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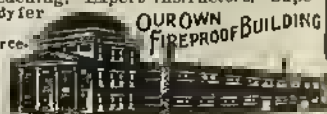
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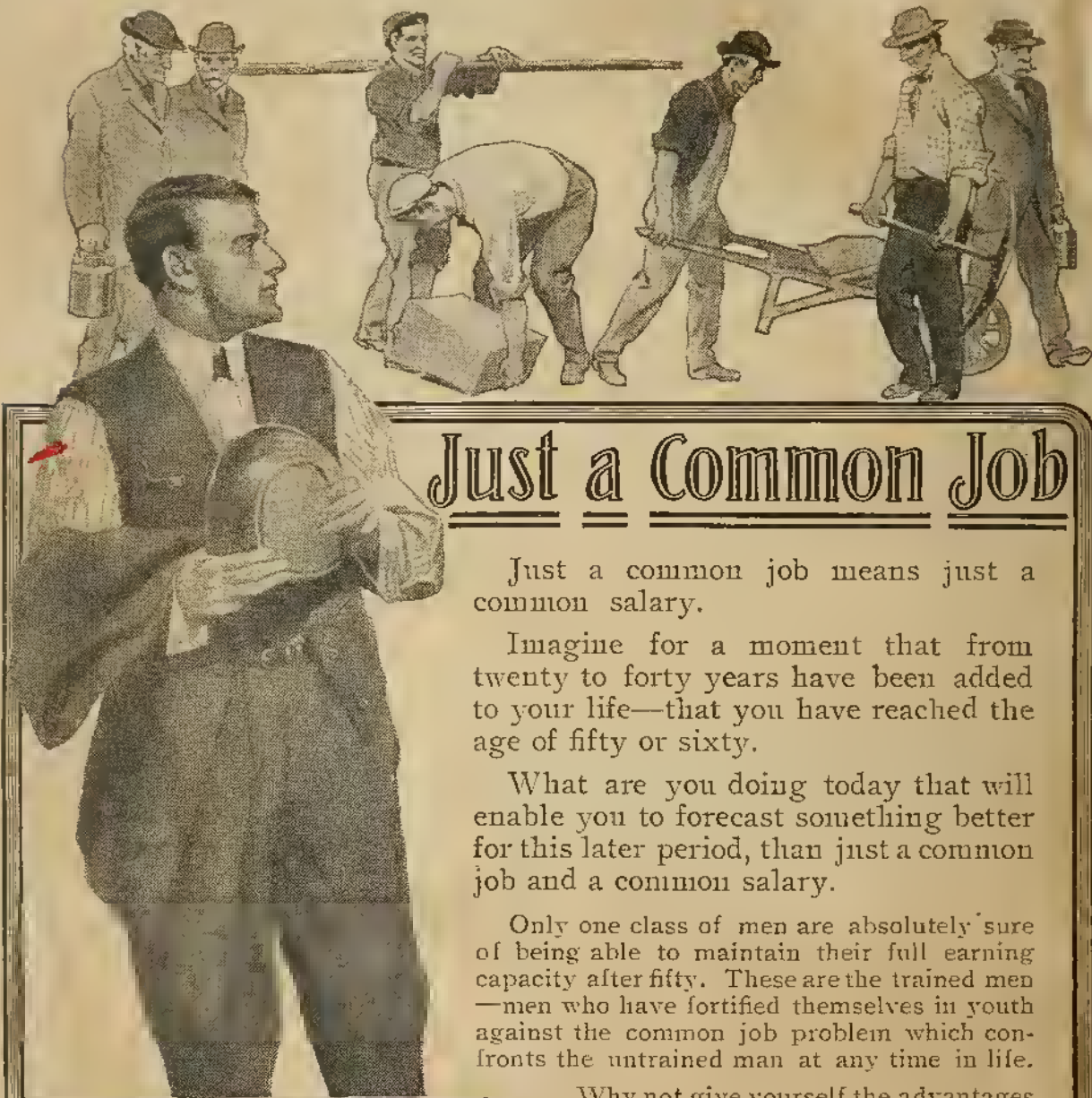
ISSUED MONTHLY BY THE FRANK A. MUNSEY COMPANY.
175 Fifth Avenue, New York, and Temple House, Temple Avenue, E. C., London

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THE RAILROAD MAN'S MAGAZINE

Vol. XI.

FEBRUARY, 1910.

No. 1.

The Headlight of Genius.

BY C. F. CARTER.

RAILROAD history is not a dry affair of dates and names and dust-covered happenings long since dead. It is living, personal, real, and most of it is recent. Of course, the great events of railroad history are fairly clear in the minds of most of us. If they aren't, we can easily find out what we want to know. For example:

When was the first railroad charter granted?

When was the first transcontinental road completed?

Who invented the air-brake, and when?

The answers to these questions are at the command of nearly every one.


But what of the lesser things, that are still as full of human interest?

When was the first bell-cord used; and what is the story that hangs from it?

Who was the first conductor to let a minister travel half fare, and why?

The answers to these and other similar questions are amusing.

Birth of the Bell-Cord—The First Train Run by Telegraph—Origin of the Ministerial Half-Fare Ticket—Coming of the Ticket-Punch, and Other Wonders.

AILROAD builders of the early days were too impatient to reap the benefits of a good idea to wait for that idea to take coherent form before they put it into operation. Consequently, many trifling details of construction and operation had to be evolved from the inner consciousness of the men who were confronted with the need of them.

Take the bell-cord, for instance, the forerunner of the air-signal now in uni-

versal use for communication between train and engine. That humble cord plays an important part in train operation. It is absolutely necessary that the conductor should have some means of signaling, the engineer always within reach.

In early days, before there were automatic air-brakes, the bell-cord was very much more important even than it is now. In Europe, where passengers are shut in little compartments where they are unable to communicate directly with

trainmen, or even with other passengers, the presence of the bell-cord has put an end to the robberies, assaults, and murders to which passengers were formerly liable.

The bell-cord was introduced by Conductor Henry Ayers on the Erie Railroad, which, being the world's first trunk line, for that reason had to solve an undue proportion of the practical problems of railroad building and operation.

In the spring of 1842, a few months after the opening of the line to Goshen, forty-six miles from the Hudson River, there were no cabs on the engines, no cabooses for the trainmen, no way of getting over the cars, and no means of communication between the train and the engine.

"Poppy" Invents the Bell-Cord.

There were no such things as train-orders, for the telegraph had not come into use, nor even printed time-cards. The engineer ran the train to suit himself, the conductor being merely a collector of fares.

Conductor Ayers, under the sobriquet of "Poppy," later became one of the most widely known and popular conductors in the history of railroading. He was witty and good-natured, and possessed in a remarkable degree the faculty of getting on pleasantly with every one with whom he came in contact.

Also, he possessed a waist-line that could be inveigled through the narrow car-doors only by the exercise of a good deal of finesse. Poppy was permitted to ride behind Engineer Jacob Hamel, a German, and the first engineer employed on the road. Hamel had always looked upon the genial Poppy with dark suspicion.

When the latter suggested that there should be some way for him to communicate with the engine so he could let Hamel know when to stop to let off a passenger, or for any other reason, suspicion became at once a certainty that the conductor was seeking to usurp the prerogatives of the engineer. Hamel decided to teach the presumptuous one his place.

One day Poppy had an idea. Procuring a stout cord, he ran it from the

rear of the train to the framework of the cabless engine. He tied a stick of wood on the end of the cord, and told Hamel that when he jerked the stick-up and down, that he—Hamel—was to stop.

Hamel growled out something inarticulate, and as soon as Poppy's back was turned he cut the stick of wood from the cord and tied the latter to the frame of the engine. Next day the same performance was repeated.

On the third day, Poppy rigged up the stick of wood at Piermont, the terminus of the road, and told Hamel that if he cut the cord again, or ignored his efforts to signal him, he would thrash him when he got to Goshen.

When the train reached Goshen the signal-stick was gone and the end of the cord was trailing in the dirt. Poppy walked forward to the engine and, without uttering a word, took off coat, vest, and hat, loosened his ample collar, rolled up his sleeves, took a reef in his belt, yanked Hamel off the engine, and sailed into him.

It was as pretty a set-to as the most ardent sport could wish to see. Hamel had all the dogged tenacity of his phlegmatic race, while Poppy, in spite of his bulk, was agile as a cat. Neither knew anything about boxing; neither had any idea of yielding.

One represented Prerogative; the other championed Progress. For several minutes they puffed and mauled each other, and tore up the earth to the delight of several bystanders, until Progress triumphed, as she always does.

That memorable victory on that balmy May morning settled for all time the question of who should run trains. Also, it introduced an exceedingly important device. Once the idea was hit upon, it didn't take long to replace the stick of wood with a gong, and then the bell-cord was fully launched upon its useful career.

Sending Umbrellas by Wire.

Poppy Ayers took a good deal of pride in his invention, and made use of it on every possible occasion. One day, in 1849, when everybody was talking about the telegraph, one of his passengers, bound West from New York, was an old

countrywoman who had been to the city on a visit for the first time in her life.

Soon after leaving Piermont, Poppy found the old lady in a paroxysm of tears and sobs. With difficulty he calmed her sufficiently to learn that, in the excitement of her first journey, she had left her umbrella on the boat at Piermont. It was an umbrella that had been in the family for years, and could never be replaced.

"Never mind, mother," said Poppy. "I'll get your umbrella for you by telegraph."

With this comforting assurance, Poppy struck an attitude, reached for the bell-cord, wriggled it a few times, cocked his head as if listening intently, wriggled the cord again, and said:

"All right, mother; your umbrella will be here in a few minutes."

Then he went forward to the baggage-car, and came back bearing the missing umbrella aloft triumphantly, to the unspeakable amazement of the old lady.

"Got it by wire, madam," said Poppy.

It was a rule that the porters were to pick up all articles left in the cabins of the boats by travelers and take them to the baggage-cars, where they could be claimed at any stage of their journey by the absent-minded ones. Poppy knew just where to look for the umbrella when he telegraphed for it with the bell-cord.

First Clerical Tickets.

To Poppy Ayers is also due the credit of originating the custom of allowing

ministers of the gospel to travel for half fare. Early in the spring of 1843, Rev. Dr. Robert McCartee, pastor of the Presbyterian church at Goshen, who made one or two trips to New York every week, was a passenger on Poppy's train bound for the city. There had been an exceptionally heavy rain the night before, and as the frost was just coming out of the ground, the track was covered with mud in the cuts so deep that the train was delayed for hours.

The passengers, as passengers always have done since the days of the ark, uttered maledictions on the management for the delay. As the hours wore on, while the train stood still some of the more spirited ones drew up a set of resolutions censuring the railroad company in strong language for its incompetence in permitting the delay.

The resolutions were passed around for signatures.

When Dr. McCartee was reached, he said he would be most happy to sign the resolution if the phraseology

were slightly changed. Being asked to suggest the changes he had in mind, he wrote the following:

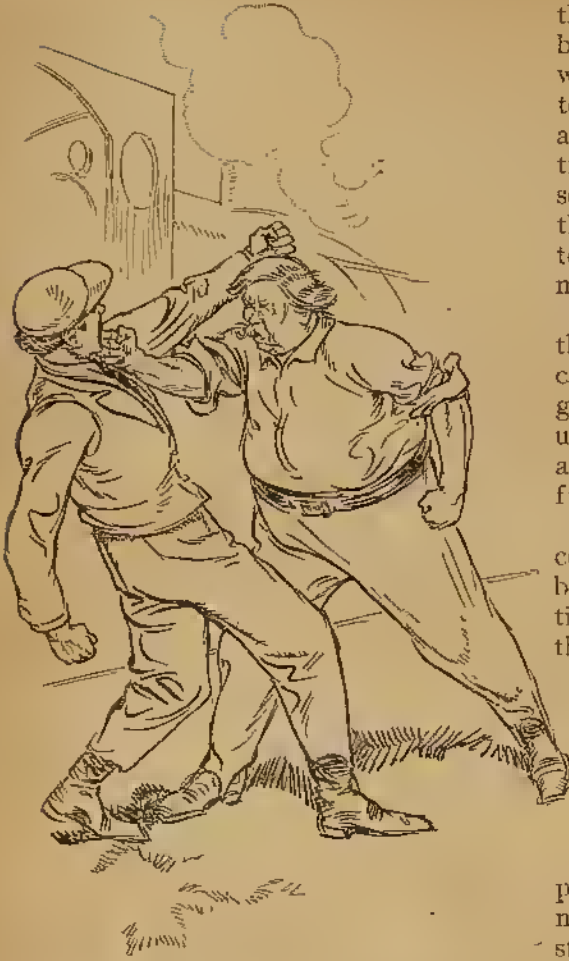
"Whereas, the rain has fallen at a time ill-suited to our pleasure and convenience, and without consulting us; and,

"Whereas, Jack Frost, who has been imprisoned in the ground some months, has become tired of his bondage, and has determined to break loose, and his head may already be seen coming out; therefore, be it

"Resolved, Thus and so."



"THE INVENTOR OF THE BELL-CORD."



NEITHER KNEW ANYTHING ABOUT BOXING.

When the good Dr. McCartee arose and read these resolutions in his most sonorous voice, there was a hearty laugh, and nothing more was heard about censuring the management of the road. Poppy Ayers was so delighted over the incident that he would never accept fare from Dr. McCartee thereafter.

Birth of the Ticket-Punch.

Not being selfish, Dr. McCartee suggested, after enjoying his free transportation for a few weeks, that all ministers be allowed to travel upon the same terms as himself. The company agreed, and for a few weeks no minister paid any fares to ride on the Erie. Then an order was issued that ministers were to be charged half fare, and that order established a precedent which was and is still universally observed.

The ticket-punch, too, was evolved on

the oldest trunk line. When the Erie began to carry passengers, in 1841, there were no station-agents. Each conductor, when he started on his run, was given a tin box which contained a supply of tickets and ten dollars in change. Passengers bound for New York gave up their tickets on the boats, for the Erie terminal was at Piermont, twenty-four miles up the Hudson.

After station-agents were appointed, the tickets for some years were of heavy cardboard bearing the signature of the general ticket-agent. These were taken up and returned to be sold over and over again until they were too much soiled for further use.

The public discovered a way to beat the company on these tickets. A passenger bound for New York would buy a through ticket to the city, which he would show to the conductor, according to custom. At the last station before reaching New York, he would get off and buy a ticket for the remainder of the trip. Then he would put his through ticket in his pocket and surrender the short-distance ticket.

On the return journey he would repeat the process, buying a ticket to destination, and then getting off at the last stop before reaching his home station and buying a ticket to be surrendered. Then he would be in possession of tickets for a round trip to New York, which he could use as often as he chose by merely paying fare for a few miles at the end of each trip.

It was a long time before the railroad company discovered the fraud. Then a system of marking the tickets by lead-pencil was adopted; but pencil-marks are easily erased, and the plan didn't work. The only mark which could not be tampered with was one which mutilated the ticket, and the necessity for some instrument that would do this neatly led to the adoption of the ticket-punch.

Train-Despatcher Appears.

The movement of trains by telegraph was developed first on the Erie Railroad in 1851. At the beginning of that year the New York and Erie Telegraph Company's lines were completed along the railroad.

D. H. Conklin, a printer who had learned to operate after a fashion, was sent to Goshen by Charles Minot, the superintendent of the road, to adjust a battery which would not work. Conklin racked his brain over the matter for two days, but at last he got the battery straightened out.

Minot was so delighted to find a man who could do anything at all with the telegraph that he insisted upon Conklin taking the position of operator at Piermont. He was the first telegraph-operator regularly employed on salary by a railroad company.

At first he didn't know what salary he was to get. In fact, the company was so slow in adjusting the matter that he was obliged to borrow money to pay his living expenses; but at last Superintendent Minot decided that thirty dollars a month would be about right, and Conklin agreed with him.

After the telegraph line was ready for business, they didn't know what to do with it beyond sending an occasional unimportant message beginning "Dear sir," and ending with "Yours, respectfully." It was left to Conklin to make the first practical application of the telegraph in expediting railroad business.

Without the telegraph it was, of course, not possible to know what an incoming train was bringing in the way of live stock or other freight. It was, therefore, the custom to put off loading the barges and boats by which freight was transferred from the end of the line to New York until after the last train of the day had arrived, so that live stock and perishable freight might be moved with the least possible delay. Under this arrangement, the boats did not get to the city until late in the morning.

One day it occurred to Conklin to ask the operator at Goshen to find out how

many cattle there were on the east-bound train, and to telegraph the information to him. Having found out that the train was on time, and that it was bringing a certain number of cattle, he told the captain of the boat to go ahead and load, leaving room for fifty-four head of cattle.

There was a grand powwow, in which the captain, the agent; and about everybody else around the pier took part, to discuss this strange innovation. Although wholly incredulous, the majority decided to go ahead and try it. To the amazement of every one, the train did arrive on time, and it did have the precise number of cattle Conklin had predicted.

The boat was ready to leave as soon as the cattle were driven aboard. The result was that when Superintendent Minot reached his office in the morning and inquired about the boat, he was greatly astonished to learn that it had arrived and unloaded hours ahead of the usual time. When he learned how



"GOT IT BY WIRE, MADAM,"
SAID POPPY.

the feat had been made possible, he was delighted.

Yet even with this strong hint, it took Superintendent Minot nine months to hit upon the idea of using the telegraph to control the movements of trains. At that time trains were run simply by the time-card. Trains going east had the right of way over west-bound trains of the same class.

A Flagman on Foot.

If an east-bound train did not reach its meeting-point on time, the west-bound train, according to the rules, had to wait one hour and then proceed under a flag until the opposing train was met. That is, a flagman would be sent ahead on foot, and twenty minutes later the train would follow, moving about as fast as a man could walk.

Under this interesting arrangement, when a train which had the right of way was several hours late, as often happened, the opposing train would have to flag for thirty or forty miles.

On September 22, 1851, Superintendent Minot was on Conductor W. H. Stewart's train, west bound. They were to meet the east-bound express at Turner's. As the east-bound train did not show up on time, Minot told the operator to ask Goshen, fourteen miles west, if it had arrived there. On receiving a negative answer, he wrote the world's first telegraphic train-orders, as follows:

TO OPERATOR AT GOSHEN:

Hold east-bound train till further orders.

CHARLES MINOT, Superintendent.

Then he wrote another order, which he handed to Conductor Stewart, reading as follows:

CONDUCTOR STEWART, TURNER'S:

Run to Goshen regardless of opposing train.

CHARLES MINOT, Superintendent.

Conductor Stewart went forward to Engineer Lewis and showed him the order. Lewis read it carefully twice, and handed it back to Stewart.

"Do you take me for a damned fool?" snorted Lewis. "I'll not run on that thing."

This being duly reported to Minot, he

went forward and tried to convince Lewis that the order was all right. Lewis refused to pull out. He wasn't looking for a chance to cross the Jordan that morning, so he proposed to abide by the rules in such cases made and provided.

Finding Lewis obdurate, Minot climbed on the engine and took charge of it. Lewis jumped off and established himself in the rear seat of the rear car, leaving the door open so he could jump when the crash came.

But nothing happened; Minot trundled along at a good clip until he reached Goshen. Finding on inquiry that the opposing train had not reached Middletown, he gave orders to hold it at that point until his arrival, and proceeded. He kept on moving under telegraph orders until Port Jervis was reached, where the east-bound was met.

The account of the superintendent's conduct caused a great commotion on the road. The engineers in solemn conclave agreed that they would not run trains on any such crazy scheme.

But the revelation of the possibilities of the telegraph in facilitating train movements had settled the matter beyond the possibility of change by all the decrees of all the engineers in the world. Superintendent Minot issued an order that telegraphic orders must be obeyed.

Testing Douglas.

But an important improvement remained to be made. Charles W. Douglas, a printer, who had picked up a smattering of telegraphy by stealth at night in a telegraph-office in the same building with the printing-office in which he worked, was given a position as telegraph operator at Addison, New York.

One day he wrote out a train-order without consulting the tape. In those days all messages were printed in dots and dashes on a paper tape. The conductor was horrified, and refused to accept the order until Douglas had spelled it out from the tape.

He considered Douglas's conduct so dangerous that he reported the matter to Superintendent of Telegraphs L. G. Tillotson, at Elmira. Tillotson was as horrified as the conductor had been. He summoned Douglas to Elmira forthwith,

and proceeded to give him a scathing lecture upon his dangerous departure from established usage.

"But," said Douglas, "if you can read your own station-call by sound, why can't you read a whole message the same way?"

"Because you can't."

"But you can, and I'll prove it."

Thereupon Douglas proceeded to write down a message by sound which Tillotson verified from the tape. But he was not convinced. All the rest of the afternoon Douglas was put through test after test.

He went through them all without a mistake. Even then Tillotson was not convinced. He sent Douglas back to his post at Addison, and tested him again. That test settled the matter, and numbered the days of the telegraph-tape.

The first shipment of milk by rail ever made in the world was made in the spring of 1842, over the Erie Railroad to New York City. As usual with all new departures, every one knew that it couldn't be done. But Thomas Selleck,

one of the two original station-agents on the Erie Railroad, thought it could be done successfully.

Selleck was appointed agent at Chester in September, 1841. He was quick to notice the excellent quality of Orange County milk, for he had lived in New York City, where in those days the only milk available was from cows kept in stables in the city and fed on slops from breweries and distilleries.

He suggested to the farmers that they would do well to try shipping milk to

the city by railroad, but they jeered at the idea of sending it such an unheard-of distance as fifty miles, subjected to the jarring and jolting of the trains. Why, it would sour and be churned into but-



TWENTY MINUTES LATER, THE TRAIN WOULD FOLLOW.

termilk before it had gone half-way. The idea was preposterous!

In those days dairying in Orange and other interior counties consisted in making butter throughout the year and packing it down to be taken by wagon to Newburg, where the wagons were loaded on barges and taken down the river to the city; there every farmer would drive to Washington Market and sell his butter himself.

The second Tuesday in November was the date of the great butter market. The

farmers called it "the day of the big trip." The butter brought from twelve and one-half to fifteen cents a pound.

Selleck finally decided to try shipping milk himself. He rented a store at 193 Reade Street, New York City, and announced that he would have fresh Orange County milk for sale there on a certain May morning in 1842. He finally induced four farmers to deliver a total of two hundred and forty quarts of milk in old-fashioned blue churns, which he shipped to his city store. He paid them two cents a quart for the milk, and paid freight at the rate of twenty cents a hundred pounds.

Icing the Milk.

The milk reached the store in good condition, and sold at four cents a quart, instead of the established rate of six cents for swill-milk. But there was not enough to supply the demand. Selleck increased his shipments as fast as he could, but he could not supply one-half the demand.

Every morning there would be a line of men, women, and children a block long, waiting at the milk depot for the arrival of the boat. The farmers were glad enough to sell their milk for two cents a quart, for there was more money in it at that price than in making butter to sell at fifteen cents a pound.

When hot weather came, trouble arrived with it. The milk soured before it reached New York. The farmers had been in the habit of delivering the milk just as it came from the cows without taking the trouble to cool it. Finally, Jacob Vail, of Goshen, procured a coil of lead pipe, which he placed in a hog-head filled with ice.

He poured his shipment of milk through the pipe. It came out cold, and arrived in the city in good condition.

Then another inventive genius discovered that all this costly apparatus was not necessary; that the same result could be obtained by merely setting the pails of milk in a spring, or even a tub of cold water, until the animal heat was driven off.

Then the troubles of the milk business were transferred from the farmers to the railroad management, which had to

find a suitable car for transporting milk, and then to meet the necessity for special trains to collect it.

The second year of the milk trade by rail produced a revenue of sixteen thousand dollars for the railroad. The third year, 6,138,840 quarts were shipped by the Erie, saving the consumers one hundred and twenty thousand dollars by reducing the old price of six cents for swill-milk to four cents for real milk, while at the same time the farmers received forty-five thousand dollars more than they would if they had converted their milk into butter at fifteen cents a pound.

Milk is now brought to the New York market from Hornellsville, three hundred and fifty miles away; somewhat farther than the fifty miles which the farmers of Orange County once thought an impossible distance. Milk has built five branch roads in Orange County at a cost of four million dollars, and has returned to the county fifty million dollars. New York now consumes 1,878,480 quarts of milk every day, and every quart of it comes by rail.

Earliest Iron Bridge.

The first iron railroad bridges, three in number, were built on the Erie Railroad in 1849; but they were all replaced by wooden bridges, because one of them, over Westcolang Creek, near Mast Hope, gave way under a train on July 31, 1849. When a freight and live stock train of seventeen cars east bound on that date struck Westcolang Creek bridge, Nat Hatch, the engineer, heard a loud, cracking sound.

He instantly pulled the throttle open, with the result that the engine got over safely; but the tender and fifteen cars went down, carrying with them Brake-man Adam Tice; George Randall, a drover, and J. L. Clapp, his helper. One hundred cattle and a number of sheep and hogs were in the cars. Randall and Tice were alive, but were penned in so that they could not get out.

While efforts to extricate them were being made, both were kicked and crushed to death by a steer which lay upon them. Clapp died soon after being taken out.

After this accident the company lost faith in iron bridges. All bridges on the road, including the famous structure over the chasm of the Genesee River at Portage, were of wood. This chasm was two

This was two months before the famous trip by Stephenson's Rocket, which is generally credited with first honors. The engineer who made this historic trip was Horatio Allen, who was born at Schenectady, New York, on May 10, 1802.

On January 28, 1828, Mr. Allen was sent to England to buy three locomotives. One arrived in New York early in 1829.

It was sent to Honesdale, where it was set up by Mr. Allen, who also made the



EVERY MORNING THERE WOULD BE A LINE OF MEN, WOMEN,
AND CHILDREN.

hundred and fifty feet deep and nine hundred feet wide. A congress of engineers was assembled to devise a span.

A wooden bridge of fifty-feet spans was decided upon. It required two years of time and an outlay of \$175,000. When it was opened, on the 9th of August, 1852, 1,600,000 feet of lumber, the product of three hundred acres of pine forest, had gone into its structure.

But the science of iron bridge building was making progress; and when the great wooden bridge burned in 1875, it was replaced in forty-seven days with a modern iron one.

It is a fact pretty generally overlooked that the first successful fast trip ever made by a locomotive was made by an American engineer on an American road.

first trip on it. Allen was chief engineer of the South Carolina Railroad, the first railroad ever built which was designed from the outset to be operated by locomotives. He was afterward president and chief engineer of the Erie Railroad, engineer of High Bridge, New York, and the inventor of paper car-wheels.

The story of this first locomotive trip ever made was related by Mr. Allen in an address at a dinner at Dunkirk, May 15, 1851, celebrating the opening of the Erie:

"When was it? Where was it? And who awakened its energies and directed its movements? On August 9, 1829, on the banks of the Lackawaxen, at the commencement of the railroad connecting the canal of the Delaware and Hudson Canal Company with the coal-mines,

and he who addresses you was the only person on the locomotive.

"The circumstances which led to my being alone on the engine were these: The road had been built in summer; the structure was of hemlock; the rails were timbers notched on caps placed far apart. The timber had cracked and warped from exposure to the sun. After about three hundred feet of straight line, the road crossed Lackawaxen Creek on a high trestle about thirty feet above the water on a curve of three hundred and fifty to four hundred feet radius.

"The impression was very general that this iron monster would break down the road, or that it would leave the track at the curve and plunge into the creek. My reply to these apprehensions was that it was too late to consider the probability of such an occurrence; that there was no other course but to have a trial of the strange animal which had been brought there at great expense, but it was not necessary that more than one should be involved in the same fate; that I would like to take the first ride alone, and the time would come when I should look back to the incident with great interest.

"As I placed my hand on the throttle, I was undecided whether to go slow or with a fair degree of speed; but, holding that the road would prove safe, and preferring that, if we did go down, to go

handsomely and without any evidences of timidity, I started with considerable velocity, passed the curve over the creek safely, and was soon out of hearing of the cheers of the vast assemblage present. At the end of two or three miles I reversed and returned without accident to the place of starting, having made the first locomotive trip on the Western Hemisphere."

The first attempt at train-wrecking ever made took place in the last week of November, 1852. A track-walker on a section near Andover, New York, on the Erie Railroad, found an obstruction on the track that had evidently been placed there with the intention of wrecking the east-bound express. A watch was set.

At 9 P.M. Friday, November 26, 1852, a few minutes before the east-bound express was due, two men appeared on the track carrying a log chain. They went to a wrecked gravel-car, and, taking from it a pair of wheels, chained them to a culvert where they could not be seen until the train was close upon them.

The two were seized and taken to jail at Angelica, where they were found to be George Palmer, a cabinet-maker, aged twenty-five, and Sam Allen, a blacksmith, aged twenty-one. They were tried and convicted of attempting to wreck a train, and on February 3, 1853, were sentenced to serve four years each in prison.

THE ENGINE'S HYMN.

BY H. J. SMITH.

Written for "The Railroad Man's Magazine."

I LOVE to hear the whistle blow,
It sort of lets a person know
That all is well; that the engineer
Is watching to see that the way is clear.
There's something comforting in its
sound,
While on some journey you are
bound;
If you know its language you can
tell
If there's something wrong or all is
well.
"All aboard!" Toot, toot! the defi-
ant sound,


Is echoed and echoed for miles
around.

And ever as we speed along,
You catch the spirit of the song.
Sometimes at night, when all is still,
I can not close my eye until
I've heard the call of the night express,
Thundering on to the Golden West.
I can hear it whistle long before
It passes by the station door.
And I listen until the sound grows
dim—
And go to sleep to the engine's hymn.

COMEBACK'S PRIZE POLTROON.

BY CALVIN JOHNSTON.

Even the Ghost of His Grandfather Couldn't
Swerve Tim Grogan from His Calculations.

"IM GROGAN," remarked the Old Switchman, filling his pipe with the yardmaster's tobacco and absently putting the pouch into his pocket. The yardmaster snapped his fingers and his companion eagerly returned the pouch.

"To think I w'u'd forget such a thrifle!" said the Old Switchman sadly, "and when I'd rather be smokin' soft coal than this stuff any day."

The midnight freight clattered past over the crossings, and two other mem-

bers of the yard crew entered the switchshanty and put down their lanterns.

"What about Tim Grogan?" demanded the yardmaster sternly.

"He was the lad for the higher arithmetic," answered the Old Switchman musingly; "high enough to go in for astronomy. Subtractin' was play to him, and we used to call him superintindint av division—though his only job was herdin' cars with a lead-pencil in the yards at Comeback."

Removing the pipe, he gazed into the bowl and lapsed into silence.



"GROGAN W'U'D SIT ON THE STATION PLATFORM AND ADD UP THE CAR NUMBERS FOR THE IDDICATION THERE WAS IN IT."

"Throw in a little more coal," suggested one of the switchmen from his perch on the tool-box, and with an exclamation of disgust the yardmaster hurled his pouch at the Old Switchman, who all but emptied it into his pipe and pocket.

"Though 'tis little use I can make av it," he complained, "I am gettin' ould and wind-broken from overwurrak, and can hardly get a draft through the pipe—p'rhaps the flue is choked up a little bit. Wance I c'u'd draw like a suction-pump—"

The switchman on the tool-box reached for a wad of oily waste with a look there was no mistaking, and the ancient narrator suddenly took up his story as if the thread had remained unbroken from the very first word:

"Whin there was nothin' else to do, which was from noon till 7 A.M., Tim Grogan w'u'd sit on the station platform at Comeback, and add up the car numbers for the iddication there was in it. Aftherward he w'u'd calculate the date av your birth, which made him disliked by the women, or the date av the superintindint's death, which made him popular with the men, for he proved it was no distant day. Ivirying he did was the raysult av careful calculatin'.

"He knew the exact time it w'u'd take the flier to come from the bridge to the station, and w'u'd sthroll across the track in front av it so close that the suction w'u'd pull out hairs from his head and scatter thim like sparks, for Tim's head was the color av a prairie-fire, the friction av figures kapin' his skull at a red heat.

"Kitty Flannery, who was the chief despatcher at Comeback, with no subordinates, despised him for calculatin', though Tim had kept her company for three years, eight hours, and wan minute. The eight hours bein' the length av his call the night before while Tim was calculatin' sh'u'd he ask her to marry him, and the wan minute bein' the time it tuk Kitty to answer in the negative.

"Nixt day Tim sat in the lunch-room estimatin' the number av chews it tuk to reduce a sinker to food, whin Kitty came in. The two av thim nodded with caution, and afther a bit Tim asked:

"Have ye calculated well on what I asked ye last night?"

"I have," answered Kitty with great enthusiasm; "I have given eight hundred and fifteen cheers meself, actual count, for rayplyin' as I did."

"Ye c'u'd give thim in two hours and five minutes," said Tim; "have ye filled in the balance av the time by regrettin' me?"

"Regret ye?" she replied with a laugh and toss av her brown curls; "ye cold-blooded polthroon, who w'u'd calculate on askin' a lady to marry ye as ye w'u'd on buyin' a horse! Niver will I regret ye."

"Raymimber, woman," said Tim, raisin' his pencil, "I have calculated the day ye were born; ye are too old ivir to have that question raised again."

"Kitty, for all her blue eyes and pink cheeks, gave him a look as black as a witch. 'Ye are a polthroon,' she said wance more.

"Tim felt this was a hard wurrud, which it was above the power av the highest arithmetic to explain. He thought it over in a dark humor, feelin' that she had raised a wall betwane thim.

"Yez answer last night was correct," he tould her thim, as if it had been a sum in figgers; "will ye let me join in the cheerin'?" With this he raytrated cautiously through the door, comin' back for his hat whin he heard the station-call in the telygraph office.

"Afther a while he went into the station-room and stood around; prisiintly the engineer av the switch-engine came in, too; and Kitty, who had pretended not to notice who was there, stopped behind the counter av the telygraph office.

"She smiled at the engineer, who came up to the windy and stood sideways, with wan eye glarin' at Tim and the other winkin' at Kitty, till the fireman rang the bell for him. Tim took his place before the counter, but she paid no attintion till he had called her twice.

"I am not to blame," he said; "Kitty, I calculate by impoolse; 'tis impoolsiveness at the bothom av it. Ye must take me as ye find me."

"Impoolse," raypated Kitty—with an icy laugh; "why, the wreckin'-crane, which takes six hours to make up its mind whither to hold an ould box car in

the air or to drop it and break it over ag'in, is hysterical beside ye.'

"'Ye led me on,' dayclared Tim.

"'It has taken three years to shake ye,' said she.

"'Ye called me a hard name, woman.'

"'Surc; look it up in the arithmetic; the dictionary is black magic to ye.'

"Tim was defeated with great loss av

gan lookin' as blue as the caves below Killarney, where Tim's grandfather used to raytire to curse his landlord in privacy.

"'Twas a bould man, that ancistor,' said Tim, callin' him to mind; 'I calculate he w'u'd have cursed a switch-ingineer—if he had owed him rent. But he used up all the courage that had come



"TIM WAS CALCULATING
SH'U'D HE ASK HER
TO MARRY HIM."

spirits and wint away, thinkin'. 'She has taken up with that greasy spalpeen who is proud av his dirthy switch-ingine. And me with a disthant relative at headquarters! If he was not so disthant, I w'u'd instrooct him to fire thim wan afther another.'

"'Beware, woman; it is the pride av ye that goes before a fall,' he said. But this was out av ear-shot, for he didn't want her to be warned av his relative.

"All that afthernoon he attracted unfavorable attintion from the telygraph office, till at last the whole wurruld be-

down in the family from the King av Balhooly; not a spark did he leave for us, bad 'cess to him, or I w'u'd take that greasy divvil apart a limb at a time.'

"When he got through upbraidin' his ancistor for bein' a spendthrift av the family courage, it was time fur the through flier; and, afther a calculation which w'u'd have humbled ashthronomy to the dust, he strolled across the track with Kitty watchin' him from the windy.

"This time the draft av the train not only plucked his hair like the fingers av a banshee, but almost dragged out his

head by the roots, and left him spinnin' like a top in the cinter av the track behind the train. When he c'u'd walk ag'in without feelin' that he was on a turn-table, Tim looked in at the telygraph office, where Kitty lay across the table in a faint.

"Ye are losin' color from worryin' over that answer," said Tim.

"Ye are a fool," whispered Kitty, white as a ghost.

"It is the raysult av calculation," replied he.

"Not so; it is the raysult av nature," said Kitty, and, as her face from bein' very white began to grow very black, Tim went away quickly to curse the ancistor who had left his descendants to shiver with fear.

"That evenin' the ingineer walked home with Kitty; and later, when Tim passed the house, he saw him makin' a call, for Kitty had placed him so the lamp w'u'd throw his shadow on the windy-curtain.

"That is a big, strong shadow," said Tim, 'but I w'u'd stand up against it, if the owner w'u'd raymain quiet.'

"Thin he went to Flannagan's, the flagman, who had a library av his own.

"What is polthroon?" asked Tim.

"I will tell ye," says Flannagan; 'I have "polthroon" at me tongue's end. Bridget, where is the dictionary?'

"Sure, I traded it for two magazines av fashion," answered Mrs. Flannagan, who had wore a polky-dot calico, and an osthritch-feather with an elbow in it, for three years.

"Ye are a peacock, who w'u'd feed on book-worms," said Flannagan, woid at the thought. 'Where is the other book av the library?'

"I used it for currul-papers; we have wurds enough in the house already.'

"I will go to the beer-garden," said Flannagan in a threatenin' voice.

"It is an invitation," said she, puttin' on her hat; and so Tim and Flannagan stayed at home and played pinochle till they quarreled, and the two av them thrust Tim outdoors.

"He went past Kitty's house again. The ingineer was still callin', and Tim calculated the width av his shoulders on the curtain before undoublin' his fists and walkin' on softly.

"But next mornin' Tim went to take the car numbers, wonderin' why the sun didn't rise. As he came back toward the depot through the yards, it got so dark that the caves below Killarney w'u'd have blinded him with light.

"The switch-ingineer was passin' in and out all day, while Tim sat on the platform calculatin' the number av times the wurrud 'polthroon' w'u'd occur in his own funeral service, which he set for Friday.

"I cannot outlive Friday, whenever it comes," he tould himself, and he felt that life was passin' him as a pay-car goes by a tramp.

"Now, it used to be a common rayport along the ould P. D. Q. that in choosin' the right av way from Comeback to the foot-hills, they'd imploied a crow instead av a surveyor. You c'u'd stand in any spot av that wan hundred miles and, lookin' either way, see the two lines av rails come together like the points av a silver spear sharpened at both inds. Not a crook, or even a waver in all this disthance, though there was a stiff grade from Comeback to the foot-hills.

"Tim knew this as well as any wan, but on this day he had no mind to give it calculation till toward evenin'. While waitin' for the flier he saw Kitty rush out onto the platform with a piece av paper flutterin' in her tiny fist.

"There was tears av fright in her big blue eyes as she raised her hand to beckon him. Thin, raymemberin' the slight Tim had put upon her by takin' 'No' for an answer, and by not drivin' the ingineer out av her favor, she stopped short and waved her hand down the yard instid.

"The next minute the ingine was beside her, with the ingineer leanin' out av the cab-windy.

"Make haste for the life av ye!" she cried, wavin' the paper as if flaggin' him with the death notice. "'Tis a freight-train busted in the foot-hills, and tin cars av coal are on the way back here like the bullet out av a gun!'

"The man hung there as if frozen; and thin, with a white smear comin' over his dirty face, reached for the lever. But Tim Grogan had heard and was on his fate.

"The flier!" he yelled.

"Is rummin' fifty minutes late!" said

Kitty, furgittin' her impoliteness in the excitement.

"'Thin it is past the division-point,' goes on Tim; 'and none av the stations betwane here and there have night-operators! The offices are empty hy now! If those coal-cars should raytrate through Comeback as the flier comes up, 'twill be a foine wreck!'

"He drew out a pencil and piece av paper so cool that Kitty's eyes began to blaze.

"'Ye have no heart av a man at all,' she cried. 'Think av the people killed—' She put her hands over her eyes, while the engineer growled at Tim and reached out with his fist.

"'Be quiet,' said Tim, 'I'm calculatin'.'

"'It's crazy he is with figgers in the

head,' said the fireman. 'Let's get into sidin'.'

"'Stay where ye are!' commanded Tim. 'I'm calculatin'.'

"He picked up the piece av paper which Kitty had dropped and went on as if teachin' a class in arithmetic.

"'The passenger will be here at 7.40. Accordin' to this wire, the coal-cars were sixty miles away at seven o'clock. They will come down the grade at ninety miles an hour—I have figgered it many a time. They will meet the flier here in the yards at Comeback! It is an illigent time-card,' he said, and went racin' on with his figgers, while the others stood by, not knowin' what to make av it.

"'And there is no place to ditch the coal-cars excipt Backwood Sidin',' he raysumed, 'where they will be at 7.30.

It is now 7.10,' and he looked at his watch. 'There raymains twenty minutes to throw the switch at Backwood Sidin'.'

"The other three looked at each other wit' startin' eyes, while



J. NORMAN LIND.

BE QUIET," SAID TIM.
"I'M CALCULAT'N."

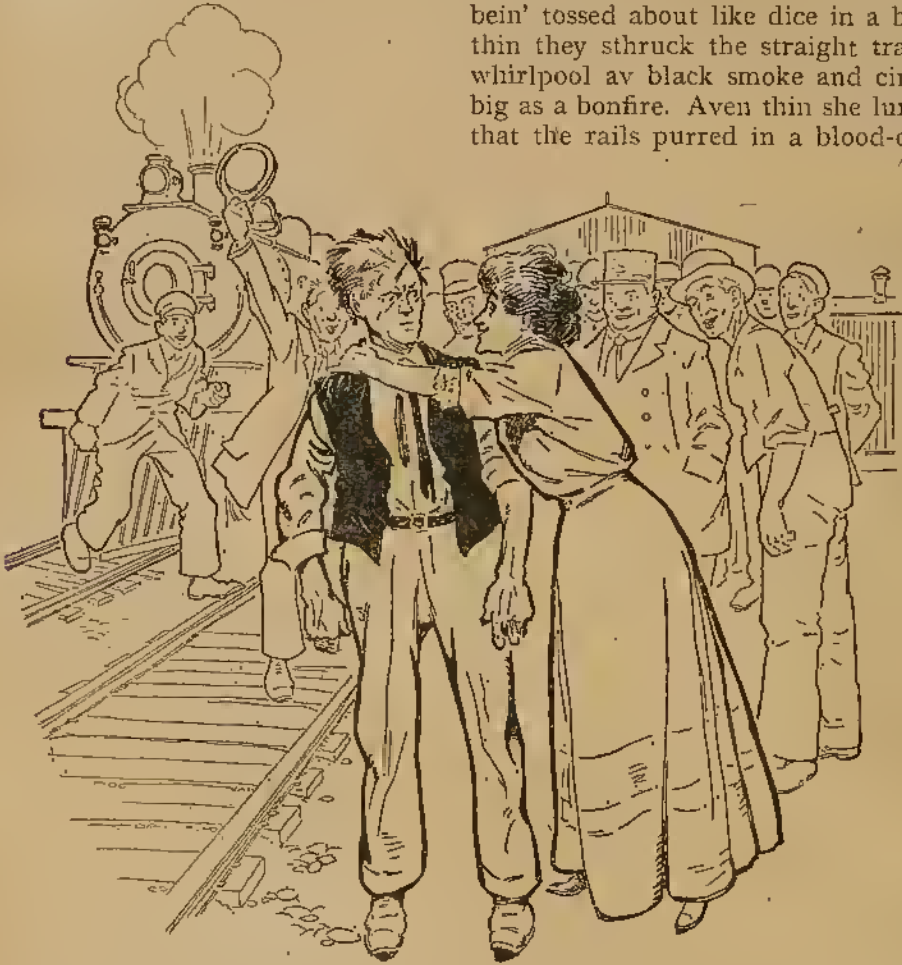
Tim kept his eye on the watch, whose tick-in' began to sound as loud as the clang av a fire-gong.

"'Nineteen and a half,' said Tim. 'Nineteen! Are ye still here?'

"The fireman got out av the cab. 'Fif-

"'Now, this is like ridin' out a cyclone on a spring-bed,' says Tim to himself, as, with the throttle wide open, his toy engine began playin' leap-frog out av the yards. It is a hurdle racer yez are, ye scrap-iron Nancy Hanks.'

"He threw coal into the fire-box, while bein' tossed about like dice in a box, and thin they sthruck the straight track in a whirlpool av black smoke and cinders as big as a bonfire. Aven thin she lurched so that the rails purred in a blood-curdlin',



"YE HAVE SAVED THIM ALL!" SHE CRIED, "AND, BEST AV ALL, YE HAVE SAVED YOURSELF!"

teen miles in about that many minutes wit' this ould tea-kittle! And thin throw the switch at Backwood!' He burst out in a great tremblin' yell, and sat down on the cinders.

"'They may be comin' wan hundred and fifty miles an hour,' said the ingineer, with that white smear showin' more and more through the dirt.

"'Yez are no calculators,' said Tim in disgust. He just waved his hand. The ingineer stepped out and stood stoopid, wit'out wurrud or sign. 'I will show ye what is arithmetic,' Tim told thim all, and thin ran away with the ingine.

steely way. The purr rose to wan long infernal scrame, and the little ingine—pantin', clawin', spittin' like a wilcat—seemed tearin' the whole road-bed to scraps as she whizzed along.

"'Eleven minutes,' said Tim, calculatin'. 'But where are we? I can no more count the mile-posts than pickits on a fince; besides, the dark is on me.'

"And night it was by that time, as it comes ou the pra'ries, wit'out a light in the earth or sky, and him with no head-light hurtlin' on into the solid blackness av it. The red rays burstin' through the fire-box door turned his hair and face the

color av blood; his hands seemed drippin' with it as he held up his watch.

"'Four minutes more,' he said, lookin' at the speed-recorder. 'I will have wan minute to throw the switch.'

"He leaned far out the windy to catch a landmark with his eye.

"'Wurroo!' he yelled suddenly with the excitement av the occasion. 'Why didn't the ould divvil curse the landlord to his face, insthead av in the caves av Killarney? If he were only here to curse the coal-cars!'

"The coal-cars! It was the first time he had thought av thim.

"'Still, it takes more courage to curse a landlord, even behint his back, for here I am p'rotected by calculation,' said Tim.

"'And is your calculation thrue to the minute?' asked the spirit av his grandfather, gettin' into the cab with him.

"Tim fell back out av the windy, and his hair stuck straight out av its own will.

"'It can't be wrong,' he gasped; 'I have me own time-card.' And thim he remembered too late that no train icht the wrecker iver ran on time on the P. D. Q. He shut off the steam with his face a smear av white in the bloody light.

"'From now I will curse insthead av calculate,' says Tim. 'A man has no right to know more than his ancistors.'

"The runaways are comin', as wan meteor to mate another, till the second whin they crash and shplinter the earth and sky like glass. There was a sharp crackle under the wheels as the engine slowed down, and Tim clamped the brakes on her so sudden that she bucked as if startin' to turn a cropper off the right-av-way.

"Tim trimbled as he backed her up thirty yards. 'Curse away now, ye ould divvil,' he said. 'Ye have left me no courage, aven for calculation.'

"He jumped out and staggered toward the switch stand; he fell down and crawled; he fumbled with the lock. A roar burst out av the dark like the salute av a battery in his left ear; his head rocked before it; he dropped the key.

"'Polthroon, polthroon!' lie kept thinkin', as he pushed himsilf away to be clear av the ruin, whin the wild cars would wade through the switch-engine. 'I raynimber,' he yelled. He shook his fist into the face av the night. 'I heard it wance before. It means a coward!'

"He groped for the key with his tremblin' hands and picked it up. 'And it is thrue. I am sthruck with panic,' he stutted in a chill av horror. But it is a liar I will prove the woman, who has no business to calculate a man's character.'

"He pulled on the lever, kneelin' down. Somethin' passed by in front av him, startin' an avalanche av air, which pinned him to the ground like a wave av solid rock.

"Only for an insthant, howiver, and thim he sthorted to fill up the vacuum made by the runaway cars, which were now ingaged in throwin' coal from a pile av wreckage at the ind av the sidin'.

"In thirty minutes Tim knew enough to hop on wan foot, which he did, back to the switch; and, closin' it, he climbed into the ingine. His grandfather's ghost got in alongside.

"'Unload!' commandid Timothy. 'We are not in it with a calculator.' That was the last he saw av him.

"The flier was in the yards whin he got back to Comeback, and hoondreds av people mobbed him in gratitude. But Kitty, breakin' through the crowd, lunged about his neck.

"'Ye have saved thim all!' she cried, 'and, best av all, ye have saved yourself!'

"'It was—' said Tim, but the memory began to gain on him, and the wurrud sthuck in his throat.

"'Calculation,' laughed Kitty, her eyes brimmin' with tears; 'but I'll take ye as I find ye.'

"'Woman! Niver spake that wurrud to me ag'in,' said Tim, steadyin' his voice. 'I felt death blow into my face. My brain froze stiff, and thim he lured me afther him a quarther av a mile down the sidin', tūrnin' handsprings. Do yez think I am a fool to calculate so far? But "Polthroon" is a different mather—'

"Kitty raised her head from his shoulder, while Tim and the ingineer, who had come up, gave wan look at each other.

"'Maybe she was right,' said the ingineer. 'But I have a duty to the company, and will take no chances against him.'

"'Is that all?' asked the yardmaster.

"'It is enough,' replied the Old Switchman, 'only I will add that the relative in his distance heard av Tim's calculation, and took him into the transportation department as the only author av a time-card whose train was ivir on time.'



The Inside of the Freight Department.

BY T. S. DAYTON.

WHEN a boy gets a watch he always wants to examine the works. When he gets older he doesn't care, but he still carries with him the passion for looking at the inside of things to find out how they work. This curiosity is the secret of achievement. This article is for the young men who have that wide-awake curiosity. If you read it you will not find your curiosity satisfied, but only more excited. Then you will get in and do something. That is what we want.

How a Great Railroad Organizes Its Chief Revenue-Producing Traffic; a Glimpse of the Big and Little Men Who Do the Work, and How They Do It.



HE traffic-manager of a railway is usually one of the highest salaried men on the official list. His post is close—if not next—in real importance to that of the president, even if a few vice-presidents may outrank him. On many of the large systems, however, the traffic-manager is one of the vice-presidents.

Although he has charge of passenger traffic as well as freight, it is with freight affairs that he is most especially concerned, even though he has as his chief lieutenant a highly qualified general freight-agent. The freight earnings of

a railroad are about three times as much as the passenger earnings, and seventy-five per cent of the road's total receipts.

Twenty years ago the average salary of a good traffic-manager was ten thousand dollars a year, and of a general freight-agent a little over half that sum. Exact wage statistics of this sort are hard to get at, but it is safe to say that to-day there are several traffic-managers who are drawing more than twenty thousand dollars annually, and a fair number of general freight-agents who get ten thousand and over.

What must a man know in order to fill either of these high places with credit

to himself and with profit to his company? Let us first take up the traffic-manager's qualifications and duties, and then work down through the list of his subordinates, on whom he depends—those who head his various sub-departments—clear through to the station-agent out on the firing-line, for among these or their employees are the traffic-managers and general freight-agents of to-morrow.

The Busiest Man.

One of the traffic-manager's principal duties is rate-making—a task that, owing to the ever-changing adjustments of trade, is never finished. These rates cover principally the transportation of goods. Upon his skill in fixing them so as to leave a reasonable profit for the road and at the same time stimulate business depends to a great extent the prosperity of his company.

Every civilized human being has an influence on the ebb and flow of the freight business. The adjustments of trade to-day may be obsolete to-morrow. That is why the traffic-manager's task of rate-making is never finished.

Even the president himself does not keep as minute watch of the company's total receipts and expenditures as does the traffic-manager, who also scrutinizes continually the total volume of traffic—how it is made up, how it fluctuates and what its ever-changing and peculiar needs are.

He keeps in close touch with the head of the operating department in regard to the number and time of trains. He conducts the difficult negotiations with the traffic-managers of other roads relative to through rates, what percentage of the revenue each road shall receive, and all other questions in regard to the interchange of traffic. He must know the conditions of every business and of all markets, and must work continually to increase the traffic of his road.

Traffic-Manager's Right Arm.

To do all this, the traffic-manager must be a man of mature judgment, he must have clearness of perception, firmness, consistency of purpose, practical experience and a perfect familiarity with the resources of the company. If he is in-

competent no one can lose so much money for a railroad in so little time.

It is the traffic-manager's first lieutenant, the general freight-agent—his understudy, in fact—on whom his success depends to a considerable extent. In cases of necessity, this official temporarily assumes all the duties of the traffic-manager in making rates and directing the flow of traffic.

The general freight-agent's first duty, however, personally and through his subordinates, is to get business for the road and keep his competitors from taking it away. It has to be hunted out and solicited precisely as other goods are sold. The competing sellers of freight transportation, however, have a little more handicap than the sellers of merchandise, for their prices are all the same, and they have to depend on personality and service to get the business.

A Man of Leisure.

In brief, the principal routine duties of the general freight-agent, outside of getting business, are as follows. He issues regulations governing the transportation of freight and the disposition of perishable property and high-class freight. He has to keep an eye out to see that there is no laxity in the weighing and inspection of freight in transit over his line; that the cars are not overloaded so as to go limping to the repair-shop in unusual numbers.

He prescribes what classes of freight shall and shall not be loaded together, how it shall be placed in or upon cars, how it shall be handled while in transit and when it arrives at destination, and the disposition to be made of claims, for delay, overcharge, loss and damage. Finally he has to see that measures are rigidly enforced to insure getting the freight to its destination in the shortest possible time after the railroad receives it from the shipper.

Issuing regulations and seeing that they are enforced are parts of the general freight-agent's work that the public sees little of. To the many people who call on him in the course of a day, he seems to be a man of abundant leisure in which to discuss affairs.

The general freight-agent climbs up

to his place through a long list of subordinate offices. He knows about the weight and bulk of freight—perhaps, because he long has handled it at some station. He is familiar through long experience with every fine point of the freight classification.

He understands thoroughly the resources of the country that is tributary to the hundreds or thousands of miles through which his road passes. The strife for business at junction or other competitive points makes it imperative that he shall know what his rivals are doing, so that none of them shall catch him napping.

Men Who Get the Freight.

Connected with the general freight office, when it is located in a large city, are a number of freight solicitors who report either directly to that office or to the heads of the branch offices which are located at various strategic points throughout the town. These men are like the city salesmen of a large mercantile house. Wherever there is a possibility of getting business they go after it.

If the newspapers mention the letting of a big contract which will involve the transportation of large quantities of material, they are at the contractor's office in the morning awaiting his arrival so as to present the advantages of having the business transported over their line.

They have a wide acquaintance, and their work brings them in touch with every class of industry and with all sorts of people. As all the competing railroads are practically on an even basis as far as rates are concerned, the successful solicitor must be a man of pleasing personality.

He must know how to interpret the freight classification correctly and must also be familiar not only with the rates which it governs, but also with a vast number of commodity and special rates. Like the commercial salesman he must have a thorough knowledge of the goods he is selling, and must make no mistakes when quoting prices.

The salaries of these freight solicitors vary according to their experience, acquaintance, and efficiency. A beginner would not receive over \$40 a month. He

would be sent out at first to answer requests for rates on specific classes of shipments, with the information carefully prepared in advance, and with instructions to refer any new inquiry to the office for further instructions.

By the time he had learned his job thoroughly and was able to be trusted to "run alone," his salary would be double that. If he rose to be one of the crack business getters in his department, he could doubtless command \$125 a month.

There are cases where freight solicitors are paid as high as \$175 a month, but they are men of exceptional talents in that line, and they generally become division freight-agents when they are able to command that salary.

A boy or a young man who wishes to enter this branch of the freight department—and by many it is considered one of the best in which to acquire a knowledge and experience that will be of great service in securing future advancement—should make his application to the division freight-agent in the district in which he is located. The general freight-agent, except on very large systems where the departments are minutely subdivided, has the hiring of the freight solicitors who cover the city or section of the country in which the general offices are located. These men report direct to his office. Application for this employment should be made by letter or in person to that official.

The Inside Force.

But the soliciting end of a freight department, while extremely important, is no more so than the great office forces—the men who by letter and by record-book carry on the work that the solicitors have begun. It is only a part of the detail to secure the business. Once obtained it must be looked after most carefully, and for this the railroad needs not only a large but an able and energetic clerical force.

Each freight department of a large railroad, though individual lines differ in their planning, is divided, as regards its inside workings, into approximately these sub-departments: The Freight Tariff Bureau or Rate Department, the Freight Claim Department, the Tracing Department, and the Overcharge Department.

Closely allied with these, though not a part of the Freight Department itself is the car accountant's office—a part of the Accounting Department—which keeps track of where the cars are.

How large these sub-departments are, may be realized from the records of one of the large Eastern railroads that has in its main office twenty-five clerks in its Overcharge Department alone, forty clerks in its Rate Department, sixty to seventy-five clerks in its Freight Claim Department, and fifteen in its Tracing Department—about one hundred and fifty in all.

Makers of Rates.

The titles of these departments are largely self-explanatory. Each is presided over by a highly qualified executive clerk, and the Claim Department is generally so important that its head has his name in the list of officials under the title of freight claim-agent.

The Freight Tariff or Rate Bureau has in direct charge the making up of all the freight rates—those based on the classification, commodity rates, special rates, local and through rates. In the matter of through rates, however, they furnish only the data which is necessary for the heads of the Traffic Department to determine the basis on which they shall adjust the through charges and the proportions thereof with the connecting lines who participate in hauling the merchandise.

Whenever changes in through rates occur—and that is always happening in some part of the country—the Rate Department sees that its tariffs are adjusted as quickly as possible to meet the changed conditions. The schedules of freight rates that continually come from this office are passed upon by the general freight-agent and by the traffic-manager before they are issued for use.

This department is in charge of a chief clerk, who is generally a member of the freight tariff committees throughout the country, and has to keep in close touch with them personally and by correspondence. Rate making in the freight department of a railroad is a science by itself that takes the ablest man a number of years to be classed as an expert.

It is a common saying that no one ever learns it thoroughly. The experts, however, are among the best-paid men in the clerical force of the Traffic Department. It is rare for them, however, to rise to the higher-executive positions.

The Freight Tariff Bureau's head, on an important line, will receive on the average \$200 a month salary. His chief assistants will draw from \$100 to \$150 a month. Those who do the routine work will get the usual scale of clerical labor, according to their knowledge and efficiency, from \$40 to \$75 or a little over.

If mistakes and accidents never happened, the Freight Claim Department would not exist. But where there are millions of individual shipments each year—as there are on each of the great railway systems—there must be a certain proportion of errors, out of which claims arise. The classes of freight claims are: loss, damage, and overcharge.

The number and amount of claims are very great on even the best organized line. Each one has to be carefully investigated, which takes endless time and patience.

Shippers put in claims hastily in many cases. The consignee of a few pieces of household goods, for instance, does not receive them as promptly as he thinks he should. He concludes that they are lost and writes the railroad company that such is the case, usually claiming a value on the goods that is far in excess of what they are worth.

Most Interesting Department.

The Claim Department puts a number on his letter and replies asking for the original bill of lading so they can make investigation. Meantime the goods have arrived, and nothing more is heard about it.

Nevertheless, on many roads this is numbered and listed as a claim. This partly explains why the number of claims per year on a large system will often pass the hundred-thousand mark.

At best the adjustment of claims is one of the most vexatious branches of the service. It is to the road's interest to make prompt and full settlement of every just claim. But every claim must be examined carefully before it is passed.

In a case such as that of the household goods, if they had been really lost, or were received in a damaged condition, the railroad company would have to follow up the matter step by step, and ascertain every particular as to where they were lost and why or how much they were damaged. This investigation is necessary in order to prevent the road from being imposed upon, and it is also necessary to ascertain the cause of the mishap, for upon that may hinge something important concerning the efficiency of the service.

Making of Mail.

If the claim is for local traffic, its adjustment is comparatively simple, but if several other roads have handled the merchandise before it was lost or delivered in a damaged condition to the consignee, it becomes a complex matter to fix the blame, and the result is seemingly endless correspondence caused by the making of innumerable inquiries. Occasionally a single claim-file will contain no less than two thousand separate letters and documents before it is finally settled.

Paid or rejected it must be, however, as quickly as the methodical investigation is finished, and the efforts of most railroads are in the direction of investigating claims to their conclusion with the utmost despatch. Otherwise their business is likely to suffer.

In the Freight Claim Department, where the Overcharge Department is a distinct organization, the chief's job is worth from \$200 to \$250 as a general thing. His assistant will draw from \$150 to \$200. There will be a few employees at \$100, but the most of them will get from \$40 up for the clerical work.

The Simple Side of It.

Overcharge claims are more easily adjusted than those for loss and damage. They outnumber the loss and damage claims many times.

These overcharge claims arise in this way. There is an enormous number of rates that an agent, even at the smallest station, has to try to master.

If he charges too low a rate on the way-bill it is the custom of some roads

to recharge the difference between that and the right rate back on the unfortunate agent. If he is not able to collect this undercharge from the shipper or consignee he has to pay it out of his own pocket.

Therefore, in order to obviate this, the agent takes the safe side and charges the highest rate that he thinks the traffic will bear, and an overcharge results. If the receiving agent does not detect it—and he has so much to do that he generally does not—the error is caught, usually, when the copy of the way-bill is revised in the general office.

Frequently the consignee receives notice that there is money due him on account of an overcharge in rate before he knows it himself. Large customers of the railways, however, usually keep a rate clerk of their own and send in their claims as quickly as the errors are found.

The Overcharge Department's scale of salaries is not quite so high as the Freight Claim Department's because it handles almost solely questions of fact and not those involving long investigation, niceties of judgment, or discretion. The chief of this division receives about \$150 a month and has a number of expert rate clerks who draw from \$75 to \$100 a month each. The lesser salaries run about the same as those in the claim office.

Sherlock Holmes Bureau.

When a shipper thinks his goods are slow in reaching destination he writes or calls up the Freight Department on the telephone and asks them to start a tracer after them. The Tracing Department forthwith proceeds to do so by first ascertaining the number of the car in which the shipment was made and other details, and then writing or wiring each division point between point of origin and destination. The car numbers are checked at each point and the receiving agent is also communicated with.

If, in the case of less than car-load shipments, the car in which the goods were shipped reaches the destination of the merchandise being traced minus the goods, several things may have happened to account for the loss. The goods may have been stolen—which is rare—or they may have been hastily unloaded with

other goods bearing marks that resembled theirs in the lantern light. Again, they may have been overlooked and carried far beyond their destination, thus becoming astray freight.

It is the business of the Tracing Department to find out what became of the goods, if possible. If it cannot, and the goods have disappeared, then its file becomes the basis of settlement in the Freight Claim Department in the regular order of things.

Frequently, where one or more carloads of perishable or much needed freight is being hurried through, the shipper requests the railway to "trace by wire." The Tracing Department thereupon receives reports from all the division points of the passage of the car or cars, and keeps the consignee and consignor advised of their progress, if it is so desired. This obviates the cars being delayed in transit except by extraordinary causes.

The Tracing Department's chief executive is on about the same salary basis as the head of the Overcharge Department. Aside from his principal assistant, however, the average of salaries in this department is between \$40 and \$50 a month. The principal qualification is care and exactness in keeping the multitude of records straight.

The Man of Figures.

The car accountant's office is the one upon which the Freight Department depends for essential information regarding the movement of its merchandise and the location of the supply of empty cars. The car accountant is advised daily by agents and conductors of the location and use of each car on the line, whether it is loaded or empty, in good or bad order.

His work is one of immense routine and requires the utmost exactitude on the part of every member of his large staff of clerks. Without the car accountant's aid the Freight Department, especially, would be almost helpless.

The car accountant is paid \$200 to \$250 a month, and even more on a big system. His principal aides get probably \$175 and \$150 a month.

The bulk of the work is purely clerical, the entering up in great books of endless

car numbers, the going over of thousands of reports each day. It is the kind of drudgery that work of that sort cannot escape being, and there are more salaries of \$40 and \$50 a month paid in this department than those over \$65.

Away from the general office of the railway, in almost every large city, on its own line, and in practically every city in the United States from which it may hope to draw freight traffic for a greater or less proportion of the through haul, are its district or division freight-agents. Each of these keeps informed of the traffic conditions at each point in his territory.

The Feelers of the Service.

He has to know the producers and merchants of each town in his district, the kind and quantity of the merchandise shipped and received by them. He watches the fluctuations in shipments to see whether a decrease in their amount is caused by decreased demand, ill-adjusted rates, inadequate facilities for reaching markets, or whether they are being diverted over competing lines.

The division freight-agent located on the line of his own road keeps in close touch with the station-agents on his division. He advises the general freight-agent of traffic situation in his particular district, and of any need for rate adjustments to meet changing conditions.

These district or division agents, according to the importance of the territory in which they are situated, have a clerical staff and force of solicitors to drum up business for the road. They are of great importance to the Freight Department and their ranks are most frequently recruited from the most able of the freight solicitors, or from the large number of station-agents on the line.

A position of this sort pays from \$175 a month up, according to the importance of the territory that has to be looked after.

The boy or man who wishes to secure a place in any of these divisions of the General Freight Department should ordinarily apply to the head of the division, either personally or by letter, in either case stating his qualifications and references as briefly as possible.

If he is a stenographer, the chances for quick employment and more rapid advancement are much increased. For the applicant who is inexperienced there is nothing to do except to begin among the bottom rounds of the ladder, to master his own duties first and then to learn all he can of what the work is that is going on about him.

The Open Door.

A youth of eighteen or twenty is regarded as the most desirable timber in these minor places, for if he has the right stuff in him he learns quickly and is ready for promotion when it offers. The rule in all railroads is to fill vacancies by promotion from positions next in line—providing, of course, the man next below is competent.

The aspirant for a place in the general freight office itself should address himself to the head of that department. The run of salaries there, for ordinary labor, is about the same as it is in the subordinate divisions. The general freight-agent's chief clerk will receive \$125 to \$150 a month.

There are, of course, one or more assistant general freight-agents whose salaries run from \$250 a month up, but these high positions, naturally, are filled by men of long years of service and wide experience.

If an application is made personally, the applicant will doubtless be asked to write a letter detailing his qualifications, so that it may be placed on file. It is often the belief that this request is but a convenient excuse for getting rid of him.

Importance of the Agent.

This is not so. These letters of application are carefully classified as they are filed, and whenever a vacancy occurs that cannot be filled from the staff in the office they are taken out and gone over most scrupulously. Vacancies of this sort do not occur every day, therefore the applicant may hear nothing of his letter for weeks or months before he is asked to call.

Every station-agent on a railway is an indirect employee of the Freight Depart-

ment—one of its great mainstays, in fact. He gets small pay usually, but at the smaller competitive points especially, where the road has no other representative, he can do much toward increasing his line's business.

If he is a better hustler than his competitor, the volume of freight from his station steadily increases until some day there is a vacancy at a more important station or in a higher post in another department, and he is promoted.

Most station-agents start in as telegraph operators. In fact it is the rule that at small stations the agent shall know telegraphy. A station of this sort, where one man does all the work, pays \$40 a month on the average.

At larger stations where there are day and night operators, a car clerk, etc., the pay will run from \$60 to \$100 a month. The latter figure is well up toward the top of the scale.

The Road to Fame.

As has been said, a knowledge of telegraphy is one of the most frequent stepping-stones to the station-agent's place. There are many schools that teach telegraphy, and it can also be studied at home. The superintendent of telegraph is frequently called upon to send men to fill these minor agencies.

An operator desiring to become a station-agent would do well to file his application with that official, and also with the general superintendent, or whichever of his assistants in the Operating Department has charge of appointing agents. The custom varies on different roads.

Aspirants—young men especially—who have had no experience and desire to enter the railway service by this door, should apply to the station-agent in their own town, if he has an office force. The smallest position is usually that of station-messenger, which will pay perhaps \$15 or \$20 a month.

But there is always an opportunity for the youth who wishes to learn to become familiar with the station routine and with telegraphy as well. It will be encouraging for him to remember that probably more railway officials, from presidents down, started in as station-agents and operators than as anything else.

TREASURE OF THE WORLD.

BY STEPHEN CHALMERS,

Author of "The Cataclysm," "A Daughter of the Armada," etc.

A Man's Honor, a Woman's Love, and a Shylock's Pound of Flesh.

CHAPTER XV.

Good-By?



It mattered little where the Swede went. It matters little, as a rule, where a picked-up sailor wants to go. Higgs wanted to proceed to Colon, while Miss Harding wished to return to New York as soon as possible.

Naturally, Philip Sand being master, Miss Harding's wish was law. Presently the Chameleon headed in a northwesterly direction.

The captain briefly told his story. It was merely an amplification of what the mate had related. Pearce, however, was of the opinion that some one was behind the cable of the shipping-agents, ordering a search for the survivors of the *Rueulan*.

"I don't know who it was," said Pearce, "unless it was the owner of the Chameleon."

"Who is he, by the way?" asked Philip, with assumed indifference. "I have forgotten for the moment."

The captain looked curiously at him for a moment, then he said:

"The original owner was a Mr. Harding—Frederick Harding. I sailed this yacht before, Mr. Sand. In fact, it just so happened that you turned up to charter her just as all hands were about to be paid off. Most of them were, in fact."

"Harding?" mused Philip.

"Yes," said Pearce, laughing. "I'll tell you something more. This Miss Harding whom you brought aboard with you is—is

a relation of the owner. Perhaps that's why there were prompt searching orders."

"M-m-m-m!" hummed Philip.

He thought he began to understand. He remembered that when Miss Harding said she knew the Chameleon, and that she had sailed on her as a guest of Merton Scragg, he had been filled with the conviction that Scragg was not the owner's name, but that the real name had a familiar sound, though he could not recall it. Harding! Of course! It was, and should have been, familiar.

But where did Merton Scragg come in? Miss Harding had said that she had sailed on the Chameleon "as a guest of Merton Scragg." She could hardly sail as a *guest* of her relative, Frederick Harding. Where did Merton Scragg come in?

Then a light dawned on Philip's mind. The yacht had been given up just when he chartered it. Miss Harding had distinctly stated that Scragg was the owner of it. The ghost of Miss Sharpe's warning voice came up in the conversation. There was something here which was not to be discussed, but Philip thought he understood.

Miss Harding's father had fallen into the hands of the skinflint Scragg. Scragg *was* the owner of the yacht—by a mortgage, perhaps, just as he was owner of Philip Sand, body and soul. Yet Miss Harding had distinctly stated that her father was rich!

However, the matter was of too delicate a nature for discussion with Captain Pearce. Philip gave the order for the run to New York, saying that the mat-

ter of further orders would be discussed later.

"How about the treasure, Mr. Sand?"

"I'm tired of treasure," said Philip wearily.

And, indeed, a new mood had come upon him. It seemed that the adventure was over, and that no future adventure could be as pleasant or as sweet. Now that Miss Harding was safe and was about to be restored to her proper environment, the bottom had fallen out of so many things that Philip was quite disheartened.

Nevertheless, despite his determination to freeze her back into her shell of reserve, he spent many hours of the precious three days with her. One day he kept away from her altogether, but after dinner in the evening he could stand it no longer. He sought her out where she sat abaft the funnel. He sank into a chair by her side and was silent.

"Philip," she said suddenly. It was the first time she had called him by his Christian name since coming off in the boat from the island. "Philip, after you leave me at New York, what are you going to do?"

For a moment he was dumb. The question had come so abruptly. It was so terse and pointed. It covered the whole problem over which his heart and mind had been battling.

"When I leave you at New York?" he echoed.

"Yes," she said quietly.

He was, somehow, disappointed at her quiet acceptance of the necessity. But it was necessity.

"What am I going to do?"

"Yes. You are going to do something, of course."

Her tone jarred him. It was so unlike her.

"Does it really interest you to know?" he asked.

"Philip—you know it does." And he was sorry on the instant.

"Well, I chartered this yacht to hunt treasure," he said. "Having found the treasure and having time to kill, before time kills me, I suppose I shall have to find other mischief for my idle hands to do."

"What like?"

"Trade, for instance. Take cargoes

and deliver them, and get more cargoes and amass money and give it to the sailors to spend. I might have a string-orchestra aboard to liven the men as they load up with coconuts or logwood. There's lots of things I can and will do."

"Philip," she said gravely, "you are in a very bad frame of mind. I understand and sympathize thoroughly. But, listen to me. I want you to do something—to do something for me."

He sat up, turned around, and caught her hand.

"Verina," he said hoarsely, "you know that there is nothing I would not do for you. Tell me what to do for you, and I will indeed have something to do—something it will be a joy to do."

"It is a very simple thing, Philip. I want you to say good-bye to me at New York, believing that all may yet be well—for you. Then I want you to sail right out to the open sea and stay there. You once spoke of filibustering and trading, and you said something just now about cargoes. Go and do these things, Philip. Forget your illness. Forget everything—"

"Well, if it will help you, think of me sometimes, and know that my prayer is that you may grow strong and well. That is all I want, Philip. Will you do this for me?"

"I will, Verina," said he; "but what good will it do?"

"I think it will do lots of good. Remember, I saw you when you came aboard the Revuelan. You did not know that I saw you; but I did, and I have thought of it since—since you told me you were ill. I remember now that you looked just a little bit pale and languid. But you are not that now. You look brown and sinewy and strong and—and—" She suddenly bent forward and took one of his hands in both of hers. "Philip," she whispered tensely, "I don't want you to die. You mustn't die. You must fight to live, because it means much to me."

"I understand," he said. "Thank you—and God bless you!"

He lay back in his chair, quite happy for the moment. Then the lean phantom of Merton Scragg arose before him. Merton Scragg! Even if he did get well, there was the mortgage.

Then his heart leaped. Everything in

his body responded to the fighting call. He would get well. He would make money to buy back his life. He had less than eleven months. To make twenty thousand dollars, plus interest, in that time was no small task for a man with no particular or special ability. But he had the yacht, and he had optimism and determination; and there was a prize to be his if he won health and twenty thousand dollars—Verina!

"And after that?" he said.

"After that?" she echoed very softly. "Let us speak of that—then. You will come to me—come to see me, for I must know if my doctoring is better than my cooking; and I am sure it is. You will come to me at the end of the year and tell me how it has gone with you. Philip, I will be waiting to look into your face and know that you are well and strong."

He understood all that she did not say. His eyes were filled with tears and his throat thick with tenderness. He took one of her hands gently and almost reverentially kissed the finger-tips.

"I will try—I will try so hard. I will fight!"

"Good!" she said bravely, and the little fingers closed tightly over his hand. "To-morrow, then, I shall be in New York. I will leave you my address. You are not to leave the yacht. As soon as you have said—good-by to me—I know my way home, surely—you will about-ship, as you salt-water people say, and leave away on the raging main. Good night, Philip. You have been very good—better than any man I ever knew. You know that I feel that, don't you?"

"Verina," he said, "I know every word that you *would* say, and you know what is in my heart. Good night, dear!"

"You may come in!" cried Verina.

Philip entered the cabin. She stood in the middle of the little room, and the sunlight shone through the port. Outside, tugboats shrieked and big liners growled. Close by, a ferry-house bell clanged, and a great river castle slid slowly out across the stream.

Verina was dressed in the height of fashion. The yacht had been but an hour in port, but in that time a young woman had come aboard with two suitcases and a bandbox. And now Verina

Harding was again arrayed as a sweet American girl in summer costume.

As Philip entered, she held out a card to him.

"Put that away safely until the time comes when you want to find me," she said.

He took the card mechanically. He was looking at her with the eyes of love's worship. She laughed happily.

"Do I look like a castaway on a desert island?" she inquired archly.

"You are the dearest woman in the world—and the best loved!" said he.

"Philip," she said reproachfully, "we mustn't go as far as that." He noticed the "we." It was advice, not reproach.

"I suppose you are right. You *are* right," he said.

Then there was silence.

"I am ready now," she said at last. There was a little quiver in her words. "Good-by, Philip."

"Good-by," he said brokenly. He stood away from her, with his hands hanging helplessly at his side.

For a moment she looked, then her eyes filled with tears. In another moment she was in his arms.

"Philip! Philip!" she whispered. "What fools we are not to say what is in our hearts! You are the best and noblest thing in my life. Don't think I am sending you away. I want to make you well and strong again, so that we can be happy always. And—Philip—if it is not to be, remember this: I love you, and I will wait—oh, I will be *patient*; and so must you, because we must pay for our happiness."

He drew her close to him.

"Yes, perhaps we have been foolish," he said. "Now, you have made me happy. I love you, dear—love you the more because I cannot have you. But I will go away and fight—oh, I shall fight so hard, for it is not my happiness only. It is yours now. I *must* win!"

"You shall," she whispered, drawing away from him.

He opened the door for her. She reached out her hand and pushed it back again. It was then, as she stood looking her last upon him, that he noticed a string of pearls around her neck.

"My fishing-line," he said huskily.

"Yes. Kiss me. . . . Good-by."

He would have followed her to the deck, but she said "No." Then the door closed, and he was alone. He looked out of the port-hole. The sun-ray was slanting across the cabin. The air breathed of her late presence. A fresh red rose lay upon the pillow where she had slept. He took it up tenderly and touched his lips with it.

"I *must* find a way back to life," he said to the rose.

CHAPTER XVI.

The Doctor's Sentence.

A LITTLE less than eleven months after Philip Sand said good-by to Verina Harding, the yacht *Chameleon* steamed into New York Harbor.

Philip himself stood on the bridge beside Captain Pearce, and looked eagerly at the tall buildings and the shipping and the palisades ahead.

Verina's advice had been good. At least, it had been well meant; and, of course, she had not known of that other complication. Philip had obeyed her injunction to the letter. He had manfully fought for life. He had been a trader among the Caribbean Islands. He had been a filibuster around the Honduran ports. He had been a smuggler between Curaçao, Margarita, and Venezuela. He had steadfastly refused to think of his misfortune.

He had dreamed night and day. He had allowed himself to think that all things were possible, and especially he had taken for accomplished the paying off of the mortgage on his life and his marriage to Verina Harding.

Dreaming *hard* is half the battle in life. Dreaming hard is optimism refined—the belief that a thing shall be. Some people say that half the efficacy of prayer is the desire of good—the recording of wishes with the belief that they will be fulfilled.

In Philip's case, dreaming hard seemed to have achieved much. Any man who saw him immediately thought: "What a fine physique!" And, indeed, he looked the embodiment of health, strength, and vigor.

He had little fear, however, of Lauriston's verdict. His mind was filled with

that other difficulty—Merton Scragg and the twenty thousand dollars. For Philip was a man of honor. He had played his cards; and if he had lost, he was not going to cry mercy of his opponent.

But there was a bitter pill—the bitter pill of many a man's life. He had had the twenty thousand dollars—the necessary amount to buy his life back—and he had lost it. At first, he had traded in any old thing—logwood, coconuts, bananas, and other island produce. He had run the gantlet with firearms disguised as "bedsteads and lima-beans." He had entered into anything and everything that promised life and interest in life.

And because he cared little and rushed into things with a gambler's spirit, he had *won*. He had made money.

Then came that last and greatest risk—when he had invested his earned twenty thousand dollars in a venture—and *lost*!

To the treasure in the channel he had paid no attention. He had had enough of the treasure. Perhaps some of the superstitious talk which he had hurled at the heads of Howells and his men had rebounded upon his own senses. Perhaps his dream of what happened to all who had owned that treasure—and what, to his own knowledge, had happened to its last owners—had deterred, or driven from his mind, the idea of raising it.

His first thought had been to win back that treasure, against which all treasures of the world are as dross—life! To keep in the open air, to buoy his own interest in life, to forget the why and wherefore of his struggle, and just *live*—these constituted the commandments of his creed.

And as money began to pour into his coffers, he had realized chucklingly that taking care of his life meant taking care of its wherewithal. Thereafter he had thought even less of Scragg and the mortgage. The first thing was health. Perhaps he had won that, or very nearly, as he had won back the twenty thousand dollars—or very nearly.

But "very nearly" in this case meant not at all. He had lost his money; and, whether he had gained health or not, tomorrow must see him dead, unless some unforeseen thing happened to show him a way out of his difficulty.

Not for a moment did he think of crying off his bargain, although the sweet

ties of life were beckoning him from the path of honor. It would be easy enough to say to Scragg:

"I am well, and you can do your worst. No court would uphold your infamous stipulation."

Yet no stipulation had been made. He remembered that distinctly. He remembered Merton Scragg's words when he sought to specify the stipulation himself.

"Mr. Sand," Merton Scragg had said, "I think we have said enough."

It was understood, and it was as clearly part of the contract as if it had been set on paper, signed and sealed by both parties in the presence of witnesses. And no part of the transaction was on paper, save that Philip had willed Scragg his entire property, which at the present moment consisted of a few hundred dollars, some old books, fifty thousand dollars in insurance, and a faded red rose.

Yet Philip had not given up hope. He believed that Scragg was a human being, at least; and he had heard stories of the man's private life which, although strangely at variance with the popular idea of the man, might be true.

It should be understood, however, that Philip had no intention of going to Scragg and crying mercy of the bargain. He was not of that sort. He had made the bargain with his eyes open. He had taken and enjoyed the man's money—and he *had* enjoyed it. Now, being a gentleman, a sportsman, and a man of refined honor, he was not going to cry *peccavi*.

But he would go to Merton Scragg and tell him of the treasure. At least, he would ascertain Scragg's attitude, and it was just possible that thirty days' grace might be forthcoming. If so, what might he not do in thirty days? He might raise the golden ingots and pay off the twenty thousand dollars, with interest.

But, of course, everything depended upon Lauriston's verdict. If he was not cured of the disease, there would be little use in clutching at a straw to prolong life. He had enjoyed his year. He had tasted love, life, travel, and adventure. If the end were merely to be deferred, then—why not now? Why not fulfil his bargain with honor and a smile?

There were a thousand possibilities. One thought which recurred, despite his hatred of it, was the fact that Verina

Harding loved him and that she was rich. If he married her— He put the thought away repeatedly, yet it had a peculiarly insistent way of coming back again and again.

A man of less refined instincts and a less rigid code of morals would have lingered, at least, over the thought of marrying her and borrowing twenty thousand dollars. He decided to think no more of anything until he had seen Lauriston.

An hour later he was at the physician's office. The waiting-room was filled, and Philip had to wait for some time. There was a secretary—a pretty young woman—whose business was to note the patients as they entered, and this young woman kept the physician in his inner sanctum duly notified of the arrivals. Most of them she knew by name; but Philip seemed a stranger to her, although he nodded as he entered and addressed her by name.

As he sat there in the waiting-room, reading a magazine six months old, he was conscious that the secretary was studying him. She had seen him before, but— He might be a stranger, and strangers were not encouraged unless they came by appointment. Finally she arose and came over to him.

"You are Mr.—"

"Sand—Philip Sand. Have you forgotten me, Miss Armstrong?"

"Why, Mr. Sand, I confess I had. You have been away—so long and—you are looking so—changed."

A moment later she was whispering into the telephone. Presently in walked Lauriston. The next patient arose to take precedence, but Lauriston smiled and said:

"Excuse me, Miss Hollis. I have an urgent appointment with a gentleman here whom I overlooked yesterday. I am sure you won't mind waiting a few minutes."

All the time his eyes were upon Philip, and his face expressed astonishment.

"Come this way, Mr. Sand," he said.

The physician presently closed the inner door of the sanctum behind him. For once the reserved, gloomy doctor was almost human.

"Upon my word! Sand, you are marvelous. But, there!" he warned. "Don't

get your hopes up in the air. You never can tell. Peel off your clothes. I want to listen."

Philip smilingly stripped. Lauriston watched him curiously—noted the full expanse of chest and the sun-tanned collar above the breast-bones. There was a queer light in the physician's eyes as he came toward the patient with the stethoscope dangling from the back of his ears.

For a moment he looked down into the clear eyes of the man whom he had practically condemned to death. Then he grunted and adjusted the Y-shaped tubes.

"Take a long breath," said he. "Say 'Ah.' Now whisper 'ninety-nine.'"

There was silence after Philip obeyed the instructions. Presently Lugubrious Larry took the stethoscope from his ears, laid them on the table, and walked up and down the room for a half-minute. Then he faced Philip with an unbelieving light in his eyes.

"Sand," said he, "if I did not know to the contrary, and any man told me that you had ever had anything the matter with your lungs, I should say that he was a blatant ass. *You are as sound as a bell!*"

Philip took the physician's outstretched hand mechanically. His heart was beating fiercely, joyously, rapidly. He was thinking of Verina Harding and the future. Then, like a phantom, arose the specter of *Shylock!*

CHAPTER XVII.

A Woman's Claim.

AN hour later, history, as if repeating itself, brought Philip Sand to the park; and once more he found himself seated on a bench, watching the tame ducks sailing about the pond, the children feeding them with broken crackers, and the self-conscious policeman twirling his locust on his wrist-thong.

A year had passed—a year all but a day—and the year was like the day that it wanted. So many things had happened while the trees had lost their foliage, while the ducks had squawked in their winter quarters, while the pond had frozen over.

He put his right hand into his left breast-pocket and slowly drew forth a

card. Should he see her? No, he should not. Yet, while his conscience was telling him what was best for him and for her, his heart was anticipating the meeting.

To see her again! All he had to do was to start *now*, and in half an hour he would be facing her—*Verina Harding*—looking into her eyes—into the eyes of *Verina Harding*. He must not go; yet already he was going.

"There must be some way out," he said to himself. "Perhaps I should have told her that, even if I got better, I had to reckon with Scragg; but I never dreamed that I would be *as sound as a bell*. That's pretty sound; and there is no reason on earth, save one, why I shouldn't live a long, honorable, honored, and prosperous life. Only—by noon to-morrow I must either be dead or ready with twenty thousand dollars, plus interest."

He tried to figure out just how much interest was due, and it came to him suddenly that there had been no interest spoken of. Or, to be strict about the matter, the interest was to be one hundred and fifty per cent. Merton Scragg was to get fifty thousand dollars in return for his loaned twenty thousand dollars. Of course, the old skinflint had not reckoned on getting a man's life on top of that; but, if Scragg was really a *Shylock*, he would demand his money or his life. The latter alternative meant life first and money afterward.

"Well," said Philip, with a sudden glowing of his blood, "maybe Verina can tell me. I'm going to see her just for that reason, to tell her all about it—to ask her advice." Then he added to himself in a still, small voice: "Philip, you are a liar! You are going to see her because you *must!*"

The address took him to a quiet part of the unromantic Bronx. The house was an old Colonial thing, half hidden among trees. Around its environs brick tenements—very new ones—were squeezing up. It was typical of the Bronx—yesterday and to-morrow hugging each other.

There was a broken-down wall, with a wooden gate set in the middle of it. The gate whined as Philip swung it open and advanced up a grass-grown path. Before the old house there was a stump

of what must have been at one time a magnificent tree. Around this stump was a bench, and on the bench sat Verina, sewing.

She lifted her eyes as he came up. Her face turned pale. Then she stood up and awaited him with a glorious expression about her mouth. He took off his hat and walked in the air toward her, his eyes never leaving her face.

"I am here," said he quietly. He had not known how his feelings would greet her.

She held out her hand.

"And I was right—" she began, her speech breaking off as if there was something which she wished to add, but was afraid to.

"Were you going to call me 'Mr. Sand?'" he asked.

"No—Philip."

"Thank you! Shall we talk here?"

"No," she said, still with her eyes on his face, his brow, his neck, his shoulders—roaming over him. "Come in."

As in a dream, she turned and walked up the rickety old steps. He followed, only conscious that it was she—Verina! His eyes were enchanted by the beautiful figure, the dear, familiar head and hair, and the sudden reality of her face.

She entered a dim hall, he close at her heels. She turned and shut the door, in which were two panels of crimson glass. The light fell rich and ruddy upon her as she faced him.

"Philip!" she whispered, and her eyes filled.

"My beloved!" he said.

Then he remembered—that is, presently. She took him into a big, old-fashioned drawing-room and drew him down to a seat beside her.

"Now, what is the story?"

"Verina," he said slowly and earnestly, "I think I am worse off than ever. You see, I did not tell you everything. I—"

"First, tell me," she cried, "what did the doctor say?"

"He says I'm—I'm—as sound as a bell," said Philip, wondering how he was to come to the point without hurting her.

"Then nothing matters!" she whispered jubilantly.

"No—that makes my position worse," he said. "I have a confession to make.

I never thought that this was possible, or—"

Then he told her. At first her face expressed amusement, then amazement, then alarm, then terror.

"But—but"—she stammered—"this is—absurd! I never heard of anything so absurd. You are not going to die. How are you to die between now and tomorrow noon if—if God doesn't will it so?"

Philip groaned. "But I took his money," he managed to say.

"Pay it back," she said sharply.

"I can't," said he lamely. "I couldn't pay back a tenth of it. I lost everything."

"Then let me lend it to you. I have plenty."

Philip shook his head emphatically.

"Then"—and her words came very slowly, very searchingly—"what are you going to do—as a man of honor?"

Philip was silent. He dared not look at her, let alone speak. He knew that she understood. Presently she got up and walked about the room.

"Philip," she said softly and thoughtfully, "I do not think this is a time for pretense. You know that I love you, and I have never doubted your love. Is not your love big enough to surmount petty things?"

"I do not understand you," he said.

"Loving one another, was it not understood, as love is always understood, that when obstacles were cleared away we should marry?"

"This is worse than the treasure I couldn't enjoy," said Philip.

She stopped in front of him. Her hands were lightly clasped before her. Her eyes were slightly downcast, and her face crimson; but she had decided the question, and she meant to be brave about the matter.

"Philip, will you marry me—to-day?" she said.

For a moment the room seemed to whirl about his head. He only saw her, beautiful and womanly in her confusion of bravery. He longed to take her in his arms and hold her close—very close.

Presently he understood, but his heart was torn between the natural demand of the life-loving creature and the so-called honor of ethic-bound custom.

"Verina," he almost moaned, "don't tempt me."

"I am not tempting you. I am not trying—altogether trying to solve *your* difficulty. I am fighting for myself, Philip—fighting for my love. Your life is not your own—not since that night on the island. I don't think any man's life is ever quite his own. Somebody loves him. I love you, Philip, and our lives are as one. If you take your own life, it is murdering me."

"I cannot take your money to—to save myself. I could never be happy."

She began to walk about, rapidly and nervously. She toyed with papers, ornaments, and other things in an absent kind of way. Then she turned to something else that momentarily attracted her whirling mind. She understood his horror of marrying her that he might pay off the *Shylock*. She honored him, too, for his reluctance. But she herself had some views on the subject.

"Philip," she said, with her face averted, "I am not good at expressing what is in my heart—in my mind. Perhaps it is because I am so much in earnest. But listen, dear."

"I am listening, Verina," he said huskily.

"I gave you my happiness—I gave it into your keeping when I let you know that I cared. Perhaps I should not have let you know. Perhaps you should not have let me know. But it was my fault. I loved you, and I don't know how it came about. I forgot for a moment that the woman should wait. But—I forgot—and you were so brave and—I loved you so much."

"Never mind that, dear," said Philip. "I was weak and— But we were happy," he added, lifting a haggard face to hers.

"Yes, we were happy. I have been happy all the year—waiting. Philip, I prayed—morning and night—for you. It was just a foolish little prayer; but it was all I could make up, perhaps because I was so much in earnest. I said often and often—in the street here, in the garden, anywhere—'God, make Philip well again.' That was all, and I felt that He would. And you see He did."

There was silence in the room. Philip could not speak, and she was trying to

find once more the lost thread of her argument.

"I gave you my happiness—my life—when I gave you my heart, Philip. Human beings—especially, I think, a man and a woman when they love one another—are peculiarly bound up together. I can understand why you did what you did—a year ago; that is, if you thought you were going to die.

"But you see how things have turned out. You are not going to die. But you owe a man twenty thousand dollars just because you promised that you would be dead.

"But since then, Philip, you have made a graver mistake. You have given me your life—your love. Perhaps you had no right to do it; but perhaps I stole it, and so stole your life.

"It won't do us any help to talk about that, Philip," she went on. "We can't understand these things, but it just shows you that you have no right to barter that which is in the hands of Fate. The wrong was in bartering even a shattered life for money."

"I wouldn't have met you if I hadn't," said Philip, without looking up.

"That was Fate," said Verina. "We can't alter decrees of Fate, Philip; but sometimes we can right what we have done wrong. Most of the acts of human hands can be undone by human hands. Why can't we undo this?"

"I can't take your money," he reiterated. "I could no more sell myself to you than buy you, Verina."

She stamped her foot. "Who speaks of buying and selling?" she cried angrily. "Look at me, Philip!"

He lifted his head as she had commanded. She was standing erect, with her chin slightly lifted. Her lips were quivering, and two tears were perilously near the corners of her eyes.

"Verina!" he said helplessly.

"I know you didn't mean it," she said; "but listen to me. If there is talk about buying and selling, let me say something about taking and stealing and defrauding. If you pursue this foolish—no, I shall not say foolish, for I understand your position—but if you refuse to let me rescue you, what will be the result? Is your life not mine?"

"Does my happiness count for noth-

ing? Are you going to place the fictitious value of so-called honor in the scales with *my* love, *my* life, and *my* happiness? *Don't* you understand me?"

"But how am I to do this consistently with honor—so-called or fictitious?" asked Philip. "Remember, it is the only honor I have, and—I took and spent the man's money."

"I can write a check for twenty thousand dollars and never miss it!" she cried; "and I could not let you go out of my life quite as easily."

He winced—for two reasons. He knew that her direct statement was only uttered because it was no time for pretense. He knew that she was talking the sheerest kind of common sense, but her writing that check—He winced.

"I cannot do it," he said doggedly.

"Philip!" she cried, and her strong attitude seemed to melt like wax. She dropped on her knees at his feet and clung to him. Her voice came to him in incoherent pleadings.

"I cannot do it that way," he said; "but you mustn't give up yet, little woman! I recognize with you that this thing must be adjusted somehow. There must be a way. Put your way aside, dear, and let us think of something else."

In a little while she got up and sat beside him.

"Well," she said, "what do you wish to say—what is your plan?"

"Listen," he said. "There is one chance. I took this man's money. If I had nothing to offer him but a plea for mercy, I should not go near him; but I believe I have something to offer him. If he would give me thirty days' grace, I might get that treasure."

"He will!" cried Verina. "I am sure he will. Oh, Philip, if you could—Go to him—to-day—at once. If he is a human being at all, he will understand. Tell him about me. Tell him I have money, but you won't take it. Let me come with you. If I ask him—"

"Wait a minute," said Philip, smiling at her eagerness. "The trouble is the man. If he is a human being at all, he will, as you say, agree; but it has always been a question whether Merton Scragg is a human being or not."

"Who?" she exclaimed.

"Merton Scragg."

"Is that the man who—" She had arisen to her feet and was staring down at him, his face white and agitated.

"Why, yes," said Philip, puzzled. "Merton Scragg—He's the man."

"Mer-ton Scragg," she said, hardly above a tense, agonized whisper.

For a moment she seemed like a woman turned to cold marble. Then she dropped upon her knees and buried her face in her hands.

CHAPTER XVIII.

His Pound of Flesh.

PHILIP let her be. He sat near her, staring and wondering. Was it possible there were two Merton Scraggs—one the skinflint *Shylock*, who was willing to trade even upon a man's life, who never spent a penny on luxury, who grudged seventeen minutes for his luncheon of coffee and buns, who hoarded every dollar like a miser; the other a man who owned a private yacht and put to sea at intervals with guests of the class and refinement to which Verina Harding undoubtedly belonged?

The suspicion was growing in Philip's mind that the Merton Scragg of Verina's acquaintance was identical with the Merton Scragg of his own. And her present behavior suggested that perhaps there were two sides to this Merton Scragg. Although Philip was positive that Scragg was not the name of the owner of the Chameleon—or, at least, that it was not the name as he had learned it from the agents and from Captain Pearce, he could not drive from his mind the fact that Verina herself had positively declared that it was "Mr. Merton Scragg's yacht."

She had recognized the Chameleon, too, when it sailed into the cave at Caicos Island. And Philip remembered, also, the peculiar recognition between Captain Pearce and Verina Harding when the party came off from the island.

Of course, nothing of all this proved the identity of one Merton Scragg with another. But Pearce had said that the owner's name was Frederick Harding, as the agents had. Philip remembered. Verina had said it was Merton Scragg. And now, at the mention of the man's name, she had sunk by the sofa, and her quiver-

ing shoulders were betraying some strange inward emotional struggle. There was a tangle here.

What had this beautiful, refined woman to do with the lean, hungry-jawed *Shylock* of Wall Street? Philip had sometimes wondered. He had often regretted that he had not asked her directly. But his policy had been to discourage intimacy between her and himself, so that the forgetting—the seemingly mandatory forgetting—might be the easier when the seemingly inevitable time came.

But, as Verina had said, the time for pretense was past. They two were hopelessly bound up in each other. The crisis had come, and her present behavior could not be passed over unexplained.

"Verina," he said, "tell me one thing. Who is your Merton Scragg, and what is he to you?"

A few minutes passed in silence. She arose to her feet and stood by the window with her back to him. Presently she turned her face to him. In her eyes was an expression of bright hope, despite her tears and her pallor.

"Philip," she said, "I believe Fate—or God—is being good to us in a mysterious way. I cannot tell you everything; but Merton Scragg is my father's closest—I will not say dearest—friend. Merton Scragg is a peculiar man—a man whom few people understand. He is a hard man in business—a merciless man.

"But my father is his best friend, although my father is under obligation to him. It might be that in a case of this sort my father's influence would have no effect upon Mr. Scragg. But I am going to try what my father and I can do to influence him. He is, I think, very fond of me—I mean Merton Scragg. I believe I am the only person in the world that he truly loves."

Philip's heart grew heavy again. It seemed that his life lay in the hands of Verina Harding. He thought he saw the position. Her father was under Scragg's thumb, probably more securely than the daughter dreamed. It might even be that the spider made playthings of the father and daughter, who fondly imagined that they had some influence over the old tiger. Yes. . . . She had been on the Chameleon as a guest of Merton Scragg.

Her pleasure was the pleasure of the man of steel. In time he might tire of it. Now would be a test of the genuineness of his affection—if he really had any—for the Hardings.

"Well?" said Philip monotonously. He had little hope or cheer in his heart.

"I know what you are thinking," she said. "You are remembering what the world thinks of Mr. Scragg. You have heard that he is mean, mercenary, and merciless. But there is another side to that man, Philip, and I have seen it. Perhaps you will see it, too.

"It is now one o'clock, Philip. You have time to go to his office in Wall Street. Put the case clearly before him. You need not speak of me if you do not wish to. Tell him about the treasure. You have the ruby pin, and I will give you the string of pearls. Ask him to give you time.

"Talk business to him, and then come back to me—Come to-morrow morning. You have done much to-day—and so have I. Whatever the result is, think well to-night and come to me to-morrow morning."

"I see," he said. "You are determined to save me some way or other. I am to owe you my life."

"I am fighting for my own," she reiterated. "I am trying to rouse in you that sense of honor of which you are so proud."

"Very well," said Philip, "but before I let you make a sacrifice for me, I wish to help myself. Will you promise that you will not speak to your father or communicate with Merton Scragg—at least, until I have seen him and received his answer?"

"I promise," she said, holding out her hand. "Good-by just now, Philip. Go quickly, for time is precious."

A few minutes later he was going downtown. As he went, he puzzled much; but mainly over the fact that Verina had been very cool in her parting with him. She was a strange woman in some ways, he reflected. He remembered how cold-blooded she had seemed aboard the Chameleon when she had said: "What are you going to do after I leave you at New York?"

And now—But perhaps her seeming cold-bloodedness was merely cool-blood-

edness in emergency. Some women are like that.

Merton Scragg's chief clerk looked curiously at Philip as the visiting-card recalled the young man's identity. He hurried into his employer's private office and as hurriedly came out again.

"Mr. Scragg says, will you step in at once, sir?" said the chief clerk.

The iron-faced, rigid man received Philip with a repelling stare.

"Be seated, Mr. Sand. I am groping in my mind for the reason of this unexpected visit," said he coldly.

"I have not come to ask any favor," Philip said, a little warmly. "I merely wish to put you in possession of certain facts which might bring you regret if you discovered them after—"

"Exactly," said Merton Scragg. "You find that your bargain was a rash one. You have found life of more importance than money, Mr. Sand. You have come to put me in possession of certain facts which may carry so much responsibility that the burden of the affair will rest upon me."

"I will not permit you, Mr. Scragg—" began Philip hotly; but the lean, raw-boned financier waved his hand impatiently.

"One moment!" he snapped. "I have not finished. If you object to what I may say in my own office, you have the right to leave it. I bear no ill feeling toward you, sir; but I wish to freshen your memory."

"A year ago you came to me and borrowed twenty thousand dollars upon your insurance policies, assuring me that the best specialist in the city had given you only a year to live. I expressly asked you—three times I think—what security would be mine against the contingency of your not dying. We did not go into painful details, but you assured me that you would be dead. I warned you, Mr. Sand, that life was sweet—even to an old man like myself—neither blessed with youth, great health, or popularity."

"After consideration, I loaned you the money, for I understood the position in which you were placed. To me it was a perfectly legitimate transaction. More than that, I perceived that I might be doing some good in making the last year of your life pleasant."

"You will recall that it was I who objected to your placing the understood stipulation upon paper; not because, as I perhaps led you to think, that I realized the incriminating nature of such a document, but because I foresaw that, if by any chance you regained your health or tired of your bargain, you would come begging at the end of three hundred and sixty-five days—as you have done!"

"You are quite in error, Mr. Scragg," said Philip, his coolness regained, although his heart was like molten lead. "My honor has suffered none at the prospect of death to-morrow. I—"

"That is what I supposed at the time—that you were a man of strict honor—as your father was before you," said Scragg; but his eyes were fixed curiously on the young man's face, and he was thinking of Philip's last words. So the young man contemplated suicide, after all!

"Had I come to the end of the allotted days, with no hope of continued life," said Philip, "or without the means or any prospect of paying back to you the money which I borrowed on my life, I should not be here. As it is, I am here to make a proposition which you are at liberty to accept or decline, without any further discussion of it."

"You overlook one point, Mr. Sand," said Scragg with forbidding iciness. "I must either accept any proposition you may make, or take upon my shoulders the guilt of what a moral world might call by an ugly name—murder, Mr. Sand."

Philip knew that this was a truth. He hung his head, and there was silence, broken only by the tapping of Merton Scragg's lean fingers on the desk-top.

"But," said the miser, "you may proceed, Mr. Sand, for possibly your proposition may be such that I may be able to accept it. I assure you that, no matter what you may know or think of my character, I should be very pleased to dodge a painful issue. All I want is—my pound of flesh, Mr. Sand." The man smiled, almost pathetically. "You see," he added, "I have a reputation to sustain in Wall Street. Now let me hear what you have to propose."

"I ask for thirty days' grace," said Philip. "and for an extension of one month in my charter of the yacht Chame-

leon, which, I have every reason to believe, is your property."

Merton Scragg glanced quickly at the younger man, but he betrayed nothing of the effect the remark may have had upon him. When he spoke his tone was as icily severe and quite as businesslike as ever.

"There is nothing to warrant your reason or belief that I am the owner of the Chameleon," he stated. "I am, however, a personal friend of her owner, Mr. Harding—Mr. Frederick Harding, to whom, I believe, you are indebted for your rescue. But for my acquaintance with Mr. Harding I should find it rather difficult to understand what you are talking about. A chameleon, I believe, is a lizard that changes color with circumstances. There are human chameleons, Mr. Sand," he added, with the ghost of a smile.

Philip hardly heard the sarcasm. He was thinking over that matter of the yacht's ownership. He began to see light. Verina's father, he remembered, was "under obligation" to Mr. Scragg. Harding was probably the owner, but only in name.

The Chameleon, and perhaps all of Harding's worldly goods, were mortgaged to Merton Scragg. The skinflint admitted an acquaintance. The fact that Verina had been a "guest" of Scragg did not necessarily mean that the Wall Street *Shylock* had ever been the host in bodily presence. Yes, it was Verina's way of expressing a bitter truth, and—Miss Sharpe had uttered her warning, "*Verina!*"

"Why don't you marry the girl?" was Scragg's way of breaking the stillness that had fallen in the skinflint's office.

For a moment the silence seemed intensified. Philip could hardly believe his ears. What had the man just said?

"Why don't I marry the girl?" he echoed. "Marry—what girl?"

For a moment the disloyal thought came to him that Verina had—perhaps out of sheer desperation and the desire to save him—broken her promise.

"Harding's daughter," said Scragg, looking at him keenly. "She has plenty of money. To marry her would seem poetic justice after the romance of the island. There is some poetry in my life,

Mr. Sand. Also, it would be a solution of your difficulties."

"I have no intention of making use of any woman's love, or any woman's money, as a way out of my obligations," said Philip coldly. "How did you know—of all this?"

Merton Scragg picked up an afternoon newspaper. In bold head-lines on the front page Philip saw the words:

REVUELAN—FOUNDERED— SURVIVORS!

"Pearce has leaked—as usual," was Philip's inward reflection. "Well?" he said to Scragg.

For a moment *Shylock* regarded the younger man searchingly.

"The world expects it, of course," said he incisively. "Why not?"

"Mr. Scragg," said Philip loftily, "I have nothing to say on the subject, except what I have already said, that I cannot consider taking the advantage offered me."

"Does the girl fancy you?" inquired Scragg bluntly—almost coarsely.

"That," said Philip sharply, "is none of your business, and I shall trouble you to keep the matter off your mercenary tongue."

Scragg merely smiled. "Very well," said he, "you will not blame me if I demand a pound of flesh from your own resources when you so carelessly flout what Providence offers you. What was your proposition?"

"My proposition," said Philip, "entails a revival of that story." He indicated the newspaper article, and proceeded to tell the tale of the wreck, the landing, the treasure, and all that followed.

Scragg listened with an impassive face; although once, when Philip spoke of the retreat from the golden hut, his eyes brightened and he looked at Sand.

"You gave up a fabulous treasure for the sake of—a woman?" he queried curiously.

Philip ignored the remark and continued his tale. "The treasure," he concluded, "lies in that channel. I could almost mark off the spot on a chart. All I need is thirty days, the yacht, and a diver or two."

"I see," said Scragg finally. "You do not wish to die, Mr. Sand."

For the life of him, Philip could not make out whether the man was uttering a sarcasm or not. The financier's face was immobile. Only his eyes glowed with a peculiar flame.

"I do not," confessed Philip; "not because I am afraid to die, although I would prefer that I could die naturally. But life has taken a new meaning from circumstances. Will you grant my request?"

Merton Scragg tapped on the table with his fingers and looked keenly through the window at the tops of the city's buildings. Presently he said:

"I will be frank with you, Mr. Sand. I put no faith in treasure schemes. I have never heard of a treasure expedition which found treasure, except in cheap literature. Also, I cannot give you the yacht. You had better see Mr. Frederick Harding on that point.

"If he consents, then—I will consider the matter. In fact, you have placed me in such a position that I dare not withhold my consent. I feared that it would come to this. You—"

"One moment, Mr. Scragg," protested Philip. "I will not listen to any such talk. I have not come to beg. If your common sense—if your decency does not urge you to see the wisdom of my course, then I can leave this office now, and the rest—remains with me."

"Then go," said Scragg coolly. "You should not have come to me. It is none of my business; but you have until noon to-morrow. You can do as you please, because I have no power over you, thanks to myself.

"You can obtain the yacht and sail in defiance of me and what is due me. But I am loath to be responsible for your death—directly responsible, when it is in my power to present you with your life at a cost of twenty thousand dollars to myself. I have worked hard, Mr. Sand, for every penny I have.

"I value my rights. They are all a man has in a world that cannot, or will not, live without money battle." He stopped abruptly. Presently he waved his hand.

"Go now, young man. You have until noon to-morrow. But before you do any-

thing rash—call me on the telephone. It might be that I may yet agree to be robbed."

CHAPTER XIX.

The Debt Is Paid.

PHILIP awoke next morning with a headache. Strictly speaking, he did not awake. He merely opened his eyes, looked at his watch, and decided that the day had sufficiently advanced for him to get up and run the last lap of human affairs.

He had not slept. His mind had traveled down the oiled groove of the line of least resistance—the descent of which is so easy, and so uncontrollable once the mind has been launched upon it.

And it was so easy. The solution of the difficulty was so broad and simple and inviting, and the point of honor involved so delicate, so thin, so imperceptible to all but the finer sort of soul.

All night he had dreamed of Merton Scragg's own words—as if *Shylock* were the tempting devil himself:

"You can do as you please, because I have no power over you, thanks to myself. You can obtain the yacht and sail in defiance of me and what is due me."

It was a strong temptation—just to take French leave for thirty days, regain the treasure, pay Scragg his twenty thousand dollars, plus a liberal interest; and probably in the end the skinflint would be better pleased. At present Scragg only feared for his money—his investment.

And that was just where the blood of old Philander Sand arose in rebellion. The house of Sand had made its quondam fortune by methods unquestionable. The name of Philander Sand on paper made that paper as a bond.

The pride of Sand arose in arms against any subterfuge in the payment of a note fallen due. True, it was for everybody's best interest that thirty days' grace should be granted. But the holder of that figurative note wanted his money, and the principle of Philander Sand whispered in Philip's heart-blood:

"You backed the note, my son. You must pay the fiddler."

He dressed—wearily. His eyelids seemed to be filled with grittiness. His

lips were sticky, as if he had been drinking sweet wines the night before. His temples were hot and his senses were strangely dulled.

He could think no more. He cared no more. He was just sorry—sorry for himself, sorry that he had ever visited Merton Scragg, sorry for Verina, but too tired of mental debating to feel any great pang.

To-day was—the day of execution. This was the three hundred and sixty-fifth day. At noon the matter must be settled for good and all. There was no doubt in his mind that it *would* be settled—one way or another. If it was not settled one way, it would be settled—the other way.

He looked at his watch. It was eight o'clock. The watch was ticking with monotonous regularity. So many ticks, and it would be nine—ten—eleven—*noon!* Then it would be all over and—the watch would still be ticking, whether the little timekeeper in his own breast was still or not.

He had three hopes left, and surely one of them would save the situation. Scragg might relent of his own volition—Philip was determined that he should not again apply for extension. Verina might devise some scheme, even if he himself did not accept her money as a thirty days' loan—his mind revolted even at that. And the third chance was the one which is ever present in the most precarious of situations—the something which may turn up.

One queer idea came into his head. It did not seem queer at first—indeed, it seemed perfectly feasible and sensible. He might go to some acquaintance—and he had a few who were moneyed men—and tell him the story of the treasure, borrowing twenty thousand dollars, plus interest, on the enterprise, which would see the gold raised and converted into cash. But who would believe his tale of the mortgage on his life, even if he told it? And he felt that he had no right to reveal that which was Merton Scragg's secret as well as his own.

Merton Scragg had served him while serving himself. It would be dishonorable to tell of the transaction just because he himself was sorry for his side of the bargain.

And if he did not reveal the reason for

haste, it was hardly likely that in a few hours he could convince even an intimate acquaintance that the treasure story was true and get twenty thousand dollars on its vague promise.

When he was ready for the street Philip paused a moment to plan his actions. First, he must see Verina and tell her of his interview with Merton Scragg. Then he must see Verina's father and ask him for the loan of his yacht. If he got it, he must then telephone Merton Scragg and— Perhaps the miser would agree.

But Scragg would probably yield. He had *said* that he would be loath to be responsible for Philip's death. He had *said* that he might agree to be robbed. Philip's pride was struggling within him. He was questioning his right to place Scragg in the position of "permitting himself to be robbed"—and that was how Scragg felt about it. The only other course was to fulfil his bargain and—before noon.

"Anyhow, I have four hours," said Philip to himself in the glass. He looked a little pale, but far from being a suitable subject for an undertaker. "I will see Verina. I owe it to her, and I promised."

The truth that was knocking at his heart was this:

"I am a drowning man. I love life. I am weak. If she offers me a straw, though I may not clutch at it, I would like to feel that it is within my reach."

When he arrived at the house in the Bronx he was a little disappointed that Verina did not at once see him. The housekeeper, an elderly woman with an aggrieved face, said that she was dressing, adding the gratuitous remark that it was still very early in the day.

Philip was hurt. There were some things about Verina he could not understand. Was she so selfish that she could not appreciate how precious every minute of that forenoon must be to Philip, if not to her? Was it possible that her mentality was of that sort which moves around only one thing at one time, the kind that weeps at the tragedy and forgets at the curtain?

She kept him fully half an hour. Then she came into the room with her hand outstretched in a formal welcome.

"I pray you will accept my apology

for this untimely call," said Philip, with just a tinge of reproach and bitterness.

"I had not expected you so early," she said coolly. "Well, what did Mr. Scragg say?"

Her tone was so cool and indifferent that Philip felt wounded to his very soul.

"Are you—are you really interested to know?" he asked laboriously.

"Philip," she said, with a smile, "you are a very foolish boy. Perhaps you will soon know just how much interested I am and have been in your behalf."

"You have not spoken to your father or to Merton Scragg?"

"To Mr. Scragg—no. I promised you I would not. When my father came to dinner last night I said I wished to have a long talk with him in the study. I told him."

"And—"

"He is at home to-day, and I think it would be better if you and he talked it over together. He is very sympathetic, Philip."

"I am glad of that," said Philip dazedly. "I need some help—from a man. I would like to talk to him."

"But what of Scragg?"

"Scragg? I am afraid the man is impossible. There is not a grain of sentiment in his composition. I made matters worse by going to him. He treated me as if I were a beggar. I will admit that he left the matter open for consideration; but his decision, even at its favorable best, will be a hard nut for me to swallow. He told me that your father, Verina, owned the Chamcleon, and that— By the way, you told me Merton Scragg owned it."

"My father owns it," said Verina simply.

There came a sound of footsteps creaking on an old wooden staircase over the hall. The door of the drawing-room presently opened and Merton Scragg stood in the portal.

"Philip," said Verina tremulously; "this is my father. Do you see now how good God has been to us?"

Philip sat down on a chair and stared at the figure in the doorway.

"Mr. Scragg," said he, although the face of the man was cast in a softer, more human mold than that of the tiger of Wall Street. He might have been Scragg's twin brother.

"No, Mr. Sand," said the old man gently, "my name is Frederick Harding—*here!*"

It took a few seconds for the last word to sink into Philip's dazed intelligence. Then it all came back to him in a vivid flashlight panorama. Merton Scragg was Frederick Harding. Frederick Harding was Merton Scragg. Yet the two men were as different as cheese and chocolate.

There was some one kneeling by Philip's side. A little warm hand was trembling in his and a little voice was whispering:

"Philip—Philip. It's all right. Everything's all right. Don't you understand?"

Philip did—partly. But he could say nothing. He was trying to identify the white-haired, thin-faced old gentleman in the doorway with the gaunt, iron-jawed *Shylock* of the Wall Street office.

"Philip Sand," said Frederick Harding. "This is my house, and when a guest is introduced to his host I believe custom requires that he stand up, even if he does not shake hands. Shake hands, my boy."

Philip got up. He was conscious that he was being led forward by some one who held his left hand. His right hand he extended mechanically, still with his eyes fixed on the kind eyes of Verina's father.

"Listen to me, young man," said Harding in a paternal way. "You needn't think your wits have deserted you. You are not seeing ghosts. I am Merton Scragg, right enough, but not here. I am taking a holiday to-day—the first I have taken in years, barring Sundays."

"You are one of the few men who know my secret. Down there"—he frowned—"I am what I am—a man of business, fighting for the peace and happiness which I keep locked up here. Up here I am Frederick Harding—Merton Scragg is the only amusement I ever permitted myself in business—and my little girl and I are very happy together."

"A kind of *Jekyll* and *Hyde*?" stammered Philip.

"Not exactly," laughed the old gentleman. "But I think I know what you mean. Everybody is more or less of a *Jekyll* and *Hyde* or a Harding and Scragg. The only difference in my case

is that I am a creature of pronounced views.

"My business is my business, and I am what my business has compelled many a man to be—a hardened fighter, with mercy to none and asking no quarter. My private life is what I think a man's private life should be—something devoid of the miseries of the outside world.

"Sit down, my boy," said he, smiling still. "Miss Harding," he added with mock severity, "I did not ask you to sit down beside him."

There was a long pause. The old man was regarding the young people with a sad but happy smile.

"I am very pleased with you two. Philip, my little girl told me last night that she loved you very much. I know that you love her. I knew it yesterday in my—in Mr. Scragg's office. You see, I had been reading the newspapers. Besides that, I heard your story eleven months ago when my little girl was restored to me. And so," he said curiously, "you let the blackguards take away a million in gold for the sake of—a woman?"

Philip started a little. It was as if he was in Scragg's office again, only the Scragg who stood before him was very strangely transformed. Now he understood it all.

"But I owe you twenty thousand dollars," said Philip stupidly.

"No, you don't," said Frederick Harding quietly. "Your debts are paid in full. I did not bargain for your life, my boy. I bargained for your money. All you have in the world is fifty thousand dollars in insurance, and I believe that by your will it belongs to me.

"I have given that will to my daughter, to whom I presume it would naturally be your intention to leave your earthly possessions. You see, young man, I insist upon your marrying my daughter. Propriety demands it."

Philip stared at the old man. Then his eyes slowly filled with tears. He could not utter a word, but the little hand stole back into his and nestled there assuringly. Harding, knowing that which takes the iron out of a man's self-control, went on talking tactfully:

"I admire your pride, Philip. I ad-

mire still more your manhood and your sense of honor. I could have found it in my heart to tell you everything in the office yesterday when you told me to keep the matter of your love-affair off my mercenary tongue. My heart was made happy right there. The man who could resist a beautiful woman and her money when his life was at stake is—the kind of man I would like to see my little girl's husband.

"The yacht, by the way, is Mr. Harding's; and, as you have his permission to use it, perhaps you might go treasure-hunting around that island. You can't have too much money in this world, my boy; but nobody knows better than you that it isn't everything. Verina tells me that she would like to go back and get the breadfruit out of the fire."

For a moment Philip was at a loss to interpret this queer speech, but suddenly it dawned upon him. The yacht was his. *Shylock* was satisfied. His life was his. Verina was his. Health was his. Now he was to go treasure-hunting again with Verina to help him find it, with Verina to help him roast breadfruit on that particular hilltop.

He held out his hand in silence. He was too happy to utter a word. Through a haze he saw *Shylock* with an amused, contented smile on his rugged face, and heard his voice say:

"Now I must get down-town. All play and no work makes a fool of Jack."

Ten minutes later Merton Scragg was traveling down-town in the street-car line which he owned. The conductor, taking the fares, passed by the man, who picked up a castaway newspaper and became immersed in it.

Back in the old Colonial house, which was hedged in by new tenements, Philip Sand was staring before him. There was a woman on her knees before him, and her face was buried in his hands. Presently an old grandfather's clock in some other part of the house began to dole out the long-drawn strokes of the noon-hour. Philip Sand started.

"Verina!" he exclaimed.

"Philip," she whispered, and her arms stole up around his shoulders. "Kiss me—but don't say anything for a little while."

(The end.)

A Woman at the Key.

BY EVA M. RICHARDS.

WE find women in every phase of commercial life nowadays—even in railroading. But Miss Richards, who spent some time as operating express-agent, and in other capacities, in a little way-station out West, advises women to keep out of that part of the game, and she gives some pretty good reasons why. When she started in she was satisfied to be a mere cog in a great system, but she made herself more useful than ornamental, and soon became a Lady Pooh-Bah in her little sphere.

**Thrilling Experiences of a Young Woman Who Did Most Everything,
from Feeding a Wrecked Crew to Chasing Boes
Down the Dusty Pike.**

IT had always been my wish to be part of the great wheel of business. I had studied telegraphy a short time, and had had a short experience in station work, but when I was offered the position of station-agent and telegraph-operator at a small station on the Chicago and North-Western Railway, I promptly accepted.

No queen on her throne was ever happier than I when I first wrote my name as agent for the company. And I pity him who has never felt the exhilaration of responsibility.

Doing business over one's own signature is quite a different matter from doing it over another's. But strength and courage are generally near us when we are in need of them, and they have never failed me.

Except the clerical work in the general offices there is no branch of railroad work for which a woman is physically fitted. The reasons are numerous. The long, uncertain hours, exposure to climatic changes, strain on the nervous system, and the necessity of always being ready to stand one's ground in the face of unexpected and most difficult circumstances.



SHE ARRIVED AT THE STATION AT LEAST FIVE HOURS BEFORE TRAIN-TIME.

"Ready for an emergency," "Prepared for the unexpected," should be branded on every would-be railway employee. Hardly a day passes that does not bring some unthought-of proposition, when one acts without hesitation.

The station in which I was installed as agent and operator was in a small town, but being the shipping-point for a rich stock and agricultural district it was a busy point, and I soon became well acquainted.

Multitudinous Duties.

When it was possible, I hired a man or boy to attend to the outside work, but more often this was impossible. Then I surely did the work of a man.

In the years I associated with railway men they treated me with the greatest respect, and I can truly say of them that they are a class of men with big hearts, and always ready to do a kindness.

I was also postmistress and express-agent, so had my fingers on the keys of the town's government, express, and railway business. At seven in the morning I was due at the office, when I sent my first report to the division train-despatcher; and from then until the last train at night, no-matter how late, my work was before me.

An agent of such a station cannot be the steel figure of the city. He must not only be polite, but neighborly with the townspeople and those from the country. Every newcomer must be gracefully welcomed and every old one honored.

The admonition of the photographer to "look pleasant" is always needed by the agent. One old lady, who took the train quite frequently at this station, often asked me to make a cup of tea for her. She usually arrived at the station at least five hours before train-time; and, when she was not drinking my tea and eating crackers, she was knitting socks and smoking an extremely odoriferous corn-cob pipe.

Private Secretary to Farmers.

After the telephones were installed throughout the country, I acted as private secretary to most every shipper in that country. I was often called upon to write

an order for harness or similar articles for a farmer. These orders usually came just about train-time. The shippers appreciated this assistance because there was no charge. They appreciated my efforts for them, though they never deluged me with storms of gratitude.

Of all the mail which I handled, I think the following "forward," as the writer called it, merits a place in English literature. I was asked by the writer to "look it over," hence my knowledge of the contents:

My der gurl this fur all rite seems
a age sence i see yer be back sun as pus-
ible yer own lover Al rite more nex
time so gud-by little blue ies and pink
teth—you no what that lin is Al agin.

I presume the line stood for an affectionate demonstration of his ardent affections, and "Al agin" meant that he was still Al and not an alligator.

Shipping a first consignment has been to some people their Waterloo. I distinctly remember a horse that was brought to the station for shipment. The consigner had never shipped an ounce of freight in his life, and was duly excited about the performance.

Milk for the Crew.

The box car was not right in front of the stock-chute, so I told him to push it there with the aid of the pinch-bar. This he refused to do, and insisted upon loading from the depot. He improvised a bridge by laying boards from the platform to the car, then led the horse up the steps into the car, I going before, coaxing the animal with an ear of corn.

It has often been necessary for me to stand on boxes in order to seal cars, and I have moved empty cars with the aid of the pinch-bar. There is little work about a station that I have not done, even to dodging hoboes.

One evening the freight was coming down the line, running on a smooth stretch of track, when, without any apparent cause, three of the loaded cars were off the track, lying on their sides. These cars were loaded with shelled corn, so the spill may be easily pictured.

The conductor and brakemen were in the "lookout" at the time, and graphic-



HIS BARK AND GROWL COMPENSATED FOR HIS LACK OF SIZE.

ally told me they found themselves at the other end of the caboose on their faces, but expected to be in paradise.

The crew came to the station to report, and asked if I could furnish them supper. My sister said we could; but, when she went to the ice-chest to see if there was sufficient milk and cream, she found the same condition that confronted Mother Hubbard.

A 1 x 2 Dog.

Seeing a herd of cows grazing by the roadside, I called a boy to get us the necessary supply. He did his best for us; but found it difficult, as it was fly-time, and I think he did most of the milking walking about the lane with the cows. After supper the crew went back to work, and I sat at my desk, taking and sending orders until the next day. My sister kept me company, occupying an improvised couch of empty egg-cases.

All the time I was in this office I had a most ardent admirer and protector in Jack, my one-by-two dog. His bark and growl compensated for his lack of size, and he frightened more than one Weary Willie by attaching himself to a trouser-leg.

One Willie came into the office and, with a savage cast of face, said: "That dog bit me, and now I will have cholera-morbus rabies."

Jack was very fond of the trains and crews, much to my discomfort, until an engineer sent a great cloud of steam at him and a conductor pulled his tail.

From that time, if he was lying on the platform and heard a whistle five miles away, he would run for his life into the office. Many is the way-bill he has torn into bits for me, one in particular, which covered a shipment from La Crosse. Going into the office, I found the little fellow sitting in the ticket-window, having a fine time throwing bits of pink paper about. Not an inch of the bill was left.

I wrote to the agent at La Crosse, asking for a duplicate, and when I received it, across its face in bold letters was written: "Either tie up your dog or give him to a circus."

One Lantern—Two Globes.

The passing of a circus through our town at two in the morning from Platteville to Cedar Rapids, Iowa, gave me my first experience in blocking trains. My station was not a regular train-order

office, consequently I had no semaphores or other devices with which to give signals, save one lantern and two globes, one red and one white. But these did the work satisfactorily.

Very few persons realize the responsibility that is connected with the operation of trains. They enjoy the excellence of the service from the ballast road-bed to the electric-lighted padded berth. They frequently notice the whistling of the engine and the stopping of the train, but

enough to express the tortures through which I passed when I received my first train order. Had it not been for the kindness of that conductor, I too might have piped my swan song. I have the original yet, which reads:

BARABOO—To C. & E., No. 125 N.:

No. One hundred twenty-five (125), Murphey, can have until eleven forty, 11:40 A.M., to go to Ipswich, against No. one hundred twenty (120), Reales. No. 120 gets this at Ipswich, 12.

J. W. L.



THERE NEVER WAS A COUNTY FAIR WITHOUT THEM.

what this means they do not know. But the men at the telegraph key and the throttle know.

A small sheet of yellow tissue paper is an insignificant looking article, but upon it depends the safety of lives as they span rivers, cross prairies, and crawl up mountainsides. This yellow sheet contains the train orders which govern the movement of a train, and which is the young operator's test of ability and courage—and often his swan song.

A rule appears simple until we attempt to harness and put it into use. So it is with learning about train orders and the delivery of such.

I have never found words strong

After the delivery of that order I felt that I would succumb to nervous prostration.

When McKinley Died.

I hold copies of three messages which I received and which were but three of thousands of the same nature received on the same dates. They are as follows:

BARABOO, 17.

TO ALL AGENTS:

Thursday, Sept. 19, 1901, has been appointed a day of mourning and prayer. You will please issue such instructions to those under your jurisdiction as will result in as complete cessation from labor as practical.

Switching crews and station help will be reduced to a man, and every employee of this company is to be given an opportunity to comply with the proclamation of the President.

(Sig.)

R. A. C.

BARABOO, 18.

TO ALL AGENTS:

Thursday, September 19, having been appointed memorial day account of death of President McKinley, we will abandon all way-freights and other freights as much as possible, except for the handling of perishable freight and live stock. Notify all concerned.

J. W. L.

BARABOO, 19.

TO ALL AGENTS:

All trains and engines of this company will come to a full stop at 2.30 P.M. to-day and will not resume motion until 2.35 P.M., or five minutes, as a mark of respect to the dead president. This is to be done regardless of where the train may be. Operators will please leave the wires silent during these five minutes.

J. W. L.

During these five minutes my wires were silent, and looking up the track we could see the motionless passenger-train which had just left the station. I do not remember seeing a smile on the face of a railroad man during that sad week. My Chicago daily paper reached me at eight in the morning, and every morning of that week I read it aloud to the section men and neighbors as they gathered in the depot, and every day we grew sadder and sadder.

Off for a Picnic.

If one has never seen a crowd of people board a train for the county fair, he has missed one of the best bits of human comedy. The crowd gathers from all parts of the country—old men and women, young mothers carrying little bundles of life carefully wrapped in shawls, youthful lovers and their girls on their first trip away from home; the little girl with a rubber cutting her little throat in order to keep her hat on the back of her head; the growing boy with the small felt hat turned up to give a good view of his freckles, and old young men, known as sports, who are regular attendants at every fair.

These old chaps usually wear a bright

tie, a rubber collar large enough for two necks, a stiff hat on the side of the head, and a ring bearing a stone the size of a quarter-of-a-dollar. Their clothes are of goodly proportions and fit the frame as if thrown at it. Their shoes are of a perfect dust color.

These captains of leisure usually carry either a cane or whip. There was never a county fair without them.

When they come straggling from the train at night, it is a different crowd. They are weary, worn, and sometimes sad; they are dirty, crumpled, and forlorn, but they have been to the county fair, seen the big pumpkin and bet on the races.

It's Work We Love.

To one unaccustomed to the clocklike routine of railroad work, the charm which attends it is unknown. But to one who has received a "G. N.," or relief from duty, who tunes his ear to the heavy whistle of an approaching train or the resounding clang of the bell, feels the irresistibility of the charm.

There is nothing more welcome than a delayed train, one for which one has waited hours. The trains on the division on which I was employed were more often late than on time during the winter. Despite the snow-fences which hugged the right-of-way, the snow would persist in filling the numerous cuts, making progress slow, sometimes impossible until the plows and flangers would make their missionary visits.

At such times, the most welcome thing on the face of the earth was the train, and I held its engine in deep esteem, as it came puffing in, its light piercing the gloaming, its long black plume of smoke waving in the keen air, its back blanketed with snow and its flanks fringed with icicles.

When it stopped it seemed to breathe heavily and then to sigh. Then with renewed strength, with its drivers silhouetted in the red light of the open furnace, it snorted and moved on.

Then I banked my fire for the night, reported the train, received "G. N.," cut out the wire, locked the door and hurried home, tired and happy, until the dawn of another day.

THE SONG OF THE WIRES.

BY OTIS M. SISSON.

Written for "The Railroad Man's Magazine."



HERE'S a message of death on the wires to-night,

For they ceaselessly throb and moan;
For they ceaselessly mourn like a soul that is lost,

In a quavering, minor tone.

Far off in the darkness I hear it come,
Faint and soft it sounds;
Nearer it speeds with the pulsing beat
Of a wrought heart's leaps and bounds.

It comes like a shriek from the depths of space,
A quivering, anguished cry—
Oh! surely some soul is forever lost,
And forever alone must fly.

It goes like the sigh of a parting breeze,
And dies, like a sigh, away;
But to return in the rising gusts
The saddest of sad chords play.

There's a message of death on the wires to-night—
Hark! how they sob and moan;
And a soul somewhere in the farthest space
Is winging its way—alone.

DUGAN'S PAL GOES DIPPY.

BY AUGUSTUS WITTFELD.

("E. Florence.")

The Book-Agent Tries To Get in a Few Words During the Recital of Archie's Love-Affair.



MY friend," said the book-agent to Dugan, "I would like to interest you in a work that should be in the hands of every thinker. A work that will raise your standard of efficiency, no matter what your calling may be."

"Say, sport," replied Dugan, "no doubt you have sincere convictions as to the value of your indispensable work, for the brooklike flow of your language would lead me to infer that you have, at least, mastered your circular letter of instructions; but when you speak of standard of efficiency, I would like to inform you that old man Hinchman looks out for that; and the man that can't keep the gage prognosticating a plethora of steam gets ample time for the rigors of social requirement."

"True," replied the book-agent; "but do you never aspire for a more exalted position than the one you are now filling? Ambition should be implanted in every human breast, and every man should endeavor to prepare himself for advancement."

"Right you are," assented Dugan; "but you don't for the infinitesimal subdivision of the unit of time imagine that I don't know anything but coal-heaving?"

"Why, man, it's not knowledge, but opportunity, that I am laying for. It's true I'm feeding fuel to a mogul now, but I'm ready to tackle any job along the line—clean up to the presidency of the road."

"Are there never times when you wish to refresh your memory on matters of a

technical nature?" inquired the book-agent. "The composition of the coal you handle, the expansive power of steam, the mechanical construction of the steam-gage, or even the principle of the balance escapement of your watch, are all subjects of absorbing interest."

"Speaking of watches," said Dugan, "reminds me of Archie Bruxton; and so long as you show a predilection for telling me all you know, I am going to relate this yarn to you. It may not be of material benefit to you, but its recital may, in a sense, compensate you for the loss of an order."

"Archie gravitated to railroading by divine instinct back in the eighties, at which time I was swinging the scoop on the Pennsy. He was an innocent-looking chap, with a caffy-o-lay complexion and an unalloyed confidence in mankind."

"He was unsoiled by contact with the world, and was preeminently a child of nature."

"I cottoned to him at the start, on account of his unsophisticatedness, and introduced him to the Medusa who ran the Waldorf where I kept my steamer-trunk."

"By reference to Medusa in this sublime work," interrupted the book-agent, "you will learn that the name was applied to Mary, Queen of Scots—'The Gentle Medusa.'"

"Yes," commented Dugan; "but this Medusa was 'Queen of the Micks.' Likewise, not gentle. Well, to continue—one evening Archie went out for a stroll, and when he returned he proudly exhibited a pawn-ticket for a watch, which he said he had bought from a stranded railroad engineer."

"I uttered mental maledictions when he told me the story, which is as old as the hills, and cursed myself for letting him loose in the night air without a nurse. Instinctively, I knew that some one had handed him a prize specimen of the *citrus vulgaris*.

"He said he thought that a watch which was good enough for a railroad engineer must be a pretty good article, at timekeeping, and that's just what the party of the second part expected him to think; but you couldn't expect Archie to be wise to the wiles of the pawnbroker's runner."

"Are you aware of the origin of the pawnbroker's insignia?" again interrupted the book-agent. "By reference to the proper subject in this mine of information, you will learn that the three balls are the arms of the Medici family, and refer to the exploit of Averardo de' Medici, a commander under Charlemagne, who slew the giant Mugello, whose mace was fitted with three iron balls."

"Sport," replied Dugan, "you may be long on medieval history, but the accepted interpretation of the sign of the three brass balls is that it was the emblem of the first pawnbroker—he who traveled in the wake of the Crusaders, advancing loans on their watches and scarf-pins, and whose motto was 'In hock signo vinces.'"

The book-agent attempted to dispute this explanation of the erudite fireman, but Dugan threw the gab-throttle over and shot ahead.

"Now, see here, pardner," he cautioned, "if you're going to throw a switch every few minutes, and run this fiction limited onto a siding, we'll never finish on schedule."

"Well, to get back on the main line, Archie redeemed the watch the next day by separating himself from eight forty. He showed it to me, that night, in the privacy of our boudoir."

"It was one of those Swiss movement affairs, reposing in a gold-filled round-house, highly ornamented with bizarre engravings. As I sprung open the lid, I was surprised to see the picture of a handsome heroine, gazing soulfully at me."

"Say, boy," I asked, "who's your lady friend?"

"Archie blushed like a girl caught in the act of concealing her age."

"The picture was in the watch when I got it," he replied.

"She's a beauty, all right," I commented. "I wonder who she is?"

"Wish I knew," said Archie soulfully.

"See here, kid," I cautioned, "don't you go getting spongy on a fictitious female. You are too young to indulge in affinities or soul-mates."

"The article on affinities in this magnificent work," interrupted the book-agent, "abound in reference to the celebrated affinities of history—"

"Hold on," protested Dugan: "I ain't interested. I ain't no blooming monastic Abélard nor no pugilistic Paris. When a man does his love-making in the spotlight, you can bet your sesterces that the divorce court is getting ready for executive session."

"I warned Archie to be careful in diagnosing his symptoms. Told him that the symptoms of love and a predisposition to hepatic disturbance were often confounded. He protested that he was heart whole, but, like the lady, he did protest too much; and I realized that he was squarely hit."

"During the days that followed, I caught him frequently gazing at the photo of his innamorata as though it was a twenty-dollar gold piece."

"One day he came home and told me that he had run across the buccaneer who had sold him the ticket. This time he happened to be a stranded sailor, who had smuggled in some diamonds which he wanted to sell."

"Archie chided him for leaving the honorable calling of railroad engineer and taking up with dissolute sailors. When the fellow professed ignorance of the railroad business, Archie showed him the watch and asked him whether he didn't remember selling him the ticket for it."

"Then, suddenly, this Jekyll-Hyde character remembered all about the watch incident. When Archie questioned him as to the identity of the woman in the case, he laughed, and explained how the game was worked. Then he examined the watch, and told Archie that it was of a make that had been handled by a mail-order house in Chicago exclusively."

"He suggested that Archie write them, giving the number of the case and also of the works, and possibly they could inform him as to whom it had been sold. Archie thought it was a capital idea.

"I tried to dissuade him from acting recklessly, but I hadn't stopped to consider that the foolish flier always travels on a clear track. Archie was traveling on the matrimonial limited, and he ignored my signals and tore ahead on down grade to destruction.

"He sent off his inquiry, and in due time the answer came that the watch had been sold to one Antoine Picard, at South Bethlehem, Pennsylvania."

"You may not be aware," commented the book-agent, "that the name Bethlehem has been given to upward of one hundred towns and villages. By reference to this *vade mecum* of information, you may—"

"Hold on, sport. Put on the air," cautioned Dugan. "From the way you interfere, one might imagine you was playing talk-back in a football game. When you started to run wild, I was trying to impart the information that Archie got busy and indited an epistle to the Bethlehemite with the Quartier Latin name, and asked him whether he had ever owned the watch.

"He got an answer stating that the watch had been stolen from him about a year back, and offered Archie a reward for its return.

"The answer transported Archie to the haven of happiness, and he squandered some more real money for postage to inform that Gallic Bethlehemite that he would return the watch in return for some definite information about the original of the photo in the case.

"Picard came back with a proposition that Archie take a trip to Bethlehem, meet the original in person, and get his information at close range.

"I realized that there was no use trying to restrain that bally brakeman when the hymeneal hawser was pulling him Bethlehemward.

"The following Sunday, arrayed in his gladsome garments, he journeyed to the burg with a biblical name. I did not see him until Monday night.

"Well, boy," I inquired, "did you see your divinity?"

"Sure thing," he replied.

"What's her name?" I asked.

"Marie Héloïse Clothilde Jeannette Louise Antoinette Picard," he answered.

"Great Scott!" I ejaculated. "Isn't that a rather voluminous name for a single female?"

"But she isn't a single female," answered Archie.

"Married, eh?" I commented. "Well, it serves you right for getting dippy over an unknown."

"Well, no," replied Archie; "she's only partly married."

"See here, boy," I said, "just loosen up, and let me have some details."

"It's like this," replied Archie. "The original of the picture happens to be the sisters of Antoine. Yes, I said sisters. There's six of them. When Antoine wanted to put their picture in his watch, he found that he couldn't get six photos into it, so he conceived the brilliant idea of making a composite photograph of the six and carrying that in his chronometer. The result was satisfying to Antoine but untrue to the originals. Dugan, old boy, you ought to see them."

"No, you don't," I replied. "You're not going to drag me into a mésalliance with any disintegrated portion of that composite chronometer."

"There's two of them married," replied Archie; "and when I make up my mind which of the remaining four is to be Mrs. Bruxton, I'll give you an invite to the wedding."

"Well, I got the invite, all right, but it didn't happen to be one of the composite coquettes that landed the susceptible Archie; for, while he was puzzling over the problem of plural possibilities, he succumbed to the wiles of a fat German girl whom it would have been impossible to photograph except with a view camera.

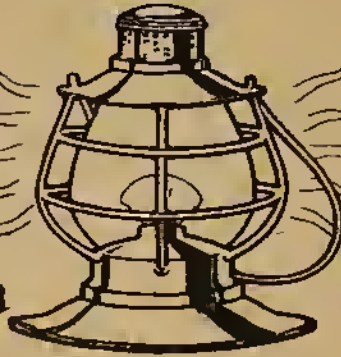
"Say, how are those composite photographs made, pardner?"

"In this superb work which I am offering you," replied the book-agent, "the article on photography goes into full detail as to the *modus operandi* of composite photography; and, in fact, there is hardly any subject that is not covered. If you will place your name here on the order, the books will be delivered—"

But Dugan had fled.

WHAT'S THE ANSWER?

By the
Light of
the Lantern



Questions
Answered
for
Railroad Men

ASK US!

WE like to be as useful to our readers as we can; but, because of the great popularity of this department, we are forced to impose certain restrictions. In future, we shall be compelled to limit its scope to the answering of questions of an informative, technical, or historical nature only.

We receive dozens of queries in regard to the right person to apply to for certain classes of employment. If the writers will pause for a moment to consider, the title of the proper official will readily occur to them, and in any case the information can be obtained by application to the headquarters of the company involved, much more quickly than we can publish it.

If a reader, after following these directions, still finds himself lacking in information, and will write us, giving his full name and postal address, we will try to satisfy him through the mail, but we cannot answer any letter in which it is not made clear that some real difficulty exists.

SOME time ago I had occasion, while handling air on trains from the rear with the tail-pipe, to back an engine with one heavy coach from the depot to the yard. I placed my tail-hose, or "gun," as we say, on the rear end, tried my air and set the brakes, the excess pressure, of course, releasing them.

I gave whistle signal to back up, and we proceeded to the yard, where another engine was standing. I applied the air slowly, until we were about 400 feet away from this engine, but it had no effect to reduce speed, so I threw valve in emergency, letting air out of train-pipe. When the air escaped I could tell it had no force.

We were going about five miles an hour and struck this engine which I mentioned, but fortunately with no damage. This has happened several times lately, and we have a dispute about it.

What caused this to occur? Was it my

fault, the brakes, or the fault of the engineer?—J. W. W., Chicago, Illinois.

Without knowing all of the conditions implied in your interesting query, we could not say positively what the exact cause was, but, judging from the manner in which the application of the brakes was made, the back-up hose was open, or at least partially. This reduced the brake-pipe pressure somewhat, and caused the feed-valve to open wide at the brake-valve, thus supplying the air to the brake-pipe as fast as it was being reduced at the rear.

No doubt the brake had also been applied partially in service, thereby reducing the possibility of obtaining quick action, even if the brake-pipe was wide open. Without having made a partial service application, however, the same difficulty in obtaining the quick ac-

tion would be liable to occur for the reason that the feed-valve would be supplying air to the brake-pipe very rapidly, thus preventing the rapid drop in brake-pipe pressure necessary to obtain quick action, or even a quick service application of the brake. In other words, the condition necessary to produce quick action had probably not been obtained.

WHAT is the average cost of a wood freight-car; also, of a steel car? What is the average thickness of the plates used in the latter?—F. N. P., New Haven, Connecticut.

Wood cars of different types, with steel underframing, may be assumed to cost from \$1,100 to \$1,400. Pressed steel cars are worth about \$2,000. The average thickness of the sheets in all steel cars is one-quarter-inch tank steel. Some of the pressed steel shapes entering into the details of the car are much heavier than this. These parts are pressed out between dies in a hydraulic press.

J. S., Fall River, Massachusetts.—We have intimated many times in this department that we cannot pass on the merits or demerits of any school or institution advertising a course in firing locomotives. This attitude is due principally to the fact that we know nothing about any of them other than the information which may be gained from a perusal of their advertising matter, which you can secure on application, and because we have never known or talked with one of their graduates.

It would appear from the literature mentioned, that, so far as the theoretical knowledge which may be gained is concerned, the courses taught are no doubt of value. We know that many good firemen are woefully weak in this end of it. Furthermore, we know that the time is fast coming, in fact is here, when a man will have to pass a very good examination on the theory of combustion, and many other things heretofore disregarded, before he will be allowed to run an engine.

We do not believe that the actual work of handling the scoop, and the art of keeping the fire in good condition at all times and under diverse conditions, can be learned anywhere except on the footplate. We have no knowledge whatever of the ability of the school you mention to secure positions for its graduates.

They are, of course, in touch with various master mechanics, and keep the latter advised of their available men. The long and short of it would be solely whether the master mechanic, or employing official, would

prefer to take the new men this way, rather than through personal acquaintance with them. Your size and weight indicate that you are physically qualified to perform the work of a fireman, but, as you are under age, on some roads it would be necessary to secure a minor's release before going to work.

WHAT disposition has been made of the locomotive "General," captured in the spring of 1862, from the Georgia State Railroad, at Big Shanty, Georgia, by J. J. Andrews, and some twenty others?—S., East Liverpool, Ohio.

It is on exhibition at the Union Depot, Chattanooga, Tennessee, where it has been for some years as a permanent exhibit.

J. T. J., Columbus, Ohio.—The salaries paid traveling auditors is variable, as, by the way, are all salaries identified with this business for corresponding lines of employment. We know personally of one traveling auditor who receives \$200 per month, but, from our knowledge regarding recompense, we are inclined to the opinion that this is exceptionally high. They do not appear in the official guide in the capacity which that name suggests, but in view of the importance of their work they should properly be so considered.

IF an engine were fired up all ready for a run, could it run on level track for half an hour with but one shovelful of coal after starting?

(2) What railroad has the most track in use under one management in the United States?

(3) Does the Southern Pacific have the longest engines in the United States? I have heard that two of theirs measure over all ninety-two feet.

(4) Which is the hardest to fire, a large or a small engine?—N. M. S., Angel Island, California.

(1) This would depend absolutely on the conditions under which the engine was run. If the fire were built up in good shape, such as it would be before pulling out with a hard fast run, and the cars were omitted, that is, nothing but the light engine considered, it might be possible to run it for half an hour by careful handling.

On the contrary, if we assume your question to mean an engine with a train, the answer is that it wouldn't run very far or very long without intelligent firing and plenty of it, if the train was heavy. It is a very hard drag on a fire to get the swing on a train of eight or ten cars, and without attention it would soon burn down or become so pulled

full of holes that the steaming qualities would be seriously affected.

(2) The Pennsylvania system has the most mileage under one name and management, but for your information, and replying to other queries received this month, we quote the make-up and mileage of what are known as the Harriman lines; the figures implying the miles of road:

Union Pacific	3,337.63
St. Joseph and Grand Island.....	257.85
Oregon Short Line.....	1,454.06
S. P. Co. (Pacific System).....	6,014.58
Sonora Railway	263.45
Sunset Central Lines.....	3,442.49
Mexican and Arizona Lines.....	318.62
Mexican Extensions	527.82
Illinois Central.....	4,594.00
Total.....	20,210.50

In addition, the following are owned jointly:

U. P.—Leavenworth and Topeka...	46.57
U. P.—Miscellaneous	31
U. P.—San Pedro, L. A. & S. L. R. R.	1,066.35
S. P.—Sunset and Sunset Western.	47.64
S. P.—Northwestern Pacific.....	405.76

Total 1,566.63

Grand Total Rail Lines.....21,777.13

Atlantic Steamship Lines.....	4,400.00
Pacific Steamship Lines.....	31,200.00

Total Water Lines.....35,600.00

Grand Total, Rail and Water.....57,377.13

The above figures, carefully compiled from latest records, are complete regarding the Harriman lines. They are, of course, the largest number of railroad properties practically under one control, but we think that the Pennsylvania lines, or system, better answers your question.

(3) Eighty-three feet six inches, is the longest total wheel-base of engine and tender of which there is any record. This is on Southern Pacific engine No. 4,000, which was fully described in the December Lantern Department. It is no doubt as long as you mention, that is, from the extreme point of the pilot to the extreme rear portion of the tender, but the official figures are silent on this particular dimension.

(4) More work is naturally required to maintain the fire in proper condition in engines having extensive grate area than in those with small fire-boxes, so far as the actual physical effort is concerned. It has been our experience that more skill is required to fire the small engine properly. The

majority of the big fellows steam so freely that the work becomes merely a question of the endurance available for baling the coal into them. The others have to be humored, and the coal has to go just where the fireman wants it, and in quantities no more than needed.



H. S., St. Louis, Missouri.—The engines of the Western Pacific Railroad, which you mention, burn coal as fuel.



IN what position are the eccentrics on the axle in relation to the crank-pin of a locomotive?

(2) How much steam pressure is there on the slide-valve of a locomotive, and is the pressure on the valve the same as the pressure around it?

(3) What is the difference between a slide-valve, a balance-valve, and a piston-valve, as used on a locomotive?—G. N. S., Friedens, Pennsylvania.

(1) Depends entirely on whether the valve motion of your engine is what is called direct, or indirect. Direct motion engines may be considered as those in which the slide valve is driven by the eccentric and rod without the interposition of a rocker arm.

A rocker arm, which is a pivoted device, naturally reverses the motion imparted by the eccentric rod and necessitates a different arrangement of the eccentrics on the shaft. The large majority of locomotives have the indirect motion, which cannot be avoided, owing to the height of the valve on its face above the center line of motion, or the line drawn through the centers of all axles.

In such cases the forward motion eccentric is placed with its throw above the crank-pin, when the latter is on the center, or "following" the crank-pin, in shop parlance. The back-motion eccentric, with the crank-pin in the position above defined, would be in a corresponding position below the crank-pin.

If the slide or piston-valve had no lap or had no lead, the center of the eccentric throw would be set at right angles with the crank-pin, the forward at right angle above and the back at right angle below. All valves, however, have some outside lap, and as a rule, some lead, therefore it becomes necessary to advance the eccentric toward the pin a distance equal to the sum of the lap and the lead.

A handy rule for this, in the instance of the locomotive, would set the center of the throw of the forward-motion eccentric at the third spoke in the driving wheel, above the crank; that is, reckoning from the posi-

tion of the wheel with the crank-pin on the center. Logically, therefore, the center of the throw of the back-motion eccentric would be at the third spoke below the crank-pin.

(2) If the packing strips are tight, there is practically no pressure on the top of a balanced slide-valve, with which the large majority of locomotives are equipped, except from what steam may leak over the packing strips, due to poor fit or wear, and this leakage is provided for through a small hole in the center of the valve, which allows whatever leakage may ensue to pass into the exhaust cavity of the valve and thence into the stack.

The pressure in the steam-chest, around the slide-valve, is generally reckoned at 85 per cent of boiler pressure, it being computed that 15 per cent is lost between the throttle-valve and steam-chest through wire-drawing, radiation, and condensation.

(3) A balanced slide-valve is protected with packing strips, or rings, arranged to make a steam-tight joint on a true plate above the valve. This relieves it of tremendous pressure, to which it would be subjected, secures corresponding ease of movement, and not least, a minimum of wear to the seat on which the valve travels.

A plain slide-valve, of which few examples remain in locomotive design of the present day, has no packing strips or rings, and has equal steam pressure on sides and top. The objections to this type, and which resulted in its retirement, were difficulty in securing proper lubrication, in handling the reverse lever under steam, and the rapid wear of both valve and seat.

A piston-valve, of which many examples are now standard in this country, is simply, as its name implies, two pistons representing the edges of the slide-valve, and connected by a rod, this rod forming the valve-stem. When outside admission, the space between the two pistons becomes the exhaust cavity; when inside admission, the space between the pistons contains the live steam for admission to the cylinders.

In either instance the valve is nicely balanced, this latter being the advantage claimed for it. Its weak point is in the liability to breakage of the packing rings which encircle the pistons to make them steam tight in the valve chamber. Although so many piston-valves are now in use, it can scarcely be claimed that they have yet passed from the experimental stage.

It needs but a reference to the reports issued by the various locomotive building concerns to show that many new engines are still specified to be built with the regular balanced slide-valve. Undoubtedly skepti-

cism still prevails to a marked degree in regard to the utility of the much-exploited piston-valve.



G. F. B., Shreveport, Louisiana.—The question of the first automatic cylinder lubricator for locomotive use is somewhat obscure, but its invention is generally credited to Nicholas Siebert, a California engineer, who in 1869 applied his idea to engines in service and with considerable success.

The first "up drop" lubricator was invented in 1873 by John Gates, of Portland, Oregon. All succeeding lubricators, up to and including the elaborate affairs of the present day, are but developments or modifications of Gates's idea. We have never heard, or can find no record of the invention of the lubricator assigned as you mention in your letter.



B. M. B., Grand Rapids, Michigan.—The best medium through which to secure the information requested would be some extensive dealer in scientific instruments. You will find many such in all cities of prominence, and, whether the article is carried by him or not, he will no doubt be pleased to place you in touch with it and furnish full information regarding its care and maintenance.



DOES it require a great deal of brain work to run a locomotive?

(2) What is the average pay of an engineer and fireman?

(3) How long must a man fire before he can become an engineer?

(4) Does the fireman merely watch the engineer to learn, or must he get information from the railway school?

(5) Does a man have to wipe engines before he goes on the road?

(6) How old must the average young man be to physically handle the work of a fireman?—T. A. P., Cleveland, Ohio.

(1) Yes, lots of it, and many other requisites. Read "The Man Who Pulls the Freight," in the October, 1908, number of the RAILROAD MAN'S MAGAZINE, and judge for yourself. This is simply a plain tale of an average freight run, under average conditions.

(2) Engineers' pay averages \$3.50 to \$4.00 per day; firemen, \$2.00 to \$2.50 per day.

(3) Usually four or five years.

(4) He picks it up on the footplate through observation of from two to a dozen different men for whom he may fire regularly, if it is in him, and the final examination will readily decide this. The railway

school might help in passing a better final examination. See reply to "J. S., on page 51, this issue.

- (5) No, there is no defined rule about this.
 (6) Twenty-one years is about right.

C. W. A., Hutchinson, Kansas.—There is no difference whatever in the action of a crank and an eccentric. So far as results go, the names imply the same results. If you will submit us a sketch embodying the details of your problem, or the work you want to do, we will be pleased to advise definitely the most economical and efficient arrangement which you should use.

PLEASE tell me whether or not an engine is considered as a train.—C. L. S., Norfolk, Virginia.

An engine running alone, if displaying signals, or carrying markers, is always regarded as a train. This does not apply to engines running in yards or within yard limits.

RULE No. 12 says: "Trains will not leave the following stations without train order or clearance card: 'A,' 'S,' and 'Z.'" Conductor, engine 1697, receives an order at "A" to run extra to "S," and accept caution card on work extras, 18, 28 and 37, working between "B" and "D." Operator at "A" gives conductor a caution card. The conductor refuses a clearance card, saying he does not need one, as he has his orders and a caution card. Who is right, the operator or the conductor?—E. V. P., Schenectady, New York.

As you have quoted the rule which makes a train order or a clearance equally effective, and conductor had orders, it would appear that the clearance card was not necessary. There is no reason, however, why he should refuse to accept a card, except on the technicality which the rule implies.

WHY is the high-pressure cylinder on a compound locomotive so called, when it is smaller than the low-pressure cylinder?

(2) Where will I get a book explaining valve setting and going into machinery in detail?—G. F. H., Maricopa, California.

(1) Because it first receives the steam from the boiler and uses it at that pressure, minus 15 per cent due to condensation, radiation, etc., before exhausting it into the larger cylinder. This latter is termed the low-pressure cylinder, because it is supplied solely by the exhaust steam from the high-pressure cylinder, and the reason that it is

made of much larger diameter than the other is because the steam which it receives is much reduced in pressure, and in order to partially offset this loss it is spread over a greater piston area.

(2) Apply to Locomotive Engineering Publishing Company, New York City, New York, or to *Railroad Age-Gazette*, New York or Chicago.

F. W. F., Chicago, Illinois.—A second man is always carried on electric locomotives, practically in the same capacity as was a fireman when these roads were formerly operated by steam. The proposition was made to dispense with the second man in the interests of economy, but the matter was taken up by the labor organizations and two men were conceded with scarcely an argument against it.

The duty of the second man is to assist the operator where required; to observe and call the signals, and anything of a similar nature which would naturally be suggested. Electric railroading, on the largest scale, is at present carried on by the New York Central and Hudson River Railroad, out of New York City, and by the New York, New Haven and Hartford Railroad, between New York and Stamford, Connecticut, about thirty-seven miles.

This latter road will shortly extend its electric zone from Stamford to New Haven, Connecticut, making a total electric division of seventy-five miles. It should not be lost sight of that the Baltimore and Ohio Railroad was practically the pioneer in this form of transportation on a generous scale, as back in 1893 they began hauling their trains, both freight and passenger, from Camden station, Baltimore, Maryland, through the Belt Line tunnel to the northern outskirts of the city. The fact that these original Baltimore and Ohio motors were just as efficient in their day as the ones now in use, forms almost a convincing argument that the development of the electric engine is not all which might be reasonably looked for.

If railroads were generally electrified, there would probably be no better time made than at present. The time on the New Haven from Stamford to New York was made with ease by steam, and from all we can learn it is made no easier now.

W. B. G., Pearce, Alaska.—We regret that we cannot give you definite advice regarding the possibilities for employment on the line mentioned in your letter. Unfortunately, the railroad guide does not give us any information or clue through which to institute inquiry. We do not think,

however, that the prospects for operators on the west coast are any brighter than in the East, and these latter are scarcely sufficient to awaken enthusiasm. You could no doubt obtain information more to the point through direct correspondence than by any assistance which we could give you.

PLEASE describe the "Mother Hubbard" type of locomotive. Are there any in use now?—T. J. San José, California.

This term applies to engines equipped with the Wooten or extended fire-box. They came into prominence about 1877, at which time this form of fire-box was patented. It was a radical departure from the existing type of eight-wheel, or American locomotive, inasmuch that the fire-box was extended completely across the gage of the track, and over the driving wheels, thus permitting a vastly increased grate area.

This extension resulted in the cab being placed ahead of it, or about in the center of the boiler, as if located in the usual place on the end of the boiler it would take up the clearances along the permanent way. All engines having the cab so located are broadly termed "Mother Hubbards," and there are hundreds, if not thousands, running in this country.

They are almost the standard engine on the Lehigh Valley Railroad, and the Erie, and the Delaware, Lackawanna and Western have a large number of them in service.

There is a prejudice against them, as the engineer and fireman are quite remote in performing their duties. This is so strong in some sections that this type cannot run in certain States, we think Ohio and Indiana, and they are gradually dropping out. They have always been regarded with favor by motive-power management, as with their tremendous grate area they are able to get along with very inferior fuel, in fact, the idea of Mr. Wooten, when he first took out his patent, was for an engine with a fire-box so designed that it would burn satisfactorily the culm from mines.

G. W. V., Douglas, Arizona.—It is said that while an engine is in tow of another that the injectors on the dead engine will fill the boiler by proceeding as follows: Place reverse lever in back motion and open main throttle, cylinder cocks, and injector steam ram.

The idea is that the pistons of the engine being towed will act as pumps, and the tendency thereby being to rid the boiler of air, a vacuum would be created within the boiler, or at least a vacuum sufficient to raise the

check-valves from their seats and allow the water to flow in through the tank hose, feed-pipe, injector, and branch pipe. Theoretically, this should be so, but we have personally never had a practical connection with the experiment. No doubt this will meet the eye of many of our older readers among the engineers, who can cite a case of fact.

HOW would you proceed if a valve yoke broke on the road, with a plain slide-valve engine with balanced valves?
J. H., Baltimore, Maryland.

A valve yoke usually breaks off at the neck of the valve-stem. It will be readily discovered at the exhaust by a tremendous blow. If the valve is pushed far enough ahead it will blow; if not it is often mistaken for a slipped eccentric, so would suggest that the eccentrics be examined first.

It may be discovered in this way: Place the crank-pin on top or bottom quarter and reverse engine. If the steam continues to come out of the back cylinder-cock, you may depend it is usually the yoke. A great diversity of opinion exists regarding the best remedy for this kind of break. The time-honored and safest way is to raise the chest cover and block the ports central, replace the cover, remove the valve-rod and main rod and block the cross-head at the back end.

But this remedy requires much time and labor, and as time is a very important consideration on the road, and there appears to be no mechanical objection to the other methods, provided that the cross-head is securely fastened, we will state them. Disconnect the valve-rod, and push the valve clear ahead, remove the stem, if it would blow out, and use a gasket back of the gland, or hold the valve-stem intact with a valve-stem clamp. Block the cross-head at the front end and proceed. The pressure will hold the valve forward, and if the valve should move it will do no harm, provided the cross-head be securely blocked. Another way is to remove the release-valve, push the valve clear back, fit a block into the release-valve long enough to hold the valve back, then block cross-head at back end. Still another way is to push the valve-stem forward and clamp it by cocking the gland, then block cross-head at the front end.

If the yoke is only broken at one side of the valve it will affect only one exhaust. When the yoke pushes the valve forward, the valves will sound all right, but when it pulls the valve back, the engine will be lame. With careful handling you may finish your trip. Work engine in full gear with a light throttle.

SPIKE MALONE AUTOS.

BY JOHN C. RUSSELL.

He and Another Shorthorn Get Aboard a Careless Buggy and Disfigure the Scenery.



"HERE," said I to Spike Malone, tossing him a highly colored plate of one of the 1910 models of a famous car, "that's my next extravagancy when my ship comes in."

"There you go again," he growled, "You-all has got the most ridiculous notions concerning money of any human I tracks' up with. Ain't that ship of yours about overdue? Where do you-all allow to get any such insignificant sum as three thousand dollars to ante up for this here careless cart?"

"Oh! I'll get her all right, some time!"

"Yes, and then I reckon you're calculating to do a heap of riding around this here Arizona scenery, with your gasoline buggy, ain't you?"

I assured him that such were my intentions. His next question riled me.

"Got any life insurance?" he drawled.

"What the thunder has that got to do with it, you old sorehead," I demanded in some heat. "You're nothing but a rank old calamity howler!"

He only grinned.

"Lemme tell you of a funny wrestle of little Spike's with one of these here bubble wagons and you'll sure sabe whyfor this life insurance is a good play to make when you-all invest in this auto of yours."

"Go on; bust yourself," I snapped at him, "but don't think that you're going to throw any scare into me."

Spike rolled himself another paper pipe, and after blowing a few smoke-rings at the ceiling broke into a reminiscent chuckle.

"Which this here episode is sure the banner frolic of my life," he laughed.

"Long about four years back, I was baling diamonds out of Winslow on the Santa Fe. Pretty nifty job, too, and for a wonder I stuck to it long enough so that I had whiskers down to my knees, so to speak, meaning thereby that, in point of seniority, I'm little and big casino with an ace up my sleeve.



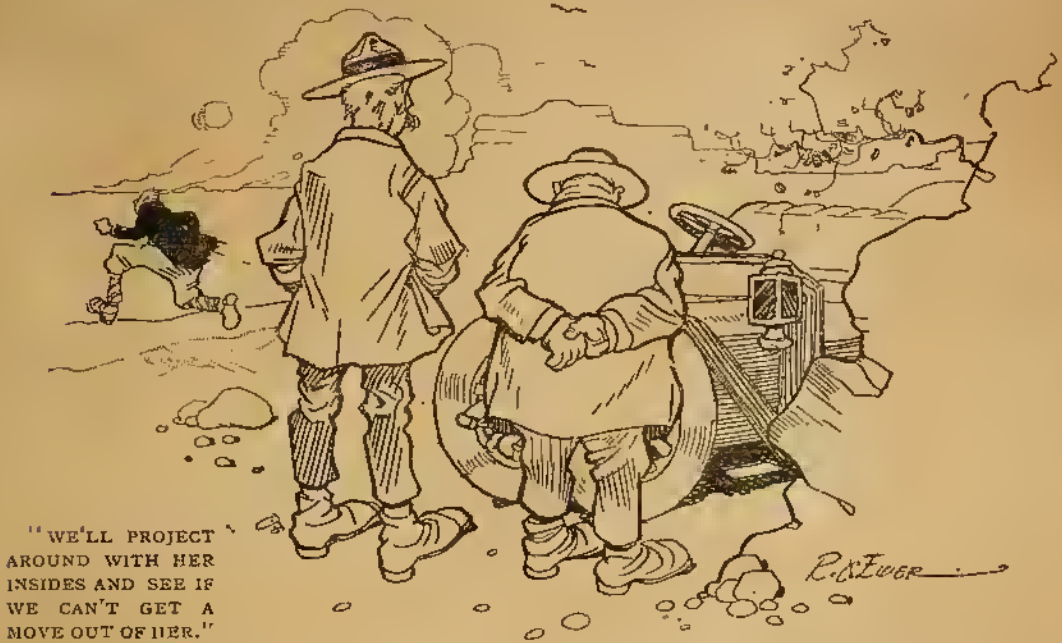
"WE WANT TO MAKE THIS PRAIRIE-DOG TOWN SET UP AND TAKE NOTICE."

"Meanwhile, with my natural bent for accumulating foolish and irresponsible friends, me and another shorthorn, Billy Day, contrives to git thick as the Little Colorado River in July." Which stream in that festive month is that solid that a man has to use an ax to extract a bucket of water.

"Day and me tracks along aunexing the dinero, and not having any suitable outlet whereby to dispose of it, we lays by

'longside of us, so we libates, frequent and deep.

"Theaters and such minor frivolities serves to while away the time, but I notices Billy gets quite a peeve on about something. So I nails him and asks what's the trouble. 'Bout that time Billy gets an illumination that was surc a peach. He lets all Alberquerque know, by pulling off a Navajo sun-dance in the middle of Center Street, before I



"WE'LL PROJECT
AROUND WITH HER
INSIDES AND SEE IF
WE CAN'T GET A
MOVE OUT OF HER."

quite a respectable pile. One day Billy and me gets our heads together and sizes up our roll. Man, she looms up like a barn in a fog! She sure looks huge!

"With one eye on that wad and the other far away on the festive gaieties of Alberquerque, I makes a motion that we lay off and proceed to that burg in search of these aforesaid festivities. Motion seconded and carried like a stampede of Dogie cattle for water.

"So four days later sees us, arm in arm, parading Center Street, Alberquerque, happy as two little birds. Billy gets infatuated with a sure 'nough 'lectric street-car, and after four round trips I has to drag him away by main force. He 'lows he's sure due to get metropolitan plenty pronto.

"A multitude of thirst emporiums along the right of way reminds us that for dryness the Mojave Desert is a fool

gets him bedded down in the hotel and inquires whyfor this exhibition.

"Spike,' says he when he gets calmed down, 'this here outfit of ours ain't putting on enough dog to suit me. We don't allow to have these here New Mexican sharps a saying that Old Arizona ever sent out anything that was slow. What we want to do is to make this prairie-dog town set up and take notice. Let's give 'em an episode from which they can date time.'

"Go to it. Old Socks,' I told him, 'I'm with you from soda to hock! Watcher going to do?' I asks him, being some curious.

"Hangfno yet,' says he, 'but the idea is ripening fast. Let's hire that big red auto down the street a piece and go for a ride to think it over.'

"We ambles down to this here auto stable and dickers with the old negro

that runs her for the big red wagon aforesaid. There was a man to run her that was included in the deal, and we piles in for a little spin, swelling up something awful.

"She's sure fine riding, so we makes this auto herder run us out to Old Town jnst to see what she can do. Out there we stopped at the road-house to remove the dust from our tonsils with a few high ones.

"Then we begin to get merry, and lays the bed-plates for more trouble than we can rightly handle.

"When we start back, Billy insists that this here auto runner instruct him as to the whys and the wherefores of running the trouble cart, and right there was where I begin to see a large patch of dark-blue trouble on the horizon.

"Autos being a strange game to me, I follows my usual custom of sitting tight, saying nothing, and keeping an eye skimmed for the other fellows while playing my hand close to my necktie.

"Billy, having reached that stage where he was the Great Jajandrum with the little round button on top, and this mechanic beginning to utter objections, Billy lights out of that front seat with a deep purple howl and starts for that runner-chap making war medicine.

"Here's where this runner sees a great white light, for he hops out of his seat and streaks it off into the dim distance like a scared coyote, Billy three jumps behind and several hollers ahead.

"Having satisfactorily abolished that spavined skate, we will now proceed to navigate this here do-funny on our own hook,' says Billy. 'Come over here, Spike, and cast your eagle eye over this lay-out of levers and such like.'

"I came.

"'Whatcher make of 'em,' he asks.

"I'm stumped and says, so.

"'Well, never say die,' says he, 'we'll project around with her insides and see if we can't get a move out of her,' and he pulls a lever here and there.

"No go.

"'Oh, thunderation,' says he, 'I forgot to wind her up. Git out and give that handle a twist or so. Spike,' says he, pointing to a crank hanging out of the pilot of the machine.

"I hops out and grabs the handle. Three turns I gave her, and then *chuff!* says the machine, and the handle sneaks up and lands me a wallop on the head like the crack of doom. I retires to the roadside in confusion and a beautiful display of fireworks.

"'Whoopee' yells Bill, 'she's going

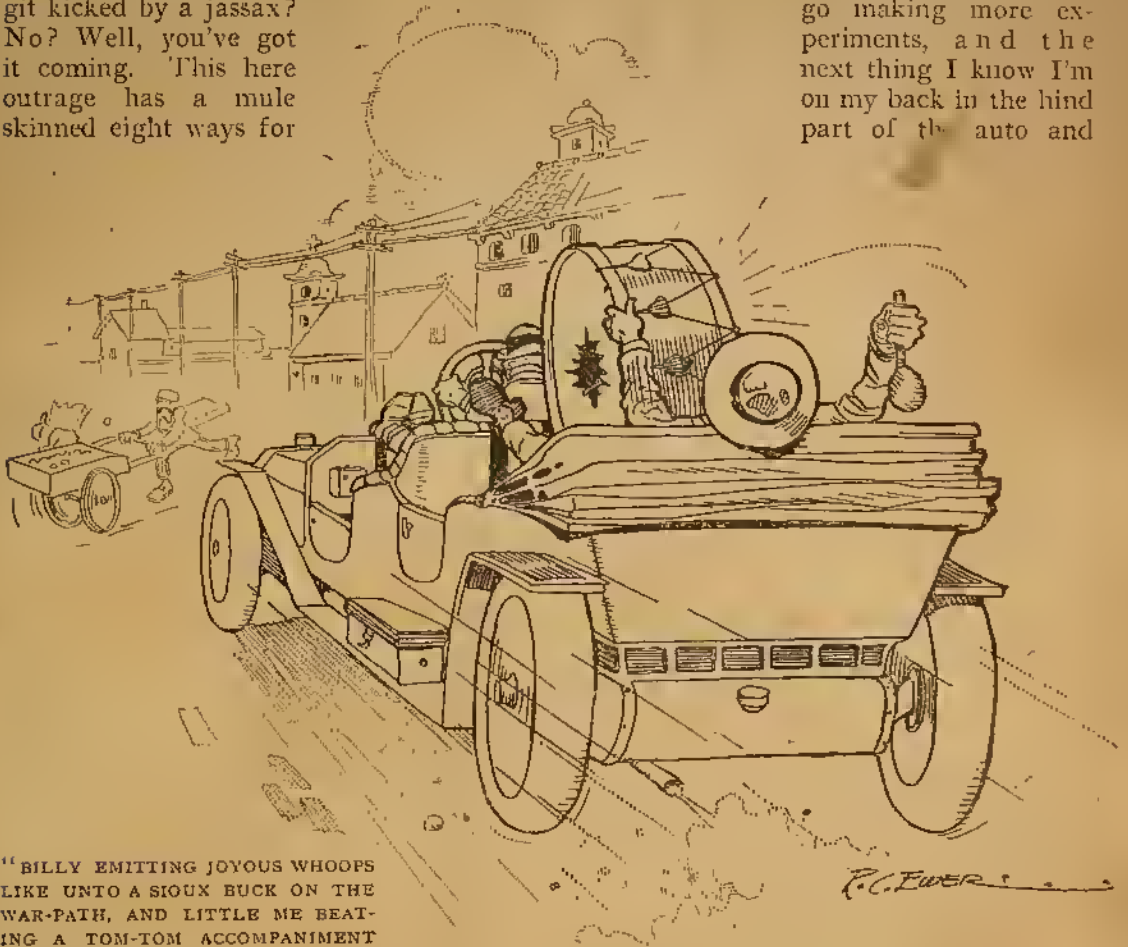


"BUT WE WENT ON INTO THE STORE."

all right! Come along here, Spike! Git in! Don't you mind a little thing like that.'

"'Little thing!' I snorts. 'Little thing! Did you ever git kicked by a jassax? No? Well, you've got it coming. 'This here outrage has a mule skinned eight ways for

" Billy grabs the little wheel that done the steering and pushed the lever back, and the noises ceased. I began to feel better. But he had to go making more experiments, and the next thing I know I'm on my back in the hind part of the auto and



"BILLY EMITTING JOYOUS WHOOPS LIKE UNTO A SIOUX BUCK ON THE WAR-PATH, AND LITTLE ME BEATING A TOM-TOM ACCOMPANIMENT ON THE BIG DRUM."

Sunday. Wait till the scenery quits going 'round and I'll join you.'

"I gets up and navigates, some unsteady on my pins, over to the machine, the object of remarks from a large collection of Mexicans that blew up when the fracas started.

"Just then Billy horses over a lever and comes tumbling into my arms, and the buzz-wagon takes a flying start backward that would have done Arthur Duffy proud. It fetched up against a handy wall, making curious sounds. Also the Mexican population vanished suddenly, and the sounds they left behind indicated surprise and a good deal of scare.

"We corraled the machine again. By that time my mad was up, and we boarded her with warlike intentions.

we are streaking it down the road, Billy hanging onto his steering-wheel, yelping most joyous.

"'Hold on, sport!' I warned him. 'We better take another track to town. That runner chap you herded so gracefully off the scene will be sitting up in this pike like a bereaved catamount howling for vengeance with a passel of cops to keep him company against our coming.' So we sheared off down a by-road for a short cut to town.

"Just as we turned the corner an old Mexicana came into the road driving an ancient wagon and a more ancient plug. The sight of our little procession revived all the youth in the horse. He stood up on his hind legs and made faces at us, and then whirled off down the road like

a comet with a tail of dust, market vegetables, and plaintive Mexican protests. We followed gaily on.

"Our path was narrow, but not straight by a heap. Far from it. The trail we left behind would have made a snake dizzy. I was getting kind o' seasick, but Billy seemed to be having the time of his life.

"All of a sudden the car stopped dead, and Billy took a header out on the road, while yours truly made what was called in the innocent days of my boyhood a belly-whopper dive over the pilot and onto the right of way.

"Now, what the mischief caused that ruction?" I queried of Billy, who stood regarding me real foolish.

"I just touched off the brake," says he.

"How did you know it was the brake?" I wanted to know.

"I didn't then," says he; "but I ain't got no doubts now!" And neither had I.

"In we got, and I says to Bill: 'Lead on, Horatio, but the next time you do any braking, you make a light application and leave that big hole strictly alone. When I get out hereafter, I may get out on my feet, not my face—sabe?' but all the answer I got was a growl, and we were off on our career of glory again.

"We rounded a corner, and ran plumb into a Salvation Army meeting. Meeting was dismissed right away. When we had cleared the mess, I found that the big bass drum had careened into the back of the auto, and, rescuing it, I began to play a tom-tom on it to add my bit to the excitement.

"By this time I was really beginning to enjoy it. We were making quite a hit.

"The next turn brought us into Center Avenue, the bright and busy Broadway of Albuquerque. We were going by and large, high, wide, and handsome, Billy emitting joyous whoops like unto a Sioux buck on the war-path, and little me beating a tom-tom accompaniment on the big bass drum.

"To help out the effect, the auto was doing its best to give fine portrayals of a big red Moki buck Indian pulling off the famous snake-dance of his tribe. She sure was glorious. Add to this a large and ever-growing string of interested spectators, who strove earnestly to over-

take us, and you have some glimmering of the sensation we produced.

"Business was suspended for the day when we passed. The sidewalks were miraculously deserted on our approach. Still, we did manage to pull off a few stunts, by way of variety. The auto swooped into a peanut-stand on one loop, and then went right across the street and took a market-basket out of a deaf woman's hand. We left her the hysterics, by way of recompense, however.

"As we neared the railroad tracks I begin to see our finish, and a large, scarlet finish it was. There was a crowd there. The police had a rope stretched across the road to stop us.

"Whoa, Billy!" I yelled at him. "Look at the reception committee they've got spread out there for us. Better stop."

"He turned his face to me and yelled, 'Stop, blazes! I can't stop! That brake won't work!'

"Oh, Lord!" I groaned from the depths of my heart.

"A bevy of the blue-coated minions of the law awaited us with outstretched arms, but not of welcome.

"Billy saw them, too, and tried to take the corner, but the auto had other designs, and plowed across the street and into a druggist's window.

"Here the beast gave an expiring groan and ceased activity in one gorgeous burst of orange-colored flame and a rank odor. But *we* went on into the store. I lit behind the soda-fountain, from which the clerk promptly skedaddled, while Billy went on and demolished the cigar-case before he toppled the cashier's stand over on that outraged young lady.

"I remembered thinking before the darkness descended that we was plumb lucky to light where we did, medical attendance being so handy and nice.

"Murmuring, 'Send for the wrecker,' I went peacefully to sleep.

"Afterward, in the convalescent ward, Billy remarks to me that we finished our ride with 'eclaw'—whatever the blazes that is. When I disagreed with him, and stood out that our finish was the drug-store, he was inclined to agree until the consequences burst in upon our inner senses, and then we decided that our finish was yet to come.

"It was."



Observations of a Country Station-Agent.

BY J. E. SMITH.

No. 21.—To the Boys Who Bend Over the Desks—A Bunch of Workers Who Tackle Many Weighty Problems, but Are Human, After All.

I WAS a passenger on one of our local passenger-trains recently—a train of one baggage-car and two coaches. We had fifty-five pay passengers on board. Every mile our gross earnings were one dollar and ten cents.

We are single track. On the first long siding there was a train of hoppers loaded with coke, and in the clear to let us by. On a ways, in another siding, also into a clear for us, was a train of meat. Everything was out of the way for us.

The two trains lying by while we passed represented the revenue possibilities of the road. They were the money-makers. Our train, with its service and equipment, amounted to but little, but everything else was held up to let us proceed on time.

It has always been that way. The freight business of the road is subservient to the passenger.

The passenger is the spectacular side. A passenger conductor is the majordomo of the road. Ten people consult a ticket-agent to one the freight-agent.

The public is insistent and explosive over the passenger service, but not one

man in five ever touches or knows anything of the freight service.

When you speak of a railroad, the public has only a mental vision of passenger-trains and passenger-stations.

It sees a freight pull through with coal and iron and the country's products, and the only sensation aroused is that the noise and smoke ought to be abated.

Village trustees will act, commercial bodies will petition, and all the force and persuasion of local authorities will be exercised to induce railroads to build passenger stations of dizzy architecture. Who ever heard of a people demanding a convenient, commodious, and showy freight-house?

I got off the train in an industrial town.

The passenger-station is located between two busy streets and is flanked by a lawn of flowers and shrubs. It is a fancy, ornate, minareted, and portecochèred structure.

The people of the town are proud of it as belonging to them, same as the Carnegie library or the new post-office. All in a public sense, understand, but in no way thankful or considerate of the rail-

road company that furnished the money to erect it.

I disguised myself as a government inspector.

"What are your average receipts from the sale of tickets?" I asked the agent.

"Take it for the month," replied the agent. "Make it about forty-five hundred dollars. But if you want to examine the records, you will have to show me your certificate."

I bade him good morning. One of those nice, genteel, fare-you-well and see-you-again, backstepping, and apologetic good-byes.

I went three squares down the track to the freight-house.

I assumed a sort of dignified and authoritative poise, and thrust my hand into my inside coat-pocket. I rummaged a moment, and then exclaimed, with a show of exasperation:

"By George! My cards and certificates are in another pocket. Maybe you will tell me, anyway—about what are the average monthly earnings of this office?"

"From twenty to twenty-five thousand dollars," said the chief clerk, thumbing over a bunch of correspondence and never raising an eye.

"That's about five times as much business as they do at the passenger-station, is it not?"

"Anyway, that much more."

"When your business is so much more than the passenger-station's, why don't they have flower-beds around, and have a few gables, and some dormer windows, and tile roofing, and gimcrack eaves—"

"How long have you been out?" asked the clerk.

"Ornaments — decorations—curlicues —harmony — esthetic equilibrium — the freight-house beautiful!"

"We ought to find some way to notify his folks," put in another clerk.

But just then a big, redfaced drayman elbowed me away from the counter, and I stepped outside and surveyed the rakish-looking structure that answered for a freight-house.

Low, flat, soiled, and begrimed, unsought and unknown by the people generally, it had the merit to the company of bringing in five dollars to every one taken in at the passenger-station, with all the latter's spectacular flubdubbery.

There are no frills about the freight business to catch the public eye. It creates no public interest. If a road puts on two additional passenger-trains, it is an event of keen interest to every one living along the line. It can put on a half-dozen new freight-trains, and no one knows or cares about it beyond the employees.

"What bureau or association do you represent?" asked the chief clerk with a sort of weary indifference, when I reappeared at the counter. "We have an inspector of some sort for every working hour of the day," he went on, without waiting for me to reply. "Let me see, we had the car-service inspector here at nine o'clock. We had the Inspector for the Bureau of Weights and Measures at ten. We had the Joint Rate Commission man at eleven.

"We have representatives of the State Railroad Commission, the Interstate Commission, the Live Stock Inspector, the Nursery Stock Inspector, and the Pure Food Law man.

"The State Fertilizer Inspector ought to be here some time to-day, and in between we have a few special agents of our own to look after cars, buildings, insurance, real estate, right-of-way, and other things. My dear sir, there isn't any angle of our business that isn't provided for, either by the government or the railroad. Maybe you are the Inspector of Ventilation. Don't think he has called on us yet."

I grasped at the straw, and bestowed on the clerk one of my sickly, ingratiating smiles.

"That's it! That's me!" I exclaimed triumphantly. "I'm the Hot Air Man! Sorry I haven't a card. But never mind that! I want to write up the freight-house and the force. I want to make a story for other railroads of the strange, sensational, and amusing events that occur in a local freight-office."

The clerk eyed me with a Peary-to-Cook gaze.

"My deluded friend," said he, "no one cares for us. No one sees us. All we do is to get the business and take in the money. Nothing ever happens within these dismal walls. Do not waste your efforts on us. Go out and see the yard-crew. Chase the section-gang down the

track. Interview the crossing switchman. Down on No. 6 there are some camp-cars of Macedonians and Syrians, the newest and rawest recruits to the railroad army. See 'em—"

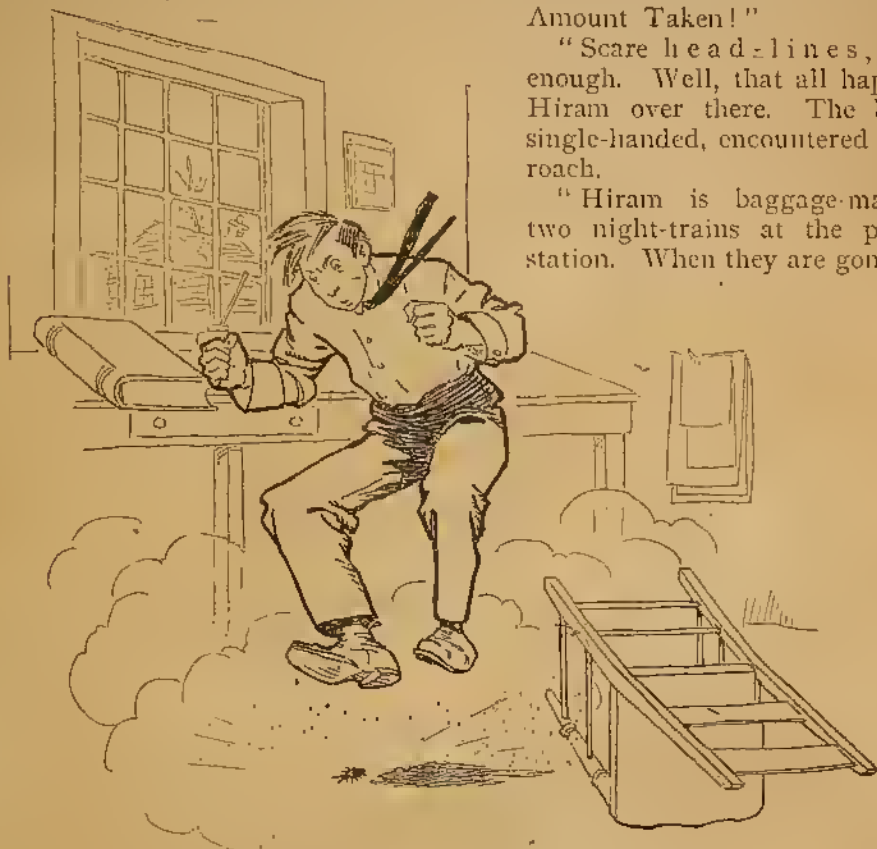
At that moment a clerk who was making out expense bills at a desk on the other side of the office suddenly jumped up and grasped a book and brought it down with two or three resounding

roach is geared up like Barney Oldfield's auto, and it takes quick and violent action to light on one of them.

"But Hiram had a real adventure a few nights ago. No doubt you read about it in the dailies. Yes, that was it, headed: 'Night Expressman Robbed! Held up by a Lone Bandit and Many Thousand Dollars Taken! Detectives at Work on the Case! Railroads and Express Officials Refuse to Make Known the Amount Taken!'"

"Scare headlines, all right enough. Well, that all happened to Hiram over there. The boy that, single-handed, encountered the cockroach.

"Hiram is baggage-master for two night-trains at the passenger-station. When they are gone, Hiram



"A COCKROACH IS GEARED UP LIKE BARNEY OLDFIELD'S AUTO, AND IT TAKES QUICK AND VIOLENT ACTION TO LIGHT ON ONE."

whacks on the desk, then jumped the floor a half-dozen times with all the fury of a maniac. He then calmly resumed his seat, picked up his indelible, and proceeded expensing.

"Poor fellow," said I sympathetically. "Unbalanced from trying to do three men's work. Awful thing to have frazzled nerves. Has he a family?"

"Be not alarmed," said the chief clerk assuringly. "Be not deceived. Hiram had just killed a cockroach. You can't run a local freight-office without cockroaches any more than you can run a boarding-house without prunes. A cock-

tucks the freight-house mail into a bag and treks for the freight-house. Half-way between the two places, the other night, he ran onto Captain Kidd or Dick Duval or Robert Younger, and it was a case of hands up!

"The robber took the bag. ~He never touched Hiram's silveroid watch, his imitation ruby, nor the forty-four cents he had left over from last month's pay. All he wanted was the bag and its contents. He got it, and he made away with it.

"He left certain orders with Hiram relative to posing, and Hiram stood there in the attitude of grasping with one hand

the handle of the Great Dipper, and with the other making a one-handed stop of Halley's comet.

"After a time, a night-watchman accidentally found him and told him he could relax.

"The lone bandit made a rich haul. He got the papers in ten claims. He got an even dozen of tracers. He got a brand-new *de luxe* edition of the Southern Classification. He got supplements and circulars enough to make him the wisest bandit that ever raised a gun. No wonder the railroad and express people refused to talk. A robbery like that stuns us all."

"I notice the clerk over at the cabinet muttering to himself," said I softly to the chief clerk. "When he crossed the room a moment ago he moved with a halting, jerky step. He isn't disconnected on one side, is he?"

"That is the rate-clerk. Judge him gently. I will explain. We have printed instructions from every source, covering every phase of transportation. We have all the classifications. We have exceptions, and qualifying rules. We get crisscrossing and amending supplements and circulars until it has the rate-clerk going like a prairie air-motor on a windy day. It is a wise rate-clerk that sits down to his desk these exacting days and knows exactly where he is."

"You noticed the rate-clerk get up and walk over to the water-cooler after two hours assorting, filing, and adjusting. You thought he appeared groggy. It may be he is developing locomotor ataxia following the devious windings to find what it all means and where it belongs."

"But that peculiar expression of the eyes?"

"That is the strabismus. He gets that by trying to follow Supplement R-49 to I.I.C. 10.001, amending that part of Article 16, Paragraph X, and canceling Circular 2313, and restoring the provisions of Joint Notice 101, and calling particular attention to Rule 29b—see reference No. XX, Notes *, †, and gg. For explanation of character-marks see page 3, etc., etc.

"Last month he forgot the pay-car. A few evenings ago he remained at his desk, working after the rest of us had gone.

"These are serious symptoms.

"They indicate an acute attack of inflammatory supplemento tariffitis—that new disease.

"We have recommended a change of air and scene. What we mean by that is for him to get up and go out into the freight-house, stand in the door, and look out over the vacant lot adjoining, shifting the vision leisurely to the ice-house and then to the row of coal-sheds that lie in the offing.

"Then he should engage the freight-house man in light, blithesome conversation as he loads his truck with green hides, at the same time harking to the mellifluous chant of the slaughter-house teamster who has just mashed a thumb, then back to the desk. For in the meantime another batch of tariffs and supplements has arrived."

Almost every freight-office is provided with a back door or window view.

Whenever there is a lull, a clerk stands and gazes out pensively. It may overlook a vacant lot, some dingy cars, a straggling tree or two, or merely the city garbage dump.

No matter.

Many times a day a clerk looks out on it and dreams. Then he saunters back to his desk, and another clerk looks out and dreams.

However gloomy the perspective or uninviting the view, in some way over the routine it casts roseate reflections. It creates a longing for the open and mental mirages of fields and lakes, autos and steam-yachts.

"See here, John," said the chief clerk, "you have looked out of the window ten times a day for three years, and now, after ten thousand inspections, it is safe to say you cannot write a description of that big tree that stands in the foreground that will enable any one to identify it."

John tried it with a bravado flourish, but failed. He could not say if it was elm, oak, or maple, the kind of leaf, nor the number or direction of its principal branches.

"What's the odds?" retorted John defiantly. "That's got nothing to do with booking freight-bills."

Strangely enough, none of the others could describe the most prominent objects.

That is the way we learned they were

not looking—only dreaming. The peep of the open contained nothing within itself, only the subtle suggestion of the boundless beyond.

It is a dead, dull life, indeed, to the man who works all the time within narrow walls, if there are not some dreams, some hope concealed in the far-off years to be unfolded.

Credit Shakespeare with this:

True hope is swift, and flies with swallow's wings;
Kings it makes gods, and meaner creatures kings.

"Pardon me," said I to the chief clerk. "The voluminous document you now hold in your hand, bearing the large letters 'Special,' and which you are about to enclose in an envelope marked with a register stamp, has aroused my curiosity. May I ask the purport of it?"

"You may," replied the chief clerk blandly, at the same time unfolding and

smoothing out the papers. "This is a freight claim."

"Indeed!" I exclaimed. "Does it involve some fundamental right of the road—some vital privilege—some—"

"You judge by the bulk. The truth is it is for three dollars and sixty cents," the chief clerk explained, "and no constitutional question raised. This is for damage on a shipment of drain tile, and some of them were broken. These papers seek to find the cause of the damage and fix the responsibility."

"That is an easy matter, is it not?" I asked, with childlike innocence.

The chief clerk bestowed a pitying glance.

"We have here," he went on, thumbing the papers one by one, "a car that was handled by three conductors and went through two yards. We have statements from every man who handled the car to this effect: 'No rough handling in my charge.' So you see there is but one



"GRASPING WITH ONE HAND THE HANDLE OF THE GREAT DIPPER, AND WITH THE OTHER MAKING A ONE-HANDED STOP OF HALLEY'S COMET."

inference, and that is that certain contractions and expansions, brought on by variations of the temperature, have broken the tile. That puts it up to Providence."

"Isn't it possible that some of those statements are incorrect?"

the mucilage thinner on the envelope-flap."

"What document have you there?" I asked of the bill-clerk.

"A tracer," he replied. "There's thousands of them in circulation, sir. They are put out as recklessly as clearing-house certificates during a panic. You see, when a shipment don't arrive the day before it's shipped, we have to put a tracer after it."

"People have great faith in tracers. When a patron kicks of delay, we tell him we'll put a tracer after it. He does not know just what a tracer is, but he has a misty sort of an idea that it lets out a few hoarse, bloodhound harks, gets its nose to the rail, picks up the scent, and runs down the loitering shipments with amazing speed and certainty. It's a sort of opiate we give our kicking patrons. Quiets them for the time. It's all a fake, sir."

"A tracer is a printed blank whercon one agent informs another that he has forwarded, on such a date and waybill, one crate of cabbage. Has it been delivered? What date, and to whom? In time, unless it accidentally falls into the waste-

basket or office-stove, the receiving-agent returns the tracer with the necessary information. Now, if the crate should arrive about the time the tracer is put out, it gets the credit for turning the trick."

"There seems to be a general impression that 'putting a tracer after it' is the same as placing the lever at high-speed notch. The real fact is, it hurries matters about as much as writing 'Rush' on a letter before dropping it in the post-office."

"There isn't much excitement about a freight-office," the chief clerk ventured, after a while. "The draymen line up to the counter every day for their bills, and some one from the factories comes over with the daily billing. There is no rustle of silk and nod of ostrich plumes, and happy vacation faces, like they have every hour over at the passenger-station. All our joys come by telephone."



"IT IS A LARGE PART OF OUR FOOD-SUPPLY, AND COMES TO US GRATIS."

"Why should we doubt? Why should we question the word of our fellow workers? Did you ever stop to think what a horrible thing it is to lose faith in man? I have looked over claims for ten years, and I have seen that statement ten thousand times: 'No rough handling in my charge.'"

"And now, sir, I know, by undisputed testimony, first hand, that no two cars ever came together with greater force than is employed in smacking the lips of a fair lady."

I watched him seal up the papers.

"May I ask why you lick the envelope twice?"

"Sh-sh—" he replied, with an admonishing wave of the hand and bending toward me. "It is an office secret. It is a large part of our food-supply, and comes to us gratis. Never breathe it. If it were known, the company would spread

"B-r-r-r-r-r-r-r-r-r!"

Rings every minute.

"Hallo! Hallo! Freight-office. Yes, freight-office! This is Simpkins talking! Simpkins, the chief clerk! Mr. Simpkins. A barrel of potatoes to Bowling Green, Kentucky — will cost you about eighty-five cents — eighty-five! E-i-g-h-t-y-f-i-v-e cents! They'll be transferred, two or three times. Yes, two or three times! About a week, I should say. No! I should expect them much sooner. Yes, I know a letter goes through in one day — this is local freight, you know. I can't say about express rates and time. You will have to call up the express company."

"B-r-r-r-r-r-r-r-r-r!"

"Unfinished business," continued the chief clerk, hanging up the receiver.

The telephone is a great invention and convenience in modern business transactions, but it has an irritating rudeness not possessed by any other mechanical contrivance. It doesn't matter what you are doing or when, it "butts in" with a persistence dangerously provoking.

There is nothing tentative about a "phone." Nothing of the "I beg your pardon for interrupting, but—" It has

neither politeness nor modesty. No matter what mood you are in, what occupies your thoughts or engages your hands, it calls harshly and unmindfully for immediate attention.

Time and again in every local freight-office there is a mad impulse to seize the apparatus and hurl it through the window. Occasionally the wind or lightning kindly puts it out of business for a little while. A peaceful quiet — a delightful calm settles down over the office, and work proceeds with despatch.

The boys who bend over the desks in the freight-house are not mere machines doing certain things with automatic and unvarying regularity.

They have hopes and ambitions. They take a peep out in the world, and they form opinions, not always well-defined and wise, but none the less robust.

They have some bickerings, some jealousies, some resentments—human qualities, all.

All great events receive the attention of this bunch of workers.

They wrangle in argument over "Who hit Billy Patterson?" "How old is Ann?" and "Which was the first one there, Peary or Cook?"



NORMAN LIND.

"TO HEAR 'EM TALK, YOU'D THINK THEY HAD ACTUALLY STAYED OUT SOME NIGHT AFTER NINE O'CLOCK!"

They develop rank partizanship in political campaigns. They are ready with zeal and enthusiasm for anything that comes before the public mind.

Their blood teems with sporting bacilli.

They follow the various baseball leagues and associations, and every game is analyzed and discussed.

They have their favorite clubs and their favorite leagues, and they feel and express elation or disappointment as they win or lose.

They banter and bet.

They "josh" one another without much regard.

They kindle with excitement and enthusiasm as the race narrows.

They take sides in the post-season games between the leaders of the big leagues, and for a week, while the battle is being waged on the diamond, every detail of the contest is gone over and over within the office walls, and there is wild-eyed victory and galling defeat a hundred miles away from the sniff of the real powder.

All this fills "Big Sam" with disgust.

"Big Sam" is the warehouse man. I went out on the loading platform and sat down on a barrel.

He stopped before me and leaned heavily on his truck and took a chew of tobacco. No mincey, dudish tidbit, but a quantity like unto the raise to the barn-loft on the hay-fork.

"What do them fellers know about sport, anyway?" said Sam, jabbing his thumb toward the freight-office with a gesture of disgust.

"They talk about baseball, and croquet, and tiddledywinks, and 'Whose got the button?' but they ain't any of 'em been within a thousand miles of real sport.

"They make me tired. I've seen real Spanish *toreros* down at Laredo. Why, in one afternoon, I seen three bulls and two horses killed, and one *matador* laid out.

"Then I was down at Vicksburg, Mississippi, when old John L., the greatest

that ever was, you bet, put the fixin's to Jake Kilrain! Seventy-five rounds! Talk about sport! They ain't anything like that in these days.

"Why, them young fellers ain't never seen anything more exciting than opening a bottle of pop. But, to hear 'em talk, you'd think they had actually stayed out some night until after nine o'clock!"

Sam sneered with contempt, and continued: "I see by the papers this morning that the scrap between Joe Halligan and Jim Hackey came out just as I said it would, only I didn't expect Hackey to last nine rounds. I said he'd be down and out by the seventh round. Hackey ain't in the same class with Halligan.

"Halligan just let him prance around until he thought the audience had got its money's worth, then he handed him one of them upper-cut slumber coaxers, and that was the same to Hackey as takin' half a pound of morphin."

Sam seized the truck, and marched off as triumphantly as if he were Halligan's trainer.

And of such stuff are dreams made.

For in reality I know Sam has never seen a bull-fight, and I do not think he ever saw a prize-fight. But he is saturated with the "dope," and when he is not sweating from honest labor it exudes from his pores.

"Hasn't the chief clerk a fad of some kind?" I asked of the rate-clerk.

"I'll tell you on the quiet he has," responded the rate-clerk, glad to suspend operations and discuss anything. "He's studying a modern cult called 'The New Thought.' You see, the mind is always serene and all powerful. I got that from him. He is seeking to have constant mental control that will never be disturbed. And around a freight-office, too. Wouldn't that jar you? He is getting instructions every few days from a blond-headed young woman."

"Oh, ho! From a young lady with golden hair! Don't let him fool you, boy. That is no 'New Thought.' That is the 'Oldest Thought' known to man!"

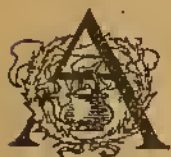
A Whistle Is a Mighty Useful Thing, But You Don't Have to Be Blowing it All the Time.—Reflections of The Unhurt Cow.

Perpetual Motion — the Greatest of Delusions.

BY E. L. BACON.

IN spite of endless failures, the blind seekers of a force without a law have gone on and on, encouraged by the seeming successes of certain plausible or ingenious impostors. Some of these men have hoodwinked a credulous world; all without achieving the slightest good with their sensational inventions. By the combined work of these apparently successful fakers not an industrial wheel was ever turned, not a moment saved, not a labor lightened. They are the chief provers of their own delusions and their own trickery.

No. 2.—Orffyreus, Prince of Perpetual Motion Sharps, Deceived Princes, Dukes, and Even Scientific Men, Until His Nerve Gave Way on the Eve of Exposure.



A MYSTERY that will never be solved was the perpetual-motion machine of Jean Ernest Elie-Bessler Orffyreus. For a century after his death, in 1745.

there were hundreds of students of the search for self-motive power who were convinced that he had really solved the great problem.

Probably there are believers in him even to this day. Many and many a mechanic has been drawn into the centuries-old search for the impossible solely through his belief in Orffyreus's success.

He was the prince of impostors of his time. He fooled half the rulers of Europe with his mysterious wheel, and it raised him from a poor, wandering showman, sometimes hooted and scoffed at by village crowds, to fame and high position.

There was no promise of what was going to happen connected with his machine. His was a wheel that really revolved. It not only revolved, but raised heavy weights. What was the source of its power

is as much of a riddle to-day as it was in his own time. Men who really believe in the possibility of perpetual motion are likely to maintain that there was no fraud about it, and that it was the greatest invention of all time.

Try to convince a perpetual motion inventor of the fallacy of his idea, and he will point to this man Orffyreus and tell you the great secret was found two hundred years ago, and lost. Whatever the secret of that famous wheel was, it was destroyed by the inventor himself; for with his own hands he smashed the machine to fragments and never made another.

The Master Mystifier.

During the year 1712, Orffyreus appeared in several villages in Saxony, where he exhibited to street crowds a swiftly revolving wheel which he declared would never stop unless interfered with. Sometimes the crowds looked upon him as a great genius, sometimes they stoned him.

Before long, news of the wheel had spread about through Europe, and Maurice William, Duke of Saxony, showed a lively interest in it. In 1715, Orffyreus exhibited his invention before a commission selected by the duke, on which were the ducal secretary and other high state officials, and Frederick Hoffman, a distinguished physician. The commission was convinced that perpetual motion had at last been discovered.

Royal Indorsement.

A few days later, on November 26, the duke himself came to see the wheel. He ordered the doors and windows of the room in which it was running to be closed and sealed, and a guard was left outside.

On the 4th of the following January the duke came again. The seals on doors and windows were removed, and the room was thrown open. The wheel was running as fast as ever!

This surprising discovery carried absolute conviction to the mind of the duke. He pledged himself under his name and seal that the construction of the machine was not such that it required winding up.

The inventor's fame spread rapidly after this test. The Emperor of Austria, hearing of his achievement, offered to give Herr Schluter, a celebrated engineer, thirty thousand rubles if he would construct a perpetual-motion machine.

Herr Schluter tried and failed, and died of a broken heart. His son took up the attempt, but the thirty thousand rubles remained unwon.

Andreas Gartner, Court Model-Master of the King of Poland, denounced Orffyreus as a fraud, but declared that he himself could make a perpetual-motion machine. The king gave him an order to construct such a machine, and he set to work upon it. He made a machine in which a ball was seen to run up and down on a wheel, and thereby raise weights.

A Shift of Patrons.

The king, his ministers, architects, and mechanics, brought Gartner into great notice, and a special patent was granted to him for the protection of his invention.

In the meantime, Prince Lord Charles, Landgrave of Hesse, had become the pa-

tron of Orffyreus. The inventor had been attacked from many quarters in Saxony, and for some unexplained reason the duke's suspicions had been aroused against him.

The landgrave installed Orffyreus in his Castle of Weissenstein, near Cassel. There the wheel was set up and exhibited, and it so pleased the landgrave that, eventually, he made its inventor High Hessian Councillor of Commerce.

Orffyreus explained his source of power in these words:

"The inward structure of the wheel is of a nature according to the laws of mechanical perpetual motion, so arranged that by disposed weights once in rotation they gain force from their own swinging, and must continue their movement as long as their structure does not lose its position and arrangement. They are so arranged one against another that they can never obtain equilibrium or the *punctum quietus* which they unceasingly seek in their wondrous speedy flight. One or other of them must apply its weight vertically to the axis, which in its turn will also move."

A Scientist's Approval.

Surely there must have been something wonderfully ingenious about this wheel, for when Baron Fischer, architect to the emperor, came to Cassel to inspect it, he could find no trace of any deception. He saw a wheel twelve feet in diameter revolving twenty-six times a minute. A cord was then tied to the axle to turn an Archimedean screw to raise water, and the wheel then revolved twenty times a minute.

"I then stopped the wheel with much difficulty," wrote the baron, "holding on the circumference with both hands. An attempt to stop it suddenly would raise a man from the ground.

"Having stopped it in this manner, it remained stationary. (And here, sir, is the greatest proof of a perpetual motion.) I commenced the movements very gently to see if it would of itself regain its former rapidity, which I doubted, believing, as they had said in London, that it only preserved for a long time the impetus of the impulse first communicated.

"But to my great astonishment, I ob-

served that the rapidity of the wheel augmented little by little until it had made two turns, and then it regained its former speed. I examined well the axles of this wheel to see if there was any hidden artifice, but I was unable to see anything more than the two small axles on which the wheel was suspended by the center.

"His highness, who is a perfect mathematician, assured me that the machine is so simple that a carpenter's boy could understand and make it after having seen the exterior."

Unproven Doubts.

A woman servant declared to some investigators who had been invited to the castle by the landgrave to inspect the machine, that she had been hired by Orffyreus to turn the wheel from an adjoining room, but Baron Fischer said this would have been impossible. So said other distinguished men who had examined it.

They declared they had found not the slightest trace of any communication with the adjoining room. The servant, however, after announcing that Orffyreus had threatened to strangle her if she disclosed the secret, disappeared, and the inventor himself, apparently roused to fury by the suspicions directed against him, smashed the machine into small pieces. Although he lived for many years afterward, he never furnished the world with any more clues to the mystery's solution.

Europe was full of perpetual-motion impostors for a century after Orffyreus's death. There was a dramatic exposure of one of them at Frankfurt in 1817. J. Geiser had been exhibiting in that city a pendulum clock which he declared possessed self-motive power.

Another Fake.

A trifling accident happened to the clock while it was on exhibition, and the inventor set about to repair the damage. He fell dead while he was tinkering with the works. While he was lying there, some mechanics investigated the interior of his machine and discovered a concealed winding apparatus.

In 1812, Charles Readhefer, of Philadelphia, came near getting a grant of funds from the legislature of Pennsyl-

vania to back his perpetual-motion project. Such firm faith did the legislators have in his revolving wheel that they appointed a committee to investigate it.

Readhefer had set his wheel up in a small building in Philadelphia, on the banks of the Schuylkill River. When the legislative committee arrived there, they found the doors and windows locked.

One of the members of the committee was Nathan Sellers. He had brought with him his son, Coleman, a boy. Coleman Sellers climbed up to one of the barred windows and looked in. It was this boy's sharp eyes and sharp wits that saved the State of Pennsylvania from making itself ridiculous.

"I can see the machine," cried the boy, "and it's a fraud."

He called his father to the window and pointed out what he had seen that resulted later in Readhefer's exposure. The machine had a set of teeth in the periphery of the rotating table which geared into another wheel whose axle was supposed to transmit the power to some other point where work was to be done.

A Child Leads Them.

The boy had noticed that the faces of the teeth on the two wheels were polished by wear on the wrong sides. The boy explained that if the machine were driven as Readhefer declared it was, it would be the other sides of the teeth that would show the wear, and that the power must come from some concealed mechanism in the base.

This argument failed to convince the committee, but it led to an investigation that resulted, some time afterward, in the discovery of concealed clockwork. Readhefer, who had induced many persons to invest large sums of money in his scheme, left the State in a hurry.

"I shall soon revolutionize the industrial world," declared John Paine when, in 1875, he exhibited his electro-magnetic engine in Newark, New Jersey. He invited several well-known scientists to come and see his machine work. They came and watched the contrivance driving lathes and sawing wood, and went away bewildered.

Paine organized a company and sold stock. The shares were quickly gobbled

up, and he was growing rich when, one day, a committee of stockholders waited upon him to inspect the inner workings of the machine with the assistance of an expert.

Under pretext of getting a drink, the inventor went out. He never came back. It was discovered, during his absence, that a belt ran from the axle of the machine to steam power in the room below.

Scores of such swindlers there have been in this country since that time. Most of them have been exposed, and some are in prison.

Keely the Plausible.

None of them, however, ranked with that marvel of impostors, John Ernest Worrell Keely. He it was who kept some of the world's greatest scientists guessing, and millions of money sprang to the assistance of his motor project during its quarter of a century existence.

An overpowering personality was his. He possessed a phraseology as incomprehensible as it was beguiling. He talked of "molecular vibration," "oscillation of the atom," "sympathetic equilibrium," and "quadruple negative harmonics" until the average mind found its receptive powers unequal to the occasion. Nobody knew just what he was driving at, but almost everybody who came under the spell of his bewildering conversation believed in him.

With a series of tuning-forks he declared that he could disintegrate air and release an etheric force rivaling a cyclone in strength. A pint of water would work wonders. Before the eyes of the spectators in his laboratory, great ropes were torn apart, iron bars broken or twisted, and bullets discharged through twelve-inch planks.

The De-Polar Force.

With one quart of water he would be able to send a train from Philadelphia to San Francisco; with a gallon he would propel a steamship from New York to Liverpool and back.

Keely declared he had discovered that there existed polar and de-polar waves of force. "If we take the compass," said his lawyer, in explaining the wonderful mo-

tor, "and put it near the machine, the needle will cease to be controlled by the force that otherwise makes it point toward the north, and will turn toward the machine."

"Suppose you have two tuning-forks pitched in precisely the same tone, and both giving absolutely the same sound vibration. Put one on a table in one room, put the other on a table in another room.

"Strike one, and immediately the other will take the tone and vibrate in harmony with it. The cosmic force that carries that vibration from one fork to the other and makes them vibrate in harmony is the force that Keely has discovered. That force has now been harnessed."

Set up in his laboratory in Philadelphia, the motor was a very impressive piece of machinery. It was composed of the motor proper and the transmitter. The machine rested on a heavy brass base. Also, there was a heavy brass sphere.

Musical Motive-Power.

Between the engine and the transmitter ran a series of wires, and along the base of the transmitter an array of steel rods bristled like so many fixed bayonets. These steel rods were responsive to the touch, and compared to an ordinary musical scale, which is subject to the tuning-fork.

The interior of the globe almost defied description, but out of the complex mass brass tubes and adhesive plates stood prominently. This was the shifting resonator, as Keely termed it. The tubes and plates took up the vibratory sound and carried it along with rapidity. Of these vibrations there were seven distinct kinds, said Keely, each of the seven capable of infinitesimal division.

The motor itself consisted of a heavy iron hoop placed firmly on the plate. Within this hoop ran a drum with eight spokes. When it was once in operation, the movements of the drum were very rapid. The harmonics were supposed to start the machinery by "etheric force."

Exposed, but Still Puzzling.

To the day of his death, when he had kept up the deception for a quarter of a century, his stockholders held their faith in him. It was not until several weeks

afterward, when, late on a winter's night in 1899, the walls and flooring of his laboratory were ripped up and secret tubes discovered, that they realized the colossal fraud.

Even to this day nobody is quite sure whether it was compressed air or some other force that Keely brought through those tubes.

In even greater numbers than the frauds are the tragedies that mark the long road to this unattainable goal. In 1890 a distinguished-looking old man, John Kreyezich, a cabinetmaker by trade, went to live in a poor little room at No. 50 Fourteenth Street, Hoboken.

He paid one dollar and fifty cents a week for his room, and not only slept and prepared his own meals in it, but used it as a work-shop. His food was of the poorest sort, and his clothes were threadbare. All day and until late into the night he could be heard sawing and hammering at his carpenter's bench.

Tragedies of Futility.

"Some day," he told his landlady, "I shall make millions. I shall make heat, light, and cold. I shall drive steamships and railroad trains. I shall revolutionize industry. My machine on which I am working will run without fuel, and will never stop."

He never allowed anybody in his room. He was afraid, he explained, that his great invention would be stolen.

Seven long years he hammered and sawed, and then, one day, two strangers, said to be rich promoters from Boston, called on him. After that, every week for one year they sent him ten dollars, and he bought a new suit of clothes and ate a little more regularly. Then the remittances stopped.

"They got tired," he told his landlady. "They wanted their millions too quickly. Ah, they'll have nothing now!"

Three more years went by. One evening it occurred to the landlady that she had not seen the old man for several days. She went to his door and knocked. There was no reply. She tried to open it. It was locked.

Then she called in a policeman, and the door was broken open. Lying against a great wheel surmounting a mass of ma-

chinery was the old man, dead, his stiffened fingers gripping a tangle of wires.

The big wheel hung on a steel axle, with which the wires had seemed to have some important connection. Fastened to the wheel's circumference, at regular distances apart, were a number of buckets, and at the base of the wheel was a tub of water.

Nobody knew where the old inventor had come from, and they buried him in Potter's Field.

A Railroad Man's Ruin.

Charles Heiner was a machinist employed in the roundhouse of the New York Central Railroad at Mott Haven, and lived with his wife in a flat at No. 693 East One Hundred and Forty-Fifth Street, New York. For twenty-five years he had spent most of his spare time working on a machine that he expected would give perpetual motion. Every night after dinner he would go to his room and tinker with his array of wheels and cogs and chains.

"I shall be rich and famous some day," he told his wife.

She had unbounded faith in him, and encouraged him when sometimes his spirits flagged. One day in 1893 he lost his position. He gave his bank deposit of a few hundred dollars to his wife and went to work with desperate energy on his machine. He must solve the great problem before his savings were spent.

The months went by, and the bank account was almost exhausted. But still the wheels would not go.

After dinner one day he said to his wife: "I'm tired out, and sha'n't do any work to-night." He carefully covered up his wheels and chains and went to bed.

In the morning she found him hanging dead from a rope tied to the apex of his machine. When some machinists who had known him investigated the contrivance on which he had toiled for so many years, they found that evidently the whole complex arrangement was based on the idea of the overbalancing wheel.

The Despair of Weariness.

In Cleveland, in 1908, B. F. Eibler was found one morning dead in his work-

shop with poison beside him. For two years he had been working night and day over a mysterious machine. He had never explained to anybody what it was going to be; but just before taking the poison, he wrote a letter in which he told of a fruitless struggle to invent an attachment for electric automobiles in which the electricity used in running the motor-car would be replaced with power generated by the car itself.

In 1901, a handsome young Syrian was among the students who were taking the course in mechanical engineering at Columbia University. He was Basile Saheb, who had come to this country three years before, and had been living at No. 131 West One Hundred and Eleventh Street. There he had fitted up a little laboratory, where he worked every evening until midnight on a perpetual-motion machine.

One morning a shot rang out from the laboratory, and there was the sound of a heavy fall on the floor. Some of the startled lodgers in the house rushed to the student's door and found him lying dead against the bed. Strewn across the floor was a mass of pulleys, valves, levers, cog-wheels and chains. He had smashed his machine to pieces.

An Old Man's Awakening.

In the summer of the same year, William Herford, an old carpenter in Williamsburg, committed suicide in his workshop at No. 265 Ellery Street. For thirty years he had tried to find perpetual motion. Two weeks before his death he told his wife that he realized at last that his long search had been hopeless, and that he had wasted his life on a delusion.

All his money he had spent on his machine, and left scarce enough to bury him. It was a most complex contrivance that he left behind him, so complex, in fact, that nobody could understand on what lines he had been working.

As pathetic as any of these tragedies was the story of Adolf Schaap, an old Hungarian. He came to America from his native country when a young man, and became a thrifty ironworker. He married and had children, and his home was a happy and prosperous one.

And then, somehow, the delusion of

perpetual motion got into his brain and drove him on to ruin. He gave up his job as an ironworker, and spent all his time constructing a machine to carry out his ambition.

Before long the family treasury ran empty, and there was no food in the house. Yet he could not be persuaded to leave his machine.

Worst Form of the Mania.

"Never mind!" he cried. "We can starve for a while. We'll soon have money enough; we'll have millions."

Before another week had passed his wife had left him, taking the children with her. The landlord put him out of his home, for the rent was long overdue. Schaap picked up his few belongings and his machine and went to live in a room at No. 346 East Fifty-Fourth Street.

There he stayed and worked on his machine for years. Sometimes he found an odd job, and made enough money to tide him along, but most of the time he was hammering away in his room.

Very carefully he guarded his secret, for nobody was ever allowed within his door. The fear that some one might steal his invention always worried him.

One day in 1903, the landlady of the place, who had noticed that the old man had been growing very thin and white, and had gone out very seldom for weeks, went to his room to offer him some food. Receiving no answer to her knock, she pushed the door open and caught a glimpse of him in his big armchair, gazing abstractedly at a machine that was racing about his room.

Weak Guardian of Nothing.

The next moment he caught sight of her, and, jumping to his feet and pointing to the door, he shouted angrily, "Go!"

But the kind-hearted landlady felt sure that her lodger had not eaten for days, and she appealed in his behalf to the Charity Organization Society. It was found that the old man was sick and unable to walk, and he was taken to Bellevue Hospital. He did not live very long afterward, and he died a pauper; but to his last hour he held faith in his machine.

(The end.)



THE BAREEN BLOCKADE.

BY J. R. STAFFORD.

**A Real Man Goes Through the Fire
Before He Is Admitted to Be Pure Gold.**

FOR fifteen days the sidings at Bareen had been filling with all manner of cars. The yards had become a sink into which all manner of freight drifted and stayed. It was a real blockade.

Henderson, the yardmaster, whose duty it was to keep the traffic moving, had looked on the forming blockade with the same feeling that another man might have watched flames eating upon his fortunes. He knew that when a blockade becomes absolute, a railroad quits the business of transportation and goes to chopping off heads and cleaning house. His head was on the block.

To make matters worse, Henderson had no more to do with that blockade than you or I. Patterson, division superintendent at Bareen, son-in-law to Old MacReady, the general manager of the G. and T.; Patterson, whose only knowledge of his position consisted in the fact that he had authority and was the author of the tangle.

Now, everybody in the employ of the G. and T. knew that MacReady, who was hard as flint, would have dared the hand of God for the sake of Patterson. And Patterson had a habit of snatching up the

laurels from the brows of those below and replacing them with the dunce-caps that he himself had earned. That was the situation.

If Henderson had been a hereditary yardmaster, as Patterson had been a hereditary superintendent, it wouldn't have made any difference. That would simply have been a case of dog eat dog, and the best one win, with perhaps the rare good luck of both of them being eaten.

But Henderson had begun railroading as a section-hand, and, having worked like a horse for six years, he had won the promotion of foreman. Six more years, and they made him a track inspector. At that rate, he would have been a thousand years old before he got anywhere.

Of course, that shouldn't have made any difference. Henderson was only Henderson. Even if he had forgotten more about railroading in any five minutes of his railroad career than the average superintendent ever knew or ever would know; though he had a good brain, a good, brave heart, and the will to lay down his life in the day's work, it should have satisfied him to maul rail-spikes through all the years of his prime, and then wind up his days as a bridge-tender or a crossing flag-man.

A man ought to be contented and keep out of trouble. But Henderson had not been contented. Having mastered the details of every job of which he could learn anything, he had spent years wondering why the deuce ignorammuses of twenty years' inexperience got to be heads of departments.

At last the day arrived, as it always will, when his knowledge came to his hand like forgotten money in a cast-off suit of clothes. He rectified an error of Patterson's that would have cost the G. and T. the loss of two fast trains and damagesuits for no telling how many human lives. Wherefore, on the day he was forty, he had become yardmaster at Bareen.

What that promotion meant to Henderson is not given all men to realize. His father was a cripple, and his mother old and worn out, and he loved a woman who returned his love and waited for him.

Of course, that was all nonsense. He could have sent the old people off to the poorhouse, and he and the woman could have lived handsomely on a track inspector's pay. Or he could have been an optimist and married, and the whole family could have got along swimmingly on his forty dollars a month, unless something happened to him, when all of them could have gone to the county farm.

As yardmaster, he was to draw better than a hundred a month. Was to draw, because as yet he had not drawn pay on the new job.

The blockade began the day after he had assumed his new duties. Now it was all swept away. He would be a dead dog the minute Old MacReady arrived.

He would be dead everywhere, too, for the newspapers had made a sensation of the blockade, and had featured it with photographs and interviews with Patterson. When the whole business was ended on the G. and T., his career as a rail-roader would be finished.

Whenever Henderson thought of the injustice of it, he wanted to take a claw-bar and beat the superintendent to death.

On the evening of the fifteenth day, Old MacReady got down from a high-speed engine in front of the switch shanty and began giving impossible orders.

"Take out those fruit-cars on siding twenty-four, and send them back east local."

Siding twenty-four was a switch of twenty-three, and twenty-three was full clear up to twenty-two.

"You mean," Henderson corrected, "to take out the junk in twenty other sidin's first, so's to git to twenty-four? What the deuce is to be done with them thousand-odd cars that's first got to be moved?"

MacReady knew that well enough, anyhow. Henderson should have bowed to the position and kept his mouth shut to the man. Positions are to be respected.

He got proof positive of it next morning. When he went up to the despatcher's office for orders, he received his discharge instead. And while this was being handed out to him he heard MacReady dictating an interview for the papers which would show that the blockade was the fault of the yardmaster alone.

Henderson walked down the alley between two lines of cars reeling like a drunken man. There are poisons that intoxicate more terribly than whisky, and of these he had drunk because he had been forced to drink.

Coming to a certain point, he crawled under many lines of cars, and came out on the edge of the yards opposite a little cottage that lay just beyond the right of way. It was his home that was not paid for. Now it would soon be some one else's.

He looked beyond the cottage, up the long slope on which Bareen the city stood. Bareen would be his no more, either. He went in, and his father asked him: "What will ye do now?"

Yes, what would he do? Henderson knew that when a man of forty loses his trade, he goes either to the scrap-heap of common labor or the dumps of crime.

Of-course, that should not necessarily be true. A man should look on the bright side of misfortune. But he knew that he was deserving, and that he had been compelled to bear the stigma of another man's incompetence.

He knew that the good men who go down under the ignorance of fools in authority are numberless. The point of it pricked him to madness. He got his pistol and went back to the despatcher's office. Patterson, white-faced and sneaking, met him at the door.

"I've come to square things with ye," Henderson declared.

MacReady jumped from his seat at the despatcher's elbow and ran in between. "Square things!" he shouted. "You've tied the line, and now you threaten. I'll have you locked up."

"I never tied the line. The man that says I did is a liar!" And Henderson shook his fist in the general manager's face.

Now MacReady, for all he had the stubbornness of a mule, knew the difference between a bluff and a challenge. So he made a show of interest by asking, "Then who did do it?"

"You!" the answer came like a shot. "You done it! You put this dub in here when you knowed what he was. You knowed he wouldn't do. He made me shunt through freight to the back sidin's the first day, and he kep' it up."

"You knowed he was a fool who wanted all the authority coming to him, even to sayin' how the switchmen should trim and set the lamps. But that's neither here nor there."

"It's nothin' to me that he tied up the line. I couldn't help it. That was your fault, and more yourn than his. But lemme tell ye, it is his fault that he's laid the blame on me. He's a low-lived cur, and you that hack him is no better."

As he choked out the last words, Henderson jerked his pistol and fired pointblank at Patterson's head. The shot went wild, but the fist of fighting Old MacReady went home on the point of Henderson's jaw.

"I'll have you in the penitentiary for this!" the general manager bellowed. "Johnson, call the police!"

Now Johnson, the despatcher, knew a great many things. This was his answer: "Mr. MacReady, if you arrest him, there'll have to be a trial. If there's a trial, the facts will have to come out. The facts will hurt. Patterson has ruined this fel-

low, and nothing else can be made of it. I'd have to swear to that."

Being mundane, the affairs of men consists in actions and corresponding reactions. Half the business of life with many people consists in keeping one set of facts



OLD MACREADY BEGAN GIVING IMPOSSIBLE ORDERS.

in the spot-light and the other set clear off the stage.

MacReady let go his hold on Henderson's arm and collar, disarmed him, and told him to make himself scarce. In exactly the same spirit the would-be slayer slunk down the stairs and down the gloomy alley of the cars toward home. He went into the house and, stumbling into his own room, flung himself down on his bed like a maimed dog come home to his kennel to die.

For a quarter of an hour he gazed dully at the wall, and thought of nothing but the cracking in the back of his head and the clutch of the unseen hands upon his throat. Presently the quavering voice of his father, repeatedly calling, aroused him. There was intensity in the old man's voice.

He listened for the words, and caught, "The yards are all afire!" With a kind of grim hope he jumped up and ran out. The yards were hidden under black clouds of rolling smoke.

A gust swept the murk toward him, and his eyes smarted from the fumes. He smiled, for it was pleasing to think that MacReady would have to answer for a thousand cars all turned to scrap and smoke. Then the gust steadied to a blast, and the paint on the porch pillar at his side blistered and crinkled in the driven heat.

He dashed into the house, and catching up his father, carried him to the street that led up the slope toward town. His mother followed him. They had not gone half a block when they looked back and saw the roof smoke and then burst into flame.

A fire-engine dashed past, going whence they had come. It was followed by dense crowds. But Henderson had not made two blocks when the same rabble came running back, and he heard them crying, "Bareen will be burned to the ground."

The thought of it caught and held his attention. Bareen, the town he had loved all his life, like him, was to be made a sacrifice to the folly of the fools who ran

the G. and T. As he hesitated, a city fireman came running by. Henderson grabbed him by the arm and demanded, "What are ye runnin' for?"

"It's a death-trap," the man under the helmet answered. "an' I hain't a goin' to stay to git burned up. The railroad com-

p'ny's in a row with their switch-in' help, and they can't git a wheel turned to move them cars. The town's a burnin' on this side. It's sure death to stay between." And he deservered himself free and dashed away.

Henderson looked back where the smoke-clouds, lifting for a moment, disclosed that only the cars of the first siding were on fire. He beckoned a passing townsman and said to him:

"Mister, I'm a goin' back to bust that blockade. Will ye see that my ole daddy an' my mother are kept out of the way of the crowds an' the

fire? If I don't make it back, they'll be some life-insurance comin' to 'em on me. I ask ye as one man to another'n, to see they git it." Before the other could answer, he was gone.

Back he sped through the surging crowds, and on past those devoted firemen who would run not. He saw that their playing streams burst into steam-clouds before they touched the walls, and he knew that the heat before him was yet more terrific.

He drew a deep breath and plunged on. He stumbled blindly through his own gate to the right of way, and he thought



MACREADY WOULD HAVE TO ANSWER FOR A THOUSAND CARS ALL TURNED TO SCRAP.

of it as the gate to Hades. He bounded down a burning alleyway that would save a quarter of a mile on the eternal way to the roundhouse, and came out at last with his clothing on fire.

Down the lee side of the inferno he raced like an Olympic runner in the first lap. But at the end of his course, where he should have received the cheers of switchmen, he got nothing but the mockery of locked doors and silence. The roundhouse was deserted.

Another man might have laid down. What could one man alone do? He could handle one engine and one string of cars, and while he was doing that six other strings of cars would be catching fire.

But Henderson had fought for six years to become a section-foreman, and a man who will do that lies down to no task the issue of which is to be had in half an hour. He caught up a coupling-pin and beat the padlock from the door of the first stall.

Inside, on the ribs of the fan-shaped floor, stood six engines, with fires all banked and steam in the boilers running low. He opened drafts, started injectors, shoveled coal, and then, taking a coal hammer, went outside and smashed more locks. By the time the last door swung open, the roundhouse was a pandemonium of screeching safety-valves.

One by one, he ran the moguls out onto the main track. Coupling them together, he shot down to the switch which opened off to siding one. The cars on that line had by this time been burning for so long a time that their beams and sills had sagged clear down to the rails. That string could never be moved, and he knew better than to waste time trying it.

He bumped onto the next switch, and looked down the windrow of fire. There was no use trying that one either. He was now well into the breath of the conflagration; yet he knew he must penetrate more deeply, and that the work, after he got there, would be work for more than man.

But he steamed on down to siding three, and, groping in the smudge, saw that the sills of the cars on that string were as yet intact, though all the woodwork above was in a blaze. He cut off his head engine, ran down the main line, and then backed up against the end of the burning car.

The skin of his hands and the hair of his head were gone when he finished that coupling. He got that string under way, and then opened his throttle to the last notch and jumped to the ground. That siding full of box cars went out of there like a snake on fire.

Henderson grinned as it went by, and lumped on down to siding four. That string was easier, for as yet the cars near the end had not begun to burn. As before, he coupled up, made a big head of steam, and, when he had the mogul under way, opened the throttle to the last notch, and, jumping off, watched that section of the conflagration speed off in the wake of the first.

After that, his breath came easier, for siding four was the last to open directly to the main line. Siding five opened from four, six from five, and so on all the way to twenty.

However, what had been done before was boy's play to what must now be done. It was necessary to run far back into the zone of the first of the fire, where the ember-spewing debris of sidings one and two threw out tremendous heat.

Now, when he backed his third engine down to couple in on the string on five, he knew there was no use trying it. But he hooked up and, of course, stuck. He got down, and saw that half the sills were already sagging to the ties.

Then a draw-head pulled loose, and he came lucking out with two cars. Two cars would not let him back to six. He slowed up and went back. No coupling could be made at all.

Now it was that Henderson yielded to the last frenzy of his purpose. He cut loose, went back to the main line, and hitched onto the other three engines. Having run them out onto the main line beyond the switch to siding four, he went back and set the other switches so that the main line ran direct to five.

Then he got aboard, and ran down the track for a quarter of a mile or more. There he stopped, and built such fires under those boilers as would make steam faster than any safety-valve could let it off.

This done, he crawled up into the cab of the head engine, reversed it, opened the throttle to the last notch, and then, as the giant went plunging back, he jumped

back and got to the next mogul behind. There he did the same thing. Then he made his way to the next one, and the next; and by the time he had reached the last one, the four moguls in tandem were sweeping back at forty miles an hour, and every boiler straining at its rivet-heads.

Henderson sat in the head of his battering-ram, and pulled his throttle-lever to the bracket to give her a little more steam. He was going to sweep that siding of its gutted cars.

Of course, only fools court death in such a fashion. But once in a while a fool jumps up, and the world for ten generations afterward wonders at him. The head tender crumpled the cab in which Henderson sat, but siding five started and went out, half of it dragging on the rails.

As for Henderson, some timber or something struck and flipped him back onto the coal. Old MacReady and Johnson, sitting at the despatcher's window, looked out and saw him lying there as the roaring skid of wreck toiled by them.

The two fell over each other going down the stairs, and raced like a pair of hounds till they caught the pilot of the last of the toiling moguls. Then they got aboard and shut down.

By the time they had the last engine under control, Henderson had regained consciousness. By that time, too, all the switchmen who had refused to go out under the boss appointed that morning had gathered around.

MacReady yelled at them: "Take these engines and clean out those yards. It's easy now."

But even if it was easy, not a man stirred until Henderson gave the order.

Nowadays, if you go anywhere on the G. and T., anybody can tell you all about Henderson and the Bareen blockade. They cannot tell you much about Patterson, however, for small men, like small coins, are soon spent and forgotten. If you will go to Bareen, you will either find Henderson in the superintendent's office, which he now fills, or else at his home.

N. Y. CENTRAL'S NEW PENSION SCHEME.

PRESIDENT W. C. BROWN, of the New York Central and Hudson River Railroad, lately announced that three of the railroads in the Central system would begin paying pensions to their retiring employees from the first day of this year.

The pension plan will affect about 100,000 of the employees of the Central and affiliated lines. It will involve the payment of about \$500,000 a year. Employees of the New York Central and Hudson River Railroad Company, the Lake Shore and Michigan Southern Railroad Company, and the Michigan Central Railroad Company, will be eligible under certain conditions for the pensions under the present plan.

Employees of the Pittsburgh and Lake Erie and the other lines of the Central system will not be eligible.

Under the plan, as adopted, employees on reaching the age of seventy years are retired. If they have been continuously in the service of the company for at least ten years immediately preceding their retirement they will be entitled to a pension.

An employee who has been at least twenty years in continuous service and has become unfit for duty may be retired with a pension, although he has not reached the age of seventy years.

The amount of the pension, as explained, is one per cent for each continuous year of service of the employee's average annual wage during the ten years before his retirement.

A conductor who has been earning \$1,500 during the ten years before his retirement, and who has been in the company's employ for twenty consecutive years, would thus receive twenty per cent of his annual \$1,500 salary, or \$300 a year, for the rest of his life. If the same conductor had been thirty years in the service he would get \$450 a year; if he had been forty years in the company's service he would get \$600.

A brakeman who had been earning \$900 a year for ten years, and who had been twenty years in the service, would get \$180 a year for the rest of his life.

A trainman who had reached the age of seventy years, and who had been ten consecutive years in the service, would get ten per cent of the average annual wage which he had been receiving during that time.

The pension system will reach from the lowest to the highest employee throughout the Central system. On January 1, 1,735 men were scheduled to receive old-age pensions according to the plan.

THE DAM-BUILDERS.


BY BANNISTER MERWIN,

Author of "The Girl and the Bill," "The Sword of Tarroloys," "The Corner,"

Friends Are Made, Enemies Discov-
ered, and a Woman Has Her Way.

CHAPTER XIV.

The Other Half.

N the happy silence his lips met hers. His arms held her close. "Oh, I am so glad!" she whispered. "So glad!" And Jack could only kiss her lips again. But even in her happiness she could not long forget her errand. Hastily she told him what had happened—the decision to blow up the sluices, her fruitless effort to keep the men back.

"And then I went to the stable and got Precia and rode down to tell you," she ended.

Jack, by the light of the unbroken lantern, glanced at the leathery flanks of the mare. He observed, for the first time, that there was no saddle. He made no comment. She had done no more than he, knowing her, would have expected, but he shuddered as he thought of the risks she must have run, and he thanked God silently that she had come through safely.

A light was bobbing down the bridle-path. Larry and Mary were coming. They stopped, amazed, a few feet away, looking from the steaming horse to the picture of a strange girl, with golden hair, whose head lay on Jack's shoulder.

"Larry—Mary," said Jack, "this is Thekla Wist, who is to be my wife."

Thekla raised her head. She was neither timid nor embarrassed—just frankly happy. Jack briefly told the story that she had come to tell.

"You mustn't blame them too much," said Thekla earnestly. "They don't understand."

"I don't blame them at all," replied Larry. "I blame the persons who have lied to them."

His face looked very gray. He and Jack could understand now the full subtlety of Briggs's treachery. No such clumsy device as a strike was solely to be relied upon to make the work fail. The purpose of the strike was merely to get the workmen out of the way, in order that a foul blow might be aimed at the dam itself.

They both felt as though they should have guessed as much. In the case of a strike, with three days of leeway left to them, Briggs would know that they might pick enough men to finish the job on time. Of course, he would have some surer trick in his pocket, and it would be impossible to prove any connection between Thomas Briggs, the Denver capitalist, and the mad suspicion of a group of Norwegian farmers.

The end seemed to have come. What could they do to keep the men of the valley from the dam? To try to hold them back with revolvers would be futile and absurd. Two men could not guard all the sluices that dark night, and the Norwegians were not the kind to be easily frightened.

To reason with them? What good would that do? They had already shown that they were not amenable to reason. Yet, to meet them as they came, and to attempt to parley with them, was, after all, the only plan that could be followed.

and, with no hope of success, that is what they decided to do.

Presently they heard the distant rumble of the wagons. Louder and louder it became, and Larry and Jack smiled at each other, and at Thekla and Mary, in a last grim effort at reassurance. Jack took out his broken shilling.

"If there is such a thing as luck," he said, "we're going to need it now."

"Hold on to it tight," said Mary.

"What is it, Jack?" asked Thekla.

"Just a lucky piece. Do you want to go to the shack, out of view, before the wagons come?"

"I want to stay here, near you, Jack."

He kissed her, without shame.

So the wagons came rattling around the nearest curve, and at sight of the barrier and the two men and two women who stood before it the driver reined in his teams.

"Let me start things," said Jack to Larry; "but be ready to get into the game if I make any breaks."

Jack, therefore, stepped forward and called: "Mr. Wist!"

The Norwegians were already getting to the ground, and at the sound of Jack's voice, Peter Wist shouldered his way to the front. His glance fell angrily on Jack. Then he saw Thekla advancing to Jack's side, and he started.

"Thekla!" he muttered.

"Yes, father!" she answered bravely.

"Wait, dear!" Jack whispered. Then he addressed himself again to the lowering man before him.

"Mr. Wist," he began quietly, "we know why you have come. There are not enough men in the camp to oppose you. But before you do what you have planned to do, I want to tell you something. I want you to hear the real reason why you have been made to believe that our company meant to injure you. That's a fair request, isn't it?"

Peter Wist did not answer at once. Outraged by what he considered his daughter's treachery, bewildered by the fact of her presence, he hardly heard Jack's words. How had Thekla, whom he had left at the house, managed to get to the dam ahead of the wagons?

Then Freia whinnied, somewhere in the darkness near by, and Peter Wist understood. He realized that the girl had

ridden the mare through the night, slipping by the wagons somewhere along the road, and had come at the risk of her own life to warn her lover against her father.

He realized that his victory over Jack Marly that afternoon in the field—was it only a day ago?—had been a sorry victory after all. He even realized that from now on Thekla was committed by her own act to consider her lover first, her father second. The pain of these revelations was sharp in him.

The men were beginning to murmur.

"Will you listen to me?" Jack repeated.

"To the dam!" shouted Ole Knudsen hoarsely. His dull eyes had flamed with rage at the sight of Thekla.

Others among the Norwegians took up the cry: "To the dam! To the dam!"

Peter Wist had felt no change in his resolution. He had himself been at the point of ignoring Jack and Larry, ignoring his daughter, and pushing on to the sluices; but unruliness among his followers was something that he would not brook. As they surged around him, threatening to hurry on without authority, he turned to them and ordered them back.

"Be silent!" he cried. "There is time enough. We will hear what this man has to say."

"Don't listen to him!" yelled Ole Knudsen, rushing forward. "Thekla has bewitched him! Come on, men!"

Peter Wist did not hesitate. One step, and his huge fist caught the oncoming rebel squarely on the mouth and sent him staggering back.

"There!" shouted Wist, stamping with rage. "Will you disobey me? Be silent, all of you!" He glared at his men. Two of them were holding Ole Knudsen. Then he turned again to Jack.

"Say what you have to say, but say it quickly," he ordered.

"Mr. Smith and I"—Jack indicated Larry by a nod—"own, between us, a half interest in this property. The other half is owned by Aaron Garth. Do you know Aaron Garth, Mr. Wist?"

"Yes, I know him."

"Do you know that he is a hard man?"

"Yes, I know that."

"To get the money to build the dam," Jack went on, "we had to mortgage this property to a friend of Aaron Garth's. We knew that we should not be able to pay the mortgage when it fell due, and he said that he would renew it, if—" he paused, to make his facts impressive—"if we would have all our work done by the date when the mortgage comes due. That date is one week from to-day."

"This has nothing to do with us," exclaimed Wist.

"Wait! We have found that the man who holds our mortgage is a bad man. He wanted us to think that he would renew the mortgage. He talked fair, but really he wants us to fail, so that he can foreclose the mortgage, and thus get possession of our property for a great deal less than it is worth."

"He has secretly interfered with our work. We have reason to think that he bribed our contractor to slow down just when we needed to hurry. We have reason to think that he hired a labor leader to come here and persuade the workmen to strike. To-night we are without laborers, and unless the dam is finished by next Saturday, Mr. Smith and I are ruined."

"Now, there is one other thing: we have reason to think that the rumor that we planned to flood your valley was started by our enemy, just to make you angry, so that you would do what you intended to do to-night. If you destroy the sluices, you will be doing his work."

"Is that all?" asked Wist. He seemed to be unmoved.

"Not quite! Mr. Wist, your daughter Thekla is going to be my wife. Do you think that I, bound to you by such a tie; loving her who loves you—do you think that I would stand for the flooding of your farm?"

Wist shrugged his shoulder.

"If you help to ruin us, our enemy will have possession of the dam. You will find him a worse man to deal with than we are."

Wist made an impatient movement. "You have said enough!" he exclaimed. "What we know, we know. You are the robbers and destroyers, not we. Come, men!"

They surged up about their leader, these vikings of the modern age. They

were hot and eager. The flames of their rage burned brightly. Jack, disheartened, stood back. He had done all that he could do. Even Larry, who had kept himself in the background, realized that no more could wisely be said.

But Thekla, with exalted courage, moved forward to bar the way. Jack drew her back. "Don't," he whispered. "It's no use. Let them go."

"Oh, they must not—they must not!" she sobbed. "For their own sake, too, they must not!"

Jack smiled sadly. "Luck is against us, dear," he said. "I had thought that there might be something in luck for us. See what I have held in my hand all the time." He showed the broken shilling in his left palm. "It did no good. Now, I will throw it away."

His motion was arrested. Thekla had clutched his wrist. With staring eyes, she bent over the broken coin. "Father!" she cried. "Father! Quick!"

Peter Wist involuntarily halted and looked. His daughter had snatched something from Jack Marly's hand. She was holding it up between her thumb and finger. Her eyes were wild with excitement.

"The other half of the shilling!" she cried. "The other half of the shilling!"

With a hoarse cry, Wist seized the coin and dropped to his knees beside a lantern. Presently he began plucking at his throat. He got hold of a string, and drew from its place of concealment under his shirt a small leather bag, polished smooth by years of contact with his skin.

Tremblingly he opened it and took out a bit of tarnished silver. Jack, bending down, saw that it was a fragment of a coin.

The two pieces lay together in the Norwegian's palm. He pushed them together. The broken edges fitted, to form one perfect circle.

Wist, closing his hand on the shilling, got slowly to his feet. His face was working strangely, and he fixed his burning eyes on Jack's.

"Where did it come from?" he demanded. "How did it get to your hands?"

"I found it."

"But where did you find it? Who lost it?"

Jack dreaded to speak. If the coin were an old token of friendship between Peter Wist and Thomas Briggs, the situation might be the worse for its discovery. Wist might realize, from what he had already heard, that to injure the dam would be to help the man to whom the other half of the coin had belonged.

Hesitating, Jack looked at Thekla. It would be a simple thing to say that he did not know who had lost the coin. Wist would not know that he really knew; Thekla would not know. But he could not look into her blue eyes and tell the lie, harmless though it seemed.

"Where did you get it?" Wist whispered. The man was tense with emotions which he was struggling to control.

"I saw a man drop it, and I picked it up and kept it."

"Who was the man? Who was he?"

"The man was the holder of the mortgage on this property—my enemy."

"His name! His name!"

"Thomas Briggs."

Peter Wist exclaimed aloud, and raised his shaking hand.

"Your enemy!" he cried. "Your enemy, and *mine*!"

CHAPTER XV.

The Turn of the Tide.

HIS hand grasped Jack's arm. "Your enemy—and *mine*," he repeated. "My son, I believe you now! I believe you now! Back, men! We will not touch the dam! This man has spoken truth to us. He has proved it!"

His excited authority, his unusual vehemence, drove the Norwegians to wonder. They clustered around him curiously—among them Ole Knudsen, who evidently had accepted the leader's discipline, though from the row of his yellow teeth one was missing, where Wist's knuckle had struck. They muttered excitedly in Norse, for many of them had known the history of the token that hung about Peter Wist's neck.

Several minutes of confusion passed before Thekla was able to get her father's attention. At last, however, she pointed out to him that Jack did not know the meaning of this sudden change of heart. Then, tensely, Peter Wist told the story

in his clean, straight English, without faltering once.

"When I was your age," he said to Jack, "I came to the Western mountains to hunt for a fortune. I met another lad—a sharp-faced, wiry lad—named Thomas Briggs. We became friends and partners.

"Each of us had saved a few hundred dollars, and, putting the money all together, we went to a new mining-camp and opened a restaurant. We made much money—more than the majority of the seekers after gold. At the end of a year we had six thousand dollars hidden safely away.

"Thomas Briggs was an English boy. He had a shilling which he carried for luck. When we became partners, he broke the shilling into two pieces and gave me one, and we swore to keep them as tokens that we would be faithful to each other. I made this leather bag, and put my half of the shilling in it. Ever since have I worn it.

"Then the camp began to play out. The gold-hunters were drifting away. So we made less money, and at last we decided to stop our restaurant and go to another place.

"Then, when I woke up one morning, Thomas Briggs was gone. I went to the place where we had hid our money. The money was gone, too."

He stopped, and for some time busied himself with his own grim thoughts.

"I have trusted no man since," he added at last. "I have always worn my token to remind me that I must trust no man. Many years later, I found Thomas Briggs in Denver. He was rich.

"When I went to his house and asked him for the money he had stolen, he laughed. He said I could not prove that he had stolen it. So I struck him. He had his servants throw me out of the door.

"After that I wanted to kill him; but that would not do, and I tried to forget everything except that no man could be trusted. I went back to Minnesota, and many years later I came here. That is all."

A plain, bold story, but no less tragic for the brevity of its telling. A wronged man had nursed his bitterness for more than thirty years, while the man who had wronged him continued to prosper. Not

uncommon, perhaps; but in the slow revolutions of the wheel of Fate justice eventually is done.

CHAPTER XVI.

On the Dam.

THEKLA had drawn her father aside. They were talking in low tones—she, all eagerness, while he apparently listened at first with doubt and reluctance, and gradually began to nod his agreement with what she was saying.

She called to Jack; and when he had stepped over to where she and her father stood, she said: "The men of the valley will finish the dam for you, Jack."

"Can they do it?" Jack was amazed at this turn of the situation.

"We know how to mix cement and build walls," said Peter Wist. "If you will tell us where to lay the stones, we will place them as you wish."

Larry was summoned. His face lighted up when the news was given to him, but he shook his head disappointedly as he made a rapid count of the men available. "Thirty-five only," he muttered. "It would take fifty men five days."

"I can get more men," said Wist. "These can remain here—all except one. Him I must send back to the valley to look after matters there. You can give us the tents where your men have slept, and to-morrow morning we can begin work. I myself will go to my people at Larkin City, and they will help."

Thus it was ordered. Ole Knudsen was sent back to the valley. The other men took up the quarters which the strikers had left vacant. They were at first inclined to grumble, but the promise of high pay made them quiet.

Late into the night Larry talked with Peter Wist. He showed him the maps and charts. Without great difficulty, now that suspicion had been killed, he made it plain that the farms of the Norwegians were not to be endangered.

Meantime, Thekla and Jack wandered together up and down the lower road. The heavy clouds had been blown away by a wind, and the stars gave them light enough to see the gladness in each other's eyes as they said sweet words over and over again.

It was late when he took her up to the shack and gave her over to Mary. Nevertheless, he returned alone to the lower road, and for an hour retraced the steps he had taken with her.

In the morning the work began. The sturdy Northmen, adapting themselves to the more or less unfamiliar labor, went at it with a vim that raised the hopes of Larry. Jack had insisted on taking his place among them. Larry oversaw the work, with the help of Jones and Armsby and Ives, who had returned.

In the afternoon Peter Wist came back from Larkin City with the wagons loaded down with forty more Norwegians—all eager for the double pay. O'Neill had tried to stop them, but they would not listen to him.

So the work fared on through the early days of the week. The engines puffed, the great derricks swung their burdens into the air, and hammer and trowel elinked merrily.

On Monday Bill Murdock appeared, threatening trouble because Larry was using his camp outfit and his tools. Larry drove him off with a threat of a thrashing.

On Tuesday morning came Aaron Garth, with uneasy protests against the way things were going. The hint of a suit for conspiracy sent him hurrying back to town.

The same afternoon came O'Neill. At Peter Wist's command, half a dozen Norwegians left their work long enough to throw him into the stream, whence he emerged much sobered, to make his wet way down the cañon.

Meantime, course after course was laid on the dam, until when work stopped Wednesday night Larry announced that half a day would see all done.

Thekla and Mary had found plenty to do. On Monday Thekla had ridden up to the valley to get her medicine-case and her surgical instruments. Where many men are at work, accidents will happen, and she found considerable use for her rolls of bandages.

Mary supervised the camp kitchen, in which Wing Fah showed himself general and army in one. Indeed, there were no idlers in the camp.

Thursday morning the men streamed up to their work with evidences of the

excitement they felt. The spirit of the battle against time had penetrated them, and they were a unit in their interest and enthusiasm.

Overnight Larry had had the sluices closed, and the water was beginning to collect behind the dam; but even the widening lake between them and the valley did not arouse the dead suspicions of the Northmen. They were keyed to their fight to get the work done.

Stone by stone the last course was laid. The derricks creaked and groaned. The men grunted and panted. Stone by stone! And ever the lake behind the dam grew longer.

The sky was clear, the sun was hot, the sweat rolled down the faces of the toiling men, but they ran to and fro with exhausting eagerness. Three hours longer—two hours—one hour—

At half past eleven the last stone was ready to be dropped into its position. Larry—a relieved smile on his face—raised his hand.

"Jack!" he called.

All wet and grimy, Jack came forward.

"This is your job," said Larry. "You must lay the last stone."

Jack shook his head. "That's for you, old man. I'm only a private."

"But I insist."

"Then let Mary do it."

"If you say Mary and Thekla, I will agree," replied Larry.

Mary and Thekla, therefore, spread the mortar. As the stone sank into place, they stepped upon it, and the men broke into a loud cheer.

The dam was finished.

Jack and Larry threw their arms around each other. They had won. Thekla and Mary came to them, tears of joy in their eyes.

Half a mile down the cañon a dusty buggy was coming at a rapid speed. A large, uneasy man, a bunch of a beard on his chin, was urging the horse on with constant flicks of the whip. Aaron Garth never spared a horse—or a man, if he had the chance to drive him.

The man beside him sat with compressed lips. His hatchet-face was gray, as though he had slept poorly of late.

"What is that noise?" he asked.

"They are cheering."

"Oh!"

"It looks as though they'd done us, Briggs."

Briggs did not answer.

"I never knew luck to fail so. Giddap, there! We got those farmers all excited. They came down to blow things up; they remained to finish the work."

"And those that came to scoff remained to pray," muttered Briggs.

"What's that?"

"Nothing."

"What are you going to do, Briggs?"

"How do I know?" Briggs sighed faintly. "I'm not used to being beaten. Perhaps they have overlooked something."

"Guess we can't depend on that, Briggs. Giddap, there! We might have something smashed before Saturday."

"It wouldn't do us any good if the work is already completed."

"I hope you don't think we haven't been doing what we could at our end of the line."

"I think you were up against some better men, Garth. Oh, there might be ways of beating them yet. I could trick them on their bond issue, perhaps, but I don't believe it's worth while."

"What's that?"

"Never mind! The last time I was here I lost something that I had carried with me for years."

"Valuable? Giddap there!"

"Not intrinsically! But—" He became silent.

Garth jerked the foaming horse to a stand at the gate of the corral, but Madden had gone up to the dam, and Garth had to hitch the animal himself. Then the two men went slowly on, afoot. They could see the workmen standing in groups on the broad top of the great gray wall.

"Who are the two women, do you suppose?" asked Briggs.

"Larry Smith's wife, for one, the other I can't guess. Some friend of hers, I suppose. Smith and Marly are with 'em."

As the newcomers got to the top of the dam, Jack caught sight of them. He seized Larry's elbow and wheeled him around. "Great Heavens!" he exclaimed. "Look!"

Larry started. "Wist mustn't see him," he whispered, as he and Jack moved forward.

"How do you do, Mr. Smith—and Mr. Marly?" Briggs was cold and precise as ever. "I see that you have finished the dam."

"Yes," replied Larry coldly.

"I—I congratulate you," said Briggs. "You have done a big thing. I shall be glad to have you go in with me on my Utah enterprise."

Larry did not reply. The significance of his silence, however, was not lost.

A faint, ironic smile appeared on the capitalist's face, and he said:

"May I ask how you managed to convert the lions into lambs? How you induced the men who came to destroy your work to remain and finish it?"

"When you were here before, Mr. Briggs," said Jack, "you lost something."

"Yes?" said Briggs, wondering.

"A piece of a shilling, Mr. Briggs."

"Yes. Did you find it?"

"A lucky piece of a lucky shilling!"

"Yes. I have missed it."

"Well, Mr. Briggs, see if this explains anything to you: The leader of the lions who came to destroy our work is the man who for thirty-five years has carried the other half of that shilling."

"Peter!" gasped Briggs.

"Yes, Peter Wist," said Jack sternly. "And if you value your life, you will not let him see you."

"Where is he?" asked Briggs.

"He is back there with his daughter."

Swiftly Briggs darted away, straight toward his enemy. Larry and Jack followed on the run. They expected nothing short of murder. Briggs hurried to the place where Wist was standing.

"Peter!" he called.

The Norwegian turned like a flash. He towered above Briggs, and the embers of old rage blazed in his face.

"I have searched for you for years, Peter," said Briggs. "That night when I had you put out of my house—I wish you had come back."

"What do you mean?" Wist's voice was only a strangled whisper.

"I mean that then, when you had gone, I realized for the first time that things would never be right with me, until I had made things right with you."

"You are my enemy," exclaimed Wist, shaking free as Thekla grasped his arm.

"No, Peter, I am my own." There was no question of Briggs's earnestness. His hands were shaking; his voice was uncertain. "Believe me or not, you are the one man I ever cared for. When I wronged you, it hurt me worse than it ever hurt you, but not until you had been put out of my house that night, did I begin to understand."

"Not until then, and I set aside the money I had taken from you. It has been growing all these years at compound interest. It is yours, Peter. I have done many things that were not worth while, but they all trace back to the wrong I did to you."

Peter Wist studied the face of his old partner. Long he gazed.

"I guess it is so," he said at last. "I have been happier than you, Tom—and I will be happier now if—if I forgive you."

Future biographers of Thomas Briggs, the money-captain, may not record it, but when he heard those words from the lips of Peter Wist, his eyes became wet.

That evening, while the afterglow still tinged the sky, a formal, precise capitalist sat in long converse with a Norwegian farmer. And at the door of their shack, Larry and Mary, well content, gazed musingly down at the stately wall of masonry which stood for more victories than one.

"See Jack and Thekla down there, walking arm in arm," laughed Larry. "What children they are!"

"Dear," she whispered, "are we not ourselves children of that kind?"

And Larry's answer was to draw her closer to him.

(The end.)




Letters of an Old Railroad Man and His Son.

BY HERMAN DA COSTA.

No. 3.—HOW TO KEEP GRATITUDE AND PUSH ON THE RAILS.

Jim Gets a Chance to Shine, and Has a Good Time Proving that He Can, While Dad Gives an Illustration of Proper Enthusiasm.

JIM TO THE OLD MAN.

EAR DAD: Since I wrote you last there has been lots doing. Bigby, T. F.'s secretary, was taken ill some time ago and had to go home. He developed a case of typhoid-fever, and was laid up for over two months.

In the meantime, T. F. had to go out on the line, and you can imagine how surprised I was when Connolly told me I was to go out with him. Pleased! If I had had a couple of feathers in my bonnet I believe I would have floated away.

We went out for three days the first time. And say, dad, you talk about work! When I wasn't busy working, I was busy hunting up some work to do. When I wasn't busy hunting for work, it was because I was too busy working.

T. F. would give me dictation at the rate of a mile a minute while we were on the road. It's hard enough having to write at a desk in an office at that speed, and it was kind of piling on the agony having to write thirty to fifty letters in shorthand while the car was rocking and lurching about.

My notes straggled over the page from

the top to the bottom, but by some good luck I managed to read them all. Then I would buckle down to the typewriter and try to hit the keys that I wanted to hit while he was doing something else.

It's great having a private car of your own. T. F. had a brass bed in his state-room, and I had a big room all to myself—that is, when he wasn't calling me out of it. Nobody around to bother us; once in a while T. F. would talk about places he had been, and tell stories about the road.

I've been out with him a couple of times since then, and am beginning to get used to it. Connolly told me that T. F. said I was a pretty good stenographer.

I don't wonder people like him, dad. He's a man, all the way through. True, he cusses a great deal, but he doesn't mean cussing for anything bad; it's just his way of expressing his feelings.

People would come out on the line wherever we went to shake hands with him. Everybody called him Tom. Brakemen, engineers, firemen, section-men—everybody knew him. There'd always be a crowd at almost every station waiting to see his car come in.

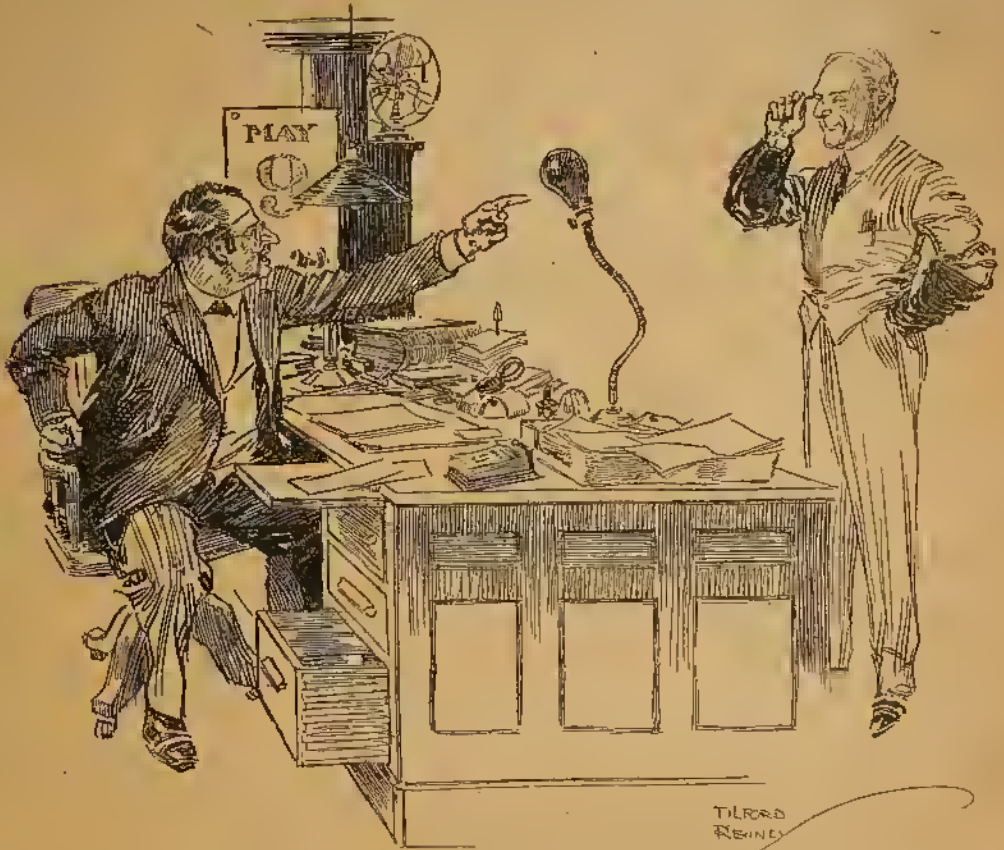
When Bigby came back to work again I was honestly sorry to leave T. F. and

go back to the office, even though it was hard work out on the line. It somehow felt different, although really it wasn't. But when you are alone with the general manager, you think he sees you can do good work, and you try hard to do better work than you usually do, so he will notice it.

I've settled down again now. But

that—trying to make me feel it was due to him that I had been raised—and I would have gone away feeling that he was lying, and that I got it because I deserved it.

Then, after a while, I would begin to think that the reason I got a raise was because they wanted me to stay with the road, and that they gave me part of what



"MAXWELL GRINNED. I'VE FOUND OUT I'M A MAN, AT LAST."

there's a surprise coming for you, dad. They've raised my salary! You know I started in on sixty-five dollars. Well, when Bigby came back, they put my salary to seventy dollars.

I commenced to thank Connolly for it, but he told me to shut up: I wasn't getting paid for anything more than I had done, and the road had done it, not he.

That's what I like about Connolly. He looks at things differently from most people. Some other man would have talked about me working harder, now that he had shown his confidence in me, and try to show him by my work that I deserved the raise, and a whole lot of stuff like

was coming to me in order to pacify me. All this because some chief clerk had talked as if he had done the whole thing.

You hear so much stuff like that here, dad. Up in the car service department, particularly.

There is a fellow up there named Maxwell. He worked for about ten years at a salary of about seventy-five dollars a month. One day he got a raise of five dollars. He almost fainted.

After he could think without his head going around, he went up to Claire, his chief clerk, and commenced to thank him for it, getting wilder each minute until he almost flopped on his knees. When

he got through, Claire commenced to talk to him about how he had recognized his ability by giving him the raise, and that he hoped he would repay his confidence in him by doing much better work than he had done.

He talked to Maxwell for about fifteen minutes in that strain, until Maxwell began to feel angry because Claire took all the credit to himself. When he got through, Maxwell turned on him.

"Mr. Claire," he said, "God has been mighty good to me in putting a man like you in this office. I used to think we had a superintendent of car service here, but now I see that I was mistaken."

"What do you mean?" asked Claire, feeling proud at the compliment.

"I mean this," said Maxwell. "I made an ass of myself slopping over to you that way. I thought you would see it was merely the surplus gratitude running over, and that it was intended for the road, not yourself."

Claire was at first astonished, and then he began to get angry.

"You are confounded impudent, young man," he yelled. "I guess you don't need that money, anyhow. Come to, think of it, you'd better write out your resignation, and I'll accept it."

Maxwell grinned. "It's worth it, Claire. I've found out I'm a man, at last."

When Connolly told T. F. about it, T. F.'s eyes twinkled. I was banging away on the typewriter, and they didn't know I heard what they said.

"Good for the boy," said T. F. "He'll make his mark now."

"Will you take him back?" asked Connolly.

"Certainly not. In the first place, that's up to the auditor; if I did, it would make bad feeling."

Connolly nodded. "I know. Lots of men in that department are like that, but they can't speak up as Maxwell did because they have families to support."

"We only live this life once," said T. F. "Some of us try to make the best of it, but others try to change it to suit themselves. No man need put himself in that position if he looks at life through the right kind of glasses."

I have been saving up a little since I came here. Got one hundred and twenty

dollars in bank now; going some, isn't it? And yet, when I see so many young fellows right in the B. and D., who are holding down big jobs because they've got pull, somehow it doesn't seem fair to me.

When one of these fellows born with a golden spoon in his mouth comes along and takes precedence over everybody in the neighborhood, there's a feeling that the other fellows aren't treated right, and somehow they aren't as enthusiastic as they might be with their work, and are apt to find fault with the road they are working for.

It's only human nature.

Affectionately, JIM.

THE OLD MAN TO JIM.

DEAR JIM: You don't remember John Right, of course. He was way before your time. John's father was a farmer, who brought up his son farming. John never did like it, so one day he ran away from home.

I didn't see him again for five years, when he turned up again in pretty bad shape. He had tried almost everything, but was too honest with himself to stick at it. He told me he was going to search until he found the kind of work he wanted to do.

I laughed at John then; for I figured if a man had a job, it was better to hold on to it, and make up his mind he wanted it, than to give it up and try for something he didn't know anything about.

Well, anyway, John drifted off again. In the meantime, I had gone with the B. and D., and was in charge of the roundhouse at Cumberland. One day I was up in Chicago, on a vacation, when I plumped into John on the street. He was looking pretty prosperous, and, after we had talked a while, I asked him what he was doing.

He said that he had at last got something to do that he liked. He was a reporter on a newspaper. He'd been with the paper for two months; but the way he talked about the newspaper business made me feel as if I ought to take off my hat whenever I bought one.

He had me believing before he got through that it was the holiest kind of an enterprise that had ever been set up in

the public market-place, and was the voice of a free people speaking out when everything else on earth was deaf, dumb, and blind. And just about ten minutes before I met John I was cussing them for being the yellowest, meanest bunch of liars that ever hit the pike.

Well, anyway, I was mighty glad to hear that John had landed at last, and I got him to take me up to his office. It was a big room, with a row of desks around the wall, and typewriters scattered about.

There was a bunch of young fellows in it, smoking and writing, and John made me sit down in a corner of the room with him and talk over old times. While we was sitting there, somebody in another office hollered something, and John jumped up and rushed away. In a minute he came back.

"I've got an assignment, Billy," he says. "Come along with me and see how a reporter gets a story."

I had a little time on my hands, and thought I might as well use it up that way as any. I hadn't yet got over my surprise to see John doing that kind of work.

Well, at any rate, we moseyed around, and John talked to several people about something or other, and they sent him to other people, who talked about it another way, and finally I went back to the office, and he pecked away at a typewriter for a little while and turned in his story.

We were sitting, chatting, in a corner of the room when a man came out of an inner office. He had a piece of paper in his hand.

"Where's Right?" he bawled. "Then he saw him. 'Look here, Right,' he said, 'what do you call this?'"

John got red, but stood up. "What's the matter, Mr. Martin?" he asked.

"Matter!" yelled Martin. "What's this stuff you wrote here? Do you call that a news story?" He shook the piece of paper in his hand at John.

"I don't see anything wrong with this, Mr. Martin," said John.

"Of course you don't!" yelled Martin. "What you ought to do is to go back to the farm, instead of working for a newspaper."

Well, sir, that would have made any man mad. I know I clenched my fist myself, and wondered whether it wouldn't



he a good idea to give him a punch for luck. John walked to the door and flung back his head.

"I'll tell you this much, Martin," he said. "I'll be managing editor of this newspaper when you will have to go to work on a farm yourself to make a living."

That was piling it on strong, wasn't it? Chicago was a mighty big place, and John was a mighty small ant in it. But John had enthusiasm. He loved his work. He wasn't in it for money as much as for the liking he had for it.

He stayed with that paper until the week was out, then he went with another

newspaper. He worked with them for about two years, and finally began to turn in work that was the real thing.

Then a reorganization of the paper came, and John was made city editor. He held that job about four years, and went on another paper in a higher position, stayed with them for a while, and finally darned if he didn't get the offer of managing editor of his first paper!

In the meanwhile, Martin had gone on another paper, and also had been made managing editor of that; but just about the time John got his big job, Martin's paper changed hands, and Martin was thrown out of work.

I was in Chicago again then, and dropped in John's office at the time it happened. John had dictated this letter to Martin when I came in:

MY DEAR MARTIN—Fifteen years ago you told me that I ought to go back to work on the farm, instead of working for a newspaper. I now beg to inform you that I am owner of a farm in southern Illinois, which is in good shape, and well kept.

As you are no doubt looking for work, I offer you the position of superintendent of it. You should be able to make a fairly good living from it, if you are competent enough. Please let me hear from you promptly. Sincerely, JOHN RIGHT, Managing Editor.

I didn't see John until about a year after. Then he told me that Martin had got furious when he received the letter, and had sat down and wrote a note to the owner of John's paper, who was a personal friend of his, enclosing the letter, and requesting that John be fired. The proprietor of the paper simply referred the note to John, and it ended there.

The beauty of this is that it's true. And the particular point I want to bring out is that enthusiasm got John the position of managing editor. True, he had to have something besides enthusiasm. He had to know the business. But he would never have known it if he hadn't had the enthusiasm.

There were probably three thousand other young reporters like him in that city, some with influence, some without, but the majority of them with a better education than he had. It was simply a

case of a man finding the work he liked best, and making good in it.

To-day, John Right is managing editor of one of the cleanest newspapers in the country in a city not two hundred miles from Chicago, known from one end of the country to the other, and one of the most popular men in his city.

You say that that's not railroad work? All right, then. I'll tell you about another John. This John was named Dickerson. Pat Niff, in your office, knows him well; for Pat was holding down the wire at Martinsburg when Dickerson was superintendent of the I. and F. Central division.

In those days the B. and O. was being managed by a bunch of men who knew as much about railroading as a cat knows about singing. They had rolling-stock out on the line, standing on sidings months at a time.

Engines were tied up on branch lines, freight-cars were getting lost and wandering away, and, altogether, the old B. and O. was in about as bad a position as any road could be and not go in the receiver's hands. Finally it got so bad it did go in the receiver's hands.

The man who managed it then was named Murray. His initials are O. G. As soon as he was appointed receiver, he sent a telegram to John Dickerson, of the I. and F., to report for duty at Baltimore.

Dickerson had a mighty good job at the time, for he was one of the best all-round men in the country. He declined to come. That must have got the Old Man's dander up, for he sat down and wrote this to John Dickerson:

MR. JOHN DICKERSON:

I wired you the position of general manager of the B. & O. ten days ago, and you have declined it. I now offer you the position at double the salary previously offered, payable in advance. Do you want it? Answer quick.—O. G. M.

Now, John Dickerson was a pretty shrewd man. He had been watching the B. and O. for a long while, and saw that the real fault with the road was that the higher officials had tried to meddle too much in the actual running of it, and there had been a good deal of "favorite sons" placed in fat jobs without regard



HE LEFT JOHN DICKERSON TO RUN IT, AND JOHN RAN IT.

to their ability to run it. So back came this wire to the Old Man:

If you will place me in entire control of the road, with authority to discharge and appoint whom I may see fit, without any one being given power to cancel my orders, I will accept.

It took O. G. M. about three minutes to answer that. And all he said was, "Come." Well, John came.

The first thing he did, he fired the general superintendent of the eastern division, the general superintendent of the middle division, four superintendents, six trainmasters, two yardmasters, and about fifteen other officials.

But there was a Man in the receiver's chair. He just kept on going after money to finance the road, and left John Dickerson to run it. And John ran it. He sent to Pittsburgh and got two of his old men there, got three more from the Pennsy, and gathered about two more in. The rest of the positions he had open he filled by promotion.

And then the rolling-stock began to

move. John was up and down the line, night and day. He left a trail of enthusiasm behind him wherever he went. Engines began to move. Passengers began to come. Freight began to pour into the terminals. John was everywhere, and his men worked with him like all get-out.

The Old Man, up in New York, fighting hard to get money to keep the road alive, began to find things getting easier. From being known as the worst road in the country, the B. and D. began to be known as "not so bad, after all." It was hard to live down the reputation that had been put on her—in fact, to this day, it's a joke in Pittsburgh that if you want to leave there the worst way, you must take the B. and D.—but she fought up, and pretty soon began to show her head once more and perk up.

John fairly made things hum. If a man worked hard, good. He was right in line for promotion, and got it, too. If he wasn't able to work hard, out with him.

John Dickerson put life into the old road when it was fairly at its last gasp.

He did what any other railroad man in the country would have declared impossible. He did it because he was enthusiastic. He knew the B. and O. was the natural outlet for one of the best sections of coal and grain country in the United States. The rails were there, and the rolling-stock was there.✓

Well, sir, the annual directors' meeting came around. It was just a year that John had been with the road, and in that time he had set it on its feet again. True, it was still a trifle unsteady; but before he came, it was ready to have prayers said.

So the board of directors, in solemn conclave assembled, decided that John Dickerson should be written a letter commending him for his excellent management. They composed a letter that read like the Declaration of Independence. Each man signed it, and it was mailed.

John was out on the line, as usual, when his mail came in. They brought him the big letter with its red seal, and

John tore it open. He read it over carefully, laid it down on the table, picked up a big blue pencil and scrawled over the letter in big characters, then put it in another envelope, and mailed it back to the dignified board of directors.

The secretary of the board received it, and opened it in the presence of the other directors. John had this scrawled over it:

We are knocking merry Hades out of them.
JOHN DICKERSON.

Only it wasn't Hades. Should you ever go in the president's office, look over the old man's desk. That letter is hanging over it in a frame, and, straggling across, the embellished words in blue.

Look at it, Jim. It's right to the point. It showed what a man did with his enthusiasm, properly directed.

Your mother says to send her your picture. Don't let your dignities make you forget the folks at home.

Your affectionate FATHER.

LITTLE RAILROADS OF WASHINGTON.

OFFICERED like a South American revolutionary army is the Southeastern Railway Company, operating the shortest railroad in the State of Washington. In its statement for the year ending June 30, 1909, just filed with the State Railway Commission, it reports six general officers, one general clerk, one station agent, one engineer, one fireman, one conductor, three trackmen and a section foreman. The line is four and three-tenths miles in length and runs from Kangley to Camp Five Junction.

The report states that the clerk drew a salary of 68 cents a day, as against \$2.23 a day for the trackmen and \$2.97 for the conductor. The engineer worked forty-one days during the year, and the fireman put in nineteen days, while the general officers worked 360 days. One general officer drew salary at the rate of \$1.66 a day.

Under the heading calling for a report of "important changes during the year," the report says: "Mileage decreased nine-tenths of a mile by abandonment of line from Camp Five switch to end of track."

The total cost of the railway and equipment to June 30 last is reported at \$125,121, which includes \$4.82 for right of way and \$3.50 for stationery and printing.

The road carried 328 tons of freight and

no passengers. Its total revenue from operations was \$364, while the operating expense was \$2,985 and \$648 for taxes, making a loss of \$3,270 for the year, but this was cut down by the receipt of \$795 for rent of the company's locomotive to a logging company.

The company was organized September 13, 1906, and the directors are W. M. Ladd and Edward Cookingham, of Portland, John Bagley, J. G. Dickson and E. M. Hayden, of Tacoma.

The North Yakima and Valley Railway Company, operating fourteen miles of line between North Yakima and Naches, Washington, west of Spokane, carried 39,640 passengers and 19,482 tons of freight during the year ended June 30. The revenues amounted to \$36,150, while the operating expense was \$20,373 and taxes \$1,012. The company expended \$367,000 on construction and equipment on the line. Its net profit was \$19,360, or \$13,669 less than enough to pay the interest charges on the capital borrowed to build the line. Its equipment consists of one locomotive, two coaches and two freight-cars.

The main line and branches tap the commercial apple and fruit districts in the Yakima country, where the United States government has three large irrigation plants.



SHE REACHED A PLACE WHERE JUMPING
WAS HER ONLY RESOURCE.

BARBED-WIRE CHIVALRY.

BY KATHARINE EGGLESTON.

Proving That Woman Can Win In a Scrimmage,
Even If There's No Bargain-Counter In Sight.



"COMPRESS your gills, you sardine! Don't you take any liberties in breathing unless you can do it up-and-downward!" Bill Bellows hunched over against Frank Storrs as he spoke.

"Aw, what's hurting you? How much of this train-lid have you bought?" Storrs asked gruffly.

"We're a crowdin' the lady," Bellows whispered as he snuggled closer to Frank.

Instantly Storrs gave up the room he had been contesting and cultivated a dangerous intimacy with the edge of the box-car roof; then stretched his neck to see across the back of his very near neighbor.

"The lady" was lying flat on her stomach, just as the men were, her feet toward the middle of the car and her

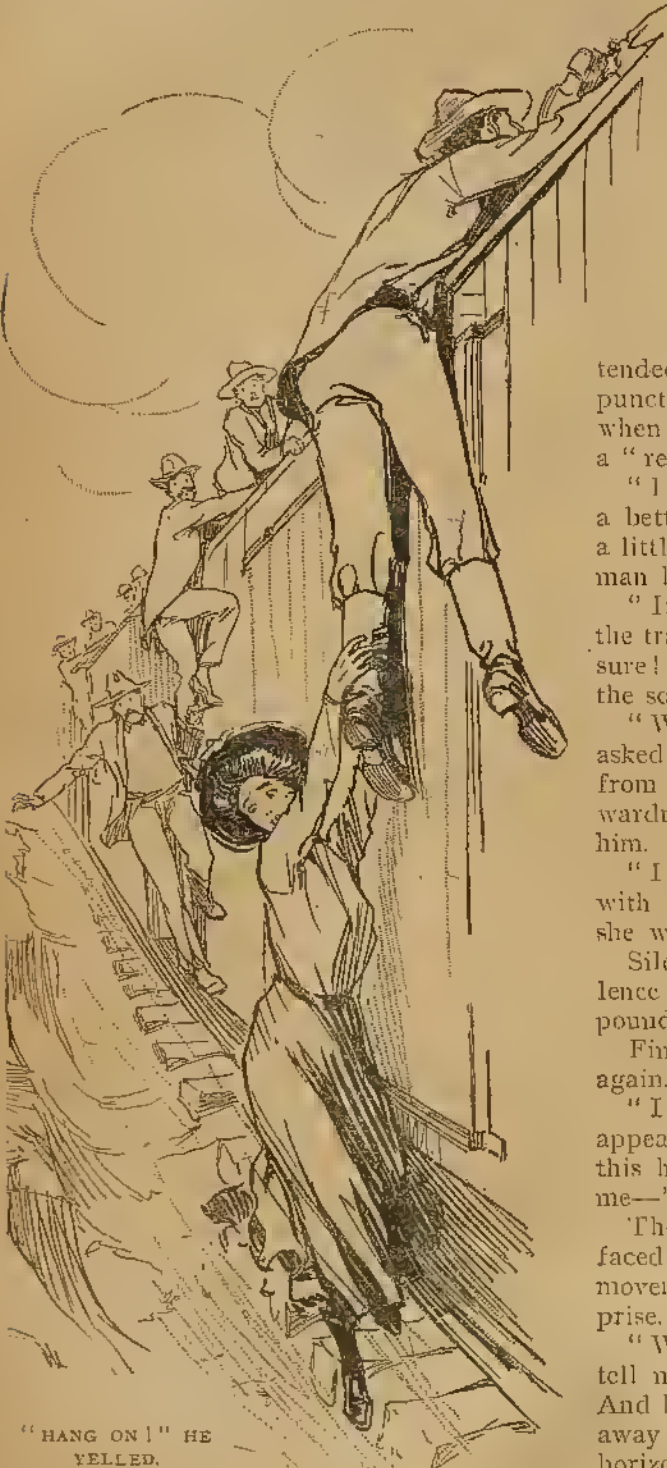
head raised as she looked out across the brown and red of the prairie.

She was the only woman who had dared to mount to the car-top when the inside of that and all the other cars refused to hold another person. A look of admiration passed between the two men. It was a tribute to her nerve.

The train bumped along the newly made track, which had been laid to accommodate the home-seekers who were making the run to secure possession of the claims in the territory the government was opening up for settlement. For a month, wagons and horses, carts and burros had been coming to the border of the new country and stopping there to await the signal for the scramble for claims.

But the woman on the top of the car-

was an unexpected development, even in this time and place of the unexpected. She was pretty, too, with sweet lips and calm, soft eyes, the kind of girl who would have looked in place sitting on a veranda embroidering a doily.



"HANG ON!" HE
YELLED.

Yet, here she was; and the two men who made room for her liked her all the better for looking like that and having the courage to shin up the side of a box car and take chances.

"You're makin' the run?" Bellows asked by way of opening up conversation.

"I'm letting the railroad do it for me," she answered as she stretched a little to absorb the extra space the men had given her.

"They ain't goin' to do more'n a half-way job, you know," Storrs volunteered.

"Yes, you'll have to finish on your own—um." Bellows swallowed the word he had intended to say with the exaggerated punctiliousness of the frontiersman when he talks to a woman he thinks is a "real" one.

"I wish they were wheels: I'd stand a better show," the girl said, smiling a little at the embarrassment of the big man beside her.

"It'll be a grand scrimmage when the train stops and we all light out, for sure!" Storrs observed, not wanting the sociability to come to an end.

"Which way you goin'?" Bellows asked after he had rescued himself from the depths into which his awkwardness of speech had precipitated him.

"I haven't decided," the girl said with such brevity that Storrs thought she was offended.

Silence fell, if it can be called silence when a heavily laden train is pounding along protestingly.

Finally Storrs found his courage again.

"I don't want to be cuttin' in and appearin' to try to boss; but I know this here land, an' if you wuz to ask me—"

The girl turned her head, so that she faced him, with such a sudden, eager movement that Storrs stopped in surprise.

"Well, I do ask you! I ask you to tell me what to do. I'm anxious—" And both of the men turned their eyes away and looked along the rolling horizon line as tears gathered, and her

lips trembled and stiffened as she tried to control them.

"I'm so anxious to get a good claim. We haven't any home; and I've paid almost every cent we have to register, and if—if—if I should be crowded out, or not get a claim, or—or anything, I'd—"

"Well, you won't be crowded out or not get anything. You jes' run our way. We'll start you right," said Storrs.

He and Bellows had hunted through the Indian Territory and the Panhandle, had traded with the Indians and ridden in the round-ups till the country was an open book to them. They knew just the claims they meant to stake.

They would lose no time, but go straight as the crow flies to the land they had decided to get and settle on. A home loomed large in the minds of both. They had knocked about till the edges that they had bumped into began to make them a bit sore and cause them to long for quiet and certainty.

Both felt for the little woman beside them. She was out after the same good thing. Just a little woman, quiet and sweet and weak, making the run that would probably test even their strength and endurance. Each of them registered a vow to help her win.

With a great grunbling of wheels and a shrilling whistle that was like a command to get off, the train began to slow down.

Moved by the impulse to get a good start, the whole sardine-like arrangement of men swung about till their feet shuffled and felt about the edge of the car roof over which their eager faces had stretched a moment before.

The little woman was turned about with the mass of humanity. Lighter than the others and less muscular, she could not keep herself safely poised on the flat roof. Before Bellows could get himself adjusted and look to her, she was pushed over, and, grabbing frantically at anything that promised to arrest her fall, she seized his big-booted foot.

"Hang on!" he yelled, realizing the predicament after the first jerk as her weight nearly dragged him from the car.

He followed his own instructions. As he slid off he seized Storrs's legs.

Storrs, surprised by the maneuver, hurled an indignant protest at his captor.

"Turn me loose, you coyote!"

But the coyote was dangling uncertainly in space, hitched firmly at one end by the desperate clasp of the nervy little lady and anchored with a finality that left Storrs no choice to the pair of boots above him.

Storrs felt himself going over the edge. Seizing a pair of legs that offered a last chance, he, too, swung down from the car-top, feeling the outraged kicks of his victim subside as he got busy with the top end of himself and sought the same leg route to safety.

Down from the car-top the human chain depended. The men crowded on the iron ladder at the end of the car, yelled and cheered. The little lady looked down. She swung a short distance only from the ground. Bellows felt the weight on his legs removed. She landed lightly and safely on the soft dirt along the track side.

The train was stopping. Bellows let go. The little woman saw a dozen eager legs adjusting themselves to spring to the ground and set off in the race.

"Which way shall I run?" she cried, shaking Bellows's arm in her excitement.

"That way," he pointed. "Run like the—the dickens!"

Her soft eyes, looking up into his with perfect trust, made him gulp again at his linguistic extravagance.

"How'll I know when—" she began.

"I'll yell. Git!" he commanded.

The loyalty that had made him cling to Storrs, and Storrs to him, through greaser fights and empty cupboard days caused him to wait till the dragging chain of men had brought his friend to safe dropping distance.

As soon as a point was reached where Storrs could cut loose from his hold on the upper man's legs without running the risk of breaking his own, Bellows sang out:

"Leggo, you Indian! You're on *terry femy!*"

He ran ahead to where Storrs landed. Together the two swung about and paused for an instant to get their bearings. Poised on the top of a ridge of dirt thrown up along the railroad track was the little lady. She waved her hand to them.

They plunged forward toward the

ridge. She shot down the other side. When they reached the top and had a chance to look beyond, she was scudding over the prairie like a big brown rabbit.

"Jumping jehu, look at her go!" Bellows cried in a burst of admiration.

"Follow the leader!" Storrs yelled as he stretched his long legs and set off.

The train had come to a dead standstill. The mob had poured out of the doors to fall under and over the dropping load from the tops of the cars. Screams of fright, of anger, of derision, made the prairie that had never known more than the shouts of the cowboys and the bark of the coyotes a pandemonium of human noises.

Bellows, glancing back, saw the ridge of earth change to a pyramid of people. The race was on! Out the crowd streamed, covering the brown plain with a motley lot of plunging, puffing, swearing, sweating creatures who made the prairie-dogs scud into their holes and lay low.

The flying feet ripped the brown skin of grass from the red soil till it looked as if the whole land bled under the lacerating heels.

Out ahead, skimming as lightly along as if she had borrowed wings from the sweeping wind, ran the little lady. On she went, till her brown figure became a sort of focus for the eyes that stared toward the promised land.

Bellows and Storrs pelted along in something like proximity; but she flitted before them at a distance, and so the directing yell that was to tell her where to stop was lost in the racket and roll of the voices behind.

Suddenly a barrier appeared to leap out of the ground. Some far-seeing cattleman had set up a barbed-wire fence that seemed to her eyes to stretch from chaos on one side into eternity on the other.

She glanced over her shoulder. The pounding mob was coming. Fleetness of foot was her only advantage. She would lose the benefit of that if she stopped to find an opening through the fence, and the lowest wire was too close to the ground for her to roll under.

Gathering her short skirt as tightly about her as she could, she dashed at the fence.

"Good guns, she's going to climb it!" Bellows cried, with a sickening memory of the torn sides of horses, the bleeding flanks of cows that had come in contact with the wire octopus.

Already she was putting her foot on the lowest wire. She had climbed up the freight-car; this looked comparatively easy, as her modesty could not make her shrink for the feat when the crowd was so far behind.

She felt the cold prick of a barb in her hand and sought a more satisfactory hold. She had managed to get to the top of the six-wire fence. Shaking and swinging on her uncertain footing, and obliged to disregard the prongs that were gouging into her hands and body as she pulled herself up, she reached a place where jumping was her only resource.

Unable to take any notice of her skirts with her hands and feet so fully occupied, she lifted herself to spring. The fourth wire, on which she stood, vibrated crazily. The fifth wire bit and dug at her knees; and the top wire, by which she tried to steady herself before jumping, wobbled up and down under the uncertain pressure of her hands.

Just as she prepared to spring, a shout from the rear assailed her ears. It had the effect of sending her forward desperately. She scrambled frantically to regain her balance. The effort entirely killed the little momentum she had. She turned a half hand-spring, and landed in a heaped-up tangle of skirts and loosened hair on all the barbs in her immediate neighborhood.

Madly she tried to drag herself loose. She dropped her whole weight, hoping to tear herself down from the wires. Blood streamed from her torn hands; and, by the merest chance, she kept her face from being scratched by the trembling top wire.

One who has never had an experience with a barbed-wire fence can scarcely picture the tenacity of the hold with which the wire demon clutched her.

The big hope that had buoyed her in overcoming difficulties died as she hung there. The horde behind would sweep by her. All the land would be grabbed. She would be left, a bit of driftwood on the sea of the prairie that every one but herself would have some claim upon.

The thought of the two men to whose kindness she had owed her comfort on the car roof, and especially of the one whose good left leg had saved her from a bad fall, came to her now. If only they would come to pick her off this terrible trap!

The two men were coming, running with renewed vigor as they saw her arrested, a captive of the barbed-wire fence.

Then the little lady began to wonder if they would extricate her. They, too, were running for a home. They had entered the race to win. They were quite justified in looking on her as an obstacle in their way removed—or, rather, held up, by fate for their benefit.

Would they loosen her from the torturing fence? And if they did, what show would she stand when the great crowd swept down upon her? Tears of discouragement ran down her cheeks.

Bellows was wasting his breath, swearing with every step he took.

"It's that white-livered half-breed's done this! 'Thinks he'll turn the pack off the scent of the good land beyond, so he can wiggle his dirty carcass onto it!" he growled.

"Shut up your steam-box and run!" Storrs ordered, showing the worth of his advice by leaping ahead of his comrade.

He dashed on toward the fence. Another minute and he was working with might and main to free the dress, the hair, the flying ends that seemed to have grown all over her.

"You—you mustn't let me loose!" she sobbed hysterically. "I—I might get the very land you want. I might take your claim."

"Guess they's enough to go round—the whole passel's got to," he added, as he saw the mob sweeping down toward the fence.

Bellows came up to the other side just as Storrs gave up trying to work through the wires and climbed over. Between them they pulled and tore the little lady free.

Storrs's bleeding hands bore testimony to his efforts; but the little lady lifted her soft eyes—the tears making them softer still—to Bellows's face and thanked him.

"I ain't done nothin'," he disclaimed, with a gratified flush showing through his bronzed skin.



THE RACE WAS ON! OUT THE CROWD STREAMED, COVERING THE BROWN PLAIN.

The rage of the crowd rose in a roar as they came on the formidable fence. A few of the hardier ones tried to climb, but most of the land-seekers knew barbed-wire fences and respected them. The race swung about as the crowd scurried like a huge herd of giant jack-rabbits along the wires, seeking an opening.

"Look at 'em! Scared cats! We've got it our own way!" Bellows gloated.

And they had. Only a meager few had managed to get up and over the fence with much satisfaction to themselves; and now they were running out toward the land that was obviously richer and better.

"Go it!" Bellows shouted to the girl as the advance runners came closer. "Go it good! We'll give you a handicap—er—won't we, Bill?"

Storrs nodded.

"Oh, no! I couldn't let you! You've been so good. It's not fair!" the little lady objected, standing on ceremony in the tattered remnants of what had been a very neat and serviceable brown dress.

"Light out! Don't be a—lady!" Bellows shouted, his eyes on the foremost of the claim-seekers.

Storrs shuddered at the temerity of his friend. He spoke as if the little lady were just an ordinary woman. And, to his relief, the little lady seemed rather pleased than otherwise.

Off she shot as if Bellows's command had been a key to set the mechanism of her body in motion.

"Hurrah! Leg it! Leg it!" Bellows yelled, with forgetful but genuine enthusiasm.

"Shut up, you eejut!" Storrs warned.

At the instant a long-legged, air-splitting figure shot by them, the head of the fence-climbers.

"Hike!" Bellows shouted to Storrs.

The race now had narrowed down to themselves and the sandpiper whose marvelous strides measured off space with clockwork regularity. Bellows hated the man and his red goatee before he had run a half dozen yards abreast of him.

The pine pegs that marked the corners of the quarter sections showed now and then a bit more freshly yellow than the drying grass.

Bellows was wrathful at the man who ran him just a little better, making with

each stride a slightly perceptible advance. Storrs looked ahead at the little lady.

She had come to a place where a fringe of stunted willows and a few mesquit trees indicated the bed of a dry creek.

"Stop! Hold up!" Storrs sang out, making a megaphone with his bony hands.

On she flew, quite too intent to realize that she had reached a good place.

"Hi!" Bellows shouted.

The red-bearded man diverted his thin body for an instant from its straight line of procedure and planted a jab with his sharp elbow in the neighborhood of Bellows's fifth rib.

"Mind your business!" he said.

"You—" Bellows snorted, as he squared off to return the compliment to advantage.

"Aw, cut it!" said the red-bearded runner, as he made prompt use of the slight advantage Bellows's pause gave him and struck out at a quicker pace.

Bellows was too mad to think of a claim. He set off after the man with a purpose that gave wings to his feet. But the kangaroo-creature had incentive, too, the kind he carried always in large quantities—self-interest. His eyes were fixed on the small, brown figure that had stopped at Bellows's call just as quickly as it had set off at his command.

His shrewd sense that smelled out everything to his own interest told him that there was a good reason for Bellows's warning cry. He glanced about at the prairie and saw the greener grass, the fresher foliage that indicated the presence of water at a more recent period than most of the land he had run over had enjoyed. His running mate evidently knew the lay of the land, and was giving the little woman the benefit of his knowledge.

Gathering himself together for a supreme effort, the man hurtled forward with a speed that dropped Bellows behind after two leaps.

Bellows, losing ground, and Storrs still further behind, saw him come up to the little lady. They could see that he was waving a dictatorial forefinger, and that she was shaking her head decidedly.

Then, from the angry motions and the wildly waving red goatee, they could

tell that the red-bearded man was saying a good deal. Bellows imagined that he saw the nervy little woman shrink. He yelled to Storrs:

"Chase!"

Both men dragged the fresh air into their lungs and rushed forward at top speed.

The little lady turned to them eagerly. They stopped, panting, beside her.

The woman sent a glance that would have shriveled any but the atrophied pride of the man she faced.

"I'm not your wife, Ezra Innes," she asserted.

"You ain't got your decree, Mirandy," the man gloated. "I guess these here gentlemen ain't so perlite that they'll try to run yer husband off his wife's land."

"Oh! You—you—" The wrath of



"HE'S TRYING TO MAKE ME GIVE UP."

What's up?" Bellows demanded.

"He's trying to make me give up," she answered, the tears coming.

"You skunk!" Bellows cried, facing the tyrant. "This here land's her'n. We seen her on it before you'd come within hearin', didn't we, Storrs?"

"You bet!" Storrs seconded.

"You'd better make tracks," Bellows advised.

The red goatee quivered, as the owner of it laughed.

"You two air some kind. This here is my wife, an' I guess I kin stand to let her git this claim—if you insist."

If Storrs had not been too busy with his own amazement, he would have described Bellows as completely flabbergasted. Staring from the man to the little lady, Bellows was speechless.

the little lady ended in a burst of tears.

She flung herself down on the ground and gave way to a spasm of grief and anger that reduced the two astounded frontiersmen to even more complete silence.

Bellows looked down at her with anger and pity struggling in his face. Storrs clenched and unclenched his hands. Both felt utterly helpless in the face of the situation.

"It's always been like this," the little lady finally found voice to say. "He always comes along and takes everything away from me. He done it ever since I married him. And he's going to keep on doing it."

Bellows and Storrs looked at Mr. Innes to see how this accusation affected him. But it slipped from his leather-like hide



“THIS IS MY SISTER'S DECREE! YOU CAN—GIT.”

as lightly as the wind capered across the plains.

“Ef you two want to git the kind uv land that suits you, you better run crlong,” he suggested comfortably.

Bellows and Storrs looked at each other, then at the approaching runners, and last at the little lady.

She looked pitifully up at them, her face stained by her tears and the red earth. She lifted her shoulders and made a gesture with her little, bloody hands that seemed to say she recognized the uselessness of protest.

“Go on! Get your claims! Don't let them cheat you out of yours, too,” she urged.

Bellows and Storrs turned away. There seemed to be nothing for them to do but look to their own interest, which they did by making quick progress across the creek-bed to land that they knew to be first-class.

Within an hour the prairie was peopled. Five and six claimants on each quarter-section laid the foundation for a legal war that went merrily on, while others bought off and “swopped” to save themselves lawyers' fees.

Water sold for a dollar a glass, and

Mr. Innes, again scenting his own advantage, went into the business and reaped a rich harvest from the puddle that nestled on his side of the creek-bed.

During the second day of their occupancy, Bellows and Storrs, neither of them daring to leave the land they had taken, were carrying on a long-range conversation, when a rattling old sulky and horse came along.

A young man, whose cheeks burned with a suspicious redness, drove the queer turnout. The presence of canned goods was evident by the gunny-sack that dangled from the back of the seat.

“Spare any fodder?” Bellows asked as he drew up.

“Nope. Takin' it to my sister,” the young fellow responded pleasantly. “This is great, ain't it?”

He filled his cramped lung cavity with the ozone and lifted eyes exactly like the little lady's to the big blue sky.

“Whose your sister?” Storrs asked quickly, as he saw the color and soft glow of the eyes.

“Mrs. Innes, that was, praise he,” the boy replied.

Bellows came up to the sulky and laid his hand on the uncertain wheel.

"Great old trap, ain't it? Best we could afford. She came down on the train—to get in good, you know. And I jogged along with this bunch of bones. They told me back yonder that along here's where the train-load got to going. I'm looking for—"

Bellows interrupted.

"She's over the creek with her husband."

The young fellow shot up from the rickety seat and stood on the wobbly foot-rest; his face one big interrogation.

"What?"

"Sure! Her an' Mr. Innes got that claim over yonder."

"That monster ain't here?" the boy asserted and asked at once. He's hounded her till she's desperate. I'll kill him the second I sight him."

He had pulled a pistol from his pocket, and the intensity of his anger had sent the red flying into his cheeks.

"We've raked and scraped all we could to get down here—me for my health, and her to get shut of him. And he's here."

The same helpless acceptance of the ubiquitous Mr. Innes that had seemed to take possession of the little lady threatened to overwhelm her brother. Evidently the husband was an octopus when once his tentacles clutched.

"He's there, all right!" Bellows growled. "He's sellin' puddle-water fur a dollar a dipper, gettin' ready to live on Easy Street when they lay out the town—on his land, I reckon. He's got the kind iv luck you can't kill."

"Yer sister got the claim fust," Storrs added. "But he come along an' took possession, 'cause she was his wife."

Trembling with nervous excitement, the boy was fishing in the opening of his flannel shirt for something that showed the outline of sharp corners. He pulled out a thick letter in an official envelope.

"I guess he won't browbeat her any more. That's her decree. It came just after she left."

He stood waving the envelope in one hand, while his other still clutched the pistol.

Bellows snatched the envelope.

"When'd you say you got it?" he demanded.

"Day before yesterday," the brother

answered, staring with some displeasure at the excited man.

"Then she wasn't his wife when she got the claim. We kin prove she got there fust. It's her'n—it's her'n!" Bellows shouted.

Swept by the enthusiasm that took possession of them, the three men made quick time to the Innes claim.

Storrs and Bellows swallowed hard when they saw the little lady fling herself into her brother's arms.

"Archie! Archie!"

Quickly, treading on the very heels of her joy, her grief found expression in the brief but sufficient, "Ezra's here!"

"He ain't going to stay," the brother asserted, looking over his sister's shoulder at Mr. Innes, who came from his shack.

"This is my sister's decree! You can—git!" he cried, waving the envelope in the husband's face.

"You mean you and her kin git!" that individual answered coolly. "This is my claim."

"I reckon not!" Bellows said, with decision. "That there decree was granted before yesterday, so you wasn't her husband. An' we kin swear that she was here fust—so this ain't your claim!"

Mr. Innes looked at Bellows as if he thought of protesting, but that look evidently gave him cause to reconsider. He turned, with a fair amount of self-possession, and started to go. Storrs met him.

"You can leave the money for that muddy water you got out of this lady's crick," he said mildly, but with his pistol for emphasis.

And Mr. Innes, with a recognition that he was beaten, handed over the money.

"It's—it's all because you picked me off the barb-wire fence," Mrs. Innes said, as she lifted her gentle eyes to Bellows.

Bellows and Storrs swallowed hard, but for different reasons.

But the best part of the story is, though it's only reality, not romance, that the friendship between the two men never wavered while they both courted the little lady; and it grew insoluble in the comfort of their miserable confidences when the storekeeper from the town in Missouri where she had lived came down and married the little lady whose first sweetheart he had been.

Running Down Lost Freights.

BY ARTHUR F. BLAKELEY.

THE TRUE STORY SERIES. How would you like to have T. O. L. F. C. tacked onto your name? Puzzle folks, wouldn't it? Those letters stand for an interesting profession—Tracer of Lost Freight-Cars. If you were a tracer, there is no telling where you would have to go on this great northern continent while running down a missing car. Mr. Blakeley had a number of interesting experiences while he was a tracer—quite as exciting as if he were a detective in search of an elusive robber.

But—thanks to a wonderful system and well-kept records—there are not so many missing freight-cars as one would imagine. And the fact, as Mr. Blakeley says, that his calling is followed by less than a dozen persons, shows how well our great railroad companies keep tab on their wandering rolling-stock.

**If It Hadn't Been for a Baseball Game and Some Piutes Wandering
In a Forgotten Land, Two Cars Might Have
Been Lost Forever.**

TRUE STORY, NUMBER FORTY-ONE.



FOR upward of twenty years I was a tracer of lost freight-cars. It is a unique calling, and is followed by less than a dozen persons.

To those unacquainted with the intricacies of car-counting, it might seem easy to keep track of the rolling-stock: but when it is considered that, no matter how small the road owning it, a car may be sent from the Atlantic to the Pacific, and be handled by a dozen different train-crews and perhaps as many switching-crews at all hours of the day and night, there is plenty of room for mistakes.

Passenger, express, and baggage-cars are rarely lost, but the freight-car department is less fortunate; and every road of any importance has its lost-car agent, who is always on the wing, hunting up stray cars.

His trips frequently cover thousands of miles, and take him into all sections of the country, from the busy yards in the large cities to some out-of-the-way switch in a desolate region, where the railroad station stands alone.

While I was lost-car agent for the Alabama Great Southern, I had some queer experiences. While out on a hunt for box

EDITOR'S NOTE: All the stories published in this True Story Series have been carefully verified by application to officers or employees of the roads or companies concerned who are in a position to be acquainted with the facts. Contributors should give us the names of responsible persons to whom we may apply for such verification, in order that fruitless inquiries may be avoided. This condition does not imply any lack of confidence in the veracity of our contributors, but is imposed merely to give greater weight and authenticity to the stories.

Series began in the October, 1906, Railroad Man's Magazine. Single Copies, 10 cents.

car 873, a telegram reached me at Aberdeen, Mississippi, that, as soon as my report was turned in regarding its whereabouts, I was to go to Terre Haute, Indiana, in search of gondola 13,781.

This car had been sent to Indianapolis with a load of machinery for the Nordyke Marmon Machine Company from Tuscaloosa, Alabama; and, having arrived and been unloaded, instead of being sent home, it had been loaded with car-trucks and sent to Terre Haute via Vandalia, they being short of cars, and it being the unwritten rule to use anything in sight when a car must be had.

From Terre Haute it was sent to Brazil for a load of coal. It was the plan to load it there and send it on the way home as far as Indianapolis with block coal. On its arrival at Brazil, the mines were closed, owing to a strike, and the car was sidetracked on a C. and E. I. spur, owned jointly by the latter road and the Vandalia. Here the car dropped out of existence, no further trace being obtainable.

The books of the agents and switching-crews showed its arrival, but no trace of its departure. On my arrival at Brazil, I carefully inspected every side-track and coal-switch in the town, but no sign of 13,781. Many other cars of other roads, built at the same shops, and of the same description as the lost car, were there, but no A. G. S., 13,781.

I was about to give up the hunt there and try some other near-by town to see if it might not have been shoved out there for want of room at Brazil, when I chanced to go down the Chicago and Eastern Illinois tracks toward the station north of the roundhouse.

A game of ball in a park had attracted my attention. Being a lover of the sport, I found, on consulting my watch, that I had nearly an hour till the first train. Going over to where the two nines were playing, I sat down on a convenient knoll, and was soon oblivious to all but the game. The catcher was the weak point in one club, and many muffs of his allowed the



THE USEFULNESS OF THE BACK-STOP DREW MY ATTENTION.

tally of the other side to run up, nothing but a back-stop preventing the ball from landing in a pool of water.

The usefulness of the back-stop, which was both high and heavy, drew my attention to it. It looked strangely familiar, and I drew closer and soon recognized it to be the sideboards of a gondola nailed to upright posts.

This fact interested me more, and going around to the rear, my astonished vision was greeted with the sight of the letters "A. G. S." in white, but nearly effaced, and on the end of the boards, "13,781."

In a few minutes, I learned that the boards had been purloined by enthusiastic lovers of baseball from an old, demolished car. Getting my informant to accompany me, I went to the spot, and found that from the spur track another spur had been built, at one time, to a coal-shaft, now abandoned and full of water.

By questioning the track foreman, I found that the old shaft had caved in one night, taking with it several rods of the switch. The hole was filled with water some twenty feet deep, and was perhaps a hundred feet in diameter.

Close inquiry elicited the fact that the track had been filled with cars, though none had gone down, as was thought, when the end sank in the cave-in. Thinking differently, I secured a pump from a near-by mill, and, connecting it with their steam plant, started the work of emptying the cave-in, as such ponds are called.

After three days of steady pumping the bottom began to show, and soon the drawbar and timbers of a gondola-car were visible. When the water had been sufficiently lowered, it was quickly recognized as our lost car 13,781, though badly broken up, and in a terrible plight from lying in the mud and water for nearly two years.

A derrick was rigged up, the wrecking-car of the Chicago and Eastern Illinois was called into use, and the remains of the gondola were brought to solid ground again. Temporary rails soon got it back on the track. The back-stop was reinstalled in its original position, the car was temporarily repaired and sent home for overhauling, the mystery was solved, and my work was done.

A few months after this I was sent to St. Louis to locate car 3,002, A. G. S. It

was a box car that had left Selma, Alabama, for San Francisco, loaded with oakum for ship-calking. From San Francisco, where it had been unloaded, it was sent over to Oakland, and from there to Coronado Beach, California, with a consignment of furniture.

From there, after unloading, it had gone, empty, to Encinitos, where a gigantic powder-works is located. Here it was loaded with powder and billed to Litchfield, Illinois, the consigners being a coal company.

It had been despatched via the Santa Fe route in connection with the Southern Pacific and Missouri Pacific, and it was traced to East St. Louis with but little trouble. Here it dropped out of existence while it was being made up in the Big Four yards—at least, so far as the official record of it was concerned.

Persistent inquiry failed to locate it, and I went to Litchfield. There the books of the agent showed that the powder had been received, but in a Canada Southern car, No. 300, and that the car had been emptied and despatched to Port Huron, Michigan, as standing orders were to return to that point all empty cars of that line.

The name and number being somewhat similar, I concluded to go to Port Huron. Arriving there, I found the car had been sent to Shingleton, Michigan, just a few days before, where it was to load with shingles.

Taking the first train there, I found a sawmill and lumber-yard in the midst of a forest. I hastened to the single side-track, and I inspected the cars, half a dozen in number, half loaded with shingles. I found C. S. car 300, as expected.

A close inspection, however, revealed that on the trucks and other iron-work underneath was our company's name, as nearly all companies do mark their cars. It was easy to see that the sides of the car had been newly made and painted. The ends, however, were badly scorched, and the original boards had been repainted. The sills of the car were badly smoked. This was evidently our car.

In reply to a telegram, it was ascertained that at the time of the great oil refinery fire in the yards in East St. Louis, in the previous fall, a number of cars were burned, some being totally consumed, and

others damaged. Our car had been injured, and in the process of repairing it had been lettered incorrectly.

After the usual routine of correspondence, the car was turned over to us by the Canada Southern people, along with a bill for thirty-six dollars and eighty cents, which they had paid for repairs; and the mystery of 3,002 was solved.

Perhaps none of the many spectators and railroad men knew how near they had been to death when that car, loaded with enough powder to wipe out the city, had been in the midst of them with the woodwork on fire.

Another interesting experience in tracing lost cars fell to me in 1897. While in an Eastern city, I received orders to go at once to Gila Bend, Arizona, and see if I could locate box car 2,172 of the Mississippi Central, a leased branch line of the Alabama Great Southern. This car had been the subject of a great deal of correspondence before it had even been traced so far.

It had been in Texas, and from the Houston and Texas Central had been traced to the Toledo, St. Louis and Kansas City Railroad, thence to St. Louis again, and from there it had gone west to Nevada, where it had been loaded with silver ore.

Thence it had been back to Argentine, Kansas, to the smelter, where it had remained a month before being unloaded; and then, by a yardmaster's error, had been hilled to Yuma, Arizona, in place of Selma, Alabama.

It had broken down at Gila Bend, Arizona, *en route*, and had been set off on an abandoned spur-track almost overgrown with cactus and sage-brush. The spur, at one time, led to a quarry of quartz some three miles back, but had been abandoned.



I STRUCK OUT TO SEE WHO WOULD BE FOOL ENOUGH TO LOCATE THERE.

The locality was as desolate as a hermit could desire, not an inhabitant being within miles, and a name was given to it only because, occasionally, a stockman flagged the train. South of the bend was a sand waste—an arid desert.

Dropping off the train at this place, I was lonesome in a minute; and the only consolation I could get out of the situation was that the west-bound train would be along in three hours, and I could get back into civilization at Mineral Point, a village some sixty miles away.

Taking the track or spur switch which left the main line at the bend of the road, I walked along the ties. The rails had been removed, except for a few lengths near the track. I wandered along for half a mile through the cactus, watching for Gila monsters, rattlesnakes, and other pleasant sojourners whom I might intrude upon to my sorrow; I at last came upon what appeared to be the end of the grade.

The track disappeared at the edge of a high sandhill, evidently a formation of some wind-storm for which the desert is noted. Why, I do not know; but curiosity prompted me to climb this hill, which was some thirty or forty feet in height,

and covering an acre or more. I was rewarded only by a stretch of sand-plains covered here and there with sage-brush.

Seeing nothing of interest, and anxious to get away from the lonesome spot, I was about to return, when from behind a little sand-knoll a quarter of a mile away I saw a curl of smoke arising. Thoughtless of possible danger in this haven for outlaws and renegade Indians, I struck out to see who would be fool enough to locate there.

In what had formerly been the old quartz quarry stood a dilapidated box car, out of which came smoke; while half a dozen Piute children and an assortment of native dogs lolled in the sun. No Indians being on the war-path, I made bold to venture farther. An old squaw was tanning some kind of hide, while an old buck was stretched out asleep inside a rug of wolf-hides.

Unable to converse in their language, I confined myself to a survey of the premises; and, while the trucks and running gear of the car were buried in sand, one side showed plainly that it was what was left of Mississippi Central 2,172. The lettering and paint had completely vanished from the side exposed to the wind. An explanation from the Indians being unobtainable, I left, under the scrutiny of the squaw and the barking dogs.

Retracing my steps as well as I could

in the shifting sand, I was on hand at the spot where the train stopped when flagged. At Yuma, I wired headquarters full particulars about finding 2,172, and the impossibility of ever getting it back.

Orders came at once to burn it, and, if possible, carry away the trucks and iron. As there was not a team within forty miles, the latter was out of the question, and I wired back to that effect. Nettled by this reply, the officials sent orders to burn it anyhow. This I did, aided by six stalwart section-men. It was only our show of superior force, and our help in removing the effects of the family, that we succeeded in avoiding a fight, as Scar-faced John, the buck, was ready to defend his home.

Investigation solved the problem as to how the car got there. It is likely that, after the car was side-tracked, some one released the brake and it ran down the grade, which was sufficiently steep to carry it near to, if not into, the quarry. Then the ever-shifting sands soon covered up the track, the quarry was abandoned, and the spur closed.

The country was abandoned to the roaming Piutes, sage-hens, and the ever-dreaded Gila monsters. It became a part of the Forgotten Country, and little wonder that even a freight-car should get lost there.

TRAIN HELD UP BY A HAWK.

LITTLE did the passengers of the train going to Kingville realize that a chicken hawk was the cause of their train being delayed for something like two and a half hours, says the Rock Hill, South Carolina, *Herald*. Some time before the train was due at Lesslie Station, a citizen discovered that a hawk was after his chickens.

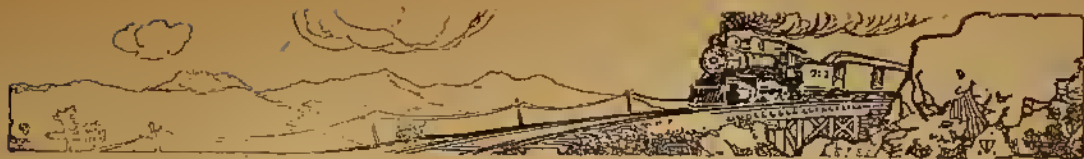
He got his gun, but before he could get a chance to shoot, it had escaped with one of the chickens. He followed the bird, which was floating along through the air like an aeroplane until it discovered one of the big steel towers of the Southern Power Company, near the railroad.

The hawk had its prey in its claws, seeking some spot where it could enjoy its breakfast. Without hesitation, it flew straight to the tower, alighting upon one of the wires, which was charged with a voltage of 22,000, still

clinging to the chicken and with the owner close behind.

But the hawk did not last long, for no sooner had its feet touched the wire when some part of its body or the body of the chicken touched the steel tower, which caused instant death, forming a short circuit which caused the heavy charged wire to burn in two.

In falling it landed on the railroad track at the crossing, which is a little way below Lesslie Station. When the train reached Lesslie Station, Captain McGuire, who was in charge, was informed of the danger that lay ahead, and after stopping the train he secured Preston Lesslie's auto and came to Rock Hill and phoned to the power plant to cut off the "juice." In a short while the train, which had been delayed for nearly three hours, went speeding on its way.



WHY BAYARD STAYED.

BY ROBERT FULKERSON HOFFMAN.

**An Engineer Declares Against High Heroics
Then Calmly Breaks the Wise Rule He Makes.**

ALL right! Have it your way. I wouldn't make bad friends with you about it."

Hutton, the front brakeman, spoke in tones of broad compassion for hopeless ignorance. His was the voice of a regret that yields much because of an encounter with an adversary that is so very wrong.

"And I'll tell you why," he added, unexpectedly losing hold of his pacific intentions, in a sudden revulsion of certainty and renewed aggression.

"Neither you nor any other man knows what he'd do in that kind of a squeeze until he's square up against it. And a lot of them don't know, then, till it's all over and the pieces have quit falling."

"Aw, what you talking about?" demanded Sunny Acre, the fireman. "You talk as though a man had no more sense than a rabbit. Nor as much, for a rabbit knows enough to hop before he's grabbed both back and front, don't he?"

"Now, that's just where your flag's faded," declared Hutton. "He's just as likely to set still till he's grabbed, as he is to hop off. And if you was a little older at the business, you'd know it."

"What business?" laughed Acre from under the vizor of his close-drawn cap. "Rabbit-hunting?"

"I'm wasting sleep on you," replied Hutton in high disdain.

Without further contention, he lounged

down upon the ballast and sunk his face in the crook of his arm.

"What are you young coddymoddies squawking about?" demanded Bayard, the engineer, in good-natured drawl, as he sat up, with slow deliberation, beside them in the gloom. "Are you too strong to sleep when you get a ten-minute chance at it?"

"Oh, Hutton, here, thinks he is educating me some," replied Acre.

"Say, Bayard, if you were to be in a head-ender right now—to-night—where you could-see the other fellow coming at us in time, what would you do after you had shut off and set the brakes? Hop right then, or stay on and fiddle with the lever?"

Sunny's eyes were very bright, his face was very young and brave-looking, his blouse and overalls were stiff and new—hardly smudged, in fact—and so, while they had lain waiting in the silence of the mountain-top, under the brilliant studding of the stars and a low quarter-moon, he had fallen into Hutton's old, pet discussion.

Meanwhile, Bayard, with his head upon a tie-end and his weary body stretched upon the stone ballast of the road-bed, had slept—briefly, but well—beside them, in the deep shadow of his silent engine.

Bayard, forty-eight years old by the calendar, and twenty years old at engine-running, was a man of slow speech and reputed wisdom. For all of the twenty

years he had deliberately avoided giving the answer to that question of staying or jumping, although each new fireman—and nearly every new brakeman—had asked it in turn.

And now, he did not answer it as propounded by Sunny Acre. Instead, he arose leisurely and, after a wide-spread yawn, with his face to the sparkling sky, shook himself fully back to the joy of living.

He walked, slipped, and stumbled agilely down the slight bank of loose sandstone ballast, then climbed a pace or two, until he stood before the clear rill of mountain water that fell in cool drippings from the near-by rocks. He drank his fill from the half shell of a coconut, and laid it carefully, edge downward, in its accustomed niche of rock.

Then he looked at the pair of deeper shadows that marked the now reclining and silent orators in the shadow of the engine; listened to the far, faint murmur of the first section of opposing freight laboring up from somewhere down in the pass; looked up again at the wide, star-lit expanse of summer sky, and knew that he was going to answer Sunny Acre's question squarely, then, and from the depths of his soul.

For the world that he knew best—that great, silent, starlit world—was good to live in, and he would answer accordingly.

"What would I do?" he repeated at length in deep and measured tones across the short intervening space.

The shadowy figures of Hutton and Acre at once sat bolt upright by the engine.

"I've side-stepped that question long enough to give every man on this division that wants it a chance to hold up the traditions of the high heroic. And now I'm going to answer it for my own account," Bayard continued without prompting.

"If I was to be in a head-ender to-night, or to-morrow, or any other night or day, I'd shut off, set the brakes, reverse on general principles—and climb off.

"I'd jump as far clear of the engine as I could and keep on end, run as fast as I could, and keep on running until I got arrested for violating the speed limit,

got knocked down, or until kindling quit flying.

"And," he added with much deliberation, "if I had time, I'd surely advise you fellows to do the same. But I wouldn't wait a second longer to see whether you were coming with me.

"Now, if you will write that on the roundhouse call-board, first time she's clear, I'll sign it. Or you can tell Windy Lou, the wanderer, and that will have the same effect of publicity.

"But don't you get any wrong idea from that. Always do what you can before you unload—but unload quick when you need to."

That was the sum total of Bayard's unexpected declaration, and, resisting all enticements held out by the promptly renewed wrangle of Hutton and Acre, he bared his well-thatched gray head to the cool of the night and withdrew into his habitual silence as precipitately as he had emerged from it.

No specious plea against that final precious help that may possibly be drawn from careful reversing at the last, even though the brakes be fully set; no clever application of the theory of increased coefficients of friction at slower speeds, as Acre had newly coined it; no begging of the question as to whether it is the running of the first twenty, or the last twenty feet, after brakes are set, that causes the slaughter in collision, served to incite Bayard to further discussion.

His position was clear and final.

Do what you can for others, for your train, and for yourself. Shut off, warn, jump, run, and keep on running!

It did not sound at all heroic; barely civil, in fact. But Bayard, quite composed and quietly happy in his work and his surroundings, climbed aboard in due time, after the meeting and passing of the first freight section was accomplished, read his latest order once more, for certainty's sake, and started for the bottom of the pass, with a clear conscience and a track supposed to be equally clear.

He caught the top buttons of his corduroy coat into place as the night breeze grew keener with moderately increased motion—corduroy was the one visible foible of Bayard—and he lifted his stout corduroyed leg to his favorite position, astride the nicely balanced reverse-lever,

and settled comfortably to the business of running down the curving grades.

Hutton and Acre, hunched up together on Acre's seat-box, were still debating with unflagging zeal. They had not arrived at a conclusion when the engine reached the bottom of the pass and struck into the rather sharp left curve, around the base of the mountain.

On Acre's side of the engine the vertical rock-wall continued close to the cab-window. On Bayard's side the first funnel of the valley lay wide and smooth with range-grass. There they met the second section of freight, without note or notice, coming to them at a spanking pace on the single track.

It is of no present consequence how they got there, perhaps, except that Bayard was running correctly on his order and the other crew had misread the meeting-point. And so the meeting-point having been suddenly transposed without notice, while Hutton and Acre were busy with their own opinions on the obstructed side of the engine-view, it was Bayard who first caught the rocking gleam of the coming headlight and voiced a brief warning.

"Jump! This side!" he shouted, and that was all, except one short bark from the whistle, which the other engine instantly echoed, in kind.

For the rest of it he thrust the throttle shut upon the thread of steam which he had been using, toward the level, swept the brake-valve to its fullest duty, as his hand fell from the throttle and, with his feet still astride of the quadrant, and one of them resting upon the strong steel footrest which projected from the side of the quadrant, he pulled the lever back sharply, released the latch and, attempting to get to his feet, lunged half out of the window, intending to swing his feet up and leap clear.

Instead of leaping, however, he turned hastily back, after one longing, straining glance at Hutton and Acre fleeing safely under the quarter moon, across the range grass, and then he attacked the reverse lever fiercely, in the effort to reset it elsewhere in the quadrant.

That was the last fleeting view Hutton and Acre had of him, struggling in writhing outline, against the dim cab-lights, until after all was over.

They stood watching, with shortened breath, as the great, shadowy hulks of the engines bore down resistlessly upon each other, while little jets of fire spurted from the grinding brake-shoes upon the wheels all along the cars crowding up darkly from the rear.

Sunny Acre's arms were unconsciously stiffened in grotesque arcs like those of a frog's front legs in poise for leaping, and his outspread fingers were set wide and separately as extended claws.

Hutton, close beside him, ankle-deep in the brown grass, leaned forward, open-mouthed, in that last moment when the senses of the onlooker undergo a sort of palsy, and colliding engines deceptively seem to halt just before striking.

Then, with a brakeman's last resort when all else had failed, he let go a piercing, quavering yell that was swallowed up in the crash of the impact, leaped once, straight up from the ground, and started racing back toward the grinding and smoking jumble in the half darkness on the tracks.

All of it was very briefly done. The opposing pilots thrust their steel-shod noses together, crunched and crumpled; headlight glasses fell shattered and clinking upon the crushed forward decks; the muffled roar of collapsed front-ends followed, and the front-ends lifted from the trucks, a little space, like belligerent goats in their first preliminary of battle, then settled, jerkily, down.

The dull rumble of the suddenly stayed trains quickly subsided in both directions, and these things were about all that marked the occasion in the usual way, except that the erring freight-crew had leaped and run, and had joined Hutton and Acre, at a safe distance, before the broken glass had ceased falling.

Bayard was the one unaccountable unit of the whole transaction. When the four fugitives had come hurrying back and climbed upon Bayard's engine, they found him standing bolt upright, in almost military severity, except that his feet were astride of the quadrant and his hand was upon the top end of the reverse lever. He was chewing a stub of match stem and looking, with a faded sort of smile, out into the dimly lighted valley.

"Matter, Bayard? Did it get you?" asked one of them, in kindly concern,

while yet clambering up the distorted engine-step.

"Nope," replied Bayard serenely.

"Then, why in Cain didn't you unload?" demanded the same voice.

"We're in bad enough. No use scaring the souls out of the rest of the gang, is there?"

"Say," exclaimed Bayard, with sudden testiness of speech, "I wouldn't worry any about that, if I were you. I'm on my beat, all right, ain't I?"

"I was 'staying by her,' understand? 'Brave engineer stayed at his post,' eh?"

"Now, you fellows had better climb your own engine, and we'll see if we can back 'em apart. Then you can begin to figure out how you got here on my time."

Through it all, Bayard stood firmly erect. He maintained his clutch upon the reverse lever and his clench upon the match stem, until the others had departed, and only Sunny Acre was left in the cab with him.

Then Bayard's heroic pose underwent a sudden change. It gave place to feverish activity.

"Sunny," he commanded in quick, insistent undertone, "grab hold of this reverse lever, and help me throw it over forward!"

"The left leg of these cursed corduroys is caught and jammed between the lever and the quadrant, and I could neither tear loose nor throw her."

A lusty pull or two from Sunny, with his back to the boiler-head and his foot upon the end of the seat-box, added to Bayard's earnest but cramped efforts, did it, and Bayard stood free, examining his traitor garment.

"That's why I 'stayed, Sunny. And, if you ever tell it, you're no friend of mine."

"I tried hard enough to get away, but this stuff I'm wearing is too good for the job."

With that, Bayard rolled both legs of his overalls up above the knees, searched out his pocket-knife, and carefully amputated both corduroy trouser-legs, just below the knees. He was anything but a heroic figure as he kicked the severed parts free of his feet, and rolled his overalls down to place.

Sunny, thawed out of his fright, and well into the reaction, clung weakly to the throttle fulcrum and laughed while he wept.

Before Bayard added his efforts to those of the other engine-crew in backing clear of the tangle, he opened the fire-box door, tossed the discarded sections of torn corduroy into the still flourishing fire, and quickly latched the door upon them.

This is the how and the why of Bayard's staying at his post. That is to say, staying longer than to others seemed necessary. Yet, Bayard is quite as good as the best men who ever ran locomotives, and he never shirked a duty because of danger.

It may also show why, when he made his next trip out on the road, and thereafter, Bayard wore anything that suited his fancy, except corduroy. And, if Sunny Acre had not shamelessly broken the embargo of secrecy, which Bayard placed upon him, Bayard's real reason for staying might never have found its way here.



Riding the Rail from Coast to Coast.

BY GILSON WILLETS,

Special Traveling Correspondent of "The Railroad Man's Magazine."

ONE of the many readers of THE RAILROAD MAN'S MAGAZINE recently wrote to us, "If I could tell stories like Gilson Willets I would die happy." We wish that, by some magical power, we could gratify our correspondent's desire, so far as the first part is concerned; but, after all, the telling of a story—at least, such stories as Mr. Willets writes—is not the whole thing. It is *hearing* them.

We dare say that Mr. Willets *heard* hundreds of stories while riding the rail which were only good enough to forget. Willets *knew* a good story when he *heard* one. Being a good writer, he knew how to repeat it. Our readers get the benefit.

No. 12. — IN THE LAST OF THE TERRITORIES.

The Rise of "Vermont"—Getting the Widow's Third Son—Making "Ash Fork" Buy—Tackling a Toro—A Rattlesnake Alarm-Clock—Flooding a Jail—and Others.

DOWN in Tucson, Arizona, in 1880, the Southern Pacific's representation in trackage, yardage, and superstructures was not so imposing as that of to-day—of course not. Yet, even at that time, C. P. Huntington had planted a sufficient number of railroad adjuncts in Tucson to cause the town to be regarded, throughout southeastern Arizona, as truly metropolitan.

It was only natural, then, that this Arizona metropolis should be the first town in the Southwest to form a lodge of the Brotherhood of Locomotive Firemen.

After Mr. Huntington gave the town the railroad adjuncts aforementioned, a

station, some shops, an engine-house, and a coal-bin, the number of railroaders in the place was some considerable.

And it came to pass that one day late in the year 1880, one of the "adjuncts," namely, the coal-bin, bore a newly posted sign, reading:

A meeting of the locomotive firemen of this division will take place in this hall this evening, for the purpose of initiating a new member. Firemen who believe in sticking together will please note that the starting time is seven o'clock.

Within the "hall," amid the black diamonds and the dust thereof, about a dozen men in overalls and jumpers put in an appearance at the appointed hour.

They took their seats on cracker-boxes, barrels, and whatever else came handy,

Series began in March, 1909, Railroad Man's Magazine. Single copies, 10 cents.

and then with great solemnity the ceremonies opened with remarks from the master, who said:

"Gents, the thirteenth member of this lodge is now to be received into our fold, and our brand put onto him. The sergeant-at-arms will kindly bring in Frank Sargent, commonly known on this division as 'Vermont.'"

And that's how, where, and when Frank Sargent joined the Brotherhood of Locomotive Firemen. You all know the name, because Frank Sargent, within five years of his initiation at Tucson, became grand master of the brotherhood, and, later, Commissioner-General of Immigration of the United States, holding that post when he died in September, 1908.

"Vermont" Gets His Start.

About six months previous to that night when the brand was put onto Frank Sargent in the coal-bin at Tucson, a man of twenty-six summers walked into the yardmaster's shanty at Tucson and asked Yardmaster Mant for a job.

"Well, son, what do you know about railroadin'?" asked Mant.

"Nothing at all, sir. I've just spent five years tendin' stock and shooting Apaches, about harf and harf, sir."

"Harf and harf, eh? Not half and half. You from 'way down East?"

"Yes, sir—Vermont."

"Well, Vermont, what *as* have you been tendin' stock and shootin' 'Paches? Cowpuncher?"

"No, sir. United States cavalryman, at thirteen dollars a month."

"Well, Vermont, if you allow you can begin at the bottom here, you can stamper yourself over to our engine-house and wrestle with cotton-waste in the way of wipin' engines, at forty dollars a month."

And that's how, when, and where Frank Sargent became a railroad man, beginning as engine-wiper at Tucson. He was so quick in learning everything about a locomotive that in six months he became a fireman and a member of the local lodge of the brotherhood.

And Frank Sargent became grand master of the brotherhood after only five years' experience as a railroad man. That is easily understood, however, if you listen

to stories they tell at Tucson of how Sargent, or "Vermont," as he was known down there, acquired the popularity among firemen that led to his election, in such short order, to the highest office within the gift of the brotherhood.

The Tucson men will tell you that very soon after Sargent quit wiping to fire an engine, a man named Snelling loomed up in Tucson, riding the rods, and was accosted by "Vermont" thus:

"What's the sense of being an outcast. Snelling, a fine fellow like you, when you can be a real man among men? The job of wiper in the engine-house is vacant here and now, and if you say the word you can have a chance to make a man of yourself."

Snelling took the job, became ultimately a fireman—and throughout his life would have given his heart for young "Vermont."

Once a fireman named Garner chucked up his job and mounted a horse to ride away into the desert.

"I'm tired of railroadin'," Garner said to "Vermont." "I'm going to hit the trail for Globe."

"Oh, you'll come back, all right," said "Vermont" with conviction in his voice. "You'll want your job back, same as soldiers always went to reenlist. I've heard many a bunkie say, at the expiration of his enlistment, that he would not come back. But they always came back, all the same."

Garner Came Back.

"Now, I'm going to arrange with Yardmaster Mant for you to come back on your own job and your own run, any time within four months. I'll tell Mant you're hitting the trail as a sorter vacation—see? I reckon two months' vacation will be your limit, Garner."

"And say, I want you to do something for me up at Globe. There's a widow up there named Halpin. She's one of the bravest women in Arizona. She's got three sons, and all three of 'em, together with the widow, are crack shots."

"Many a time, after they had been besieged by Apaches at their cabin in Superstition Mountain, I've ridden up there with others of my troop, to clean out the enemy, only to find that the wid-

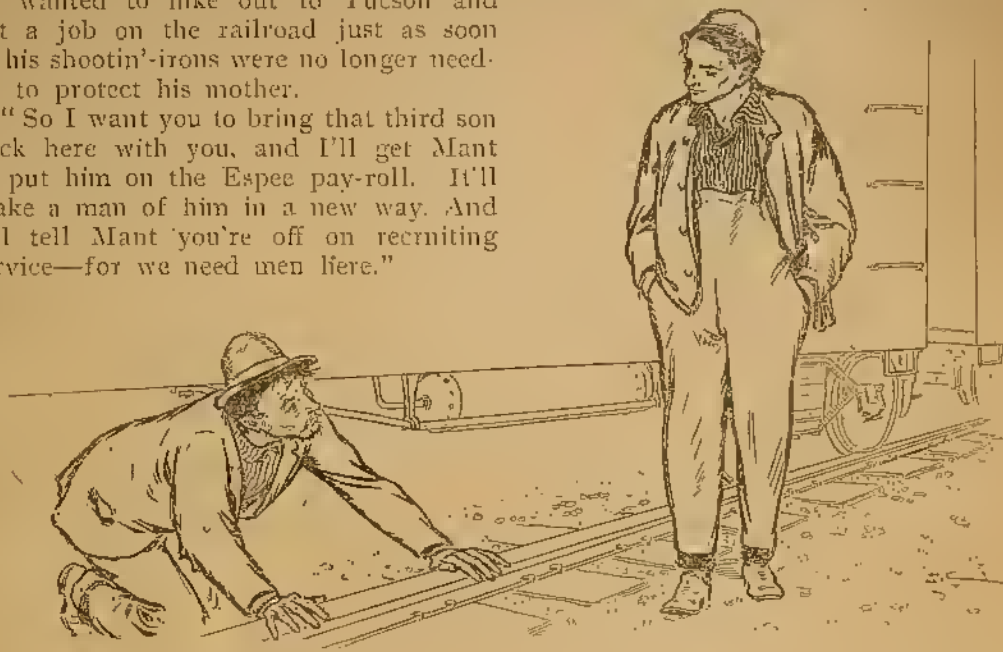
ow and her sons had been standing off the Apaches for days and made the Indians think that about two dozen sharpshooters were in garrison in that cabin.

"Well now, Garner, two of those sons have married and settled in Globe, and the widow is living there, too. But the third son is still scot-free of petticoats. He used often to say to me that he wanted to hike out to Tucson and get a job on the railroad just as soon as his shootin'-irons were no longer needed to protect his mother.

"So I want you to bring that third son back here with you, and I'll get Mant to put him on the Espee pay-roll. It'll make a man of him in a new way. And I'll tell Mant you're off on recruiting service—for we need men here."

Wheeler presently got to dabbling in copper-mines, leaving Mrs. Wheeler in town to run the shop.

The bride gamely took up the work, drummed up trade, sold trappings to the teamsters who hauled ore-wagons to and from the mines, and even invented and patented a new kind of hame and col-



A MAN NAMED SNELLING LOOMED UP IN TUCSON.

Two months later, just the time named in "Vermont's" prediction, Garner rode back into Tucson, and with him came the third son of the Widow Halpin. Garner got his own job and his own run back, just as "Vermont" had promised, and young Halpin was put to wiping in the engine-house at forty a month.

This made two more friends for "Vermont." And it is with no end of stories of this kind that the men of Tucson illustrate for you how "Vermont" Sargent gained the popularity that put him at the head of the Brotherhood of Locomotive Firemen after he had been rail-roading only five years.

Mrs. Wheeler's Store.

Thirteen years ago a man from Rochester, New York, and his young bride—Mr. and Mrs. Abram Wheeler—came to Tucson and opened a harness-shop.

lar for teams of six horses or more hauling ore.

"That there is a plucky little woman," said Foreman Joe Harrington, formerly of the engine-house, but now of the shops.

"She deserves to succeed, and what I allow is that it is sad and sorrowful that us railroaders don't need harness and so make business for the little woman."

Soon after that a boss teamster from the mines drove into Tucson with an eight-horse team hitched to an ore-wagon, the harness on the outfit being in shreds and tied together with ropes in a makeshift fashion.

"Had a accident with these pestiferous horses," announced the boss teamster, Ash Fork Pete. "And now I'm goin' to telegraph to El Paso for new harness, waitin' here till the same comes up on the train."

Harrington and the boys who heard

this looked at one another significantly—and forthwith went into executive session with the following result:

When Ash Fork Pete stepped into the telegraph office at the station to send his wire to El Paso, some twenty of the Tucson railroad men, headed by Harrington, advanced upon the telegraph office in a body, and their leader stepped up to the teamster and said:

And "Ash Fork" Bought.

"Ash Fork, we have decided that home industry is worthy of the patronage of all outfits headquartering along this railroad. For those who gallivant round this metropolis of Tucson in particular, we recommend a certain harness-shop as is attended to capable by Mrs. Wheeler.

"And what we have come to concerning this matter is, that folks that send needless to El Paso for harness trappings is like to find this metropolis some malarious hereinafter.

"You sees, we don't have no call for sich harness, we being railroad men. But when we finds others as do need it, we proposes to steer 'em on the trail of Mrs. Wheeler; she has hames and collars good as any from El Paso, and they can be had without sending her no telegram."

"But I don't want no home-made hames and collars, gents," speaks up Ash Fork Pete.

"Yes, you do, Ash Fork!" Twenty guns were flashed into sight. Surrounded by those twenty guns, Ash Fork was marched to the harness-shop of Mrs. Wheeler, and not permitted to issue forth until he had purchased what he needed.

In the Greasewood.

In its flight across Arizona, my train was held up twice. The first was at a tank station in the desert, and there we stood for three hours, all because of something unheard of in the East, but common in the Southwest.

There was not a drop of water in the tank. That would have been nothing serious, had there been any gasoline with which to pump water. For the lack of a spoonful of oil we could not budge.

The second involuntary pause was in

the greasewood, miles from nowhere, between Mescal and Benson, and a wreck ahead was the cause. Here we stood for seven hours.

I was glad of both these delays and the chance to roam around in the greasewood, because in these periods of train idleness I had long talks with Old Man Streamer, old-time cowboy and railroad-cr. He was one of the excursionists in the special train behind us, which, when we stopped, poked her nose right into the platform of our observation-car.

The special was carrying a large number of Southwesterners to Mexico City, a one-way fare for the round trip. With the stopping of the trains, the passengers from the two trains commingled, to pass the time away with rambles on the desert.

"I shore am enjoying the big delight at meeting you," said Old Man Streamer, in greeting. "I'm traveling *this* away now as a towerist, I being out for a holiday on that towerists' train yonder, bound for Mexico City. But days I've traveled *that* away, though," and he indicated the men in the caboose of a freight that was stalled near our own trains.

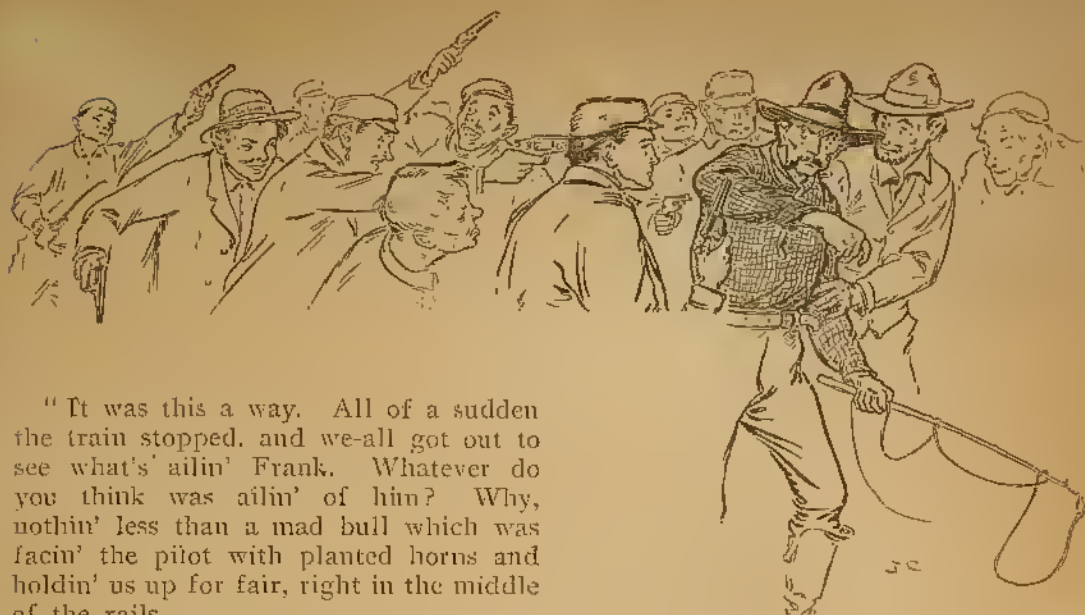
Old Streamer Chews the Fat.

"Yes, son, after I quit cow-punchin' I went to railroadin', and stayed at it till I got some sixty-three wrinkles on my horns. I saved the money instead of straddling it over the Territories like these yere softthorns you see around on railroads, and by savin' that away I'm able now to travel as a towerist and see things leisure-like before I close my lids for the life everlastin'."

During that stop in the greasewood I strolled around with Old Man Streamer, listening to his endless chain of tales, until he finally said:

"Let's camp right yere, son," seating himself on the 'dobe and lighting his cob pipe. "And I'll tell you, before I forgit it, about my friend Frank Baker and how he come to be a bull-fighter.

"Frank's a engineer on the Colorado Midland. I was traveling on his train only a few days ago—out of New Mexico, and going up Buena Vista way—when Frank allowed the time had come when he ought to turn toreador.



"It was this a way. All of a sudden the train stopped, and we-all got out to see what's ailin' Frank. Whatever do you think was ailin' of him? Why, nothin' less than a mad bull which was facin' the pilot with planted horns and holdin' us up for fair, right in the middle of the rails.

"That son of a sea-cook gored a track-walker down a piece," says Frank. 'I saw the gorin', I did, and now here he is standin' us off.' With that Frank ups and heaves some coal at the toro, but the toro acts like he enjoys the festivities, and swishes his tail and snorts like he's saying as how he'd like to chew somebody's mane.

In the Matador Business.

"I'll fix that cow," swears Frank, jumping off his cal and advancing on the mad bovine with his fireman's shovel in his hand.

"That ain't no cow," says Alf Hogan, the fireman. 'That's an infuriated male head of cattle.'

"I know it," says Frank; 'an I intend to turn this yere desert into a bull-ring.'

"Frank charges the bull just like the matador in the ring, using the shovel for a sword. Also the bull charges Frank—with results and consequences mighty painful to Frank. That bull pushes his horns into Frank enthusiastic, as if he meant to feed and bed down on engineers the rest of his life. But that hope was cut short by a shot from a gun in the hands of Hogan, the fireman.

"We picked Frank up, decernin' that he was some unnatural from the gorin' he'd had. But I'm a Mex if Frank

"SURROUNDED BY TWENTY GUNS, ASH FORK WAS MARCHED TO THE HARNESS-SHOP."

weren't game, all the same. 'Lift me onto my cal,' says he instanter, minute he come to.

"And hanged if he didn't seize hold of the throttle and set out to run that train to Buena Vista! But soon he falls off his box in a dead faint from loss of blood, and the fireman has to take the train in.

"We carried Frank to his teepee on a nice little reservation that he had staked out for to live on, and we thought he was sure to come abreast of the bright and shinin' gates before night.

"All the same, he *did* have a hard pull for life. And I allow that the next time his train is stood up by a mad bull, with the blood hunger, Frank Baker will remain in his cab, instead of goin' forth to play matador."

"Highpocket's" Rattler.

"'Nother friend of mine," continued Old Man Streamer, while still "camped" on the 'dobe, "is a Santa Fe engineer out of Lamy, New Mexico. He's a rattlesnake fancier, he is. His name is Highpocket Smith.

"One day, while lolling on a lonely sidin', Highpocket sees a wounded rattler, and out of sheer good nacher to-

ward wild animals, Highpocket picks up the rattler and carries him home and nurses him back to health and long life.

"And it's Gospel I'm tellin' you, son, as any railroader in New Mexico will tell you, that Highpocket never had to say, 'How sharper than an infant's tooth it is to have an ungrateful serpent.' That rattler showed his gratitude—he did.

"One night Highpocket awoke out of

"The plan was this: Looping himself around Jerry's bedpost, the rattler put his head in the watch-pocket of Jerry's vest, and the minute six o'clock ticked the rattler rattled his rattles till Jerry woke. Yes, son, you just ask Jerry. He'll tell you he's got the cheapest and best alarm-clock on the whole Santa Fe system."

The Old Man remained silent awhile, during which time I neither spoke nor



"FRANK CHARGES THE BULL, USING THE SHOVEL FOR A SWORD."

a sound sleep to hear rattlers rattling right beside his bedside. He jumps up, follows the windings and twistings of the rattler's body through the house till he comes down to the dining-room, where he sees the snake's body coiled round the body of a burglar, holdin' th' burglar hard and fast so's Highpocket could nab him.

And Jerry Woke Up!

"And then there was Jerry Muskovitz, rodman on the Santa Fe, working at Belén, New Mexico. Jerry was a snake lover too, just like Highpocket, and he, too, rescued a rattler in distress. The snake followed Jerry home, and lived with him a whole lot. And that time when Jerry got jacked up for not showin' up for work early enough of mornin's, the rattler got to thinkin' how he could help his benefactor, and at last hit onto a plan.

barely breathed, for my experience has taught me never to ask an oldster a single question. After a while, as I had banked he would do, the Old Man cleared his speaking-valves and opened up again:

"But, serious, son, have you ever heard of Black Jake, the train-robber? Sure you have. I knowed it. Well, Black Jake was the only man in the Southwest that ever induced me to quit my job voluntarily and take a vacation.

"He made me lose a lot of pay, Black Jake did; and when I think of the money I might have saved while taking that vacation in his behalf, it makes me nauseated.

At Third-Drink Time.

"Black Jake was for awhile the terror of all trainmen in these Territories. He robbed trains right and left, first on the Santa Fe, then on the Espee, and we never knowed where he'd show up next.

He'd ride into a cow town at first-drink time in the evenin', take a swig of nose-paint, then go out and stand up a train and return to the joint in time for a bit of nose-paint at third-drink time.

"He was absolute fearless, Black Jake was, and he swore he'd never be taken alive, him bein' one of those gunmen that could shoot off the hip.

"Well, I had a friend, a pardner he sure was to me, who was express messenger on the Santa Fe. His name were Willyum Klaber, and he was as absolute fearless as Black Jake or any other bandit known to us boys.

"So when, one night in June, some eleven or twelve years gone now, when Black Jake and his gang held up the Santa Fe Overland train west of Gallup, New Mexico, and ordered Willyum Klaber to fork over the sack of gold and currency that was there present, Willyum Klaber whips out his gun and begins lettin' fly permisc'us.

"The next time I saw Willyum he was dead, of course. For Black Jake attended to him instanter on the occasion when Willyum refused to obey the bandit's orders. Black Jake on that occasion also dynamited the express-car and got the sack of gold and currency.

Lure for Bandit-Trailers.

"Immediate, the Santa Fe posted five thousand dollars reward for Black Jake, dead or alive. Well, son, that reward brought more bandit-trailers and professional takers of train-robbers to New Mexico and Arizona than we ever sees in these Territories before or since. I reckon there was fully a hundred men, working independent and in posses, tryin' to run down Black Jake, dead or alive."

"It was then that I myself knocked off work on the line, and allowed I'd devote a vacation to takin' Black Jake and earnin' that five thousand. Black Jake had killed my bosom partner, Willyum Klaber. I would avenge Willyum, and scoop in the reward shore, too.

"So I outfits and sets off on a mustang, gallivantin' round the uninhabited regions of Arizona along the line of the Arizona and New Mexico Railway that runs up to Clifton, Arizona, where it was said Black Jake and his gang retired

after standin' up the Overland that time at Gallup.

"I cavorts around, bushwackin' in and out of cow towns at first, second, and third drink times, but never a smell of Black Jake do I get. Finally I hears that he has been trailed to some place mighty near to Clifton. I had been on the trail and off it for some six weeks then, and I was dead sick of the job of avengin' Willyum and tryin' to earn that reward. But I decided that I'd make one more try up Clifton way to get Black Jake.

Cornered at Last!

"After three days in the saddle, I rides into Clifton, red-hot on the very heels of Black Jake—only to hear one of the hundred professional bandit-takers employed by the Santa Fe say:

"'Good news, Mr. Streamer. Black Jake is in that prison at Clifton that's hewed out of the solid rock, and is one of the most unique prisons in this or any other country. I presume, Mr. Streamer, that congratulations are in order from you, you bein' particular friend to Willyum Klaber, the same havin' been slaughtered by Black Jake—since I am the one who landed Jake prompt in the stone wickiup.'

"Oh, yes, son; I congratulated that feller, you believe. The hour bein' second-drink time, I allowed it was in order to proceed to the joint in the Red Light and there clink the crystal in token of his glad news. We clinked, and then I hiked back to the rails, resolved never again to quit wages to avenge some friend, not even if I found another Willyum Klaber.

"Concernin' of that same prison that's hewn in the solid rocks at Clifton, I'll come again, and then I guess I'll get back to my fellow towerists, which has arsked me to set in a game of poker.

The Clifton Bastile.

"Before proceedin' with what I'm now opening up on, I must paint you a picture of that prison. It is composed of three big cells forming the letter 'T,' the same having been blasted out original by a mining company for the incarceratin' of miners that were needin' punishment.

"The prison has for entrance a 'dobe hut that stands not ten feet from the tracks of the Arizona and New Mexico Railway. The tracks of the railway run along there between the entrance to the prison on one side and the San Francisco River on the other.

"Close to the 'dobe hut that forms the entry to the prison there is a switchman's hut, and another hut where the prison

the spring of 1891 the San Francisco River cut loose and flooded things permisc'us. It riz and it riz, till it reached the 'dobe huts at the entrance to the prison. It riz—that is, so quick-like—that it carried off the guard and all but drowned the switchman.

"I think it pretty safe to say that in all my born days I never see a river that riz as high as that one.

"In the mornin', while the flood was still ragin', the switchman, he bein' perched on top of the 'dobe hut at the entrance to the prison, became aware that some men of the town of Clifton, on the opposite bank of the river, was tryin' to attract his attention.

"The switchman watched, and presently he sees a big sign—a board—raised on high, bearing these words writ with charcoal by the Sheriff of Clinton:

"Get Friday out of the Balliwax."

"Friday, son, was the lone and only prisoner then in the jail, he bein' in durance vile for seekin' to make his fortune by standin' up a train of the Arizona and New Mexico Railroad.

"The switchman, accordin', now swims down track to dry land, and tells the miners there what the sign across the river says. The miners then takes dynamite and jumps up to the rock prison and sets to work to blast out the prisoner, Friday.

"They puts a charge into that cooler that would have blown up a town, making a hole big enough to crawl through.

But Friday Came Not.

"Come out of the Balliwax, Friday,' the miners and the switchman cry in chorus. But Friday came not, neither did he show up to take advantage of his blessed liberty.



"IT CARRIED OFF THE GUARD AND ALL BUT DROWNED THE SWITCHMAN."

guard lives—that guard's principal work bein' to pass food through the bars of the prison window—bars fastened in the rock on the face of the cliff—to the prisoners.

"On the prison side of the river is mostly the prison and the mines. On the other side of the river is the town of Clifton. Now, have you got all that fixed in your mind?

"If so, I may proceed to state that in

"So inwards step the miners and the switchman, to find Friday, wounded and unable to move, all on account of the flying-stone effect resultin' from the blast.

"'Look here, you-all,' moans Friday, 'what do you mean by trying to kill a man in order to save his life?'

"And now, son, did I say that would be about all? Well, this here poker-game I'm scheduled to set into has reminded me of just one more. And as the trains give no sign nor signal smoke of breaking camp, I allow there's time for me to frame up this supplement.

"The poker-game reminds me of the hand Marshal Moore drew up at Phoenix, recent. One of the railroad boys up there phoned Moore to come to the station on a run, and capture a lunatic that was bucking and prancing around loose, and was frightening away possible patrons of the Maricopa and Phoenix Railway.

"Moore hikes down to the depot, and the boys there put him next to a Mexican known in the town as Miguel Ceres. Miguel now looked tame enough to eat out of the hand of almost anybody, and, in reply to all Moore's questions, he answered rational-like and sane.

Dotty Dialogues.

"'This yere ain't no lunatic,' says Moore contemptuous, addressing the boys.

"And Moore turns to go. Just then up springs Miguel and tags after Moore, shouting: 'What did you do with all those women?'

"'What women?' asks Moore.

"'Why, all those ladies you sent up in a balloon from this depot larst night?'

"Well, son, Moore annexed that Mexican prompt. But before he could get away from the depot, one of the boys out of the ticket-office came runnin' up to him, sayin':

"'Marshal, some one wants you on the telephone.'

"Moore goes to the wire and hears some one ask him to come at once to a certain teepee in Phoenix and take possession by right of eminent domain of a crazy man. The marshal thereby pinches himself to make sure he's not in a dream or sufferin' from the treemers.

"Decidin' that all's well with him to date, he takes the lunatic Miguel in tow

and perambulates the nearest route to the teepee at the street number mentioned on the wire. He enters the teepee and finds a Mexican lying on a cot and other Mexicans standin' round, cryin':

"'Take him prisoner, marshal. 'This is Antonio Flores, and he's got a fire in his stomach.'

Accordin' to Hoyle.

"Moore questioned Antonio, and Antonio answered accordin' to Hoyle.

"'This ain't no crazy man,' announced Moore resultin'ly, turnin' to depart.

"But just then the Mexican on the cot cried out:

"'Oh, this fire in my stomach. I am only a stove and some one has lighted a fire inside of me.'

"'Are you a fire-eater?' asked Moore.

"'No, *señor*, but I'm the fire-box of a locomotive and soft coal is making a blaze inside of me.'

"Hearing the which, Marshal Moore heaves a sigh, despondent, and gathers in Antonio Flores alongside of Miguel Ceres. On the way up the street, he entrusts his two charges to the care of the man at the cigar-stand while he calls up the sheriff's office an' says:

"'I'm sitting in the lunny game lively this morning. I open the pot. I've drawn a *pair*.'

After the seven-hour wait in the greasewood, we pulled on eastward through Benson, Cochise and Bowie in Arizona, then to Lordsburg, New Mexico, where passengers connected with the Arizona and New Mexico Railroad mentioned by Old Man Streamer—that road running up to Clifton, Arizona.

A Dead Sheep.

By the time I had passed through the New Mexico town of Deming and began running over the tail-end of the division into El Paso, I was in possession of many stories of railroad life in the last of the Territories—of which the following are given here as the most interesting:

On the Santa Fe Railroad south of Santa Fe, a train having Engineer Reardon at the throttle was nearing the Arroyo Chamez. It was late in the af-

ternoon of July 15, 1908. As he rushed northward toward the arroyo, Reardon saw a dead sheep lying on the right of way.

"Looks like he'd been drowned," Reardon shouted to his fireman.

"Yes! Think the arroyo is spilling over," replied the fireman.

Pretty soon they passed another dead sheep, and then a third.

"There was more than one animal in that arroyo when the spill came," said Reardon, slowing down. They passed two more dead sheep, and then Reardon stopped dead, remarking that a little investigation was in order.

Sixty Cents a Sheep.

Reardon hated to stop his train, for he knew that every such stop cost his company sixty cents, that being the estimated expense of bringing a train to a full stop and of accelerating the speed again to normal. Multiply sixty cents by every dead sheep you pass and it will amount to many dollars in time. Nevertheless, Reardon decided that so many carcasses were nothing less than a warning of something unusual going on at the Arroyo Chamez.

"What I want to know is, how did these carcasses get here?" he said.

"It's mighty wet hereabouts," said the fireman. "Looks like the arroyo had been sending a gush of water down the line."

And as the two men advanced on foot to investigate, lo! a wall of water was seen approaching—a sight that made them scamper back to their cab. The water rushed by, flooding the floor of the cab and putting out the fire in the engine.

The water subsided quickly, however, and when Reardon and others of the train crew walked up track again to investigate, they found hundreds of dead sheep. Moreover, they found that some three hundred feet of track had been washed away this side of the arroyo, also that the trestle over the arroyo was gone.

"Cloudburst!" announced a track-walker. "It'll take twenty-four hours to relay track and reopen communication by rail with Santa Fe, so you fellows might as well hit the hay."

"It's good I didn't mind spending sixty cents to take a peek," said Reardon, with a self-satisfied smile.

A Terrific Tank.

The most novel load ever hauled by rail was under the direction of Emmett Stansel, foreman of bridges and build-ings, with the assistance of engine 0155, Engineer Weedon, and Conductor Mike



"CALLS UP THE SHERIFF'S OFFICE AND SAYS:—

Murphy, all of the New Mexico division of the Santa Fe.

The novelty of the load lay in the height and width of the thing hauled. It was as high as eight ordinary men. It was as high as that four-and-a-half-story office building in Albuquerque. It was as wide as a city lot. It weighed 60,000 pounds.

"It was one of our standard steel tanks," said my informant. "Now, if you want something clumsy to wrestle with in the freight-traffic way, just you attempt to move that kind of a tank four miles over two curves with an elevation of five inches—for that's the distance we moved that big tank and such were the conditions of the same."

"Our foreman, Emmett Stansel, sure knew his business. He first lifted that tank off its foundation. Then he raised it up with jacks, till it was high enough in the air for us to back two steel flat cars under it. When the tank was all braced and fastened down, an engine was hitched on and the novel moving took place successful—from Springer to the new Springer yards.

"Queerest load I've ever seen, and

turing no end of desperate criminals. In July, 1908, he had been in Williams three years, becoming a successful boss contractor.

One day a stranger walked up to Frank Sherlock and asked for a job. After a second look at Sherlock the stranger said, "How!"

"How!" answered Sherlock, peering sharply at the stranger. Without another word from either of the men, Sher-



—"I'M SITTING IN THE LUNY-GAME LIVELY THIS MORNING. I OPEN THE POT. I'VE DRAWN A PAIR,"

I've been in the traffic department of the Santa Fe ever since we hauled the first train through New Mexico thirty years ago. Nothing could get by the train pulling that tank, you bet, 'cause we occupied about all the right of way there was, our load being some twenty-four feet wide, the diameter of the tank, and forty-three feet in the air. It was the clumsiest package of freight the Santa Fe or any other road has ever had to carry."

Meeting Sherlock.

Before coming to Williams, Frank Sherlock had for eight years served as deputy sheriff of Mojave County, cap-

lock put the stranger to work under his own eye.

In two weeks, however, Sherlock discharged the new hand—for good reasons. Two days later the stranger was seen holding whispered converse with one of the youngest of the Arizona Rangers, named Woods. On the third day Woods rode up to where Frank Sherlock was directing the operations of his men, pushed a pistol into Sherlock's abdomen and exclaimed:

"You're under arrest—Charlie Bly!"

"No necessity for the shootin'-irons," said Sherlock, or Bly, quietly. "That discharged skunk has been talking to you, that's easy to see. I guess you've got me, kid."

The next day, Conductor Osgood, on the Overland, punched a ticket that read: "From Santa Fe to Williams." To the holder thereof, Osgood said:

Bringing Him Back.

"Hallo, Captain Christman, you're going some way from your corral. Important business?"

"Yep! I'm making passenger traffic for this road. Bringing back a prisoner."

Next day Conductor Osgood, now east-bound from Williams, again went through his train on a ticket-punching tour and again found Captain Christman, who this time held two tickets, each reading: "From Williams to Santa Fe." With Christman was Frank Sherlock.

"Good Lord!" exclaimed Osgood. "You don't mean that your prisoner is that contractor at Williams!"

"Sure thing!" replied the captain.

"This man that you respect as Frank Sherlock is Charlie Bly, who rode away from the pen in our Territory eleven years ago on the warden's horse.

"An ex-convict from the same prison whom Sherlock, alias Bly, employed a few weeks ago and then discharged, recognized him and squealed on him in the car of that ranger, young Woods. At Williams they told me that they intend to petition for a pardon for their fellow townsman—since for eleven years he has lived an exemplary life."

"Well say, cap," remarked Conductor Osgood, "railroadin' in these parts does make queer bedfellows. I hope, with the rest of the boys, that the yap that squealed on Sherlock, gets *his*."

They told me a fair one, down there in New Mexico, of the man who was assistant general passenger agent of the Santa Fe in 1906, H. K. Gregory. Gregory

has his office in the Ferry Building, San Francisco, and in a darksome corner of his office, during the chilly time in December, he placed an oil stove.

Within two days the floor space roundabout that oil stove became a gathering place for those railroad men in the building who sought surcease from the ills that cold feet are heir to. On the third morning in walked an assistant-assistant general passenger-agent, and glibly said:

"Gregory, I'd like to know where's that oil-stove I've heard the boys blow about?"

And then, without waiting for Gregory to reply to his question, the assistant-assistant stalked to the dark corner of the room where, prior thereto, he had been in the habit of occupying, a certain stool, and sat him down—only to jump up with a yell of terror, pain, and dismay.

His countenance sicklied o'er with the pale cast of repressed thought. Assistant G. P. A. Gregory of the Santa Fe asked:

"Did you find it?"



HE FOUND IT.

The little⁷ things in life are the hardest to bear. For example, the call-boy.—From a Tallow Pot's Diary.

THE DAUGHTER OF THE IDOL.

BY JOHN MACK STONE.

Several People Disappear, and
One of Them Does Not Like It.

SYNOPSIS OF PREVIOUS CHAPTERS.

ROLAND BURKE is a young boy sightseeing in San Francisco during a visit to his uncle, Richard Engle, a famous explorer. While standing on the dock he is alarmed by a crowd of struggling men rushing down the street, evidently pursued by the police, and in his astonishment is hustled into the boat for which they are making. One of the men, who is struggling with the others, is kidnaped onto a vessel, and Roland, though unobserved, is also unable to escape. The ship puts out, defying the forts. On the boat he is discovered by Ruth Holland, who also seems to be there against her will, and who seems quite familiar with Richard Engle, though there seems to be some misunderstanding between them. In her cabin Ruth is annoyed by a man named Welch, who seems to have some power among the cutthroats. Engle interferes.

Captain Hawson interferes against the persecution of Engle by Welch, and Welch shows his power by deposing the captain and making him a prisoner. The captain joins forces with Engle, the boy, and Miss Holland. They attempt to recover the ship.

They are captured again, but the captain manages to communicate with a United States cruiser by means of a wireless apparatus in a secret alcove in his cabin. He then puzzles the mutineers by hiding Miss Holland in the alcove.

CHAPTER XIV.

We Create Mysteries.



WAY hurried the man.

Welch closed the door and sat down on one of the heavy chairs near it.

"Go back to the bunk," he ordered me.

That order pleased me most. The revolver Captain Hawson had taken from the captured guard was in the bunk, beneath the blanket.

I lay down, and pretended to sob. Welch seemed sick and weak, and once he arose and opened the door and glanced down the passage to see whether the man was coming back. As he did so, I slipped the revolver from beneath the blanket, and put it in my hip-pocket.

In the next cabin Captain Hawson was cursing and trying to get free of the men who guarded him. He had heard Welch threaten to torture me, of course, and was

evidently trying to do something to postpone the torture.

When the spokesman returned, Welch left him to guard me, and went in to see Captain Hawson.

"Will you tell me what you have done with the woman?" he asked.

"I will not."

"Then we'll torture the boy until he tells."

"You cowardly cur!" the captain screamed. "Let the boy alone. Try to torture it out of me."

"I think the boy will be easier," Welch said, laughing.

"You have no right to torture the boy," the captain said.

"If you insist, we'll torture you first," Welch replied angrily.

"It will do you no good," the captain said.

"We'll see," Welch cried. "There is nothing in the law to prevent me torturing you. You have given us enough trouble. Why did you cut that hole in

the cabin wall? What have you done with the woman?"

"Are there any more questions?" demanded the captain, laughing mockingly.

Welch cursed, and ordered the men to seize him. When they had him in the passage, taking him to the temple-room, where the great aitu sat on his throne, the spokesman left me and went out and locked the door.

Welch was so intent upon the torture that he forgot one thing—he had left the door of the captain's cabin open, thinking no one was in there, and the hole was still in the wall.

Captain Hawson fought them all the way down the passage. As soon as they had gone some distance, I crept to the hole and peered through. There was no one in the captain's cabin, and I crawled into it, and ran to the door and looked out. There was but one man in the passage, and, as I watched, Welch called to him, and he went into the temple-room.

I ran back to the panel. "Miss Ruth!" I whispered.

"Is that you, Roland?"

"Yes."

"What are they doing?"

"They are trying to make Captain Hawson tell where you are."

"You must let me out," she said. "Enough have suffered for my sake already."

"I cannot do that," I answered.

"Let me out, Roland; please. They must not torture him."

"I cannot let you out, Miss Holland," I replied. "They will kill you at sunrise if I do."

"But we must not let them torture the captain to save me," she said.

"The captain would blame me if I let you out," I said. "And Uncle Dick would always blame me."

"But we must try to do something," she said.

"Wait!" I implored.

I ran to the door and looked into the passage again. All the men were in the temple-room. I went out quietly, and hurried in the other direction until I came to the third cabin. There I knocked softly on the door.

"Who is there?" my uncle's voice asked.

"It is Roland, Uncle Dick. Can you

break out? They are torturing Captain Hawson to make him tell where he has hidden Miss Holland. I have a revolver, and there is no one in the passage."

"Stand to one side," he directed.

I stepped to one side, and heard him walking around in the cabin. Then there was a crash as he hurled himself against the door, a second crash, and the lock snapped and the door burst outward. Uncle Dick stood beside me.

The noise of the breaking door had been heard by those in the temple-room, and now they came pouring into the passage to see what it meant. With Uncle Dick at my heels, I dashed into the captain's cabin, and together we slammed the door shut and threw the table and heavy chair against it.

"Quick!" I cried to Uncle Dick.

I ran to the panel and opened it. "Quick! Get in with Miss Holland!" I whispered. "That will puzzle them more. You cannot fight out here."

I half pushed him into the alcove.

"Dick!" I heard Ruth Holland say, and I saw him take her in his arms just as I closed the panel.

The men were hammering at the door, forcing it open. I ran to the hole in the wall, crawled through, and threw myself on the bunk. Just as I did so, the door of my cabin opened, and the spokesman hurried in. He looked at me, made a peculiar noise in his throat, then went out again. I heard him calling for Welch.

As I lay upon the bunk, I heard the men jabbering in the captain's cabin. Welch's voice was raised in anger. Presently he came in to me.

"You helped your uncle to get out of his cabin," he said.

"What if I did?" I retorted.

"Where did you put him?"

"He is not in here."

"He is somewhere near. The men saw you enter the captain's cabin. He's with Miss Holland. Where are they?"

"I have said they are not in this cabin," I said.

"Will you tell me where they are?"

"No!"

He called two of the men, and they led me down the passage toward the temple-room. There seemed no help for it now. Torture awaited me, unless there was a chance for me to use the revolver.

The men left the captain's cabin, all except one left behind as guard, and followed us. I was not used kindly as we made that short journey down the passage. Welch grasped my injured arm tightly, so that the pain almost made me cry out: but I did not give him the satisfaction of hearing me do so.

Captain Hawson was standing just inside the temple-room door, a man on either side of him. They stood me near him, facing the altar.

"Will you tell what you have done with your uncle and the woman?" Welch demanded again.

I saw Captain Hawson's face light up when Welch mentioned my uncle.

"They are together," I replied, to tell the captain what had happened. He flashed me a look of commendation.

"Tell me where they are!" Welch cried. "I have done with your nonsense. I'll take your life-blood from you, drop by drop, unless you tell!"

"I will not tell," I replied.

Welch turned to one of the men who was working at the foot of the steps. "Get the hot iron!" he commanded.

My uninjured arm was free. I reached to my hip quickly, and got a grip on the revolver. The man started toward me with the iron, a wicked-looking instrument, white-hot.

My hand came up quickly, the revolver in it. I fired, not at any one of them, but into the roof of the cabin.

The shot had the desired effect. The men guarding us, astonished at the shot, stepped aside for a moment. That moment was all we needed. I found the captain beside me in the door, found that he was grasping the revolver, tearing it from my hand.

"Back to the cabin!" he cried.

I took him at his word, and, turning into the passage, raced back toward the cabin. He came after me, firing once more as the first head showed at the temple-room door.

But we ran into more trouble as we reached the cabin, for the man left behind as guard rushed at us. Captain Hawson fired again, this time with effect. The guard toppled over in the passage, and the captain grasped his revolver and ran on.

The others were coming down the

passage now, uttering cries of rage, urged on by Welch's screams and curses. We dashed into the cabin and slammed the door. The captain handed me my revolver, and retained the one he had taken from the guard he had wounded.

"Into the alcove!" he commanded.

The door swung back! We sprang in, and the panel closed again. We heard the others crash into the cabin, shrieking wildly, and we heard their exclamations of consternation when they did not find us.

"Keep quiet," the captain whispered to us. "This is a mystery that will cause them some annoyance."

I felt some one's arm go around my shoulders, felt some one's lips brush my cheek, and heard Ruth's voice say:

"Boy! Boy!"

And then a stronger arm was thrown around me—Uncle Dick's. And in the position we were standing it must have been around Ruth Holland, too.

CHAPTER XV.

We Capture Welch.

WE heard Welch come into the cabin.

"Where are they?" he demanded.

"They are gone, master," the spokesman replied.

"Gone where?"

"I do not know. When we entered the cabin they were gone. We saw them run in here."

"Search the cabins!" Welch commanded.

We heard them rushing about, opening and closing doors, running back and forth through the passage, and to the deck. After a time all of them returned.

"We cannot find them, master," the spokesman said. "They are gone; they have vanished. We do not like this sort of business."

The men were muttering among themselves.

"Silence!" Welch commanded. "What do you fear? They came into this cabin, and therefore they are some place aboard the steamer. There is no mystery about it at all. They simply have some hiding-place that we have not discovered. Search again."

We heard Welch tell the spokesman

to leave a guard on the cabins, and that he would have the ship searched from one end to the other. The men went away, and there was deep silence. But Uncle Dick whispered to me to remain absolutely silent, for one of the men might be inside the cabin listening.

The alcove was very small, and we began to grow weary. The air was getting foul, too. It was daylight outside now, and the sea had calmed, for the steamer did not roll and pitch as formerly.

While we huddled there in the alcove there was a tiny flash behind us, and that half-distinct crashing which I had heard before when Captain Hawson worked at the wireless. Now he uttered an exclamation under his breath.

"What is it?" Uncle Dick whispered.

"It is the cruiser calling," the captain said. "I gave them a private signal when I was talking."

"Are you going to answer?" Ruth asked.

"It is risky business."

"But they may have something important to communicate," Uncle Dick put in.

"I'll run the risk," the captain said.

We changed positions as noiselessly as we could, so that he could get to the keyboard. Then he reached for the key and answered the call.

His answer was acknowledged, and the message came. He whispered it to Ruth and I, for Uncle Dick could read it for himself:

CAPTAIN HAWSON.

ON BOARD STEAMER FARAWAY:

Cruiser will make island as rapidly as possible, and land marines to protect you if you are already prisoners ashore. When do you expect to arrive at island?

Captain Hawson reached for the key and replied:

Faraway should reach island within forty-eight hours. How near are you?

We cannot reach island for at least three days.

The captain tapped in reply:

Make it as soon as possible. Two of us are doomed to execution as soon as we are landed, but we'll try to detain them.

"O. K." wired the cruiser, and then the communication was broken.

No sooner had the message been finished than we heard Welch's voice in the cabin again.

"What was it?" he was asking.

"Some peculiar noise, master, so the guard says," the spokesman replied. "He was standing in the center of the cabin when he heard it. It seemed to come from the wall."

"What sort of a noise?"

"He said it sounded like tapping, yet not exactly like that either. He is becoming afraid. All of the men are becoming afraid. These things must be explained soon, master, or there will be trouble. If the men begin to fear—"

"There is no cause for fear," Welch said. "We are still searching the ship. They are somewhere on board."

"But what is to be done, master?"

"Go up and take command of the ship. My wound weakens me," Welch said, "and I'll remain here on guard."

"You want a man with you?"

"Leave one man," he instructed.

We heard the spokesman go away, heard Welch talking to the one man left behind. He was trying to convince the man, Captain Hawson whispered to me, that our disappearance was not due to any supernatural power.

Another hour passed, an hour in that stuffy hole, with its foul air and its distressing heat. We were huddled so close together that we could scarcely move.

"If we only had more room," Captain Hawson said once, "I'd try another little trick."

"Cannot one of us leave?" Uncle Dick asked.

"Not Miss Holland, for she is doomed to die as soon as they find her," the captain replied. "The boy cannot go, for they will torture him. They will torture me, too, and you, Mr. Engle. I fail to see how any of us can leave in safety."

"What is the little trick you want to play?" Uncle Dick asked.

"I want to capture Welch," the captain answered.

"And frighten the men to death?" Miss Holland asked. "Is that your idea?"

"Yes."

"But how will we gain anything by

doing that?" she asked. "They would only hurry to the island all the faster."

"When superstitious men are frenzied by queer happenings, they make mistakes," the captain said. "A little mistake, made at the right time, may save us. If we could only remain in the alcove until the cruiser arrives—"

"That is impossible," said Uncle Dick. "It will be three days, and we'll have to get out of here within the hour. The air is foul already."

"We'll have to fight for it, then," the captain said.

"Then we'll fight for it," my uncle replied.

"But what can we do?" the captain demanded. "If we could slip from the alcove without any one seeing us, and let Miss Holland remain here, with your nephew, all would be well. We don't want to betray Miss Holland's hiding-place."

They ceased speaking, for Welch was tapping on the panel. It was evident that he had either heard us whispering, or had suspected the secret alcove. His investigation seemed to tell him nothing, however, for we heard him leave the wall and go back to the chair.

"I am growing faint," he said to the guard. "Go to the medicine-chest and get me liquor."

The man hurried away. "Now is your chance," my uncle whispered to the captain.

Captain Hawson touched the spring, and the panel slid back noiselessly. In a flash he and Uncle Dick were upon Welch's back, and, while Captain Hawson bound him, Uncle Dick inserted a gag in his mouth.

CHAPTER XVI.

We Receive a Surprise.

BEFORE any of us could make reply, we heard the guard hurrying along the corridor. I'll never forget the look on his face as he entered the cabin and saw the four of us sitting against the wall under the port-hole.

He had a bottle of liquor in his hand; and, when he caught sight of us and saw that Welch was missing, he dropped the bottle on the floor. Then, with an ear-

splitting scream that would have done credit to an Indian on the war-path, he fled up the passage.

We waited in silence, while a chorus of cries on the deck above warned us that the guard had aroused all the crew. They came pouring down into the passage, with the spokesman at their head. He came to a stop just inside the door, the others grouped about him. His eyes bulged; his hands shook.

"You have come back?" he gasped. None of us made reply.

"Where were you? What has happened? Where is the master?"

He shouted the questions at us as swiftly as his lips could form the words. And none of us made reply.

"Why don't you speak?" he screamed. "Are you human beings, or ghosts?"

It was an unlucky word for him to speak. The men behind him looked once, screamed once, then fled up the passage again, shrieking at each other.

"Come back! Come back!" the spokesman shouted at them in English. Then, realizing that they could not understand, he shouted at them in his own language, and they came back, one at a time, silently, staring at us with fearful eyes.

"Where did you come from?" the spokesman demanded of the captain.

"We've been in the cabin all the time," the captain answered.

"Where is Mr. Welch?"

"I am not keeping track of Mr. Welch," replied the captain. "Perhaps he is on deck."

"He is not on deck—he was here watching the cabin."

"Is that so?" the captain asked, smiling.

The spokesman took another step into the cabin. "However, now that you are here, we'll attend to business," he said. "There is a certain duty to perform, and it is already an hour past rise of sun."

"You mean the execution of this young lady?" the captain asked.

"Yes."

"Then there will be no execution. Miss Holland has reconsidered. She is ready to apologize before the great *aitu*, and to go on with the ceremony. Something displeased her before—that is why she refused to be betrothed."

The man's face lit up. What his people most desired, he knew, was the marriage of Welch to Miss Holland.

"What you say gives me great joy," he said. "The ceremony shall be completed at once. I will have you escorted to the temple-room, and will send a man to search for the master. Perhaps he was taken ill and retired to his cabin."

So we were taken down the passage and to the temple-room again; and there Uncle Dick, Captain Hawson, and myself stood against the wall as before, while Ruth went to the front of the steps and stood ready and waiting.

The man returned with the intelligence that Welch was not in his cabin and could not be found. Another man was despatched; and he, too, returned to say that Welch had strangely disappeared.

The spokesman seemed puzzled. "Why do you not go on with the ceremony?" the captain asked him. "The great aitu will be displeased if you postpone it again."

"The great aitu must have mercy," the spokesman muttered. "There can be no ceremony until the master is here to do his part."

"Then let us go on deck and get fresh air," the captain said. "Send your guards along. The troubles of the night have left us worn out. Miss Holland must have fresh air and rest, or she will not be able to continue the ceremony when your master is found. The wound on her arm, made by the hot iron, has sickened her. Do you want her to be ill when the island is reached?"

His words seemed to bother the fanatic, for he ordered the men to take us on deck and to serve us breakfast there. Then the search for Welch began again.

We really enjoyed those two hours on deck, after being confined below in the alcove, and I never relished a meal as I did that breakfast. We talked of ordinary things, for the guards were always near us; and, after we had finished eating, we sat back near the wheel and watched the sunshine play upon the sea.

At the end of the two hours the spokesman came to us, and addressed Captain Hawson:

"Did you see anything of the master? Where were you hiding? Why did you show yourself again?"

"I haven't time to answer questions which do not concern me," the captain replied. "Are you going to continue the ceremony?"

"We cannot until the master is found."

"Then you'd better hurry up and find him. The great aitu will be angry."

The spokesman hurried away, crying out his orders to the others. Another hour passed; and the guards, squatting on the deck near us, prevented conversation except on ordinary topics. Finally, however, when some of them were called away to attend to other duties, we found that we could talk without being overheard.

"What is to be our next move?" Uncle Dick asked.

"If we could get control of the ship—" the captain began.

"You cannot," Uncle Dick replied. "Even if we conquer the men on deck, the engine-room force will learn of it and will not obey your orders."

"But we may be able to delay the ship, to give the cruiser a chance to overtake us," the captain said.

"If we could do that—" began Uncle Dick.

"We can try," said Captain Hawson.

"Have you a plan?"

"We have two revolvers. Mine has five cartridges in it. How many has yours, Roland?"

"Two, sir," I replied.

"And we failed to get the one on Welch," the captain said. "That is what comes of being in a hurry."

Ruth Holland smiled at us. "I was not in such a hurry," she said. "I have Welch's revolver. I took it while you were putting him in the alcove. He was trying to hide it."

"Good girl!" the captain cried.

"There are six cartridges in it," she said.

"That makes thirteen shots in all, an unlucky number," the captain put in.

"Unlucky, but perhaps not for us," said Uncle Dick. "Now, what is your plan?"

"Let Miss Holland hand you the revolver she has when none of them are looking," he replied. "We'll have to make a fight for it. They'll be careful not to harm Miss Holland, but the rest of us will have to take our chances."

He explained his plan at length, and then we arose and started forward, as though we were ready to go below again. The guard got up lazily to follow us. Two other men moved toward us across the deck.

"Wait," the spokesman cried when he saw us. "I am not ready for you to go below yet."

So we walked on toward the fore-castle, for it suited our plans. Presently we found ourselves forward of them all, with nothing between us and our old barricade near the bowsprit.

"Now!" Captain Hawson cried, and we made a dash for it.

Those on deck realized our purpose instantly. Before we had gained security the bullets were flying about us, but none of them found a human target. We got down behind the barricade without firing one of our precious shots.

The spokesman came running across the deck toward us.

"What do you mean?" he cried. "What are you doing up there? I am ready for you to go below now."

"We don't care to go below, thank you," the captain said. "We prefer it up here."

"I'll send my men for you!"

"You'll send your men below, and go with them, and remain there," the captain said sternly. "Do so at once, or we open fire!"

"You have no weapons," the spokesman cried.

"You see one," replied the captain, holding up his revolver.

"If you don't come down I'll send the men after you!"

"Send them!" retorted the captain.

The fanatic cried out an order, and the men swarmed toward us. It looked like the old battle over again. When the nearest man reached the barrier, the captain fired, and the man fell. The others retreated, but secured places of safety, and from their new positions rained shots at us.

"Down, all of you," the captain ordered. "Let them waste their ammunition."

In a few minutes the firing ceased, and we looked over the barrier to see what was taking place.

"I give you one more chance to come

down!" the leader cried. "The great *aitu* commands it! Death is to be preferred to dishonor, and dishonor will be my lot unless you are conquered. So come down, or I'll burn you out—burn the ship with you—go out with you to meet the great *aitu* in eternity!"

He held a firebrand in his hand, and as he spoke he waved it above his head.

"Will you come down?" he cried.

"No!" Captain Hawson answered.

"Then I'll burn you out!"

"You'll never live to apply the torch!" the captain cried.

He stood up, and leveled his revolver at the spokesman, meanwhile watching the others. One of them fired, and the bullet whistled past the captain's head.

He dodged behind the barrier.

And at the moment he dodged the spokesman gave a scream and ran forward with the burning brand in his hand. I saw it tossed above his head, saw it fall at the bottom of the mass of rope and sail-cloth. The flames sprang out, caught the cloth, and began to eat their way toward us.

Then some one staggered forward from the stern.

"Fools! Fools!" he screamed. "Put out the fire!"

It was Welch.

Whipped into action by his words, the men sprang forward to obey. They threw the burning cloth into the sea, threw the rope after it, stamped out the flames. And while they did so we watched without offering violence, glad that we had again been saved from death, and wondering at the appearance of Welch on the deck.

We did not have to wonder long, for he was a natural hoaster.

"The next time you put a man in an alcove," he said, "be sure that there is nothing there on which he can saw his bonds in two, and be sure the panel is so strong that even a wounded man cannot crash through it!"

CHAPTER XVII.

Fair Speech and False Action.

AT first the full significance of what Welch's escape meant did not strike us. It was the spokesman who,

running across the deck eagerly, his face lit up with a smile, anxious to correct himself in the eyes of the man he called master for having set the fire, first brought to us a realization of what it meant.

"Master, master," he cried, "the woman will go on with the ceremony. Now that you have returned to us!"

Ruth gave a little cry when she heard him speak, and I heard Captain Hawson curse softly to himself.

"Now there'll be a lot more trouble," Uncle Dick said. "This will be the fight of fights."

Welch was talking to the spokesman, but we could not hear what he was saying. Captain Hawson decided to take the initiative, and standing up behind the barricade he called to those below.

"Miss Holland absolutely refuses to go on with the ceremony, which is repugnant to her," the captain said.

"Then she must die immediately," the spokesman answered.

"There are three of us here, well armed," continued the captain, "who will fight to the death to protect Miss Holland. I serve notice upon you now, that if we are molested we shall shoot. Moreover, we are going to make an attempt to get control of the ship again, and after one minute has passed we'll fire on any one within range who tries to oppose us."

Welch turned to the spokesman and talked rapidly in the man's own language. Then they both went aft, and we saw no more of them for some time. The steamer continued on her way, rushing through the golden sea, carrying us to the strange land where there was nothing to expect but death.

"What do you think they will try to do?" Ruth Holland asked of Uncle Dick.

"It is hard to tell," he answered. "Welch will try some bit of strategy, that is certain."

"Yes," the captain said. "But you forget some things. While Welch is angry enough to try any cruelty, and though he wants to keep in the good graces of the fanatics by pretending to honor the laws of the great aitu, yet he does not wish to see Miss Holland executed. If he conquers us now, and

we are captured, he will have no excuse for not ordering her executed immediately."

"You think we'll not be molested, then?" my uncle asked.

"I think we'll be allowed freedom until the island is reached. We ought to reach the island by to-morrow morning, and it is now almost noon."

Another hour passed, and then Welch appeared again, carrying a white cloth fastened to a stick. He stopped directly beneath us.

"What do you want?" Uncle Dick asked.

"To talk with you. May I come up?"

"Talk from where you are."

"I don't want every one to hear," he said.

"Then one of us will come down," the captain said. "But see that you try no tricks, for if you do you'll never get aft alive."

"I'll try no tricks," Welch said.

Uncle Dick looked at the captain.

"You go," he said.

Captain Hawson left the barricade and went to the deck below, and stood within a few feet of Welch while he talked. Uncle Dick held his revolver ready to use in case of treachery. Although they spoke in low tones, the wind carried their words to us.

"Will you go to your cabins?" Welch asked.

"And be captured?" the captain demanded.

"I'll see that you are not molested until the island is reached."

"I'm sorry, but I cannot rely on your word," replied the captain.

"Certainly you know," said Welch, "that I do not seek Miss Holland's death, and will do anything to prevent her execution before the island is reached. I have consulted the aitu before the men, and have told them that it is better to let matters rest until we are at the island and the high priest can judge you all. The men have agreed to that."

"How do we know it is not a trick?" the captain asked.

"You'll have to take my word for it. If you'll go to your cabins as prisoners, you'll be treated with every courtesy until the island is reached. There the high priest will judge you."

"You expect us to give ourselves up to death without a struggle?"

"There is no way for you to escape," Welch replied. "From what possible source could help come?"

"Perhaps even now it is very near," the captain said.

"I'd advise you to go to your cabins. You'll not be harmed while on board ship. We will leave everything to the high priest."

"We may retain our weapons?" the captain asked.

"Of course I cannot allow that."

"Then we cannot think of returning to the cabins," the captain said firmly.

"With weapons you may make an attempt to regain the ship."

"And without them we would be at your mercy absolutely. I think we'll remain where we are."

"Just as you please," Welch said. "You'll not be molested until we reach the island, anyway. If you think you'll be more comfortable up there—"

"We'll feel safer at any rate," laughed the captain.

"I'll send food to you in an hour or so."

"Thank you," replied the captain, with mock courtesy. "And the food, I presume, may be eaten without any ill after-effects."

"You think I'd poison it?" Welch demanded.

"My dear sir," said the captain, "I think you'd do anything on earth to gain your personal ends. This interview should be terminated here, I believe. Why prolong it?"

"As you please," Welch said again. "But you'll be hungry before the island is reached."

"We had a very good breakfast."

"But we'll not reach the island until noon to-morrow."

"Then you are not sailing the ship right," the captain said. "You should be off the island at break of day."

"If you are afraid I will poison the food, perhaps you will be willing to go yourself to the galley and pick it out," said Welch. "There is a young lady in your party. It is not kind to her to unake her suffer from lack of food."

"You expect me to walk into a trap?" the captain asked.

"Certainly not," he answered. "I give you my word of honor that you'll not be molested."

"Your word of honor?" laughed the captain.

"I have tried to do the right thing at this juncture," Welch said. "You'll not accept the food I offer to send, and you'll not go for it yourself."

Captain Hawson turned and looked up at us, then faced Welch again.

"Will you clear the deck," he asked, "and allow us to go to the galley as we please to get this food? Will you send all of the men below and go yourself, and let one of us guard the companion-way while another reaches the galley from the outside?"

"Yes," Welch answered.

"Very well. Then, do so."

Welch turned back to speak to the men aft, and the captain returned to us and told his plans. When the men had gone below Welch called to us, and remained standing near the mast.

"Mr. Kingle, I think it better for you to remain here and protect Miss Holland," the captain said. "I'll take Roland with me."

"Do you not fear a trick?" Uncle Dick asked.

"I think we can take care of ourselves," the captain answered. "At the first sign of treachery I'll send a bullet through Welch, and this time it will be the last wound he'll ever receive."

"Very well," said Uncle Dick.

The captain started down, and I followed him, each of us holding a revolver. Welch awaited us near the mast, and when we approached him he turned and led the way aft, to show us that his intentions were good.

At the head of the companionway he stopped for a moment.

"Go below, and into one of the cabins," the captain directed. "At the first sign of treachery there will be trouble."

Welch did not reply, but went below. I stood guard as the captain directed, watching to see that none of the men came up. Captain Hawson went to the man at the wheel, and searched him for weapons. Finding none, he went on to the galley.

Once or twice I looked forward, but there was no one on the deck. There

was only the one way the men could reach the deck forward, and with Uncle Dick watching there it was not likely that any of them would try it.

Just once I looked toward the stern. The man at the wheel had his eyes on the open sea, and so I turned from him and watched the companionway, wishing that the captain would hurry, for I did not feel at all comfortable.

How many minutes passed I do not know. But suddenly I heard the captain's shout: "Look out, boy!"

I whirled toward him. The man at the wheel had lashed it, and had crept upon me. As I turned he sprang, hands outstretched, straight at my throat.

As Captain Hawson rushed toward me across the deck, fearing to shoot because his bullet might strike me, I threw my revolver up before me and fired.

The man crashed to the deck at my feet. Captain Hawson reached my side at the same instant. From below, and from forward, came a chorus of screams and cries. I heard Uncle Dick's revolver speak, saw the fanatics swarming onto the deck forward and charging at the barricade behind which my uncle and Ruth Holland were entrenched.

And then I became aware that the captain was screaming something at me, and that more of the men were charging toward us up the companionway.

"With me, Roland! It was a trick, after all!" the captain cried.

We each fired one shot into the midst of the swarm of men rushing up toward us, and then we started to flee aft. If we could reach the stern, and drop down the side and into the galley through a port-hole, we would be safe for a time, and could at least make a defense.

Several bullets flew by us as we ran. But by dodging from place to place we escaped harm. We dropped over the side safely, the captain leading the way. He reached up to help me, and we got through the port-hole and into the after-cabin. A short run through the aft-passageway, and we would be in the galley. They would have a hard time dislodging us there.

But we were not able to reach the galley. Some of the men were still in the passage, and seeing who we were they opened fire. Welch had evidently told

them that the great aim would be pleased if the captain and myself were slain. It was only Uncle Dick, because he was doomed to execution, and Ruth Holland, because they wanted her to wed a priest, that were exempt from present death.

There was no time, then, to reach the galley, and we dare not remain in the passage. The captain dashed before me and fired, and the nearest man dropped without a sound. The others held back.

"The first door!" Captain Hawson cried.

He fired again to cover our advance, and I crept through the passage at his heels, looking back to watch the companionway. We reached the door in safety, and turned from the passage into the cabin. The captain threw the door shut.

"Bolt the door!" I screamed.

"There is no lock on this door," he replied. "We are in their temple-room."

He struck a match, and by its light we beheld the priest on guard before the altar creeping upon us. Captain Hawson covered him with the revolver, and he held out his hands to show us that he could do no harm.

"Up the steps!" the captain cried to me.

Once more I found myself at the foot of the idol, behind the draperies. Captain Hawson remained at the bottom of the steps, holding the priest before him. In the passage outside the cabin arose a bedlam of voices. Some one threw open the door and showed a light.

"Back!" the captain cried. "When the first man enters I kill your priest!"

CHAPTER XVIII.

A Battle in the Temple-Room.

"YOUR uncle cannot hold out long," the captain said. "He has only the one revolver and no extra ammunition."

"And we have only two shots left, sir," I said.

"You are wrong there," he said. "When I went to the galley I did not look for food, but for ammunition. My pockets are filled with cartridges."

He handed some of them to me, and

I filled the cylinder of my revolver, and put the remainder in my pockets.

A few minutes passed, and then we heard the spokesman in the passage outside.

"Will you come out and surrender?" he demanded.

"No," the captain cried.

"Then we'll come in and take you."

"If you open that door, I'll kill your priest," the captain cried. "I'll kill him at the feet of the *aitu*!"

Screams and curses answered the captain's speech, for the spokesman translated it to the others. There was silence for a time, and then the leader spoke again.

"Miss Holland and Mr. Engle are in our hands. Unless you release the priest and come into the passage immediately, they shall die!"

"I do not believe you," the captain said.

"You do not hear any more firing on deck, do you? I say they have been conquered and are in our power. Will you come out?"

"No!"

"Then your friends shall lose their lives."

"Very well," the captain replied.

"You still doubt that they are in our hands? I'll convince you," the spokesman said.

He gave a command in his native tongue, and the captain whispered to me that he had told some of the men to bring my uncle and Ruth Holland to the passage. It was true, then; they had been taken.

The captain seized the priest again, and put his revolver at the man's head to prevent him crying out. Then we bound him with ropes and gagged him, and carried him up the flight of steps and laid him across the *aitu*'s great wide lap. He made a peculiar noise in his throat.

"He is begging the *aitu* to save him," the captain said.

"What are we going to do?" I asked.

I did not relish the idea of my uncle and pretty Ruth Holland being slain because of the captain's stubbornness.

"Keep your eyes open, and follow me," the captain said.

We went to the top of the flight of steps, crawled around the narrow ledge

of the pedestal upon which the *aitu* sat, and dropped down behind in the darkness. Then I saw that there was a hollow space beneath the steps, and that from the front of it we could peer out and see the entire interior of the cabin between the *aitu* and the door. It was a small space, but large enough to fire through. And the steps served as a formidable barricade.

"Wait, and make no noise," the captain said.

In a short time there were steps in the passage, and the words of the spokesman came to us again.

"Will you come out?" he cried.

We did not answer. "I have your friends here, to convince you that I have not been speaking untruly," he went on. "They shall speak to you."

We heard him command my uncle to speak, and there was no answer. My uncle was not the man to give himself readily to the work of a decoy.

"You speak to them, woman," we heard the spokesman say.

Still no voice came to us. Then one of them must have seized her in an effort to make her cry out, for we heard her scream; and it cut into our hearts like a knife. And at the same time we heard my uncle's cry of rage, the sound of quick fighting, of blows. The door was burst open, and the mass of fighting, twisting men streamed into the temple-room.

"Don't fire! You may kill your uncle!" the captain whispered.

Some one brought a light and held it high, showing the scene of combat. Ruth had run to the bottom of the steps, and was standing there, watching the fray, sobbing. In the center of the room my uncle fought like a madman with the fanatics, having some advantage because of the smallness of the room.

But he was conquered in time, and held against the wall. "Seize the woman," the spokesman commanded. "Now, get the others."

Two of them seized Ruth and placed her against the wall beside Uncle Dick.

"Where are the others, master?" one of the men asked in his tongue, and the captain translated it to me.

"They are here; find them," was the answer.

We heard some of them start up the steps, heard their cries as they discovered the priest, bound and gagged. The spokesman ran up to them, and fell back with them, too, for none of them dared touch the *aitu*. He sent one of the men for Welch.

Welch was not long in coming.

"What is it?" he asked.

The spokesman explained quickly. "None may touch the *aitu* save you, master," he said. "We are not priests."

Welch made his way up the steps and helped the priest down, and unbound him and took the gag from his mouth. We heard the priest jabbering.

"He says the man and the boy went beneath the *aitu*," Welch told the spokesman.

"Then we have them in a trap."

"Get them out," Welch ordered. "When you have them, see that all four are placed in separate cabins under a strong guard. We must have no more nonsense until we reach the island."

Welch went across the cabin and stopped in front of Ruth Holland and Uncle Dick.

"I promise you," he said to my uncle, "that you'll have a short time to live when we get to the island."

"Perhaps," my uncle said.

"And I promise you," he said to Ruth, "that I'll not forget your part in this affair, and that you'll be made to suffer for it."

Uncle Dick struggled to reach him, but the men held him back. Then the captain and I had our own business to attend to, for the men were trying to reach us from behind. We opened fire upon them. One dropped down, badly wounded; and the captain secured his revolver and filled it with cartridges, and held it ready.

"We cannot get to them, master," they reported. "They can kill us, one by one."

Welch turned toward the *aitu*.

"Captain Hawson," he cried, "unless you and the boy come out and give yourselves up, I'll take matters in my own hands here and forget that these friends of yours are entitled to courtesy."

The captain made no answer. Welch bade the men carry Ruth to the other

end of the cabin, and then he had Uncle Dick placed with his back against the door.

"I'll give you one minute," he cried.

"You dare not kill a man in the presence of the *aitu*," the captain replied.

"I can kill him in the passage," Welch answered.

He motioned the men to take Uncle Dick outside. Ruth gave a scream and tried to get to him, but they would not permit her.

"Will you come out?" Welch cried again.

"Yes," the captain answered.

Again he made me follow close behind him and be on my guard. We backed out from beneath the steps, and with difficulty reached the ledge of the pedestal. Then we crept around the *aitu*.

"They were touching the *aitu*," the spokesman cried.

And as he spoke the captain opened fire with both revolvers, shouting into the midst of them, sending a hail of bullets down the steps.

"Shoot, Roland!" he screamed to me.

I joined in the fray. The men burst out the door, fleeing. Welch and the spokesman were gone. We dashed down the steps, where Ruth Holland was leaning against the wall, almost at the point of swooning.

The captain did not stop there; but ran to the door, filling his revolvers as he did so. His continual firing unnerved the men, for they did not know we had extra ammunition.

They were fleeing up the passage toward the companionway. We ran after them, keeping up the firing. They fired some shots in reply, but none of them took effect.

When the last one had gone on deck we ran back again and got Ruth, and the captain led us forward the way we had gone that other time, and so to the deck. There were men forward, but when we emerged and began firing at them they ran aft quickly.

It was only the work of a minute to get to our old position of security near the bowsprit. But there were only three of us safe and secure.

Uncle Dick was in the hands of the fanatics.

(To be continued.)

Signaling Without Semaphores.

BY ARNO DOSCH.

SPEED demands safety just as certainly as darkness demands light. The semaphore, with all its various means of operation, has done yeoman service in this direction, but something even more nearly perfect is needed to meet modern conditions. The visible signal on the track will some day give way to the visible and audible signal in the cab, with its accompaniment of the automatic stop. This article describes the beginning of the revolution. Read it. Some day it will be history.

How an Engineer Will Get His Signals in the Cab, Be Automatically Controlled, and Be Able to Telephone, All By One Third Rail.



TELEPHONE on the train connecting with distant cities so that a traveler can conduct business from a speeding coach as if in his own office is one of the striking features of a three in one invention which Fred Lacroix, a young railroad man of twenty-four, has just placed in successful operation on twelve miles of the Erie Railroad in New Jersey. The two other parts to the combination are a cab signaling system and an automatic stop, and the whole proved its efficiency before half the signal engineers and many financiers of New York.

The inventor is staking his success on the practical working of the safety appliances, but the appeal to the general imagination is in the telephone. For though the public at large does not know when it travels whether the road is automatically controlled or operated by hand signals, it can see a telephone and feel a thrill of wonder when it is possible to sit in a car and talk with some one a thousand miles away while the train is whirling over the country.

As to safety, Lacroix's system has

all the advantages of the automatic block in preventing collisions, and goes a step further by stopping the train if the engineer does not heed the signal. The fact that its method of cab signaling is simple as well as certain is also worthy of comment.

First in England.

Up to the time Lacroix appeared with his device the most advanced form of signaling included only cab signaling and the automatic stop. This combination has been used, moreover, only on a few miles of road in England and is not thoroughly established as yet. The difficulties encountered have been chiefly with the weather conditions, necessitating the use of steam heat to melt the ice and snow at the points of contact between the engine and the signal arrangements on the track.

With Lacroix's system a third rail is used, and there is only such inconvenience as is caused by ice on a third rail anywhere, and that is not too great to obviate, as shown by the success of third-rail systems in the open country.

The telephone in the cab is entirely

new in signaling, and has immediately commended itself as a time saver. It provides a quick and direct means of communication between engineer and operator and permits the issuing of orders to trains on the move at a distance from a station.

Stopped from Outside.

A light third rail does the work. It conveys the signals, applies the brakes when necessary, and acts as a telephone wire. The mechanism is on the engine, where it is brought into the roundhouse for inspection, and all that can get out of order along the track is the track circuit, containing a battery and a track relay. If anything should happen to these the train will be brought to a full stop.

The engineer receives his information as to the condition of the track ahead from a green light, which shows in his cab as long as the right of way is clear. Directly under it is an electromagnet, which derives its magnetic powers from a shunt-wound dynamo driven by steam pressure from the engine. When it has its full energy it is sufficiently powerful to hold up a heavy iron arm, which, when in contact with the magnet, does not affect the air-brake valve.

If anything happens to the current so that the magnet loses its power, the heavy iron arm falls, opening the valve and setting every brake in the train. And, as the air escapes, it passes through a whistle, which it blows in warning. As the current also supplies the light, it goes out simultaneously with the dropping of the arm.

In the same circuit with the light and the magnet is a shoe of steel brushes, made to scrape the third rail and communicate an electric current to its surface. As long as the third rail is in a closed track circuit not broken by the presence of another train, the current which is local to the engine flows out through the third rail, making a complete circuit of the track wires and returning through the wheels and body of the engine.

If there is another train on the track and the circuit is not closed, the engine circuit is abruptly broken by the same

opening in the track circuit which interrupted the track current, the magnet loses its power, the arm drops, the brakes are set, and the train stops.

The whole mechanism of the signal system in the engine is so constructed as to respond promptly to the indications it receives from the third rail. To make it effective it is merely necessary to have the track circuit closed if the track is clear and open if it is occupied.

In doing this, the principles of the ordinary automatic block system are applied. The wiring is different, in order to bring the third rail into the track circuit, but there is no essential change. For this, as for all automatic systems, the track is divided into blocks or sections, each of which is entirely separated from the rest for signaling purposes.

Failure Made Safe.

A current of electricity generated at one end passes down a rail to the other, where it goes through a relay containing an electromagnet, which must remain energized in order to keep the circuit closed. In other automatic systems, the current then passes to the other rail and returns to the battery, but in the Lacroix system a slightly more complicated arrangement is necessary in order to permit it to pass through the short sections of third rail at both ends of the track and include them within the block. In both, the track circuit depends upon the magnet in the relay remaining energized, but this it will only do while the full current is passing through it.

As soon as an engine runs into the block, the wheels and axles form a short path for the electricity, and only a small amount of it passes through the relay, not enough to hold the armature and keep the circuit closed.

Points of Difference.

On the ordinary automatic system, the opening of the circuit, whether from the presence of a train, a broken rail, or a landslide, sends the signal on the semaphore to danger. The working of the Lacroix system is quite different.

When a block is occupied or in trouble the approaching train first learns of it

when the shoe strikes the third rail at the end of the block. Previous to that time, while the train was passing over a clear track, whenever the shoe struck a section of the third rail the engine current passed out through it to the track circuit, then through the track relay, which was closed, back to the track and home through the wheels and body of the engine.

But as soon as it strikes a block where the track current has been short-circuited by the presence of a train or by other trouble, the current cannot make a complete run through the track circuit on account of the opening in the relay caused by the lack of power in the magnet.

Improvements to Come.

The action is instantaneous. The current does not leap from the shoe to the third rail, because it cannot return. The effect is to break the circuit in the engine, which results in extinguishing the green light, setting the brakes, and blowing the whistle.

Each block is connected with the third-rail sections at both ends of the block, so that trains can never approach each other nearer than the length of the block plus the lengths of the two third-rail sections.

On single tracks, such as the Erie branch on which it has been installed, the blocks overlap both ways, so that trains will not collide head on at the end of a block. At public demonstrations it has been shown that head-on collisions could not happen.

Two engines racing toward each other, with the throttles wide open and the engineers leaning from the cab windows, were stopped at the ends of a block which they both approached from opposite sides. As soon as each struck the third-rail section, the air-brakes were set and both engines were brought to a standstill within a few hundred feet, although the engines were still puffing away with the throttles wide open.

The entire possibilities of the invention are not shown as yet, because the third rails are not continuous. The sections are only long enough to give the air-brakes a chance to stop the train

before the brushes have passed off, which is five hundred feet on the Erie. While the train is passing from one third-rail section to another, it is entirely cut off from communication.

There is, however, nothing to hinder the third rails from being continuous with only short breaks between blocks, and it will be a necessity if the telephoning possibilities are used.

There is at present no provision giving the engineer warning of the danger ahead until suddenly the air-brakes are opened and the train is brought to a stop by an emergency measure. This can be remedied, however, by more extensive wiring and the use of distant signals, not unlike those in the automatic semaphore system.

Through them the engineer is informed several blocks in advance of the condition of the blocks he is approaching. At present the same electric current which operates the signals also applies the brakes, and, before he can grasp the throttle, the train is being stopped automatically, the amount of jarring the train receives depending on the brakes.

A Switch for Telephone.

There is as yet only one current generated in the engine and this must be used for both the signaling apparatus and the telephone. Obviously it cannot be used for both at once. This is recognized by the inventor, and he has prepared a switch to be thrown whenever the telephone is in use. But this entails the consequence that while the telephone is in operation the signaling system is dead. To be running blindly ahead with no signals to guide, would be suicide, as even the automatic stop is out of commission.

A single current is feasible, however, if the telephone is to be used for signaling purposes only, as the telephone is only called into requisition when an engineer receives information as to the track, but, when it becomes a convenience for travelers, the telephone will need a current all to itself. This can be taken care of by providing an alternate current which can be used over the same rails and wires without interfering.

A PINK-TEA BO.

BY CHARLES BATTELL LOOMIS.

Something Might Have Happened If They Hadn't Put on the Binders While He Was Cutting the Fat.



"H, yes, Uncle Jabez is the most romantic of men. Why surely I've told you of the time that he put a new piano in Stella Wyngrave's hen-house as a wedding-present to her?"

I assured Mrs. Dorkins that that particular manifestation of her Uncle Jabez's ultra romanticism had never before been told me.

"Why, yes. You see, Stella and her husband had gone into the poultry business just after they married, and she had given up her music. Uncle Jabez hadn't given her any wedding-present and she felt a little hurt, but one night when she went out to the hen-house to lock up, she found in the big scratching pen a brand-new piano with the legs lying beside it and a card. 'From Uncle Jabez.'"

"I should think that it might have scratched the piano somewhat."

"It did, and it gave them no end of trouble to get it into the house, but that was Uncle Jabez's romantic way, and so I say I never know what he's going to do next, and

now that we've heard he's at last struck it rich out in the Klondike, there's no telling how he'll come back or when he'll turn up.

"We've always been friendly with him, and we sort of hope that if he does come back East, he'll take a fancy to Marietta Ethella and give her a musical education."

I was occupying a room and boarding with the Dorkinses while pursuing my medical studies. They did not keep a boarding-house, but took me in because my father and Mr. Dorkins had been boys

together and Mrs. Dorkins thought it "so romantic" for me, the second generation, to be in the way of having kindnesses shown me just because my father and Lester Dorkins had learned swimming in the same swimming hole.

Mrs. Iolanthe Dorkins had a nose for the romantic that I have never seen excelled. Her own marriage to Mr. Dorkins was in the highest degree romantic, because she had gone to buy a pair of shoes in the store where Mr. Dorkins was a clerk and he had had the hardihood to tell her



"QUITE A GRAFT, MY BOY."

she pinched her feet. She had admired his manliness in telling her what she confessed was the truth, and she had ordered the next size larger and had fallen in love with him at the same time.

Mr. Dorkins had a vein of the romantic in him which took the form of admiring his wife's appreciation of things removed from life's humdrum, and Marietta Ethella lived in a dream of romance where every passer-by was a potential prince and the grocer's boy was a kidnaped crown prince of the house of Ruritania.

Knowing them as I did, and being of an age to enjoy a bit of practical joking, I set to work to devise some scheme by which I could provide a little innocent pleasure for myself and a bit of mystification for them.

It was not long before I had decided on a plan rich in promise; I would get some tramp to play the returned uncle, he should make a fat thing out of it in the way of rich food and cigars, and when all was over I would confess my complicity in the affair, pay all damages, and take the whole family to some "Rupert of Hentzau" sort of a play.

It so fell out that the following Saturday lent itself to my plan quite as if the day had been prepared for me; Mr. Dorkins being detained at home by a slight cold, I having the whole day free, and Mrs. Dorkins beginning to wonder when Uncle Jabez would return to his home in the East.

I had kept him to the front as a topic of conversation and had brought out recitals of his many "romantic" actions, and the time was ripe for the entry of Jabez Patchen, Romanticist.

The suburban villa of the Dorkinses covered a half acre, and was mostly lawn and old-fashioned "romantic" flowers, with one peach-tree which Mrs. Dorkins treasured as the apple of her eye because the pit from which it sprang had been given to her by a favorite nephew, who died next day of indigestion brought on by eating the peach, which was not fully ripe.

This tree had never borne fruit before, but now was loaded with Morris Whites, which promised to be delicious when they should have become ripe.

The house itself was one of the Swiss

chalet order for obvious reasons, and while the furniture was not costly nor the decorations rich, the amount of bric-à-brac with romantic associations festooned around it was remarkable. Knick-knacks from many lands fairly littered center-table, piano, mantel, and writing-desk in the old-fashioned parlor.

It was to this home that I purposed leading some fun-loving tramp who was at the same time honest, and that is why I set out right after breakfast to search for him.

Mrs. Dorkins was preparing to do up plums, Mr. Dorkins was nursing his cold in a red wrapper covered with white roses (a gift from his wife), and Marietta Ethella was in a hammock on the veranda, reading, "How Prince Florizel Came to His Own."

A walk of half a dozen blocks brought me on a tramp, but he was so villainous looking, so destitute of any hint of refinement that I passed him by. But two blocks farther on I caught sight of a trampish fellow looking at a map in the window of a little real-estate office perched on a knoll that commanded a view of "highly improved" property.

The fellow wore a frock coat whose better days must have been coeval with the closing years of the Civil War, and his hat looked older yet. He had a red handkerchief in place of a collar and his shoes had not at any time been mates.

His trousers had surely first been worn at an afternoon tea, for they were of a light material and of what had once been a fashionable cut, but they were too tight for the sturdy legs that were now within them.

Here was the tramp I wanted—if he had a sense of humor. I hailed him. "Good morning! Quite a boom in real estate, isn't there?"

"Yes," said he, turning and looking at me with an insolent but whimsical eye. "I was thinkin' of buyin' a lot or two an' makin' it over into a restricted park."

Mrs. Dorkins would have believed his statement, but I was delighted at his chaffing power. A tip or two, and he would play the part to perfection.

He looked to be about forty-five; his beard, grizzled and wiry, had been allowed to seek the outer air for five days

at least, and his hair had not known the caressing touch of a comb in many a day. His hands were fairly clean and he did not look like a drinking man. "Made to order."

"I'm sorry I can't sell you a block," said I, "but I got rid of my last holding a few days ago. But, say, I'd like to have a little talk with you if you have time."

He rubbed his musical beard, knotted his eyebrows, and said, "I have an appointment with a capitalist, but it will keep."

Then, without telling him who he was supposed to be impersonating, I told him what I wanted him to do; to make himself perfectly at home if Mrs. Dorkins should invite him in, and to throw himself on her hospitality fervidly.

He hesitated. Perhaps he was thinking of parlor carpets and his rough shoes.

He gave me a keen, half-suspicious look. Then I explained that I was a medical student, bent on having some fun with good friends of mine; showed him a five-dollar bill that should be his if he played his part well, cautioned him against any malicious mischief, and, pausing for his reply, got a poke in the shoulder that nearly toppled me over. as with a gusty laugh he said, "You have picked a winner, Doc—what?"

"Good. just be easy and natural, you know. They're a little bit dotty on tramps. Help yourself to cigars—I'll make it good to them afterward, you understand—"

"I don't give a whoop in Ohio whether you do or not, but I'm the man for the round trip and I want to say right now that it appeals to me."

Here he fetched me a good-humored slap in the ribs that brought me to the verge of the gutter, and I had to ask him to restrain his exuberance.

But I liked my tramp. There was no Harvard reserve about him. He was human.

I explained to him that my friends were long on romanticism and short on humor, and that I felt a little good-natured practical joke at their expense was perfectly legitimate.

"Yes, and mild for a medical student," he said.

"Well, I'll hurry back to the house and you come on in about half an hour."

I was turning away when he said, "Say, w're is this joint?"

"To be sure." I gave him clear directions and went on my way, returning by another street so that Dorkins would not connect me with the advent of the tramp.

I had been at the house a little over half an hour before my tramp appeared, and he seemed about to pass the house, looking beyond as if he had misunderstood my instructions.

I coughed significantly, and he looked up, shrugged his shoulders and shambled around to the side gate. Mrs. Dorkins has what she calls romantic palings enclosing the place—"as they used to be in the old story books."



"I WAS THINKIN' OF BUYIN' A LOT OR TWO."



In a few moments, I heard a whispered call in the hall, "Father, Marietta Ethella, Mr. Tompkins!" and I knew that the curtain had risen.

Marietta Ethella tumbled out of the hammock, dropping the book, I rose from the rustic chair, and Mr. Dorkins came down from his room in his fancy wrapper.

"Oh!" said Mrs. Dorkins, breathing heavily, "there's a tramp in the kitchen, and while I'm not sure I can almost be reminded of your uncle. He looked test us. What shall I do?"

"Did he just come down the side street?" I asked.

"Yes—"

"Why, the minute I saw that man I was reminded of your Uncle. He looked sort of amateur theatrical. I'll bet a hat he is.

"Just dress him up in your Sunday clothes, Mrs. Dorkins, kill a fatted calf or two, and give him the time of his life. Open a can of sardines and a keg of beer and an oyster or two. You won't regret it."

She bit beautifully, and if she had any doubts of her uncle's identity they were now removed. We all went into the kitchen and on the way in I was suddenly inspired.

The tramp, a born actor, was standing in a very humble attitude drinking a glass of milk which Mrs. Dorkins had poured out for him.

His back was to us, but his pose was one to win sympathy, for he reminded me of a peasant of the Millet variety—down-trodden and cloddish.

The world had been hard on the poor fellow, and I gave the Dorkins's credit for a feeling of real sympathy for tramps in general—their very wanderings must appeal to the good lady as somewhat "romantic."

My inspiration was to make it easier for the Dorkinses to do a rather unusual thing by suggesting it to them on the plea of the obligations of universal brotherhood.

"Hallo, my poor fellow," said I, "aren't you the man I was talking to down the street a while ago?"

He turned, his face lighted up and he said in broken tones, "Thank you kindly, sir, yes, I am. You said the first kin' words I'd heard in a week. If all the world was like you—"

I held up my hand to stop his flow of praise and said, "Mrs. Dorkins, here is a man and a brother. He is as good as we are, but he's never had a chance. Why not let him have one?"

Mrs. Dorkins gave me a grateful look. I was making her action natural. "Why not indeed?" said she, and I'll do her the justice to say that I think she was sincere and perhaps forgot for a moment that she supposed that this preposterous looking fellow with the insolent eyes was really her uncle.

As for me, one can imagine my joy. I foresaw to what lengths this sentimental couple would go to make it easy for this modern Kit Sly.

"Won't you have something more to eat?" asked Mrs. Dorkins.

With what I considered a touch of genius, the fellow said, "No, thanks. I had something to eat 'bright an' early an' on'y for walkin' so far I wouldn't need this. I'm not a great eater."

He felt that such sincerity on his part would appeal to this kindly lady; she felt that "uncle" was acting his part well, and I felt that he was in his way an artist.

While Mr. Dorkins went up-stairs to see if he could find a suit of clothes that would do for the poor fellow and Mrs. Dorkins returned for the time being to her plums, Marietta Ethella showed the tramp into the parlor and suffered him to pat her head in a fatherly fashion that made my gorge rise.

I was glad to see her leave him and go out to her book. I was also astonished to see him slyly slip a little silver ornament into his tail pocket. I saw this through the crack of the door and hastened into the parlor.

He stepped over to a box of cigars and transferred at least thirty to his breast pocket, winking at me and saying, "Quite a graft, my boy. I owe you something for this. These folks are soft enough for cushions. Here's where I lay down on 'em for all I'm worth."

I did not mind the cigars, but the silver trinket was one that Mrs. Dorkins

had obtained in one of her romantic ways and I knew it was endeared to her by associations, so I said:

"Cigars are all right, but I didn't mean you to help yourself to bric-à-brac." This with a significant glance at his tail pocket.

He laughed impudently. "Graft is graft, young feller, and when I play a game I go the whole hog."

As he spoke he went to the mantel and helped himself to two silver candlesticks which his capacious pockets concealed in short order.

Quite forgetting that I had fostered Mrs. Dorkins's idea that this man was her uncle, I went out to the kitchen and said, "Mrs. Dorkins, you'd better call your husband and show this man to the door. He's a thief. He's helping himself to bric-à-brac."

She laughed a silvery laugh. "Why not?" said she. "The dear soul! You leave him alone. When it comes time for him to disclose his identity he will take all those things out of his pockets and we'll have a good laugh over it."

"But," said I "he *isn't* your uncle."

She looked at me coldly. "I don't know what you mean."

I didn't know what I meant myself. I didn't know what I could have meant to bring a disgusting old rounder into a respectable house and give him a chance to loot the place.

Of course I'd have to make good, and I'd rather make good than confess to these kindly people that I had put up a senseless job on them. It didn't look funny to me any longer.

I went back into the parlor. The tramp was not there. A little silver traveling clock was also missing.

I hurried out onto the veranda and saw, to my horror, the tramp fondling the hair of the innocent child who, supposing it was her great-uncle, let him do it, although I could see she shrank from the greasy coat.

"Come here!" said I, in peremptory tones, and with mock contrition he lumbered up to me.

"Aren't you ashamed of yourself?"

"Shame died in me in me third year, young feller. I regretted the loss, but I didn't go into mournin'."

His pockets were positively bulging.

and every bulge meant several dollars out of my pocket unless I could get him to disgorge.

"Nice location, this," he said, looking out over the rolling country to a branch of the Hackensack in the distance. "And early peaches, too. Say, cull, what's the matter with us havin' some fruit? Fruit in the mornin'—what's the sayin'?"

"Then don't butt in, Lorenzo. The lady of the house"—he broke into a laugh—"the lady of the house is doin' up plums. How can I show her me gratitude? W'y, I can pick her peaches for her to do up. Unripe for eatin'—just right for cannin'."

He started down the steps that led to the garden. Marietta said, "Unc-er-Mr. Man, please don't pick those



WE ALL WENT INTO THE KITCHEN.

"You leave that fruit alone," I growled. "It isn't ripe and Mrs. Dorkins sets great store by it."

"When a feller tramps as I do," said he blandly, "his digestion laughs at a little thing like unripe fruit. I like peaches and I'm go'n' to help myself. Have some, Flossy?"

"No, thank, you, sir," she said, trying to control a tendency to giggle.

"Will you keep out?" I asked earnestly.

"Do you own this fruitery?" said he, mimicking my tones.

"No."

IO R R

peaches. My mama is keeping them for papa's birthday week after next."

"Flossy," said the horrible man, "what if some one broke in here in the night and stole those peaches—then where would your pa's birthday treat be? I will pick them now and they can be made into brandied peaches for his birthday!"

Lightly he ran down the steps and over to the tree with its bushels of fruit. As for me, I went into the house and called Mr. Dorkins, but he was up in the attic and did not answer. I went to the kitchen. Mrs. Dorkins was not there, but I heard her in the cellar.

Down to the cellar I went, and said to her, "Mrs. Dorkins, that man is out picking your peaches."

She shook her head calmly. "Uncle Jabez wouldn't do that even in joke."

"But how do you know this is uncle?"

"Because he acts like him—because his disguise is so splendid. It's just the way he would act, and he'd be sure to make up so that I couldn't see any resemblance to him."

I left her hurriedly and ran out of doors, determined to appeal to the tramp's finer feelings.

But he had none. When I reached him he had actually half stripped the tree, putting the peaches into a basket he had found there by cursed luck.

"Look here, you're a beast, that's what you are! You're a vandal! What kind of return is this for these people?"

He looked at me insolently. "The glass of milk, and the cigars—not forgetting the bric-à-brac?"

As he spoke he went on picking the Morris Whites—peaches that were the apples of Mrs. Dorkins's eyes. Suddenly I heard a hoarse laugh at Mr. Dorkins's bedroom window. We looked up. He was watching us and yet, thanks to his fatuous belief in the identity of this tramp with his wife's uncle, he was merely amused at this act of rapine.

I yelled up to him, filled with shame and contrition and ready to eat dust in my humiliation. "Mr. Dorkins, I must apologize to you for this. Hold me personally responsible. I put up a joke on you. This man is a tramp."

"Yes, he looks the part, but," wheezed Mr. Dorkins, his sore throat preventing fuller tones, "I think that he will admit that he is my good wife's uncle and he knows that when he comes back we're only too glad to let him do what he wants with our things. I can't find that suit, Uncle Jabez, but now that the cat's out of the bag it doesn't matter."

"Great Scott!" said I, running under the bedroom window. "I tell you that this fellow is *my* tramp! I hired

him to come here and take all that was coming to him, and he's turned out a thief. He'll go to jail for this!"

The noise of my voice had brought Mrs. Dorkins out and Marietta Ethella had again dropped her book and was leaning over the veranda-rail, all eyes.

The tramp sunk his teeth into a Morris White and then ejected the unripe fiber on the ground. He also gave the basket a kick. Beast!

But nothing would shake the faith of these people in the man they had befriended and I saw that I would have to pretend to give up and go away, after which I would telephone for an officer.

I felt sure the fellow had audacity enough to stay there over at least one meal. Perhaps he would again fawn over that innocent if sentimental child.

Suddenly the fellow straightened himself, threw his hat on the path, ran his hands through his tangled hair a few times, reducing it to order in a remarkable manner. Then in tones that bespoke gentility he said:

"Young man, you would have had more fun if you had picked out a real tramp, but he couldn't have had half as much fun with you as I've had."

He took out of his pocket a clock, a paper-cutter, and a candlestick.

"These go back where they belong," said he, "also the rest of the things I picked up. The peaches, unfortunately, I can't restore, but I'll set out a young orchard this fall if Iolanthe will let me."

"I told you, young man, you'd picked a winner, and you have. I won enough the last year in the Klondike to make all of us happy—and if you'll forgive me I'll let you come in."

I looked at the Dorkinses. Mrs. Dorkins was hugging herself at the romanticism of the morning. Mr. Dorkins was looking ruefully at the peaches.

From a waistcoat pocket the tramp took a card-case, out of which he extracted a card which he handed to me. It read, "Jabez Patchen."

The joke was on me.

Even a yard engine needs steam. Don't forget the grub-bucket.—
The Landlady.

OLD-TIMER TALES.

With the First Vanderbilt.

BY C. P. GRENEKER.


THE old-timers are the most appealing, the most romantic, the most interesting section of the railroad community. Men who have helped to make history which we are living upon will always have a charm for the popular mind that cannot be described, and is held by no other set of men. Here we are presenting the first of a series of Old-Timer Tales which we feel pretty sure will be one of the hits of our career. Turn to the Editorial Carpet and see what else we have to say about this feature.

There is still alive and active a man who was in the employ of the late Commodore Vanderbilt's first railroad. He was a railroad man even before the famous commodore came on the scene, and for four years he was one of the magnate's right-hand men.

The stories that he tells of the old days are not tragic, nor are they of great historical value. There is not much mystery or romance concealed in them, but they do show one thing that is sometimes too much neglected in the little stories of the great—the human side of the founders and guardians of great industries and colossal fortunes, their faults and virtues that make them kin to the rest of us.

It is for the sake of the light that they shed on the purely human qualities of the first Vanderbilt that these stories are related.

The Old Freight-Agent on the Harlem Tells Stories of the Early Days When Commodore Vanderbilt Was Rising to Power in the Railroad World.

T was ten o'clock of a Sunday morning in June, 1863. The place was the bedroom of Commodore Vanderbilt, the new president of the Harlem Railroad. The speakers were Commodore Vanderbilt, still in bed, and I. D. Barton, his first freight-agent, formerly a Harlem Railroad conductor. The story is told in Barton's words.

"The commodore had a habit of lying in bed late Sundays, although he was an early riser week-day mornings. Railroad-

ing was comparatively new to him; he had just got hold of the Harlem road; but he had a faculty of asking questions, and it was with this object in view that he sent for me to discuss freight-rates.

"I was ushered into his bedroom. The old commodore pulled himself up and began firing queries at me.

"'What does it cost to ship a ton of coal from here to White Plains?' he asked, pointing his index finger first to the right and then to the left. He had a habit of doing that when he talked.

"I told him.

"'Umph! Huh,' he sort of groaned, and, after a pause: 'And how much for a horse and buggy?'

"Again I gave him the amount.

"There was another pause. Finally: 'And how much for a barrel of flour to White Plains?' I told him the rate. Without hesitation the old commodore, now in a sitting posture, said gruffly:

"'Put your rates down on flour and coal; poor people use those things; but anybody that can afford to have a horse and buggy can afford to pay high freight-rates. Put your rate up on horses and buggies.'

"That ended the 'freight meeting,' commented Barton, "and the next day I had a new tariff. When I read of this teapot tempest which is being raised over rate legislation, I often wish that the old commodore, with his common sense, were here to spread oil on the troubled waters. Horse sense is what he had, and a heart as big as this sofa."

Vanderbilt's First Pensioner.

We were seated on a plush-covered divan of tremendous proportions, in one corner of which half reposed the figure of the commodore's first freight-agent, a man now seventy-six years of age, who has seen service on several roads as general superintendent. His last position, which was given up on account of advanced years, was in charge of operation of the Brooklyn Rapid Transit.

"Yes, he had the kindest disposition of any man I ever knew," continued the veteran. "One day we were standing near the ticket window at the Twenty-Sixth Street station—that was at Fourth Avenue—when a woman with four or five children came up and asked for tickets to Chatham. She lacked one dollar of having enough money.

"The commodore never missed anything. He overheard the woman's conversation with the ticket-agent, and, calling me aside, told me to pay the difference and charge it to 'profit and loss.' Before carrying out his wish, I ventured to ask the woman why she wanted so many tickets, and the cause of her financial embarrassment.

"She replied that her husband could

not get work in New York, or, at least, I should say she began to tell me that when the commodore, who I thought was some distance away, broke in with:

"'What? Can't get work in New York? Your husband must be a fine specimen,' he thundered. He had followed me up to hear what I said.

"'No, yure rivirince,' explained the woman; 'it was this way.' And with that she led up from around the corner of the station a one-legged man, who was her husband. 'He wure run over by er train on this very road.' The man nodded, as though to confirm his wife's story.

"'When?' demanded the commodore with some passion. He had just taken possession of the road.

"'Some years ago,' answered the woman. 'And he niver got a cent.'

"'Then he'll be my first pensioner,' said the commodore; 'and,' he added thoughtfully, 'I trust my last.'

"Yes, indeed," commented Barton, heaving a great sigh, "those were great days. Dick Croker, Tammany's old boss, was a machinist in the Harlem shops at Thirty-Second Street; his brother George drove a horse-car on the Fourth Avenue line, and another brother, Ed, was an engineer on the Harlem.

"In those days, just after the commodore got hold of the road, his son, W. H. Vanderbilt, was farming over on Staten Island—a regular country farmer—and he used to sell hay to the Harlem road for the horses that pulled our trains from Tryon Row.

Dropping Mule-Power.

"I can't just recollect the year, but the commodore got tired of mule-power through the tunnel, and ordered me to run the trains from Twenty-Sixth Street up with engines. Yes, I was general freight-agent at the time, and I was also assistant superintendent, but for both jobs I got only seventy-five dollars a month.

"I did as I was told, and soon the city authorities were after us, as all of the property-owners objected to the smoke and noise from the engines. This tunnel was the one under Fourth Avenue, and both sides of the avenue were lined with fine dwellings.

"The commodore defied the authorities until at last a squad of policemen was sent to capture any engine that went through the tunnel pulling a train. The commodore saw to it that I was on that engine. There were about ten policemen, and they started for us at Twenty-Sixth Street. Four or five were daring enough to climb on the tender, and I tell you we gave them the ride of their lives, and a free bath from the tender tank into the bargain. When we reached Forty-Second Street, there wasn't one of them left to tell the tale.

"At the end of the tunnel the commodore was waiting for us. I jumped off, and the train went on. Presently the police squad came charging through the tunnel with an Irish sergeant in command. He was one of the four whom we had first drenched and then discarded. He was a sorry spectacle.

"There the commodore was, in white stove-pipe hat and long black frock coat. A most commanding figure he was. At the sight of him the policemen halted. Before the sergeant had time to say anything, the commodore turned upon them with:

"'What do you impertinent rascals mean by trespassing in this tunnel?'

"'Trespassing, do ye call it?' snorted the Irishman. 'A dum foine naime it be for murther.'

"The remark so amused the commodore that he laughed until I thought he would burst. The bedraggled appearance of the drenched policemen helped matters along, and soon the sergeant, realizing how he had been worsted, joined in the laughter. The situation suddenly dawned upon the Irishman. He walked up close to the commodore, and in a whispered tone said:

"'Ye won't mintion it, will ye, yure honore—between two gentlemen?'

The Question of Salary.

"The latter remark I thought would result fatally with the commodore—he laughed so long and heartily. But 'between two gentlemen,' enough had been said, and the incident was closed. The secret was not divulged.

"I was saying I got seventy-five dollars a month. I was handed down, as it

were, when the commodore bought the Harlem road, for I had served under five presidents of the same company before Cornele—that's what we sometimes called the commodore—got hold of it. He never thought to inquire as to my salary.

"The road was making money—you remember, a year after the commodore was elected president of the New York Central he declared a stock dividend of eighty per cent—and one day, while out driving with him, he asked, somewhat abruptly: 'What salary are you getting, young man?'

"I told him 'seventy-five dollars' as meekly as I possibly could. 'More than you're worth' was his curt reply. But at next pay-day, I think it was less than a week off. I found that my salary had been doubled.

A Ride with Cornele.

"I shall never forget this particular ride I took with Cornele. I think it was a Sunday morning. At any rate, we were going up to One Hundred and Third Street to look at the new stock-yards. I got in the buggy at Twenty-Sixth Street, and before we started the commodore says to me: 'Young man, they tell me that tunnel leaks.'

"I knew it only too well, but I wouldn't admit it. So I thought by giving an evasive answer he would forget.

"'I think I'll drive through and see for myself,' said he.

"I remonstrated with him, not that I cared so much about the leaks, but on account of the danger of driving a blooded pair and a light runabout through the tunnel. He appeared not to hear me.

"Whipping up his horses, we started bumping over the ties. Did he find any leaks? If you had known the commodore you wouldn't ask. As I said, the leaks were there, and he found them.

"After emerging from the tunnel at Forty-Second Street, the commodore turned into Fifth Avenue. It was then a dirt road above Forty-Second Street, and the thoroughfare was lined with boulders. He drove around them so recklessly I feared that we would meet with an accident, but he simply laughed when I told him to be careful. They were very fine horses, that team, and I compliment-

ed the commodore on owning such fine stock.

"By George!" he replied, "I wouldn't swap them for the whole Long Island Railroad." At that time I don't know that the commodore was putting too high a valuation on his horses."

Money in Milk.

I asked Barton to give me some of the Harlem freight-rates. "We changed them so often," he replied, "that I can't remember a single rate. It was a long time ago, you know. Our biggest traffic, however, for a long time, was the transportation of cattle and milk.

"In the early sixties the Harlem road handled as much as three thousand dollars' worth of milk—I mean in rates—a day. We charged, I think, a cent and a half a quart, and we collected every nickel before the milk was loaded. We had agents for that purpose.

"I believe it was the milk and cattle business that attracted the commodore to the Harlem Railroad. I first met him when I was a passenger conductor on the Harlem in 1854, and I believe that the trips he used to make on my train had a great deal to do with his purchasing the line.

"He always drove to the station, and had me take the wheels from his buggy and load it in the baggage-car. Then I'd place chairs for him in the baggage end of the coach. That's the way he would ride to Chatham. He always carried his lunch and a bottle of cider with him.

"After I had made my collection the commodore would ply me with questions about the Harlem road. How many gallons of milk did we haul a day? How many engines had we? Were they good? Did the farmers patronize the road? And a hundred and one similar questions. I never realized what he was after until I learned he had bought the road.

"In my opinion, the Harlem Railroad—the New York and Harlem, it's called—is the greatest asset of the Vauderhilt fortune to-day. It is the key to the New York Central situation. While the Vauderbills have sold thousands and thousands of shares of New York Central stock, they could, even were they to dispose of all their holdings, still dominate

the New York Central, on account of the Harlem road.

"It is the very necessary tail to the dog, and the New York Central pays well for the lease of the tail."

Going back as far as 1854 led me to ask Barton in what year he began railroading. He said that he became agent of the Harlem road at Mott Haven in 1852, and six months later resigned to take a freight run on the same road. Russell Sage, he told me, was then running a general store "up State" and frequently rode with him.

Stealing a Freight-Train.

"I recall back in the fifties," he continued, "when five hundred people seized one of our trains and compelled the crew to bring them to New York. There was a famous prize-fight at Boston Corners one night—the place gets its name from the fact that three States, New York, Connecticut, and Massachusetts, meet there—and we carried up the noisiest and rowdiest lot of passengers I have ever seen.

"We felt very much relieved when we put them off at Boston Corners, and wired headquarters not to stop the incoming night express at that place. The 'sports' had intended catching this train back to the city.

"When the fighters and sports found themselves high and dry at the Corners, with no place to sleep, they marched on Millerton, and after drinking all our milk and roasting five or six pigs which belonged to our agent, they compelled the crew of the Millerton local to fire up.

"There were five cars, but the gang, determined to get revenge, made the crew couple on all of the freight-cars at Millerton. Poor old John Birchall was the conductor. It was nearly four o'clock in the morning when he finally got his train made up, and he brought those five hundred people to the city without collecting a cent.

Blowing Them Off.

"It was at Boston Corners, you know, that the treacherous 'blow hole' was located. It was nothing more than a breack in the cliffs, but the rocks were so situated

that the wind-used to blow through the gap with terrible force. They had a saying that the winds from the three States met at the 'hole.'

"They evidently did, one day in 1855, when Tom Hyers came along with a train of six-coaches. As soon as the train got opposite the 'hole' the rush of wind blew all the coaches into the river. Everything left the track except the engine. It was a miracle that everybody was not killed, but I believe only one life was lost.

"Hyers always swore that the only thing that saved the engine from toppling over was the fact that the engineer carried a huge jack-knife, one of the blades of which he had magnetized by slipping it in the rail joints.

"The most peculiar railroading in my experience was out in Ohio, on the Atlantic and Great Western Railroad, which ran from Meadville to Salamanca and thence to Cleveland and Cincinnati. It is now a part of the Erie. I was general manager of the United States Rolling Stock Company, an English concern, when General George B. McClellan, the father of New York's present mayor, was president. The general was also president of the Great Western.

"In 1871 the general called me into his office one morning, and told me that he wanted me in Meadville next morning to take charge of the Great Western. There was nothing to do but go.

A Three-Gage Road.

"I found the road a six-foot gage, and, to further add to my horror and burden, the connecting lines were either narrow gage or standard. This was the case all through the Mahoning Valley. Therefore, in order to handle traffic—we didn't use the Ramsey transfer—we had three rails, and every switch, of course, was double 'jointed.'

"The Irish section-boss who, after being warned about his verbose accident reports, wired, after a derailment, 'Off ag'in, on ag'in, gone ag'in, Finnegin!' must have been a switchman on the Great Western at some time. There were so many derailments that the splintered and broken ties made the track look like a corduroy wagon-road.

"I have seen a six-foot-gage engine pulling twenty-five cars, half of which were of one gage and half of another. This, of course, required four couplings for every car. Then on some stretches of track where we had three gages I have seen a narrow-gage engine hauling standard six-foot-gage and narrow-gage cars. Imagine trying to switch a train made up of different gage cars.

"The most apt comparison I can think of is the old drop hook link motion engines. When you pulled the throttle of one of these engines you never knew whether she was going ahead or back. So, when one of these trains struck a switch there was such a difference of opinion between the cars that some would go one way and some another.

— Held Up by Friends.

"One day the division superintendent at Meadville got this wire from a freight conductor who had tried to run his train into a siding west of Meadville: 'Five cars off on narrow-gage track; ten off on six-foot; eight off on standard. Unable yet to determine location of engine. What shall I do?' Back went the wire: 'Sending ton of dynamite.'

"I had a funny experience one night with General McClellan. We were bound for Cincinnati, and our train was held up about two o'clock in the morning—I thought at first by train-robbers. I got a good scare.

"'Little Mac,' as the old 'vets' called the general, dropped into Meadville one afternoon and told me to get my car ready, as he wanted to go west on number three, which left Meadville at nine o'clock at night. There was no one on the car except the general, myself, and the colored porter. We talked until about midnight and then turned in. I was riding forward and the general occupied a stateroom in the rear of the car.

"Suddenly I was awakened by some one pounding on my door. I demanded to know the cause of the knocking, and the train conductor, evidently agitated, as I could judge from his voice, said:

"'We're held up, and they won't let us proceed. They're on the engine, and in front of us.'

"'By the great boot!' I yelled, gets

ting into my things. 'Shoot 'em! Shoot 'em down!'

"'It's not that at all,' explained the conductor. 'They're a lot of old soldiers in uniforms, and with banners, flags, and torches, who demand a speech from General McClellan.'

"'This is certainly a pretty mess,' I mused. As soon as I had dressed, I went forward to explain that 'Little Mac' was undressed and in bed. That didn't make a particle of difference to the veterans. They had heard, early in the night, that the general was on the regular Cincinnati express, and their presence was due to love for the war hero, and, moreover, they were there to stay. Finally I told them that it would be impossible.

"'Then you'll spend the night here,' shouted a dozen old fighters.

"I realized that they meant it, and went back to arouse the general. I must confess he wasn't pleased, at first, but after he got a glimpse of the great crowd of soldiers and citizens—there must have been four hundred—he relented. When he had dressed, I ran up to the engine and told the soldiers, who were on the track, that if they would step aside I would have the train pulled up until the private car, which was on the end of the train, came up to them.

"'Go wan, ye rebel!' yelled a man with a torch. 'Ye can't trap us as aisy as ye think. We'll go back to the caar, but a body-guard will stick to th' engine.'

Early Days on Long Island.

"I had to submit to the arrangement, in spite of the implied treachery. The general made a brief speech from the rear platform, and at the conclusion of his remarks I signaled the conductor to go ahead. But we were again held up. The Irishman and his companions, who had doubted my sincerity, refused to let the engineer start until he and his friends had shaken hands with General McClellan."

Barton told me that he had served on the Long Island Railroad at three different times, always as general superintend-

ent. The first time was in 1866, when Oliver Sharlock was president. Again in 1875 he took the general superintendency of the old North Shore Railroad, and in 1881, when Austin Corbin got control of the road, Barton was placed in charge of operation.

"When I first went to the Long Island Railroad under Sharlock," continued Barton, "the road ran from Hunter's Point, now Long Island City, to Greenport. I spent a week walking over every foot of the track, and every step I took I couldn't help thinking of old Commodore Vanderbilt's remark about swapping his horses for the Long Island Railroad.

The Lost Rails.

"I never in my life saw worse track. Accidents were so frequent that no one depended on the railroad, and yet the Long Island is one of the oldest steam roads in this part of the country.

"After I had finished my inspection tour I surprised Sharlock by announcing the immediate need of twenty thousand ties and ten tons of rails. On hearing my demand, he all but expired.

"'Then, what in the name of heaven has become of our rails?' he dramatically and excitedly cried. (The rails had been in use since about 1835.)

"'You can't prove it by me,' I replied. 'I've been out on the line for nearly two weeks, and I haven't found any rails.'

"'Then, what are our trains running on?' he asked in an injured manner.

"'On the sod,' I answered.

"And it was a fact. The earth had risen over the rails and had been packed so firmly and so hard that the wheels of the cars made grooves in the sod, and they were running on this more than on the rails.

"I say rails, but I never saw them until Sharlock bought the ten tons I wanted. When I had laid the new rails, Sharlock says to me:

"'Well, Barton, I give you the credit for having built the first railroad on Long Island. What we had before was a hole in the ground.'"

The next Old Timer Tale will tell of the Jarratt-Palmer special, which was a sensation in 1876, when it made a record-run from New York to San Francisco.



Recent Railroad Patents.

BY FORREST G. SMITH.

The Vast Network of Railroad Efficiency and Railroad Equipment Has
Been Built up by Eighty Years of Such
Efforts as These.

We have decided to slightly change the form of our monthly article on Railroad Patents, and to add another feature. For a long time we have been receiving queries from readers seeking advice about patent procedure, and heretofore Mr. Smith has answered these queries by mail. In future we shall run these queries and the answers to them as an appendix to the monthly article. Every reader who has a problem of this nature is welcome to the services of the department, and a letter addressed to Mr. Forrest G. Smith, or to the editor, will receive attention as early as possible.

TORPEDOES.—Ordinarily railroad torpedoes are highly efficient as signals, but in rainy or snowy weather the explosive mixture which they contain becomes damp, even after a few moments' exposure, so that the proper signal will not be given. An extremely simple but very effectual remedy for this evil is shown in a patent, No. 938,465, November 2, 1909, issued to Frank Dutcher, of Versailles, Pennsylvania. Mr. Dutcher provides a torpedo in which the explosive-containing portion is sealed with a water-proof substance.

CONVENIENT BRAKE.—It is now customary for trainmen in setting the brakes on a car or a train of cars, while they are at a standstill, to climb onto the car platform in order to set the brakes, but a device patented by Henry C. Ostermann, of Chicago, Illinois (No. 939,076, November 2, 1909), obviates this necessity when the car or cars are at a standstill. The device is embodied in an ordinary brake-mast, such as now has mounted at its upper end the usual hand-wheel, but in this device the wheel-mast is swiveled so that it may be swung down to extend behind the car and be turned by means of the wheel, while

the brakeman is standing on the ground. In other words, the brake may be applied on any car, whether the brakeman is standing on the ground or is on the car.

SPRING JOURNAL LID.—Spring controlled journal-box lids have often been suggested, but nearly all of them possess the disadvantage of being liable to seat improperly, leaving a space for dust to enter. To prevent this, Thomas H. Symington, of Baltimore, Maryland, has patented, No. 938,523, November 2, 1909, a journal-box lid, which is held in place by means of a heavy spring, which, while it is arranged in the usual manner, cooperates with a cam member on the hinge of the box and lid, so as to guide the lid to its seat and insure a close fit between the parts.

AUTOMATIC STOP.—An entirely automatic system for controlling trains is disclosed in Patent No. 941,233, November 23, 1909, issued to William G. Daring, of Pittsburgh, Pennsylvania. His system is designed to prevent the entrance of a train into a block occupied by another train.

It is embodied in automatic means carried

by the engine or tender, which is actuated through the closing of a circuit through the medium of contacts arranged beside the tracks. The system is so arranged that the air-brakes will be applied on any train entering a block occupied by another train. After stopping the train on which the mechanism is arranged, the actuating device for the brakes is automatically reset.

LUMBER-LOADER.—Ordinarily, lumber is loaded into cars by the aid of a man in the car. A device, shown in Patent No. 939,452, November 9, 1909, however, issued to Edgar L. Stocking, of Buffalo, New York, makes it possible for lumber to be loaded without this help.

The device consists merely of a bar structure, which is so constructed as to be arranged within the doorway of any car, and which supports a roller which is of such breadth that lumber may be readily shoved over it and into the car. The support for the roller is moreover swiveled so that the lumber may be guided into the car toward either end and disposed according to the wishes of the operator of the device.

NEW RAIL PROCESS.—As the ordinary form of rail is rolled, the strata of the steel in the tread of the rail is positioned in layers parallel to the strata in the web of the rail. In other words, the grain of the rail, if it were of wood, would run the same in the head of the tread as in the web of the rail.

As a result, rails soon become worn in their tread surfaces, and have to be replaced by new ones. To overcome this disadvantage, Norman Randleman, of Knoxville, Pennsylvania, has devised a method of manufacture, which is simple in the extreme, but which will result in the rail manufactured by the process having the grain of its head run at right angles to the grain of its web.

As a result, the life of the rail is prolonged and it will not peel as does the ordinary rail after a short period of use.

RAIL-BENDER.—A novel form of rail-bending tool is disclosed in Patent No. 940,325, November 16, 1909, issued to James R. James, of Ridley Park, Pennsylvania. Usually such devices are not adjustable to every size of rail, and are consequently limited in their usefulness.

The device disclosed by Mr. James, however, includes a bracket member, which is adapted to be applied to a rail, and has mounted upon it an arm, which is adjustable

so as to bring the rail engaging and bending members into proper engagement with the rail. As a result, a rail may be bent by means of this device at any desired angle, regardless of its size.

CONTROLLED HEADLIGHT.

—Numerous devices have been proposed for the purpose of keeping the headlights of locomotives in alinement with the tracks, but such devices have usually included mechanism connected with the trucks of the car to which they are applied.

A device patented, No. 940,446, November 16, 1909, by Silas W. Pomery, of Big Run, Pennsylvania, discloses an extremely simple idea, which is adapted to this use, and which includes no mechanism of this character. The device is embodied merely in a reflector, for the usual headlight, which is pivotally mounted and is controlled solely by means of weights so arranged as to direct the rays of light from the reflector to the tracks, regardless of curves and inclines.

STREET-CAR DOORS.—As Pay-as-you-enter cars are at present constructed, the conductors are exposed to the cold, or, where the doors are so arranged as to be normally closed to enclose the rear platform, they must be manually opened by the conductor at each stop.

Mr. Harold Rowntree, of Chicago, Illinois, has conceived the idea of providing means operable from the movement of a crank-handle at the inner end of the bar behind which the conductor stands, for automatically swinging the entrance door inwardly and the exit door outwardly. The patent disclosing this device, No. 937,870, October 26, 1909, has been assigned to one of the principal manufacturers of this class of cars.

GRAIN-DOOR ESCAPE.—It is desirable that grain-car doors be so constructed that they may be partly opened so as to allow the escape of a greater or less quantity of grain before the entire door is opened or removed. Ordinarily, a small door is arranged in the main door for this purpose, but such doors permit the discharge of grain in too great a volume and over too large an area to be satisfactory.

Richard R. Reaveley, of Fort William, Canada, has secured a patent, No. 938,789, November 2, 1909, on a car door of this type, consisting of three sections, two of which, when arranged in closed position in the door opening, leave a V-shaped opening, which is closed by the third section. This

latter section may be opened to a greater or less degree, as may be desired, so as to allow the discharge of a small stream of grain through the V-shaped opening at the narrow end thereof.



A STRONGER FROG.—A railway track frog naturally receives considerable thrust, which is usually transmitted to the rails leading from the frog rails, causing abnormal creeping of the rails. This creeping is overcome by a means disclosed in Patent No. 940,440, November 16, 1909, issued to William H. Dotter and Raphael S. Hays, of Carlisle, Pennsylvania, and assigned to a large switch-manufacturing concern of Pennsylvania.

The frog shown in this patent is formed with pairs of spaced reinforcing ribs between which seat the usual braces provided for securing the frog to the ties. Not only do the ribs reinforce the frog rails, but they also cooperate with the braces to hold the frog against creeping.



BETTER RAILS.—A novel process in treating railway rails so as to prevent peeling and render them practically proof against shocks and wear, except after lengthy use, is disclosed in a patent, No. 941,134, November 23, 1909, issued to Fred. H. Daniels, of Worcester, Massachusetts. In this method, the blanks are first heated to a high degree and then suddenly cooled so as to impart a very fine crystalline structure to them.

They are then heated again and cooled gradually, so as to eliminate internal strain, after which they are cold rolled so as to lengthen and flatten the crystals throughout the entire exterior surface. By this method, a kind of fiber is formed at and near the exterior surface of the rail, rendering it tenacious, so to speak, and calculated to materially prolong the life of the rail.



HOSE-COUPLING.—Numerous automatic air and steam couplings have been devised for railway cars, but nearly all of them have lacked the one thing which will render their adoption really practicable. That is, they nearly all are rigidly mounted so that a slight difference in elevation between the cars to be coupled will be liable to result

in leaks or imperfect engagement of the couplings.

To obviate this disadvantage, Joseph V. Robinson, of Salem, Oregon, has patented (No. 937,961, October 26, 1909) a coupling of this class, which will be effectual whether the cars to be coupled are in or out of direct alinement as regards their couplings.

The coupling employed may be of the ordinary form, which includes centering wings, to bring the terminals of the pipes to be coupled in mutual engagement, but, whereas such devices have before been rigidly supported, the heads of this coupling are held in position solely by stout springs, which serve to support the same from the main air and steam-supply pipes.

These springs will, of course, yield when the heads upon two cars contact so as to insure of proper mutual engagement.

ANSWERS TO PATENT PROBLEMS.

H. D. L., Tacoma, Washington.—Has any patented nut lock been adopted for actual use?

Only in an experimental way on short lines of track. Even the simpler forms, patents on which have long expired, have not met with favor.

R. M. S., Pittsburgh, Pennsylvania.—Is the idea of wireless communication between moving trains patentable?

The idea itself is old and would not be, even if new, but the novel features of such a system would be considered the proper subject-matter for a patent.

R. T. B., Cincinnati, Ohio.—Are spark-arresters now in general use on locomotives?

2. Can patents still be secured on such devices?

1. But few are in general use, and such as are, are chiefly those on which the patents have expired, and which are, as a rule, much similar in construction than those which have been recently proposed and patented.

2. There is no art which has been exhausted, and patent may be secured on any device embodying novel structural details which are considered to amount to invention, and especially where new or more satisfactory results are secured.

For flat wheels it's either the lathe or the scrap-heap. Get in the lathe.—Master Mechanic.



SONG OF THE NIGHT MAIL.

BY H. S. DUDLEY.

Written for "The Railroad Man's Magazine."



WO shining threads of silver
In the night. The quiet trail
Of the fire-devouring monster—
The path of the Midnight Mail.

Far to the east they glimmer
Through a sleeping countryside,
Under a moonless, starlit sky,
Where the whirling winds have died.

From my place in the swelling foot-hills,
Far out toward the rim of night,
I know that the Mail is straining
In leash, with a wondrous might.

Out of the bustling depot
It glides at length, with a sigh,
And feels the cool, caressing breeze,
As the city's lights drop by.

Into the open country,
With ever-increasing speed,
Shines far ahead on the cold gray rails
The light of the Titan steed.

Now, like a hundred thunders,
With the throttle open wide,
It leaps into the shrieking wind,
Which licks at the iron hide.



From my seat, in the swelling foot-hills
 I can hear a muffled throb,
 Like the march of a distant army,
 Or a restless, seething mob.

I know that the Mail is coming
 Ere I see the light at the head;
 For the muffled throb is the mighty wheels
 As they spurn each silver thread.

Then from the edge of darkness
 Comes a steady speck of light;
 The throb becomes a muffled roar
 Far out in the eastern night.

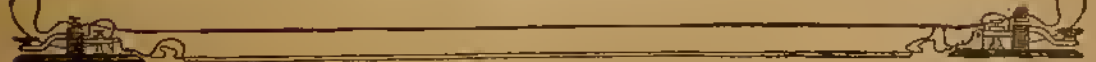
Now I see the distant flashes
 From beneath the swaying hood,
 As a sweating, heaving pygmy
 Crams the monster's maw with food

Nearer, and ever nearer,
 With the speed of a hurtling shell;
 Louder, and ever louder
 Comes the clang of its brazen bell.

The earth seems all aquiver
 With the shock of the awful speed,
 Over a mile a minute—
 For the Mail must meet man's need.

And then with a roar like thunder
 The Midnight Mail goes by.
 The strips of steel scarce touch the wheel,
 The shrieking air like a soul laid bare—
 It fairly seems to fly!
 The bursting bell like a wild death-knell,
 The furnace door like a glimpse of hell—
 And the Midnight Mail is by.

On into the gloomy canyon
 The rumbling fades and dies,
 And the quiet seems more quiet,
 More peaceful seem the skies.



Being a Boomer Brakeman.

BY HORACE HERR.

THE improvident boomer of the In and Out System having managed to get together, at one time, as much as one dollar in United States coin, flew the coop and hotfooted it to Mexico, where he had some escapades which were so hot that a Chile con carne factory would be an ice-house in comparison.

It seems as if every railroad man wants to have a fling at Mexico, and if the experiences of any who have emigrated there are at all like those of Mr. Herr's hero, we don't wonder that it's better to keep this side of the gringo-belt.

Our boomer has hustled back to his native heath—he has gone home to help father milk the cows and wean the pigs. Thus ends a brief but varied railroad career. We are not sorry having read about it—are you?

5.—GETS HIS CLEARANCE FOR KEEPS.

Showing the Marvelous Independence of the Stinger Who Thinks that One Hundred Cents Will Buy the Sun, Moon, Stars, the Stellar Spaces—and a Few Drinks.

DID you ever notice how independent a fellow gets when he has a dollar in his pocket? He will rise up in his dignity and tell a railroad to go to the underworld; then he'll fly the job, apparently in the belief that that one dollar will buy the sun, moon, and stars. When the last penny is gone and he hasn't anything in his pocket that will make a ratttle, he's mighty glad of the chance to fight the cinders on the head end and lug chains in order to get back on the pay-roll.

I flew the job on the In and Out, and decided that I would quit railroading for some other occupation a little less strenuous. I might have kept the resolve, if I hadn't drifted into El Paso, Texas.

El Paso is a wonderful town. There

are forty men for every job, and a card isn't good for a look-in at a square meal. I went down there thinking I would catch on as manager of the Southwestern, or some other easy money, but there was a nothing-doing sign hanging over the entire place.

I went onto the G. H. and S. A. extra board, but you couldn't get a trip down there for love nor money. Those fellows get a job and never leave it until they are ready for the Soldiers' Home.

Then I went to shuffling cars in the yard. The first string they cut off on me when I was in the field ran down and hit the rear end of a switch-engine, put the tank over the smokestack, and it was me for the time-check and out of the job again, a private in the great army of the unemployed.

One week more and I was looking for

Began in the October, 1909, Railroad Man's Magazine. Single copies, 10 cents.

a hand-out, looking hard with a magnifying-glass, and there was still nothing doing. Every one appeared to be on the side or running light, and I had to flag the meal-stops until I got so thin that I looked like the imported living skeleton in a side-show.

Then I began to east longing glances across the Rio Grande to the land of the "*quien sabe?*"

Land of Lead Dollars.

Mexico for me, where the lead dollars come easy and go twice as fast; where the last summer's clothes are plenty good enough and a sandal-foot peon is the only one you have to look out for. Without the price of the toll-bridge, I got over to Juarez, out-talked a conductor on a south-bound drag, and climbed aboard. bound some place, I didn't know where, but content to feel that I was on my way.

I woke up in Chihuahua, a beautiful village, with a population of two hundred thousand—counting the dogs—but there was nothing doing there, not even a free lunch. It was back to the dog-house for me, and the next stop was Torreon. At Torreon things looked better.

I heard that there was a chance down at Jimulco, and that night I rode the sky-side of a water-car into Jimulco. The next day I walked into the trainmaster's office and asked for a job running a train.

No more stinger stunts for me. What's the use of being modest? I knew that I could handle the bills and sign the orders, and I couldn't see the use of working for eight Mex. when I could pull down two hundred and work less.

Nothing doing as a conductor, so I took

the next best thing, and woke up to find that I was again the proud possessor of one of those brass keys and a badge. When I climbed onto Vernon's caboose I'll admit that I heaved a sigh of relief, even though my braking pardner was a greaser, for I saw square meals looming up again, and I was more than anxious to see if the corners would really hurt me.

Now, I'll say a few things about rail-roading in Mexico. You can pick up most any old newspaper and see startling accounts of how the entire crew of some train has been taken to jail for some trivial offense. The blood-and-thunder stories which come out of the South would fill several volumes.

Fine Jail Service.

Take-it from me straight that there are *worse* places than Mexico. Mexican law is ~~all~~ right; in fact, the Mexican law has some few points of superiority over



MY MEXICAN PARDNER SAID
THAT IT WAS A GOOD JOB.

the same brand in the United States, but the way they have of administering their legal medicine is something fierce.

In the outlying and isolated districts, petty judges are so ignorant that they couldn't read a law-book, even though it was printed in words of one syllable and illustrated with signs. They never saw a law-book, and never want to. Their personal feeling is the only law they recognize, and a gringo [American] is legitimate prey.

In the United States about the first thing a conductor buys is a good watch—in Mexico his first purchase is generally a forty-four revolver. All you want the gun for is a bluff, for nine-tenths of the gringos wouldn't use the gun if they had a chance.

You see, it's something like this: The road says that it will hold you responsible for the merchandise-cars. They put them right next the caboose, where you can watch them; and if some thieving son of Mexico gets busy and steals some of the imported silk, you have to answer for it to the company.

Suppose you catch the fellow in the act and take a shot at him and get him; then you are up against the Mexican law as it is, and a gringo never gets any of the best of it in court.

Chile Coal and Poor Water.

Braking in Mexico isn't just like a Sunday-school picnic by a great deal. About fifty per cent of the trunk-line traffic is in ores. They have the big engines down there now, just as they have in the United States; and Chile coal and poor water make the hog-head's life a burden.

In the first place, the fireman can't put the coal-dust into the fire-box fast enough to keep her hot; and when he does get a fire just about the place he wants it, he has to open the fire-door and put in the rake. By the time he has the fire-bed raked, the cold air has reached the flues, and they are leaking a steady stream.

Water goes to working through the stack, and if it's not one thing, it's another. If ever a train—a freight-train, at least—made running-time in Mexico, it is not recorded on the books of national history.

If it happens that an engine is in condition to permit of its making the running-time, the conductor won't let the engineer speed it, for fear he will heat the boxes. A real brass is almost a stranger down there.

A "Good" Job.

Every ore-car is equipped with shell brasses, and as soon as the babbitt has melted you know what happens. If you find it before the journal drops, you're mighty lucky. It's easy during the night-time, for every time you hit a curve you can look along the string; and if you see one blazing, you can pull the air and go over and cool it off.

During the day you have to depend on your sense of smell, or stop every twenty kilometers and go feel them over. My first trip out of Jimneco was south to La Colorado, and it took just thirty-two hours to make the two hundred and ten kilometers.

On that trip I put on one new air-hose, one Gould knuckle, chained up twice, packed fourteen hot boxes, and put in three new brasses. When I got in on that run, the pay looked mighty poor—eighty Mexican "dobies" a month for such work as that; but my Mexican pardner said that it was a good job. Perhaps it was for him, but I never did think much of his tastes.

Then the men began to tell me a few of those choice little stories of the men who had gone the route. There are two dreaded routes in Mexico. One is the wreck route, the other is *via* the little adobe with the barred door, sometimes called the jail, the "hoosgau," or anything else you want to call it.

Into the Canyon.

There was Skinny Farris, who had his little experience with the Mexican law, and Tim Lee, of Denver, who was then over at Zacatecas doing time for the Zacatecas wreck, in which sixty Mexicans were killed. He was a steady patron at the national boarding-house for over thirteen months without a trial, and then they turned him out because it was so expensive to keep him.

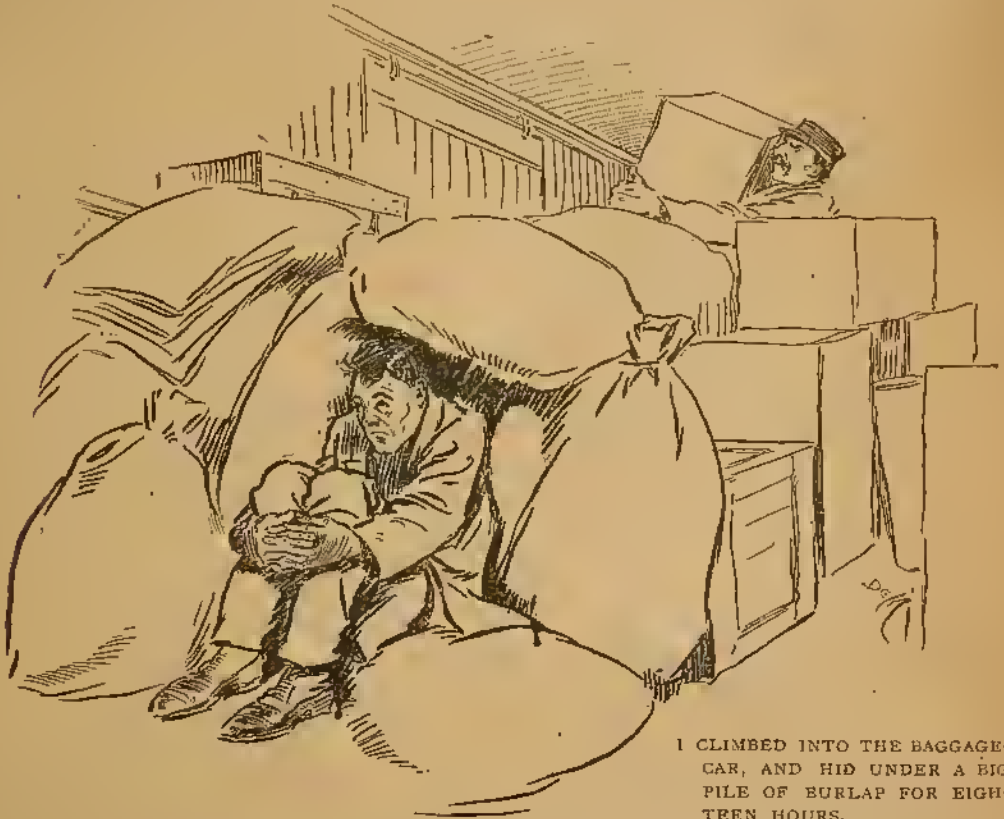
After I had finished my time braking

and had been set up to running a train, I was one of the boys who carried Tim over the pike to the border at El Paso. When he came out of that town he was a wreck, physically and mentally, and here is the straight of how he went there:

Lee was an engineer running between Zacatecas and La Colorado. One evening he coupled onto a passenger-train coming out of Zacatecas; and when the conductor brought the orders over for his

When he hit the first bend on that mountain, and gave them about five pounds to settle them on the rails before taking the curve, he found that his train line, which commands the brakes, was cut off. He called for hand-brakes, but what could a few hand-brakes do after a train had such a start?

He took the next curve all right, but the third one—well, they shot out into a cañon like a greased rocket.



I CLIMBED INTO THE BAGGAGE-CAR, AND HID UNDER A BIG PILE OF BURLAP FOR EIGHTEEN HOURS.

signature he brought a message from the despatcher, asking if he could make up fifteen minutes on the running-time from Zacatecas to Calero.

Tim's reply was: "If they stay on the rails, I can make it."

From Zacatecas to Calero is down the side of the famous Zacatecas Mountain, and five coaches need a lot of air to hold them when they are dropping down a heavy mountain grade. Mexican car repairers and inspectors are supposed to look over every train which pulls out of Zacatecas, and when they gave Lee the high sign he supposed that his train was all right.

Engine, tender, baggage-car, and two coaches went along. Sixty Mexicans didn't get home to their beans that night, and Lee was picked up from the bottom of the pile of scrap-iron, leg and arm broken and badly scalded, and hurried off to jail. He never came to trial, and he was no more to blame for the accident than was I or any one else who was a thousand miles away.

What One Woman Did.

Here's another one like it. Plummer was a conductor on the Chihuahua division, running between Jimulco and La

Colorado. He had one American brakeman on his crew, who was a mighty good man. One evening they came to Jimulco, and when they stepped off the caboose a flossy little greaser policeman, wearing the authority of the law and a saber, led them over to an 8x10 jail, the dirtiest little hole you were ever in.

There they stayed for seventy-two hours, with nothing to eat except the grub which the rest of us were able to slip through the bars, while his royal nibs, the "hombrey" with the saber, was down at the corner *cantina* accumulating a train-load of *tequila*. Finally they brought them into court to try them.

Some woman had complained that the two of them had put her off a freight-train when she was endeavoring to bum her way to town to buy some supplies. They had never seen the woman before, and the evidence showed conclusively that they were not guilty, and that the woman had jumped off a moving train and broken a leg.

"Not guilty," was the verdict, and then the judge fined them sixty-four dollars. That's going some now, isn't it? Can you beat it? If they had been guilty of that heinous crime, they would have been digging in the salt-mines still.

After that, I decided that if I ever caught up with trouble before trouble caught up with me I would make the big hike for the line, without the formality of kissing my Mexican friends good-by, and never take a chance with Mexican justice outside the City of Mexico.

I am awful glad I decided that way, for it was just a month after that when I got into it. Never mind what it was. I didn't take my bills down to the office when I got in that trip. I had the brakeman register in for me.

He was a Mexican, and the Mexican

law isn't made for the native—it's made for the gringo. He took the bills, and I took the second section of a passenger-train which happened to be pulling out for the States.

I climbed into the baggage-car and hid underneath a big pile of burlap for eighteen hours until my friends, the baggage-master and the conductor, came over and dug me out, and pointed through the open door to where I could see Old Glory waving from the flagpole of Fort Bliss, near El Paso.

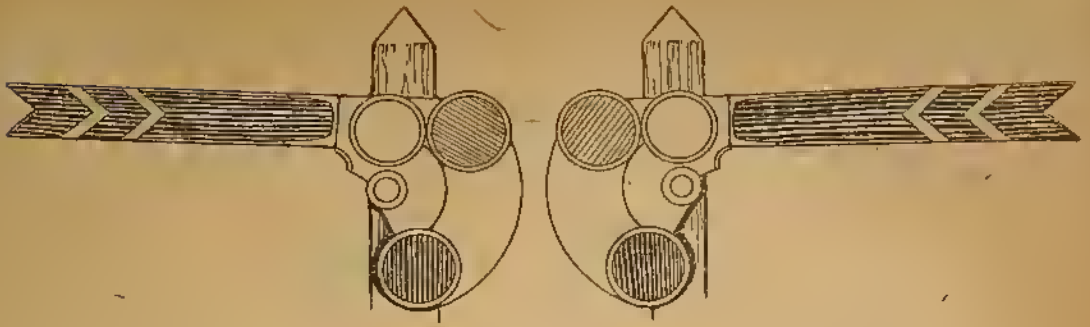
Half an hour later I was over the line, making naughty faces at Mexico, and vowing that I would never visit that beautiful country again. One trip was enough—especially under the circumstances—and I hardly believe that, even in time, I would ever get used to eating beans and tortillas three times a day.

So far, I have kept that vow. I waited around El Paso until the pay-car came over the line, some twenty days later, drew my Mexican pesos, had them changed into real money, and then, while I had the coin, I bought a ticket back to the dear old East, and went prospecting for a job—not a railroad job, but a place where you are home every night, and as long as you work and duck the street-cars, you are reasonably sure of meeting yourself at the supper-table every evening.

While I have the greatest respect for the men who follow the railroad game, a game full of more danger and real romance than any other calling in the world, still I would rather be on the outside looking in than on the inside where you can't see at all. And I guess a fellow will reach that stage soon enough where all the friends pass by and say "How natural he looks!" without tempting fate by hanging around a Baldwin hog or a dog-house.

(The End.)





The Death of "Dread 107."

BY RALPH C. MULLIGAN.

THIS is the story of the most unfortunate locomotive that ever turned a wheel—"Dread 107"—cursed by every man who ever had anything to do with her. We have never heard of a locomotive history to equal hers. If so—if any of our readers can tell a more remarkable story of wreck and ruin—we want to see it, and we cordially invite them to submit it for our consideration.

It seems strange, almost uncanny, that one disaster after another, accompanied by loss of life, should have followed with such regularity.

Is it a wonder that engineers absolutely refused to take her out?

After Twenty Years of Appalling Disaster, the Old Man-Killer of the Rockies, Whose Name Was a Byword, Adorns a Scrap-Heap.

"DREAD 107," the fiend-driven locomotive which has launched into eternity a dozen of her train crews and has been in twice that many fatal wrecks; the locomotive which superstitious firemen and engineers swear was haunted by the phantom spirits of her victims who could be seen at night, awful in aspect, sitting in the engine cab or gliding up over the pilot, is in the scrap-heap; dead, after twenty years of terrible service.

Hearts of railroad men on the Denver and Rio Grande beat slower, for all along the line she was known as a man-killer. Death sat at her throttle.

After her last fatal wreck, eight years ago, she was virtually abandoned with

a death roll of seven engineers, six firemen, and almost two score of passengers.

She earned her name during the first two years she was in service, when one disaster after another occurred in rapid succession, always fatal to the engine crew, and frequently to the passengers. Railroad men soon believed the 107 was hoodooed, and it became increasingly difficult to persuade an engineer to run her. She was transferred from one division to another, leaving destruction in her wake and bearing such an ominous history that among the more superstitious it was like getting a death-warrant to be called to take her out.

"Dread 107" was one of three anthracite burners, the first of such type to be used in the Rocky Mountain coun-

try, sent out in 1888, and put on the passenger run between Gunnison and Grand Junction in western Colorado.

It was a narrow-gage line, which had been built in 1883, and followed a treacherous, tortuous path through mountain gorges and across deep cañons—the only route through the Rockies at this point until the tunneling of Marshall's Pass, a year later.

On the night in early spring when 107 left Grand Junction on her first trip over the division, Bill Duncan, who was the first man to pull a train over the Continental Divide, was at the throttle, and Josh Zoogley was firing.

They were well on their way toward Gunnison, the new locomotive running without a hitch. Duncan opened her up on a straight stretch down Black Eagle Cañon.

He did not know that part of the bridge had been carried away. Without warning, the train plunged into the river, bearing the engineer and fireman to their death. To this day the exact number of passengers who lost their lives is not known.

"Dread 107" lay at the bottom of the cañon until late in the summer, when the river receded and she could be raised. She was taken to the yards at Salida and put in condition. She went back to her run again in November, and for two months nothing happened.

Bill Godfrey's End.

Bill Godfrey was the next engineer to whom she was assigned. With a fireman named Bell, who was making his first run on the division, Godfrey left Gunnison on Christmas Eve, both train crew and passengers eagerly anticipating their arrival at Grand Junction to spend the holiday.

It was bright moonlight, but just around Blindman's Curve, between Escalante and Domingues, a ten-ton boulder, which had loosened and fallen, obstructed the path of the train. It was going at a high rate of speed and the impact of the collision was terrible. Godfrey and Bell were instantly killed, and several passengers were added to the list of fatalities.

It took nearly two months to repair

the engine, and she was not put in service again until early in March, 1889. Already old engineers were fighting shy of her, and Frank Bratt, a new man on the road, offered to take the run.

He made only two round trips. On another bright moonlight night, the 11th of March, "Dread 107" and Bratt left Gunnison, passed Blindman's Curve where Godfrey and Bell had but recently been killed, and started down the Black Eagle Cañon, which had been the scene of the first disaster.

Between Thapaniro and Currecanti, one of the worst snowslides for many a season was encountered. When 107 struck it she turned turtle, and both engineer and fireman were crushed to death. In this case the passengers escaped unscathed.

Few Would Take Her Out.

After this accident the locomotive had such a name that few men could be persuaded to take her out. For over a year she lay in the yard at Grand Junction, and then an attempt was made to put her back on her old run, but so firmly implanted in the hearts of all the engineers was the belief that 107 was hoodooed that all sorts of excuses were made for refusing to run her.

It was at this time that she was nicknamed "Dread 107," which has clung to her even until to-day, when she lies a mass of battered and rusty iron.

Uncanny stories were circulated about her, tales of spirits that were seen at night clambering in and out of the cab as she lay in the roundhouse; premonitions, which all six of the crews who were on her death roll were said to have told them of their fate.

In despair at the reports from division headquarters, the locomotive was ordered transferred to Salt Lake City, to run between that city and Ogden, a distance of about eighty miles over prairie country.

At first there were only minor accidents, two rear-end freight collisions in which no one was hurt, and a derailment that killed an unknown hobo who was riding back of the tender.

"Mad Ole" Gleason was her engineer, and in the remembrance of the old-

est railroader in the West, a more dare-devil hand never held the throttle. For fifteen years "Mad Ole" had been in an engine cab and in a half-score wrecks, but never once had he been more than scratched.

His friends said he had a charmed life, and the old engineer believed it himself. Within six months from the day when he set foot inside "Dread 107" he was picked up a corpse.

Into a Stock-Train.

It was a head-on collision with a train of live stock. The engine crew of the freight jumped before 107, with "Mad Ole" in the cab, piled on top of them. In all, five persons were killed in this wreck. The cause was never satisfactorily explained. People merely said, "she collided with 107."

Although now only three years old, 107 was so battered up when she came out of this collision that after she had been repaired she was relegated to freight service.

For over two years her history was uneventful, and many thought that the hoodoo had been broken. During that time her name lost some of its former terror, and then one night, lest her old record be entirely forgotten, some unknown hand carved in the woodwork of the cab the names of the eight men who had met their death there and the list and dates of the various wrecks in which she had figured.

From that time, although there were still no new accidents, misfortune seemed to follow all those connected with her. Sickness and death among the train crew and their families, ill luck of various kinds, which was all traced by the superstitious victims to the old locomotive.

When Flynn Went Crazy.

"Dread 107" celebrated her sixth anniversary in a startling way, which, as told by old railroad men, is half fact and half legend.

It was a Sunday morning, and she was standing in the Ogden yards with steam up ready for her eighty-mile haul. Engineer Tom Flynn was in the cab, and his brother was fireman. Suddenly Flynn

opened the throttle, and the locomotive sprang forward and was a hundred yards down the track before the yardmaster or anybody realized what had happened.

She did not stop until she rolled over an embankment on a curve twelve miles away. Two trains which were in her path were flagged, and got on sidings without a second to spare.

Fireman Flynn was picked up unconscious beside the track several miles from where 107 engine had been ditched. He died next day as a result of internal injuries, but not until, half delirious, he had told of a mad tussle with his brother and how he was finally thrown backward from the cab.

The engineer was found pinned beneath his overturned engine, a raving lunatic. As this story is told in smoky cabooses on stormy nights, it is declared that Flynn went mad while staring at the death roll of the victims of 107.

If it had been difficult before, it was impossible now to get an engineer to run her. She was once more transferred—this time to Alamosa in southwestern Colorado on the other side of the mountains. She was sent deadhead from Ogden across the divide to her new home, so unwilling were those who knew her history to ride in her cab.

Her Number Changed.

Before starting on her new run, she underwent a thorough overhauling and painting, the offensive death roll in the cab was removed, and, most important of all, her number was changed to 100 in the hope of forever burying "Dread 107" and all the superstition which surrounded her.

During the next few years, little is known of her history although, gradually, her former identity became known and she was regarded with curious interest. Then came tales that fantoms had been seen on moonlight nights riding on the pilot as she puffed slowly up the mountain grades, and these fantoms always had one hand upraised toward the number, as if trying to change the "0" to a "7."

One spring, during the freshets, the old locomotive once more rolled into a ditch, scalding to death an engineer named

Peters and maiming her fireman. But, strangest of all, when she was brought into Alamosa again there was her rightful number, "107," back in its old place.

Who changed it? It was the spooks, some of the superstitious claimed. But after that she kept her number and her old name, "Dread 107."

For the next five years she remained in the Alamosa roundhouse, used only on occasional emergencies, gradually growing more antiquated, and dilapidated, feared and hated by all, from the oldest eagle-eye to the youngest call-boy.

Before making her last journey to join her less famous sisters in the burial-ground of scrap-iron at the Burnham station, 107 was destined to be in another wreck, more horrible in its consequences than any in her civil history.

It was a long winter on the Alamosa division—a hard winter, with wrecks, snowslides, and washouts that nearly paralyzed traffic. During that winter, not one fire was built beneath its boilers.

Then, one June morning, she steamed out in the yard, in charge of Frank Murphy, an engineer who, alone of all who

knew her record, scoffed at bad luck. Jenkins, his fireman, had just finished eight weeks in the hospital. The 107 was to take a string of empty gravel-cars to Mear's Junction to load, and every operator along the line shuddered with dread as he sent the number.

That night Frank Murphy started on the return trip to Alamosa with a heavy train of gravel. It was all down grade, and only two trains to meet. Six miles out of Mear's Junction, on the worst piece of track on the whole division, Murphy suddenly realized that his train was running away.

He shut off steam, applied the worn-out air, and whistled for hand-brakes.

No one lived to tell what happened. At the foot of the mountain the runaway crashed into a light mixed train, the wreck caught fire, and Murphy, Jenkins, and the conductor, the engineer and a brakeman of the mixed train were killed.

"Dread 107" never made another run. The man-killer locomotive, which had more deaths and more wrecks to her credit than any other in the intermountain country, was abandoned forever.

WHY CASEY DOESN'T WORK.

BY RAY H. HOLSINGER.

Written for "The Railroad Man's Magazine."

MY name is Jerry Flannigan, Oi work on siction three,

Pat McCarty is the foreman, and a dacint man is he.

Oi've just wan fault to foind with him, Oi'm tellin' you of it,

In regard to Casey, his first man, who doesn't work a bit.

Of all th' lazy min Oi've saw, he is th' limit yet,

Us other bys have nicknamed him, "Ould Pat McCarty's pet."

Whin we are puttin' in th' ties, or linin' up th' thrack,

Instid of sweatin' loike th' rest, he sits upon th' jack.

If it happens we are cuttin' weeds, his dear back doesn't bend.

It's "Casey, take the speeder and run over th' east end."

Oh, it's Casey this, and Casey that, and Casey, ile th' car,

And Casey mustn't sile his hands on some ould tampin' bar.

An' if they have a washout, down on th' Wymore branch,

We all must go but Casey, he can stay and run th' ranch.

An' whin th' pay-car comes along, ould Casey steps up spry.

An' draws the same as all th' rest, an' uivir bats an eye.

Th' roadmaster has got a snap, th' siction foreman, too,

But Casey's job skins theirs because, he's not a thing to do.

Oi'd like to own a railroad, but if sich a thing can't be,

That first man on th' siction job is good enough for me.

If things don't change around this gang, Oi'll quit nixt pay-day sure,

To have ould Casey for straw-boss, is more than Oi'll endure.



THE MAN WHO HIRED.

BY EDWARD HOLDEN.

**A Smooth Game Is Checked by a Dupe
Who Happened to Be Waiting for a Local.**

IT was 10 P.M. when the Toledo train left Pittsburgh. Disposing my baggage, I removed my coat and opened the window. Then, with my pipe for solace, I lay back in the serene consciousness of having arranged for the comfort of the all-night passenger in a day-coach. Mine was the third facing seat on the right of the car, the first being occupied by two men who seemed to have already traveled some distance on the train. Opposite them were two railroad men, deadheading.

A few other yawning travelers were scattered through the car behind me.

When we had made some fifteen miles, I finished my smoke, and started to doze. But my time was not yet.

"Smoke these on me," I heard one of the men on first seat right say, as he tossed two cigars to the railroad men opposite. He leaned over, and I saw his face—lean even to sharpness, with thin but overly loose lips.

"Boys," he went on to the two across, "two days ago I was flat on my back—hadn't even a feather for the aborigine's head on a red cent. Now I've come into something that'll make the success of Rockefeller and Carnegie look like that negative virtue which is often referred to as being the color of verdigris. They all thought I was good for nothing—the folks in Toledo, I mean—but I'll show 'em by agreeably making the fortunes of

some forty or fifty relatives, giving 'em all jobs working for me.

"It sounds fishy, doesn't it? But it's true. I say, Gus," turning to his companion, "I can't hardly believe in such good luck—that I'm really president of this new company we're organizing. Hoo! Hoo! Hoo! Hee! Hee!"

Presently he and Gus got out pencil and paper and commenced figuring. In the lull I dozed off.

Next thing I knew I was awakened by the words, "I'll give you two hundred a month and expenses," and found the man of the financial bonanza in earnest converse with a man who occupied the seat in front of mine.

"Rent an office and storeroom in Mansfield, your home town," he continued in tones husky with enthusiasm, "and store white lead and oils by the ton."

He came back and sat with the stranger in his desire to explain more fully.

"Now, I'll furnish you with an automobile—steam or electric—and you can equip your office to suit yourself as our manager. Don't stint. Get good furniture—put a Brussels rug on the floor, if you want it. Advertise freely. And above all, get good men—and hold 'em."

This he added with insistent emphasis, and went on:

"If some other company pays its painters and decorators five dollars a day, pay yours five and a quarter, or

five and a half—but hold 'em, if you have to pay six."

I began to throw my sound-receivers wide open about this time—for a capitalist who is hiring men at high salaries for a new concern has a most absorbing attraction for a clerk who, like myself, has not yet reached the century mark in his monthly stipend.

I began to cast about for a pretext to talk to this man. Maybe this stuff about "Opportunity once gone is lost forever," was no stuff, after all. Here seemed to be a chance for me to better myself. If I sat still and did nothing, I might never see another—surely never a better. Just then the man who hired rose to return to his own seat, and the stranger moved to a seat across the car.

"Don't forget, F. H. Andrews, 425 Victoria Building, Toledo, Ohio," said the former, in parting, "and wire or come to see me personally when you get things in shape." And he and Gus returned to their pencils and paper.

I must have dozed again, for when I was next conscious we had stopped at Alliance, and a man came through with hot coffee and sandwiches. The man who hired bought some and set about demolishing them.

It struck me as queer that one who had fallen into sudden opulence should ride all night in a smoker and lunch on coffee and sandwiches; but I concluded that either he must be a man of hard democratic sense or had not as yet come into possession of much ready money. I observed that the railroad men had moved my traps to the left front seat, where was a most promising field for stretching my six feet one for slumberous purposes.

I hadn't settled long before the man who hired looked at me and whispered to Gus. Then he came across, and I was glad I had not made first advances, for now I was in a position of greater advantage.

"Can I talk to you a little while?" he began, and, at my acquiescence, dropped beside me.

"My name's Andrews," he commenced—"F. H. Andrews, president of the Andrews Decorating Company, of Toledo."

I felt a chill at the nearness of so great a person, but the American in me rose

up—Diogenes, I believe, was the first American—and I disclosed my name with some sonority.

"We're just organizing," said Andrews—"going to have branches in all the large cities of the country. Want men—good men—every class. What is your business, and what does it pay?" he ended in crisp tones that admitted of no application of the word inquisitive.

"Bookkeeper. Thousand a year," I replied, with equal telegraphic directness.

"We need you. Give you twenty-four hundred a year if you will act as our manager. Gus," turning to his companion, who came across, "shake hands with Mr. Nichols. Mr. Nichols, Mr. Wilson, my brother-in-law. Mr. Wilson," he went on to me, "has left a job that paid him two hundred and a quarter, to help me systematize my new company. So, Gus?" he questioned; and Gus nodded.

"How do you want me to begin, and where?" I inquired.

"Rent a place—storeroom and office—in Pittsburgh, your home town," he replied, tapping my knee. "Store it with white lead and oils. Furnish your office well. Hire good painters and decorators—good, mind you—at five and a half or six a day, if necessary; but don't hesitate to overbid other companies in wages and underbid for work, in order to hold your men and secure the contracts. You can refer all bills to me—F. H. Andrews, president, 425 Victoria Building, Toledo.

"I'll send you an automobile—steam or electric—or you can come on through with me to Toledo, and we'll buy it now, and you can take it back with you. Think it over, and tell me how you like the offer." And he and Gus returned to their pencils and paper.

Well, I want to tell you, the thoughts whirled in and out upon me about then. Two hundred a month! A practically independent position! My own boss! But where was I to find credit to store white lead and oils by the ton, to buy furniture, or even pay the first month's rent? And he had said nothing about advancing anything, nor offered to establish my credit in Pittsburgh. The matter began to look to me like a newspaper advertisement for managers with some capital to invest.

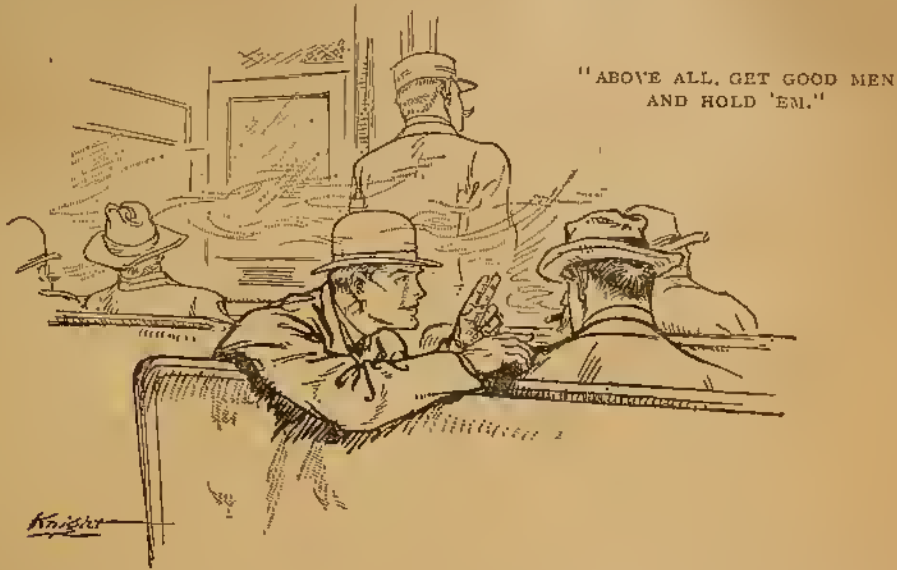
"Well, what do you think about it?" called Andrews across the car. "Will you take it?"

"Don't know whether I will or not," I replied. "I don't know you, nor you me, but I'll think about it."

"Says he'll think about it. Hoo! Hoo!

cause the ravings of a harmless lunatic were such.

Wilson looked back to see if Andrews could see him, but he had gone through the swinging-door into the second compartment of the smoker; so Wilson came over and sat by me.



Hoo! Hee! Hee!" spurted the man who hired, to Gus.

"Why, man," he went on. "it's a sure thing. Make your fortune. We'll buy materials in such quantities that we can underbid them all. We'll get the contracts for all the great amusement parks in the country—painting their scenery and ornamentation.

"Well, there's time yet, and if you decide later to accept, you have my address, and can write me," and he moved down the car—to make more managers, I supposed.

I was beginning to wonder why "Gus" Wilson said so little, for to my mind he looked as if he knew more than President Andrews. I was startled to hear the man's voice just then, speaking to me in a low tone across the aisle.

"Don't mind him," he said—"he's crazy. I'm taking him from Reading to Toledo Asylum. Easiest way to get him there is to keep him in a good humor with this rot of organizing a company."

Well, I just wilted. You could have knocked me out of the window as easy as puffing a pipe. The bubble was busted, and here was I, disappointed be-

"Yes, he's crazy—but harmless if kept in a good humor. I wonder I'm not as bad as he is, considering I've hashed over this rot of his since 4 P.M. yesterday—almost twelve hours."

We talked a while and he told me his companion had paresis, the fruit of a wild young life. He was about thirty-five now, he said. I became mighty sorry for the fellow, and more so for the mother to whom he was going—Wilson said she lived in Toledo.

Pretty soon he rose and gathered up their traps, for, as he said, they hadn't long to ride now, and he might as well go out where Andrews was, to keep an eye on him.

For a few minutes I watched the lessening blackness without, and knew that dawn was not far off, although it was still dark in the fields and along the sky-line.

Andrews looked in at the door.

"Better accept, Mr. Nichols," said he. "We'll have a booming concern in a year from now."

I was sorry for the poor fellow, and humored him, assuring him I would accept: and then, with another of his

laughs and a good-by, he dramatically departed, leaving me to sadly contemplate the misguided actions of a man yet young, bereft of what was, in all probability, a bright and enterprising mind—a mother doomed to bitter disappointment in the hope of her boy's achievements.

The train stopped. The brakeman called Wagerstown, and I knew the next stop was mine—Goonburg. As we started again I was wondering how many in the other car were enlisted as poor Andrews's managers, for he had talked to every one in my part of the car. The swinging-door flew open, admitting a red-faced conductor.

"Have any of you gentlemen lost money or valuables?" asked he unsteadily.

With one accord we all began to feel for watches, jewelry, and money. I felt in my right-hand pocket, where should be fifty dollars and some odd silver. It was empty.

I felt in the left-hand pocket, and found I still had forty dollars in bills, having luckily divided the bulk between the pockets.

Several others reported money gone, and some both money and watches.

"It's those scoundrels that I thought were a lunatic and his keeper," yelled the conductor. "They picked my pocket of all the cash fares, and left the train a minute ago at Wagerstown."

He pulled the emergency cord, and when the train stopped we ran the quarter-mile back to the station in a body.

But, as might have been expected, there was no trace of the rogues. And I'd lost a lot of sentimentality and pity on one of the wretches—as well as fifty dollars of U. S. Treasury output.

We piled sorrowfully back on the train, and in a few minutes I alighted at my destination—*pro tem*.—two miles farther on.

For fear some one should desire some sort of description of Goonburg, I give my own impressions. I arrived at 3.30 A.M., and may possibly be inclined to give too much of a gray-carbon tone to the picture. Goonburg is situated somewhere on the lag-end of nowhere, notwithstanding its being a junction for two railroads and having a respectable frame

station and baggage-room—joint, of course.

The only water-tight surmise I could conjure up, explaining the beginning of Goonburg, was that perhaps there yet remained some odd lumber after building the station, and shelters were built to house the male incumbents at such times when each left his favorite roost on the station-platform.

The waiting-room, as I saw on entering, was ell-shaped, with the office and ticket-window on the inner angle. Two doors led from the extremes of the ell, one giving out on the main-line platform, the other on the branch-line track. A light—the only one save those in the office—burned at the corner of the office wall, but on the P. T. and Q. side by the ticket-window, leaving the branch waiting-room in comparative gloom.

I deposited my effects on a seat, meaning to try for some sleep, for I knew of no train to Freeport before eight.

"What is the quickest way I can take to get to Freeport?" I asked, going to the window.

The night-operator yawned, and appeared to consider.

"Walk, I guess," he said, and grinned. "No train till eight, and you can't reach any trolley lines from here."

So I went back and tried to sleep, stretched out on that bench. It was no go, and I lit my pipe and strolled out into the night. When I got tired of this, I sat on a ladder that lay against the front of my waiting-room.

I had been out about half an hour when I heard voices coming from down the track toward Wagerstown. Presently the forms of two men carrying satchels loomed dimly through the early light, and passed on into the station by the other door. They had not seen me, because of a window that bulged out from the office, deepening the shadow where I sat.

The windows were open—it was July—and I heard them set down their bags, and one of them struck up a conversation with the operator. The voice sounded reminiscent.

"Pretty lonesome, staying here all night, isn't it?" The voice was casual.

"Oh, sometimes yes, and sometimes no," came the answer. "I go on at

eleven, and I'm relieved at seven in the morning. Always some chore to do, though—settin' signals, answerin' the key, and so on. When I get a half-hour or so I cat-nap or read a magazine story."

I looked slantwise through the window, being curious about the stranger's voice, and saw the operator leaning on the window-shelf, one hand under his chin, supported by his elbow, the other hanging down inside. The stranger I couldn't see, for the agent's body blocked the window.

"Excursion up to Cedar Point to-morrow, isn't there?" remarked the stranger—again casually.

"Sure; want tickets?" asked the key-tapper and ticket-seller combined.

"Not now. We may go up in the morning, though. Many going?"

"Yep; sold a hundred and five to-day. Guess there'll be more sold before train-time."

Just then a Smith & Wesson appeared through the window, and the stranger made another casual remark.

"Better 'pass out that coin for the hundred and five tickets," he said, adding, "and any more you may have that isn't tacked down. Needn't trouble about refusing, for there's another

Gatling covering you," and he nodded toward the door where the other stranger appeared, leaning through the window.

I looked, too, and saw Gus Wilson, the lunatic-keeper. I had no doubt then who the other was—the man with the reminiscent voice.

I had no weapon, and was casting about for some way to aid the operator. The loss of that fifty dollars and all that pity and sentiment still rankled deep.

Suddenly the agent dodged, and, as his arm shot up, there came a flash and report, followed by two more that sounded as one. Gus fell with a thud that made

me think he was dead, and the operator staggered back into a chair, his revolver falling to the floor. The other man—Andrews—slipped in through the window, and was picking up the agent's gun as I crept softly around toward the other door.



"BETTER ACCEPT, MR. NICHOLS. WE'LL HAVE A BOOMING CONCERN IN A YEAR FROM NOW."

When I got there I heard no movement from Gus, so I peeped carefully around the jamb. He was unconscious—dead, maybe—and his gun lay a foot inside the door.

I secured it quietly, and made sure Gus had no more weapons, in case he should come to. I could hear Andrews, president of the Andrews Decorating Company, ransacking the cash drawer, and then he moved over to the open safe.

Lights began to move in the houses down the road, so help in some form would doubtless arrive soon. I crept along the office wall to the ticket-window,

then, rising suddenly, I leveled the gun at Andrews's back.

"Mr. Andrews," I said, "you are abroad a trifle early. However, I always admired early risers, and you appear to be engaged in catching the proverbial worm."

bat he sprang toward me. Cool, wasn't he? Well, I was too hasty for him, and fired as his hand was diving under the shelf, boring an awful hole in his arm and plowing up that good yellow-pine floor deep enough to plant a potato in.

He sprang back with a cry, then stood,



"I WAS TOO HASTY FOR HIM
AND FIRED AS HIS HAND WAS
DIVING UNDER THE SHELF."

He whirled around and eyed the muzzle of Gus's thirty-eight—well, not exactly with eagerness, but still with self-possession.

"Well, I'll be gashdoodled," he remarked, "if here isn't one of those decorating gulls on top, after all. And with Gus's gun, too, so I suppose the poor boy is down and out."

His eyes dropped to a point just inside and under the shelf, and quick as an eye-

coolly stripping up his sleeve and wrapping a handkerchief around the hole.

"Good shot," he vouchsafed, knotting the bandage tightly. "Much obliged for sparing my head-piece."

"It is personal inconvenience I am eliminating," I returned, reaching over and securing the two guns from the cash drawer beneath the shelf. "No obligation due on your part," I continued. "Your errors, in not making certain that

the agent was alone, and then in separating yourself from your gun, are responsible. Just sit down over there and be quiet, and some of your friends will soon see you comfortably housed for the night—what there is left of it. Don't crack your etiquette again, for I only hit twice out of three where I aim, and the next one may go higher and a little to the left."

He did as I ordered, but seemed hurt that a former dupe had got the upper hand of him.

"Throw up your hands, durn ye."

I turned to see the town marshal and two farmers with leveled guns.

"Pull that body out of the way," I rejoined, "and open that door. Your man is sitting in there, waiting for his wristlets."

Their jaws dropped at my tone, but

they did it, and soon the promoter of financial ventures that made Rockefeller and Carnegie look green was under guard and on the way to the calaboose. The plucky operator was shot through the shoulder, but a dash of water awakened him.

He wanted to know how they caught the fellows, and looked astonished when they pointed me out, having actually believed me to be one of them.

Well, I got that fifty dollars back, and the conductor got his cash fares. All the other passengers who could be found were reimbursed.

Gus was dead—the agent's bullet struck him right between the eyes. And I was glad when my train came, for I had to repeat the telling of that "Daring Attempt to Hold Up a Night-Operator" at least forty-nine times.

THE RAILROADS MORE FRIENDLY.

THAT there has been a decided change in the attitude of the public, especially in the West, toward the railroads and the questions arising out of railroad operation, is frequently made evident nowadays.

The radical intolerance which characterized public sentiment two or three years ago, is giving place to a rational desire to see the relations of public and railroads put on a better basis. There is recognition of the interdependence of the agencies of transportation and the communities they serve, and the corollary of that interdependence is that fair treatment on both sides is necessary, says the *Minneapolis Journal*.

Evidence of this changed attitude is usually apparent when some great railroad builder, like James J. Hill, appears on the platform at a public gathering. Mr. Hill, busy man though he is, readily responds to such calls, and is usually received with the utmost enthusiasm. His plea that the farmers of the West ought to remain good neighbors with the railroads was enthusiastically received. The incident would have been almost impossible at any farmers' gathering four or five years ago, although Mr. Hill himself, by reason of his intelligent interest in farming and far-sighted understanding of its needs, has always been a welcome guest at farmers' gatherings.

Nor has the change been entirely on the part of the public. The railroads themselves have moved over to a position that has made the public's attitude possible.

They have abandoned such ancient and revered principles of rate-making as that expressed by "All the traffic will bear." They have come to a realization of the fact that, deriving their rights to act as common carriers from the public, they are charged with certain duties toward the public that created them.

The more enlightened and practical railroad men are sparing no effort to establish better relations with the public at all points of contact. Station agents and trainmen are instructed to be polite and accommodating to patrons.

They are to exert themselves to the utmost in this direction, for the great managers realize that on such little things is public sentiment founded.

Mr. Harriman himself, before his death, completely changed his attitude toward the public, and toward the public's humble servants, the reporters. This change sprang from a realization that the success of his plans were impossible if he permitted the hostility and prejudice against him, which his reticence no less than his policies had aroused, to continue and to grow.

The great railroad problems are largely unsolved as yet. We are again approaching their serious consideration in Congress. The President has outlined far-reaching, constructive legislation. In the changed attitude of public and railroads toward each other, there is promise of solutions of these problems with justice to both sides.



The Railroad Man's Brain Teasers.



WE are still teasing the brains of our readers, and having our own teased in return, by the clever puzzles that continue to come in. We thought we had worked the puzzle ground pretty dry, but we were wrong. Puzzles are still to be had; but, on the other hand, don't think that we are getting so many that we can do without that good one that you know. Send it along. We want it.

This month we are indebted for a couple of good ones to Mr. F. Einsel, of Struthers, Ohio.

There are two given spots, one on the extreme base of a $4\frac{1}{2}$ -foot drive-wheel, the other on the extreme base of a pony truck-wheel which is $1\frac{1}{2}$ feet.

How much farther will the spot on the drive-wheel travel in 50 miles than the spot on the pony truck-wheel?

An engine with 3-foot drive-wheels, hauling a heavy train, runs over 14 grade crossings in 10 miles. Seven of the grade crossings are 20 feet wide, and the other 7 are 30 feet wide. The drivers slip and revolve 24 times over each of the 20-foot crossings and 37 times over each of the 30-foot crossings.

How many revolutions will the drivers make in the 10 miles?

For another of the teasing variety we owe our thanks to Mr. A. L. Monroe, Indianapolis, Indiana:

A belt conductor delivered a cut of cars to the Sanky yard. Yardmaster McGuffin told him to leave half of the cars he had and half a car over in track 8, and leave half the cars he had left and a half a car over in track 7, then leave half the cars he had left and half a car over in track 5, and put the rest of his cars in track 4.

How many cars did the conductor have, and how many did he leave on each track?



The Sunny Side of the Track.

Lubricate the Grime and Soot of the Long Day's Run with a Good
Hearty Laugh—Don't Harden Them with a
Weary Scowl.

A GOOD NAME.

CHAMP CLARK, Representative from Missouri, dearly loves a good story at the expense of the State of Arkansas.

"One day," said Mr. Clark, in the course of a political conversation, and branching off from the main subject, "as a train from the East pulled up at the dinky little station of a most depressing town in the fever and ague district of Arkansas, a passenger, thrusting his head out of the car-window, demanded in bitter tones of a dejected looking citizen who was leaning against the station door:

"Tell me, what do you call this dried up, dreary, God-forsaken place?"

"That's near enough," replied the native, in a melancholy voice, 'let it go at that.'—*Washington Herald.*

RETAIL TRANSPORTATION.

THE venerable farmer with the tobacco-stained whiskers and furrowed brow climbed aboard the limited and shambled into the smoker.

"Mister," he drawled, when the conductor halted before him, "is that thar two-cents-a-mile rate good on this train?"

"It is," replied the conductor brusly. "Where is your ticket?"

The old man fumbled in the depths of an ancient shot-bag.

"Ain't got no ticket, mister," he said slowly, "but here is two cents. I never rode on one of these pesky fliers, and I just want to feel the sensation. Put me off after I've rode one mile."—*Railroad Telegrapher.*

PERSISTENT GRATITUDE.

SMITH, the railroad agent at a suburban station, saved the life of a dignified gentleman waiting for a train, by pulling

him from in front of a through train on another track.

The dignified gentleman lost all his dignity for the moment and was much confused, but not so much as to forget that something was due to the agent. Following a grateful impulse, he thrust his hand into his pocket, and, drawing it forth, exclaimed:

"Man, you've saved my life; here's half a dollar."

"Oh, I never take payment for a thing like that," answered Smith, as he turned to attend to the duties of the moment.

"But, man, you must; you saved my life. Have a cigar, anyway."—*Harper's Weekly.*

NON-COMMITTAL.

"I HAD always thought the public servants of my own city were the freshest on earth," says a New York man, "but a recent experience in Kansas City has led to a revision of that notion.

"One afternoon I dashed into a roadway station of that town with just half a minute to buy my ticket and enter a train for Chicago. I dashed through the first gate, and, pointing to a certain train, asked hurriedly of the gateman:

"Is that my train?"

"Well, I don't know," replied he, with exasperating deliberation. 'May be it is, but the cars have the company's name on them.'—*Harper's.*

A GOOD CROSS.

SHORTLY after a new administration took hold of a well-known Southern railroad a great number of claims were preferred against the company on account of horses and cattle being killed along the line in Kentucky. To make matters worse, it appeared that every animal killed, however worthless it may have been before the

accident, invariably figured in the claims subsequently presented as being of the best blood in Kentucky.

One day, in conversation with one of the road's attorneys, the president became very much excited in referring to the situation. "Do you know," he exclaimed, bringing down his fist on the desk, by way of emphasis, "I have reached the conclusion that nothing in Kentucky so improves live stock as crossing it with a locomotive."—*Harper's Monthly*.



A LINE OF TALK.

ACCORDING to the *Philadelphia Ledger*, two telephone girls were talking over the wire. The subject was a lawn party, which was to take place the next day. Both were discussing what they should wear, and after five minutes had come to no decision.

In the midst of this important conversation a masculine voice interrupted, asking humbly what number he had. The lack of any reply did not squelch the inquirer, for he asked again for the number.

One of the girls became indignant, and scornfully asked:

"What line do you think you are on, anyhow?"

"Well," said the man. "I am not sure, but judging from what I have heard I should say I was on a clothes-line."—*Express Gazette*.



CAR AHEAD.

ONE cold, winter morning a man of tall and angular build was walking down a steep hill at a quick pace. A piece of ice under the snow caused him to lose control of his feet. He began to slide and was unable to stop.

At a crossing half-way down he encountered a large heavy woman. The meeting was sudden, and before either realized it a collision ensued and both were sliding down hill, the thin man underneath, the fat woman on top.

When the bottom was reached and the woman was trying to recover her breath and her feet, these faint words were borne to her ear:

"Pardon me, madam, but you will have to get off here. This is as far as I go."—*The Argonaut*.



CLASSICAL PAINTINGS.

"A CLASSICAL education," said the engineer, who could read Latin when he was eight years old and had mastered

Hebrew before he was ten, "should be given to every boy, no matter what his surroundings are.

"For instance, a sign-painter should receive a classical education. He has often to do with subjects taken from the classics, and if ignorant of classical history, then his value is so much the less.

"I was once connected with a railroad company which had a number of barges and the first one was named Ajax. After a short time we built another barge and we decided to have it also named Ajax.

"I sent for our painter and told him we would have a series of these boats and would give the same name to all.

"Did you say you was going to have a series of them Ajaxes?" he asked.

"Yes."

"A few days after we went to look at the barge and he had painted on it 'Bjax.' The next vessel he named 'Cjax,' and then came and asked us what the tom-fool words meant."—*San Francisco Call*.



DOGS AM DOGS.

MIKE FLANNERY, the express-agent whose experience with pigs and the multiplication table are recited in "Pigs Is Pigs," is not the only humble agent to become entangled in the complexities of live-stock transportation.

The prosy reports of the Interstate Commerce Commission hint at a story with somewhat similar possibilities:

The agent of a shipper not knowing the value of a dog to be sent by express, nevertheless named a valuation of \$500, and the resulting charges to destination amounted to \$45. The dog was actually worth \$15, and at this valuation the express charges would have been \$8. The consignee declined to accept delivery and pay the charges demanded. Upon inquiry whether charges may be collected on the basis of the actual value of the dog, it was held that the shipper is responsible for the act of his agent, and that the charges at the valuation given must be collected.

What, we wonder, has become of the dog during the time that this appeal has been traveling to the Interstate Commerce Commission?

Has some humble Mike Flannery been buying it biscuits out of his slender wages? And if the owner still refuses to pay \$45 charges on a \$15 dog, what will become of the dog? Under what account could his up-keep be entered?

No struggling express company can afford to keep a dog; that is a luxury, doubtless, its officers will decide to leave to Mike.—*Chicago Post*.

THE SPIDER OF PALERMO.


BY EDWARD BEDINGER MITCHELL,

Author of "An American Knight Errant," "The Yellow Rose," Etc.

Brains, Bluff, Villainy, and
Courage Rake in the Pot.

CHAPTER XXI.

An Old Friend.

OME fifteen minutes afterward the door of the back room opened and Mr. Peter Marshfield stalked into its reeking atmosphere. The Wall Street magnate was in no good humor, and his gaze traveled from his son to his son's friend in cold displeasure.

"There are four saloons on this corner," he remarked. "I went to the other three first, and I am not as fond of saloons as you two seem to be."

David laid his hand on the great man's shoulder with the confidence of a deep, if reserved, affection. "I knew you would come," he said.

Marshfield's answer was a scarcely articulate grunt. "Of course I came. I'm your father, ain't I? Now, what's all this about?" Striding over to a table, he laid his stick on it and faced us like a judge about to deliver sentence. "So you're here, Paget. Still hunting villains, or what?"

I had no answer ready for the rough sneer. The short space we had waited for him I had employed in racing over to my apartments. David had been a true prophet; the black book I had snatched from Cagno's pocket, the key to the Abyssinian papers, was gone.

There was no time to listen to the confused explanations of the doorman. The book had been taken from my desk. One glance told me that, and then I dashed back to the saloon. Now I stood panting

and silent, wondering how on earth old Marshfield was to help us. David answered for me.

"Run to earth," said he, a note of triumph in the low voice. "Steve told you a story this morning you wouldn't listen to, father. It was true, just the same, and you've got to listen to me now."

"That's what I came here for," retorted Marshfield. "What is it?"

Leaning against the table, his hands behind his back, he heard his son through without a word or a gesture of surprise. Only when I laid the map and the deeds before him did he move. Then he took his glasses from his pocket, placed them deliberately on his nose, and leaned down to examine the booty. Even then his face revealed nothing as he studied the papers one after the other. When he had finished, he straightened up, replaced the glasses in his pocket, and turned to me.

"All of us make mistakes," he said. "I made one this morning. I was busy, and you irritated me. At the time, I remember, I thought it was all moonshine. Of course, I might have known that if Rocca had had the papers, he would have come up with them before. Still, they are not much good without the key, and Rocca's got that, you say."

"Confound the key!" I broke out. "He's got Miss Bigontina!"

"So I understand." Old Marshfield raised his hand to stroke his mustache with a hesitation that sat strangely on him. "I suppose you are in love with her, and you don't like the idea. We might try a trade—the papers for the

girl. I dare say you'd think it a good one."

David shot one quick glance at me.

"How do you propose to find the man to make the trade with?" he asked. "We can't take the police to the house without killing Miss Bigontina. How are you going to see Rocca?"

His father reached behind him for his stick. "By sending in my card," he answered. "That's one way of seeing people; and if I do see him, I'll get the girl—but I'm not so sure he will get these papers."

I was too amazed to question how. Truly I had not known David's father well. The man who would not even listen to me when I intruded upon him in his office was now, of his own accord, about to venture alone where no other man in the city, knowing what he knew, would have dared to go.

It was quite true that he was safer than any other man would have been. Peter Marshfield was too big a figure in America to be attacked with impunity, and in this case he was Rocca's last hope for the wealth he had snatched at. But it takes nerve to remember such things when one is defenseless in the castle of one's enemies.

Unbounded admiration for the stern fighter in front of me was the one definite thought in my brain as we rolled away from the saloon in the cab. The cabman had agreed to take us as near as he dared to the house. From there the banker would have to trust to his own resources. They had never failed him yet; as my gaze drank in the strength of the jaw and mouth, the heavy forehead, and deep-set eyes, I did not believe that they would fail him now.

The cab rolled down Fifth Avenue and into Washington Square under the white arch. When I first passed it that day, on my way to Maria, the morning sun had been high above it. Now the white marble was bathed in the glory of the flaming west; already the memorial cross had sprung into light over the bare trees and crowded pavements. The day was dying, the longest I have ever lived. With unspoken thankfulness that it was over at last, I leaned forward to see its farewell.

The cab stopped with an abruptness

that flung me onto the knees of the startled banker. The door was wrenched open, a man shot in upon us, slammed the door behind him, and cried out to the driver: "Go on! Go on!" The next instant David and I held him, gagged and helpless, at our feet.

"What the deuce—" my friend began when I knocked his hand from the fellow's mouth. It was the violinist of the Auvergne, and he was struggling hard to speak.

"I have come back," he spluttered in breathless, foreign English, as I helped him to the few inches by my side on the narrow forward seat. "I have come back to help you. I ran before, but I am no coward. I will fight."

"Good for you, and how?" David spoke in light-hearted joy of battle as he faced our unexpected ally. "Whom are you going to fight, my friend?"

"I fight them all. They have been worse to me than to you. Why should I leave you to fight, then?"

"Search me," returned young Marshfield. "But you didn't come in here as if you were spoiling for a fight."

The violinist spoke with inborn dignity.

"I fight, sir," he said; "but I fight with my head as well as my hands. I wish to aid Mr. Paget, who has much befriended me, not betray him. Therefore, I waste no time where spies may watch."

"You are wise as well as brave," I put in, in haste to intercept whatever ill-judged jest David may have meditated. "But what brings you back? You told me that you were a doomed man in New York?"

"I met Rosa," he answered. "I met her as I went to take my train. I knew her years ago, when we were both young."

"We talked, and she told me things that I did not know—that it was the Signorina Bigontina that they pursue, that Rocca himself may be here, that now is my time to strike for the daughter of the dead Signor Bigontina, the man who helped me, to strike at the man who murdered my brother. I come to fight, sir."

"Well, you've come to the right shop!" cried David, startled out of his humor by the intensity of the man's emotion. "At least you have, if this cab-man is telling the truth."

"Where are you going?"

The violinist leaned forward, his eyes bright with the fire I had seen in them when music carried him beyond himself.

"To Jefferson Street—149 Jefferson Street; at least, my father is. We're—now what's the matter?"

"It is the house—I have heard them talk of it. Ah, do you think I sang with my eyes and ears shut in the Auvergne all these years—I, who knew their deviltry? They did not know me—only Ghedina—and him I never thought to see again. So I watched and listened and learned."

"What did you learn?"

Old Marshfield spoke as he might have spoken to a clerk in his office. He was going to risk his life in that house, but there was no quaver of fear in the peremptory demand for information.

"It is their most secret place, sir. They have several in the city, but this is their most secret. I have known of many who went there, but never of any who came away."

"You will know of one soon," returned Mr. Marshfield as he settled back into his seat. "Is that all?"

"No, sir. I have investigated myself—quietly, you understand—for always I have dreamed of my revenge. It is not all. The house is on the heights, the water is below: but from the house to the water there is an alley running down to a dock."

He paused for a second, as though to give due weight to his next words.

"A few days ago a steamer came to that dock. It is a fruit steamer, the Cavour, from Palermo. It is one of Rocca's. There are lumber and coal-yards near that dock; the Cavour is supposed to carry fruit. Why is she there?"

"Lemons," grunted David. "By Jove, more lemons!" But his father and I sat silent.

"It is quite plain," Marshfield spoke at length with cold precision. "He intends to take the girl away on the steamer. We could have the house and the boat searched. We might find something, but it would not please you, Stephen, if you really care for her. I will try him with these papers. There is the chance that he will bite; if he does not, we will try something else."

He put the cigar back in his mouth as though the last word had been said, smoking steadily on as we drove toward the bridge. There were a thousand questions we might have asked, a thousand things that I would have been eager to learn at another time. Now, with all my life staked on one wild throw, I had no interest in the shape of the dice.

The violinist's long fingers twined nervously together, and his lean face was blazing with the thirst for vengeance; but he said nothing. In absolute silence the four of us, crowded in the cab, jolted onward through the swarming streets.

Only when we were high above the river, in the center of the bridge, the musician's hand closed on my arm. "Look!" he breathed. "It is the Cavour."

His arm pointed downward, through the open window of the cab, to the Brooklyn water-front. A tramp steamer lay at a pier below us, a thin trail of smoke rising from her funnel into the softness of the coming night. On the heights above, clear against the evening sky, stretched a row of commonplace brownstone houses. In one of them, or in that steamer, was Maria Bigontina. The cab rolled on over the bridge as we peered through the narrow window until houses and steamer were shut from our sight.

A minute later we came to a halt, and the driver appeared at the window.

"This is near enough," he said. "Anybody can show you how to get to Jefferson Street. I'm not going there, I can tell you."

Peter Marshfield stepped heavily down to the sidewalk. For a brief second he stood motionless, then turned with outstretched hand:

"Good-by, Dave," he said. "Good-by, Steve. I'll do the best I can for you." He started across the street, and a passing trolley-car hid him from our sight.

CHAPTER XXII.

In an Hour or Not at All.

"SO now you comprehend, gentlemen, why every foe of Rocca's is a friend of mine." The musician's story

was ended—a story of cold-blooded villainy, persecution, and suffering into which it is not necessary to enter again. He had told it to us in the cheap restaurant outside of which the cabman had stopped.

Nothing short of that tragedy of blood could have held our attention as we sat there, waiting, hearing in every sound the heavy tread of the banker, hoping for his return before he had even had the time to meet his peril. But the musician had held us. Fortune had brought him and his brother, years before, to Palermo, to be befriended there by the dead Luigi Bigontina. For a while the fates smiled, and then came the crash.

Somehow, his brother had permitted himself to be swept into the net of the Mafia—there was at times something to be said in its favor, but not as Rocca ruled it, and Rocca ruled it absolutely. When the boy learned what was expected of him, he mutinied. And to mutiny against the Mafia there is but one end.

In trying to save his brother, the violinist had drawn on his own head the same doom. He had escaped, it is true, but for the moment only. At the Auvérigne, with his soul eaten with ungratified vengeance, he had fiddled and listened.

"I was as safe there as anywhere," he said; "and a man must live, gentlemen. I had only my violin."

The coming of Ghedina had thrown him into a panic, only too well justified, but his conversation with Rosa, the old servant of the Bigontinas, had fired all his lust for revenge. As he told us in the cab, he had come back to fight.

So Rocca was head of the Mafia, and it was the Mafia we had been fighting. It was hardly a surprise, but it was none the less appalling. I knew something of Sicily, and how helplessly it lay in the grasp of its secret tyrant. Even if Marshfield returned in triumph with Maria Bigontina herself, it would not be victory. The shadow would be upon our lives until the end, as it was upon the musician—and the end was almost inevitable. It was he who voiced my thought:

"If Rocca gets back to Sicily, we are as good as dead. No one can touch him there."

"He won't get back," growled David between clinched teeth, and at that moment the door of the restaurant opened. Peter Marshfield had returned—and returned alone. He walked steadily up to us and sat down, his face as rigid as a bronze cast.

"Get me something to drink," he ordered. "I think I need it."

"Where—" I broke out; but Marshfield waved his hand impatiently.

"Wait. You might as well hear this from the beginning." And it was from the beginning that he told it to us, omitting nothing, dwelling on nothing, speaking as though he were expounding a problem of finance.

When he left us, he had found his way without difficulty to Jefferson Street. It was a quiet Brooklyn street, lined with houses of the better sort, and 149 was like its neighbors, substantial, unpretentious, uninteresting. He walked up the steps of the stoop and rang. He waited for an answer.

There was no answer, and again he rang. Still there was no answer. Then Marshfield pressed his finger against the button and held it there, while the bell clamored its summons throughout the house and out into the street.

As usual, Marshfield had calculated accurately. Visitors were unwelcome at 149 Jefferson Street; but an obstinate old gentleman attracting the attention of the entire neighborhood by his persistent demand for admission was more so. In an instant a key turned, the door was opened on the chain, and a surly face peered out.

"What you want?" demanded its inhospitable owner.

"I want to see Mr. Rocca," returned Marshfield.

"Not here," and the man attempted to slam the door. He succeeded only in closing it upon the broad sole of Marshfield's shoe.

"Yes, he is," said that gentleman. "I know better. Give him this card. Look sharp now," for the fellow was hesitating, perplexed by the visitor's assurance. "Look sharp, or it will be the worse for you when Rocca hears of it."

I suppose it was the air which years of unquestioned authority bestow that overawed the man. Muttering something

about inquiring within, he departed with the card, leaving Marshfield with his foot in the crack of the door, the victor in the first skirmish. In a minute or two the man returned, transformed into an obsequious servant.

"Will the gentleman please to enter?" he asked, swinging wide the guardian door.

He escorted Marshfield across the hall to a small reception-room, flung open the door for him, and departed. In the center of the room, his hands behind his back and a forbidding smile on his heavy lips, was Signor Rocca.

"Good evening, Mr. Marshfield. I had hardly expected this honor."

"I had hardly expected to pay it," returned Marshfield, unruffled; "but business is business, Mr. Rocca."

"Quite so, and how did you know that I was here?"

"It is my business to know many things, for instance"—Marshfield deliberately drew up a chair and sat down—"for instance, I know why you did not produce the evidence I demanded."

Rocca's lips tightened and his eyes narrowed. "Indeed, and why was that?"

"For the good reason that you did not have it. I have." Rocca stepped between Marshfield and the door, but the banker merely followed him with his eyes. "I didn't bring it with me, Mr. Rocca. I was not born yesterday."

The Italian laughed shortly: "You seem rather suspicious, Mr. Marshfield. Are you in the habit of doing business with pickpockets?"

"Sometimes," answered Marshfield, and I can picture the figure of the grim old man sitting quietly in the chair, gazing straight into the scoundrel's eyes.

Rocca's face darkened at the thrust, and he frowned down on his visitor. "Did you come here to insult me, Mr. Marshfield? That is likely to be a dangerous amusement. Also, I may remind you that you do not own this evidence of which you speak."

"Bosh!" The banker crossed his legs, settling back comfortably in his chair as though for a prolonged session. "Bosh! You don't own it, either. The difference is that I have it and you haven't. That's the difference; the question is, what are we going to do?"

"I see," Rocca's face cleared. "You come to propose what you call a deal."

"I did not come for the pleasure of your society," retorted Marshfield, and for a while there was silence in the little reception-room.

"Well," said Rocca at length, and he walked carelessly away from the door. "what do you propose? You have seen the evidence; is it satisfactory?"

"Quite. There is only one thing lacking."

"Ah, and what is that?"

"The key."

"Oh!" Rocca's face was fairly wreathed in smiles as he beamed down on his visitor. "Oh, you have found that out? The papers aren't much without that, are they?"

"No. Just a little more than the key without the papers." For a minute the two men eyed each other before the banker went calmly on: "Under the circumstances, I think we might as well go back to where we began."

"You see, we really have to give this man Paget something. He knows too much not to. I don't care about giving him money, so we had better give him the girl."

The assured impudence of the suggestion was too much even for Rocca's composure. He started forward with an ugly scowl and raised voice:

"What girl? What talk is this? Paget—" He controlled himself with an effort in front of the chair where the banker sat impassive. "You are crazy, Mr. Marshfield," he ended with a belated attempt at a sneer.

"Oh, no, merely prudent. As you remarked, neither you nor I own these papers, and Paget knows it. It would be awkward if he talked. Give him the girl and he won't. It's all quite simple, if you would scowl less and think more."

Rocca's face was black, and his fists clenched, but the outbreak did not come. Instead, he glared impotently at his visitor in a tumult of indecision that choked his rage. Gold was the god he worshiped, and Marshfield held it out to him. But, on the other hand, there was Maria. Surely there was some way to win and keep both—only, at the minute, he could not see it.

Peter Marshfield read the man as

plainly as he might have the newspaper head-lines that told of his latest financial coup, but he said nothing. Only he swung his foot idly and waited, his gray eyes relentlessly tearing the mask from the scoundrel before him.

The Italian made up his mind at last. With a forced laugh, he turned away from the banker to lean with outstretched hand against the wall, close to the door.

"You are crazy," he sneered. "I know of no girl."

"Nor I of any papers." Marshfield rose quickly to his feet in stern command. "Don't ring that bell, Mr. Rocca. You don't dare touch me."

And Rocca did not. His audacious eyes met Marshfield's unflinchingly, but his hand did not press the hidden signal whose existence the banker had divined. It still lingered there, however; when he snarled: "And why not?"

"It wouldn't pay," said Marshfield quietly. "You would lose your Abyssinian mine, and you would get the whole United States at your heels. Stephen Paget is an unknown newspaper man, Mr. Rocca. He may disappear with every girl he ever knew, and it is no one's business. But I—well, there are men who know where I have gone, and I am Peter Marshfield."

Rocca's hand crept slowly downward to his side. It was perfectly true. If he had touched Marshfield, he would have been a hunted man all the rest of his life. It was not worth it. The banker nodded his head in satisfaction as he watched.

"That is better; now, do you think you could find this girl if I should suddenly discover the papers? After that, we might continue the negotiations you were kind enough to begin with me a few days ago."

"You take a deal of interest in this girl," replied the Italian. "What is it to you where she is?"

"I thought I had told you once," said Marshfield wearily. "Paget is not to talk. Now, are you going to give her to me or not?"

Rocca did not answer at once. He was thinking hard, his keen mind striving to wrench some advantage from this new situation. Involuntarily, he stepped across the room to a side window and

looked out. Marshfield's tireless, persistent eyes followed, looking out too.

Beneath the window the ground fell abruptly away, a steep hill tumbling down to the yards of the river-front. Through the dusk shone the lights of a steamer, and a smudge of rising smoke was dimly outlined against the sky.

Rocca turned sharply on his heel. "In an hour," he said, "if you bring me the papers, I will give you Maria Bigontina. She is not here, but doubtless my friends will oblige me by bringing her. But they will bring her nowhere but here; therefore, you must bring the papers here."

"I am here already," answered Marshfield. "One hour is as good as another. Give me the girl. You have the key already; the rest you can have for the asking at my office."

The Italian shook his head. "Possibly; I run no chances. Bring me the papers in an hour, and come alone. Besides, Marie is not here."

"Oh, rot!" began Marshfield; but Rocca interrupted him with a loud call: "Giuseppe, the door for this gentleman. In an hour, Mr. Marshfield, or not at all—it is my last word."

The burly figure of the doorkeeper loomed beside my friend's father. His errand was over. Rocca bowed farewell to him, and the door of 149 Jefferson Street was locked behind him.

CHAPTER XXIII.

Drawing the Net.

AS he finished his narrative, Mr. Marshfield reached across the table of the little restaurant. "Give me those papers, Steve," he said. The map and the deed were in his hands before I grasped the meaning of his request.

"You're not going back!" I gasped. "There's no faith in the man, if you had had these things the other time, you would never have got away."

Old Marshfield smiled grimly. "Quite right, Stephen, I never would have. Nevertheless, I am going back. Excuse me a minute." He stalked to the rear of the room, and we saw him busy in a telephone-booth.

"He's got something up his sleeve,"

muttered David, as we watched the gray head bending over the instrument. "I wonder what the dickens it is?"

"There's no faith in Rocca," I repeated. "We can't let him go back. We oughtn't to have let him go at all."

"Don't worry about the governor," retorted Dave. "He knows what he's up against. I wish we knew as well."

His father may have known, but he was in no hurry to inform us. When he returned he seated himself again at the table, laying his watch before him without a word. Once I opened my mouth to speak, but closed it again. The least I could do in gratitude was to respect his silence.

The strain told, however. It seemed as though I could not keep my seat, could not maintain that horrible silence another second, when the door of the restaurant opened to admit three men. They were all big, inclined to corpulence, but still strong and active and endowed with obvious aggressiveness. After one quick glance about the room, one of them stepped up to us.

"This is very strange, Mr. Marshfield," he began, but the banker cut him short.

"You ought to be used to strange things, inspector. We have been waiting for you."

"I came quickly enough," said the other, and I recognized the gruff tones at once as those of Inspector McCormick, the head of the detective bureau. "Lucky I was in my office. It's not every policeman who would chase over the city for a telephone message."

"It wasn't every policeman I was telephoning to," retorted Marshfield. "Did you do as I asked?"

"Of course," snapped the other. "I know my job. But what are we up to now?"

"Waiting," answered Marshfield. "If you have those guns I asked for, you might hand them over to my son and Mr. Paget here."

McCormick regarded us doubtfully. "This is very unusual, Mr. Marshfield," he said. "What is this affair?"

"Ours," said the banker curtly. "I don't ask many favors, McCormick, but I ask this. You wait here half an hour. If I'm not back by then, go round to 149

Jefferson Street and break the place open. Until then, it is our affair; after that, do what you like. You know me; will you do it?"

"I don't like it, Mr. Marshfield—"

"Neither do I," interrupted the banker, rising to his feet; "but it's got to be done. Come along, you three."

Clutching the revolvers the policeman reluctantly handed to us, we followed him to the street in a daze. There he halted to give us our instructions:

"You three go down to the pier by the steamer, and wait in the alley this fellow told us of in the cab. If anybody comes along, stop him. I fancy myself it will be Rocca, and in a hurry. If it is, make him take you to the girl. The police will be round in the neighborhood somewhere if you need them; but I prefer to trust you. Somebody may have to think, you know. Good-by."

He was a rod or two up the street when David sprang after him and grasped him by the sleeve.

"By Heaven, you sha'n't go!" he cried hoarsely. "Give me those papers, and let me take them."

Wrenching himself free, Peter Marshfield wheeled roughly upon his son. "Do as you're told," he growled. "Go fight with your hands, and let me fight with my head."

Turning his back upon us, he strode up the street. I heard David give a choking little gasp, and there was a queer lump in my own throat; but it was the violinist who spoke:

"He is a brave gentleman. Come, I will show you the alley."

By a labyrinth of devious byways, he brought us out at length upon the river, close to the uncovered dock where lay the fruit steamer. It was quite dark now, and, as far as we could tell, there was no one about to observe us as we clung to the shadow of a high fence.

Far above us many lights marked the row of quiet houses on the heights. Between their solid respectability and this obscure section of the city's water-front, there seemed no possible connection. Yet there was one. The fence on our left stopped suddenly, to begin again a pace or two beyond.

The gap between was the mouth of the alley which the musician had discovered

in his midnight prowlings about the fortress of his unsuspecting enemies. We dived into it, and were swallowed at once in the dense shadow.

It was too dark to do more than inch our way slowly forward. We felt the ground rise sharply under our feet, and knew that we were climbing toward the house, but of what lay on either side we could form no idea. The alley was narrow, however. When we halted well up the slope, there was no chance for any one to pass us. One exit from 149 Jefferson Street was effectually barred.

But what was happening at the entrance? In the darkness I still saw Peter Marshfield's broad back as he swung away from us to he knew not what. There was no faith in Rocca, and now he had the papers with him. There was no faith in Rocca! How many times I said that to myself I do not know. I was still repeating it when the words were driven from my head.

Through the blackness above a man was coming down to us—coming as fast as the steep slope and slippery path permitted. We heard his heavy footsteps, and then a dark form shot in front of us. I dived at his knees as he came, struck them with my shoulder, and, with my arms twined about his legs, brought him to the ground, a helpless mass. While I clung to him, blindly obeying old Marshfield's instructions to stop whoever came from the house, David struck a match in the shelter of his hands.

"By all that's holy, it is Rocca!" he cried, holding the little flame close to the fallen man's face. "Get up, you!"

Grasping the Italian by the collar, he dragged him to his feet, still dazed by the violence of his fall. "Where is she?" he snarled. "Speak, or I'll—" The threat was the more significant for its not being finished, but Rocca could only gasp for breath.

"She's on the steamer," I breathed in his ear, my very hope warning me to caution. "Your father guessed it. Rocca's got the papers, and he's trying to get off himself."

"You're right. But what then?"

"This." The time had come for the last chance, the last charge of the old guard that would win or lose it all. I

slipped my arm part way through Rocca's, and the muzzle of Inspector McCormick's revolver pressed against the villain's side. "You feel that, Mr. Rocca? That's a pistol. March!"

The Italian did not hesitate. He had seen too many men killed in his life to count on my possible reluctance to shoot down a man in cold blood. And my blood was not cold. At that moment I believe I would have killed him with as clear a conscience as ever a soldier fought the battles of his country. Fortunately for my future peace of mind, it was not necessary.

We emerged from the alley, a little knot of men shutting in our captive, the revolver pressed with convincing force against his side. Straight across the street, to the pier, and up the gangplank we walked to the deck of the steamer. There we stopped to confront as bewildered a gang of seafaring ruffians as it has ever been my fortune to behold.

"Order her up," I whispered, and the revolver forced its way still farther into the folds of his coat.

On the face he turned to me was written all the black evil of the man. "You," he began, but the steel was jammed against his side and he was silent.

"Order her up!" I repeated. "And before I count five. One—two—three—"

"Bring the *signorina* on deck." The voice was thin and broken, like the ring of cracked crockery. It was a different man that David and I held between us from the suave, self-confident host who had entertained us at luncheon that morning.

Changed though he was, the man's power was still unbroken. At the order, one of the least ruffianly of the crew before us disappeared in the companion-way; the others remained staring at us in undisguised astonishment.

They could not see the revolver, they did not know who we were, and they must long since have grown accustomed to the unexpected; but certainly they had been prepared for no such scene as this. Standing by the other side of Rocca, David took advantage of the pause to slip his hand unobtrusively into the scoundrel's pocket. He drew out a bundle of papers and stuffed them into his

own coat. Then we stood, motionless, waiting.

She came at last. At sight of the frail face, even whiter now and more drawn than when it had first glorified the chill desolation of Washington Square, the revolver in my hand shook. It was Rocca who had done this, and his life was mine, to take or give. I sometimes wonder how it was that my finger lay quiet on the trigger.

For a second she stood bewildered at the change of scene; then, catching sight of the four men who watched her, she sprang back:

"No, no!" And her hands were flung out as though to blot us from her sight. "Not you again!"

The cry struck into my heart. In the joy of battle, for her sake I had forgotten that it was as Rocca's friend she had last seen me, that it was as Rocca's friend she now saw me standing by his side on the deck of his steamer. Even with death before his eyes, the keen Italian grasped something of the situation. The mud-bespattered visage he turned to me bore a hideous leer.

"You see your welcome," he jeered, but the next instant his face blanched at the sudden stab of the revolver. It was not now as it had been in Eleventh Street. I must play the brute a minute longer; then the nightmare would be at an end.

"Come here," I cried out harshly to the girl. "Come here, or Pietro dies!"

Her hands dropped, and she stared at me with wide, terror-stricken eyes. She could not reason that it was an empty threat. Horror had been heaped too heavily upon her for her to question new disaster.

Slowly, reluctantly, as though drawn by an irresistible magnet, she crept across the deck. Nearer and nearer she came, until my breath stopped in the suspense of the final moment.

My eye measured the distance; she was within my reach. The revolver was still against Rocca's side, when my left arm shot out and grasped her.

"Move, and you're dead, Rocca!"

My shout of triumph rang through the night as I sprang backward toward the gangplank, Maria Bigontina within the circle of my arm. The wavering aim of my weapon mattered nothing; planted

like a rock before us stood David Marshfield, his leveled revolver steady in front of him.

How we staggered down that gangplank I do not know—nor did I ever know. Only I remember that, as I stood upon the dock, I saw David backing slowly down, and the light from the lamps of the deck shone upon the steel in his hand.

From the darkness of the alley behind us came the shrill whistle of a police signal, the sound of running men, and the roar of Inspector McCormick's command: "On the steamer, men! They're on the steamer!"

Then chaos was let loose. Above the inferno of Italian shouts and oaths rose Rocca's order: "Down with that gangplank! Cast off! Full speed ahead!"

The gangplank crashed down by our feet, the end of a heavy hawser splashed into the water; the steamer had started on her way to Sicily and safety. But, while only a foot or two separated her from the dock, the figure of a slender man shot abruptly into the center of the ring about Rocca. The light fell full upon his face, and we saw that it was Ghedina.

"Who are you," he screamed, "to give us orders? Clumsy fool! You betray us but once!"

He flung himself straight at his defeated chief. There was the flash of steel and the dark form of a man falling. The police found Rocca afterward—flat on his back on the deck of his fruit-steamer, his unseeing eyes turned up to the stars, a knife thrust downward through his throat, under the protruding, sensual jaw.

So die many of the chiefs of the Mafia. I am told. Unquestioned despots while they reign, death is the penalty they pay for failure.

Ghedina's triumph was short-lived. While we stood aghast at the tragedy before the Cavour could gather way, a police-boat dashed out from the shadows of the neighboring pier. There was a sharp command, the crack of a pistol, and then we saw men swarming over the low sides of the fruiter. Old Peter Marshfield had fought with his head to good purpose.

The pier was filled with policemen now, but I did not notice them. A hand fell on my shoulder, and I turned to find him panting beside me.

"Thank Heaven!" I gasped. "You're safe!" But not even to shake hands with him would I release my arms from the prize they clutched so fiercely.

"Safe! Of course I'm safe. They grabbed the papers and gagged me—that's what I expected. You got her, I see; and now I suppose you will think yourself happy."

"I suppose so—I—yon—I want to thank—" The silly words stuck in my throat as I looked from the gray-haired banker who had wrought this miracle into eyes that glowed up at me from a white face. "Will I?" I asked abruptly.

For a second my eyes held hers, blazing with a light I could not read. She did not answer the question; instead, she lay quiet and inert upon the arm that pressed her to me. She had offered no resistance as I carried her down the gang-plank; she offered none now; but the fire flaming in her dark eyes burned its way into my soul and seemed to lay it bare before her.

"Will I?" I asked again, for still she had not answered.

"What do you want?" she breathed. "Why have you done it?"

"Want!" My voice rang through the noise-filled pier, above the commands of policemen and the shouts of excited, angry men. "Want! I want you—and I have you now."

With a fierce instinct of protection, my arm tightened about her; but this time she did not yield. Her slender hands pushed hard against my breast, all her helpless strength fought me, and for very shame my arm dropped to my side. I could fight for her—I could not fight against her.

She fell away from me, her gaze roaming without comprehension over the sudden tumult. The pier was thronged with shouting men; between the dock and the steamer was open water; on the deck of the *Cavour* the clubs of the men from the police-launch were making short work of the crew demoralized by the death of their master and the mu-

tiny of his lieutenant. We had won, and she was free—but she knew nothing of it.

Suddenly she drew herself erect in tense courage. She could not reach the steamer—one glance had told her that. She was a prisoner in my hands, and she faced me fearlessly.

"You betrayed me to Rocca. Now you have taken me from him, and you have killed my brother."

The blank wonder in the voice was that of one who has outlived hope. In that loud chaos of battle and victory she stood alone and undaunted, facing the end.

"Your brother is safe with Mrs. Noyes. I never betrayed you!"

I did not recognize the words as my own—I hardly knew that I had spoken. In my head was the conviction that it was all a dream, that some time we would awake and I would find her sitting before the fire as she had sat that first afternoon.

"My brother, Pietro! He is safe!" The cry brought me sharply to myself. "But it is impossible."

"*Signorina*, your brother is in the house from which you fled. In half an hour you will be with him and free."

She stood motionless upon the dock, her eyes searching mine; and slowly I saw a new glory arise from their depths.

"I almost believe you," she murmured. "And, oh, if I could!"

One step forward and my arms were about her. "He is safe," I breathed in her ear, and then with the blessed awakening Marshfield's last words came to me. "Am I to be happy?" I asked.

The long black lashes closed softly down upon her cheek. "I do not understand it all," whispered Maria Bigontina, "but I know that I am very happy. I do not think I ever quite believed it."

For the second time that evening the heavy hand of Peter Marshfield fell on my shoulder. The banker was still standing by my side; but he was not looking at us, and his eyes blinked strangely when he turned them at last from the lights in the sky-scrapers of Manhattan.

"If you are going to marry her, Paget," he muttered gruffly, "you'll manage her property. How much will you take for that Abyssinian stuff?"

(The end.)

ON THE EDITORIAL CARPET.

Side-Talks With the Man Who Sits in the Cab of
the Magazine and Is Commonly Called an Editor.

JUST completed our March time-card. Therefore, we feel that we can load our think-tank with pride, lay back, light the pipe and chew the fat like a bake-head who has spent half his life on an old wood-burner.

But any motive-power that can pull along a train of a few hundred thousand cars, such as we pull every month, isn't much like the woodburners we remember.

We hold all long-distance and tonnage records, and the length of time we keep out of the repair shops would, we think, delight the heart of any master mechanic.

But one thing we must say—it isn't any cinch. We do it because we are always overhauling and oiling and cleaning and adjusting, and because we use nothing but the finest oil and the best fuel. Might as well quit cold as try to make a limited schedule on lignite or some kind of grease that looks like molasses and smells like a hot hox long neglected.

We have just given this February number the high ball and sent it on its way. If any of the crew deserves a brownie, the captain who sits back here and does the heavy thinking wants to know about it—and as quickly as possible. And its up to you, boys.

We want particularly to assure you on these points this month, because three of our splendid serials come to an end in this number.

Maybe you think we talk like a pinhead who has just been made private secretary to the G. P. A. If so, call us down.

In March we shall start on the trans-continental run a railroad novel, "Without Lights." It is the story of a young railroad man's fight in the dark and it is hot everywhere except at the journals. Its author is J. Aubrey Tyson.

To take the place of another serial, and by way of a little variety, we are going to run a complete long story about a bear fight in a Western railroad town. It is by C. W. Beels, and it is full of the stuff that makes your mental rails curl up.

In the matter of short fiction we have not closed the throttle a notch over the Febru-

ary speed, and this we consider one of the fastest fiction numbers we have sent out.

We have not neglected humor, as you will admit between laughs when you read "The Man from Texas," by James Francis Dwyer, and "The Rebate," by Frank Packard, but we have four tense, dramatic stories—one by Robert Fulkerson Hoffman, one by Harry Bedwell, and the others are by new writers—Robert T. Creel and Earl C. Wight.

"Riding the Rail from Coast to Coast" slides onto its last rail length next month and comes to a stop. We dislike to state that the board is placed against this bully series, but we have another series by Mr. Willets ready to couple onto the train of his popularity, which will haul it over the steel at the same old gait. Look out for it.

A clever new series that we hinted at a month or two ago, "The Evolution of Almost," by Horace Herr will also start out in March. Did you ever see a dog carrying a dinner-pail? That's how proud we are. Almost!

E. L. Bacon will tell how a record-breaking special is put on for a long run when some millionaire suddenly decides that he must cover the ground quickly.

Arno Dosch will tell of the conquest of New York by the Pennsylvania Railroad's new entrance to the metropolis. A big, gripping article told in a big way.

We have one of the niftiest yarns for the True Stories Series you ever read. It is called—"Neath the Shade of the Old Water Tank." It's a bully tale, too.

Robert H. Rogers, one of the most interesting writers on railroad subjects that ever steamed into our depot, will have a special on the nerve of the Eagle-Eye.

We think that our Old-Timer Tales are going to hit the boys just right. The second one will tell about the famous run of the Jarratt-Palmer special back in 1876, when most of us youngsters were playing with tin engines tied to strings.

But that isn't all. It's time for us to throw the jolly switch and get on another track.

Our March number will be like the new

4-4-6-2 Santa Fe Mallet-Articulated—all right.

ASLEEP AT THE SWITCH.

SOME time ago a reader asked us to reprint the poem "Asleep at the Switch," and another reader has since asked us for the name of the author. We are indebted to a lady reader for the following copy. The name of the author is George Hoey, as we stated in this department in the October number.

The first thing I remember was Carlo tugging away,
With the sleeve of my coat fast in his teeth,
pulling, as much as to say:
"Come, master, awake, and tend to the switch—lives now depend upon you,
"Think of the souls in the coming train,
and the graves you're sending them to.
"Think of the mother, and babe at her breast,
Think of the father and son,
"Think of the lover, and loved one, too,
think of them, doomed every one—
"To fall, as it were, by your very hand, into
you fathomless ditch,
"Murdered by one who should guard them
from harm, who now lies asleep at the
switch."

I sprang up amazed, scarce knew where I
stood, sleep had o'ermastered me so.
I could hear the winds hollowly howling, and
the deep river dashing below;
I could hear the forest leaves rustling, as the
trees by the tempest were fanned,
But what was that noise at a distance? That
I could not understand!
I heard it at first indistinctly, like the rolling
of some muffled drum,
Then nearer and nearer it came to me, and
made my very ears hum;
What is this light that surrounds me and
seems to set fire to my brain?
What whistle's that yelling so shrilly? Oh,
God! I know now—it's the train!

We often stand facing some danger, and
seem to take root to the place;
So I stood with this demon before me, its
heated breath scorching my face;
Its headlight made day of the darkness, and
glared like the eyes of some witch;
The train was almost upon me before I re-
membered the switch.
The switch resisted my efforts, some devil
seemed holding it back;
I sprang to it seizing it wildly, the train dash-
ing fast down the track.
On, on came the fiery-eyed monster, and
shot by my face like a flash!
I swooned to the earth the next moment, and
knew nothing after the crash!

How long I laid there unconscious is im-
possible for me to tell;
My stupor was almost a heaven, my waking
almost a hell.

For I then heard the piteous moaning and
shrieking of husbands and wives,
And I thought of the day we all shrink from,
when I must account for their lives;
Mothers rushed by me like maniacs, their
eyes staring madly and wild;
Fathers, losing their courage, gave way to
their grief like a child;
Children searching for parents, I noticed, as
by me they sped,
And lips that could form naught but "Ma-
ma" were calling for one perhaps dead.

My mind was made up in a second—the river
should hide me away;
When, under the still burning rafters, I sud-
denly noticed there lay
A little white hand—she who owned it was
doubtless an object of love
To one whom her loss would drive frantic,
tho' she guarded him now from above.
I tenderly lifted the rafters and quietly laid
them one side;
How little she thought of her journey when
she left for this last fatal ride;
I lifted the last log from off her, and while
searching for some spark of life,
Turned her little face up in the starlight, and
recognized—Maggie, my wife!

Oh, Lord! Thy scourge is a hard one! At
a blow Thou hast shattered my pride!
My life will be one endless night-time with
Maggie away from my side;
How often we've sat down and pictured the
scenes in our long happy life;
How I'd strive through all my lifetime to
build up a home for my wife.
How people would envy us always in our
cozy and neat little nest,
When I would do all of the labor and Maggie
should all the day rest;
How one of God's blessings might cheer us
when some day I perhaps should be
rich—
But all of my dreams have been shattered
while I lay there asleep at the switch.

I fancied I stood on my trial; the jury and
judge I could see,
And every eye in the court-room was stead-
fastly fixed upon me;
And fingers were pointed in scorn, till I felt
my face blushing blood-red,
And the next thing I heard were the words,
"Hung by the neck—until dead."

Then I felt myself pulled once again, and my
hand caught tight hold of a dress.
And I heard "What's the matter, dear Jim?
You've had a bad nightmare, I guess,"
And there stood Maggie, my wife, with never
a scar from the ditch—
I'd been taking a nap in my bed, and had not
been asleep at the switch.

BOUQUETS.

WHILE we heartily believe in that good
American motto, "Every knock is a
boost," we regret this month that we have

no knocks from our readers to liven up this little part of The Carpet. They are all bouquets, and they are pretty fragrant to us. Here are what some of the boys say:

H. STILLSON, DURHAM, CONCORD, CALIFORNIA.—I have intended writing you for some time to express my appreciation of the value of THE RAILROAD MAN'S MAGAZINE. I have been a reader since your first issue, and always watch the news-stands impatiently for its appearance.

C. L. BAXTER, CLEVELAND, OHIO.—Though I am not a railroad man, I like your magazine very much, and get it regularly from the news-stands.

J. P. SMITH, READING, PENNSYLVANIA.—I have been a constant reader of THE RAILROAD MAN'S MAGAZINE, for more than two years. It is the best and most classy magazine ever published, and contains everything of interest to railroad men. Being a telegraph operator, I find it very interesting while on duty at night.

B. C. PARKER, COLTON, CALIFORNIA.—I have never missed a copy of your magazine since it came out, and if it continues as interesting in the future as in the past, I never will.

C. L. MILLER, TAMPA, FLORIDA.—I think THE RAILROAD MAN'S MAGAZINE is nearly perfect and improves with each issue.

P. S. MEACHAM, DULUTH, MINNESOTA.—My sister and I had a scrap about THE RAILROAD MAN'S MAGAZINE this month, and the little kids cry every time we take it away from them. It is the one magazine that cannot be kicked, and the person who makes a kick about it must have a severe attack of brainstorm. The tonnage it carries is up to the standard.

GEORGE F. BABB, SHREVEPORT, LOUISIANA.—While I am not expert at throwing bouquets, I think we should "toss a few buds" to "Ye Editor," when we have received so many from him. I have been a regular reader of THE RAILROAD MAN'S MAGAZINE from the first issue, and I can say that it has filled a long-looked-for link in railroad literature.

While I have not guided a hog for over eight years, I sure do appreciate THE RAILROAD MAN'S MAGAZINE, for it is railroad from cover to cover.

While some one-sided readers occasionally "set your packing out" for you, I surely get the worth of my money. While it may not be as good as the one-sided reader could do, it is better than I could do, so I get even by sitting up late to read my copy.

Let the good work go on. I remain a satisfied reader of THE RAILROAD MAN'S MAGAZINE.

F. H. CHILDS, MELROSE, NEW MEXICO.—I have been reading your magazine for the last three years. I think it is clock-full of

human nature. 'The contents of each number are like what the Irishman said about the whisky, "It is all good and some better."

BERT SMITH, TOMBSTONE, ARIZONA.—I am a constant reader of your magazine, and think it the best.

PERCY NEISTER, RICHMOND, VIRGINIA.—Been a constant reader of your magazine, and now let me register a kick. I want it every week—or twice a month, anyhow—as once per is so long to wait. May your magazine run for many more years to come. Don't try to improve it any more, as it is O. K. Just give it to us oftener.



HAULING NITROGLYCERIN.

HERE is an interesting and important letter from a man who evidently is in a position to know just what he is talking about. If, as he suggests, any of our readers want his assistance to further his idea, we will be pleased to furnish his name and address on application:

EDITOR THE RAILROAD MAN'S MAGAZINE:

I have been engaged in the manufacturing and shooting of nitroglycerin for oil-well purposes for a number of years, so I do not expect recognition from your very popular railroaders, except where human life and property are at stake.

Now I have been a very eager patron at the news-stands on the tenth of every month for a year and a half to get THE RAILROAD MAN'S MAGAZINE, as I consider it the most interesting publication ever put out. In your December number I find an article entitled, "The Dynamite Division," by D. A. Stovall, and it recalls a good many similar cases that have happened in the Eastern States, some of which have been mentioned by writers in your magazine.

As I am a great lover of fair play, I believe those train crews have enough risks to take without having to handle cars of dynamite packed as they are. There are plenty of men in their line who would be willing to show up the cause of these explosions, but who hold back with the fear of being known as a "butter-in."

Now, if facts will be the means of stopping this useless slaughtering of innocent lives, I am willing to accept the above title, and more if need be.

The only cause for those explosions is seepage of the nitroglycerin from the absorbent, caused by too warm a temperature being kept in the car, or by the carelessness of the employees of powder companies in not getting the nitroglycerin equally distributed with the absorbent, or by the compression of the sticks, forcing or squeezing out the glycerin, which comes in contact with the nail-heads on the boxes or any other iron plates or bolt-heads on the inside of the box cars.

This seepage can be stopped by placing light tin pans on the inside of each case of dynamite, and which should have a depth of at least one-third that of the case. This precaution will hold the seepage from coming in contact with hard substances. The top of each case should be plainly marked "This Side Up."

Having taken into consideration that sometimes these cases are smashed open and even the car upset, the danger is almost entirely eliminated by the glycerin being in its proper place at the *time of the shock*. The railway companies or the government could make the demand for this precaution and get it.

I do not care for notoriety, but if any of your boys should become interested in this and wish a detailed description of the nature of this explosive, they may get my address through you and write me. Personally, I assure them that I will do all in my power to help their cause.

X. Y.

MORE VERSE FROM ATLANTA.

JAMES A. CROWELL, the railroad bard of Atlanta, author of "Oh, Yon Ham" (First Section), is again in our midst—as the real country editor would say. He contributes one more heart-touching poem to the Carpet, a gentle tribute and plaintive pæan to that much-written, much-mooted person, the poor old ho.

CONTENTED.

Up on the top, 'mid the sleet and snow,
Of an east-bound freight lay a poor old ho.
His legs were numb, his clothes were old,
And he could hardly keep his hold.
He thought about the birds and bees,
And back beneath the maple trees,
When he sat with Katie by the brook—
The sunshine glowed in every nook.
He called her "Pet," she called him "Dear,"
And they were married in a year.
The biscuits that his Katie made
He thought of, too, as there he laid
Upon the train, so wan and hare,
And then thanked Heaven that he was there.

ANOTHER OLD-TIMER.

OUR good friend, E. F. Jackson, sends us a pleasant letter from his home in Florence, Minnesota, in which he refers to William G. King, an old-timer, mentioned in our December number. Mr. King began by braking on the Northern Central out of Baltimore in 1869.

"I can go him six years better," writes Mr. Jackson, "having commenced as a messenger boy in 1863 at Appleton, Wisconsin. I have worn the railroad harness ever since,

filling positions as messenger, operator, station-agent, track-despatcher and chief despatcher.

"When I commenced, a sound operator was a rarity. We all worked the old register. The engines were wood burners, with the old petticoat smoke-stacks keyed on eccentrics, and slipping out of place. In some places the track was made of 4x4 wood with strap iron and snake heads. Twelve to fourteen cars was a big train, and a 20,000-capacity car was 'a large one.'"

Now, who can go farther back than Brother Jackson?

BALLADS IN DEMAND.

A DISTINCTIVE thing about railroad-ing, a distinction which it does not share with any other business on land, but in which it resembles the free life of the seafarer, is the way the day's work and the day's play lends itself to song. There are, considering the comparatively short time that railroads have occupied the attention of poets and singers, perhaps more songs dealing with the rail than there are dealing with the sea.

This department has proved that there is an unending demand for railroad songs, and that there is an unending supply of them. One friend has written asking that some reader will supply the song, "The Train That Never Rolled In." It begins:

I was speeding on the train
That would bring me back again
To the girl I loved in Sunny Tennessee.

Another reader would like to be supplied with the words of "Life is Like a Mountain Railroad." We also have a request for a song which begins,

On a Sunday morning it began to rain,
Around a mountain came a passenger-train.

Still another reader has asked us for a poem written by a brakeman who was discharged from the Southern Railway at Knoxville, Tennessee, several years ago. It begins:

Tell me not in box-car numbers
Life is but an empty dream.

Two hold gentlemen with weird tastes inform us that they have long been looking for songs entitled respectively, "The Hell-Bound Train," and "When Billy Higgins Used to Wiggle His Ears." If anybody has seen any of these ballads in the course of

his wanderings, and can remember enough of them to make readable lines when set down on paper, we shall be glad if he will take his stub of pencil and a scrap of paper and send them on.

THE IDENTITY OF DUGAN.

DUGAN has owned up. We labored with him long before he would confess in public. He pleaded modesty, shame, poor relations, and the police—but, as we pointed out to him, what is sorrow compared with the applause of posterity?

He decided to take the applause and can the sorrow, comforting himself with the hope that perhaps somebody who owed him money, seeing that he was reduced to writing for a living, would repent and send him a remittance.

With this frank explanation, we beg to announce that, in future, the author of the jolly Dugan stories will leave the euphonious shelter of his *nom de plume*, "E. Florence," and come out under his real name—Augustus Wittfeld. He is too good a storyteller to remain unknown.

If you will turn to the story, "Dugan's Pal Goes Dippy," in this number, you will see that we speak the truth. In the letter he sent us admitting his identity, he says:

There are Dugans at work on every road—
Dugans with yarns worth while;
And I trust that the Dugan I write about
Will cause the many to smile.

His mission on earth is a mission of fun,
May he never be known as a bore,
For his object in life is to make *two* grow
Where only *one* smile grew before.

CARPETED AGAIN!

EDITOR, THE RAILROAD MAN'S MAGAZINE:

I NOTICED in the December number of THE RAILROAD MAN'S MAGAZINE, in an article entitled "Making the Lightning Hustle," that the average speed of an operator is nine words a minute.

I greatly differ with you on this subject. I am an operator myself, and would consider nine words to the minute very slow for the average telegraph operator.

Most any ham can copy twenty words with ease, and a good operator generally takes from thirty-five to forty words to the minute. Surely, this must have been a misprint.

I am a regular reader of THE RAILROAD MAN'S MAGAZINE, and think it simply great. I am not a subscriber, but always get a copy of it each month.

I may be mistaken in my charges, but I know a great many operators, and am almost positive that nine words a minute is far below the average. Yours truly,
"RAILROAD HANK."

AS TO OUR MONACHER.

WE have had a great many serious and puzzling problems put up to us at various times, but here is one that taxes our gray matter so that the gage is way beyond the limit.

A reader, who evidently has better intentions, wants to know why we write Young Men's Christian Association and THE RAILROAD MAN'S MAGAZINE. In our editorial capacity we have done most everything, from telling a tallow-pot how to propose to solving the modulus of elasticity in steel springs. We have forgotten a good deal about grammar, especially that part which relates to the construction of plurals and possessives and such things.

So far as we know—*men's* or *man's*—it is simply a matter of choice. We could have called it The Railroad *Men's* Magazine had we wanted to; but it is our belief that a great many noted authorities, such as Gould-Brown and Edgar Allan Poe, always held that the singular was the most forcible and effective.

However, as living examples, we refer to our esteemed sisters, *The Ladies' Home Journal* and the *Woman's Home Companion*.

OH, YOU HAM! (Second Section.)

THE ham is the most popular man on a railroad—not. In the December number we published a fine poetic tribute to this most expert of car-pounders, written by Mr. James A. Crowell. That poem met with approval. It inspired the muse of another gentleman, Mr. E. Logsdon, of Shawnee, Oklahoma, who evidently has bitter proof that the only thing a ham can hit is the hay—except when he is hitting the pike looking for another job. The result of the inspiration was Section Two of the ham sandwich, which runs along thusly:

This ham he got another job
On the grand old B. & O.,
And the way that he OS'd the trains
Was something fierce to know.

But as the night passed onward,
From midnight unto dawn,
This ham got very sleepy
And soon began to yawn.

And soon 'twas dear old Slumberland,
That he had drifted to,
And how he dreamed, and dreamed, and
dreamed
From twelve midnight till two.

He thought he'd been promoted,
In an awfully short time,
And now he was despatching
On the B. & O.'s main line.

He dreamed that he'd been boosted
In another, shorter time.
And now he was superintendent
Of the B. & O.'s main line.

And so he still lay dreaming
As the fast express pulled in.
The despatcher he was calling—
Calling that ham like sin.

Still he dreamed that he was standing
Midst a mighty throng of men,
And a big white-headed gent said,
"I guess we'll promote you again."

And just as they were drinking
To the health of this king-pin,
Old Humpy, boomer brakeman,
Poked him hard upon the chin.

He awoke in awful panic,
And he looked around with fright,
And he heard the C. D. calling
With all his main and might.

Our poor ham is now a looking
For a job—I know you'll weep—
But I think he'll soon be G. M.
Of that good old railroad, Sleep.



THEIR WOES IN VERSE.

OH, ye Casting Buffer! Shades of ye
Main Crank Pin! Hail! Glorious
Injector Steam-Valve—and all the other
Muses! But the manner in which every
railroad man, from captain to end-shack, is
breaking into poetry is enough to make any
man in an editorial cab yell for the binders.

Just as we were drawing the fires and
locking the old steamer up for the night,
just as we were picking up our dinner-
paid and starting home, along came a bunch
of letters from the boys, telling us about
their troubles, and—Holy Headlamp!—tell-
ing them in verse.

We began reading them. We wish we
might print them all, but we have only space
for one here on the last page. The author
is W. C. Deuel, of Birmingham, Alabama.
He says:

"They started us out the other A.M.,
with a little old engine, leaking and in very
poor condition to tackle the day ahead of us.
We were disgusted when she came to the
cab-track.

"The engineer, the brakeman, the fireman
and myself gave voice to some of the state-

ments in the following verses, in which the
meter changes without notice and the rime,
at will, but they express our opinion of the
machine we had to do business with that day.

"Your November number eulogizes the
"Tallow-pot," in a well-written piece of poetry.
The engineer suggested I write up the
113 and send the result to you. So this crime
is as much on him as on any one else, and
we know you will picture that deal we were
up against that day, as probably your experi-
ence has thrown you in a like dilemma.

We respectfully submit our 113 to you:

THE 113.

"What engine have you?" the operator
asked,

As we rolled into C. S.

"My boy, you must have been in the hay,
Or you'd have heard N. B. O. S."

"The engine we have is a la-la, my lad,
She's the pride of the hills and dales,
But the poor old girl has seen better nights,
And weathered many hard north gales."

They built her 'way back "befo' de war,"
She has served them faithfully, too!
The men that have run her and filled her
with coal,

Would number far more than a few.

I recall the day, in my hox career
When she was mentioned as "big."

She was a real consolidator—
Sometimes, we called her, a "pig."

But that day has floated into the past
And will come this way no more,*
Engines like her are now counted out,
With a tag for the beautiful shore.

She'll pull her tonnage down any old hill
And pop like a fiend 'gainst her blower.
She o'ertook a snail—'twas dead, they aver,
So say the "Old Heads," that know 'er.

She bucks like a broncho, kicks like a mule;
The head brakey won't stay inside her.
I never saw anything quite so tough,
As this flat-wheeled Rough Rider!

Baldwin built her and a bald one she is.
Likewise a Tartar, a pippin—
She'll delay the game pulling a sand-pit;
If she ain't blowin' up, she's slippin'.

She is so antiquated and useless now
That whenever I discuss her,
Well, I accent that last syllable
So hard that it ought to hurt her.

But enough of this airy, fairy talk,
I've got her and I've got to go
Over, and benevolently assimilate
The coke ovens at D. O.

Tell that third "X" to fix 'er,
Give us a green "19,"
And may some enemy of mine
Catch the little old "113!"

*An extract from Hep, Hep Laws!

The greatest home charm

Make your home-coming as late as you please from party, ball, or theatre and you will find your boudoir or bed-chamber delightfully warm and "comfy" to talk things over with your guest if the home is Steam or Hot-Water heated and ventilated by

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A No. 1-22-W IDEAL Boiler and 422 ft. of 38-in. AMERICAN Radiators, costing the owner \$195, were used to Hot-Water heat this cottage.

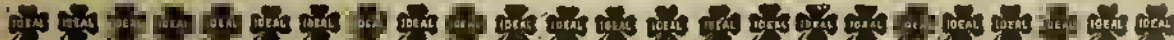
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What is life going to mean to you? Is it going to mean comfort and prosperity, or is lack of training going to condemn you to hard labor for the rest of your days?

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For **you**, there **is** a way to success—a true way—an easy way—a short way. Are you willing to have the International Correspondence Schools of Scranton **make you an expert in your chosen line of work**, in your spare time, and without your

The Coupon Means

When I was sixteen years of age I purchased a Course in Interior Wiring. At that time I was an apprentice at the plumber's trade, getting a small salary.

When I reached the age of seventeen years I started in the business myself as an Electrical Contractor. To-day I am not quite eighteen years of age, with an increased income of \$1.10 per day over what I received when I enrolled.

I owe all my progress to the International Correspondence Schools.

WILLIAM G. METTIN,
P. O. Box 42, South River, N. J.

I have increased my salary 50 per cent. I had no experience in Window Trimming before enrolling in the I. C. S. Shortly after enrolling I got a position with Reid & Congers, largest department store in Clinton, Iowa, as Trimmer. I held the position with said firm for 14 months and then got a better position with T. R. Glanville & Son, Mason City, Iowa, with an increase in salary of 40 per cent.

JOHN AHRENHOLZ, Jr.,
Mason City, Iowa

At the age of sixteen, while employed by a doctor as driver, I enrolled in the Electric Lighting and Railways Course of the I. C. S. After a year's study, in which I nearly completed my course, I secured a position through my application by mail in the power house of the Ottumwa Ry. & Lt. Co., of Ottumwa, Iowa. At the age of nineteen I was promoted to Operating Engineer, which position I have held for the last two years.

W. A. FULLGRAF,
1024 W. Second St., Ottumwa, Iowa

When I landed in this country on the 5th day of December, 1903, I did not know a word of the English language, and consequently was forced by circumstances to hard work for \$10 a month.

About three years later I heard about the I. C. S., and the same day, in June, 1907, I enrolled with you for the short Coal Mining Course, and in May last I received my Diploma.

Last November I took the complete Coal Mining Course. Recently I successfully passed the examination for mine foreman. Now I am getting \$4 a day and only eight hours work.

PETER STEVENS,
Superior, Wyoming.



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FREEDOM

I certainly can speak very highly of your Institution, and through its help I have advanced my salary some 300 per cent. I am now with the Wheeler Cond. & Engineering Co. of New York, as Engineer on the road, and give your schools a good deal of the credit, backed up by an apprenticeship with the Providence Engineering Works.

I would be nowhere without the instruction in the Mechanical Drawing connected with my course.

WM. LONSDALE,
97 Arnold Street, Providence, R. I.

At the time of my enrolment I was engaged as helper in a Montreal Machine Shop at \$8.00 per week. Since then I have held many important positions in Canada and U. S. as Chief Engineer and Superintendent with an 8-fold increase in salary. Am at present General Superintendent, Department of Mines and Minerals, for a large Canadian firm.

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JOSEPH BRADLEY,

71 St. Francois-Xavier, Three Rivers, Quebec, Can.

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Please explain, without further obligation on my part how I can qualify for the position before which I have marked X.

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Alr. Brake Inspector	Foreman Machinist
Alr. Brake Repairman	Chemist
Mechanical Engineer	Assayer
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"My sales \$1,680 in 73 days," writes C. D. Rasp, agent of Wisconsin. "Canvassed 60 people—got 55 orders; sold \$320 in 16 days," writes W. H. Reese, carpenter, of Pennsylvania. "Enclosed order for \$115—first day's work. Best thing I ever worked," writes L. H. Langley, livaryman, of North Dakota. "Everybody thinks the apparatus finest thing. Sold 15 one afternoon," writes Miss Eva Edwards of Nevada, after ordering 73. "I averaged \$164.25 weekly for three months; undoubtedly best line on market," writes J. W. Beent of Kansas. "Enclosed order for \$364.50—only three days' work. No trouble to sell. Appeals to everybody," writes J. Stralun, farmer, of Kansas. "I make \$100.00 daily," writes J. Sevegne, telegrapher, of New York. "It's great! Lucky I answered your ad. Showed it to 44 people—have 39 orders. Sold 17 one day. Sells on sight," writes A. P. Lodewick, solicitor, of Maine. "Sold 17 one day, send 60 more," writes Weather's of Texas. No wonder J. B. Cashman of Minnesota writes: "A man who can't sell your goods

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Send 48 more."

Readers, there's nothing like it. Not sold in stores. Wonderful, but true, this invention gives any home that long-desired blessing—a modern bathroom for \$6.50. Operates wherever water exists—in any room, any part of a room—no water-works, no plumbing, pipes, tools, valves—not even a screw to insert. Does same work as bathroom costing \$150. Think of the millions waiting for this one thing to happen—and it has happened. Really, could anything be more popular, so near to the irresistible, so easy to sell? Who couldn't



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ride to prosperity on such a vehicle? Can't you actually see in this

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Isn't it just what you've been looking for? Just think! This invention, by a really wonderful yet simple combination of mechanical and liquid forces, gives all the standard hygienic baths for men, women, children—cleansing, friction, massage, shower; altogether or separately, hot or cold. Makes bathing 5-minute operation. Cleanses almost automatically. So energizes water that one gallon does more than tubful old way. Used by U. S. government, famous Battle Creek Sanitarium and hundreds of world-renowned people, 100,000 already sold. Millions needed. See how simple, easy, convenient. To bathe just do this: Place combination metallic fountain and heater on wall or shelf, fill with water, touch a match, turn screw—chit's all. Thereafter it works and energizes automatically.

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J. B. HART, a farmer of North Carolina, whose sales for one year total over \$5,000, never sold goods before joining us. Took 16 orders in three hours. He writes: "You can't keep from selling it if properly demonstrated. Appeal to everyone. Never had it recommended by anyone yet."



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M. J. ALLEN, a railroad man of Canada, who started on spare time and later excluded everything for the bath business. Not a regular salesman, yet sold about \$6,800 worth in about 18 months.

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The RAYO Lamp is a high-grade lamp, sold at a low price. There are lamps that cost more, but there is no better lamp at any price. It is constructed throughout of the very best materials, and with the best workmanship.

The burner, wick and chimney are the vital things about a lamp. These parts in the RAYO lamp are constructed with the minutest attention to detail. There is nothing known to the art of lamp-making that can add value to the RAYO lamp as a light-giving device.

The construction of the burner is such that it is easy to clean and easy to re-wick, and the chimney-holder may be raised for lighting without removing shade or chimney. It is nickel-plated over brass and, being without embossing, is easily kept clean.

The RAYO lamp is an ornament to any room in any house. Millions of users attest the merits of Rayo lamps.

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Railroad Man's, 2-10.

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Cleans Carpets, Rugs, Matings, etc. on the floor, by the Vacuum Process

The Home Vacuum Cleaner WEIGHS FOUR POUNDS



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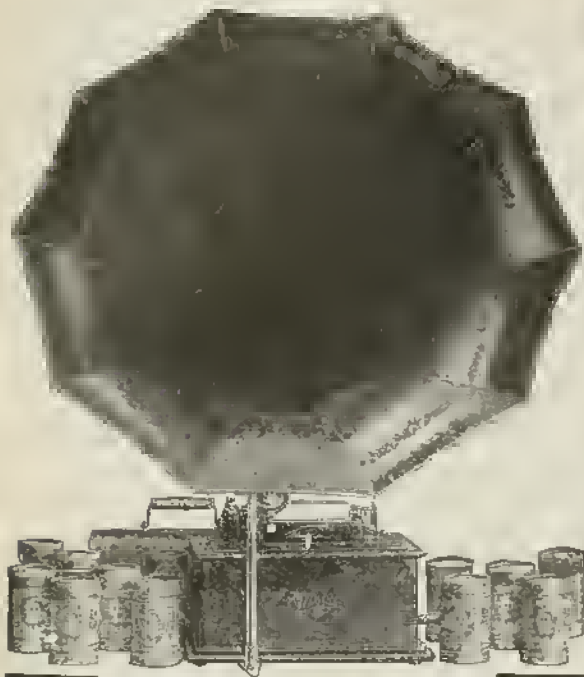
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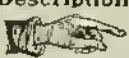


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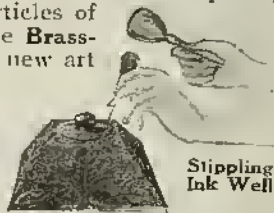
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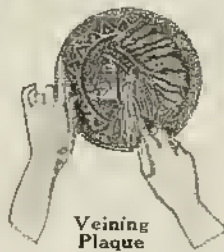
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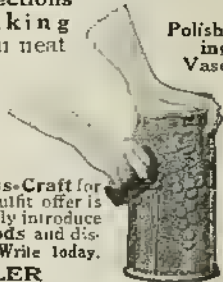
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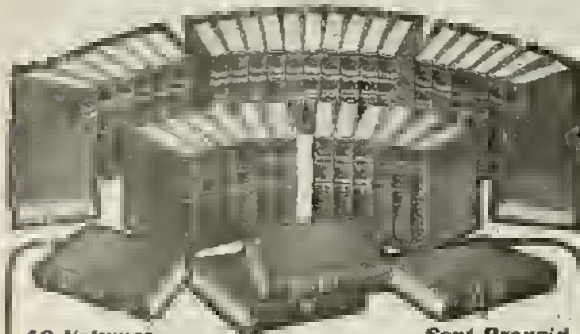
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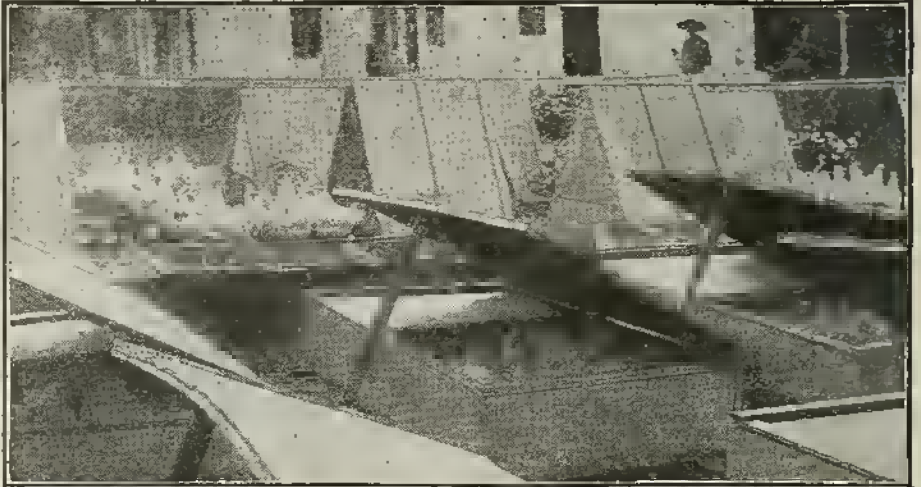
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Yours truly, R. S. LaRue.

Valley Falls, N. Y., Sept. 10, 1909.

My dear Mr. Philo:—I want to tell you how pleased I am with my use of the Philo System during the past year. The lows laid exceptionally well in the New Economy Coop, much better in proportion than those in my old style house. The fireless brooder has solved the problem for me of raising extra early chicks. I am going into your methods more extensively this coming year. Wishing you success, I am, sincerely yours, (Rev.) E. B. Tangler.

South Britain, Conn., April 14, 1909.

Mr. E. R. Philo, Elmira, N. Y.

Dear Sir:—I have followed your system as close as I could; the result is a complete success. If there can be any improvement on nature, your brooder is it. The first experience I had with your System was last December. I hatched 17 chicks under two hens, put them as soon as hatched in one of your brooders out of doors and at the age of three months I sold them at 35c a pound. They then averaged 21.2 lbs. each, and the man I sold them to said they were the finest he ever saw, and he wants all I can spare this season.

Yours truly

A. E. Nelson.


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Elmira, N. Y., Oct. 30, 1909.

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