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David is whipped by Mr. Murdstone!

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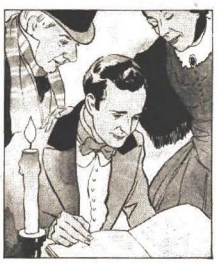
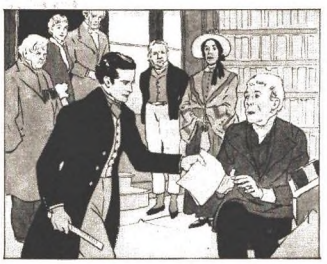
David lodges with the Micawbers

Dover—refuge with Aunt Betsey

David falls in love with Dora!



David publishes his first story!



David traps Uriah Heep!

Glorious happiness with Agnes!

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LEWIS STONE • FRANK LAWTON • FREDDIE BARTHOLOMEW
ELIZABETH ALLAN • ROLAND YOUNG

Produced by DAVID O. SELZNICK • *Directed by* GEORGE CUKOR • *Adaptation by* HUGH WALPOLE

A METRO-GOLDWYN-MAYER PICTURE

Fire on the Mountain

by

Gilbert A. Lathrop

Illustrated by ALBIN HENNING

SQUARE JAW DAVIS dropped from the high deck of his passenger engine in the yards at Mosca and tramped slowly toward the roundhouse. Although it was only nine a.m., a molten sun beat down over the cinder-strewn tracks with merciless intensity. Once Square Jaw halted and rubbed the back of a parchment-dry hand across his cracked, bleeding lips. All night the old fellow had ridden with the front cab door wide open, but the hot breeze stirred up when the train was in motion had only aggravated his discomfort.

For almost two months no drop of rain had fallen on the division between Mosca and Sage. Trees along the dry arroyos were sere and brown. The grass was burned and dried to yellow tinder.

All night long Square Jaw had smoldered. Never a sweet-tempered old fellow, these past ten days had made him as cantankerous as a bear with a sore paw. Even young Chuck Herman, his happy-go-lucky fireman, was finding it increasingly difficult to get along with him.

Square Jaw came on Chuck in the enginemen's locker room splashing soap and water from his face at the long sink. Square Jaw glared toward his youthful fireman and acted as if he were going to say something, but instead clamped his sore lips tightly together.

Chuck finally wiped his face; then with the towel hanging from his arm walked toward Square Jaw, who was laboriously making out his engine work report.

"That sag at mile post 562 gets rougher and rougher, doesn't it?" Chuck asked pleasantly.

"Whole division gets rougher and rougher," grunted Square Jaw.

"I was afraid for a minute we'd turn over crossing it this morning," Chuck went on imperturbably.

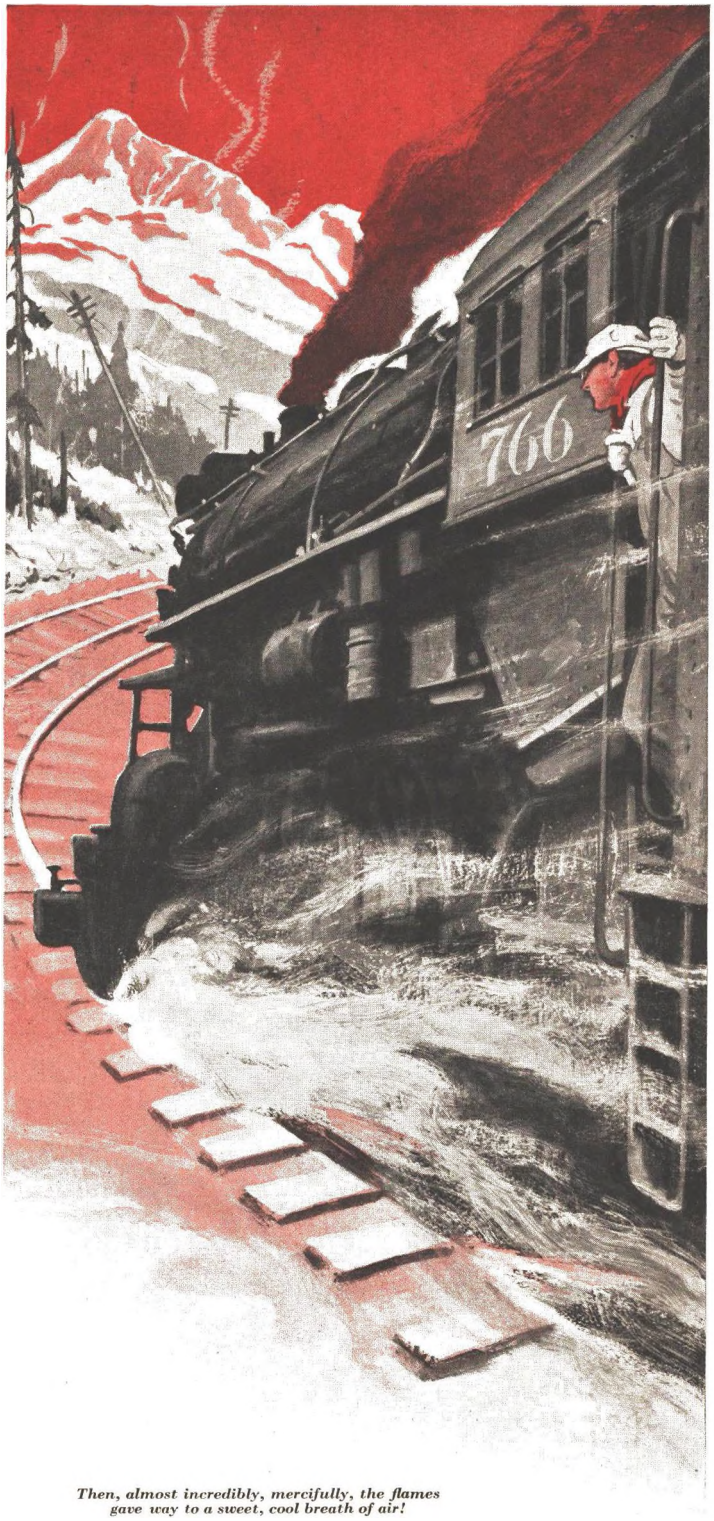
"Afraid!" snorted Square Jaw. "What do yuh mean, afraid? If I didn't have no more brains about speed and safety than you've got we'd be turned over every trip!"

Chuck laughed, showing even, white teeth. Then he grew sober and his right hand gingerly fingered his lips. His laugh had cracked the lower one wide open. "This hot, dry weather we're having is going to ruin my manly beauty," he murmured.

Square Jaw mumbled to himself and went on writing.

"And we came in fifteen minutes late again as usual, didn't we?" Chuck asked so sweetly that Square Jaw leaped to his feet and glared at his fireman.

"Yes, we come in fifteen minutes late again as usual!" the cantankerous old fellow roared. "And that's only part of it. Just as long as this half-witted, bone-headed, idiotic schedule is in force, we're gonna run late both directions over the di-



Then, almost incredibly, mercifully, the flames gave way to a sweet, cool breath of air!

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vision! And if yuh don't like it, yuh can get off this turn with me and mark up with some other engineer!"

Chuck made no reply. He knew Square Jaw well enough to keep his mouth closed when the old fellow was in one of his rages. Square Jaw seated himself again, rumbling like a threatening thunderstorm. Chuck walked across to the bulletin board, where a new notice was conspicuously tacked.

"Warning!" he read silently. "All engine men working through the Chotepa National Forest are urged to exercise extreme care while in this territory because of the unusual dryness and the danger of forest fires. It is urged that all railroad employees stop their trains and extinguish any fires noticed along the right of way. Ray Clark, Supervisor, U. S. Forest Service."

"Did you see this bulletin, Square Jaw?" Chuck asked abruptly.

Square Jaw had finished his work report and was stepping toward the railroad mail box to see if he had any letters. "What is it?" he grunted.

Chuck read it aloud.

"Anybody'd know all that," snorted Square Jaw. "This sort of season causes the loss of millions of dollars' worth of timber every year, that and these tourists who won't put out their fires when they break camp."

Out in the yards a throbbing, tired freight hog chuffed through a long track with a drag of dead freight from the east. Square Jaw reached the mail box, took up a bunch of letters, and thumbed through them. He picked out three addressed to himself and returned to the table that held the work reports. He tore open the first letter and pulled out the single sheet inside.

Chuck glanced at him anxiously. Lately, Square Jaw was finding from one to half a dozen letters waiting him at the end of each trip. The boy stared out of the window, frowning.

A snort of rage from Square Jaw brought Chuck's eyes from the freight hog that was slowly chuffing toward the roundhouse. Square Jaw was holding the letter toward his fireman. Chuck took it and read it hastily:

"Explain in detail why you lost ten minutes on Number 7, mile post 562 to Solar Summit, five minutes between Solar Summit and Mosca. J. C. Bowling, Division Engineer."

"I'll explain in detail!" blasted Square Jaw, savagely tearing open the second envelope. "I'll tell him just exactly what I think of his new schedules on Number 7 and 8. They're suicide! If I'd make the time called for on either train, this company would face a hundred-thousand-dollar wreck. I don't care about myself but there's passengers to think of." The old fellow began reading the second letter.

Chuck, watching him closely, saw Square Jaw's face turn gray and the light of battle fade from his eyes. Then the old fellow got heavily to his feet. Without a word he extended the letter to Chuck. Chuck took it and read:

"Engineer Davis: You have been asked repeatedly to make scheduled time on Numbers 7 and 8. You have refused in the face of our requests. It would appear that young blood is needed on these two mail trains and unless you immediately begin making the time, or show cause why it cannot be made, you will be demoted to freight service. J. C. Bowling, Division Engineer."

"This is a shame!" blazed Chuck. "Everyone knows you're one of the best engineers on this division. I wish this J. C. Bowling, Division Engineer, would get on our engine next trip and let you show him why the time can't be made."

"He's the kind of a bird who does his railroadin' in an easy chair in his office," grunted Square Jaw.

"Just who is he?" asked Chuck abruptly.

"Used to be a car tracer. We had a few words one time when I was pullin' freight. He threatened to get even with me then. Guess he's gonna do it."

"Not if you make running time from now on, he won't," argued Chuck.

"And I'm tellin' the world I won't make runnin' time for him or nobody else!" roared Square Jaw. "I'd rather be back on freight than blamed for puttin' a train over the dump!"

Chuck knew Square Jaw meant it. The old fellow was stubborn—and he was right in his refusal to make the time! Hadn't Chuck been riding locomotives over the division with Square Jaw for months? Hadn't he felt them roll, pitch, and heave over the rough track? True, the railroad company was working several large gangs on the right of way, but it would be months before the track was put up for the speed demanded by the new time card.

Charley Krigbaum, the engineer who had just brought in the drag of dead freight, clumped heavily into the locker room and thumped his valise on the floor. "Hot!" he informed Chuck and Square Jaw, mopping the sweat from his forehead.

The pair nodded agreement.

"We had a set-out this a.m.," Charley went on.

"A set-out?" asked Chuck.

"Yeah. The B-6 with Tom Ryan, general manager, an' this new efficiency expert, J. C. Bowling—they hitched their private car on us at Sage. They had it set out at Solar Summit and I guess they stayed up there with it."

Chuck looked at Square Jaw, and Square Jaw glared back. Both knew only too well what that meant. The B-6 would be picked up by Square Jaw's train tonight so that Mr. Ryan and Mr. Bowling could check him up and then pull him off the run for refusal to make the time.

"You'll have to make schedule tonight," Chuck said softly.

Square Jaw shook his head, his face frozen in lines of dogged determination. He picked up his valise and started toward the door.

"Come on," he called gruffly to his fireman.

Chuck followed. Outside, the two passed their high-wheeled engine, which was being taken care of by the roundhouse crew. The hostler helper was cleaning the fire, throwing shovels of red-hot clinkers on a large pile of ashes.

Suddenly Chuck grabbed Square Jaw by the arm. "Look off there to the east, Square Jaw!" he exclaimed. "See the blue haze hanging over the mountain?"

Square Jaw looked and snorted. "What of it?" he wanted to know.

"Looks like smoke," said Chuck.

"Get on your engine quick! A forest fire started a few minutes ago!"

Square Jaw grunted. He wasn't interested in smoke. He strode on with Chuck beside him.

"Hey!" called a breathless voice behind them.

Both halted and looked back. The roundhouse foreman was halfway between the roundhouse and them. He was gesturing frantically while his feet danced some kind of impatient jig.

"Huh?" Square Jaw demanded irritably.

"Quick! Fire! Hurry—"

"Maybe a mad dog bit 'im," decided Square Jaw.

But Chuck wasn't listening. He was racing toward the roundhouse foreman.

"Get on your engine quick!" screamed the foreman. "A forest fire started a few minutes ago. Private Car B-6 with Tom Ryan and Mr. Bowling is settin' in the sidin' at Solar Summit. You got to get 'em out of there."

"Hurry, Square Jaw!" shouted Chuck, eyes gleaming with excitement, nimble brains grasping the whole thing in a flash.

"Huh?" inquired Square Jaw, shuffling up.

The foreman sputtered an explanation again. "You're the only engine crew we got handy. They called to say the fire has got 'em trapped! Get on your engine. Agent will give yuh runnin' orders when yuh hit the main line. A crew of fire fighters will go from here with yuh. Hurry!"

Square Jaw grumbled angrily under his breath. "Pullin' a passenger man off his run to fight forest fires—"

Chuck was up in the deck impatiently waiting for Square Jaw long before the old fellow grunted up the side steps. The hostler helper had pulled the fire over the grates and was building it up with open steam blower.

Square Jaw slipped up on his seat box and backed toward the depot where a sizable group of men stood waiting, armed with axes, buckets, and heavy water hose.

The fire fighters piled on in a hurry, tossing axes, buckets, shovels, and hose up on the coal pile. A white-faced operator handed Square Jaw a bunch of orders as the old fellow hastily oiled around. Then with two short, chopping blasts of the chime whistle they were off.

Some of the tenseness of the situation was getting under Square Jaw's skin by now. His eyes began to sparkle as he nursed his steel charge to leaping, mile-consuming speed. The steel apron between tender and cab started to rattle and clang. The engine rolled from side to side, drive rods hissing, exhausts droning in an angry purr.

With his engine clipping off far more than a mile a minute, Square Jaw settled himself compactly and pulled out his orders. He handed them to Chuck in silence. Chuck read the first one.

"Engine 766 run extra Mosca to Westwater with right over all trains. Disregard all speed restrictions."

The next was a red tissue: "Engine 766 proceed edge of Gateview forest boundary east cautiously. Forest fire raging around Solar Summit. Look out for burned bridges or kinked rails."

Kinked rails? Sure, that would be from the terrific heat. The rails might expand and form sharp kinks around which no locomotive could pass.

The third was a message.

"Private Car B-6 set out at Solar Summit this a.m. Is in path of forest fire. General Superintendent Ryan and Division Engineer Bowling, occupants of car, trapped. If possible, pick up this car and take it to place of safety."

Chuck nodded to himself as he handed back the orders.

The engine leaped on. Chuck kept his gaze on that growing bluish haze which hung over the mountain some twenty miles away. Now they were roaring up the two per cent grade leading to Solar Summit.

Before they were halfway to the summit the blue haze was streaked with a yellowish white that hung thick along the eastern horizon.

With the hollow drum of section and bunk houses roaring in her riders' ears, the 766 whizzed through White House. The men on the engine caught a glimpse of white, upturned faces, blurred water tank, streaking switch targets; then they were on the high iron again, roaring toward Solar Summit.

The sky to the east was now a smoke-filled mass with a red haze forking up from the horizon.

Square Jaw seemed to be cut from stone. Not a muscle of his set face relaxed. His gnarled left hand was wrapped round the handle of his automatic air valve; his eyes bored straight ahead.

Excitement throbbed in Chuck's veins. Here was adventure! Soon they would streak into that smoky haze, into heat-filled air thick with sparks, rent by the crash of falling timber, and punctuated by the ominous crackle of pine needles as they exploded into lurid flame.

Chuck snatched a hasty glance back at the fire fighters riding the tender. White faces loomed against the black coal pile. Every man was lying flat, fingers hanging tightly to the wings of the tender.

Chuck knew they were running well over sixty miles an hour. Screaming flanges complained against retaining curves; joints clicked in a staccato rhythm.

Now they were only two miles from the edge of the forest boundary. In the distance it showed black, with wisps of curling smoke trailing upward from the burned timber.

Square Jaw eased down his terrific speed to less than thirty miles an hour as they approached the deep cut leading to the forest. The old man always played the game with good judgment.

Charred tree limbs and powdery white ashes littered the track. As the stubby steel pilot hissed over the litter, little puffs of hot, dry ash blew in the wind.

A blanket of molten heat wrapped the engine in its embrace. Chuck hastily pulled his head inside the cab. He smelled paint scorching. His smarting eyes glinted down that steel path they must travel. The rails were still straight and unwarped from the heat.

Solar Summit was only three miles away. If the raging furnace had swept past it, nothing but charred timbers would remain of Private Car B-6. Chuck shuddered to think what would have happened to the occupants of that car.

Now they were getting into the fringe of low-hanging smoke that lay ahead. It was acrid, stinging. The heat was becoming more intense. A leaping mass of flames crossed their path when they rounded a light curve a mile from Solar Summit.

Chuck looked questioningly across at his engineer. Was Square Jaw going to plunge his locomotive through those flames? The old man scowled at him, then beckoned. Chuck leaped to the deck and crossed it in a single bound.

"Tell them birds back there on the tender to come into the cab. I'm goin' through!" he barked in a dry, fuzzy tone.

Chuck raised his head above the coal gates and shouted Square Jaw's instructions. The men instantly started scrambling down, one behind the other.

Square Jaw held the 766 to an easy gait until all the men were in the cab.

"Shut your windows!" he yelled.

Chuck slammed them shut. Square Jaw's lips drew into a thin line. His left hand wrapped around the throttle and began tugging it out. The 766 leaped forward like a live thing that knew the peril into which she plunged.

A sea of flame licked over the pilot, traveled along the smoke box, obscured it. They plunged into the mouth of a gigantic furnace. *(Cont. on page 41)*

Then—crash! Coal scoop, shovel, coal pick, clinker hook, and oil cans clattered around Chuck.

Great Little

Red kicked Slim on the shins so hard that Slim sat down on the floor with his leg in his hands.

by

Harold Keith

Illustrator:
GRATTAN CONDON

Ardmore never knew anyone like the scrapping Red Chapman!

RARELY does a basketball coach have so many good players that he has difficulty picking the first five; yet that's exactly what happened to Jerry Wheelock, our Ardmore College coach. As his student manager, I ought to know.

It looked like the Golden Year for Jerry. He had his whole team back intact—five returning seniors, Ned Vincent, Joe Cox, Slim Masterson, Dart Nelson, and Mike Ganges—who'd played basketball together since they were kids and knew Jerry's system like a book. Five returning seniors and Red Chapman, the crying sophomore, the fellow this story is about.

Red Chapman was a tough-looking little guy weighing only 135 pounds but each pound was a fighting pound, we soon found out. His nose was so flat it looked like it had been kicked by a mule. His hard little body was splotched with huge orange freckles that ran down his short stubby legs and up into his blazing red hair.

But he was in deadly earnest about his basketball. In fact, he took it so seriously that he had the weird notion it was a disgrace not to start a game, and that's what this story is about, too. He'd played every minute of every game on his high school team back home, and had the idea that the five starting players were the regular team and all the rest were substitutes. You couldn't talk him out of it.

The funny part of it was Coach Wheelock didn't know he had Red until the first day of practice. The sophomore had boldly waddled out on the court—he walked like a duck—and straight up to Slim Masterson, our center and captain.

"Where's the coach?" he asked Slim.

"He's busy now," answered Slim courteously. "Anything I can do for you?"

"Why, yeah, big boy, there is!" chirped Red, eying Slim distrustfully. "Go take a running jump in the shower bath. Who are you anyway?"

"My name's Masterson," Slim answered quietly. "I'm the captain."

"Captain!" snorted Red. "Captain of what?"

Slim took this surprising outburst with a slow grin. He looked down into the sophomore's terribly freckled face and saw therein a curious mixture of impudence, defiance, and fight. He saw the bandy legs, looking all the more ludicrous encased as they were in the big black knee guards. He looked farther even than that, into Red's flaming blue eyes, and imagined he saw there a plaintive longing to be taken seriously in spite of his size.

"There's the coach standing yonder with that black sweater on," he told Red, pointing with a long arm. The sophomore thanked him and walked off.

That was Slim Masterson all over. Cool as mountain water. You couldn't excite him or make him mad and that was one reason he was captain.

Red liked the coach from the start and dogged him everywhere, getting under his feet like an overfriendly terrier. Finally Wheelock put him in the scrimmage to get rid of him.

And right there Red Chapman gave everybody a big surprise. A surprise and then a laugh. It wasn't much of a scrimmage at that, just three men trying to score against two in one-half the court. But to Red Chapman it wasn't a scrimmage at all—it was a game, a game in which Red set out to prove he could replace Ned Vincent and Joe Cox, our all-conference forwards.

He first opened our eyes by foxing Mike Ganges, our veteran guard, with a lightning-fast reverse dribble with Mike standing between him and the goal. Mike just stared as Red slipped around him and pocketed the goal.

It didn't take us very long to see that Red Chapman had a basketball style all his own. He fought like a bulldog and didn't know how to relax or slow down. Once Dart Nelson, our running guard, let a ball get away from him and Red slid ten feet on his stomach to take it out from under Dart's nose. The football tactics were funny, and nobody took him seriously—except Slim Masterson.

After practice Slim sauntered up to the coach, thrusting his head and long arms into a sweat shirt.

"Well, Coach, what did you think of our new redhead?" Slim wanted to know. "Looks to me like he might do us some good."

But the coach couldn't see Red.

"Too little," was his short answer. Slim looked up surprised and the coach elaborated.

"He's a hustler but he simply doesn't have the height. A tall player could pass and shoot over him all day long."

Slim poked a long leg into his sweat pants, hopping on one foot to hold his balance.

"He didn't look so badly out there today against our tall players," he suggested, bending over to zip up a pant leg.

But the coach shook his head.

"You don't see many five-foot six-inch players in collegiate basketball," he pointed out. "Besides he's a ball hawk, and in our man-for-man defense would always be out of position. Of course we'll work with him and see how he develops, but he's handicapped before he starts. It'd be suicide to throw him in there against a good team—like Peters Tech."

Peters Tech! Instinctively the coach winced. He always winced when that school was mentioned. The coach thought he was going to beat them last year, but playing on his own home court with the best team he'd ever coached he hadn't been able to come within eight points of them.

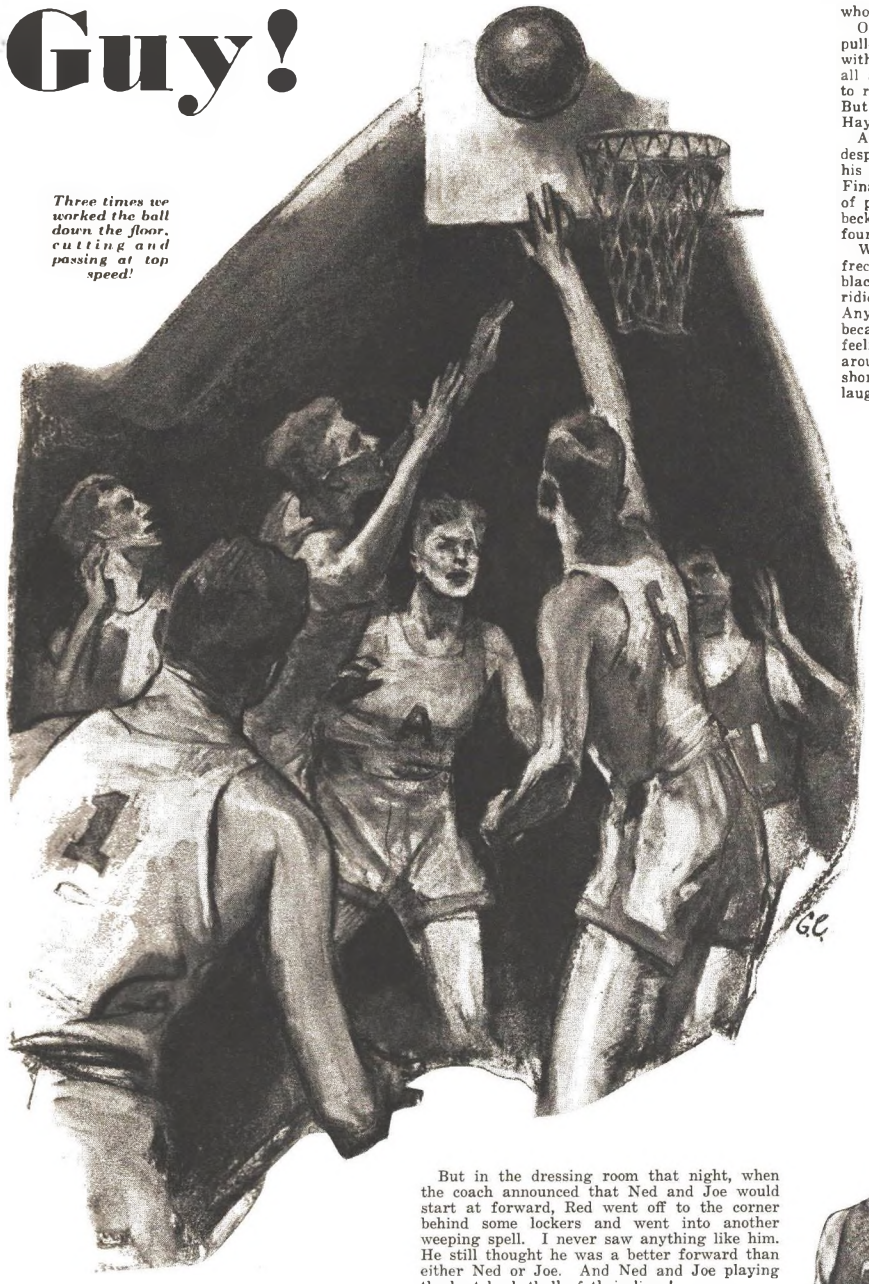
The main reason Peters Tech kept trampling everybody was because of Brad Funk, her captain and ace. I've been watching basketball for fifteen years and Brad Funk is the best player I ever saw. Cool, brilliant, and aggressive.

Our first game of the season was at home against Conger. And when the coach announced the starting line-up it naturally included the five regulars from last year. Red Chapman looked like he'd been slapped in the face. He wanted to start that game! He wanted to start every game, we soon found out.

When our five starting players pranced out on the court for a brief warm-up, clad in their new spick-and-span silver-and-blue game jerseys, I stole a look at Red, trailing along disconsolately behind the other substitutes to our bench. His eyes were red and he was sniffling and blowing his nose. I had to look at him twice before I could believe it. But it was true. Red Chapman had been crying! Crying because he couldn't start that game! A hard-boiled guy like Red Chapman, crying!

I'd never seen finer forward play than that shown by Ned Vincent and Joe Cox that night. It was great to watch them crisscross and weave through the scoring zone, flipping the ball back and forth

Guy!



Three times we worked the ball down the floor, cutting and passing at top speed!

to one another or to Slim Masterson and our guards, then suddenly cut from behind a block to rack up a basket.

Late in the game the coach began to substitute. But he never used Red. Every time he'd stand up and turn around, looking for a sub, Red would pop up in plain sight, but the coach always glanced past him and gave the nod to another man. Red never got out of his sweat shirt.

It was the same way in the Daniels game, and also against Griffith. The coach started the five regulars, let them burn up the court the first fifteen minutes of each half, and then worked in his substitutes. Everybody but Red Chapman, who sat there on the bench, red-eyed and sniffling, with his head hanging lower every minute.

Then came the first road game against Hays, a team we'd beaten the year before but only after a hard battle. The coach always carried a large squad on the first road trip; so Red got to go along.

But in the dressing room that night, when the coach announced that Ned and Joe would start at forward, Red went off to the corner behind some lockers and went into another weeping spell. I never saw anything like him. He still thought he was a better forward than either Ned or Joe. And Ned and Joe playing the best basketball of their lives!

That Hays game was one I'll never forget. With Slim Masterson controlling the tip-off, we rolled in the baskets that first half, leading 16 to 7. Ned and Joe were plenty hot.

I stole occasional looks at Red who sat at my side on our bench. His eyes had stopped leaking. His little tempest of nerves had blown itself out and now he sat there like a spent rain cloud, chin in hand, looking longingly at the electric scoreboard bearing the names of our five starters.

And then that Hays team began to click. From a badly outplayed and badly licked team, they suddenly blossomed into an aggressive, inspired team and began to hit the goal from nearly any spot on the playing floor they chose to shoot from. It seemed that a Hays man had only to let drive and whoosh! The ball would find the net.

Our own attack bogged down. The coach had pulled Ned and Joe for a short rest, replacing them with tall subs, but when Hays tied the score at 21-all and then forged ahead at 23-21, he was forced to rush his first-string forwards back into the fray. But Ned and Joe had cooled and couldn't get going. Hays piled the score higher and higher.

Although he showed no emotion, the coach was desperate. Substitute after substitute stripped off his sweat clothing and was rushed into the game. Finally, with Hays leading 30 to 22, seven minutes of play left and the game hopelessly lost, the coach beckoned to Red Chapman. He used every one of his fourteen players save Red.

When Red waddled out on that Hays court, a freckled, red-haired, homely-looking dwarf, the big black knee pads on his short powerful legs flapping ridiculously, the Hays crowd roared with laughter. Any basketball crowd would have done the same because Red did look funny. And when the referee, feeling Red's eager fingers pluck his sleeve, looked around and didn't see Red at first because of his shortness, the spectators really let it out. They laughed until they were hoarse.

But Red, keeping the crowd out of his mind, spat on his hands and grimly went to work. First he trotted over to our huddle and lit into our players with scorn and contempt.

"Well, well!" he bantered them, shaking a hard, freckled fist under their noses. "What's the matter with you big dubs? Lost your nerve? Are you going to let this bunch of new grounders trim you after you licked their socks off that first half? Come on! Where's your hustle? Let's go!" and striding from player to player, he whacked them across the back, lusty clouts that stung.

The moment the ball went up Red Chapman took charge of that ball game. He went up into the air a mile to take Slim's first tip, dribbled like mad toward the goal, sucked in Bill Chase's guard, and bounce-passed to Bill for a goal. He was all over the court at once, passing, dribbling, intercepting Hays' passes, and diving on loose balls like a terrier on a rat.

Single-handed he turned the flow of battle, until, unbelievably, we were even with them, with a minute and a half to play!

Then came disaster. The befuddled Hays players gained control of the ball when one of our men stepped out of bounds. For the first time since Red's entrance into the game, Hays was on the offensive. They worked the ball down and tried a long shot. It missed. Red and the man he was guarding, a six-footer, drove in together for the rebound. But Red's opponent was half a foot taller. Like a jack-in-the-box he sprang high over Red's wildly threshing arms and deftly tapped the ball through the strings for a field goal!

"My name's Chapman," barked Red. "Better watch out for yourself."

That basket was the ball game. Hays went into a zone defense and held us at bay those final seconds, winning 35 to 33.

As we all sank back disappointed on our bench, I remembered the coach's wise words to Slim Masterson: "He's a hustler all right, but he's too little. A tall player could shoot and pass over him all day long."

In our dressing room we saw a new Red Chapman. Of course nobody seriously blamed him for that defeat, because the game had been lost before he ever went in there and we'd scored 11 to their 3 while he played, but Red blamed himself plenty. He knew the winning goal had been scored over him and he stormed and raged at himself, pulling his hair, kicking over chairs with his bare feet, butting his head against the shower room wall and going into another of his crying tantrums.

It was funny and yet it wasn't funny, either. Red Chapman was simply a bundle of nerves. He wasn't the kind of guy to hide anything. He wore his emotions right out in plain sight.

On the train coming home after the game, the coach found Slim Masterson down in a chair car and dropped into an empty seat beside him. Slim was sitting by the window, disconsolately staring out into the darkness, his hat pulled down over one eye. The coach drummed his fingers on his knee and hummed a little tune.

"Slim, you were right about Red. He's a basketball player and a hustler in spite of his height. I've been thinking about him and I believe I've found his place on our team. I'm going to make a second half player out of him. I'll run him in about midway of the last half when the other team is tiring. He'll be fresh and fast, and he's a fighter. For ten minutes he can make trouble for any team."

Slim turned the idea over and over in his head and sat up, enthused.

"Sounds like a swell idea to me, Coach," he said.

But it didn't sound so swell to Red Chapman. He came bounding out for practice the following Monday afternoon, first man on the court, expecting to be started with the first five in the scrimmage against the freshmen. He naturally figured he'd earned the place by his great showing against Hays. But when the coach formed his starting five, Red again was fidgeting at his old place on the end of the bench.

And when the coach started Ned and Joe against Ahearn in our next game, Red, all choked up with emotion, didn't do anything else but walk to the dressing room and take off his playing uniform and put on his street clothes.

Well, that was a strong facer for Jerry Wheelock. He had to maintain discipline on his squad. If one fellow could walk out on the team any time he chose, then the other players naturally would expect that privilege too. But the coach fooled us. Instead of looking Red up and firing him off the team, he just ignored the whole episode.

The following afternoon Red came out for practice at the usual time and got his suit out of his locker. He was quiet and sober, obviously expecting to be punished for his act of the night before. I had to admire his nerve. Lots of fellows wouldn't have dared to come back after walking out on the coach like that.

But when he walked boldly out on the floor past the coach, apparently with the idea of taking his bawling out and dismissal and getting it over with, the coach merely nodded and went about his business. Red looked surprised and then thoughtful, and in the ensuing practice drove the second team like a demon. It was the best way he knew to make an apology and it must have been acceptable to the coach.

Our next game was with Cawthorn, a stronger team than any we'd met except Hays, and again the coach started his regular forwards and Red sat resignedly on the end of the bench, chewing his finger nails and casting longing looks at the big electric scoreboard. But he didn't put on his street clothes.

Then came a surprise. Five minutes after the first tip-off, the coach leaned over and looked down at Red's end of the bench.

"Red!" he called.

Unable to believe his ears, Red sat bewildered. Beefy Locke, the sub sitting next to him, nudged him in the side with his elbow. "Hey, Red, Coach says you," he whispered hoarsely.

Red got up and waddled over to the coach.

"O. K., Red," said the coach, making room for him on the bench and putting his arm around him. "I want you to watch that guard that's dogging Joe. See how closely he plays Joe? That fellow's a shade faster than Joe and stays right on top of him every minute. Now then. Watch him a little while and then tell me how you'd handle him if you were in Joe's place."

Red studied the player intently, his forehead puckered seriously. Then he turned to the coach.

"I'd try to feint him one way, then go around him on the other side," he murmured. "And I'd try to circle behind some of my own players, block him off, and try a set shot. If I saw I was as fast or faster than he, maybe I'd lead him to a corner and try a reverse on him."

The coach nodded approvingly. "Good boy," he said. "Remember that. Now keep watching him and see if there is anything else about his style you can figure out."

Red rode the bench beside the coach until there were only seven minutes left to play. Although we were leading 28 to 22, we'd been hard-pressed. The coach pulled Joe and sent Red in.

Red's guard, the fellow who'd done such a good job of dogging Joe, sauntered over to him and introduced himself, thrusting out his hand.

"My name's Boling," he said, just a shade importantly. You could tell he was proud at having ridden Joe Cox so successfully.

"Mine's Chapman," barked Red, looking up at him coolly and challengingly. "I'm gonna be after you, big boy! Better watch out for yourself!" and giving Boling's hand two or three short vigorous pumps, Red turned his back and walked off a few steps.

The ball went up and in the next two minutes of play, our bench came to its feet in alarm. Cawthorn scored three field goals in rapid succession, every one of them by Boling over Red.

But just as the coach was taking the blanket off Bill Chase, Red learned how to stop the play. The next time Cawthorn tried it, Red intercepted the ball, and with no Cawthorn player in his path, dribbled the length of the court for a field goal with the surprised Cawthorn players strung out behind him in hot but useless pursuit. We led, 30 to 28!

That spectacular play gave our team heart and Red himself a world of confidence. Exuding pep and hustle from every pore, he took charge of that Cawthorn game just as he had the Hays contest two weeks earlier. We won, 37 to 30. Red was simply too fresh, too fast, and too good in those final moments.

After the game we all went down to the campus shop to buy a morning paper. First thing we saw was this:

> Peters Tech won its 29th consecutive basketball game tonight by defeating Hays on the Hays court, 40 to 27. Hays couldn't stop Brad Funk, captain of the conference champions, who directed his team flawlessly and played a beautiful floor game.

Dart Nelson stirred his chocolate milk shake, and whistled incredulously.

"Whew! Thirteen points! That's a pretty bad licking!"

"Yeah!" spoke up Mike Ganges, "and on Hays' own court, too."

Then we turned to the story of our game. At the top of the page was a two-column picture of Ned. The story said:

> Ned Vincent, Ardmore's senior forward, forged into the lead for the conference individual scoring championship here tonight as Ardmore defeated Cawthorn in Bartlett gymnasium, 37 to 30. Vincent added five field goals and a foul shot to bring his season's total to 76. Cawthorn tied the score in the last half, but two quick goals by Vincent gave Ardmore a lead she never relinquished thereafter.
>
> "That's not fair!" protested Ned, hotly. "Red won that game for us! He's the guy who fed me those last two goals. Why, they didn't say a word about him!"
>
> "Aw, that's O. K., Ned," said Red, swallowing hard. "You all had that game won before I ever went in there. They'd never have tied the score if I hadn't given them those three goals, right at the start."
>
> But he was hurt, nevertheless, despite his being grateful to Ned for his fairness. I knew what he was thinking. The starting players were the ones the sports editors and fans marked. Nobody noticed a substitute, no matter how well he played.

When Red stumbled into his room that night, he got another bad case of the blues, falling across his bed and bawling there in the dark. We all could hear him and finally Slim Masterson, who roomed right across the hall from him, went in and tried to cheer him up. But Red didn't want any sympathy, and when Slim turned on the light, Red flew at him in a rage and kicked Slim on the shins so hard that Slim sat down on the floor with his leg in his hands, squalling like a panther. We like to laughed ourselves sick.

That was the way it went right up to the Peters Tech game. The coach would always start Ned and Joe and leave Red blubbering on the bench, and after we'd run up a nice lead he'd shoot Red in as the unwilling pinch-hitter. I'll give Red credit at that. Although he didn't relish his assignment, he gave his all, and we traveled to Peters Tech for the final game with a chance to tie them for the conference championship and gain a great moral victory, if we won.

The Peters Tech gym was filled with a noisy, roaring mob the night we played them for the championship. It was Peters Tech's last game and also Brad Funk's. The crowd gave us a big hand when we came out for our shooting drill, but it was nothing compared to the enthusiastic roar that arose *(Cont. on page 36)*

Red Chapman had been crying. A hard-boiled guy like Red Chapman crying!

Lone Wolf and Smoky return from the hunt.

Mr. Schultz shoots his own holiday dinner.

Smoky, a Good Coyote

He stole lunches and live chickens, but it was all in fun!

by

James Willard Schultz

EARLY one morning in June, 1929, my son Lone Wolf discovered a strange little animal sniffing about in the rear of our cabin in the White Mountains of Arizona. A gray-furred, sharp-nosed, big-eared pup coyote that had somehow become separated from its mother! It did not run when Lone Wolf approached it; just turned belly up and trembled and whined when he stroked its thick fur. It ravenously ate a pile of pancakes and bacon that he fed it, and then lapped into its small and now distended stomach all of a quart of milk.

Away back in the buffalo days, Indians and whites were agreed that wolves could be tamed, but coyotes never. They were, as old Bill Weaver used to say, "plumb wild an' treach'rus." Well, we would undertake to tame this one. That day we named him Smoky, built a shedlike kennel, and fastened him to it with a broad, smooth collar and a light thirty-foot chain.

Smoky ate much more than would a dog of his age and size, and grew amazingly fast. Like a dog, he would bury his excess food in holes that he dug in the ground. He soon would come bounding to the limit of his chain to meet us, wagging his bushy tail and leaping up to lick our faces. He whimpered with joy when we scratched his back and head; and when freed from his chain, he would run hither and thither and tirelessly play with us.

A companion for him was Lone Wolf's purebred English shepherd, Zora, a fine turkey dog and retriever. In the latter end of the summer, we took a long chance and freed Smoky permanently from his chain. But with Zora he remained close to home, having apparently no desire to seek his kind, though almost nightly we could hear them yelping down the valley, and up on the mountainside. The two would occasionally go nosing about the home of the forest ranger, some three hundred yards from us, down the mountain slope, but they never went near the little settlement of Greer, a mile farther up the Little Colorado.

Smoky's days of free wandering were soon to end, however. The forest ranger brought a couple dozen chickens to furnish eggs for his large family. Smoky promptly killed five of them, including a ten-dollar purebred rooster. Thereafter he was kept upon his long chain, except that one of us daily took him for a run up the mountainside or down the valley.

How he did enjoy his outings! More swift than any dog, he was everywhere at once—a gray flash exploring every log, every hole that might conceal a squirrel or rabbit or pack rat.

Late that fall, he one day pawed furiously into a hole at the foot of a pine, brought out a skunk, his jaws clamped upon its neck, and promptly killed it; then for a long time rolled and writhed in the pine-needled carpet of the forest in vain endeavor to rid himself of the horrible scent with which the skunk had drenched him. That one experience was enough; thereafter he gave skunks a wide berth.

In the following year Smoky became the best hunter and retriever we ever had. Striking the trail of a flock of wild turkeys, he would dash in among them so suddenly that they would flutter up into the nearest trees and sit peering down at him, paying no attention to our approach; then, whining shrilly, he would alternately look at us and up at the birds, so urging that we hurry in and shoot. Dearly he loved the crack of a gun, and when a turkey came tumbling down he would be upon it as it struck the ground and, gripping neck or wing or leg, come hurrying to leave it at our feet. Then again whining, leaping, looking up at the birds and around at us, urge that we kill more of them.

The great Apache Forest abounds in lakes, the breeding places of many kinds of ducks. Smoky had his first duck hunt in the autumn of 1930. Crawling through the rushes bordering the shore of a lake, we raised a flock of mallards, fired, and as three of them splashed down into the water and well out, Smoky plunged in after them. He got one by the neck, then swam to another and tried to take it too, with the result that he lost the first one. Several times he tried to grip the two and, failing, brought in one, laid it at our feet, and one by one brought in the others. But he had learned his lesson; thereafter he never attempted to bring in two ducks at a time.

People came from far and near to see Smoky, the tame coyote. He was friendly with all women, enjoyed being petted by them. Was that way with some men, but took instant dislike to others, would not let them come near him.

He was very mischievous. Three different times when, turkey hunting, we stopped to rest and eat, he seized our paper bag of lunch just as we got it out, ran off a little way, dropped it, and looked back at us; then, as we drew near, and were reaching down for it, he was off with it again, only to drop it once more and wait for us to come on; and we were just foolish enough to do so. Eventually, he tore the bag open and ate the lunch—one time even devouring our dessert, a big bunch of muscat grapes.

He took great delight in teasing Apahki, my wife, particularly when we were turkey hunting. Whenever she started to crawl under a wire fence, he would be on the other side, growling, seizing and shaking the shoulder of her *(Continued on page 33)*

Tow-Target Terror

by Lawrence M. Guyer

LIEUTENANT TOMMY THORINGTON strode through the club at France Field, conscious that eyes were on him. He held his head very erect and kept his eyes to the front, but he couldn't avoid hearing three casual, murmured words:

"Strong, silent guy."

He stopped in the middle of the room and looked around. Yes, it was Buzzy Ennis who had said that. Buzzy, seated deep in a comfortable chair and gazing at him coolly over the top of a magazine. Ennis, the short lieutenant with a quick tongue. For an instant Tommy wanted to say something hot, but there was a challenging look in Ennis' face, an "All right, out with it!" gaze that made Tommy hesitate.

Flushing painfully, he walked from the room, aware of concealed grins. He strode out to the field where his ship was idling, Sergeant McCarthy in the rear cockpit. Some day, he promised himself, he and Buzzy Ennis would have it out. But first he had a job on his hands—he had to find out what was going wrong with this tow-target work.

It was dangerous and tricky stuff, tow-target flying. You went aloft and let out a cloth target on the end of a long steel cable. Then a battery of three-inch guns on the ground cut loose. A mistake in deflection or an error in sighting might bring the shell fragments uncomfortably close. He wasn't afraid of that, in spite of the whispered words of Buzzy and the rest. What he feared, now, was another break in the cable.

He nodded shortly to McCarthy, climbed in, and soon was heading over the green Panama jungle toward the range. Three times, now, he had tried to tow this course and each time something unreasonable had happened to prevent it. Each time McCarthy had let out the cable slowly. Tommy had driven carefully to avoid jerking the ship. And every time the cable had broken!

He glanced overside and spotted the battery down below—four anti-aircraft guns, each at the point of a diamond, their black snouts fingering the sky. He watched them as they fired their practice shots. First, a pin-point of flame, then a low, screeching whine, followed by a white puff of shrapnel at 6,000 feet.

In a minute, now, it would be time to tow the target. Would the cable break again? How could it? He and McCarthy had checked everything.

Yet—it had happened, three times in a row. The anti-aircraft regimental commander was mad and didn't mind telling Major Rogers of France Field how he felt. Worst of all, the officers of the club were beginning to say that Tommy had "tow-target terror." He *wanted* the cable to break. He snapped his ship so that the cable *would* break. And well—Thorington wasn't the first man who had gone weak at having shrapnel burst on his tail!

Tommy gritted his teeth. His fingers drummed nervously on the stick of the 0-19. He hung his head again over the edge of the cockpit and watched the four guns splatter shell bursts on their trial shot target. He adjusted his radio, cut the gun, and yelled a message back at Sergeant McCarthy.

"Everything ready? You're sure, McCarthy?"

The response was mumbled. McCarthy's manner had become almost sullen these last few days. He had twice asked, pleadingly, to be relieved of the job.

"Ready, sir!"

The motor roared back on. Thorington caught the message to "commence towing when ready," and he knew that the eyes of every man at the battery watched his ship. He signaled McCarthy and the sleeve target spun down from a hole in the fuselage. The cable payed out. Tommy headed on his course.

Never, in his six years of commissioned service, had Tommy Thorington flown an airplane with more care than he did now. There wasn't an inch of variation in his speed. There wasn't a trace of jerking on the stick. There wasn't a bump of any kind in the air.

The cable unreeled slowly and easily, a hundred feet, five hundred, a thousand. The tension increased. The drag of the sleeve target added its own resistance to the weight of the cable already payed out. Tommy watched it dwindle farther and farther behind him.

And then, suddenly, he saw the fabric crumple. Without the rush of air into its cigar-shaped casing it began to capsize, and capsizing meant only one thing—the cable had snapped again!

Tommy Thorington felt a cold paralysis creeping up his back. Another failure! There was no doubt of it now. The fabric target was settling swiftly, pulled by the weight of the broken cable. Even before the 0-19 turned around, it splashed into the white-capped waters of the Caribbean Sea at the jungle's edge. A new fiasco! Another mission ruined!

He flew back to the field in a daze. He was in for it, this time. Major Rogers had been severe enough after the third failure. And after a fourth—!

There was an orderly on the line when he landed. "Lieutenant Thorington will report to the commanding officer at once!" Precisely what he had expected. He didn't even have time to wrangle the thing out again with McCarthy. Trembling inwardly he walked briskly toward headquarters and climbed the stairs to the second floor. Major Rogers glared up at him.

"Mister Thorington," he began furiously, "I understand—" Skid Rogers always began with "I understand" when he was enraged. "I understand, Thorington, that the cable snapped again today? Is that correct?"

Combining a mid-air mystery with aerial acrobatics!

"Yes, sir!" Tommy's voice was cold, self-condemned.

Major Rogers uttered a sound that was partly a groan of despair and partly an ejaculation of fury. He got up from his chair and walked angrily to the window.

"A fine mess!" he stormed. "A fine mess this is when the Air Corps can't even fly a co-operative mission without hobbling it all over Panama! Did you check your equipment yesterday as I instructed?"

Tommy swallowed.

"I did, sir. I checked it personally. I even drew and installed a brand-new reel of cable. I can't understand it, Major."

"And nobody else can!" snapped Major Rogers. "Do you realize, Mister Thorington, that an explanation of all this is going in those target practice reports? And that I've had a request to relieve you from this mission, and substitute another pilot in your place? With a remark of failure on *your* efficiency report?"

Tommy was silent.

"Well, I have!" Major Rogers affirmed. "I'll have a lot of explaining to do, myself, when this affair gets to the department commander!"

He walked back to his chair and sat down. Suddenly, and not unkindly, he motioned Tommy to a chair beside him. He gazed searchingly into the younger man's face.

"Would you—ah—*like* to be relieved?"

Tommy stiffened.

"I didn't think so," the major went on, hastily. "I just wondered. There's a rumor around, Thorington." He paused again. "You haven't got along so well here, have you—with the squadron, I mean?"

"Not very, sir," Tommy confessed. "Though I've tried to, Major. I don't know why."

"I do. You're too deliberately quiet. You keep to yourself too much. You don't give anybody a chance to make friends with you. You—well, I've watched it, Thorington. And if this phrase I've heard lately, this 'tow-target terror'—if that sticks—if I have to relieve you from this mission before you finish it, and finish it right—Thorington, you'll be ruined! I can't let it happen!"

Tommy fumbled with his cap.

"What's been the matter with that cable? New cable doesn't just suddenly break, you know. Cut? Filed? Anything like that?"

"I don't believe so, sir. I've examined the reel end each time. The cable was shredded, each strand separately, and each strand several inches from the next strand. No pliers or file could do that. It looked as if the strands gave way, one by one. And, anyway, sir, no one here would file or cut—well, they *couldn't!*"

"Hmmm!" Major Rogers had a thought he didn't dare express. "How about old McCarthy then? Simply falling down on his job?"

"No, sir! He's done fine work!" Tommy was sure. "It has to be equipment, somewhere. There's nothing else."

"Check it again. And *make it go!* I'll do anything you can think of, and anything you ask, to help you. *But make it go!* There can't be another failure over this! Understand?"

"Yes, sir. I understand."

"Anything you want?"

"Nothing I can think of, sir."

Major Rogers nodded an end to the interview and Tommy saluted. A warm glow tingled through him at the friendship and understanding Major Rogers had shown. Somehow, he had to justify his commanding officer's patience—

Tommy's reflections suddenly ended. The first brother officer he encountered at the club was Buzzy Ennis, who somehow typified his failure to make friends with the squadron. Buzzy, leader of the bachelor clique, detested Thorington. Thought him aloof and unfriendly, and believed that the squadron would be vastly improved by almost *any* type of replacement.

Ennis was still sitting behind his magazine. Across his knees lay a fragment of yellow ribbon, part of the signal streamer flown by tow-target planes to warn other ships clear. Yellow ribbon. The inference was plain and deliberate, even though Ennis said nothing.

Tommy flared. Suddenly and unreasoningly, he blamed Buzzy for everything that had happened. He took a half dozen steps forward, his fists clenched. Then he halted. He turned. The room was hostile. No matter what he did, he'd be wrong again. He went heavily up the stairs to his room and sat down alone, unseeing as the dusk darkened his window.

By the time the bell rang for supper, Tommy had reached a number of definite decisions. One of them was that he wasn't going down to the table to face the squadron's bachelor officers. Another of them was a stubborn conviction that he didn't care what anybody thought of him. And last, with a sudden shock that sat him upright in the chair, he decided that somehow, for some reason unknown, old Sergeant McCarthy was the one and only man responsible for the cable failures!

There couldn't be any other explanation. New cable doesn't break without cause—not four times in a row, anyway. McCarthy, too, had checked over a great portion of the equipment, alone. On the previous day, it was true, Tommy himself had rechecked everything except for unreeling a new line of cable that McCarthy had brought from the storehouse. But here again, it had been McCarthy who had brought it. And strangely, too, McCarthy had asked to be relieved of his job. The reasons he had given were faltering and evasive, and Tommy at first had put them down to just another case of dislike for himself.

Now they assumed a new meaning. Unsuspicious little details began piecing together in a pattern,

Illustrator:

WILLIAM HEASLIP

He didn't look below. He was too intent on his job; it meant too much to him. He glanced swiftly up at the reel of cable.

HEASLIP '11

with the design hooking to McCarthy. For some unknown reason, and in some unknown way, McCarthy was dropping the sleeves. There was no other answer to it.

McCarthy was stalling. Tommy was convinced of it. And yet—he wondered. The man was the finest old soldier in the squadron. Thirty years' service lacking one month. He was up for retirement. His record was flawless. His list of decorations in France—his wound stripes—these, too, bore testimony to his excellence. How, in the face of all this, *could* it have been McCarthy?

The morning almost brought the answer. When Tommy went down on the line and began checking his ship, there was no sign of McCarthy. At the end of an hour there was still no sign of McCarthy. At the end of two hours there came a telephone call from the first sergeant reporting that McCarthy was apparently absent without leave!

Tommy raged. It was nearly time for his scheduled take-off, and he hadn't half finished his check. It was necessary, too, to find a substitute for the man. Who? On whom could he absolutely depend for a test like this?

Over by the hangar he glimpsed a lone figure. It was Buzzy Ennis, splitting time on a P-12, and the ship was out. And of all the people Tommy wanted to see, Ennis was the last. Trust Ennis with the tow-target apparatus?

Tommy dropped his wrenches and started toward Operations to get somebody else — anybody else. Then he halted. Suppose Ennis took the controls for him, while he himself operated the cable releases? There was a flavor to this that changed disaster into fortune. Yellow ribbon, eh? Tow-target terror? Well, how would *Ennis* like it?

He walked over. He tried to speak casually.

"Doing anything, Ennis?"

"Waiting for my ship. What's the matter?"

"McCarthy's A.W.O.L. I'm stranded."

"McCarthy? Who's McCarthy?"

"My tow-target operator."

"Oh!"

There was an insinuation in that "oh" that made Tommy want to fight. But he checked himself. The day was too big to lose now, and he was due to take off.

"And you want me to help?" Ennis went on. "Sorry. I don't know much about the rear pit of a 19. I wouldn't be much good to you."

"You could fly it for me," Tommy suggested, pointedly.

Ennis stared. He caught the challenge instantly. He shifted weight, and glanced hastily about for his P-12. The sky was clear.

"When are you due to take off?"

"Right now."

Ennis shrugged. There was nothing else he could do.

"Okay," he said. "Wait'll I get my chute."

As Tommy went back to the 0-19, he was grinning. He warmed the motor, climbed into the rear cockpit, and tested the clutch that payed out the cable. He crawled under the wing above the landing gear and checked the reel installation, and the small propeller that rewound the cable on the reel when towing was over. He made sure he had five sleeve targets, one for each course the battery would fire —and he told himself, grimly, that today they *would* fire.

He did everything but unwind the half mile of cable itself, and there wasn't need for that. He'd drawn it new that morning, and had even unwrapped its original covering.

Ennis came up with his chute, and climbed in the front pit. From the rear Tommy gave him a signal of readiness and the motor roared.

They headed out over the anti-aircraft range, reached its flank and began circling. Tommy pointed his finger along the course, and Ennis nodded. They began waiting.

Minutes later the burst of the first trial shot puffed its white ball in the sky; then a succession of bursts from all four guns blotted it out. The radio carried the old message: "Commence towing when ready." The observation plane straightened out and headed down the course.

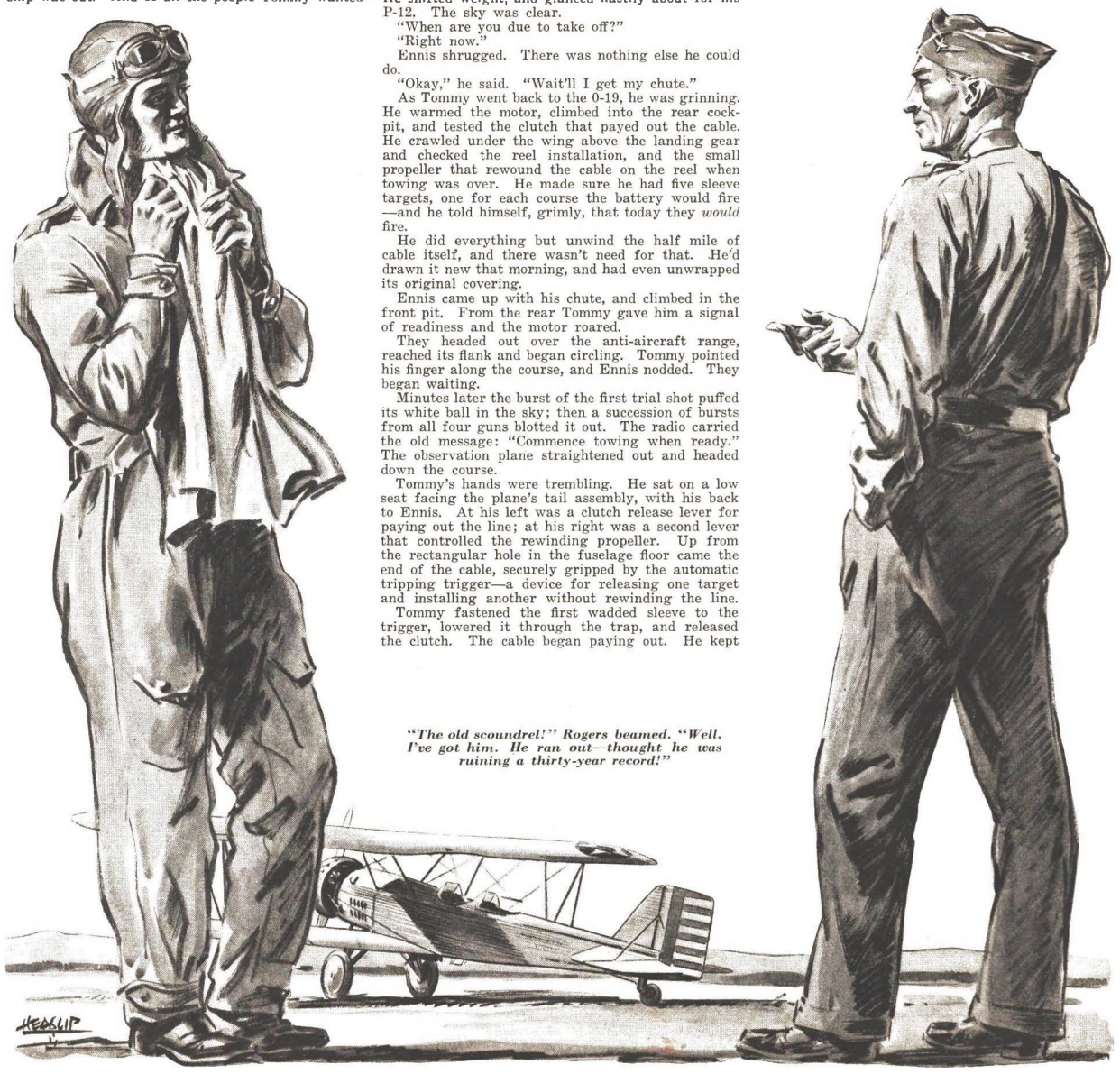
Tommy's hands were trembling. He sat on a low seat facing the plane's tail assembly, with his back to Ennis. At his left was a clutch release lever for paying out the line; at his right was a second lever that controlled the rewinding propeller. Up from the rectangular hole in the fuselage floor came the end of the cable, securely gripped by the automatic tripping trigger—a device for releasing one target and installing another without rewinding the line.

Tommy fastened the first wadded sleeve to the trigger, lowered it through the trap, and released the clutch. The cable began paying out. He kept it close to the fuselage with a hooked stick and watched the length markers . . . fifty feet, one hundred, two hundred, a thousand. His heart was pounding. Two thousand would permit firing. Two thousand feet was the safety limit—anything under that might be dangerous. Yet the length of the cable was entirely up to him, because at five miles a target line has deceptive length to ground observers. Nobody would know if it were less—or more.

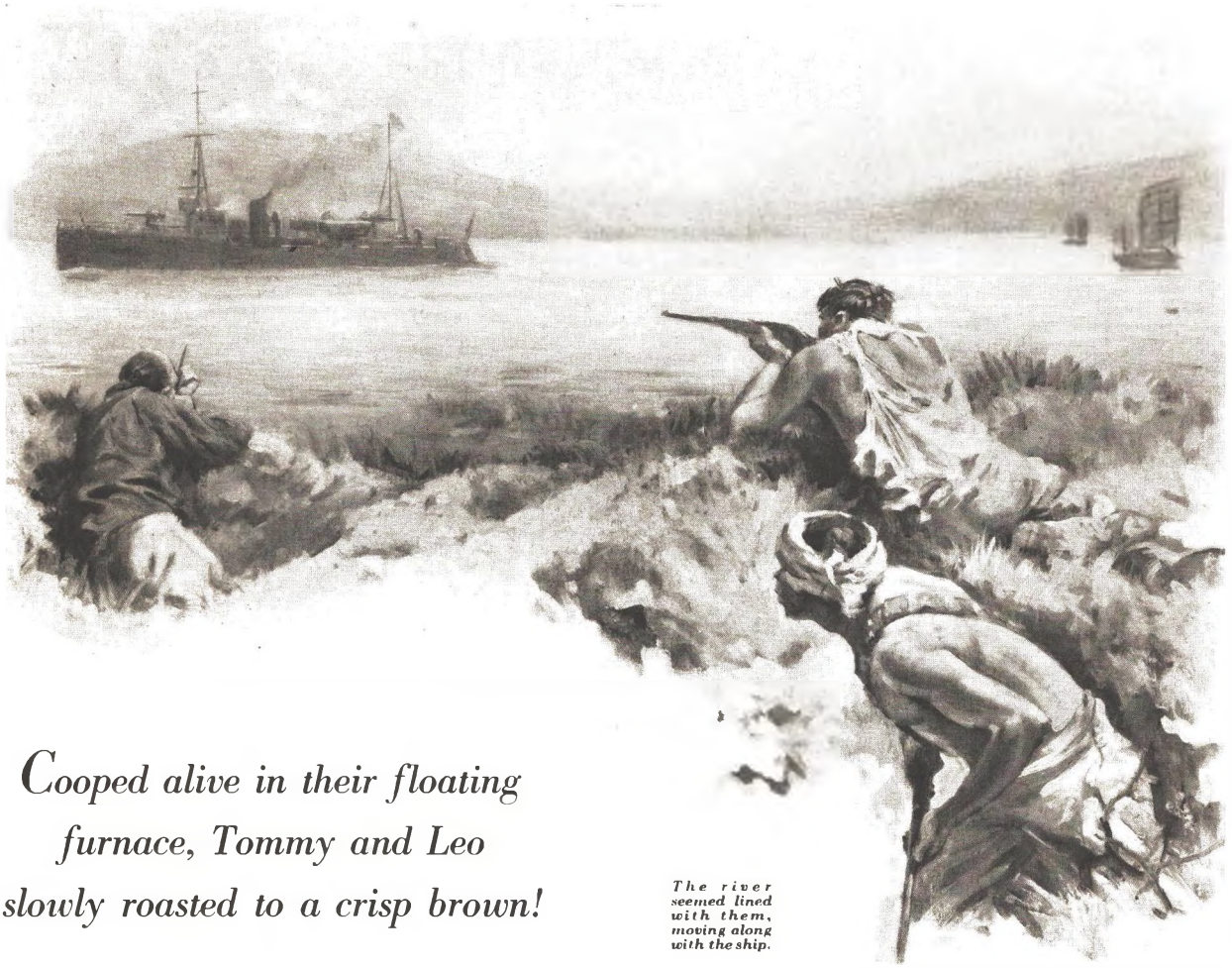
Nothing had happened so far. The cable was half out, and everything was all right. He experienced, again, the impossible conviction that the fault had been all McCarthy's. Then he stopped thinking, and his eyes widened. Through the hooked beak of his stick came the first broken strand of cable! And inches behind it came the second broken strand!

Something froze in his blood. For the first time Tommy could remember, he found himself watching a disaster from which there was no escape. It would grow worse if he did nothing; and worse if he did anything. It was like standing on an egg that hadn't yet cracked. It was like running in a dream where the legs move but get nowhere.

He watched it, fascinated, helpless, until presently, some several feet behind, came the third broken strand. And it was only a *(Continued on page 29)*



"The old scoundrel!" Rogers beamed. "Well, I've got him. He ran out—thought he was ruining a thirty-year record!"



Cooped alive in their floating furnace, Tommy and Leo slowly roasted to a crisp brown!

The river seemed lined with them, moving along with the ship.

The Navy Day Salute

by Robb White, III

Illustrated by ANTON OTTO FISCHER

THE Yangtze River patrol boat U.S.S. *Blaine* plowed its way slowly against the sluggish current of the yellow river, and its wash waved the water-grasses on the banks. Heat danced and shimmered from its scrubbed steel decks, and more heat wavered over the grooved fields of rice. Below, the engines seemed to be panting in the heat of the China sun.

Occasionally men's voices could be heard aboard ship; snatch of a song as a sailor went along a passageway; the sleepy murmur of the off-watch section lying on the foredeck under the scant shade of the bridge; but aside from that it was very quiet. Quietness and heat seemed all that China could offer the U.S.S. *Blaine* that morning.

Aft, a piece of tarpaulin rigged for awning made a little shade, and under it Lieutenant Leo Myles and Ensign Tommy Taylor scowled over a chart of the Yangtze. Tommy put his dividers back in the box and wiped the sweat off his face.

"Two more miles," he announced.

"Two more miles and we'll be in Tibet," Myles added wearily. "We're too far up this river already, Tommy."

"I don't see any American interests to be protected this high up," Tommy said, looking at the deserted banks of the river.

"I doubt if the Chinese will even know who we are. It would be funny if they'd heard of the Jap war and got us mixed up."

"It would be fun," Tommy said. "I could use a small war. I haven't done anything but eat, sleep, and sweat for four months now. Either a war or orders to report for shore leave in Manila."

Leo Myles laughed, but not very cheerfully. "Tommy, my fine young man," he said, "you haven't been in the Navy long enough. We'll have neither a war nor shore leave. We'll pull up and stop at this Chan Foo and 'wait further orders.' In other words, we spend a nice quiet summer aboard ship and by the end of it we'll be biting each other's ears, and snarling in the passageways. Then we'll come back and someone will ask, 'Where have you been?' and that will be that."

Tommy stood up, yawned and stretched. "Maybe the bridge is cooler. Coming up?" he asked, and started forward. As he stepped away a bullet whined past him and smacked with a sharp *spaang* against the steel bulkhead. The crack of a rifle floated over from the river bank, and a smudge of gray smoke rose slowly in the hot air.

Leo and Tommy yelled together, "All hands below!" and then went below themselves. As Leo slammed the door shut, another bullet whined over from the river bank and spattered against the flat steel.

"Quarters," Leo ordered the bugler, and soon the ship's crew of fifteen men and two officers was gathered in one group. Leo and Tommy hurriedly called the muster and found no one hurt or missing.

"Break out the flag and fly it at the peak, Jenson. All hands stay below until further orders," Leo snapped. "Tommy, take your post on the bridge. Vaughn, close all ports."

Men no longer slow-moving with the heat snapped to their posts and a large American flag was soon hanging from the peak. Only the slow forward movement of the ship stirred its folds, but red, white, and blue showed with occasional stars and stripes. A bullet ricocheted off the slim steel mast and went screaming away down the river. A sailor at a port-hole spotted a Chinaman on the bank. After that the river seemed lined with them, moving along with the passage of the ship. One would stop, a smudge of smoke would leap up, and then the smack of lead on steel, or the harmless whine if he missed.

Leo cautioned the men not to open any ports or show themselves at any time, and then he joined Tommy with the radioman on the bridge. They radioed the flagship at Manila:

"Being fired on from bank near Chan Foo. Advise procedure."

The answer came very soon: "Proceed to Chan Foo and wait further orders. Under no conditions return fire."

"That's a big help," Leo remarked, in some disgust. "What do we do? Sit here in this sweat box and let those fellows spend a week taking pot shots at us?"

"Perhaps they're just some loose bandits with nothing else to do. Let's go on to Chan Foo, Leo, and see if things aren't under better control there. You know, if I hadn't moved just when I did that first shot would have drilled me."

"Right. How's the river along here?"

"Shallow in spots—tricky."

"We'll keep this speed. Perhaps these fools won't follow us all the way to Chan Foo. It'll be awful if we have to keep everything battened down for any length of time. Are they on both sides?"

Tommy held up a mirror in front of the glass of a porthole, stooped down, and looked up into it. For a long time he watched the bank reflected in the mirror.

"Don't see a thing," he finally said. "I'll crack this port a little, but stay out of line. These Chinese seem to grow in the grass."

Leo moved over to the other side of the narrow cabin out of line of the porthole. A welcome sweep of hot air came into the cabin. Tommy stood pressed back against the bulkhead. For a minute nothing happened, and even on the other side there were no longer those vicious snaps of rifle shots in the steaming air. The helmsman, apparently undisturbed, continued slowly turning the wheel one way, then the other, as he eased the ship up the river.

"I feel sorry for those people below decks," Leo said. "It must be at least a hundred down there already."

"Easily. It was a hundred and twenty in the engine room."

"Well, we'll get along to Chan Foo and maybe things will quiet down."

"Perhaps this is an old Chinese custom, or a wedding or something," Tommy suggested.

"They nearly made it a funeral. Slip below and tell the men to open the ports on the starboard side, but not to stand in front of them. I don't think the bandits are over on that side, but there's no use taking chances."

"Aye, aye." Tommy stooped low under their open port and started for the ladder leading below decks. As he crossed the line a bullet whizzed through the porthole and smashed into a framed chart on the opposite bulkhead.

"Belay that," Leo said calmly, and closed the steel window. "We'll just have to boil."

"Chan Foo, sir," the helmsman said.

They had rounded a bend in the river and on the port side was a typical Chinese town built on the banks of the Yangtze. Cluttering the river for a third of its width was a jumbled mass of boats, sampans, skiffs, houseboats, rafts, and anything that would float. All of it was hopelessly tangled with ropes, laundry, planks, bridges, and Chinese.

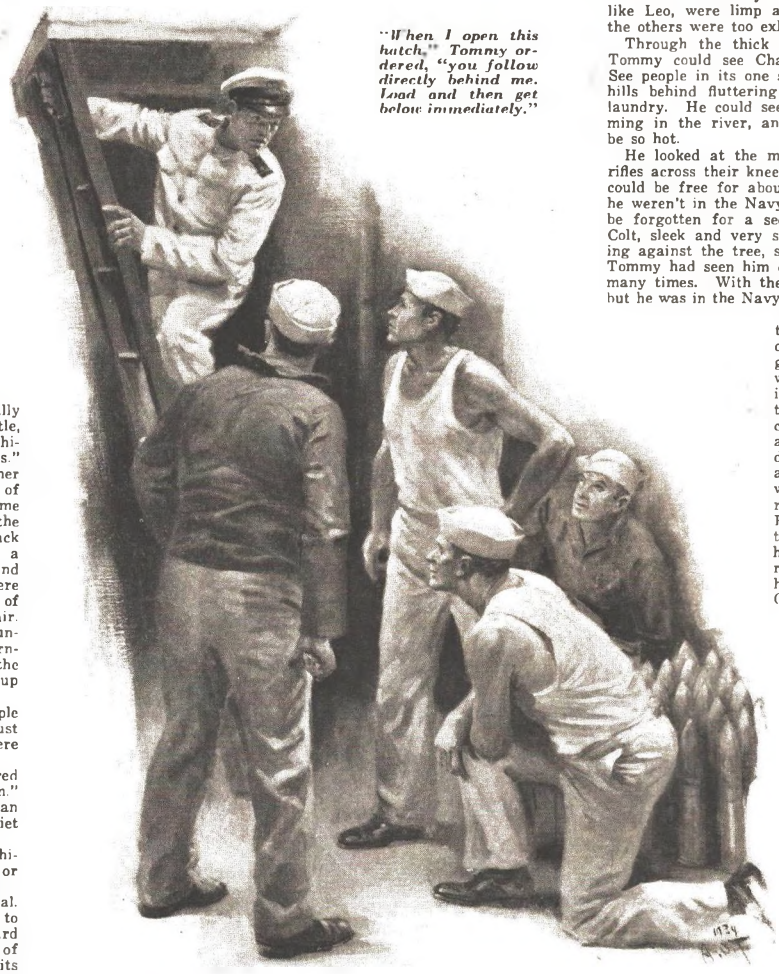
Above the mess of boats was a worse mess of houses. There seemed to be but one street that led straight back from the river's edge and along its narrow length houses had been crammed together until it seemed as though someone had dumped a huge bundle of small sticks, old wrapping paper, poles, and rags into one spot and then cut a narrow straight path through it all.

Chan Foo had the usual number of Chinese milling about on the boats, on the bank, up and down the one street, and in all the tiny windows and doors. There were millions of them all terrifically excited about something as they scrambled around.

Leo and Tommy looked at this place and then at each other.

"So what?" Leo asked.

Tommy began to laugh. "Shall we stay awhile? It looks attractive," he said, and climbed below. Soon, on the foredeck, the hatch opened slowly, and its opening was greeted by a spattering of bullets all around it. Then suddenly Tommy's hand shot out, tripped the anchor lock, and disappeared again before the next volley could hit him. The anchor splashed into the yellow river and the chain rumbled up out of the chain locker. The ship rode on a little way, and then the deck winch stopped her. She swung slowly broadside to the town and came to rest as bullets rattled harmlessly off her thick steel sides.



"When I open this hatch," Tommy ordered, "you follow directly behind me. Load and then get below immediately."

Tommy, with his sweat-soaked back held stiffly away from the blazing hot steel of the bulkhead, sat on the navigation table in the tiny cabin and looked at his superior officer lying in the lower bunk.

Lieutenant Leo Myles was almost unrecognizable. His face was gray under three days' growth of whiskers, his eyes wandering and vague and red with fever. One limp arm hung over the edge of the bunk and moved only with the gentle movement of the ship as it pulled at its anchor chain.

Occasionally Leo would mumble something unintelligible, or push the bed clothing away with feeble hands. He had stood the heat, the monotony of the ship, the spasmodic whining of the bullets, and the continued disappointment, but the fever of the tropics had brought him down. In twenty-four hours it had sapped the strength out of him and left him weak as a baby. It had even left his mind, except at intervals, useless. Tommy sat with tired eyes looking at him, listening to his wild voice.

There was no ice, there was barely enough water, the ports were battened tight against the bullets of the patient marksmen on the shore. The ship was apparently a deserted thing lying still in the middle of the flowing yellow river. Its gray paint was spotted with rough rings of spattered lead, red-rimmed. Its engines were silent and dead, and its decks bare of any moving thing. Inside of it a crew of men sat listlessly in the sweltering heat. Some, like Leo, were limp and moaning with fever, and the others were too exhausted to help them.

Through the thick pane of tightly closed glass Tommy could see Chan Foo peaceful in the sun. See people in its one street, see the wind from the hills behind fluttering and tugging at the drying laundry. He could see the yellow Chinamen swimming in the river, and he wondered how it could be so hot.

He looked at the men sitting idly in the shade, rifles across their knees, and silently wished that he could be free for about five minutes. Wished that he weren't in the Navy; wished that an order could be forgotten for a second. In the drawer was a Colt, sleek and very solid. Take that bandit leaning against the tree, smoking and taking life easy. Tommy had seen him carefully aim and fire a good many times. With the Colt—it wouldn't be hard—but he was in the Navy and he had orders not to fire.

Tommy sat and thought of that. If he could just let go one time with that three-inch gun up on the bow there wouldn't be a Chinaman within fifty miles of there by the time the smoke cleared. He could open all the ports, get all the fresh air he needed, drink water, swim — be cool again. Just one little shell would wipe the banks of that river as clean as a pie plate. But he couldn't fire. He had to sit and go crazy with the heat and let a bunch of second-rate bandits take pot shots at his ship all day and all night. Orders were orders.

The radioman, his hands shaking with fever and his eyes watery, came in and saluted weakly.

"Daily bulletin, sir."

"Thanks, Jake. You taking the quinine?"

"Yes, sir."

Tommy glanced at the bulletin. "Hmmm. Navy Day today. I'd forgotten all about it."

"Yes, sir. Maybe shore leave, sir?" Jake asked with a wan smile.

"Wish we could, Jake. But we'll get out of this in a day or so."

"Yes, sir," Jake said, knowing that it wasn't so.

"Very well."

The radioman left and Tommy reread the bulletin:

"Today being Navy Day all ships in active commission will fly appropriate flags and fire the customary salutes."

It would be rather difficult, Tommy thought, to fly "appropriate" flags. Orders, though, were still orders. Tommy stared at the ceiling for a long time. Then suddenly he got down off the table, put on his cap and went below.

The men who were able sat up or stood up when he came into the sweltering, feverish forecastle.

"Carry on," Tommy said, and beckoned the chief gunner, Hill. "Today is Navy Day, Hill. We will break out the flags and fire the proper salute."

"Sir?" Hill asked in amazement.

"How fast can you load, Hill?"

"Load and fire in ten seconds, sir," Hill answered with justifiable pride.

"Very well. Get your crew together. Equip with 21 shells and stand by at the forward hatchway."

"We haven't any saluting shells, sir," Hill said.

"You sure?"

"Yes, sir."

(Continued on page 35)

Nichols turned impatiently to Renfrew. "Get in off the ice!" he cried. "The lunatic's firing!"

Hunter *and* Hunted

by Laurie York Erskine

THE ROYAL CANADIAN Mounted Police detachment at Fort St. Roche was housed in a wide log cabin. Two cells, a living room, and a wash room ran across the back of it. A wide orderly room spanned the front, which opened upon the "street," consisting of six scattered cabins and a general store.

In the orderly room on a bleak March morning, Constable Nichols sat tapping at a portable typewriter. At a small table near the glowing stove Renfrew, his guest, who was enjoying a holiday visit in the high North, washed the breakfast dishes. After the special officer had washed a dish and thumped it down with a satisfied flourish, Steve Brandley painstakingly dried it.

Steve was eighteen. He had come down from Resolution to join his father, who had been trapping from a cabin north of St. Roche, and the boy had been rescued by Nichols and Renfrew while trying to get help after his father had been killed by an infuriated moose. He now waited at the post to go south with Renfrew when the officer's leave was up.

"Where do you chuck the dishwater?" asked Renfrew, rinsing the coffeepot.

"Out the back door." Nichols looked up uneasily from his writing. "I ought to be doing that myself, only I want to get this report ready to go out with you tomorrow. I'll open the door."

He jumped through the little passage to the rear and held the back door open while Renfrew emptied the dish pan. Renfrew ducked quickly back out of the sub-zero temperature, but Nichols continued to hold the door open, gazing at a man who plodded through the snow behind the row of scattered cabins.

"That's Lahti Haavenden," he said. "Wonder what he's doing down here without his dogs."

Renfrew glanced at the man just disappearing behind the general store. "Trapper?" he asked.

Nichols closed the door and walked back to the orderly room. "Yes, from Finland. He runs a line about fifteen miles up the Greytimber River. He's a trouble maker."

"Drunk and disorderly?"

"Oh, no. Meek as a rabbit. And maybe the trouble's not entirely his fault—Clawhammer's no pacifist."

"That's an engaging name."

"Clawhammer? I suppose it is. He's an Indian with a tribal name that sounds like that; so they've nailed it on him for keeps. And he's—well, irritable. Two years ago he complained that Lahti was fooling with his traps. We warned Lahti, though the only evidence we had was that Lahti, trapping in exactly the same kind of country — his trap lines cross Clawhammer's — got about twice as many pelts. Then Clawhammer charges down here last January with the accusation that Lahti's using poisoned bait. We searched Lahti's shack, and looked at his traps. We found some cyanide mixed up in some balls of rotten meat and rancid fat, and fined the old boy, but didn't get enough evidence to take his license. Since then we've had to protect Lahti twice from Clawhammer's rages, and both times Clawhammer claimed they were due to his having drunk too much of some liquor Lahti gave him. If I could get the goods on either of them, I'd send him up."

A hand rattled the door latch.

"Visitors," said Steve, who had been putting away the breakfast things.

The door opened and Lahti Haavenden entered. He was a rangy, raw-boned man with shaggy eyebrows that gave his long, high-cheek-boned face a

look of perpetual puzzlement. His long, lean jaw was covered with a brush of sandy beard, and his pale blue eyes popped with apparent alarm.

"What's up, Lahti?" said Nichols.

"Clawhammer!" exploded Lahti. "He's mad!"

"You two squabbling again?" demanded Nichols.

"No, he's mad! Crazy! He came to my cabin in the night. He fired his rifle—two, three times—through the wall. I hide in the chimney. He fire through the window. He will kill me, he yell. The poliss, I tell him, they will get you. But he is crazy. He fire all over my cabin. He break the lamp. He split the stove. Bullets everywhere—all round. He no care for the poliss, he yell. He come down here and kill them, too. He is crazy! He is mad! I get out of that cabin, and I run here. So!"

Nichols exchanged a long look with Renfrew. "Guess I'd better go see," he said.

"Me, too," smiled Renfrew.

"No." Nichols shook his head. "You've arranged all your transport to leave tomorrow. This may keep me out a few days."

"I'll wire," Renfrew said.

"We'll take the sled," said Nichols. "Grub for a week — you never know. And some ammunition. Want to come, Steve?"

"Sure," said Steve.

Lahti turned to the door. "I go," he said.

"Where?" demanded Nichols.

"To the store. I am hungry."

"All right. We'll pick you up when we're ready." Lahti left.

"Queer," said Renfrew. "He was making for the store when you saw him. Why didn't he eat then?"

"Search me," said Nichols. "You fellows dig out the grub. I'll hitch up the dogs. Steve, you'd better take the spare Enfield, and bring about fifty rounds of ammunition apiece. Men get pretty queer sometimes out on the trap lines."

Thirty minutes later the three were packed and dressed for the trail. With Nichols at the handles of the sled, they made their way down to the store. But Lahti wasn't there.

"He was in about an hour ago and swallowed a can of beans," said the storekeeper. "He hasn't been back since."

Again Nichols met Renfrew's questioning gaze.

"Poor fellow," he said. "He's scared senseless."

They ran the sled down the bank onto the river ice and Nichols turned it northward. Eighty minutes later they were mushing steadily over the Stareway River, heading up toward the wide white field that marked the entrance of the Greytimber.

"Is there only the river?" asked Renfrew.

"Meaning what?" said Nichols.

"I was thinking that if a maniac is really on his way down to wipe out the police force at St. Roche, he won't be following the river if there's any more secluded trail."

"That's right," said Nichols. He stopped the sled.

"I hate to think of what he might do in the village if he got by us," reflected Renfrew.

"About two miles back," said Nichols, "there's a valley trail that comes out on the Greytimber about two miles below Clawhammer's cabin. We ought to cover that. Then there's the telegraph trail that runs along the ridge above the river. We could cover that, too."

Renfrew thought it over. "Let Steve take the telegraph trail," he said. "Then you can follow the valley trail, and I'll take the sled up the river."

The blunt face of Nichols was slowly illumined by a grin that expressed a grim appreciation of Renfrew's words.

"No, you don't," he said firmly. "This is my job. I take the river."

Steve, listening and watching the faces of the two officers, became suddenly aware of their naked exposure: three clearly delineated black forms against the white field of the river ice, with no chance of cover against a bullet fired from behind brush or rocks. The man who took the sled up the river would be a slow-moving target.

"Let me take the sled," said Steve. "He hasn't any quarrel with a stranger."

But Nichols was firm. He himself was taking the sled.

"You're on leave," he said to Renfrew. "I'm in charge."

Renfrew, after getting a mental map of his route, set off across country to pick up the valley trail. Steve, his snowshoes strapped to his back, began the steep climb over slippery rocks to the high ridge where the telegraph line cut a narrow swath through the brush. Nichols, his rifle atop the duffle on the sled before him, calmly pursued his unsheltered way up the river, a human target, black against the river's white.

Steve Brandley reached the top of the rocky slope and plunged into the brush with tremendous relief; he had been tensely aware as he climbed up of what a maniac rifleman could do to a man clambering slowly up those rounded cliffs—every nerve had been taut with the expectation of a lead pellet that might at any moment crash through his flesh and kill him.

The snow was deep in the narrow trail cut by the linesmen, and he stopped to slip on his snowshoes. As he plodded forward between the walls of high brush and snow-laden spruce, his rifle in the crook of his elbow, he felt a sense of security, born of the sheltered trail and the Lee-Enfield, loaded and ready. He could not be taken by surprise.

The trail was no easy one. Fallen boughs, stumps, and brambles made a treacherous and rugged pathway under the drifts. Moreover, the telegraph line strode carelessly across cuts and gullies and skirted hillsides so steep that Steve sometimes had to swing from tree to tree to avoid a bad fall or a long slide to jagged depths.

At last, on the rim of a rock-walled ravine, he stopped with a low whistle—that ravine was the trickiest obstacle he'd met! He decided to remove his snowshoes before descending the snow-filled gap. He started down in his moccasins, and hadn't scrambled down the face of the first bowlder before he wished he had strapped his rifle to his back. But he had little time for regrets; clawing for toe and finger holds on the jagged face of the rocks, he slithered and scrambled on down until, balanced precariously on a rounded height that fell away to the depths of the gully, he realized the full error of his way. He could get no farther. He must beat his way back and find an easier descent.

Slowly he began to crawl up the rounded surface of the rock. The wet leather of his moccasins slipped on the stone. He was appalled by the weight of his body, bearing him downward, defeating the strength of his arms and the desperate pressure of his legs against the unyielding rock. Suddenly his feet slid from beneath him, and he shot down, his futile fingers rasping on the stone.

The deep snow received him. Half-smothered, he struggled up and wallowed in it, lurching and scrambling, toward the opposite ascent. He had fought two-thirds of the way up that side of the gully before he realized that his rifle was gone, hopelessly buried in the soft snow below.

Panting, smarting, fingers bleeding and body bruised, he clambered on up to the trail and started forward again. But now his mind was haunted once more by that sense of insecurity, of nakedness in the face of a deadly menace. He felt a desperate urge to get back to the river again, and have Nichols and Nichols' rifle near him. But he fought it back. Nichols was out there alone, gallantly making a target of himself on the river ice—he must guard him from the hazard of surprise.

He found himself on the summit of a hill, where the narrow trail turned sharply. Now he could see for some distance along its length—and he drew a quick breath. Far away on the narrow white ribbon of the trail, a man was moving toward him. A tall, panther-footed man who slunk along in his snowshoes with a rifle grasped in his hands, ready for instant firing!

For a brief moment Steve stood motionless, frozen by a sense of doom. Then he realized that the oncoming man couldn't see him through the brush on the curve of the trail. He dived back into the woods! Moving with forest-bred speed and cunning, he cut across the twist of the trail and found cover in the spruce thicket at the trail's edge a rod or so before the approaching man. The setting sun sent a slanting shaft of ruddy light down the trail so that the man seemed to be walking into a spotlight, and his face was fiercely and brilliantly revealed.

Steve had nerves steadier than most. He had seen death, and to save another had once plunged forward facing it unfalteringly. Yet now, at the sight of that sunlit face, something inside him quailed.

It was the face of an Indian, the copper skin stretched tightly over high, sharp cheek bones, over an arched nose and deep eye sockets, over a sharp, jutting line of jaw. The lips were cruelly thin, drawn in a harsh line across the teeth; the eyes gleamed with deep-sunken ferocity. Steve's blood chilled—this man came on like a tiger, lusting to kill; like a maniac, murderous as a beast.

Breath almost stopped, Steve peered through the brush and watched the Indian pass, watched the red sunlight burnishing the steel barrel of his rifle—and felt a sickening sense of helpless peril. He thought of Nichols, out alone on the river ice. He thought of the job he had been given—he had been sent to prevent the passing of this maniac who had passed! . . . and then thought left his mind as he saw the Indian halt and pounce down upon the snow at the top of the hill. The maniac had picked up his tracks!

From that moment Steve Brandley ceased for a while to be a thinking human being. He was a defenseless animal hunted by a beast of prey. Without knowing why, he dashed across the trail and into the brush above the river. Instinctively he leaped from a bare stump, protruding through the snow, to a wind-swept rock, and from that made a prodigious jump to a flat level of stone that shelved out over the chaotic pile of granite which fell away to the river ice.

Like a fleeing rabbit, he bounded downward in a preposterous descent that combined incredible balance with a lightning choice of each succeeding leap and plunge and drop. Coming to a narrow, descending groove, he thrust himself into it and slid down until a fortunate turn in the groove checked him. Then, working his way in a sitting position around the turn,

Suddenly his feet slid from beneath him, and he shot down, his futile fingers rasping on stone.

The lips were cruelly thin, drawn in a harsh line across the teeth; the eyes gleamed with deep-sunken ferocity.

he came out on a ledge scarcely eighteen inches wide. He struggled to his feet, stood poised for an instant and then swung off unhesitatingly to the upper branches of a tree some eight feet out. Down the tree he scrambled, and then, groveling, hugging the rock and the sloping shale, he followed the foot of the granite up a deep gully, found a drop to soft gravel below, and rolled back into the shelter of a shallow little cave. He regained his thinking mind as he lay there, stifling his panting breath, concealed from all sides and for the moment safe.

With thought came the memory of Nichols. Below him, scarcely a hundred yards down the gully, was the white highway of the river up which Nichols was steadily and fearlessly advancing. . . . Slowly Steve emerged from the cave. He stood in a cleft, on a precipitous slope of gravel stretching down to the snow-filled bottom of the gully that led to the river. He drew a long breath, thrusting back the memory of the Indian's maniac eyes, and scanned the wild country about and above him, listening intently. He saw no sign of human life; he heard only the sound of bird noises, the far-off cracking of ice. With a sudden movement he darted down the gravel slope. Again he paused, eyes wide, ears strained. Slowly, stopping frequently to look and listen, he moved toward the river.

He emerged from the gully in the shadow of a granite shoulder that overhung the river like the stern of a ship. Crouching under it, he was able to obtain an unobstructed view of the river, which swept away from him like a broad white road down to a point about a mile distant where it curved from sight. Again he stood motionless, listening. This

Illustrator: FRANK E. SCHOONOVER

time he heard the sound of metal upon stone, high in the rocks, a little farther down river. With great care he maneuvered for a position from which he could see the source of it without being seen. The rocks of the river bank were piled up from the river like huge, irregular blocks thrown in a heap by a giant. Down the tilted side of one such rock the Indian was descending, his rifle held away from the stone to prevent a repetition of the sound that had betrayed him.

Steve watched him, fascinated. The man moved with the lithe, sinister grace of a tiger on the hunt. Occasionally he stopped short, to glance with keen, ferocious eyes about him. Except for such pauses he descended with swift ease to the river ice.

Steve's breath almost stopped as the Indian reached the river bank level—if the man turned toward the gully, the wild retreat, the hunting, must begin again.

But the Indian looked down river. He put down his snowshoes and stepped into them. He moved out on the river ice, seemed about to strike out down the icy highway—then stopped, alert, tense, catlike. The next instant he turned, dashed back to the rocks, slipped his feet from the snowshoes, threw them over his shoulder, and started up the chaos of stone with the powerful ease of a puma.

Steve stared in astonishment at that swift retreat until the Indian disappeared into the riot of brush-crowned rocks. Then he looked back down river and his heart leaped with alarm—around the bend came dogs, sled, and Nichols!

Coming on toward him! And toward that frantic demon who even then might be sighting Nichols on the bead of his rifle from a safe concealment up above! . . . Steve clenched his teeth and stepped into his snowshoes. He'd got to warn Nichols—he might make it if the maniac were wholly intent upon the oncoming man. Crouching, he started swiftly down river, close under the bank.

He drove himself along, half running, half trotting, slipping and lunging through the slush, straining on and on—and then he saw Nichols move to the opposite bank! Going over to hug it for protection, of course, relying upon Steve to cover the telegraph trail. Protection! Steve's heart sank. Nichols had unknowingly tripled their peril. Now he'd have to cross to him over the open ice—if he could. If he could only get within earshot in time! He must—he would! But he mustn't yell too soon. Steady now—ready for the dash!

And then Nichols stopped. It was almost as if he had heard the thoughts that shrieked in Steve's brain. He looked about him—and Steve sprang out onto the ice.

"Nichols!" he cried, motioning frantically. "Take cover! Cover! Take cover, quick!"

For an instant Nichols stood and stared at him, too amazed to stir. From the high rocks of Steve's bank up the river, a rifle cracked once. Steve saw the splinters fly from a *(Continued on page 28)*

Jim Tierney finds new and grim meaning in the old adage about an apple a day! Here's an exciting adventure in the busy streets of lower Manhattan!

With a swift and noiseless tread, Tierney stepped to the casement and threw up the sash. The man was hurrying toward the garage.

The Hand *at the* Window

by John A. Moroso

Illustrator: ROBERT M. BRINKERHOFF

"WHO IS he?" demanded Howard Ronaldson nervously, lifting his short white beard momentarily above the edge of his *Financial Journal.*

"The man Inspector Sweeney promised to send," replied Miss Agnew, his secretary. "The detective."

"Show him in, please."

The door swung open to reveal the portly figure of James Tierney, an ancient derby in his right hand. From a round fat face, two little blue eyes innocently swept the office of the bank president.

Mr. Ronaldson stared up at the caller with a look of amazement. "Are you the detective?" he asked.

"Yes, sir."

"Sit down. How do I know you're a detective?"

"Inspector Sweeney sent me."

"How do I know Sweeney sent you?"

"Here's his letter."

Mr. Ronaldson read the few lines of introduction stating that James Tierney would be found the right man for the job. "Tierney," the last line said, "is the best in the business."

Miss Agnew withdrew.

The Ronaldson bank occupied a three-story marble building, tucked between two great skyscrapers in the heart of downtown New York. Ronaldson and Company had been in the private banking and investment business for four generations. They had provided millions for the building of railroads and great industrial plants, the waging of wars, and the bridging of the Atlantic with great liners. Beneath the banking house the vaults of Ronaldson and Company, extending far down into the shale rock of Manhattan, were fairly bursting with cash and gilt-edged securities.

Demands for extortion money addressed to Mr. Ronaldson never came to his attention. His secretary turned them over to the head of his private detective agency. The banker felt safe in his marble counting house and safe in his splendid estate on top of the Palisades, across the Hudson, where armed men guarded him constantly. In a cleft of the great wall of rock rising from the river the banker had constructed an elevator to take him down to his yacht, which bore him every morning down the river to the Battery and awaited his pleasure. His town automobile finished his journey to the bank.

The early afternoon sunlight of a brilliant September day flooded the president's private office through a deep window of glazed glass. The passers-by on the sidewalk made soft gray shadows against it.

Mr. Ronaldson glanced upward to an electric clock on the wall opposite his desk. "It's two forty-nine," he said. "Please turn your chair, Mr. Tierney, and watch that window."

The detective obeyed, placing his derby on the rug at his feet.

"Two fifty-one," said the banker, his eyes glued to the clock. "Two fifty-two." Slowly he counted off each little leap of the minute hand. "Now concentrate, Mr. Tierney, please. Three o'clock! Do you see it?"

"There seems to be a hand pressed against the window."

"Yes? What else?"

"The fingers are bent as if about to clutch something."

"Do you notice anything else?"

"The hand seems heavily gloved or it may be the heavy hand of a laborer. If it isn't gloved, then it's

the hand of a mighty man or a deformed man."

"Anything else?"

"Only the shadows of people passing."

"Do you see the shadow of the man back of the hand?"

"No."

"What now, Mr. Tierney?"

"The hand is disappearing slowly—almost melting away."

"It's two minutes after three. What do you make of it?"

"Have you got a man outside watching?" Tierney asked.

"Yes."

"Is he reliable?"

"One of our guards. He's been with us ten years, a man with a family, sober and honest."

"How often has this thing happened?"

"This is the fourth time. Always at three o'clock. Since the first appearance of the hand on the window the guard has been stationed on the sidewalk, but reports that he has seen no one stop at the window."

Miss Agnew entered and reported that the guard had told her that no one had placed a hand on the window.

"I understand," suggested Tierney, "that some of these Stock Exchange brokers are given to playing practical jokes when the market is dull."

"This is no joke, Mr. Tierney. This sort of thing could easily drive a tired and worried business man to nervous prostration or worse. Of course I shall pay you amply to solve this terrible business."

"What time do you leave for home, Mr. Ronaldson?"

"My car is waiting at the curb out there."

"You have a bodyguard as well as the chauffeur?"

"Yes."

"I'd like to take the guard's place. Will you dismiss him for the time being?"

"Yes."

"I'd like to stick close to you for a few days and nights. Can you arrange to give me a room in your home?"

"The room adjoining mine, if you wish."

The chauffeur drove them to the Battery, saw them safely aboard the *Privateer* and drove away in the city traffic.

"You keep the car in the city?" asked Tierney.

"No. Williamson drives it through town and over the George Washington Bridge. He'll be home by the time we get there."

Tierney had hardly been shown to his room in the Ronaldson home when the butler brought him a telegram. It had been sent from a station in the Bronx just across the river from the banker's country estate. It was addressed to Tierney and read:

"Lay off that job. He's got more money than a hundred men could spend in a hundred years and we got none. But we're going to get plenty even if we have to wipe you out. A Friend."

Tierney immediately called the telegraph office but learned only that a messenger boy had been stopped on the street and given the message with a dollar, and had delivered it to the office. The boy remembered only that the man was young and neatly dressed.

Tierney didn't tell Ronaldson of the telegram. Marveling at the alertness of the crooks, he spent the two remaining hours before sunset in going over the fifty acres of grounds around the great stone house. The man in charge of the guards accompanied him.

A high iron picket fence surrounded the place. There were four gates with heavy locks, each of them guarded day and night.

"It would be a hard job for anybody to get near the boss," said the chief of the guards. "Intruders could climb the picket fence in the night but they couldn't get past my men. Lately we've put a machine gun nest on each side of the house, hidden in the ornamental bushes. There have been threats of kidnaping but Mr. Ronaldson hasn't seen 'em. Where you from, old-timer?"

"Police headquarters, New York."

"Well, let me know if I can be of service."

"How many servants are there here?"

"Fifteen in the house and three outside—gardeners."

"Where do they sleep?"

"In their homes down the hill—Englewood, Tenafly."

"Do you check them coming and going?"

"Yes. The last to go is Mrs. Ronaldson's personal maid and she's never later than eleven o'clock."

"After that no one but members of the family and your guards are within the grounds?"

"No one but Williamson, Mr. Ronaldson's chauffeur, who also serves him as valet. He has a room in the big house to be on call in case of illness."

"Where is his home?"

"England. Mr. Ronaldson had him recommended to him by a friend in London while he was over there on business four or five years ago."

"And is the butler English too?"

"Yes. The rich Americans seem to like British servants."

They had reached the edge of the Palisades, just above the cleft down which the elevator shaft had been built.

"What would they do if this cage got stuck halfway down?" asked Tierney.

"Get the boss out first and then make the repairs. A good engineer planned this thing. There are platforms cut in the rock every thirty feet and iron ladders to connect 'em. There's a way out from each platform to a path that slopes down to the river."

"People could come up and into the estate that way," suggested Tierney.

"Not much chance. The top exit from the elevator is barred by a steel gate and the lock of this gate is kept in the elevator man's possession."

"Yes," thought Tierney, "and men graduate from Sing Sing every day who could pick such a lock with an old nail."

Night had come and Jim returned to the house to eat with the chauffeur and the other help in their dining room. Williamson, a clean-cut man of about thirty-five, sat at the head of the table. He drew back the chair at his right for the newcomer.

"I managed to get night clothes and fresh linen for you on my way uptown," he informed Jim. "I noticed that you had no bag. I'll lay your things out on your bed after I attend to Mr. Ronaldson."

"You're a new guard," one of the girls said.

"That's right, sister," Tierney grinned. "And as a job for a man of my years I'll say this is Boston cream pie. Nothing but automobile and yacht rides."

When Tierney found that he couldn't possibly hold another helping of roast beef and potatoes and could just barely, out of politeness, wrap himself around half a pie, he informed the company that as soon as Mr. Ronaldson was in his coop for the night he would also go to roost.

Mrs. Ronaldson and the children were at their Tuxedo place for the approaching autumn. The banker left his library at nine-thirty, retiring to his dressing room, which was next to the bedroom provided Tierney. The detective was in bed when the valet-chauffeur tapped on his door and asked whether he needed anything.

"Sleep, only sleep," replied Tierney with a mighty yawn. "Good-night."

Most of the night Tierney stayed awake, listening for sounds from Mr. Ronaldson's rooms, but he heard nothing of interest. Williamson came at seven o'clock, tapped on the door, and informed Jim that his bath was ready.

"What's that?" snorted Jim.

"One bathes in the morning," suggested the valet.

"It ain't Saturday night," drawled the old sleuth. "Run along."

(Continued on page 33)

Tierney watched with sudden interest as the man picked up the apple, paid for it, and wandered on.

Friendly talks

WITH THE EDITOR

Inventions Everywhere!

STAND in the middle of your home, and look about you. You're surrounded with inventions that make life easier and more comfortable. Your radio brings you first-hand messages from Europe. Your electric refrigerator keeps your vegetables cool. Your telephone connects you with every corner of the world. You have a vacuum cleaner, an automobile, an automatic washing machine. Perhaps, already, your home is air conditioned. Maybe, as you look around, you're struck with the thought that everything we need has already been produced. Perhaps you possess inventive skill, but feel the world has no use for it. If so, read the next paragraph.

But More Are Needed! The Institute of Patentees has compiled a list of inventions that we badly need at this very moment. How many are there? Four or five? Wrong. There are no less than 895! One is a cheap automatic device to awaken the deaf. Another is a non-skid highway. Here are several others: An instrument that will let you determine the pressure in auto tires at sight, and without having to fuss with a valve cap. A cheap photo-electric cell to fit inside the bulb of an automobile headlight and automatically dim it at the approach of another car. A table napkin that won't slip off the knees. A captive golf ball, for winter use, that will so behave as to show you where it would have landed had you played it in the ordinary way. So there are a half dozen. We haven't room for the remaining 889. But we guess these six will keep you busy for awhile.

For 1,000 years poultry was bred for fighting. Only in the last 50 has it been bred for egg production.

The Murder Business

AS WE sit here and write the newspapers are full of high explosives. Munitions manufacturers are on the carpet. We discover that the gentlemen who make money out of bursting shells and torpedoes aren't content to sit back and let wars develop all by themselves. These gentlemen conduct under-cover publicity campaigns to keep nations fearful of each other. Result—bigger appropriations for war. More money taken away from schools and libraries and used for battleships and poison gas. We're heartily in favor of legislation that will place the manufacture of munitions under close government supervision, so that nobody can make a profit out of it. That would squelch these international trouble-makers.

A Lesson From the Soldiers Right now certain misguided people are doing everything possible to create a first-class Japanese-American war scare. We are perfectly convinced that there is no need of war on the Pacific. The great majority of people in *any* country shudder at the thought of war. We've just been reading an article by Henry Williamson (author of that magnificent book which you ought to read—"Tarka the Otter"). Discussing "Christmas," the British Mr. Williamson writes: "Best of all was that strange and beautiful Christmas of 1914, when we made friends with the Saxons of the 133rd Regiment opposite us under Messines Hill; when in the frosty moonlight of Christmas Eve we strolled about in No Man's Land, talking and listening to the carols sung in German, only forty yards away, and later watching with indescribable feelings the candlelit Christmas tree they planted on their parapet. . . . Many of us longed, and even prayed voicelessly, that its good will and spirit should extend and deepen until no war spirit remained." . . . That's how soldiers felt, soldiers at war with each other. Perhaps, even, there's hope for munitions manufacturers.

Game animals and birds insist on plenty of room. Conservationists estimate that the capacity of a preserve is one bird per acre, and one deer for each twenty acres.

We Recommend This Hobby

IN OUR November issue we published an article about one of the most exciting hobbies we know of—book collecting. It told of the fun of collecting books on subjects that interest you especially—airplanes, exploration, ships. It told how, in any farmhouse library or secondhand store, you perhaps may find first editions worth a dozen times their cost. A first of Jack London's well known "The Call of the Wild," for instance, will bring you $15. . . . That article attracted a lot of attention. The author, R. A. Brewer, was showered with requests for information. Now, we're glad to announce, Mr. Brewer has brought out a new book that answers every question for you. It's called "The Delightful Diversion," and it's published by the Macmillan Company, New York City. It tells you how to identify first editions. It states the values of English and American books. It lists more than 600 American firsts, worth from $15 to $10,000. For high school boys and girls, for college students, for adults, this is a book we enthusiastically recommend.

Motorless gliders have traveled 232 miles, have stayed in the air 36 hours and 35 minutes, have climbed to a height of 8,494 feet.

He loved his Country, he loved her cause,
Her honor, her flag, her fame,
He loved the light of her liberty,
Her new and radiant name;
And it doesn't get into the histories,
But how he loved her trees!

It only got into his journal how
He cherished them, down to the core
And up with the grain to the topmost bough,
With all the treasure they bore.
He must have remembered in battle smoke
The ripple of new-leaved oak.

He knew the hillside for apple and peach
And the orchard corner for plums;
He knew to an inch how far apart
Birches must stand, and gums,
As he knew to a day the budding time
Of maple and larch and lime.

When the wearisome fights were over and done
He used to hurry home
And get down close to America's sod,
Touching her clay and loam,
Breathing deep at the root of things,
Forgetting colonels and kings!

History gives us the Gentleman,
Fine in ruffle and stock,
The General, booted and spurred and bold,
The Statesman, firm as a rock.
I give you the Countryman, on his knees,
Earth-warmed, setting out trees!

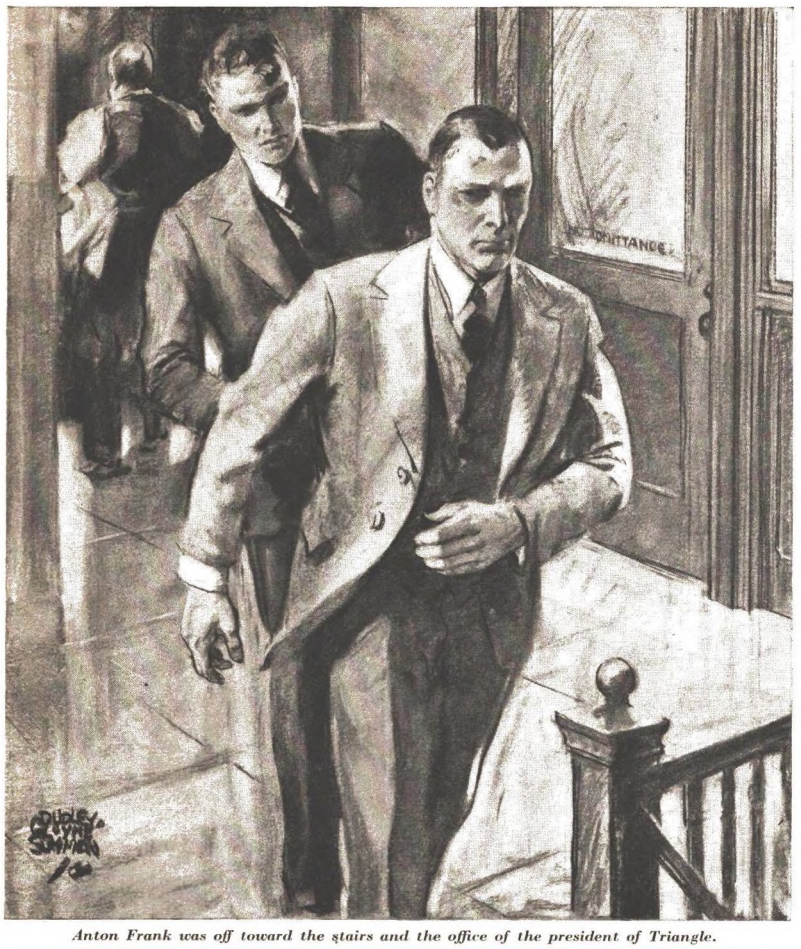
Jobs With Railroads

THE other day we were talking to a high official of a transcontinental railroad. He isn't pessimistic. He's glad he picked railroading as a career, and he positively asserts that it offers a comfortable future to ambitious boys. He says that the fastest way to the top is the way that starts at the very bottom. First, give yourself a broad and cultural background. Get a college education of the liberal arts variety, with some emphasis on economics and business. Then study stenography. Good men stenographers are scarce, and they seldom wait long for jobs. Stenographers get an excellent grounding in the fundamentals of any business. They have a first-class chance to watch executives work, to know what's being done, and how. Theirs is the best chance to learn quickly, and to climb the same way.

Sixty million years ago the seacoast of Virginia was the home of 25-foot sea serpents.

A City Afloat

LEIF ERICSON, brawny Norseman, crossed the Atlantic in a war galley propelled by oars and sail. Leif Ericson would drop dead with amazement if he heard about the *Normandie*. This giant vessel, world's largest ship, will make its maiden voyage next May. She is 1,029 feet long. Her gross tonnage is 79,280. She is electrically powered. Four 23-ton propellers, each nearly 16 feet in diameter, will drive her at record-breaking speed. Her crew will number 1,339. She will have her own expert fire department, trained in Paris. Her thousand rooms make her one of the world's largest hotels. She will require 280,000 towels, 56,000 plates, more than 40,000 knives, forks and spoons. Her round trip pantry will be stocked with 70,000 eggs, 35,000 pounds of meats, 7,000 chickens and game birds. Without leaving her decks, passengers may enjoy dance halls, a winter garden, a gymnasium, swimming pools, a theatre, a photographic studio, a shooting gallery. There are even a 100-car garage, and special kennels, promenades and washing pool for dogs. As we've said, Leif Ericson would drop dead if he heard about the *Normandie*. So, too, would Jacques Cartier. Or Magellan. Or Christopher Columbus.



Anton Frank was off toward the stairs and the office of the president of Triangle.

In which a young man rides the bumps in selling

Steve Merrill

Engineer

by

William Heyliger

Illustrator: DUDLEY GLOYNE SUMMERS

The Preceding Chapters

TWO fears haunted Steve Merrill, twenty-year-old engineer in Triangle V's electrical equipment plant. He was afraid that some traitor in the plant meant to steal his meter-box idea, and he feared at times that somehow his Uncle Alvin Merrill, president of Triangle's rival, Electrical Equippers, Inc., was concerned in the theft.

That meter-box idea meant a lot to Steve. Triangle had given him his job on the strength of it, and he fairly ached to have his box a success on the market. It would mean a start for him. Then, too, it would show his uncle—who had refused to give him a position until he had proved himself elsewhere—that he was really worth something.

But there certainly was crooked work going on at Triangle. Circumstances had thrust Steve into the thick of things; yet he couldn't figure out who was at the bottom of the sabotage that was threatening the work of the plant, its reputation, and in the long run its very existence.

"If I could only nab the guy who's doing the double-crossing!" Steve would say to himself between set teeth, and go over the list of possibilities again.

It certainly wasn't Julius Ives, Triangle's president. And Steve didn't suspect the sales manager, Jim Branty, his immediate chief. Or Sam Brooks, the young engineer who had sat in on the meter-box conferences.

But why had Anton Frank, Triangle's general manager, and Joe Seeley, Triangle's foreman, both gone recently to his uncle's office? Why should they visit an E. E. executive? Steve had seen them there himself. And what about Hozie Crabbel, the sour, half-sick model maker? Could he be selling out Triangle to make money enough so that he could go West and regain his health? Joe Seeley had hinted that to Steve.

But troubles had thickened and twisted, and Joe Seeley was always hinting about something. Trying to throw Steve off his own trail? Perhaps.

Seeley knew in some mysterious way that Steve's box had been tried out on the testing board. Now how did he know that? Had Hozie told him?

Steve found himself fencing with Joe Seeley, fencing with words. Was the big, stooping, soft-spoken foreman trying to trap him into betraying anything he might have discovered about the dirty work going on in the plant?

Chapter Nine

THE foreman spoke again, with the air of one who passes casually to another subject.

"Did you notice the new car in the parking lot this morning, Merrill? Chromium and shining paint. Streamlined. All the latest doodads. Quite a car. I'd like to own one myself, but they're expensive toys. Twelve hundred dollars is a lot of money to lay out for four wheels. Don't you think so?"

"That depends," Steve said coolly, on guard. What was the man getting at?

"Depends on what?"

"On what a person can afford."

"Ah, yes." Joe Seeley nodded slow, thoughtful agreement. "That's always a point. If one can afford it. I wonder."

"Just what do you wonder, Mr. Seeley?"

"Why, if one can afford it. That's the point, isn't it?"

"Who owns this marvelous car?" Steve demanded.

"Hozie," Joe Seeley said softly. "You picked the word, Merrill. Marvelous is right. Looks as if Hozie's starting to bloom marvelously, doesn't it?" He smiled a moment, absently, almost apologetically, and then slouched off through the aisle.

Steve groped for light. What had the foreman meant? Certainly he had meant something. That his knowledge of a trial on the testing board had come from Hozie? That Hozie was talking—talking for money—and that some of the money had already gone into a car? Whose money? E. E.'s?

"I wonder," Steve said aloud, "if I should go to Mr. Ives?"

But with what? Through all the twists and turns of conjecture, just one undisputable fact stood out. Only those grouped about the testing board last night were supposed to know about the meter box, and yet Joe Seeley knew. That in itself didn't seem worth reporting, for the foreman might easily have a valid explanation of how he had come by his knowledge. Steve decided to go after more facts, a better understanding, before he reported anything.

That noon he ate his lunch quickly and sought Jim Branty in the office. Branty sat in momentary idleness at his desk.

"Mr. Branty, if E. E. didn't have a bid in on that New York job, would she be likely to have had anything to do with ruining those panels?"

The sales manager swung half about in his chair and looked out the window. "Merrill," he said presently, "I learned only this morning that Alvin Merrill is your uncle."

"Mr. Ives knew that when I came here," Steve said steadily.

The chair swung back. "Forgive me, Merrill. Mr. Frank is right. This business is getting on our nerves." He thrust out his hand.

A warm current ran through Steve. "If E. E. is putting on a dirty show, Mr. Branty, I can't believe Uncle Alvin knows anything about it. But whether he does or not, I'm a Triangle man."

"I should have known that." Jim Branty tapped a pencil against the desk. "E. E. may or may not have tinkered with that New York job. I don't know. The fact that she didn't bid doesn't mean

a thing. If she were after us, she'd strike where she could. A big job ruined here, another job dynamited some other place. Such things spread through the trade. Triangle's reputation would soon be spotted."

Steve nodded a slow understanding and went down to the street. He had no trouble in discovering Hozie's car. It stood out, among the older, fender-dented automobiles in the parking lot, with a lustrous beauty. The car was out of Hozie's class—that was certain. Yet many a car-crazy man bought too expensive a car, hoping to pay for it in time. Maybe Hozie had just satisfied a deep, hidden yearning—sick men got crazy ideas and forgot common sense. Steve turned on his heel and walked away—that car likely didn't mean a thing.

At four o'clock that afternoon Mr. Brede came to him in the stock aisle. "Office, Merrill."

The meter box, with the black cloth as a background, stood upon Julius Ives' desk. Sam Brooks focused a camera. Hozie Crabbel sat to one side, chalky and silent.

"Merrill," Mr. Ives asked crisply, "what day did you walk in here with the idea for this box?"

"The day before I came to work."

"I know. But I want to hear the date from you."

Puzzled, Steve gave it.

Mr. Ives made a note on a pad. "We need a photograph of the first model and a sworn affidavit as to when it was taken. Also, an affidavit from you as to the date you came here and sold us the idea. And affidavits from Hozie and Mr. Brooks as to when they started their work. These things sometimes have a bearing when you apply for your patent."

The camera shutter clicked. "I'd better take a couple more," the engineer said.

"A dozen if you like," the president of Triangle told him, smiling. He nodded to Steve. "Be here at nine tomorrow morning. I'll have the papers ready for you to sign."

Steve went home that night with a step-out swing to his stride. The battle, it seemed to him, was about over. A patent meant protection, security. The meter box would be safe.

At nine o'clock next morning he walked into Julius Ives' office. The meter box was on the desk again. Why? What now? Steve stared in astonishment at Julius Ives and Hozie Crabbel. Neither man seemed to notice him. Hozie Crabbel had a look of fixed sullenness and Julius Ives' tie was twisted to the left and his hair was wild.

"I'm asking you, Hozie. You're sure?"

"I told you, didn't I?"

"I know; I know. But we must be sure. Positive. This is too important for mistakes. I want you to think back, step by step. Carefully. What did I do? What time did I do it? How did I do it? Come. Think back once more. What did you do last night?"

"I told you what I did last night," the model maker said doggedly. "Just before I locked up I put a lump of hot wax under the meter box. I pressed it down. When I went in this morning the wax was broken. It had been moved."

"Think again. Are you sure? Did you actually seal the box down? Or just think of doing it? We're all absent-minded. Now think again. If this is true—"

Hozie Crabbel held out an almost colorless hand. The back of that hand showed a spot sore and raw. "Am I sure? There's where I burned myself with the hot wax."

A sick apprehension swept through Steve. The fire died out of Julius Ives' eyes. He was suddenly cold and calm, an executive facing the need for steel-nerved thought and action.

"Merrill," he snapped, "somebody got into the model room last night and was at the meter box."

Steve could meet disaster, too. He was shaken and torn, but after a moment he looked at Hozie coolly. So somebody had been in the model room? Perhaps. But there was no way of knowing whether the story was true or false. They had only Hozie's word for it.

Did that shining new car mean something after all? . . . And who now possessed the secret of the meter box?

Steve stared bleakly at the meter box lying upon the desk. It now seemed a leering mockery, a taunting sham. It was Triangle's, and yet it wasn't. In some engineering office, men might be at that very moment hastily using the information that had been brought to them—hurrying through a model of their own, hurrying through blue prints of a stolen idea. They might even try to beat Triangle to a patent. Men who would buy from thieves wouldn't choke on perjury—on false affidavits as to when they conceived the idea, false affidavits as to when they went to work on it, a photograph of a model with the date falsely attested.

But something more than all these possibilities weighed on Steve, and hit him even harder. The knowledge that the engineering office where these things took place might be the engineering office of E. E. gave him a feeling of nausea.

He realized, however, when he looked at Julius Ives that the fight was not yet over. The president of Triangle had picked up the telephone.

"Locate Mr. Frank and get him in here. Quickly. Brooks, too."

He put down the Triangle switch and struck it once. The handle shattered. Steve's heart sank.

Anton Frank came almost at once.

"Anton, they've got to the model room." Steve marveled at the man's voice, so quiet, so coldly controlled. "Last night Hozie put the box down on hot wax. This morning the wax was broken and the box had been moved."

The general manager did not speak for a moment. "Hozie's sure?"

"I went into that. There's no mistake about it. I'm beginning to think it's time we brought in private detectives."

Steve, watching Anton Frank, wondered if a momentary change had shown on the man's face.

"What for, Julius?"

"To root out the crooks."

"I'm against it."

Steve wet his lips. Had Anton Frank any personal reason for wanting to handle things without detectives?

"Why are you against it?" Julius Ives asked.

"What would detectives do here? Merely watch? To be of value to us, they'd have to be skilled men at the presses or on the assembly tracks or in the inspection department — skilled at something. A detective would have to mix with the men as one of them. How could he do it if he weren't trained to this work? He couldn't. Soon we'd have gossip. What were these new men doing loafing around? It doesn't take a working crew long to smell the truth when detectives come in. The alarm would sound, and the rats would run to their holes. Our chance to catch them would be gone."

Steve twisted a button between his fingers. After all, that was just plain common sense. He glanced toward Hozie Crabbel. The model maker stared straight ahead in seeming listlessness. Julius Ives was a carved figure. His body did not move—only the brain worked.

"Maybe you're right, Anton. It's our plant; we should be able to find our own way to control it. Suppose we change the lock upon the door?"

Hozie roused from his apathy and spoke with a sick man's irritableness. "I'm getting tired of all this. If we do change the lock, I'm to be the only one to have a key."

What would that mean to Anton Frank? Steve waited.

"I don't see how you're going to gain anything by that either," Frank said.

"Why not?" Julius Ives demanded.

"The damage has been done. Whatever information was sought has already been obtained. If we change the lock, we show that we suspect something. If we go on as before, we give the appearance of suspecting nothing. A man who feels secure moves freely. Why take away his rope? Give it to him. Perhaps he'll hang himself."

Well, that was plain common sense too, Steve reflected. Then his mind raised a new question. If Hozie were guilty, why should he want the only key? That would nail him with a responsibility he couldn't escape. Or had the model room already been rifled of all that was wanted?

"Again you may be right," Julius Ives said—and lifted his eyes sharply at a sound from the door.

Sam Brooks walked in. Abruptly, with his coming, the time for thought and analysis appeared to have passed. The president of Triangle swept into hurricane action.

"Sam, the meter box is out of our bag. Somebody got into the model room last night. How long do you want on those blue prints?"

The engineer gasped. "Somebody got in—"

"Yes. How long on those blue prints?"

"Give me a week."

"You get three days. Drive yourself. Hozie, the meter box stays here. I'll put it in the safe. Sam, I want to see you here at a drawing board in an hour. As soon as you finish those blue prints we'll get them off and start production."

"Who'll make the boxes?" Sam Brooks asked. "The Wartucker people?"

"Yes. Do you know anybody who can do a quicker, better job? We want speed."

Steve couldn't understand this talk of production. He followed the engineer out into the hall.

"Won't we make this box ourselves, Mr. Brooks?"

"No. We handle only steel, brass, and copper. This box will be cast aluminum. We're not equipped to make it. They'll make dies from blue prints and then cast the box. When the box gets here, we'll rig it with the fittings."

"But that takes the box out of our hands," Steve protested in dismay. "Who'll own the dies?"

"We will. We'll pay for them."

"But what's to prevent a casting company's selling us out?"

"It's been done," Sam Brooks said dryly. "We pay for the dies; if we want them we can call them in. I know a case where a casting company sometimes made duplicate dies. If you called yours in, they still had a set. Sometimes that set was used to make castings for somebody else. Occasionally you run into a question of who does own the dies. You claim you paid for them and they're yours; they claim they paid for them and they're theirs. It develops into a nice little wrangle. It all gets down to a question of integrity. If your casting company's on the level, you have nothing to worry about. The Wartucker people shoot square."

Steve said helplessly: "But if we hold the patent—"

The engineer laughed. "Merrill, patents in this electrical equipment business are almost a cockeyed joke. Often, when you bring out a patented appliance, your competitors will begin to copy it at once. Do you object? As a rule—that is, unless you have taken out a basic patent—you do not. Why not? Because the chances are you're using stuff on which they hold patents. The chief value of your patent is a trading purpose value. A sort of 'I'll let you use this of mine if you'll let me use this of yours.' Fifty-fifty."

"Then why all this scramble to hide the box if we know somebody, or everybody, will start right in to copy it?" Steve asked in bewilderment.

"Branty's the man to give you the best answer to that. It's a sales angle. If anybody tries to copy that meter box after we get it out, it will take them at least six months. They'll search for a way to improve it; they'll have to design dies; they'll have to lay out trade promotion. Meanwhile, we'll have been selling for six months. We'll have lapped up a lot of the cream. Branty'll tell you it's a hard job to head off a company that has a head start."

Steve saw that the battle line had changed. It was no longer a struggle to hide an idea. It was now a race to beat the model-snatching firm to the market. And they'd know the firm the day the other meter box came out.

Ben Thorpe stepped out into the street. "Hello, Steve," he said cordially. "Where do you hide yourself?"

His mind became two minds, one distinct from the other. One half of him worked with stock sheets and parts; the other felt through fog and tried to separate true from false. Joe Seeley had gone to the E. E. plant and had denied it. That had a shady look. So had the bus ticket business. But Joe Seeley had given him the subtle warning about Hozie. Hozie, who had suddenly sported a new car; Hozie, from whose model room the secret of the meter box had been rifled; Hozie, who had smothered his claim that he had seen a figure at the model room door. Then there was Anton Frank, who had gone to see Alvin Merrill and kept quiet about it. And Anton Frank's opposition, though it looked like mere common sense, had smothered the idea of calling in detectives or changing the lock on the model room door. Did that indicate anything? Steve sighed.

"You dumb nut," he murmured to himself. "You're getting nowhere fast."

He knew that Triangle was driving. Daily Sam Brooks disappeared into Julius Ives' office and either skipped lunch altogether or dashed out minus collar and tie to gulp a cup of coffee and silently down a sandwich. Jim Branty and men from the advertising department went in to see Julius Ives and were there for hours. Once Steve saw cuts of the meter box lying on an ad man's desk amid a welter of rough-draft ads for the trade journals. One heading, blocked in by hand, caught his eye:

YOU'VE WAITED FOR
THE OUTDOOR METER BOX
HERE IT IS

A thrill crawled through his spine.

Jim Branty sent for him suddenly. "Merrill, we intended to leave you in stock for several more months. But things are about ready to pop and another man will come in handy when the selling starts. I'm bringing you downstairs Monday."

This time Steve's spine became a flaming rod.

On Monday from his new desk near Jim Branty's he could see out into the private hall. He watched the advertising agency men come and go with their masses of copy. Once Anton Frank and Hozie Crabbel went into Julius Ives' office hurriedly and he found himself timing them. Jim Branty had to call him twice.

"Merrill! Snap out of it. Here's a jobber at Rock Island claims we shipped him the wrong stock. Dig his order out of the file; check it with the work ticket that went through the shop. See what we shipped him."

"Yes, sir." Steve moved away.

"And, Merrill—"

He stopped.

"Heads up."

Steve grinned back sheepishly. And took a brace. Jim Branty was a grand guy, and he'd brought him downstairs because he needed him. The meter box was in good hands—let it ride. Steve dug resolutely into his own job. The universe became a desk near Jim Branty.

It was a new world filled with the wonders of discovery. Each day he seemed to learn something new. You picked up information in your stride and you strode fast. Jim Branty was alongside, doing a dozen things at once, setting the pace. Complaints crowded the mail. Shipments lost or delayed or misdirected; shipments found short when unpacked and shipments found damaged; mistakes and errors, and oversights. Sometimes it seemed to Steve that Triangle did nothing right.

Jim Branty laughed. "Read the newspapers, Steve. Crime and sensation by the quart. You'd think there were no decent people left. But, as a rule, the quiet, respectable lives of decent people don't make the headlines. It's the same with Triangle. You handle only what's gone wrong. You don't see the thousands of satisfied customers."

But Steve was to see one of them that day. The last mail of the afternoon brought an order from a contractor at Kansas City, and Jim Branty called him to his desk.

"We were speaking of satisfied customers. Some years ago this man was a small contractor just starting out. I was a salesman then, selling out of the

Kansas City office, and I called on him regularly. Well, a job turned up. He wanted to bid on it and sent us the specifications and asked us to quote prices. It wasn't much of a job — rather small potatoes. But one end of it was highly technical and we knew from the questions he asked that he was a little over his head. I saw to it that he got his figures, and I made sure too that the engineering department gave him the advice he needed. We even offered to send a man down if he got stuck. He's never forgotten it. Nobody can take him from Triangle as long as Triangle gives him honest merchandise at an honest price."

Steve said: "We've grown to be a big company, haven't we, Mr. Branty?"

"We're stepping toward the top."

"We wouldn't go to all that trouble for a small contractor today, would we?"

"Wouldn't we?" Jim Branty snorted. "You bet we would! We do it every day. The small, almost no-account contractor of today may be one of the big men five years from now. A good salesman never forgets that, Steve." Then he was up from the chair and out of the office, away on one of the hundred and one things that took him about the plant.

Almost at once the telephone rang. Steve picked it up. A voice came over the wire.

"Jim?"

"Mr. Branty's not here. This is Merrill."

"Who?"

"Merrill. I'm a new man."

"Oh! Take a note for Jim, will you? This is Davidson, Cleveland office. There's a firm here, Gillen & Ness, bidding on a job where the competition is stiff. They want to use Triangle. If we can give them a 5% cut in price so that they can shave their bid we can do business. I'll give you a list of what the job calls for. Take it down."

Steve made a memorandum. Ten minutes later when Jim Branty came back he told him the story and handed him the notes.

"Can't be done," the sales manager said promptly.

Steve hesitated. "I don't understand this, Mr. Branty. You said if we can help the small man—"

"He's not asking for help. We'd give him the services of the whole engineering department if he needed it. But he's asking for a donation. We sell our line pretty close. There's no sense in our doing business at all if we can't do it at a profit. They want their profit, don't they? Why should we sell him our goods and at the same time dig into our pockets and hand them our money? Once you start shearing prices for one, you soon find you have to shear it for others. The news that you're a two-price company spreads around. That's bad. Buyers will begin to squeeze you on the theory that perhaps you have three and four prices. Besides, there's another angle to this. Six concerns may bid on that job and, for all we know, half of them would use Triangle if they got the contract. They like this company. Why should we give a rival firm an advantage? And how will they feel toward us if they lose the contract and learn they lost it because we gave an edge to somebody else?"

"I see," said Steve. "No hand-picked favorites."

Jim Branty nodded. "Now you're talking Triangle."

Steve reflected in a glow of pride that he had fallen in with a good, stout company. It put new zest into his work. He learned where to go to find exactly what he wanted—in the order files, the letter files, the company's catalogue, in the filed-away work tickets of the production department, and in the records of the shipping room. With familiarity came a sureness and a greater speed. There was time for him to help Jim Branty with other things.

Apparently there were a million other things to do. Speed! The shop smashed ahead in a roaring clamor, and the assembly tracks worked at relentless pressure. But here in the office was the feverish speed that was the father of all speeds. Jim Branty's sensitive fingers felt the pulse of twenty branch sales offices in twenty different cities. A hundred salesmen combed their territories and broke fresh trails. They kept in touch with Lake City by letter, by telephone, by telegraph.

Architects' specifications jammed the mails and the sales manager spurred a group of Triangle estimators working on figures. Questions poured in that had to be answered—men seized moments here and there to talk the answers into dictating machines. There was business to be had and the sales department fought for it. Business was the life blood. Without orders the shop was a gray, silent tomb, the assembly tracks stagnated, the inspection department died, and dust and cobwebs gathered in the shipping room.

Jim Branty motioned Steve to the desk. "All clear on complaints, Merrill? Jump in here and learn some of the ways we go after business."

Steve learned. Clipping bureaus sent in published lists of building permits from ninety scattered cities and towns. Magazines came to his desk that had to be checked — architects' journals, building trade papers, monthlies and weeklies that gave the news of every industry from light and power companies and rolling mills down to obscure ice plants and laundries. You clipped every lead, every hint of future construction; you sorted them by territories, and stuffed them into envelopes and rushed them by mail to the twenty Triangle branches. When a tip was hot, you telegraphed. A day lost was a day gone.

Absorbed and concentrated, he was unaware of the thin barrage of typewriters, the ringing of telephones, the voices of men crowding letters into the dictating machines, the constant going and coming of blue-clad messenger boys.

Every day was grandly, gloriously exhilarating! Zip—and the morning was gone; snap — and the afternoon faded and the quitting gongs rang through the plant. There was never quite enough time for all the angles of the job. You went home pleasantly tired, filled with the consciousness of having done your stuff and keen for the morrow. And in the morning there were letters and telegrams and telephone calls from the twenty branches. You were off on another lap with Jim Branty.

A strike at Wartucker! For Steve the glory of the meal was gone. Swift apprehension had tightened his nerves.

A drawing board was carried out of Julius Ives' office. Steve saw Hozie Crabbel in the cafeteria. The model maker looked better; a faint flush of color seemed to have stolen into his chalk-colored cheeks.

"Quite a change in Hozie, eh?" Joe Seeley said softly. "He comes to work at his ease now, rolling along in his car; no more hanging to a strap in a crowded trolley. Nice if we could all taste the fruits of prosperity, eh, Merrill?"

"About all I could manage on my prosperity would be a second-hand scooter," Steve laughed, refusing to notice any covered meaning in Joe Seeley's comments.

But the foreman's mild, subtle insinuation stirred up a worry he had thought he was done with. What was happening to the meter box? What had they done with it? How far had they gone?

Julius Ives sent for him. "Like your job, Merrill?"

"Yes, sir." A hidden sense warned Steve that the man had not called him in just to ask him this.

"The patent papers have gone to Washington. When the man who stole our meter box files his papers he'll give date of conception of the idea; unless he goes in for false affidavits, our dates will give us prior claim. The blue prints have been sent to the Wartucker people."

So Triangle had taken the first step to put the box into actual production! Steve swallowed hard. Julius Ives, sitting back in his chair, regarded the wall for a moment and then turned his gaze on Steve. His eyes were not unfriendly, but they were penetrating.

"Do you see much of your uncle, Merrill?"

"I've seen him once since I came to work here," Steve answered without hesitation.

"At the E. E. plant?"

"No, sir. He had me at the house for dinner."

There was an interval of silence; then Julius Ives spoke once more: "You needn't answer my questions, Merrill, if you feel you'd rather not. Family is family. But there's something I'd like to know. Did your uncle try to pump you about what was happening at Triangle?"

"There's no reason why I shouldn't answer, Mr. Ives. He asked me what work I was doing."

"Nothing else?"

"No, sir."

"I've been thinking, Merrill—" Julius Ives stopped, and then began again: "You know Ben Thorpe, of course?"

"Yes, sir."

"What do you think of him?"

Steve said slowly: "He always struck me as a careful, cautious man who feels his way and doesn't like to take a chance."

There was another interval of silence. Then: "Thank you," Julius Ives said, and the interview was over.

Steve, leaving, pondered upon what had been said and what had been implied. So Julius Ives thought that if somebody at E. E. were trying to poison Triangle it might not be Alvin Merrill but might be Thorpe. Somehow, it didn't make sense. Nothing made sense. It couldn't be Uncle Alvin—surely he was too unbending in his code. Yet how could it be Ben Thorpe? The man wouldn't take such chances! He was too cautious, too timid. It took boldness and audacity to put this crooked stuff over. Well, if it couldn't be Uncle Alvin, and if it couldn't be Thorpe, what then? Why, then it couldn't be anybody at E. E. It couldn't be E. E.

Steve took a weak comfort from that. It didn't better the threatened meter box, but at least it cleared E. E.'s skirts. Mr. Ives was right. Family was family.

There came a day in the turmoil when the rush slackened. Tomorrow it would pick up again, but today they had fallen into a dull backwater. Coming back from the cafeteria, Steve found Jim Branty with a hard thrust to his chin.

"Seen any of this correspondence with the Londrigan-Powderly Company, Merrill?"

Steve nodded.

"One of the Lake City plants. Changing over its electrical equipment. They asked us for samples and prices. Ten minutes ago I had their purchasing agent on the phone and he sounded as if he weren't very anxious to have me push in there. I'm afraid we've hit a hidden snag. I'm going over for a look at it. There's nothing stirring here today. Come along; you may learn something."

Jim Branty's car was in the parking lot. The sales manager drove and Steve held on. They ran along a boulevard, swung a corner, and made speed toward the lake.

"Usually," Jim Branty said grimly, "we go to the construction engineer or the purchasing agent. Today I'm playing a hunch. I don't like the way that baby talked. I'm going right to Londrigan himself."

The Londrigan plant, an old-fashioned structure of frame, low and wide, filled the wintry street with the shrill, high-pitched complaint of machinery cutting through brass. Upstairs a girl took Jim Branty's card and went toward a door. The door was open. A voice called:

"Want to see me, Branty? Come in."

Steve followed the sales manager into an office that had the look of antiquity. The massive desk was a relic, the walls were faded with age, and the bare floor was both old and worn. Even the short, slight man behind the desk was old and gray, with the look of dried parchment. But there was a keen sparkle in the aged eyes.

"One of my young men, Mr. Londrigan. Steve Merrill. A nephew of Al Merrill's."

The old man bowed. "I have the honor to know your uncle." He looked quietly at Jim Branty. "What brings you?"

"Premonition." The sales manager said it without fencing.

"It's an uncanny thing," the old man commented.

"You've been using Triangle equipment for a great many years, Mr. Londrigan. When you decided to make over, you asked for prices and samples. Naturally, I expected the order to follow. It hasn't come. I see only one conclusion—you've found Triangle wanting. In what way, Mr. Londrigan?"

"I'll have a man in to answer that," the little old executive said. He rapped on the desk and the girl reappeared in the doorway. "Send Mr. Borden."

Presently Mr. Borden arrived. His quick, slim body was smartly dressed: pale lemon-colored hair and a wisp of lemon-colored mustache blended into his fair skin. Steve was conscious of an instant dislike. The pale young man swept the room with a glance and stiffened.

"Isn't this rather unusual, Branty?"

Jim Branty gave a dry smile. "You gave me the impression that Triangle had fallen down. That's so unusual I thought I'd come right on to headquarters. We've never fallen down in this plant before."

Mr. Borden looked toward the desk.

"They came for an answer," old Londrigan said.

The pale young man went away briskly. When he returned, he carried a hammer in one hand and two switches in the other. One of them bore the monogram of Triangle; the other the rakish double E insignia of Electrical Equippers. Steve's heart gave a hard throb.

Without speaking Mr. Borden knelt down. He laid the E. E. switch on the floor and pounded the handle heavily with the hammer. Nothing happened. He put down the Triangle switch and struck it once. The handle shattered. This time Steve's heart didn't throb—it sank.

The pale young man stood up and brushed his hands. A voice came from the desk.

"There's the story, Branty. What's your thought of it?"

"Is that the only weakness you've found?" Jim Branty asked casually.

"How many do you want us to find?" Mr. Borden demanded.

"That's not answering the question."

"Probably if we tested every unit—"

"Meaning," Jim Branty drawled, "that that is the only weakness." His smile was bland. "What type of equip-

ment wreckers do you employ around here?"

"Why not say what you mean, Branty?"

"I will. We build each unit for the one job it's intended to do. That E. E. handle is a fiber composition; ours is porceloid. Certainly you can smash porceloid with a hammer. That's not the point. The question is do your men pull switches with an ax or do they use their hands?"

The pale young man turned. "Mr. Londrigan—"

"One moment," the old man said, unruffled, and looked down at the switches. "I'll send you a word, Branty."

They came away. Jim Branty grinned.

"I think I've spiked it, Merrill. Londrigan has a wise old head. Borden may honestly have soured on us because of that handle or he may be playing ball with E. E. for a piece of change."

"I didn't think that was done any more," Steve said.

"It isn't—much. But there'll always be a few chiselers and as a salesman you'll run into them. The average purchasing agent does a square job for his salary check. When you do meet the boys who want to be sweetened you'll find they'll never take cash. Too crude. They'll take you to their golf club, and they'll play you $10 a hole, and you'll amiably let them beat you five or ten holes."

"We don't go in for that, do we?"

"No, and I don't believe E. E. does either," Jim Branty said frankly. "I'm only guessing."

The mid-afternoon mail had brought a spurt. Steve, buried in work, didn't hear Jim Branty's phone ring. A hand on his shoulder brought his head up.

"That was Londrigan, Steve. It's our job! For all his years he makes up his mind and moves fast. Confirmation will come in the morning's mail."

Steve glowed. "I guess that finishes any weak-handle talk."

"I'm not so sure of that. I have a job for you. Do a piece of it whenever you can. Dig through the files, find fifty or sixty industrials using our porceloid switch. Write them. Ask them if they've had any trouble with broken handles."

"You think—"

"A cocky young purchasing agent can be bad medicine if he gets sore at you."

The mail held another complaint on a delayed shipment. Steve went out through the shop to check the work ticket in the production files. As he passed the men's lockers, his shoe kicked something across the floor. It rang faintly on the concrete and shone with a dull gleam. He reached down and picked up a key. The next instant he stood rooted.

Anton Frank's voice sounded out in the shop. Steve's frozen brain began to function. Of course, it might not be—an important key. Nevertheless, he forced his numbed legs to move and had reached the first of the rumbling presses when Anton Frank, straight and alert, came along a runway.

"I found this, Mr. Frank."

"What is it? A key? You know what to do with it, don't you? Enter it in the lost-and-found—"

The word died in the middle and he took the key slowly. One hand made an abrupt dive into his pocket and he brought forth a keyholder. Two keys lay side by side. Steve saw that they were identical.

The man's hand made a gesture of command. Steve followed him. They went up through the stairway to the quiet third floor and across to the model room. Anton Frank slipped the key into the lock. The door opened.

A sick, irritable man, startled, bore down upon them angrily.

"It's all right, Hozie," Anton Frank said rapidly, and closed the door. His hand waved another command. He was off toward the stairs and the office of the president of Triangle.

"You found a key to the model room?" Julius Ives cried. "Where is it? What—"

His voice died as Anton Frank's voice had died. A dozen times he turned the key as it lay on his palm. At last he spoke.

"This is a model room key," he said, "but it is not a regular key. All the regular keys have the stamp of the maker of the lock. This key was filed out. It's a bootleg key. You know what that means, Anton?"

Mr. Frank nodded.

"Merrill was right," Julius said slowly. "He did see somebody at the door taking a wax impression."

The president went across the room and stood in front of a wall map of the United States. It was dotted with colored push buttons—red buttons for Triangle's twenty branch offices, yellow pins for the jobbers who carried the Triangle line. He looked at it a moment and came back to the desk.

"I'll call the Wartucker people. We want every hour of speed they can give us. Those dies must be made at once—a special job. We want boxes here within a month. We want them rigged in six weeks. I wanted the box and our advertising to hit the market together. That doesn't count for so much now. The box comes first. Whoever has stolen that box is going to find our dust in his eyes."

The telephone rang.

Julius Ives picked up the receiver. "Yes?" He turned his head and spoke to Anton Frank. "Here's luck; the Wartucker people calling me." He waited. Then:

"Hello, Amos. I was on the point of calling you. Yes—on that meter box. What? You don't mean—"

The voice at the other end crackled rapidly. Julius Ives' face was a mask. Steve looked across at Anton Frank. The man was rigid and sharp.

"I'm sorry about that, Amos," Julius Ives said. "You'll keep me in touch with the situation, won't you? You know where we stand at a time like this. Of course. Thank you. I know you will. Good-by."

He put down the telephone. Two letters had been tossed to his desk; he straightened them methodically and laid them to one side. A freight locomotive began to puff on the siding beside the plant.

"That was Amos Wartucker," Julius Ives said without heat, almost conversationally. "He had bad news. The Wartucker plant has gone on strike."

Chapter Ten

TIME in Julius Ives' office hung suspended in a void of silence. Steve glanced at his watch. Four-fifteen. In another fifteen minutes the shop would be through for the day; the tremor of the giant presses that shook the floors and the map upon the wall would be done. It surprised him that he could figure the quitting time in minutes amid the wreckage of a hope. His mind kept saying unconsciously:

"We can't lose out now. We've gone too far. We'll find a way; we'll have to find a way."

The freight locomotive upon the factory siding had dozed into quiet. Now it panted again and there was a sluggish, sliding rattle of coupling cars. The engine moved off belching smoke and the sound of its exhaust faded into the distance.

"Do you think this could have been E. E.?" Anton Frank asked.

"You're crediting them with a little too much power, aren't you, Anton?"

"I don't know. So many plans have gone wrong—"

"There's a limit to what a schemer can accomplish. You can't ferment a strike overnight. It must feed and grow. No; this is a piece of hard luck, a circumstance in which nobody was thinking of Triangle."

"What will we do—send the blue prints somewhere else?"

"No." Julius Ives spoke with slow deliberation. "The company may be at fault; the men may be at fault; it may be a case of bad judgment on both sides. Sometimes a strike irons out quickly; sometimes it fosters a long time. Yet—"

"Suppose this takes a long time?" Steve scarcely breathed.

"Let's suppose something else, Anton. Let's suppose we had a strike here—and weren't in the wrong. Suppose our customers deserted us and took their business somewhere else. How would we feel? No — we stay with Wartucker."

Steve could feel his face change.

"Seems pretty hard, doesn't it, Merrill?" Julius Ives asked gently. "I'm sorry. But I think we must wait."

Steve waited. Next morning's newspaper carried a small notice of the strike—after that there was silence. It was, after all, a small strike as strikes go and not worthy of much notice by Lake City newspapers. But to Steve it juggled the destiny of a dream and was momentous.

The wait dragged on through slow, discouraged days. Once there was a hurried gathering in Julius Ives' office. He saw Anton Frank go in and a moment later saw Sam Brooks come along the hall and disappear through the door. When they came out, they brought him no word and he knew he had cherished another vain hope. If the strike had been over, they would have told him.

A week later he met Julius Ives in the shop.

"They're negotiating, Merrill. It may be over in another day and it may run on another two weeks. There's no telling."

A thought struck him. "Mr. Ives, suppose these other people have sent their blue prints to Wartucker?"

Julius Ives shook his head. "I clung to that hope for a while. But a company racing to the market with a stolen idea wouldn't leave their blue prints hanging. They'd pull out and go somewhere else."

Of course. Steve ran a harrassed hand through the cowlick. In two more weeks whoever had stolen the meter box would be almost ready for production. He gave up trying to build castles and faced a fact. Another two-week tie-up at the Wartucker plant and Triangle would be left with a very, very slim chance.

He found a note from his uncle pushed under his door at Mrs. Quinn's boarding house. It said:

"I hope you can find time to give me another night. Shall we say next Wednesday? We could have dinner and then go to a theater. As painters will be redecorating several of my rooms, won't you meet me at the plant? Then we'll dine at one of the downtown hotels."

Steve wondered if Ben Thorpe would be one of the party. He hoped not. He wanted this, for some reason he could not explain, to be strictly a Merrill dinner.

It was a Merrill dinner. As he walked toward the entrance to E. E., one of the big doors opened and Ben Thorpe, alert and well-groomed, stepped out into the street.

"Hello, Steve," he said cordially. "Where do you hide yourself? Apparently we can't get a look at you unless we invite you down. Having dinner tonight with your uncle? You'll enjoy it. Al Merrill is a fine host." He took a step away, hesitated, and came back. "Why not have dinner with me some night soon, Steve?"

"Glad to," said Steve.

"Good! I'll call you and make the arrangements."

Going up in the elevator, Steve realized that he didn't know where Ben Thorpe lived. He hoped it didn't happen to be out in the suburbs. If it were far out, getting back to Mrs. Quinn's on a winter night might not be exactly a pleasant bit of traveling.

The outer office was deserted; the good-looking secretary was gone. Alvin Merrill, reading a slim volume, put the book down at once.

"Steve, Triangle evidently agrees with you. You look even better than when you were here before. Shall we start? You must be hungry."

Steve grinned. "That's what you'd call a Merrill habit, isn't it, Uncle Alvin?"

"We have good appetites, yes," Alvin Merrill said precisely, "but we're not gluttons." He snapped out the lights.

This time they rode down in the elevator to the private garage in the basement. A watchman slid back the door, an engine purred silkily, and they rolled up an incline to the street. Steve, sunk deep in the luxury of soft upholstery, watched his uncle's hands on the wheel and wondered at their slim, fluid strength. The man drove, as he did everything else, with a fastidious accuracy.

They ate in the great, quiet dining room of an exclusive hotel. Steve sighed with contentment. What a meal! Alvin Merrill sipped his black coffee slowly.

"They tell me you're doing well at Triangle, Steve."

"Who told you that?" Steve asked curiously.

"Thorpe. You're under Branty now, aren't you?"

"Yes, sir." Curiosity developed into something else. "How did Mr. Thorpe know?"

"I suppose he heard it; gossip of the trade. Being a Merrill, particularly a Merrill with Triangle, you'd naturally attract some attention." He lit a cigar as slim, as patrician as he was himself; the blue smoke drifted fragrantly. "Too bad about that strike at the Wartucker plant. Strikes at this time are unfortunate for everybody. You know about it?"

Steve nodded. The glory of the meal was gone. Swift apprehension had tightened his nerves.

"Good people, the Wartuckers. Their word over the telephone is as good as a written contract. We had some work we were going to send them, but Thorpe advised against it. Thorpe's canny. I find myself leaning more and more upon his judgment; he seems to have the gift of feeling unseen straws blowing in the wind. Luckily, we didn't go to Wartucker. We're on a rush job and couldn't afford to have it held up."

Steve didn't believe E. E. was behind Triangle's run of woes. And yet—what rush job? He lashed himself in silent scorn. What was he doing, letting himself go adrift on that old tide of suspicion for everything and everybody? There could be any number of rush jobs, couldn't there? His apprehension died down.

"Triangle caught in there with any of its work?" Alvin Merrill asked.

Instantly Steve's nerves were taut again. He had a sick moment. So he had been brought here to be wrung dry of any information he might have. And only a short time ago Julius Ives had asked him if he saw his uncle often and he had been able to say, truthfully, that Alvin Merrill showed no curiosity about Triangle.

"I don't know where most of our outside work goes," he said coolly. Well, that in itself was straight; he knew only about Wartucker.

He didn't enjoy the show. He felt as if he were moving in a sort of stricken daze. Could the immaculate gentleman sitting beside him, the man

who had slid a question at him with deft skill, actually be Alvin Merrill, the Merrill of Merrill's, the high priest and custodian of the Merrill code?

He wasn't sure about E. E. now. The picture had changed as it had changed so many times before. Perhaps, after all, E. E. was black with an unholy guilt.

In the morning he hung his overcoat and hat on the rack behind Jim Branty's desk—it was weeks since he had used the locker in the shop. His morning paper carried a few lines:

Negotiations between representatives of striking workmen and officials of the Wartucker Aluminum Casting Company failed to reach an agreement today. It was announced that there would be another conference later in the week.

More days gone. That, at the moment, fell into obscurity. Steve was wondering what Julius Ives would say to his Uncle Alvin's attempts to draw him out the night before.

The morning mail was heavy, and the day became a mad race to get things done. He saw Joe Seeley in the cafeteria eating alone and wrapped in a cloak of brooding thought. Anna Kovic stopped him on his way out.

"You do good in office, Steve?"

"I hope so; they haven't fired me."

"No more late parties?"

Steve laughed. "No more."

"That is good. Sleepy head is not for business. You want party you go Saturday night."

The afternoon ran on. Two estimators wrangled over the obscure wording of a specification and Jim Branty called the Cleveland branch office twice. Coming back to his desk after a dash to the shipping room Steve found the sales manager waiting.

"Remember that Londrigan job, Merrill, where the purchasing agent cracked our switch handles with a hammer? I asked you to write to plants using the switch. How many letters did you send out?"

"Forty-one."

"How many replies came back?"

"Forty-one."

"Any breakage?"

"No, sir."

"What I expected has happened," Jim Branty said with a dangerous note in his voice. "Londrigan claims broken switch handles all over the plant. Get those replies out for me."

Steve took them from the file. There was one of the warming qualities about Jim Branty. He didn't ask you if you'd done a job; he assumed you could be trusted to do your work. He asked you how much you'd done.

The sales manager departed with a fighting thrust to his chin.

Steve cleared his desk. The quitting gongs rang and the shop was through. At a little after five o'clock, just as the army of typists flocked toward the women's rooms, Jim Branty returned. He stretched back in his chair, his hands behind his head, and grinned at the ceiling.

"Those letters," he announced, "were dynamite. Apparently the Londrigan plant is the only plant in the country having breakage. Londrigan, the old fox, asked me why I had gone out for those letters. I told him I thought they might come in handy and then he asked me why I thought I might have a need for them."

"What did you tell him?" Steve asked eagerly.

"Premonition. It's a grand word; it covers so much ground. Londrigan asked no more; for all his years, he's nobody's fool. I have a feeling his young Mr. Borden is sitting on a hot lid tonight."

Steve said: "That McCreery job started through the shop on a special ticket this afternoon."

The man snapped out of his ease and reached for a pad. "Glad you reminded me. Been patting myself on the back about this Londrigan business and forgetting everything else. That McCreery job is from New York; so was the Wanaman contract. That was the job on which somebody dropped in loose screws and caused panel burnouts. We take no chances this time; maybe a game is on to try to cheese our New York sales." He wrote rapidly, pulled a sheet from the pad and thrust it into an envelope. "Leave that on Fred Leeds' desk, will you, Merrill? I want Leeds to make a final personal inspection before those switches and lighting panels go out."

Steve left with the note. Presses loomed gigantic in the gloom of the deserted shop; the stock bins on the third floor were filled with uncanny shapes. Fred Leeds' desk was littered with inspection sheets. Steve took the time to work them to one side so that Jim Branty's note would be clear in the center of the desk where it could not be overlooked.

He came toward the stock. For one instant, through an aisle, he saw one glass wall of the model room. There was a sudden gleam of light that came on instantly and was as instantly gone.

Steve stopped short, heart racing. Again? All at once he knew what that gleam had been. A flashlight turned on and off guardedly. Softly he raced for the model room.

Nobody was there. As he stood trying to see into the dimness, his ears caught a faint thud. Somebody had closed the fire-stop door at the head of the stairs on the third floor. He sped for the staircase.

Nobody was there, either. His mind made frantic clutches at possible solutions. If it had been Hozie Crabbel, the model maker would leave by the yard gate; if it had been Anton Frank, the manager could get to his office by a private door; if Joe Seeley, the foreman could leave by either the yard gate or the front entrance. But whoever it was would get out of the building at once. A man out of the building could not be a man suspected.

Again he ran. Only Jim Branty was left in the office. He ripped his overcoat and hat off the rack.

Mr. Branty jumped. "Hey, Merrill. What—"

"I'm on something," Steve panted, and was gone. On the sidewalk his eyes searched the street. A half block ahead, in the wintry twilight, a form slouched toward the car line.

Joe Seeley! And he was the only familiar figure in sight. Steve followed.

A group waited at the trolley stop. Steve lingered in the shadow of the factory street until the trolley came along. Hugging the edges of the crowd, he climbed aboard. Joe Seeley slouched inside, found a seat, and sat in a brown study, his head twisted a little to the side. Steve stayed out on the rear platform.

The trolley jerked and stopped, turned corners, and whined along its way. They came into a residential district and Joe Seeley stood up. Steve, poised, was ready to swing off if the foreman came toward the rear end. But the man went up front. He was the only passenger to get off.

Steve dared not risk it. He rode to the next stop, dropped off the step, and sprinted back. He must not lose the man! He looked down a street. Far toward the next corner a slouching form passed out of darkness into the circle of radiance thrown by a street lamp. Steve took up the trail, cautiously working closer. One block; two blocks. His heart was a hammering anvil. Up ahead Joe Seeley turned in toward a house and went up a few steps. Presently a door opened, light streamed out into the street, the door closed, and the light was gone.

(To be concluded in the March number of THE AMERICAN BOY.)

Hunter and Hunted

(*Continued from page 17*)

tree directly beyond Nichols. The rifle spoke again, and Nichols dropped upon the ice behind the loaded sled.

No use trying to go back now—Steve dashed wildly forward, covering the ice at incredible speed, obsessed as he neared the sled by his pent-up desire for a weapon. But as he reached for the rifle that lay atop the duffle, it was snatched from behind the sled by a quick hand and Nichols rose to yank Steve across the duffle and fling him to the ice at his side.

"You chump!" he cried. "Take cover!"

For a while they lay, side by side, watching the rocks where the enemy lay. Nothing moved, and they heard no sound. Nichols dropped his rifle and beat circulation back into his trigger finger.

"Lucky for me you were up here ahead," he said. "A broken strap in the harness delayed me. Well, I've got to cross the river now and investigate." He looked inquiringly into Steve's eyes. "Coming?"

"Sure," said Steve, quietly.

"Good man!" said Nichols. "You take the sled. I'll take the rifle. He can't get both of us at once."

Steve edged to the back of the sled. When the two men arose, yelling, the dogs hurled themselves at the traces as though demons tailed them, and they were soon skimming across the ice in a riotous dash. As they neared the middle of the river they saw on the farther bank a bright spot of scarlet. It was Renfrew. He had removed the fur parka they had all donned for the journey, and his red tunic glittered as brightly as a winged cardinal against the snow.

Despite their yells of warning he walked out onto the ice to meet them. He paused as they approached and they would have passed him if Nichols hadn't jumped the runners beside Steve and brought the dogs to a halt. Then Nichols turned impatiently to Renfrew.

"Get in off the ice!" he cried. "The lunatic's firing."

Renfrew stepped toward them, his rifle in the crook of his arm, his carriage as calm as if he were duck hunting.

"Do you mind if I borrow your ax?" he asked.

"Are you deaf?" cried the irritated Nichols. "We're on the spot! He fired at me!"

"I saw you," said Renfrew. He smiled mischievously. "I observed your courage and resourcefulness with the greatest admiration, but you ought to be more careful about your evidence. I want to go over and cut that bullet out of the tree."

"But don't you realize," cried the astonished Nichols, "that we're right in his range? We're under fire from a homicidal maniac!"

Renfrew had been gazing reflectively at the bank he had just left, but now he turned. "That's right," he said gravely. "I forgot." He glanced at Nichols with a quizzical twinkle in his eye. "Isn't this our friend, Lahti Haavenden?" he asked, jerking his head backward.

Nichols and Steve looked toward the bank and saw the lanky trapper standing there, waving a rifle at them.

"Let's move in," said Renfrew.

Lahti joined them before they reached the bank. He was highly excited.

"I get my gun!" he cried. "Clawhammer is out to kill! He is up the river! Have you seen him? Who fired those shots I hear? You?"

Renfrew had walked out on the ice and was peering up the river.

"If you take off your parka, Nichols," he said, "I think the sight of the uniform may have some effect on him."

"No, no!" cried Lahti. "He will kill the poliss. He has said so!"

"He hasn't done it yet," said Renfrew, still peering up the river.

Throwing off his parka, Nichols dashed out onto the ice, gaining Renfrew's side with his rifle ready. Steve and Lahti followed. Scarcely a hundred yards away, Clawhammer, his face illumined again by the radiance of the sun, now sinking, walked toward them, seeming to stare with his gleaming, ferocious eyes, directly into Renfrew's face. He held his rifle in both hands across his chest, his finger fondling the trigger guard.

"Shoot him!" cried Lahti. "He will kill you!" And he whipped up his gun.

Renfrew pounced upon him and hurled him to the ice by the slack of his collar. The rifle exploded into space and clanked on the ice as Renfrew's foot pinned down Lahti's wrist. At the first sign of trouble Nichols had brought his rifle up to a bead on Clawhammer's chest, but the Indian stood as if carved from stone, silently watching. Steve snatched up Lahti's rifle. Renfrew helped the trapper to his feet.

"Watch him," he said to Steve, and turned to the Indian.

"What's the matter, Clawhammer?" he asked. "Why do you want the police?"

Clawhammer stared at Lahti. "He said he would kill me," he explained simply. "Since last night I have been a hunted man."

"Well, I'll be—"

Steve didn't finish his snort of amazement. With the realization that the mania he had seen in the Indian's eyes had not been the insane rage of the hunter but the crazed fear of the hunted, he was wondering what his own eyes had looked like in those hideous moments of headlong flight. Almost incredulously his mind struggled to grasp what had actually taken place. Clawhammer had felt himself hunted—and so, coming on what he had believed his pursuer's tracks in the snow at the top of the cliff, he had made that wild dash downward. Then, down below, he had caught sight of a man, to him his pursuer, coming up river, and had turned and leaped for the shelter of the rocks. Both times he had fled in terror.

Renfrew's voice broke in on Steve's racing thoughts. "He wouldn't have killed you," Renfrew was saying quietly to Clawhammer. "He was leaving that to the police."

"What are you talking about?" cried Nichols.

Renfrew gazed at him thoughtfully. "If Clawhammer had shown himself while you were crouched behind that sled," he said, "you'd have shot him, wouldn't you?"

Slowly, with dawning comprehension, Nichols nodded.

"That was what Lahti wanted," said Renfrew. "That's why he trailed Clawhammer until you came in sight, and fired at you from near Clawhammer's position. That's why he missed, too, as no woodsman would ever have missed from a stationary position at less than a hundred yards."

"I did not do that!" cried Lahti. "I did not fire those shots!"

"That will be easily demonstrated," said Renfrew. "For we will be able to show that the bullet we take from that tree could have been fired from no other rifle than the one Steve is carrying now."

Back at the barracks, with Lahti in one of the cells and Clawhammer no longer crazed with fear, Nichols was quite willing to concede that Renfrew's prophecy would come true, but couldn't see how Renfrew came to know what had happened.

"I've got the situation through my head," he said. "Clawhammer had gathered enough evidence against Haavenden to send him to the pen for poisoning bait and stealing from traps; so Haavenden decided to have Clawhammer killed by the police. It was a swell plot and very subtle, and I understand it perfectly, now. You needn't explain it any further. All I want to know is how you found it out."

"It was simply because Lahti used the valley trail," explained Renfrew. "He had come into the settlement without his dogs, you remember; and he'd offered a thin excuse in order to avoid going out with us or being questioned further. So when I hit the valley trail and saw his snowshoe tracks — they were easy to identify because I'd noticed this morning that one shoe was broken across the toe — why, I followed them. And when they led to a place where a dog team and sled had obviously been cached for a good many hours, I realized that he wanted to be able to travel faster than we suspected he could.

"Now, why? If his story were true, he obviously wouldn't want to go back to his cabin—he'd be afraid to. I thought he might be in cahoots with Clawhammer, and going off to warn him—I thought of a lot of things—but I also went over the ground. I found a torn bit of cardboard such as you tear off a cartridge box when opening it, and that sounded like gun play. But for whom? I remembered his feud with Clawhammer — and then it occurred to me that he had got us all out gunning for the Indian. So I hurried back to join you.

"I reasoned that if Lahti were really planning to have us shoot down poor Clawhammer, he'd have told Clawhammer something that would bring him dashing into the settlement, looking for the police. So I took off my parka. Then I saw you fired upon and realized that Clawhammer would never have missed twice at that distance. It was obviously the subtle touch of Lahti Haavenden. At least that's how I thought it out, and as it happens, I was right. Now it looks as if Lahti will have to go to jail for attempting to murder the only man he particularly wanted to live."

"Who's that?" asked Nichols.

"You. He particularly didn't want to hit you, because you were to do his murder for him. And that murder was so perfectly planned that I don't see any grounds on which we can prosecute him for attempting it. The only thing we can send him to jail for is firing on a policeman, which assumes an intent to kill — and poor Lahti didn't even intend to hit that tree."

Tow-Target Terror

(Continued from page 12)

quarter-inch cable! Another pair—or three strands—he squirmed in the cockpit—the blame today rested squarely upon himself. And how Buzzy Ennis would broadcast that fact!

Tense with apprehension he eased in the clutch and the cable slowed to a halt. He waited almost hypnotized for the metal to pull away, leaving him with a snarled cable end at the ship and another sleeve target in the Caribbean. When it held, he shouted. He stood up, faced about, and touched Ennis' head. The gun cut off.

"Ennis! Hold her easy, man! Don't jerk her. The cable — it's cracking again!"

Ennis half-smiled, wisely. He had known it would!

"Head away from the course!" shouted Tommy. "I'm going to try to rewind it past the break. Then I'm going out there — on the landing gear — fix it if I can. Keep the 19 level — wind on the tail—"

He didn't wait for an answer, but he felt a warm glow of appreciation when Ennis eased the gun forward with catlike care. Ennis could fly, at least!

He sat down and slowly threw in the rewinding device, holding his breath. The line crept back, inch by inch. The second split strand reappeared. Then the first. Nearly a thousand feet out, the sleeve target tugged heavily. But the cable held.

Then, suddenly, the line halted again. Tommy looked down at the clutch. It was still open—the line should be moving! He opened it farther. Still there was no movement in rewinding. He eased it fully open—nothing! Something was jammed!

He dropped his chute in the cockpit, picked up some pliers and wire, and began clambering out toward the lower wing. Ennis looked up with astonishment as he passed. Ennis had been sure that Thorington would never have nerve enough to do a wing-walking act. Yet here, beside him, went Thorington! Ennis raised his goggles.

At the same moment, Tommy drew a deep breath and hand-hung from the wing to the landing gear. He didn't look below. He was too intent on his job; it meant too much to him. He glanced swiftly up at the reel of cable, and in that one glance came the answer to everything.

The right-hand reel bracket had snapped diagonally up and down. It had snapped in a line as fine and precise as a knife cut. It had probably been snapped, part of the way at least, for days. It was the sort of failure that every pilot can tell you about—the sort that shows up easily in service conditions, elusive and defiant to every ground check.

Half-cracked in that fine line, the break had escaped both Tommy's eyes and McCarthy's. It made no appearance whatever until the tremendous pull-and-weight of line and target strained the split metal into a razor-sharp edge. And then, as the cable reeled out, back and forth—as it passed the right-hand end—it scraped out over that knife-edge.

Tommy shrugged. A strand every turn or two—two strands every turn or two—there was no way of knowing.

But now the bracket had snapped completely. That was why the rewinding lever had jammed. One end of the reel hung low. The one remaining solid bracket was straining at its bolts. Tommy would have to work fast if there were to be firing today.

With pliers and wire he went to work. He bound the loose reel-end. He signaled up to Ennis to cut the gun, and when the ship stumbled the line slacked. As the line slacked, Tommy snubbed the reel back in place. When the gun went on again, another strand of the cable broke. But still it held!

Tommy climbed up beside Ennis and shouted.

"The reel bracket snapped. I've fixed it, but I've got to rewind the cable beyond the break. It'll never hold if I don't. Five strands are gone now." He paused and took a better grip on the cowling. His eyes stared at Ennis with a challenge. "Want to land? We'll have only 800 feet of line out. It ought to be safe—at this range—but—!"

Buzzy Ennis finished the sentence in his own mind. He gazed at Tommy in astonishment. His fingers drummed the stick. He glanced below, nervously, at the gleaming, tapered bores of four anti-aircraft guns. One-hundred-and-twenty rounds of shrapnel each minute! 800 feet on their tail! Five courses! Ennis shivered. He had accused Thorington of having tow-target terror, and here he was offering to fly at 800 feet! But there was a good reason for Buzzy Ennis' being the leader of the bachelor clique. He patted Tommy's arm. He knew the risk.

"Let's go—Tommy!"

Tommy dived into the cockpit. The cable came back past the break a full hundred feet. The radio sputtered down to the battery. The Thomas-Morse banked its golden wings in a graceful turn and headed along the course.

The guns flamed in the sky, and the 0-19 rocked from their concussion. The shots didn't have to come close—not at 800 feet! They were screeching, deafening. They rang in the pilot's ears. They made the air crazy. Their white puffs were so close that Tommy, who faced them, felt that he could almost reach out and pass his hand through them. He felt numb, dazed.

He finished the first course, spun a new sleeve down the line, and watched the old sleeve drift toward the battery, where it would be picked up and marked for hits. The shots cut loose again. Two courses. Three. Four. Five. Faultlessly, over every course of the practice!

When they landed, Ennis was so dizzy he was staggering.

Major Rogers was there. He was there because a commendation had come over the phone for the best towing and the best practice the Second Artillery had ever had.

Rogers beamed.

"So — it *was* McCarthy! The old scoundrel! Well, I've got him! He ran out—poor old chap—he thought he was ruining a thirty-year record with the first failure of his life, and he shoved off. Good reason, too. But he came back. Old soldiers always come back! The court-martial's going to be tough, Thorington!"

Tommy shook his head, smiling. All at once the world seemed good.

"It wasn't McCarthy, sir. I can prove that to you."

But at that moment Ennis stepped forward.

"I can prove it, too, Major. We're giving a retirement party for Sergeant McCarthy—all the bachelor officers in the squadron—we'd like you there." He paused and turned back toward Thorington, a deep sparkle in his eyes. "We'd like you there, too, Tommy," he finished, slowly. "I think—I think the gang'd like to know *YOU!*"

With a well-arranged tool cabinet you can tell instantly what tools are missing.

Here's Your Fifty-Dollar Workshop

This is how you can acquire it---a tool at a time!

by FRANKLIN M. RECK

SUPPOSE you, starting from scratch, wanted to equip your own workshop. Where would you begin? What tools would you buy first? What sizes and kinds? How big a shop would you hope, eventually, to set up in your basement?

These thoughts occurred to the magazine's editors one day just after they'd seen an attractive homemade table in a friend's home. Frankly, we were envious of the young man's skill with tools. The boy who can plan and turn out a workmanlike, good-looking bookcase, stool, ship's model or handy chest has our undying admiration.

So we set out to learn what we could about equipping a workshop. We went to a manual training teacher who has worked for years with boys.

"We want to set up a fifty-dollar workshop," we told him. "What should we buy?"

"Where did you find fifty dollars?" he asked waggishly.

"We didn't," we had to admit, "but some day we're going to have a fifty-dollar workshop if it takes five years and we have to buy a chisel at a time."

"You're going to keep sawing away at it, uh?"

"Let the chips fall where they may. Sooner or later we're going to brandish a footstool under our best pal's nose and say: 'There, beat that!' "

The manual training teacher scratched his head. "Well, whatever you do, don't start out buying bum tools. I've tried these cut-rate, cheap articles, and they don't last. Buy your tools to last a lifetime."

"Noted," we agreed. "We expect to use our workshop for a lifetime, if we live that long. But suppose we had only ten dollars to start with? What should we buy first?"

"Saw and hammers," he said instantly. "A good seven point ripsaw with a 24-inch blade and a ten-point crosscut also with a 24-inch blade will handle all your work."

"What do you mean, seven-point?"

"Cutting points to the inch. And get two hammers, a 13-ounce claw and a five-ounce claw. It's surprising what you can build with a saw, hammer, and a few nails."

"I'll tell the world it is. Next?"

"Jack plane and block plane, so you can smooth up your work."

"And then?"

"Well, by this time you'll be tired of using your mother's yardstick; you'll want a push-pull flexible rule. Also a try-square to mark off square corners, and a 'T' bevel to get angles other than right angles. Also, you'll be finding out by now that a job put together with screws is more sturdy than a nailed job, so you'll want screw drivers."

"How much of my money have we spent by now?"

"About sixteen dollars—and you have a very respectable workshop."

"Good. Suppose we've earned six dollars more, tending furnaces. What should we buy?"

"Chisels. Get the kind called bevel-edge firmer, with a stout hickory handle and a leather cap on the handle. Before you're through you'll want about six sizes and they'll cost you close to six dollars. You'll also want a mallet to swat the chisels with. A wooden mallet is oke—rubber is better."

"Okay. Now suppose our birthday has rolled around and we've asked all our fond relatives for cash. We've counted up and discovered that we can spend fifteen bucks."

"I'd like to meet your relatives! Get a brace and a set of bits. By all means get a ratchet brace. Bits run by sixteenths of an inch from ¼ inch to one inch. A Number Four bit is a 4/16 bit, and so on. Get a No. 4, No. 6, and No. 8. For your fifteen dollars you can also get a speed hand drill for small screw holes, a countersink, a nail set, and a woodworking vise."

"We should have had the woodworking vise long before this!"

"Not necessarily. You can always use your knees and hands for a vise."

The manual training teacher then proceeded to list the next items in order—metal vise, a set of files, cabinet scraper, pliers, hack saw, all for working in metal. He added a scroll saw for intricate woodwork, and the total cost for everything figured up to about forty dollars.

"By this time," he went on, spending our money with great freedom, "you'll want to grind your own tools. You can pick up a second-hand washing machine motor for from three to four dollars. Get a good grinding head for $4.75 and rig it up to the motor with a pulley. When that's done, you'll have a home workshop that will be the envy of the neighborhood, and it will have cost you about fifty dollars."

Then, at our request, he listed the most useful pieces of power equipment, and these, together with every item so far mentioned, are charted for you with this article.

He recommended, wisely, that you build yourself a good tool chest with a

Looking for Things to Make?

HERE are some books loaded with plans that will keep you profitably busy in your workshop:

Popular Mechanics' Workshop Books: "Ship Models," "Outdoor Sports," "Boat Book," "Boy Mechanic," "Make-It-Yourself." Popular Mechanics Press, Dept. AB, 200 E. Ontario St., Chicago, Ill.

"Carpentry and Mechanics for Boys," by A. Neely Hall. Lothrop, Lee & Shepard Co., 126 Newbury St., Boston, Mass.

"American Boy's Handy Book," by Daniel C. Beard. Charles Scribner's Sons, 597 Fifth Avenue, New York City.

"Homemade Games," by Arthur Lawson. J. B. Lippincott Company, East Washington Square, Philadelphia, Penna.

"The Boy Builder," by Edwin T. Hamilton. Harcourt Brace & Company, 383 Madison Avenue, New York City.

"Build a Winning Model Yacht," by Thomas Moore. Frederick A. Stokes Company, 443 Fourth Avenue, New York City.

"Making Things for Fun," by A. Frederick Collins. D. Appleton-Century Company, 35 West 32nd Street, New York City.

"Ship Model Making," by Capt. E. Armitage McCann. Norman W. Henley Publishing Company, 2 West 45th Street, New York City.

"Beginning to Fly," by Merrill Hamburg. Houghton-Mifflin Company, 2 Park Street, Boston, Mass.

slot or nail for every tool. He can look into his own tool chest, he states, and tell instantly which tool is missing. He suggested that you build a good strong workbench of your own design. The accompanying picture contains valuable hints both for chest and workbench.

We suggest that you post the chart in your workshop. Check off the items you already own. When Christmas and birthday roll around, or when you've saved a few dollars from your allowance, consult the chart for the next tool to buy. If your chum is assembling a workshop, the chart will suggest birthday and Christmas presents to give him.

Perhaps you can improve on the prices shown in the chart. You may be able to pick up second-hand tools in excellent condition. If you can equip your $50 workshop for $40, so much the better!

Your Home Workshop Chart

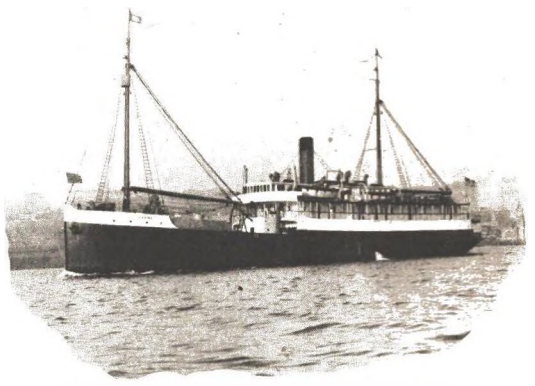
Buy hand tools in the order listed.

	First Choice	Each	Less Expensive	Each
RIPSAW, 24" blade, 7 point	D8 Disston	$3.00	B128 Ohlen-Bishop	$2.00
CROSSCUT SAW, blade, 10 point	D8 Disston	3.00	B128 Ohlen-Bishop	2.00
HAMMER, 13 oz., claw	2 Maydole	1.10		
HAMMER, 5 oz., claw	14 Maydole	1.00		
JACK PLANE, 14"	5 Stanley	3.25	5¼ Stanley (11")	2.95
BLOCK PLANE, 6"	9½ Stanley	1.50	220 Stanley (7")	1.15
STEEL RULE, "Push-pull," flex., 6 ft.	1266 Stanley	1.00		
TRY SQUARE, 8"	20-8" Stanley	.75		
"T" BEVEL, 6"	25-6" Stanley	.50		
SCREW DRIVER, 6"	20-6" Stanley	.45		
SCREW DRIVER, 8"	20-8" Stanley	.55		
MARKING GAUGE	61 Stanley	.25		
CHISELS, bevel edge firmer (Hickory handle, leather cap on handle.)	39 Buck ⅛"	.80	2725 Union Hdwe ¼"	.55
	39 Buck ¼"	.85	2725 Union Hdwe ⅜"	.55
	39 Buck ⅜"	.90	2725 Union Hdwe ½"	.55
	39 Buck ½"	.95	2725 Union Hdwe ¾"	.60
	39 Buck ¾"	1.05	2725 Union Hdwe 1"	.65
	39 Buck 1"	1.20		
MALLET, wooden or rubber (Rubber preferred, but more expensive.)	1 rubber	.75	13 wood	.25
BRACE (ratchet) 10" sweep	582 Millers-Falls	2.25	1710 Mohawk	1.75
BITS. (They run by 16ths (from ¼" to 1". No. 4 means 4/16.) Get No. 4, No. 6, No. 8.	4/16" Russell-Jennings	.50	4/16" Irwin	.30
	6/16" Russell-Jennings	.50	6/16" Irwin	.35
	8/16" Russell-Jennings	.50	8/16" Irwin	.40
SPEED HAND DRILL for small screw holes. Has set of 8 drills with it.	790 Goodell-Pratt	3.25	665 Goodell-Pratt (Has no drills in handle)	1.25
COUNTERSINK (To be used in the brace)	Brace countersink	.25		
NAIL SET	765 Browne-Sharpe	.25	Mohawk	.10
WOOD-WORKING VISE	50C Columbia	5.50	0 Christiansen	4.95
METAL VISE	143 Columbia	3.45	709 Stanley	.85
FILES	1-10" Nicholson Mill	.28		
	1-10" Nicholson Bastard	.35		
	1-10" round file, 2nd cut	.32		
	1-6" three-cornered, slim taper	.18		
CABINET SCRAPER	25 Hook scraper	.50		
SPOKE SHAVE (for finishing)	51 Stanley	.40		
PLIERS, side-cutting electrician's 8"	2801 Kraeuter	2.00	1831 Kraeuter	1.35
HACK SAW	10 Millers-Falls	2.00	99 Millers-Falls	.59
SCROLL SAW	46-12" Trojan	1.25	45-10" Trojan	1.00
If you grind your own tools	Washing machine motor (second hand)	$3 to $4		
GRINDING HEAD Rig it up to motor with a pulley.	G10 Driver with 6" wheels	4.75	94A with 4" wheels	1.65

Power Equipment

BAND SAW, 12" or 14"	12" Boice band saw	$19.50	
	14" Delta band saw	43.85	
BENCH SAW, 2½"	735 Driver bench saw	21.95	
	860 Delta bench saw	32.85	
JOINTER, 4"	P525 Driver jointer	12.95	
	301 Delta jointer	24.50	
WOOD LATHE, large enough to turn 12" pieces	500 Driver lathe	12.95	
	Crane Handi lathe	17.50	
	955 Delta lathe	19.85	
DRILL PRESS (With attachments for routing, carving, and shaper work.)	Delta	80.00	
G. E. "WORKSHOP" (Combined circular saw, scroll saw, lathe, sander, drill, mortising and dowelling machine.)	General Electric	99.50	

In the second and third columns, the letters and numbers in front of the brand name of the tool indicate the catalogue number.



Here's your private ship for the vagabond cruise.

The Nomad's Life!

You'll live it aboard the S. S. Lakina!

THERE'S something about a ship that stirs the blood. The sight of a graceful prow cutting the water conjures up visions of Captain Cook exploring the uncharted South Seas, of Columbus sailing bravely for the storm-tossed rim of the world, of all men who have ventured from the known into the unknown.

Even today, when a passenger walks up the gangplank—that narrow bridge connecting the solid, real earth with the subtly swaying deck of a vessel—he feels the thrill of excitement that has gripped every adventurer since time began.

Prepare for that thrill yourself. Prepare for it by enrolling, today, in *The American Boy* Cruise to Alaska. Then you, along with a hundred other American Boy readers, will be walking up the gangplank of the S. S. *Lakina* at Seattle on the morning of July 6, entering that kingdom known as a ship—a nomad kingdom that uncovers a new horizon every hour of the day.

The American Boy Alaska Cruise will be captained by editors and staff writers of the magazine. Through cooperation with the Burlington, Northern Pacific, and Canadian Pacific Railroads and the Alaska Steamship Company you may take an all-expense tour from Chicago to Alaska and back—or from points en route—that will cost less than any similar trip you can plan for yourself. And the trip will be amazingly, excitingly different!

Write today to the Alaska Editor, *The American Boy*, 7430 Second Blvd., Detroit, Mich., and ask for the Alaska folder containing all details of the trip. Inclose a three-cent stamp to cover mailing costs. Boys between the ages of 12 and 20 are eligible.

What will your days be like on the *Lakina*, after you have steamed out of Elliott Bay, and Seattle, with the snow-clad ramparts of the Cascades behind it, has fallen below the horizon? As you forge your way up the mountain-bordered Inside Passage to Gold Rush land?

They'll be busy, fun-packed days. Those of you with journalistic ability will be on the staff of the ship's newspaper.

Those of you who play musical instruments will be forming orchestras. The singers will organize quartets. Others will be planning stunts and acts to be presented in hilarious programs in the dining saloon, at night.

There'll be short lectures that you may attend if you wish; lectures on Indian lore, Alaska, the glaciers and mountains, ships and navigation, so that you may take the trip with wide-open eyes.

There'll be tours into the engine room and up to the bridge. Deck games. Pleasant hours sprawled on the cabin and boat decks under a yellow moon, with the Pacific gurgling by below you. And always the great cliffs, the Indian villages, fishing towns, totems, bays and glaciers of the Inside Passage.

Some of you will be in first-class cabins on the bridge deck; others in dormitories below. All of you will have the run of the ship and equal treatment at meals. For this voyage the *Lakina* will be *The American Boy* ship.

During the trip you will make friends with boys from every part of the continent, perhaps even from Hawaii! So far boys have registered from 17 states. Illinois leads with 5 and New York and California are tied with 4 each. In the South, Florida, Arkansas, Louisiana, Oklahoma and Virginia are represented. In the middle West, Kansas, Minnesota, Wisconsin, Michigan, Ohio. In the East, Pennsylvania. In the far West, Colorado, Wyoming, Oregon.

Applications are just beginning to arrive in quantity, but judging by the information on the enrollment blanks there's already material for strange and weird orchestras. The harmonica section will be ably filled by J. Harold Richards, Santa Ana, Calif., Warren Bohl, Flushing, N. Y., and Thomas O. Matzen, Santa Ana. George A. Boeckling, Dayton, Ohio, on the trombone, Bruce Bradway, Chicago, on the guitar; Leonard E. Cordes, Henning, Minn., and Seymour Jacobson, New York City, on the ukulele; Arthur Pichard, Tallahassee, Fla., on the flute; Clark Sykes, Tulsa, Okla., and Bob Moody, Shreveport, La., on the clarinet; Ashton Vaughn, Denver, Colo., on the accordion; Faris Moyer, Galesburg, Ill., on the violin; Harold Roach, Powell, Wyo., and George E. Smith, Susanville, Calif., on the trumpet; Tom Smart, Fort Smith, Ark., on the bassoon; Melvin Ward, Manhattan, Kan., on the saxophone, William Taylor, Wisconsin Rapids, Wis., and Earl Miley, Westwood, Calif., on the piano, will give variety and volume to the ship's orchestra!

Enrollments are coming in fast, but we fully intend to take care of every applicant, even though the ship's capacity of 182 is oversubscribed and we have to conduct a second tour. It will be wise to send for your folder early, however, in order to assure yourself the accommodations you prefer. Write the Alaska Editor today.

Smoky, a Good Coyote

(Continued from page 9)

jacket or her sleeve, but ending always by whining and licking her face.

When Smoky was two years old, and again when three, and Zora wanted to have a family of pups, we tried to mate him with her. But it was no go, for the very good reason that coyotes, and wolves too, mate only in February and the early part of March, and both these attempts were in the summer. Absolutely, Smoky would have naught to do with her in that way.

One autumn day in 1931, when my son, Smoky, and I were turkey hunting, we raised three coyotes, and Smoky took after them as they ran. We sat down and waited for him. Ten minutes passed; twenty minutes; a half hour, and so terribly were we worried that we actually felt sick, for we dearly loved that coyote, and now he had forsaken us, joined his own kind.

We had no more desire to hunt; turned back homeward, plodding along sadly; and had gone about a mile when here he came, swiftly upon our trail, and leaped upon us, licked our faces, whining and whining; ran madly around us again and again; led off, paused and looked back, as if to say: "Well, come on, let's hunt. Oh, how relieved we were; how happy!

Said my son: "That does settle it. Smoky is actually tame. He loves us, not his wild and wandering kind."

Twice after that, when hunting, Smoky took after coyotes that we raised, but always he came streaking back, glad to be with us again.

Came the summer of 1932, and business matters required our presence in places far from the White Mountains of Arizona. We left Smoky in the care of a good friend in Greer. Not long afterward received a terse wire from him: "Smoky poisoned last night. Is dead."

Alas! Alas!

The Hand at the Window

(Continued from page 19)

In the trim little Diesel-engined yacht, banker and guard, in easy chairs on the after deck, studied each other as they talked.

"It must be nice to have no more than enough money to take care of your immediate wants," said Ronaldson regretfully.

"I have a pension from the police department and it's plenty."

"You're lucky. You can go anywhere you want, wear any kind of clothes, and leave your doors and windows open at night when you're sleeping. I can't. I have too much money. It was wished on me by my father and grandfather. I can't take a step without being guarded, escorted, watched." He remained silent for several minutes, and then: "That hand at my window is getting me. I feel that back of it is a threat of kidnaping. What do you think of it?"

"It's a clever trick, Mr. Ronaldson, and if I can solve it we'll know pretty soon what's on the carpet. Just don't let it break your nerve."

Williamson was awaiting them at the Battery and at ten o'clock Mr. Ronaldson was at his desk. Tierney left him there and went outside to saunter the narrow streets of the financial district. The countless thousands of workers had reached their desks in the towering honeycombs of steel and stone. The Ronaldson car was parked at the curb across the street from the banker's private office, evidently by special police permit.

A hundred feet to the south on Broad Street Tierney saw the well-knit figure of Williamson, leisurely strolling. The blue uniform made it easy for Tierney to follow him from a distance. The chauffeur turned a side street, pausing to look in the windows of restaurants and small shops, making his way in the direction of East River.

Tierney continued to follow Williamson past the district of tall buildings to the New York of a hundred years ago—quaint brick houses with fanlights over the doors and dormer windows peeping out of the roofs. These buildings now were junk shops, storehouses, and gin mills, the upper floors housing the poor, or packed with bales of rags and paper. Warehouses and wharves rose across South Street, and behind them showed the stacks of freight ships and occasional masts of sailing craft.

Tierney hadn't been in this section of the city since his youth. Then he had been promptly transferred for arresting the Tammany district leader for selling liquor on Sunday, the event that had given him the nickname of "Bonehead" Tierney. A sweet neighborhood for crime, this!

Ahead of him Williamson paused at a sidewalk fruit stand, examined the apples, picked up one, and put it in a pocket. Then, dissatisfied, he drew it out, replaced it, and selected a larger apple, paying the vender a coin. Tierney looked on idly as the next customer, a huge man with gray hair and a scarred face, walked to the stand. Something about his appearance was familiar, and Tierney watched with sudden interest as he picked up the apple replaced by the chauffeur, paid for it, and wandered on.

The big man had a slight limp of the right foot and as Tierney closed up he noticed a double scar on the back of the man's neck. The limp and scar stirred Jim's memory. Yep. The guy was Tugboat Eddie, sent up to Sing Sing twenty-five years ago by Tierney for manslaughter.

He followed his man until he disappeared into a junk shop. Williamson, by now, was turning the tip of Manhattan Island, and Jim resumed tailing him. The chauffeur stopped at an oyster and clam booth for lunch and continued to Broadway, strolling leisurely, smoking constantly.

As three o'clock approached the chauffeur returned to Broad Street and began wiping the dust from the big car. This finished, he got out a small tool bag and began tinkering with the reflector mounted on the left mudguard. The sun, still high, was obscured by the mountain range of skyscrapers between Broad Street and Broadway. As it lowered slowly in the west it suddenly struck a gap between the buildings and a silver shaft shot down to the street, illuminating the banker's car.

Meanwhile Williamson finished his tinkering with the car and with apparent relief flexed his hand, stiff from working a wrench. As Williamson climbed into the driver's seat, Tierney went lazily to the banker's office.

"Were you watching outside?" asked Mr. Ronaldson eagerly.

"Yes, and nobody touched the window that I could see."

The banker's face fell and his hollow eyes filled with disappointment.

"Well, Mr. Tierney," he said in a low voice, "the clutching hand appeared just as it did yesterday. We can't both of us be suffering from the same illusion. My nerves are getting

me. If extortioners are at work I'll gladly pay them a good price to leave me in peace. I want you to go to my detective agency and tell them to get in touch with these fiends. Do it now. I'll get a double guard to take your place seeing me home." The rich man's voice quavered and his hands were trembling.

Tierney shook his head. "Nope—I'm going home with you tonight. Just be patient a few more days. Give me a little time."

In the driveway of the Ronaldson estate the big town car stood facing the brink of the Palisades. In the west, sinking toward the Ramapo Mountains, the sun shone with dazzling brilliance in the clear September atmosphere. From his window, standing well back in the room, Tierney saw Williamson again tinkering with the annoying reflector on the fender.

Downstairs, the banker's library was gently darkening in the approaching twilight. His window shades were drawn down and he sat in troubled meditation, a dreadful fear growing in his heart.

With a sigh he looked up. His body straightened and a loud cry of terror escaped his lips. His horror-struck eyes were fixed on the window shade nearest him.

Tierney, gun in hand, came rushing down the stairs. Servants were rushing into the library. Mr. Ronaldson lay unconscious in his big easy chair.

"What happened?" demanded Tierney.

All that anyone knew was that he had heard a scream from the library. The women bathed the banker's temples and wrists until his eyes opened.

"They'll kill me," he moaned. "My heart, my heart."

The detective asked the servants to retire.

"It was there, reaching for my throat," gasped Mr. Ronaldson. "There, in that window."

"The hand?"

"Yes."

Tierney raised the shade and then the sash. Nobody was about. He saw one of the guards and called to him.

"Get your captain quick and start a search of the grounds," he ordered.

The sun dipped to its bed as the men hunted for the intruder. The servants went about the household duties in silence. The master had suffered a heart attack. Hadn't the butler better call a doctor, the housekeeper inquired.

"No. I'm better now," said Mr. Ronaldson quietly. "I'll not be at dinner. Bring me a glass of the Madeira."

In the rapidly darkening room the banker sipped the wine, making a brave effort to steady his hand.

"It's dreadful, Tierney," he whispered, as if his enemy might be hidden in the room, listening, ready to pounce on him and throttle the breath from his body. Above his white beard his face was yellow-white, his usually clear and kindly eyes fired with a great fear. "If I alone saw this thing in the city I'd take it for granted that something had snapped in my brain, but you saw it there and now it's following me from place to place. Can I run away from it, do you think?"

The library telephone rang sharply. Tierney handed Mr. Ronaldson the receiver.

"It's my wife," said the banker. "The wire is a private line between Tuxedo and here." Tierney could hear the high-pitched, excited voice of Mrs. Ronaldson. He could make out occasional words, "State police," "guards," "ransom," "the children."

"They are protected for the night at any rate," said Mr. Ronaldson at last, putting aside the instrument. "My wife found a note in her car. It demands one hundred thousand dollars. What can we do?"

Until now Tierney had expected to handle the Ronaldson case without aid from police headquarters. Now he needed help. If he moved quickly he could catch Inspector Sweeney before he left for his home in Brooklyn. The appearance of the hand on the library window convinced him that within the banker's home would be found one of the extortioners, perhaps the chief of the band. There was danger of the telephone wires' being tapped but he'd have to risk that. He didn't want the banker—or anyone else—to overhear his talk with Sweeney. The housekeeper's little office downstairs, from which she ordered supplies and directed all the domestic affairs of the place, had a telephone. He found the capable Mrs. Barton and told her that he desired the use of her office for a few moments without any interruption.

"Lock yourself in if you wish, Mr. Tierney," she said. She switched on her desk light, but as she retired he turned it off. The one window of the office was filled with the gray light of the departing day. The room would have been stuffy but for the fact that the lower sash of the window was raised a few inches.

Sweeney's secretary reported that he was not in his office but somewhere in the building. Tierney waited, receiver at his ear, staring at the gray patch of window, thinking hard. It was odd that Williamson was adjusting that reflector just when the menacing hand appeared, both in Broad Street and here on the Palisades. Odd, too, that the car was faced away from the sun so that its rays struck the mirror directly, sending a brilliant shaft off at an angle.

Then he remembered Williamson standing between the car and the bank window, moving his gloved fingers in the silver beam. And he remembered how he had often amused the kids in his neighborhood with shadowgraphs on the wall. He had it solved! How simply this homely trick had worked. And with what sinister effect!

"Inspector?"

"Yes, Jim."

"There's a junk shop in the basement of an old house on South Street near Old Slip. Tugboat Eddie, out of Sing Sing after a manslaughter bit, hangs out there. He's been in touch with a guy employed by our party. Get him quick and search his place for an apple—yes, an apple. It might not be a real apple. It might be a container for secret messages. Telephone me here. I think I'll clean up this thing before tomorrow."

Mrs. Barton, in her capable way, had enjoined silence on all the help while Tierney used her office. As the receiver of his instrument clicked in its bracket Tierney's keen ears heard a soft rustling sound outside the window he was facing. With a swift and noiseless tread he stepped to the casement and threw up the sash. Williamson was hurrying from the window toward the garage.

"Get him!" shouted the detective, vaulting through the window to the ground. "Hey! Get Williamson!"

The chauffeur changed his course and headed for the brink of the Palisades and the elevator shaft with its iron rungs. He had a good start. But the dull gray light of dusk was ideal for a marksman and Tierney, in his time, had taken many prizes on the pistol range at police headquarters. His gun barked once and the fugitive leaped in the air and toppled to the ground, a bullet through his right leg.

Handcuffed, Williamson was brought into the house to face his tortured employer.

"You'll have no more trouble now, Mr. Ronaldson," Tierney said. "Here is the menacing hand. He did it with old-fashioned shadowgraphs. And the gang in New York working with him will soon be under lock and key if I know anything about Inspector Sweeney's methods. Now I've got to search this bird's rooms for something."

To keep each other informed, Williamson, as director of the extortion plot, and Tugboat Eddie as chief thug, had been using the little fruit stand on South Street as a postoffice. Whether the vender was in the conspiracy was yet to be found out. A perfect imitation of an apple was found in Williamson's room, hidden up the chimney of an open fireplace. It unscrewed, but it was empty. No wonder Williamson hadn't eaten the apple after his lunch at the oyster and clam booth! Well — and Tierney laughed aloud — for many years to come he would be able to count on an apple every Christmas in Sing Sing.

It was nearly midnight when the siren of Inspector Sweeney's car echoed through the wooded Palisades and the guards admitted him.

"We got Eddie and his entire gang," the inspector informed Tierney and the banker. "Their plans were about completed to make the snatch as Mr. Ronaldson stepped from the elevator to the shore line. A fast car was to take them north on the shore road—no slowing up for crossings, Jim, for there are no crossings on that road. Just a rock wall on one side and the river on the other. Well thought out, wasn't it? You broke the case just in time."

"Did you get the apple, Chief?"

"Oh, yes. Eddie had just tucked a map of the abduction layout into it when he and his bunch stuck up their hands in the room back of the junk shop."

"What about this guy?" asked Tierney, waving a fat hand to Williamson who sat pale from loss of blood and the agony of a shattered ankle.

"To the Hackensack jail. Eddie has spilled enough dope to put him away for keeps."

Autobiography — Lincoln

By Nancy Byrd Turner

Men sought him out after his path had led
Where few paths lead; and on that signal day
Asked for the history of his life. He said,
"Simple and short and poor," and would not say
Another word, that being Lincoln's way.

Simple it stayed, with the simplicity
That marks all greatness; poor it stayed in things
The world calls wealth, the pride that power brings;
And short—for him no threescore years and ten.

So, called to rule a mighty country—when
The curious begged a tale to fit the day,
Only three sparse, keen words: : "Simple and poor
And short," he answered and, turning, said no more—
Believing, indeed, there was no more to say. . . .
That being Lincoln's way.

The Navy Day Salute *(Continued from page 14)*

"Very well, we'll use cased ammunition."

Hill looked at Tommy and grinned a little. "Aye, aye, sir."

"The salute will be fired at noon sharp."

"Aye, aye, sir."

Tommy climbed back up into his cabin where it was only a little less hot, and looked at Leo who had slumped into restless sleep. Tommy felt his slow, halting pulse and frowned. Then he smiled a little bitterly and looked at his watch. Eleven o'clock in the morning.

Tommy went to the port and stared at the town of Chan Foo for a long time. Behind it rose the steep blank face of a cliff, and beyond that the tips of purple mountains. The town itself seemed alive with people that morning, and across the narrow straight street the houses were apparently tied together with flags and streamers. People were leaning out of the windows shouting at each other.

Tommy wondered a little at the unusual display of activity as he sat on the table gazing out at it with calculating eyes. And then, suddenly, the reason became apparent, for out of a rift in the hills a winding stream of men came down along the river bank.

The sharpshooters, usually squatting on their haunches, began to leap and wave their arms about and the noise of their shouting carried even into the closed ship. Tommy watched them pointing out at the *Blaine*, watched their apparent joy. He smiled a little and scratched his head as the people began to come in hordes from the town to meet the small army still coming through the defile.

Men, women, children, dogs, pigs; everything began to run along the river bank until it was hard to tell where the water stopped and the people began. They shouted and waved and milled around the coming men—and Tommy looked at his watch.

The men were gathering in a group beside the river. Tommy didn't know exactly what they were doing, until finally from a sudden cloud of smoke a solid sheet of bullets rained on the *Blaine*. The ship rang with the impact of the volley and the cheering of the assembled people.

Tommy looked at his watch and stood up. Another volley of bullets screamed around the ship as Tommy put on his cap. As he left the cabin he waved a hand at Leo, who was still asleep. Leo, at least, was a little better this morning.

Below in the stifling heat four men sat on the rungs of the forward ladder. Stacked neatly along the bulkhead were the shining, oiled, deadly shells. Sharp-nosed and vicious in the dim light, their brass cases gleamed dully in the semi-darkness. Tommy didn't look at the men's faces as he went up the ladder and unlocked the hatch cover. He turned around.

"When I open this hatch, you follow directly behind me. Load as I aim the gun and then get below immediately. Come topside with another shell as soon as I fire. Stand by. Load!"

Tommy threw open the hatch with one movement and landed on deck. Without nervousness, but with sure haste, he released the telescopes on the gun and elevated it. He heard the hatch close. A bullet whined close.

Tommy, stooping, looked at the hill through the telescope sight. He could see it sliding by in the glass as he whirled the training wheel. The edges of Chan Foo began to show. Bullets screamed all around him. The gun, he reflected, gave him some protection.

Then finally he saw the flags, streamers, the one narrow street with the cliff behind it. He could see the familiar houses of straw and bamboo cluttered along the sides of the empty street.

Tommy aimed just over the top of a flag about halfway up the street and pressed the firing mechanism. The gun cracked and leaped back. The sharp wicked slap and the *whoosh* of the shell—they were good noises to Tommy as he stayed bent over the sights. A flag fluttered and fell, a grey cloud of dust rose from the side of the cliff, and then all was quiet in Chan Foo, as the people drew in their breaths to scream.

Then, as they began to scream and run, Chan Foo began to move. Tommy, looking at it through his glass, smiled. Along both sides of the narrow street the houses began to move inward. Flimsy poles, roofs, walls began slowly to collapse. Gathering speed as the supports gave way, Chan Foo fell down in the middle of its one street, a jumbled mass of flags, sticks, bamboo, laundry, and Chinese furniture. And as Tommy turned he saw only the back of one Chinaman disappearing into the hills; the rest had already gone.

Tommy laughed. He sat down on the deck and roared. When he stopped he had only to look at Chan Foo to begin again. The gun crew howled.

Then Lieutenant Leo Myles came on deck. Tommy saw him first walking weakly but with all the old pride of the Navy shining in his eyes—pride and anger. He wore his pajamas and a cap.

"Mr. Taylor," Leo said, using Tommy's last name for the third time in his life, "what does this mean?"

"Navy Day salute, sir," Tommy answered.

"We have orders not to fire on Chinese."

"We didn't, sir."

Leo waved an expressive hand at the wreckage of Chan Foo.

"Never touched a stick of it, sir. The vacuum created by the passage of the shell through the street sucked down all the houses, sir."

Leo waved at the deserted banks of the river.

"Never hit a Chinaman, sir."

"Very well. Continue with your salute." Lieutenant Leo Myles carefully took off his cap and dived weakly overboard into the cool water of the Yangtze.

More Ad Letters!

$25 Go to 12 Winners!

SIT down, now, and scan the advertisements in this issue of *The American Boy*. Then write us a 300-word letter (typewritten if possible) telling us which ad you like best and why. Address your letter to the Advertising Contest Editor, The American Boy, 7430 Second Blvd., Detroit. The contest closes Feb. 15 and results will be published in the April issue. For the best letter we'll pay $10, for the second $5, and for the next ten, $1.

Nearly 700 readers entered the ad contest just closed and their letters were keenly alive to the value of copy, pictures, layout, color, and all the elements of good advertising. The prizes went to the entrants who told most simply and effectively just *why* they liked a certain ad best. The December winners:

First place, $10. Douglas J. Coyle, 17, Chicago, Illinois. (Kellogg.)

Second place, $5. Clayton J. Kasper, 19, Windsor, Vermont. (Bucchnut.)

Next ten places, $1. Jack Campbell, Western Springs, Ill., (Daisy Air Rifle); Fred Newmeyer, Jr., 17, Du Bois, Pa., (Lionel); Bob Eddy, 17, Lake Benton, Minn., (Smith & Corona); Cleon C. Cory, 17, Brewster, Minn., (Porter Chemical); Floyd Brackee, 17, Clayton, Wis., (Smith & Corona); John A. Boock, 19, Faribault, Minn., (A. Stein and Co.); Lewin Wickes, Jr., 17, Chestertown, Md., (Lee Sales Co.); Edward Higgins, Jr., 15, Lake Forest, Ill., (Kellogg); Bill Mellveen, 15, Walkerville, Ont., (Kellogg); J. Austin Clark, 16, Jackson, Mich., (Gilbert Chemistry).

Great Little Guy! *Continued from page 8)*

when the Peters Tech team walked out on the floor, clad in their red woolen warm-up suits and led by Brad Funk, who was bouncing a new basketball.

Funk was a good-looking blond boy of medium height, and every move he made bespoke finesse and grace. He had a smooth effortless shooting stance that arched the ball high and seemed to pour it, with unerring aim, into the netting. When he dribbled, he did so with a smooth liquidlike wrist motion that rendered the ball absolutely submissive to his will.

He saw Slim, whom he'd played against in two hard-fought games as a sophomore and a junior, and walked clear across the floor to our goal to greet him. He was a great guy, not a bit spoiled or stuck up.

"Hello there, Slim," he hailed Slim, shaking hands with him. "How's everything?"

In our locker room, five minutes before the game started, the coach made an announcement so startling that it came with the force of an explosion.

"All right, here's the starting lineup. Chapman and Vincent forwards, Masterson center, Ganges and Nelson guards."

Did you get it? Chapman. Red Chapman. And when Red heard his name called, his eyes got so big you could have knocked them off with a stick. At last he was going to start a game!

As our team walked out on the court, the coach put his hand on Slim's arm.

"Slim, our first five hasn't been able to come close to beating Peters Tech the last two years. Consequently we're bound to go into this game under something of a psychological handicap. If we haven't been able to beat Peters Tech the last two years, then it's logical to figure we won't tonight. That's why I'm starting Red. He's a firebrand and might give us just the spark we need."

As Slim nodded approvingly, his lean face bore a fighting look.

I was watching Red as he stepped out on that Peters Tech court. He was walking in the clouds and looking up proudly at his name spelled with colored bulbs in the big electric scoreboard on the north wall. He got a lot of kick out of rubbing his suction soles on the wet cloth the coach had wisely furnished to counteract the slick Peters Tech floor.

Then the ball went up. Slim got the first tip and we rushed it down to their goal. But their man-for-man defense was well-organized and with Funk coolly directing it they turned us three times and finally got the ball.

We raced back and formed our zone defense in two parallel lines, but there was no particular need for our haste. Brad Funk brought the ball up slowly and leisurely, dribbling back and forth along our front line as his forwards and center weaved in and out through our defense.

Then we saw how well Brad Funk could pass. Although he was looking left, he suddenly hurled the ball down the middle to his center who leaped up and scored before Mike could stop him. A roar shook the gym and Mike rubbed his eyes ruefully. Here was a player who could look one way and hit a spot with a blind pass in the opposite direction!

Slim called time out right there and blessed Mike out for watching Funk's eyes instead of the man in his zone. Then our team stiffened and began to click. Three times we worked the ball down to their goal, and each time we scored.

Brad Funk called time out. The Peters Tech crowd was buzzing with alarm. Few basketball teams could make three goals in a minute's time against Peters Tech.

But when play started again they steadied and stopped us. Then they got the ball and with that deliberate, sure offense of theirs, began to whittle down our margin.

Funk, as always, personally directed their tactics. Dribbling slowly as he carefully scrutinized our defense, he moved backward and forward along our front line like a panther on the prowl.

Then he'd strike with the savage quickness of a cat, bouncing perfectly to his pivot man as the latter shot out of a corner, and flitting through our defense to take a return pass and drive like a plummet for the hoop. Or, if we had his opening stopped, he'd put on the brakes with a shrill screech of rubber and hook pass left-handed to a man driving in from a corner, or squat on his heel and fire at the hoop with that deadly push shot of his.

Soon they were leading us, 10 to 6, with ten minutes of the first half left, and then quick-thinking Brad Funk did another smart thing. He held the ball on the center line with his whole team grouped around him and made no effort to penetrate our zone defense, which was all set and waiting for him.

For a minute or two our team was bewildered. We'd never been up against anything like that. Finally Slim Masterson, in the center of our front line, figured it out and looking back at the rest of our team, waved them forward. We had to go get the ball. If we didn't Peters Tech would win the game, 10 to 6.

Our team advanced cautiously to midcourt, changing to the man-for-man style, and that was just what Peters Tech wanted. Their right forward decoyed Dart Nelson into a corner, leaving the middle lane wide open, and then they shot a man down it a mile a minute and Funk passed half the length of the court to him. He caught it over his shoulder just in time to score, one step ahead of Ned. It was the most perfectly thrown ball I've ever seen and that gigantic crowd nearly tore down the building.

I expect you're wondering, by this time, what had become of Red Chapman. Well, Red had got his hands on the ball just once and on that lone occasion he'd chunked it clear over the backboard!

None of us could figure what was the matter with him, and out on the court Red apparently couldn't either. Peters Tech's slow offensive style, which placed such a high premium upon possession of the ball, was a puzzler for a go-getter like Red Chapman. He just couldn't get started.

At last the coach yanked Red and sent Joe Cox in. Red came off with his lower lip nearly dragging the floor and his chin on his chest. It was the first time in his life he'd ever been taken out of a basketball game and he was utterly crushed. But as he slumped down in his old seat over at the end of the bench, sorrowfully pulling on his warm-ups, he didn't complain. As a starting player, he had been a dismal flop.

The game went on. Joe's height helped considerably and as a result we held them even the rest of the half. The first part of the third quarter was also even, and with nine minutes left to play, Peters Tech held a seven-point lead, 23 to 16.

Then Slim Masterson, who plays his best when the going is roughest, got red hot. Slim tried something new. The desperateness of the situation demanded it. About forty feet from the goal, over on the left side line, he cocked himself and drove the longest shot I ever saw in my life straight through the strings. Spifff! and an exclamation of awe ran clear around that Peters Tech gym and up into the crowded balconies.

But that wasn't all. A minute later Slim, who this time was standing near the right side line just inside the center circle, again set himself carefully and arched another beautiful ceiling sweeper and I'll be blowed if *it* didn't zip squarely through the cords, too!

Now Peters Tech led us only 23 to 20! We were within striking distance of them at last! And their crowd, sensing it, stood up and roared to Brad Funk to stop us. They stood and roared continually throughout the last seven minutes of the game!

Then, with only four minutes to go, we got a bad break. Ned Vincent sprained his ankle so badly in a spill that we had to lead him to the bench. It was a bitter blow for the coach, but he didn't let on.

"Bill!" he called sharply, and Bill Chase, swallowing his surprise, had his sweat pants off and was prancing up to the coach for instructions.

"Go in for Ned," he said. "Tell Slim to try back taps for a while. Their guards have been giving our forwards trouble. Report to the scorer first!" And Bill ran like a sprinter for the scorer's table.

But the coach hadn't sat down. He was still looking up and down our bench as though unable to make up his mind. Then he decided.

"Red!"

Red Chapman, his whole life in his eyes, slowly arose, hitching up his pants and sliding up a knee pad that had fallen to his ankle.

"Go in for Joe. And let's see you drive!"

And Red, who had failed as a starter, went back to his old pinch-hitting role.

But Brad Funk had guessed that the coach would tell Slim to tap the ball back to our guards. So on the tip-off Funk himself cut sharply in behind Slim, leaped high and flipped the ball across court to one of his forwards. Peters Tech had possession of the ball and began to stall just inside the center line.

But we were rushing them so fiercely with our man-for-man style that they were having to do a lot of dribbling and passing to freeze it.

Then Red, edging forward on his toes and watching the ball like a hawk, took a chance. Moving like light he suddenly intercepted a Peters Tech pass and, dribbling like mad over half the length of the court, rammed the ball down the basket's throat. Peters Tech 23, Ardmore 22!

A moment later Mike Ganges slapped the ball out of the hands of a Peters Tech man who was trying to stall and Red dived ten yards on his stomach and arms to come up with it. Again we broke fast down court and this time Bill Chase took a bounce pass from Red and banked in a set-up that put us ahead, 24 to 23! Ahead of Peters Tech for the first time in three years!

The last fifty seconds of that game was a nightmare. Brad Funk, still cool and dangerous, dribbled swiftly up court to the front line of our defense and suddenly whipped a bounce pass to his pivot man, then drove in hard for the return pass. Dart Nelson was standing squarely in his path but Funk, using the dribble as he alone could do, went around him like so much smoke. Peters Tech led again and their crowd screamed with joy.

But we weren't licked yet. Red Chapman stole Slim's tip-off from a Peters Tech guard and we broke for the hoop for all we were worth, Slim and Bill Chase cleverly drawing their men to the corners to keep the middle wide open for Red who roared in like the Lackawanna Express and leaped up and scored. Ardmore 26, Peters Tech 25!

And then, in the last two seconds of play, Red and Brad Funk smashed headlong into each other and the referee called a double foul, just as the timer fired the final gun.

Although the game was over, each player had one free try for goal.

Funk was the first to shoot. He took his time, asking for a towel to wipe the perspiration off the ball, then coolly poised himself at the foul line. Those thousands of Peters Tech rooters were still as death. If Funk missed, the game was lost. But if he made it, the score would be tied and unless Red sank his free throw, the game would go into an extra period.

A glad roar burst from the crowd. Brad Funk had coolly pitched the ball through the ring for the point that tied the score. For a full minute the crowd bellowed insanely. Then the referee took the ball down to the other end of the court and handed it to Red, who stood at his foul line.

Red grinned, took his stance, bounced the ball once to get the feel of it, raised his eyes to the goal, and won that game for us with a perfect free throw! The ball threaded the hoop without even touching steel!

In our shower room afterwards, the boys elected Red captain. With all our starting five graduating, he was the logical choice. The Ardmore team next year will be built around Red Chapman and Bill Chase. It'll be new and green and it'll need a captain who can hustle. Red Chapman is just the guy.

I'll bet you can guess what Red Chapman did when Slim Masterson announced the result of our ballots for captain. You're right. He began to cry.

We all had to laugh. Red looked so funny sitting there stark naked with big patches of adhesive tape sticking to his hide and huge bronze splotches of iodine covering the skinned places on his hard freckled body, where he'd dived for those loose balls.

Finally he straightened up a bit, sniffling and winking his eyes to get the water out of them.

"Thanks a lot, fellows," he stammered, brokenly. Then he looked up at the coach, sort of ruefully.

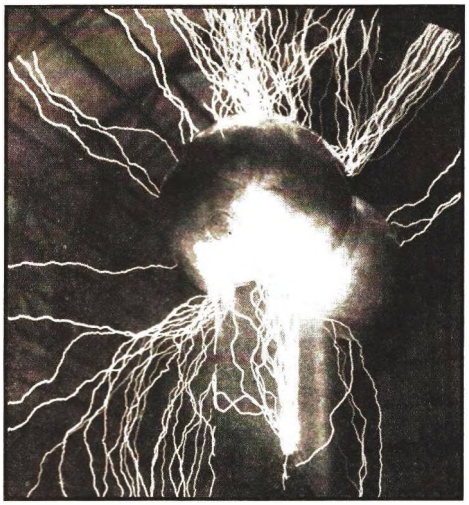
"Coach, guess this means you'll have to start me and play me as a regular next year, won't it?"

"It sure does, Red," the coach assured him. "A team needs its captain every minute."

Red was still blubbering and sniffing, making funny little noises in his throat. He shook his head.

"I don't know whether I'm going to like that or not," he said. "I've got so I'm kinda stuck on this business of being a pinch-hitter. It's right down my alley," and then he broke into a fresh outburst of the weeps while all the rest of us darned near died laughing.

That was Red Chapman all over. Cries when we lose and cries when we win. He's the fightingest, cryingest, toughest, grandest little guy I ever knew!



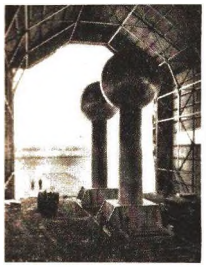
Here's man-made electricity of ten million volts!

They're Gunning for the Atom

By STUART JOHN

IMAGINE, for a moment, sitting in the center of an aluminum ball, the surface of which is charged with five million volts of electricity.

Think of yourself as a gunner. Using the great power that surrounds you, you're going to shoot a bullet at a target so tiny that no man has ever actually seen it. The bullet will travel fast—so fast that it can circle the globe three times in a second. With luck it will hit the target—and then? Nobody yet knows what will happen—what new facts will be discovered—when bullet and target meet.



With this high-voltage generator man hopes to explore the atom's nucleus.

Scientists, today, are going after the secrets hidden in the atom, and they're doing it with the kind of apparatus shown in the accompanying pictures.

They know quite a bit about the atom already. They have it pictured as a tiny positive charge of electricity called the nucleus, surrounded by rotating negative charges called electrons. In other words all matter is nothing but a bunch of electrical charges!

The Greeks thought atoms were tiny particles of solid matter. Then scientists discovered that there were different kinds of atoms—oxygen, carbon, iron, and so on. Finally the theory grew that the atom itself was composed of separate particles; that if the atom were enlarged it would look something like our solar system, with a nucleus in place of the sun and electrons for planets.

At the moment scientists are not so interested in the rotating electrons. But how they'd like to smash a nucleus and see what makes it click!

Dr. Robert J. Van de Graaff of the Massachusetts Institute of Technology showed them the way when he developed his high-voltage generator. Glance at the picture showing the interior. That strip running up the center is an endless belt of paper. At the bottom, static electricity — electricity not in motion—is sprayed on the paper. It's carried to the top where brushes take it off the belt and store it on the polished aluminum sphere, 15 feet in diameter.

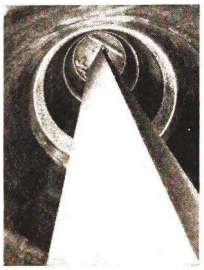
While one sphere is accumulating a positive charge, another sphere is building up a negative charge. The two spheres will be connected with a cylinder of textolite—paper and shellac—12 inches in diameter and 40 feet long.

In the positive sphere, a scientist will sit with his bullets, which are nothing more or less than hydrogen ions.

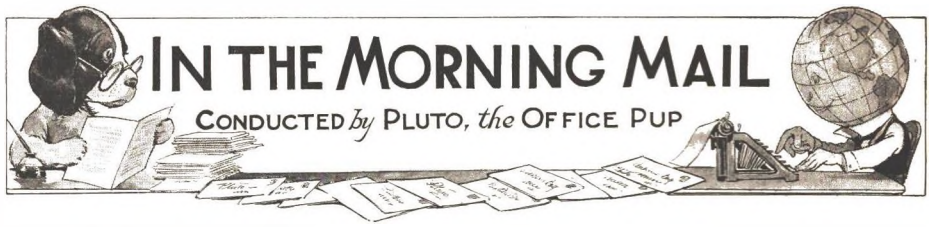
In the negative sphere will be another scientist with the target— the helpless nucleus. When the two spheres reach five thousand volts, the discharge will take place. The hydrogen ion, at a pressure of ten million volts, will shoot down the 40-foot tube. Because there's no such thing as accurate aiming there'll be lots of bullets and lots of targets.

Sooner or later there'll be a hit. What will happen then is anybody's guess, but scientists believe that there's enough energy in the atoms of a copper penny to drive the largest ocean liner across the Atlantic.

Great discoveries may be the result when a hydrogen ion smashes to smithereens the nucleus of an atom!



A belt of paper carries static electricity to the top of the generator.



"YOU KNOW," said Pluto, the Office Pup, "it's a wonder to me that human beings don't have a lot of trouble finding things to do in their spare time."

"More trouble than a dog?" the editor asked.

"A dog has no trouble! When he's not working, he's always got his fleas. I've often wondered how the human race can get along without fleas."

"It's no trouble at all, I assure you."

"But I've found that human beings have something that itches worse than fleas—an insidious insect with long tentacles, sharp pincers, and suction caps on the end of its legs, like an octopus."

"Great Scott! Do you see any on me?"

"You're covered with 'em. Everybody is. It's terrible."

"Have—have these things a name?" the editor asked weakly.

"Yes. The collecting bug." The Pup pointed to a stack of letters from readers of *The American Boy*. "Every one of those letters is about a hobby, and most hobbies are collections."

The editor breathed a shuddering sigh of relief.

"Here are a few of the more unusual hobbies," Pluto went on. "Ormond Manhard, St. Louis, Mo., collects newspapers containing important news. His oldest paper is the Ulster County Gazette, published January 4, 1800, and containing the news of George Washington's death. Recently he has carefully put away a paper containing the story of the *Morro Castle* disaster. What he's really doing, you see, is saving contemporary accounts of great events on the theory that the papers will be extremely interesting forty years from now."

"A good stunt. I hope he keeps it up and takes good care of the papers."

"And here are two boys who have formed an international society! Marshall Olbrich, Madison, Wis., writes that he and Richard Emerson, Villa Nova, Penna., are the charter members of the International Herpetological Trading Society. They're bugs on zoology, and the main purpose of their society is to trade snakes and relatives of snakes."

"Sounds exciting."

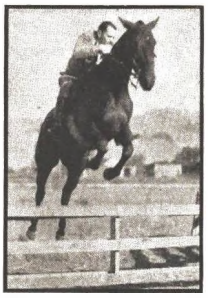
"And here's an unusual one. Hugh F. Pugh, Whitesboro, New York, traces family history. He says he's traced both sides of his family back to the Revolution. It's not knowing his ancestors that gives him pleasure, he says, but the actual tracing which takes him to old letters, deeds, documents, town clerks' offices, libraries, and old family homes. While tracing his family tree he collects old photographs and has a picture of a great uncle who bore the same name as his own and was captain of a ship that ran between New York and Liverpool. Even he collects something!"

"Haven't you any hobbies that aren't collections?"

"Well, here's Tom Tannler, Cadott, Wis., who raises vegetables every year and sells them. But he collects something too—he collected $30 last year and bought himself a new bicycle with balloon tires. Other readers who wish to copy Tannler's hobby will be interested to know that *The American Boy* is running an article on raising vegetables and flowers for profit. It's by Harry O'Brien, a famous gardener and writer, and will run in an early spring issue."

New Clubs!

Two new local kennel clubs are under way, both of them in Illinois. Jack Grohsmeyer is responsible for the Riverside Club and Richard Thompson, Chicago, is president of the South Shore Kennel Club. Both clubs have received autographed portraits of Pluto for their clubrooms, as will any group of boys sending in at least eight signatures. These clubs are devoted to the discussion of stories, hobbies, athletics, and various problems common to grade and high school fellows. For February, we suggest that local clubs have discussions and speeches on the following: How to Study, Basketball, How to Take Notes, Speed Swimming, Winter Flying, and Equipping a Home Workshop (see article on page 30, this issue). In almost every town you can find adults expert on the above topics.



The author of Hide-rack is as much at home on a horse as he is in front of his typewriter.

Rob White Greets You

Here's a personal biography from Robb White III, author of "Navy Day Salute," in this issue, and more U. S. Navy stories to come:

"Born among the head-hunting Igorots of the Philippine Islands, I was carried in a basket three times around the world before I knew what was happening. I spent the rest of my youth annoying military police in most of the southern army camps until I was finally confined to prep school in Virginia. I broke out of that only to land in the Naval Academy at Annapolis. While there I, and some battleships, romped around European waters and flung 14-inch shells at the Caribbean Sea in battle practice.

"Later I sputtered around with flight training, frightening most of the gulls in Chesapeake Bay, but fortunately not washing out any of the government planes. Upon being graduated from Annapolis I had so many unsold manuscripts I decided that I was a writer, so I resigned from the Navy to starve awhile. To get back into the habit of eating I started working as a draftsman but was let out during the bad spell of 1929, etc.

"I started teaching swimming, painting signs, selling needles and matching cloth until I became a construction engineer. During the Freeze of '34 I stood around outdoors watching steel-workers skating about on I-beams, and am at present subsisting on hope and *The American Boy*."

Robb White III, Annapolis graduate, can't stay away from sailing ships.

Speaking of Artists

Readers seldom mention *American Boy* artists, probably because they take the pictures in the magazine for granted. So we're especially glad to quote these comments in praise of artists:

"I honestly believe," writes John V. Peterson, Pomfret Center, Conn., "that Manning deV Lee should be given a salute of 66,987,654 guns for his superb illustrations for 'The X Mystery' (October's science-mystery). He captured the feeling of Claudy's story in a marvelous way. The faces of Kane and Dolliver register fear, hesitation and wonder. Behind them the transparency of the weird Guardian of the Light twists itself grotesquely about the lift." (The Pup remembers that illustration. When the editor first saw it, he ran and hid under the Pup's desk for safety's sake. Or maybe it was the other way round.)

Kennel Clubber Kenneth Olson, Moorhead, Minn., liked Paul Bransom's cat cover on the November issue (two cats on a roof, silhouetted against an enormous yellow moon). "It's the best cover of the year," he states. The favorite illustrators of Bill Monroe, Jr., New Orleans, La., are Dudley Gloyne Summers, Frank E. Schoonover, and Manning Lee.

Biography?

Lawrence Holeman, Bellingham, Wash., asks us to publish biographical sketches of such famous personages as Galileo, Nero, Alexander the Great, and Confucius. We're doubtful about that. We have always hesitated to devote precious magazine space to material that is so fully covered elsewhere. History books and the encyclopedia are full of information on the men Holeman has mentioned. On the other hand, we may at times carry biographical material on contemporary great men about whom not so much may have been written.

Classes Read the Magazine

"During our home-room period we have been reading stories aloud," writes Bob Bañes, Los Angeles, Calif. "Recently we had a debate as to which boys' magazine to use, and The American Boy won by far. The teacher was so enthusiastic about it that he took out a three-year subscription and he nearly wears the magazine out before we get to read it."

The American Boy is also popular with the class of Indian boys pictured on this page. They're members of the St. Stephen's Indian Mission, St. Stephen's P. O., Wyo.

Chestnuts, Please!

If you find any good wild chestnuts around, you can do your country a great service by sending them to Dr. John Stuart Thomson, 390 Ackerman Ave., Glen Rock, N. J. Thirty years ago an Oriental blight destroyed our wild American chestnut, at that time a great lumber tree. Scientists thought it was gone forever. Then, ten years later, Dr. Thomson found sprouts coming up from the dead stumps, especially where fire had destroyed the fungus that caused the blight. By this time some of these sprouts should be matured enough to bear fruit. So, if you want to help Dr. Thomson in his great work of replanting this tree, ship him any good nuts you may find. Wrap and ship them moist.

Club Reports, Please!

Pluto would be delighted to hear from the Setters (Corresponding Secretaries) of the 19 clubs now in existence. What has been your most successful program? What interesting activities have you taken up? How often do you meet? How have you decorated your clubrooms? We'll pass along your reports to other clubs through this column.

They play a hot game of basketball—and read The American Boy.

OCCASIONALLY readers send in a letter requesting membership in *The American Boy* Kennel Club. The Pup wishes to explain that the only way to become a member is to send him a letter interesting enough to quote on this page—or to form a local club. Your letter may be about anything. If it is used, you'll receive an autographed portrait of Pluto. Although the Pup can quote from only a small part of the letters he receives, he reads and appreciates them all. Address *The American Boy* Kennel Club, 7430 Second Blvd., Detroit, Mich.

FUNNYBONE TICKLERS

Different, Somehow

Renter: "Did I understand you to say you bought your house for a song?"
Buyer: "Well, not precisely. I bought it on notes."

Kept It Dark

Freshman: "Transfer, please."
Conductor: "Where to?"
Freshman: "Can't tell you; it's a surprise party."

Too Eggs-iting

Rooster: "What's the trouble with Molly Leghorn?"
Cockerel: "Shell shock. When her eggs hatched, out came ducks."

The Lucky Few

"Willie, how many make a million?"
"Not many," said William with a grin.

The Smiths solve the problem of getting Willie to do his Saturday practising!

Where It Was

"High school boys do many things," said the principal, "that are annoying but harmless. But the practice of raiding melon patches must stop. That is plain, low-down stealing."

A boy in the back seat rose suddenly, snapped his fingers, and then sat down again in confusion.

"Jones," the principal thundered, "what do you mean, snapping your fingers when I speak of melon stealing?"

"I just remembered, Mr. Brown," said Jones, "where I left my knife."

Some Other Fellow

Two backwoodsmen knocked at another backwoodsman's door.

"Hello, Ed," said one as the door opened. "Say, we came across the dead body of a man over there in the hollow and we kinda thought 'twas you."

"That so? What'd he look like?"

"Well, he was about your build—"

"Have on a flannel shirt?"

"Yep."

"Was they knee or hip boots?"

"Let's see. Which was they, Charley? Oh, yes, they was hip boots."

"Nope," said the backwoodsman, closing the door. "'Twasn't me."

And More Fun

Coach: "Why didn't you turn out for track practice yesterday?"

Miler: "Well, Coach, I couldn't; I had a date."

Coach: "And just where did you get the idea that a date gives you the right to cut practice?"

Miler: "Well, a miss is as good as a mile."

Trick of the Trade

The friend dropped in just as the great animal painter was finishing a picture of a rabbit. In fact, he was rubbing the painted rabbit with a bit of raw meat.

"What's that for?" the friend asked.

"It's a secret," beamed the painter. "You see, Mrs. Hasgrands is coming in today. When she sees her pet poodle rush up to the rabbit and sniff she'll buy the picture right away."

Teamwork

The enthusiastic partner and the timid partner went bear hunting. With typical beginners' luck, the first morning they left camp, they came upon bear tracks. The timid sportsman looked at them apprehensively.

"Tell you what we'd better do," he said at length. "You follow the tracks to see where he went to and I'll go the other way and see where he came from."

The New Lines

Flatterer: "Sally, your mother is pretty, but you're even prettier."

Level-Headed Sally: "I ought to be; I'm a later model."

Co-operation

Women can keep a secret just as well as men—only it takes more of them to do it.

Lucky Dogs, Too

Pluto: "What were the two luckiest fleas that ever lived?"

Bozo: "I give up."

Pluto: "The pair in the Ark. They each had a dog."

A Thumping Pun

Drummer: "Yes, old fellow, I'm the fastest man in the world."

Violinist: "How come?"

Drummer: "Time flies, doesn't it? Well, I beat time."

Father Speaks

Willie was annoying the passengers aboard an ocean liner.

Mother (exasperated): "Father, speak to Willie."

Seasick Father: "How-de-do, Willie."

Did He?

Wife (to absent-minded professor): "Your hat is on the wrong way, dear."

Professor: "How do you know which way I'm going?"

It's Polite to Agree

A Virginia family was training a colored girl from the country in her duties as maid. On answering the telephone the first day she brought no message.

"Who was that, Sara?"

"'Twarnt nobody, Mrs. Bailey, jes' a lady sayin' 'It's a long distance from New York' and I says, 'Yes, ma'am, it sho' is!'"

Or Playing a Harp

Willis: "Where's your roommate?"

Gillis: "Well, if the ice is as thick as he thinks it is he's skating. If it's as thin as I think it is he's swimming."

Too Scared to Shoot

First Hunter: "Just met a great big bear in the woods!"

Second Hunter: "Good! Did you give him both barrels?"

First Hunter: "Both barrels he blowed. I gave him the whole blooming gun."

Air-minded Russia is building three new dirigibles.

Russia's new air issue includes this 5 kopec, red-orange.

"Presidents Series" Expected Soon

STAMPS

by

Kent B. Stiles

EXCEPT for the promised Connecticut Tercentenary 3c, the 1935 philatelic program at Washington had not been definitely announced at the time these lines were being written, about mid-December. It is safe to forecast, however, that the stamp issues will be varied and fascinating. Roosevelt the collector, busy as he is, takes "time out" now and then to concentrate on our hobby and its interests, and you may be certain that there will be new U. S. issues aplenty during the year.

Notwithstanding lack of official announcement as the old year closed, those in close touch with Post Office Department plans were confident that the delayed "Presidents" series would be placed on the 1935 schedule. This is the set which presumably would have 29 values, as compared with 25 in the current regular series, and would bear portraits of all past Presidents who have died. The President is understood to have already approved several of the designs.

One of Germany's Christmas time semi-postal series shows an architect with his triangles.

Meanwhile, requests for special issues pour in on Postmaster General Farley. Washington reports that most of these are promptly rejected but that Mr. Farley is giving favorable consideration to at least three—first, a series illustrating Washington's notable buildings and views; second, a stamp to commemorate the 25th anniversary of the founding of the Boy Scouts of America; and third, postal paper to recall the beginning of the Public Latin School in Boston. Meanwhile Mr. Farley has indicated "thumbs down" on a proposal that a stamp be issued in honor of Babe Ruth, ball player extraordinary.

Regarding a Boy Scout stamp, Deputy Third Assistant Postmaster General said: "I believe a stamp of this kind would be a valuable contribution to the efforts the Administration is making for the advancement of the youth of the land. Should the Boy Scout stamp be issued it would be the first one ever gotten out by the Post Office Department in connection with the youth of the nation."

A Mother's Day stamp having set precedent, don't be surprised if Boy Scout postal paper appears in the near future!

In Other Lands

IT is not possible, in the limited space available, to tell you about *all* new issues emanating from countries abroad. The more significant ones mentioned here are as follows:

Australia issued late in 1934 a 2 pence red, 3p blue and 9p purple commemorating the centenary of John MacArthur, who was responsible for the introduction of the Merino breed of sheep into Australia. A Merino ram against a background of plains and mountains is the design. The Commonwealth also promises early 1935 stamps recalling the founding of Melbourne, and calling attention to an International Boy Scout Jamboree.

Austria's promised memorial issue in honor of the late Premier Dollfuss is a 24 glossy gray-black bearing his likeness and a Cross flanked by oak and laurel leaves.

The design of Belgium's Christmas-time, anti-tuberculosis, semi-postal issue shows a mailed figure on a horse (the "Knight Errant") and the Cross of Lorraine.

Brazil has distributed three commemorative sets. One, marked the *Exposicao Filatelica Nacional* (National Philatelic Exposition), reproduces the quaint numeral design of 1843-66. It is in values of 100 reis blue, 200r violet, 300r red-orange, and 1,000r gray. The second, 200r brown, 300r violet, 700r blue, and 1,000r green, recalls the 400th anniversary of the birth of Jose de Anchieta, a Jesuit missionary whose heroic labors among the native Indians, during the reign of King John III of Portugal, won Anchieta the title of "the Apostle of Brazil." The third series, 300r scarlet and 700r blue, commemorates the visit of Cardinal Pacelli of Vatican City, papal representative at the recent Eucharistic Congress held in Brazil.

Ceylon joins the ranks of the British colonies issuing pictorials, with scenic designs intended to advertise Ceylon abroad. The colony's Financial Secretary told the Legislature frankly that collectors all over the world would purchase the stamps and thus enhance the local treasury!

Likewise Cyprus, another British possession, has put forth postal paper with designs showing ruins, ports, churches, mountains, etc., the ten values ranging from ½p to 45p.

In the Tetra Mountains this winter are being held international ski championship games, and Czechoslovakia has brought out commemoratives in values of 50 haleru and 1, 1.20 and 1.50 korona.

Fiji, a British colony in the Pacific, is postally commemorating the 60th anniversary of annexation by the motherland.

The centenary of the birth of Aleksis Kivi, poet and dramatist, is commemorated by Finland.

A 2 marka magenta from Finland recalls the centenary of the birth of Aleksis Kivi, otherwise known as Alexis Stenwall, Finnish poet, dramatist and humorist, who turned to literature rather than work in his

STAMPS CONTINUED ON NEXT PAGE

father's tailor shop and won international fame. Kivi is a newcomer to philately's growing gallery.

Germany's Yuletide charity issue is in the following values and designs: 3 plus 2 pfennigs brown, business man telephoning; 4 plus 2pf gray, bearded blacksmith; 5 plus 2pf emerald, brick mason; 6 plus 4pf green, miner with pick and lantern; 8 plus 4pf orange, architect and triangles; 12 plus 3pf carmine, peasant and scythe; 20 plus 10pf blue, industrial engineer in laboratory; 25 plus 15pf ultramarine, sculptor and tools; 40 plus 35pf magenta, judge in cap and gown. Meanwhile Germany has commemorated the 175th anniversary of the birth of Johann Christoph Friedrich von Schiller, poet, dramatist, philosopher, with a 6pf green and 12pf carmine bearing his portrait.

The panorama of the British empire further unfolds with native scenes reproduced on pictorials from Grenada—including Grand Anse Bay, on the ½p green; Grand Etang with its sanatorium, on the 1½p carmine and black; and the land-locked harbor and town of St. George's, the capital, on the 2½p blue. The colony's coat-of-arms adorns the other values.

An airplane flight from Rome to Mogadiscio so aroused the pride of Italy and her colonies (Cyrenaica, Eritrea, Italian Somaliland, Tripolitania) that all five issued advance commemoratives bearing the names of the two cities and a likeness of King Victor. Italy's are six in number, scaling from 1 to 10 lira; while the colonies' are confined each to a 25L plus 2L.

In January, 1885, Charles George Gordon, British soldier and governor-general of the Sudan, was martyred at the famous siege of Khartum. This is the 50th anniversary of his death, and Sudan has issued three commemoratives showing his bust, the Gordon Memorial College, and the ruins of the old Governor's Palace when Khartum was recaptured by the British in 1898.

Spain offers two more portraits new to our hobby. On a 15 centimos is a likeness of Concepcion Arenal (1820-1893), a feminist, publicist, writer and penologist who aided the poor, fought for women's rights, and was a prison inspector. On a 60c appears Firmin Salvoechea (1842-1927), political revolutionist, journalist, translator, and once a mayor of Cadiz.

Fire on the Mountain

(Continued from page 5)

Chuck felt a wave of withering heat shrivel his skin. He flung up his arms to protect his face and head. He caught a glimpse of horrified faces surrounding him. Then he closed his eyes tightly.

The heat increased. It was an inferno—they'd never get through! The 766 bucked and plunged, exhausts shouting a staccato defiance to those raging flames.

Gasping for breath, Chuck waited for the end. Suddenly he heard the crackle of breaking glass as the cab windows collapsed from the heat. Hungry flames leaped into the cab, driving them all toward the right side.

Then, almost incredibly, mercifully, the flames gave way to a sweet, cool breath of air! Chuck dropped his arms and opened red-rimmed eyes under singed eyebrows. Square Jaw was sitting exactly as he had been sitting when they entered that furnace. His hair was singed, his face red and scorched, his eyes black smudges. His clothing had caught fire. He smashed the throttle shut and began methodically beating out the smoldering cloth.

Chuck grabbed the tank bucket and let himself down on the steps beside the tank valve. The water that poured out was almost hot! He twisted to look back. They were east of the fire now. Then he saw something that made him shout defiantly. The track behind had gone into a Z-shaped kink! He saw the rails move like snakes as they expanded.

With the tank bucket full of water he put out the blazing clothes of the men surrounding him. Square Jaw kept his steel charge moving rapidly toward Solar Summit.

One of the fire fighters turned to Square Jaw. "Better stop and let us off here so we can make a fire break. Take the hose on to Solar Summit with you. Leave it by the pump house. If we can't check the fire from here, we'll use the hose on it there."

Square Jaw nodded grimly and halted his engine. The men took their axes, shovels, and buckets and piled off.

Before the 766 had pulled away, the sound of axes as they bit into trees filled the air. The fire fighters were cutting a fire break in the thick forests. . . .

A smoke haze hung over Solar Summit as the 766 swayed down the main line. She passed the water tank with the B-6 standing opposite it. Tom Ryan and Mr. Bowling, faces drawn with worry, were on the observation platform of the private car. Quite unnecessarily, they motioned to the engine to couple into their car.

Chuck dropped off as the 766 rattled over the lower switch. He threw it, and Square Jaw backed in with Chuck riding the step on the rear of the tender. Chuck made a coupling between the 766 and the B-6. He quickly coupled the air hoses together and cut in the air. Then he leaped up and let off the set hand brake.

"Get us out of here, quick!" commanded Mr. Bowling.

"We will," Chuck said shortly.

"Can you make it back to Mosca?" Tom Ryan asked anxiously.

"No, sir. Tracks got a heat kink in them," answered Chuck.

Bowling dropped from the B-6 and ran ahead to speak to Square Jaw. "We're in a tight place!" he jerked. "This is a bad fire. Get us out of here fast!"

Square Jaw squinted down at him, enduring the nervous burst of words in silence.

"Understand?" barked Bowling. "Don't waste any time!"

"I wasn't plannin' to," Square Jaw snorted.

Your Ballot

WHICH stories and articles in this issue do you like best? Help the editor by writing the titles in order on the lines below, and mailing the ballot to the Best Reading Editor, The American Boy, 7430 Second Blvd., Detroit, Mich. (If you don't want to clip the magazine, we'll appreciate your making out a ballot on a sheet of writing paper. Thank you.)

1. ....
2. ....
3. ....
4. ....

NAME..

STREET..

CITY..

STATE........................ AGE........

Chuck came running up and climbed into the cab. "Tom Ryan said to tell you to go on to Westwater. We've got right over all trains to there. It's beyond the forest boundary, out of danger from the fire."

Square Jaw grunted and turned ahead. The 766 moved slowly down the sidetrack, dragging the B-6.

Chuck dropped off and threw the switch for the main line, locking it. Square Jaw waited until the boy was in the cab. Then he whistled off.

Chuck pulled out his watch and looked at the time. It was 1:15.

Square Jaw, his face lowering, started savagely toward the east. Chuck was astonished at their speed. Square Jaw soon had his charge clicking off nearly a mile post a minute.

"He's making time all right," Chuck reflected grimly. "Hope Bowling enjoys it."

They surged out on the high trestle over Dry Gulch, ripped into the cut on the other side, screamed around a sharper curve. Chuck was down in the deck firing expertly, oblivious to the swaying of the cab, sending scoop after scoop of coal through the fire-box door.

He looked up at Square Jaw. The engineer's eyes were straining ahead. He sat tensely forward on his seat box.

Cottonwood, a long sidetrack, unraveled from the main line in parallel strands of steel. Ahead was a sharper curve that tipped through the sag at mile post 562. The track crossed this sag on a thirty-foot fill.

From over sixty miles an hour Square Jaw checked their speed to fifty. The 766 swayed to the beginning of the curve.

Chuck didn't know exactly what happened next. It was all over with breath-taking suddenness. The engine seemed to lose her massive weight and leap straight into the air to soar like a bird for an appalling instant. Through a cloud of coal dust he saw Square Jaw leap to his feet, hand jerking the automatic brake valve to emergency.

Then — crash! Coal scoop, shovel, coal pick, clinker hook, and oil cans clattered around Chuck, who found himself flat on his back fighting to leap to safety. There came the sudden roar of a broken steam pipe, followed by a dull, breathless quiet — until the steam pipe roared again, this time in a steady ear-splitting screech.

Chuck got to his knees. Square Jaw was mumbling to himself within a few inches of Chuck as he dazedly struggled to rise.

Chuck was on his feet now. He stooped to lift Square Jaw and carry him from the cab.

"I'm all right," snorted Square Jaw. "Let's get out of here!"

Chuck led the way, clambering upward toward the gangway. He pulled himself to the side of the overturned tender and his gaze flashed back. His breath caught in his throat. The private car, still coupled into the 766, was lying on her side. There was no sign of life inside her.

For an instant Chuck stared at the B-6 in chilled apprehension. And in that instant he seemed to see long lines of wrecked cars, with men and women and children trapped in them, some motionless, some struggling — this thing might have happened to a heavy passenger train instead of to a single car. . . .

As the realization flashed upon Chuck, he suddenly jerked out his watch and placed it to his ear. It was still ticking, and he looked at the time. Then his lips twisted in a mirthless smile as he snatched out his time card and a pencil. In driving haste, he wrote an enigmatic thing on the edge of the card:

"Solar Summit 1:15 p.m. Fill by mile post 562, 1:27 p.m."

Then, swiftly thrusting back the time card and pencil, he leaped to the ground and raced toward the B-6. If Ryan and Bowling were both stunned or hurt or—

But then he saw the two crawling out. He found them white and shaken, but they seemed none the worse for wear.

"You're not hurt?" Chuck asked breathlessly.

"No. And you men in the cab?" barked Tom Ryan.

"All right, except for a few scratches."

"What happened?" demanded Bowling in a voice shrill from shock.

"We took a nose dive from this fill is all," Chuck answered coolly.

Bowling's pasty white face began to redden. He turned furiously on Square Jaw, who had now reached them.

"You're through!" he yelled, shaking his finger under the old engineer's nose. "Through! You've no judgment! I'll have you pulled out of service if it's the last thing I ever do. You've made the schedules of Numbers 7 and 8 the laughing stock of this whole railroad. You've defied me when I instructed you to make the time. But you've made your last trip!"

Square Jaw took it all in silence. He was still slightly dazed.

But Chuck's eyes blazed. "Wait a minute!" he said, and jerked out the time card on which he had dashed down his enigmatic notations. In a brittle tone he read them:

"Solar Summit 1:15. Fill by mile post 562, 1:27 p.m."

Bowling eyed Chuck angrily, and snapped toward Square Jaw: "Your fireman's knocked senseless!"

Chuck laughed then. "Listen, Mr. Ryan, and you too, Mr. Bowling." He opened his schedule. "I'm going to read from this now. Here's the schedule of Number 8, east bound mail train. Solar Summit, 1:15 a.m.; Westwater, 1:37 a.m." Chuck lowered the schedule. "Solar Summit is exactly twenty miles from Westwater," he went on. "The scheduled time between those two points is twenty-two minutes. This fill where we're in the ditch is just ten miles from Solar Summit. We were exactly twelve minutes getting this far. In other words Square Jaw Davis was making less than the scheduled time of Number 8 when we wrecked. And we wrecked because the track is not built up for that kind of speed. Fortunately no one was hurt today. But if it had been Number 8, you might have faced a half-million-dollar wreck!"

Grim anger had kindled in Tom Ryan's face. He turned sharply on Bowling. The color had ebbed from Bowling's big face, leaving it a panicky gray. His heavy figure had slumped in stricken realization of his overbearing blundering. But Ryan's stern eyes only grew grimmer as they surveyed the man's collapse.

"You figured out this schedule, Mr. Bowling!" he icily reminded the expert. "Is that your idea of efficiency?"

Mr. Bowling's lips moved, but no words came from them. He was trapped, and he knew it. This cool, alert young fireman had proved him useless.

"I'm going to ask for your resignation, Mr. Bowling," Tom Ryan said briefly, and then turned to Square Jaw. "I'll have that schedule lengthened to safety until we get this track built up for a higher speed!" he snapped.

Chuck was looking toward the west. "From the appearance of the sky back there," he announced, "the fire fighters have got the blaze under control—" a stirring breeze struck the left side of his face—"and that wind will turn it back on itself sure as sure!" he ended exultantly.

Square Jaw grunted. He was trying to figure exactly what Chuck had just pulled to turn the tide in his favor so abruptly.

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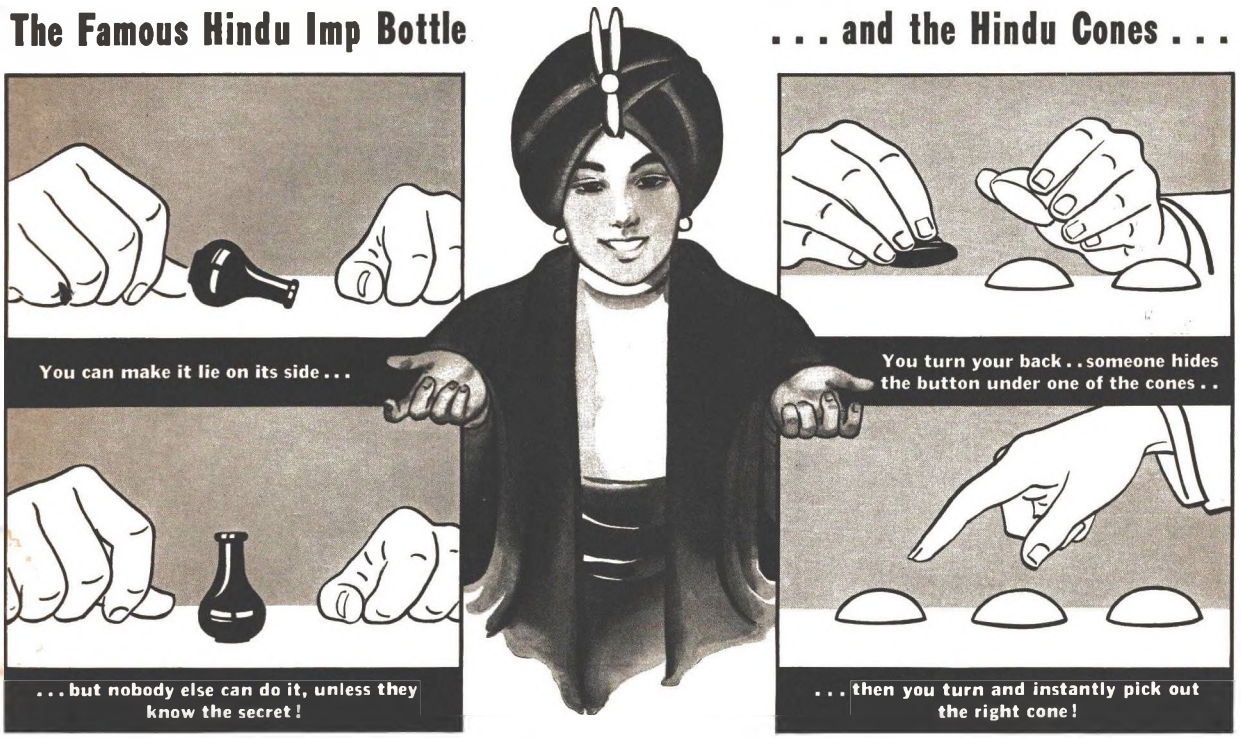

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Newly formed Apprentice Class offers opportunities to less talented boys

The fifth competition of the Fisher Body Craftsman's Guild is now under way. You have ample time, if you act quickly, to join the Guild and try for one of the four-year college courses or for one of the many cash awards. You also have an opportunity to win one of the 18 trips to the Guild Convention, in August. The competition does not close until midnight, August 1, 1935.

If you do not belong to the Fisher Body Craftsman's Guild, you are cordially invited to join now. Approximately 800,000 boys are now Guild members and the membership is increasing day by day.

Each year a number of valuable awards have been made to members who build the best model coaches.

Until now *all* competitors have been required to construct the ornate or "State" type of Napoleonic Coach; now a new opportunity is open to you.

A New Apprentice Class

This year, only the Master Class of the Guild will be asked to build the elaborate Napoleonic model.

Our newly created Apprentice Class will build a traveling coach of the same period—simpler in design—quicker and easier to create.

"The traveling coach will teach the apprentice how to handle tools," says William A. Fisher, President of the Guild. "In the next competition he should be able to construct the more difficult model."

* * * *

Read every word of this announcement carefully and then write for the complete details of this year's interesting and instructive competition.

$55,000 IN AWARDS

IN THE 1935 COMPETITION

Master Class

Napoleonic Coach Competition

SIX UNIVERSITY SCHOLARSHIPS OF FOUR YEARS EACH VALUED AT $5,000

Four scholarships will be awarded boys in the United States, two to juniors (12 to 15 years inclusive) and two to seniors (16 to 19 years inclusive).

Two scholarships will be awarded boys in the Dominion of Canada, one to a junior (12 to 15 years inclusive) and one to a senior (16 to 19 years inclusive).

* * *

Apprentice Class

Traveling Coach Competition

802 State and Regional Awards Valued at $25,000, including 18 trips to Guild Convention in August.

Sixteen Awards in EVERY STATE and District of Columbia.

Eight awards for juniors and eight awards for seniors.

1st State Award	$75 cash
2nd State Award	50 cash
3rd State Award	25 cash

Five $10 cash awards for runners up

For the equal protection of all participating in Guild competitions, it is necessarily understood and agreed that the rules and regulations of all Guild competitions and the decisions and awards of the judges are final and inviolate.

Facts About the Fisher Body Craftsman's Guild

Organized: September, 1930.

Sponsored: By General Motors Corporation, through its Fisher Body Division, to foster interest in craftsmanship and to cultivate manual skill among boys of high school age.

Fees or Dues: None.

United States Section

Eligibility: Open to all boys of the United States between the ages of 12 and 19 inclusive, in three classes of membership—Master Class, Apprentice Class, and Inactive Class.

Activities: For master craftsmen, competitions in building miniature model Napoleonic coaches for four university scholarships valued at $5,000 each. For apprentices, competitions in building miniature model traveling coaches for 802 cash and regional awards of a total value of $25,000.

Canadian Section

Eligibility: Open to all boys in the Dominion of Canada between the ages of 12 and 19 inclusive, in one class of membership.

Activities: Competitions in building miniature model Napoleonic coaches for two university scholarships valued at $5,000 each and for 24 regional awards of a total value of $1,200.

Age Divisions: Both the United States section and the Canadian section are divided into two age divisions—junior and senior. Juniors are all boys who were 12 years old or older on September 1, 1934, and less than 16. Seniors are all boys who were 16 years old or older on September 1, 1934, and less than 20. These age divisions hold for both master and apprentice classes of membership. Identical sets of awards are provided for both age divisions.

* * * *

Remember when you join the Guild there are no dues, no obligations. All you have to do is to fill in the enrollment card which we will mail you gladly. So write today—let us send you full particulars regarding the Guild and its many advantages to you.

As soon as we receive your enrollment card—properly filled in—we will mail you your membership card, the official Guild button to wear in your coat and complete scale drawings and instructions for constructing the model coach that you elect to build.

Write today—the competition closes midnight August 1, 1935. Address your postcard or letter to:

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