

A. Bertram Chandler

Up to
the
Sky
in
Ships



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Up to the Sky in Ships is published to commemorate A. Bertram Chandler's appearance as Guest of Honor at Chicon IV, the fortieth world science fiction convention. This book contains seven undeservedly obscure stories, including "Chance Encounter", the first story in which John Grimes (Chandler's most famous character) appears, and "A New Dimension", set in an alternate world in which Ned Kelly uses unusual tactics to win Australia's war for independence.

A. Bertram Chandler is a retired officer of the Australian Merchant Marine; he has been writing science fiction since 1945, producing some 31 novels and over 150 shorter stories, many of them drawing on his seagoing experience and the possible similarities between traveling Earth's oceans and traveling in space

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Up
to the Sky
in Ships

Up to the Sky in Ships

A. Bertram Chandler

A CHICON IV PUBLICATION

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This collection of stories is published in conjunction with A. Bertram Chandler's appearance as Professional Guest of Honor at Chicon IV, the fortieth World Science Fiction Convention. Most of you who read this book will be familiar with Chandler's work—or at least with John Grimes, the spacefaring officer with a skill for turning problems to his advantage and an appetite for good food. Many of you feel this honor is due—if not overdue.

On the other hand, most of you probably aren't familiar with the stories in this book. We looked through various sources and found an even hundred pieces that were short enough to fit in a book of this size and that had never been reprinted (discounting concurrent publication in different magazines in the U.S. and Britain); quite a few of them definitely were *undeservedly* neglected. So instead of the *n*th reprint of "The Cage" (a fine story with which all of you should already be familiar) this book includes:

- "Chance Encounter", the first story in which Grimes appears (and which, for some reason, has never been published in the U.S. at all);

- "Haunt", one of Chandler's relatively few out-and-out fantasies;
- "A New Dimension", an alternate-world story (again, something Chandler is less known for) published last year in Australia;

and four other stories picked with some difficulty from a great number that ought to be reprinted. As one of the bases for the final selection was variety, it's not certain that everyone will like every story, but the seven assorted people who helped choose the contents are confident that everyone will be pleased by several of the items presented.

Several people contributed much of their time to make this book possible. In addition to all the people named below, Ann McCutchen and Jim Burrows read the results of our first winnowing of the stories; Mark Olson and Rick Katze did much of the typing; George Flynn read and summarized every one of the hundred eligible stories; and Greg Thokar was my primary assistant.

—Chip Hitchcock
Cambridge, Mass.
June 15, 1982

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Chance Encounter

WE PAID OFF ON Faraway, having brought the old *Epsilon Pavonis* all the way across the Galaxy to hand her over to her new owners, Rim Runners Incorporated. The Commission's branch manager booked us in at the Rimrock House, one of the better hotels in Faraway City. All that we had to do was to wait for the arrival of *Delta Bootis*, in which vessel we were to be shipped back to Earth. The services to and from the Rim Worlds are far from frequent and none of the big passenger liners ever call there; they are not planets that one would ever recommend for a vacation. There's that dreariness, that ever-present sense that one is hanging by one's eyebrows over the very edge of the ultimate cold and dark. The cities on none of the Rim Worlds are cities, real cities, but only overgrown—and not so very overgrown at that—provincial towns. The people are a subdued mob who take their pleasures sadly and their sorrows even more sadly. Somebody once said that the average Rim World city is like a graveyard with lights. He wasn't so far wrong.

Delta Bootis was a long time coming. She was delayed on

Waverley by a strike, and then she had to put in to Nova Caledon for repairs to her Mannschenn Drive unit. Some of us didn't worry overmuch—after all, we were being paid, and well paid, for doing nothing, and the branch manager was footing our weekly bill without a murmur. Some of us worried a lot, even so. In the main, with one exception, it was the married men who were doing the worrying.

The one exception was Peter Morris, our P.R.O.—Psionic Radio Officer to you—our bright young man from the Rhine Institute, our tame telepath. Yet he was single, and so far as any of us knew, had no girl waiting for him on any of the colonized worlds or on Earth. But if there had been a first prize for misery he would have won it.

I liked Peter. During the run out we had formed a friendship that was rather unusual between a telepath and a normal human being—or, as the average graduate of the Institute would put it, between a normal human being and a psionic deficient. I liked Peter, I suppose, because he was so obviously the odd man out and I have a strong tendency towards being odd man out myself. So it was that during our sojourn on Faraway we developed the routine of leaving the others to prop up the bar of the Rimrock House while we, glad to get away from the reiteration of the bawdy jokes and boring personal anecdotes, wandered away from the hotel and through the city, finding some small pleasant drinking place where we could sip our beer in relative peace and quiet.

We were in such a place that morning, and the drinks that we had imbibed had done nothing at all to cheer Peter up. He was so gloomy that even I, who am far from being a cheerful type myself, remarked upon it.

"You don't know what it's like, Ken," he told me. "As a

psionic deficient you'll never know. It's the aura of... of... Well, there's fear, and there's loneliness, and a sort of aching emptiness, and together they make up the *feel* of these Rim Worlds. A telepath is always lonely until, if he's very lucky, he finds the right woman. But it's so much worse here."

"There's Epstein, the P.R.O. at the port," I said. "And there's Mrs. Epstein. Why don't you see more of them?"

"That," he declared, "would make it worse. When two telepaths marry they're a closed circuit to an extent that no p.d. couple can ever be..." He drank some more beer. "Finding the right woman," he went on, "is damned hard for us. I don't know what it is, but the average Esper female is usually frightfully unattractive, both mentally and physically. They seem to run to puddingy faces and puddingy minds... You know, Ken, I needn't have come on this trip. There are still so few of us that we can afford to turn down assignments. I came for one reason only—just hoping that by making a voyage all the way across the Galaxy I'd find somebody."

"You still might on the way back," I told him.

"I still might not," he replied.

I looked at him with a rather irritated pity. I could sense, after a fashion, what he was driving at. He was so much the typical introvert—dark of hair and face, long and lean—and his telepathic talent could do nothing but add to the miseries that come with introversion.

"You'd better have something stronger," I told him. I caught the bartender's eye. "Two double whiskies, please."

"Make that three," said a too hearty voice. I looked around, saw that Tarrant, our Second Mate, had just come in.

"Got tired of the same old stories at last?" I asked unkindly.

"No," he said. "But somebody had to go to find you two, and I was the most junior officer present, so..."

"Who wants us?" I demanded. "And why?"

"The Old Man wants you." He lifted his glass. "Here's to crime."

"What does he want us for?"

"I don't know. All that I know is this. Some meteor-pitted old bastard calling himself Captain Grimes came barging into the pub and demanded an audience with our lord and master. They retired to confer privily. Shortly thereafter the call for all hands to battle stations went out."

"Grimes . . .," I said slowly. "The name rings a bell. I seem to remember that when we handed the old *Eppy Swan* over somebody mentioned that Captain Grimes, the Chief Superintendent for Rim Runners, was away on Thule."

"Could be," admitted Tarrant. "He has the look of a chairborne spaceman. In which case we'll have another drink. It's bad enough having to run to the beck and call of our own supers without having to keep those belonging to a tuppenny ha'penny concern like Rim Runners happy."

We had another drink, and another. After the third whisky Peter's gloom seemed to be evaporating slightly, so he ordered a fourth one. The Second Mate and I each ordered another round, after which we thought that we had better discover what was cooking. We walked rather unsteadily into the untidy street, hailed a ground cab and were driven back to the Rimrock House.

We found them all waiting for us in the lounge—the Old Man and the rest of the officers, the chunky little man whose appearance justified Tarrant's description of him as a "meteor-pitted old bastard."

"Sir," said the Old Man stiffly, "here are my Third Officer, Mr. Wilberforce, and my Psionic Radio Officer, Mr. Morris. I have no doubt that they will show as little enthusiasm for you

project as any of my other officers. Yours is essentially a Rim World undertaking, and should be carried out by Rim World personnel."

"They can decide, sir," said Captain Grimes. "You have told me that these officers have no close ties on Earth or elsewhere; it is possible that they may find the proposition attractive. And, as I have already told you, we guarantee repatriation."

"What is it all about, anyhow?" asked Tarrant.

"Sit down, gentlemen," said Grimes, "and I'll tell you." While we were finding chairs he filled and lit a foul pipe. "I'll have to recapitulate for your benefit; I hope that the rest of you don't object.

"Well, as you are no doubt aware, we of the Rim Worlds consider ourselves the orphans of the Galaxy. You know why these planets were colonized in the first instance—the Central Government of those days feared an alien invasion sweeping in from outside the Galaxy. The general idea was to set up a huge ring of garrisoned planets, a fortified perimeter. That idea has died over the years and, as a result, only a very small arc of the Rim has been explored, even.

"We of the Rim Worlds wish to survive as a separate, independent entity. Starved as we are of trade and shipping, we have little chance of surviving at all. So it has been decided that we take our own steps, in our own way, to achieve this end.

"You've heard, of course, of the odd pieces of wreckage that come drifting in, from time to time, from *somewhere*. It was such flotsam that first gave the Central Government the idea that there might be an invasion from some other galaxy. Now, we don't think that those odd bits and pieces ever did come from outside. We think that there are inhabited planets all around the Rim, and that advantageous trade would be possible with them.

"For years we've been trying to persuade the brass hats of the

Survey Service to carry out a systematic exploration, but the answer's always the same. They haven't the ships, or they haven't the men, or they haven't the money. So, at last, we have decided to carry out our own exploration. Your old ship, *Epsilon Pavonis*, is being fitted out for the job. She's being renamed, by the way — *Faraway Quest*. . . .”

“And what,” asked Tarrant, “has this to do with us?”

Captain Grimes hesitated, seemed almost embarrassed. “Frankly,” he said, “the trouble is this. We don't seem to breed spacemen, real spacemen, on the Rim Worlds. Puddle jumpers, that's all they are. They'll venture as far as Ultimo, or Thule, or the Shakespearean Sector, but they just aren't keen to fare any further afield. . . .”

“There's too much fear on these worlds.” said Peter Morris suddenly. “That's the trouble. Fear of the cold and the dark and the emptiness. . . .”

Grimes looked at him. “Of course,” he said, “you're the telepath. . . .”

“Yes, I'm the telepath. But you don't need to be any kind of an Esper to sense the fear.”

“All right then,” said Grimes. “My own boys are just plain scared to venture so much as a single light-year beyond the trade routes. But I've got a Master for *Faraway Quest*—myself. I've a Purser, and Chief and Second Mannschenn Drive Engineers, and one Rocket Engineer. I've a Chief Officer and a Surgeon-cum-Biochemist, and an Electronic Radio Officer. All of us are from the Center, none of us was born out here, on the Rim. But this is a survey job, and I shall need a well-manned ship.

“I can promise any of you who volunteer double your current rates of pay. I can promise you repatriation when the job is over, to any part of the Galaxy.”

“Most of us,” said our Captain, “have homes and families

waiting for us. We've been out for too long now."

"You're sure that there are inhabited worlds out along the Rim?" asked Peter. "What of their people?"

"Purple octopi for all I know," replied Grimes.

"But there's a chance, just a chance, that they might be humanoid, or even human?" insisted the Psionic Radio Officer.

"Yes, there's a chance. Given a near infinitude of habitable worlds and an infinitude of time for evolution to take its course, then anything is possible."

"The purple octopi are more probable," I said.

"Perhaps," almost whispered Peter. "Perhaps But I have limited, very limited, premonitory powers, and I have a definite feeling that"

"That what?" I asked.

"Oh, never mind." To Grimes he said, "I take it that you can use a P.R.O., Captain?"

"That I can," declared Grimes heartily.

I sighed. "Your offer about double the pay," I said. "I'm Third Officer in the Commission's fleet, as you know. If I come with you as Second, do I get twice the Commission's rate for that rank?"

"You do."

"Count me in," I said.

"You must be mad," said Tarrant. "Both of you—but Wilberforce is less mad than Morris. After all, he's doing it for money. What are *you* doing it for, Crystal Gazer?"

"Mind your own business!" he snapped.

Some hours later, when we were out at the spaceport looking over the structural alterations that were being made to *Faraway Quest*, I asked him the same question.

He flushed. "What do people do things for, Peter?"

"Money," I replied. "Or power. Or"

"Precisely," he said, before I could finish. "It's only a hunch,

but I have a strong feeling that this is the chance, the only chance, to find *her*."

I remember that I said, "I hope you're right."

Delta Bootis dropped down at last to Port Faraway, and all of our shipmates, openly jubilant, boarded her. We saw them off, Peter and I. We had our last drinks with them in the little smoking room and then, feeling rather lost and lonely (at least, I did), scrambled out of the airlock and down the ramp as the last warning bell started to sound. We stood with the other spectators at a safe distance from the blast-off area, watched her lift on her column of pale fire, watched her vanish into the clear, twilit sky. With her departure I realized the irrevocability of my action in volunteering for this crazy survey voyage. There was no backing out now.

We walked to the corner of the field where work was still progressing on *Faraway Quest*. Outwardly she was little changed, except for the addition of two extra boat blisters. Internally she was being almost rebuilt. Cargo space was being converted into living accommodation. In spite of the shortage of trained space-faring personnel, Grimes had found volunteers from other quarters. Two professors of physics from Thule City were signing on as assistant engineers, and there were three astronomers from Ultimo as well as a couple of biologists. Grimes—who, we had learned, had served in the Survey Service as a young man—had persuaded the local police force to lend him three officers and fifty men, who were being trained as Space Marines. It began to look as though *Faraway Quest* would be run on something approaching Survey Service lines.

We looked at her, standing tall and slim in the light of the glaring floods.

I said, "I was a little scared when I watched *Delta Bootis* blast

off, Peter, but now I'm feeling a little happier."

"I am too," he told me. "That... that hunch of mine is stronger than ever. I'll be glad when this old girl is ready to push off."

"I don't trust hunches," I told him. "I never have, and never will. In any case, this female telepath with the beautiful mind you're hunting for may turn out to be nothing but a purple octopus."

He laughed. "You've got purple octopi on the brain. To hear you talk, one would think that the Galaxy was inhabited by the brutes...."

"Perhaps it is," I said. "Or all the parts that we haven't explored yet."

"*She* exists," he told me seriously. "I know. I've dreamed about her now for several nights running."

"Have you?" I asked. Other people's dreams are, as a rule, dreadfully boring, but when the other person is a telepath with premonitory powers one is inclined to take some interest in them. "What did you dream?"

"Each time it was the same," he said. "I was in a ship's boat, by myself, waiting for her to come to me. I knew what she was like, even though I'd never actually met her. She wasn't quite human. She was a little too tall, a little too slim, and her golden hair had a greenish glint to it. Her small ears were pointed at the tips. As I say, I knew all this while I sat there waiting. And she was in my mind, as I was in hers, and she was saying, over and over, *I'm coming to you, my darling*. And I was sitting there in the pilot's chair, waiting to close the outer airlock door as soon as she was in...."

"And then?"

"It's hard to describe. I've had women in real life as well as in dreams, but never before have I experienced that feeling of utter and absolute oneness...."

"You're really convinced, aren't you?" I said. "Are you sure that it's not autohypnosis, that you haven't built up from the initial hunch, erecting a framework of wish-fulfillment fantasy?"

"I'd like to point out, Ken," he said stiffly, "that you're a qualified astronaut, not any sort of psychologist. I'd like to point out, too, that the Rhine Institute gives all its graduates a very comprehensive course in psychology. We have to know what makes our minds tick—after all, they are our working tools."

"Sorry," I said. "The main thing is that you feel reasonably sure that we shall stumble across some intelligent, humanoid race out there."

"Not reasonably sure," he murmured. "Just certain."

"Have you told Grimes all this?"

"Not all, but enough."

"What did he say?"

"That I was in charge of communications, not prognostications, and that my most important job was to see to it that my amplifier was healthy and functioning properly."

We all had to stand out on the field in a cold drizzle while the Presidents of Faraway, Ultimo and Thule made their farewell speeches. We were drawn up in a rather ragged line behind Captain Grimes, dapper in uniform, very much the space captain. The ex-policemen, the Marines, were a little to one side, and made up for what we lacked in the way of smartness. At last the speechmaking was over. Led by Grimes we marched up the ramp to the airlock, went at once to our blasting-off stations. In the control room Grimes sat chunkily in his acceleration chair with Lawlor, his Chief Officer, to one side of him. My own chair was behind theirs, and at my side was Gavin, one of the astronomers from Ultimo, who was on the ship's books as Third Officer.

Reports started coming in. "Interplanetary Drive Room—

manned and ready!" "Interstellar Drive Room—manned and ready!" "Hydroponics—all secured!" "Steward's store—all secured!"

"Mr. Wilberforce," ordered Grimes, "request permission to proceed."

I spoke into the microphone of the already switched-on transceiver. "*Faraway Quest* to Control Tower, *Faraway Quest* to Control Tower. Have we your permission to proceed?"

"Control Tower to *Faraway Quest*. Permission granted. Good luck to all of you!"

Gavin was counting aloud, the words carried through the ship by the intercom. "Ten... Nine... Eight... Seven..." I saw Grimes's stubby hand poised over the master firing key. "Six... Five... Four..." I looked out of the nearest viewport, to the dismal, mist-shrouded landscape. Faraway was a good world to get away from, to anywhere—or even nowhere. "Three... Two... One... *Fire!*"

We lifted slowly, the ground falling away beneath us, dropping into obscurity beneath the veil of drifting rain. We drove up through the low clouds, up and into the steely glare of Faraway's sun. The last of the atmosphere slipped, keening shrilly, down our shell plating and then we were out and clear, with the gleaming lens of the Galaxy to one side of us and, on the other, the aching emptiness of the Outside.

For long minutes we accelerated, the pseudo-gravity forcing us deeply into the padding of our chairs. At last Grimes cut the drive and, almost immediately, the thunder of the rockets was replaced by the high, thin whine of the ever-precessing gyroscopes of the Mannschenn unit. The Galactic Lens twisted itself into an impossible convolution.

The emptiness Outside still looked the same.

That emptiness was with us all through the voyage.

Star after star we circled; some had planetary families, some had not. At first we made landings on all likely-looking worlds, then, after a long succession of planets that boasted nothing higher in the evolutionary scale than the equivalent to the giant reptiles of Earth's past, we contented ourselves by making orbital surveys only. Peter succeeded in talking Grimes into entrusting him with the task of deciding whether or not any planet possessed intelligent life—and, of course, cities and the like could be spotted from space.

So we drove on, and on, settling down to a regular routine of Interstellar Drive, Interplanetary Drive, Closed Orbit, Interplanetary Drive, Interstellar Drive, Interplanetary Drive.... Everybody was becoming short-tempered. Grimes was almost ready to admit that the odd pieces of flotsam falling now and then to the Rim Worlds must have come from Outside and not from somewhere else along the Rim. Had our purpose been exploration as a prelude to colonization, we should have felt a lot more useful—but the Rim Worlds have barely enough population to maintain their own economies.

Only Peter Morris maintained a certain calm cheerfulness. His faith in his hunch was strong. He told me so, more than once. I wanted to believe him but couldn't.

Then, one boring watch, I was showing Liddell, one of the astronomers, how to play three-dimensional noughts and crosses in the Tri-Di chart. He was catching on well and I was finding it increasingly hard to beat him when suddenly the buzzer of the intercom sounded. I answered it. It was Peter, speaking from his Psionic Communications Room.

"Ken!" he almost shouted. "Life! Intelligent life!"

"Where?" I demanded.

"I don't know. I'm trying to get a rough bearing. It's in towards the Lens from us, that much I can tell you. But the bearing doesn't seem to be changing."

"No parallax?" asked Liddell. "Could it be, do you think, a ship?"

"It just could be," I said doubtfully.

"Ken, I think it's a ship!" came Peter's voice. "I think that they, like ourselves, have Psionic Radio.... Their operator's vaguely aware of me, but he's not sure.... No—it's not he.... It's a woman; I'm pretty certain of that.... But it's a ship all right. Roughly parallel course, but converging..."

"Better tell old Grimy," I suggested, hastily clearing the noughts-and-crosses lattice from the Tri-Di chart. To Liddell I said, "I'm afraid Peter's imagining things. Not about the ship—she's probably a stray Survey vessel—but about the female operator. When psionic radio first started we used to carry them, but the average woman telepath is so unintelligent that they were all emptied out as soon as there were enough men for the job."

"It could be an alien ship," said Liddell.

"It could be, but it's not," I said. "Unless, of course, it belongs to one of the alien races with whom we've already made contact. It could be a Shaara vessel—that would account for Peter's female telepath. The Shaara are social insects, and all the work is done by the females."

Captain Grimes came into the control room. He looked almost happy. "Contact at last," he said.

"Suppose they are aliens," said the astronomer, "and suppose they open fire on us.... What then?"

"By the time people get around to building interstellar ships," said Grimes, "they've lost the habit of wanting to fight strangers."

"Sometimes," I said.

"Switch on the Matter Proximity Indicator," he said.

I did so, peered into the globe that was its screen.

"There's something....," I said. "Red 085, ZD 093...."

"A little astern," murmured the Old Man. "Range?"

I manipulated the controls carefully. "Twenty thousand—and closing. Relative bearing not altering."

"Liddell," said the Captain. "You're an astronomer, a mathematician. What are the odds against this? With all the immensity of Space around us we have two ships approaching on collision orbits. The other ship is using a similar drive to ours—she must be. If her rate of temporal precession were more than one microsecond different from ours she would not register on our screens, and there'd be no risk of collision. What are the odds?"

"Astronomical," replied Liddell drily. "But I'll tell you this, although you must, by this time, have come to the same conclusion. There's a Law of Nature that you'll not find in any of the books, but that is valid just the same. If a coincidence can happen, it will."

"I'll buy that," said Grimes.

Peter's voice came from the squawk box. "I've established contact. She's an alien ship, all right. She belongs to some people called the Lowanni. She's a trading vessel, analogous to one of our Beta Class ships. Her captain wishes to know if he may close us to make contact."

"Tell him *yes*!" almost shouted Grimes. "Mr. Willoughby—sound the General Alarm. I want all hands at stations. Damn it, this is just what we've been hunting for! Neighbors along the Rim..."

I sounded the Alarm. The ship hummed like a disturbed beehive as one and all hastened to their stations. The reports began coming in: "Rocket Drive manned and ready... Electronic Radio Office manned and ready... Surgeon and Biochemist standing by for further instructions..." The Chief and Third Officers, together with the other astronomer, pulled themselves into the already crowded control room.

It seemed only a matter of minutes—although it was longer—before the alien ship was within telescopic range. Just a little silvery dot of light she was at first, hard to pick up against the gleaming convoluted distortion of the Galactic Lens. And then, slowly, she took shape. There was little about her appearance that was unusual—but any spaceship designed for landings and blastings-off through an atmosphere must, of necessity, look very like any other spaceship.

Meanwhile, our Electronic and Psionic Radio departments were working together. I still don't know how Peter Morris and his opposite number in the alien ship managed to sort out details of frequency and all the rest of it, but they did. It may be, of course, that mathematics is the universal language—even so, it must have been quite a job for the two telepaths to transmit and receive the electronic technicalities.

They came into the control room then—Peter Morris and Sparks. Sparks busied himself with the big intership transceiver, twisting dials and muttering. Peter whispered occasional instructions.

The screen came to life. It showed the interior of a control room very like our own. It showed a group of people very like ourselves. They were in the main slimmer, and their features were more delicate, and their ears had pointed tips, but they were human rather than merely humanoid.

One of them—his black-clad shoulders were heavily encrusted with gold—said something in a pleasant tenor voice. The girl standing beside him seemed to be repeating what he was saying; her lips moved, but no sound came from them.

"Captain Sanara says, 'Welcome to the Dain Worlds,' " said Peter.

"Tell him, 'Thank you,' " said Grimes.

I saw the girl in the alien ship speak to the Captain. She must,

I thought, be their P.R.O. I remembered, suddenly, what Peter had told me of those dreams of his before we left Faraway. *She was a little too tall, and a little too slim, and her golden hair had a greenish glint to it. Her small ears were pointed at the tips. . . . And she has a wide generous mouth, I thought, and in spite of the severity of her uniform she's all woman. . . .* I looked at Peter. He was staring into the screen like a starving man gazing into a restaurant window.

Shortly thereafter it became necessary for the two ships to cut their interstellar drives—alterations of course are impossible while the Drive is in operation, and an alteration of course there had to be to avert collision. During the operation the image on the screen blurred and wavered and, at times, vanished as the two rates of temporal precession lost their synchronization. Peter, I could see, was on tenterhooks while this was taking place. He had found, thanks to an utterly impossible coincidence, his woman; now he dreaded losing her.

He need not have worried. Grimes was an outstanding astronaut, and in all probability the alien Captain was in the same class. The other ship flickered back into view just as the Galactic Lens reappeared in all its glory. Our directional gyroscopes whined briefly, our rockets coughed once. Through the port I saw a short burst of pale fire at the stern of the alien—then we were falling through space on parallel courses with velocities matching to within one millimeter a second.

Time went by. Through the telepaths the two Captains talked. We heard about the Dain Worlds, whose people were relative newcomers into deep space. We heard about their social and economic systems, their art, their industries. As we listened we marveled. These people, the Lowanni, were our twins. They thought as we did and acted as we did, and their history in most ways paralleled our own. I knew what Grimes was

thinking. He had made up his mind that the Rim Worlds had far more in common with these aliens than with the crowded humanity at the Galactic Center. He was thinking of more than trade agreements, he was thinking in terms of pacts and treaties.

Even so, trade was not to be sneezed at.

They talked, the two Captains. They discussed an interchange of gifts, of representative artifacts from both cultures. It was when they got to this stage of the proceedings that they struck a snag.

"There are," said our Doctor coldly, "such things as microorganisms. I would point out, Captain, that it would be suicidal folly to allow an alien to board this ship, even if he kept his spacesuit on. He might carry something that would wipe all of us out—and might carry something back with him that would destroy both himself and all his shipmates."

Peter broke in. "I've been talking with Erin," he said.

"Erin?" asked the Old Man.

"That's her name, sir. She's the alien P.R.O. We've decided that the exchange of artifacts is necessary, and have been trying to work out a way in which it would be carried out without risk. At the same time, it means that both parties have a guinea pig. . . ."

"What do you mean, Mr. Morris?"

"Let me finish, sir. This ship, as you know, has only one airlock, but carries more boats than is necessary. *Listra*—the ship out there—has the normal complement of boats for a vessel of her class but has no less than four airlocks, two of which are rarely used. This is the way we've worked it out. One of our boats, and one of *Listra's* airlocks, can be used as isolation hospitals. . . ."

"I can handle a boat, sir, as you know, compulsory for every non-executive officer in the Commission's service to hold a lifeboatman's certificate. The idea is this. I take the boat out to

midway between the two ships, carrying with me such goods as we are giving to the aliens. Erin comes out in her spacesuit, bringing with her what the aliens are giving to us. Then she returns to her ship, and I bring the boat back to this ship. She will remain in the airlock, as I shall remain in the boat, until such time as it is ruled that there is no danger of infection. . . .”

I looked at the screen. I saw that the slim, blonde girl was talking earnestly to Captain Sanara. I saw other officers joining in the discussion. I looked back from the screen to Captain Grimes. His dark, mottled face was heavy with misgivings. I heard him say, “This could be suicide, Mr. Morris.”

“It could be, sir—but so could coming out on an expedition like this. And you know as well as I do that very few alien microorganisms have been found that are dangerous to man. All that it means, essentially, is that Erin and I will have to do our jobs in rather uncomfortable conditions from now on.”

“Why you, and why Erin?”

“Because we’re the telepaths. Suppose, for example, you send a tube of depilatory among the other goods to be exchanged. Erin’s people might think that it’s toothpaste, or mustard, or . . . or anything at all but what it is. When we’re together in the boat we can explain things, talk things over. We’ll get more ground covered in half an hour together than we should in half a week, talking ship to ship. . . .”

“You’ve got it all worked out, haven’t you?” grumbled Grimes. “But on a job of this sort it’s foolish to discourage an enthusiastic volunteer. . . . Well, I suppose that the rest of you had better start collecting artifacts. Books, and tools, and instruments, samples of our food and drink. . . .”

“You mean it’s all right, sir?” asked Peter, his face suddenly radiant.

“Mr. Morris, if this were a commercial vessel I’d never allow

one of the officers to take such a risk. If you like you can tell that girl that I take a dim view of her Captain for allowing her to take the risk. . . ."

"She doesn't think of it that way."

"Doesn't she? Then she should."

"Can I get ready, sir?"

"You can. Don't forget to brush your hair and wash behind your ears — after all, you have acting temporary ambassadorial status."

"Thank you, sir."

Peter vanished from the control room as though he had added teleportation to his other talents. Grimes sighed and looked at the screen, looked at the radiant girl who was, obviously, thanking her Captain. He sighed again and demanded, of no one in particular, "Who said it?"

"Who said what?" asked the Chief Officer.

"Journeys end in lovers' meetings," said Grimes.

It was all so obvious, even to non-telepaths.

I was in the boat with Peter shortly before he blasted off.

I said, "You seem pretty certain."

"Of course I'm certain. And she was lonely too, just as I have been. Among her people they have a similar set-up to ours, but in reverse. With them it's usually the male telepath who's an unattractive, mindless clod. This chance encounter means a lot to both of us."

"She's an oxygen breather?" I asked. "You're sure of that? I mean, if she comes in here and takes off her helmet and our atmosphere poisons her. . . . I don't want to be pessimistic, but I believe in facing facts."

"She's an oxygen breather," Peter assured me. "She eats food very much like ours. (I hope she likes chocolates — I've got some

here.) She drinks alcoholic liquor in moderation. She smokes, even. She can try one of our cigarettes and I'll try one of hers. . . ."

"You've found out a lot in a short time, haven't you?"

"Of course I have. That's my job—and hers. But I'll have to ask you to leave me, Ken. I've got a date."

Are you sure you wouldn't like me to come along?"

"Not bloody likely!" he snapped.

"All right, then. And the best of luck."

"Thanks," he said.

I stood by the blister until I felt the shock of his blasting off, until the red READY light changed to green, showing that he was out and clear. I made my way back to Control. I joined the group at the port watching the little spacecraft coasting out and away from us, watched her take up a position roughly midway between the two ships.

We saw a circle of yellow light suddenly appear on *Listra's* sleek side. We saw, through telescopes and binoculars, the little figure that hung there for a while in black silhouette. We could make out the bulky bundle that she was carrying.

Flame jetted from her shoulder units, and she was falling out and away from her own ship. Slowly she approached the lifeboat. I looked away briefly, looked at the screen. The aliens, like ourselves, were crowded around viewports, were watching this first physical contact between our two races.

She was very close to Peter's boat now. I could imagine him waiting in the little cabin, as he had waited—how many times?—in his dream. I could appreciate, dimly, what he must be feeling. I had been in love myself and had waited for the loved one, and what I had felt must be no more than a pale shadow of what is felt by a telepath. There was, I confess, more than a little envy in my thoughts.

She was very close to the boat, and I saw that Peter had the outer door of the little airlock open.

For a long second she was silhouetted against the glow of the airlock light. . . .

And then . . .

And then I was blind, as the others were blind, with tears welling from my eyes, the skin of my face burning from its exposure to radiation. She had been there, just entering the boat, and then she and the boat had vanished in one dreadful flash.

Slowly sight returned, dim and painful. I was looking once again at the screen, and I could see that those in the other ship had been affected as we had. There was pain on their faces, and it was not only physical pain. I knew then—as they must have known as they looked at us—that this had been no act of treachery, that there had been no murderous bomb concealed among the package of bartered goods.

Slowly the alien Captain shrugged his shoulders. He made a gesture of rejection with his slim hands. One of his officers handed him something. It was a black glove. He put it on. Slowly he brought his hands together—the white-skinned one and the black-gloved one. He flung them apart explosively.

The screen went blank. We looked away from it through the port. The alien ship was gone.

"We should have guessed," Liddell was muttering. "We should have guessed. *They* did."

"But too late," said one of the others.

"What should we have guessed?" asked Grimes.

"Anti-matter," said Liddell. "We've known for centuries that it can exist. Matter identical with what we call normal matter, except that all electrical charges are reversed. We thought that we might find it in other galaxies if ever we had a

ship capable of making the journey.... But perhaps the Dain Worlds aren't really part of this galaxy at all."

"And when it comes into contact with normal matter?" pressed Grimes.

"You saw, Captain. There can never, *never*, be any contact between the Lowanni and ourselves."

"And what happens," I asked, "when it's two living bodies of the two kinds of matter that make the contact?"

"You saw," said Liddell.

But I was not satisfied with the answer, and am still not satisfied. I remembered what Peter had told me about the conclusion of his dream, and have yet to decide if he was the unluckiest or the luckiest of men.

Haunt

TO BEGIN WITH, I'VE an open mind on these matters. I won't go so far as to say that I believe—on the other hand, I'd rather not disbelieve. There are more things in Heaven and Earth—but you can finish it. You'll probably get it wrong, too.

Cowling, on the other hand, is definitely enthusiastic. He always knows at least six mediums—and every time that one of them is proved a fraud he finds somebody else to make the number up. He had one in tow that night at the Dun Cow. The Dun Cow, by the way, is a pub not far from Fleet Street where we all meet once weekly—"we" being a bunch of like-minded people all involved in one way or another in the fantasy racket. Some of us write it, some of us publish it, and some of us sell it. Some of us are members of rocket societies, some of psychic research societies, and some of both.

Well, this particular night things were as usual. In one corner the paper astronauts were arguing about the respective merits of nose and tail drive for their space rockets, drawing diagrams in spilled beer on the table top. In another corner Turner and Whitley were telling each other what baskets editors are. And

in yet another corner Gilbert and Chase, both editors, were presumably giving writers a similar going over.

While I was wondering whether to join the rocketeers or the scribblers, Cowling buttonholed me. He told me that he'd like me to meet a friend of his—Mrs. Canardi he said her name was—a medium. A *good* medium, he told me. Really good. She'd produced some *remarkable* results. . . . I looked at her where she was sitting by herself, a little out of place among the chatter of rates and rights, mass ratios and escape velocities, drinking her port-and-lemon. That was in character. So was her appearance—the drab neutrality, the rather smeary dullness, that seems so often to go with psychic gifts. All the others there had a certain flamboyance, the large slice of ham that is invariably a part of the make-up of the minor artist. She was a grey little peahen among a flock of somewhat phoney peacocks. And yet, I couldn't help thinking, we wrote fantasy—she lived it.

Perhaps, I added.

She was pleased to meet me, she said. And, yes, she would have another port-and-lemon. When I asked her how was trade, she froze up.

Cowling drew me apart and whispered to me. No, he insisted, Lily didn't do it professionally. She was a dentist's nurse. But she was well known in psychic circles, very well known. She has—*gifts*, gifts that very few mediums had. *No* other mediums, as far as he knew. . . .

What gifts? I asked.

Cowling asked Lily if she'd mind if he told me. She said, no, she wouldn't. I may have been wrong—but I rather gained the impression that she would have minded if he hadn't. Cowling said, "Look at this!" He pulled out his notecase, took from it a somewhat dirty and crumpled sheet of paper. Somebody had been writing on it with a typewriter well equipped with a very

worn ribbon and remarkably clogged and dulled type. It seemed to be a report of some seance somewhere in South London—Mrs. Canardi officiating. The star turn had been a Japanese—I wondered whether he had been English-speaking before his death or if he had acquired his linguistic ability after his demise. He had said his piece in English, at any rate. And it hadn't been a very nice piece. I thought, at the time, that it might have been lifted, almost word for word, from Hersey's *Hiroshima*...

Even so...

It was interesting, I admitted, and asked Mrs. Canardi if she specialized in Japanese "controls" or 'guides' or whatever the jargon is. At this point Cowling got very excited. His sparse hair literally bristled with indignation. "You've missed the point," he yelled. "You've missed the point. Look at the *date*!"

So I looked at the date. May 17 I think it was. 1944.

1944?

But the Bomb had finished the War in 1945...

"Pull the other one," I told Cowling, "it's got bells on."

He told me not to try to be funny. He asked me if I'd read Dunne. He wanted to know if there were any reason why a ghost shouldn't come from the *future*. After all, he pointed out, Dunne gives us the idea that, after death, the spirit is freed from the limitations of the body, is free to wander all the dimensions at will. *All* the dimensions. The Fourth, Fifth, and as many more as you care to mention. What about premonition, precognition, and all the rest of it? What about premonitory dreams?

Well, he had something there.

I didn't like to say what it was, though, there were ladies present. And I was rather intrigued by this medium of his—she was the first one I had met, or heard of, who had claimed to be able to do any tinkering with Time. Or, at least, the first I'd heard of to tinker with Time in that particular way. This fakery had, at least, the charm of novelty.

Had she, I asked, been able to get into contact with any other spirits from the Future? A rocket pilot, for example? A Martian colonist?

This time she answered. Her voice was high, and slightly unpleasant—otherwise it matched the drabness of her appearance. She said that the Hiroshima spirit had been her only success in that connection—and that it hadn't been tried for in any case. It had been entirely unexpected and unforeseen. She didn't know if she really had anything special in the way of gifts. She did know that her own controls had been very annoyed about the whole business, very annoyed. They had threatened to leave her. And, yes, she would have another port-and-lemon.

Cowling looked at his watch then, and said that it was time that they were going. He had promised to take Lily to a house near Northolt. It might be haunted, he didn't know—yet. But it seemed to be a fairly orthodox case of poltergeist phenomena. Lily would soon find out. Had he told me that she was a psychometrist?

So I said goodnight to them, and started to wander over to where the paper astronauts were still arguing. Before I could join the group Cowling grabbed me. "Why not come along?" he asked. "You've often said you would."

Well—why not? It'd all be material. So I finished my beer and walked with them to Holborn Station. From there we got a Piccadilly Line train to Hounslow, and from there we took the bus to Northolt. It was a silent sort of journey. I tried to make conversation, but Cowling whispered to me that Lily had to rest, that she had to conserve her energies for whatever lay ahead. She may have slept for most of the ride—but of that I can't be sure. I remember being rather scared by the possibility of her throwing a trance and treating us to a monologue by Chief Mud-In-The-Eye or Napoleon Buonaparte or some such

low type. But the lights, although not frightfully bright, could have been dimmer, and nobody was singing Moody and Sankey hymns, and so the journey passed without incident.

The house to which Cowling took us, after we got off the bus, was a fairly large villa, detached, standing in its own grounds. It wasn't far from the airport. As we were ringing the bell a large four-motored job came roaring over, low, with its landing lights on. It didn't seem to be anything like the right kind of locality for a haunt. And the house itself, although most definitely pre-war, was not old.

An elderly man opened the door to our ringing. The owner of the house, obviously. Well-to-do. It might have been his Income Tax that had induced the bad state of dither—but somehow I didn't think so. He was pleased to see Cowling. He kept saying, over and over, "I'm glad you've come, Mr. Cowling. And I hope you can do something. My poor wife is getting really frantic—we can't get a girl to stay. . . ."

Cowling introduced us, and the old boy asked us in. He told us that it had started up again—the queer noises, the sounds that weren't quite words yet trembled, as it were, on the very verge of comprehension—and the cold. "That's the worst," he said. "The cold. It's bad enough, and expensive enough, to keep this place heated without this business going on. It's hard enough to get the coal we want for our normal consumption. . . ."

"You always get a drop in temperature with psychic phenomena," said Cowling matter-of-factly.

The owner of the house took us through to a room overlooking the garden at the back. There was nothing eerie about the view from the french windows—there was a glare of lights from the direction of the airport, more lights in the sky as a plane came dropping down from Paris or Brussels or New York or somewhere.

Mrs. Canardi dropped into a large easy chair. She assumed an imperious manner like a cloak. "Philip," she said, "put the lights out." Then—"Philip, draw the curtains." Then—"I think you had better all sit down. You distract me. There is somebody here—somebody trying to get through. The other spirits are hostile. They hate... hate...."

And her voice had changed. It was thin, somehow, and faint, and distant.... And any good ventriloquist, I told myself, could have put over a better illusion.

There was a fire burning in the grate, and by its light I was able to look at the others. Cowling was sitting back in his chair, but his face was eager. The old boy seemed to be scared stiff by the mummery, had the expression which says, as plainly as words, *We-are-tampering-with-powers-beyond-our-ken*. Mrs. Canardi could have been asleep—or dead. Only the slight movement of her meager breast showed that she was alive. I began to feel a little scared myself. And I told myself that the feeling of cold that crept over me was subjective rather than objective. The fire was bright enough.

"I made a mistake," said Mrs. Canardi.

But it was not her voice. It had a peculiarly flat, metallic quality. It was mechanical—and yet it betrayed a nagging... remorse? No—not quite remorse. But there was self-blame there, and an attempt at self-justification.

"I made a mistake," said the voice, "but they did not give me all the data."

Cowling coughed, a little too loudly. He asked, "Who are you?"

The voice ignored him, went on—"The cargo was important. Two thousand tons of Zirskinite from Port Ley. But I made a mistake, and it was lost. I came down out of control. But they should have given me all the data."

The penny dropped then. There must have been an air crash

in this vicinity. Everything is simple when you know the right answers. All that we had to do—I thought—was to convince this unfortunate pilot that it hadn't really been his fault, and then the haunting would probably cease.

The penny hadn't dropped at all.

Zirskinite? Port Ley? And what aircraft could carry two thousand tons?

Two thousand tons. . .

Cowling asked, "When was this—accident?"

"It was not really my fault," said the voice. "I had my limitations. *They* knew that. They should have known. The Directorate knows all. But, as I always said, they are concerned too much with the Rim, think in terms of light-years rather than in miles. And the Seventh-Grade Computers are not to be trusted. I say—they are not to be trusted. Not any longer."

Somehow I was by Cowling's chair. I was shaking his arm. I was telling him that it couldn't be true, that it just couldn't be true. I was telling him that I wouldn't believe in the ghost of the Captain of a Space Ship dragged from God knows how many years in the future. . . .

And the words froze. Literally.

The fire was gone, and the walls of the room were gone, and it was cold, cold, and the stars stabbed at us with a harsh brilliance never known on the surface of this world, never known anywhere where there is an atmosphere. And there was the Moon, huge, every detail of the crater-pitted surface visible, every detail of the buildings and machines in the crater bottoms. And Earth was there too, hanging in the black sky, the Western Hemisphere in shadow, the dark rim of the night receding from Ireland, clouds over most of Europe and Africa. . . .

And there was the ship.

She looked big enough to carry two thousand tons—or more. There was the blue flare of driving rockets at her stern. There

was no name forward that I could see—just a string of numbers and symbols. They might have made sense—but not to me.

And it seemed, too, that I had a sort of X-ray vision. I was seeing the sleek, streamlined plating of her and yet—at the same time—every compartment was open to my gaze. I could see the neatly stowed crates and cases of cargo, the smooth functioning of automatic machinery. But....No crew. No passengers. The life of her was forward, in the control room.

Just a brightly glowing assembly of electronic tubes.

When the lights came on I was still laughing.

The damned thing was the ghost of a machine.

Planet of Ill Repute

I WAS WITH COMMODORE Pendray when, in the survey ship *Matthew Flinders*, he made his big sweep through the Sagittarius Sector. Find us worlds, they had told us when we set out from Earth. Find us worlds rich in metals, rich in timber, rich in animal life, worlds that will give us room and sustenance for our ever-expanding population. Find us worlds—but don't forget The Act.

We did not forget The Act. We knew that to do so could mean, at the very least, professional ruin. And there was more to it than the legalities involved. I can say, with some pride, that it was the personnel of the Survey Service who succeeded in impressing upon the Federation Parliament the crying need for such a law. We had seen too many worlds, planets whose people had been, until our coming, living in a state of Edenic innocence, ruined, their indigenous cultures destroyed by both the trader and the missionary. The Protection of Undeveloped Peoples Act stopped that. It stopped it by saying: *Hands off!* If the initial survey revealed no mechanized industry, no religion whose rites ran counter to absolute ethics—or no religion at

all—then the people of such a world were protected from further contact and their planet became a proscribed planet. That is the law today, and in spite of the occasional outcries from both religious and commercial interests I don't think that it will ever be changed.

We were over eighteen months out from Earth when we found Lishaar. To say that it was a pleasant world is an understatement. It was beautiful, unspoiled, and to us, after a long, dreary succession of planets that were either too hot or too cold, too wet or too dry, it was paradise. We were all of us rather sorry when we discovered that Lishaar possessed intelligent life—all hands, from the Commodore down, had contemplated resigning from the Service and turning colonist. The Lishaarians were human rather than merely humanoid, living in simple villages that we had not been able to see from our orbit around the planet. They were a highly civilized people, although theirs was essentially a Stone Age civilization. Their state of development, according to our ethnologist, was analogous to that of the Polynesians before they had been spoiled by contact with the white man.

We came to know them well during our survey of the planet. They were courteous and helpful and, once we had mastered their simple but musical language, told us all that we wished to know. They pressed gifts upon us—succulent fruits, a mildly intoxicating wine, garlands of flowers—not in the hope of anything in return, not with the feeling that they were propitiating gods from their almost always cloudless sky, but out of sheer, unselfish friendliness. We, of course, gave gifts in return—articles that, according to the experts, could have no bad effect upon them or their way of life. Any article of worked metal we—remembering the history of Polynesia—were careful not to give them, neither did we allow them to sample our own alcoholic beverages.

Our departure from Lishaar was hasty. We had been, as I have said, a long time out from Earth, and the Lishaarian women were very beautiful. Even though interbreeding was impossible, intercourse was not. The Commodore was in many respects a simple man, and it never occurred to him that his officers would be capable of putting the matter to the test. When he made the discovery he was deeply shocked.

I remember the night well. It was during my watch—the Survey Service is run on naval lines—and I was lounging around the control room, high in the nose of the ship, looking out over the rippled sea on which the two westering moons had thrown a twin path of golden light. On one side was the sea, and on the other the forest, and through the trees I could see, when I turned, the mellow lanterns that the Lishaarians hung outside their huts.

I stiffened to attention as the Commodore came up through the hatch.

“Barrett,” he said, “do you hear voices?”

I looked at him. I had heard stories of what too long service in deep space did to one. But he seemed sane enough—sane, but with one of his famous rages in the gestatory stage. The crest of white hair was beginning to stand erect, the vivid blue eyes were starting to protrude.

I listened.

I said, “I hear nothing, sir.”

“Then come down to my cabin,” he snapped.

I followed him down the ladder. It was against regulations for the control room to be left unmanned—but a Commodore on the spot piles on more Gs than a full Board of Admirals back on Earth. I followed him down to his cabin. I stood with him under the air intake.

I heard music at first. Somebody was playing recordings of the songs that had been popular back on Earth at the time of our

departure. The sound, I realized, must be drifting through the ventilation ducts.

"Just music," I said. "It will be the junior officers having a party."

"Listen!" he ordered.

I heard, then, the unmistakable sound of a woman's laugh.

He stormed out of his cabin, down companionways and along alleyways, with myself following. He flung open the door of the room from which the noise of music and laughter was coming. There were eight people there, smoking and drinking—four sub-lieutenants and four of the native women. Three of the women had lost the grass skirts that were their only garments. All of them were drunk. One of them got unsteadily to her feet, flung her arms around the Commodore's neck and kissed him full on the mouth.

Commodore Pendray pushed the naked, golden-skinned woman from him, but used only what force was necessary.

"Gentlemen," he said, "if I may use that word when referring to you, that is. . . . Gentlemen, the party is over, and you may consider yourselves under arrest. Mr. Barrett, see to it that the airlock sentry responsible is also placed under arrest. Get these women off my ship."

I managed it at last, although I had to turn out three of the crew to help me. I found, at the same time, another half-dozen women in the crew accommodation. I thought that a mutiny was going to develop, but luckily some of the spacemen were sufficiently sober to realize what the penalty would be. To go out through the airlock in deep space, without a spacesuit, is one of the more unpleasant deaths.

At last I had the rapidly sobering, badly frightened females out of the ship. As the last of them staggered down the ramp the alarm bells were starting to ring and, vastly amplified, the voice

of the Executive Commander was bellowing, "Secure for space! All hands secure for space!"

One of the sub-lieutenants was a friend of mine. I liked him, although we did not see eye to eye on most things. He was a misfit in the Service and was always talking of resigning his commission and transferring to the commercial side. His real ambition was to become a trader, to be a little king on a world like Lishaar, or as like Lishaar as a non-proscribed planet could be.

I was, I fear, responsible for his escape. After all, he had saved my life on Antares VI, had fought with his bare hands the vicious snow scorpion that had thrown me down and that would, save for his intervention, have pierced my body with its deadly sting. I owed my escape to him—so, when we were berthed on Calydon, our last refueling stop on the way back to Earth, I cancelled the debt. There was little doubt, even then, what the outcome of the trial would be—dismissal from the Service and a few years on one of the penal planetoids. I knew that Watkins would deserve such a sentence, but I did not want to see him serving it.

The organization of the escape was surprisingly easy—a short circuit in the wiring of the electric locks to the cells, the posting of an airlock sentry who was notorious for his sleepiness. Surprisingly enough, there were few repercussions. The sentry swore that he had been attacked and overpowered, and was able to produce some convincing bruises—doubtless self-inflicted—in support of his story. The officer of the watch—myself—had seen nothing, heard nothing. There is little that one can see or hear of happenings at ground level when you are on duty in the control room of a spaceship four hundred feet above her tail fins. The alarms, of course, should have sounded when the short

circuit made the locks inoperative, and the electrical engineer and his subordinates received a first class bawling-out from the Commodore. I was sorry for them.

The local police were, of course, notified—but Calydon was then, and still is, a wild, frontier world that takes seriously only such crimes as horse stealing and, now and again, murder. They did not, obviously, regard the hunting down and arrest of four deserters from an interstellar ship, even a Survey ship, as a matter of great importance. When we blasted off a day later, nothing had been done in the matter and it was safe to assume that nothing would be done.

I thought that I should never see Lishaar again. A proscribed planet is cut off from all interstellar intercourse, its peoples are left to develop in their own way and at their own speed. Landings are made at fifty-year intervals for inspection purposes, and that is all.

It was thirty years before I was proved wrong. Commodore Pendray was long since retired, but the old *Matthew Flinders* was still in service. Spaceships have longer lives than the people who man them. I was in her still, a full Commander, although I knew that I should get no further. The Lishaar incident had meant a black mark for all the officers who were there at the time, and such black marks are as nearly indelible as makes no difference, and can never be erased by long and faithful service. I should, I knew, have been Captain of the old *Mattie* or of one of the other ships in the Service—and I would have been but for The Act.

Commodore Blaisdell was our commanding officer. He was a year or so my junior in age and was what I would never be, the complete martinet. Regulations were his gods, and the observance of them was, to him, the only possible form of worship. He was a tall man, and thin, and his pallor, his washed-out-blue eyes and his grey hair conveyed the impression

of icy coldness. His manner was frigid when he sent for me to order me to prepare the ship for space.

I asked him what was happening. It was obvious that this was to be no routine voyage. Our refit was to be cut short and we were to find room, somehow, for a detachment of marines.

He told me, but not until I had got astride as high a horse as was possible to one of my rank.

One of the Commission's Epsilon Class tramps, it appeared, had put in to Lishaar to recalibrate her Mannschenn Drive controls, a job that can be done only on a planetary surface. A shipmaster may, of course, land on a proscribed planet in an emergency. The tramp captain had carried out his recalibration, but an attempt had been made to detain his ship. There had been fighting, even.

I read the report. There was, I learned, a spaceport on Lishaar and a trading post. When the Commission tramp put in she found three other ships already there—two of them privately owned trading vessels out of Calydon and one of them a small passenger liner from Waverley. The town that had grown around the spaceport combined the worst features of a red-light district and an attraction for the lower type of tourist. There was an Earthman there who had set himself up as king. His name was Watkins.

I was to learn later how Watkins had made his way back to Lishaar. With his experience he had found it easy enough to get a berth as Third Mate in one of the decrepit tramps running out of Calydon, and had succeeded in interesting her skipper in the possibilities of trade with the proscribed world. He had been landed on Lishaar and had set himself up as a trader, and as more than a trader. He had developed local industries—the brandy made from the native wine became one of the main exports. He had turned his capital city—as it soon became—into the sort of place that catered to the lowest tastes of Man.

But all this I was to learn later during the long, and sometimes painful, business of finding out just what had happened, and how, and why. Some of it I had already guessed when with Commodore Blaisdell, the marines at our heels, I marched into Watkins's palace. We did not expect to find him there—the fighting at the spaceport must have given him ample warning of our coming. But he was there, sitting in a large, luxuriously furnished room. He was alone.

In some ways he had changed a lot, in other ways very little. He had put on weight, but his brown, heavily tanned skin went well with the colorful loincloth that was his only garment. His hair was grey—but so was mine, what was left of it. His expression, the old don't-give-a-damn smile, was still the same.

He said, "Come in, gentlemen. Be seated. I'm afraid you'll have to help yourself to drinks—I sent my women away when all the shooting started out at the port." He got to his feet. "Why, Bill!" he exclaimed, advancing with outstretched hand, "I never recognized you, not with that brass hat and all that braid!"

I shook hands with him, ignoring the Commodore's icy glare.

Blaisdell said, "I hate to interrupt this touching reunion, Commander, but I have to remind you that this man is under arrest."

"I suppose I am," said Watkins. "Well—it was good while it lasted."

"Good?" flared the Commodore. "Good for whom? Good for you, perhaps, and for those scum from Calydon and Waverley. You've debauched these innocent people, Watkins, and you'll pay for it." He said slowly, "Somebody once said—it was back in the days when spaceflight was only a dream—that Man, in his travels, will carry the dirt of Earth all over the galaxy on his boots. That's what you've done, Watkins."

Watkins smiled.

He said, "Look at those pictures."

We looked at them. One was an abstract painting, one of those things that are all form and color and meaning. The other was a conventional nude—a golden-skinned woman standing beside the sea. I know nothing of art, but I knew that neither of the paintings would have looked out of place hung on the walls of Earth's finest gallery. One does not need to be an expert to recognize quality.

Watkins touched a switch on the boxed machine standing beside his chair. Immediately there was music. We all listened to it. There was depth, and there was emotion; there was the black emptiness of space and the high whine of the Drive; there was the crushing weight of acceleration and the roar of the rockets....

"That was composed," said Watkins, "by one of my proteges. He did it after his first voyage in a spaceship." He turned to me, "You remember what their music *was* like, Bill. Just a primitive thumping of drums accompanying not very tuneful voices.... These pictures, too, were painted by natives. Good, aren't they?"

"What," asked the Commodore, "are you trying to tell us, Watkins?"

"Just this," he said. "I may have brought the dirt of Earth here on my boots, as you have told me—but good things grow from dirt."

"Take him away," said Blaisdell to the marine officer. "There's no need for a trial. We'll hang him, in public, just to show all these people that we aren't to be trifled with."

Watkins paled, but his grin did not leave his face.

"Are you sure, Commodore," he asked softly, "that your own boots are clean?"

Drift

STANDING ON THE BOAT deck, by number three hatch, the blonde saw the Third Officer walk to the wing of the bridge. What he was carrying was, indubitably, a gin bottle. The Third threw the bottle out and away, watched it until it fell into the water well clear of the ship's side, then returned to the wheelhouse. Later in the day, that afternoon in fact, the Third was partnered with the blonde in a deck golf foursome.

"Really, Jimmy," she said, "you officers go altogether too far."

"What do you mean?" he asked.

"Drinking on watch. I saw you dumping the empties this morning."

"It was an empty, all right," he told her, "but it wasn't emptied on the bridge. It was one of the Mate's. And it had a message in it."

"How romantic! Pirates? Buried treasure?"

"No. Just date and time and position of dumping. We do it for the Hydrographic Office. It gives 'em data—if the bottles are ever picked up—for their current charts and such. Drift, and all that."

"I see," she said.

Jimmy Furness shifted uncomfortably. The grassy bank on which he was lying was not the most comfortable of

couches—he was sure that the stone that he had found when first he sat down had left a large bruise on his right hip. Already his right arm was numb with the weight of the girl's head. And now, of all things, she had to talk about astronomy. She was as bad as that blonde—what was her name?—who, during his last voyage, had got far too interested in meteorology.

"What's that bright one there?" asked the girl.

"Jupiter," said Furness.

"Has it got people?"

"I doubt it. As far as we know, the only planet in the Solar System that shows any signs at all of possessing life is Mars—"

"The Canals—" murmured the girl.

"If there *are* Canals—" He started, in spite of himself, to warm up to his subject. "According to some astronomers, there must be at least a billion Earth-type planets in this galaxy alone. They would be capable of supporting life as we know it. All these stars we see—I don't mean the planets, of course—are suns, each of which has worlds revolving around it—"

"But what about shooting stars?"

"They aren't *stars*, darling. They are merely hunks of cosmic debris that fall into the Earth's atmosphere, and become incandescent during their fall—"

"Look!" she said. "There's one!"

"God!" he ejaculated. "That's going to be close!"

His instincts urged him to run, but reason told him that to run was useless. Hastily, he grabbed the girl, turned her so that she was lying on her face. He flung himself on top of her—a futile gesture of protection in the event of a direct hit, but of some value as cover from the flying fragments of a near miss. His eyes were closed, yet he was still conscious of the dreadful glare of the meteorite. The air was alive with the screaming roar of it, and he felt a sensation of burning heat all along his back.

The meteorite hit. The blast of the impact lifted them from

the ground, flung them several yards. Furness was the first to recover. He got to his feet, staggered to where the girl was sprawled on the grass. He knelt beside her. He tried to lift her.

"Madge?" he asked anxiously. "Madge! Are you all right?"

"Yes," she said at last, but without conviction. "Yes, I think so."

Furness realized suddenly that he could see her pale, stained face far more clearly than he should have done by starlight. He looked away from her, looked to where the meteorite had fallen. The thing was glowing—and the light of it seemed to be brightening rather than dulling as it cooled. It was glowing—and then, suddenly, began to flash. The crazy thought crossed Furness's mind that it was flashing in Morse code—but that, he knew, was impossible. Even so, there was a regular sequence of long and short flashes, too regular to be accounted for by any explanation involving cooling and contraction.

"We must look into this," he said shakily.

"Don't," said the girl.

He ignored her, got up from his knees and walked slowly to the shallow crater. In the center of the pit lay the meteorite—a brightly glowing ovoid. The light of it waxed and waned, waxed and waned, and with every pulsation the glare became more intolerable, so that Furness had to look at it, as he approached, through slitted eyelids. There was sound, too, a continuous high-pitched whistle, almost supersonic.

"I don't like this," he said abruptly, and almost ran back to where the girl was standing.

"What's wrong?" she asked.

"It's not a meteorite. It's some sort of missile. It's liable to go up at any moment."

"What can we do?"

"Straight home," he said. "Your house is nearer. We'll phone the police."

Madge's parents, seeing their daughter suffering the after-effects of some sort of shock, demanded an explanation. Furness talked hard and was at last allowed to use the telephone. He got through to the local police station.

"Yes," he said, "in that field by Hanman's Wood. . . . No. It's *not* a shooting star. It could be a rocket. It could have an atomic warhead. . . . You'd better get a man to watch it, keep people away from it. . . . Yes, I'll come out with you. I'm at Mr. Wendell's. Yes—in Rankin's Lane. . . . Ten minutes? Right."

While waiting for the police car, Furness went out into the garden with Mr. Wendell. They looked in the direction of Hanman's Wood. There was a light there, a light like an aircraft beacon, flashing at regular intervals.

"Jimmy," said Wendell, "do you think that I should get Madge and her mother away from here? If that thing's going to go up—"

"I *think*," said Furness, "that, if it *is* a rocket, it must be one of ours, and that all this light-flashing and whistling is so that it can be found easily when it comes down—"

"I wonder if there's anything about it on the radio," said Wendell.

They went inside. Wendell switched on the radio, but they never heard any report. Some powerful transmitter close by was jamming reception on all frequencies. Furness realized suddenly that the spacing of the dots and dashes followed the same pattern as that of the flashing light.

A car drew up outside the house. There were footsteps on the path. The bell of the front door rang.

"That'll be the police," said Furness. "I'll go."

The older man followed him to the door.

"Inspector Welsh," he said to the uniformed police officer standing there, "do you think we should evacuate?"

"If there's any need for *that*, Mr. Wendell, we'll soon tell you.

Now, sir, are you Mr. Furness? You saw the thing fall, didn't you? Now if you'll be so good as to show us where—"

"You'll find it all right," said Furness. He pointed to the flashing light against the dark sky. "Still, I'll come with you."

"I don't like it," said the inspector at last. "It's out of *my* province. All *I* can do is place roadblocks and post a guard. Meanwhile, Mr. Furness, we'll go back to the station and put through a call to the military—"

"Or the Air Force," suggested Furness.

"Yes. Might be more their cup of tea than anybody's."

They got into the car, sat in silence while the driver took them through the streets of the little town to the police station. As they entered, the desk sergeant got to his feet.

"I know it's no concern of ours, sir," he said, "but there've been nothing but telephone calls from householders complaining about interference on their radios—"

"It's all part and parcel of it," said the inspector. "Put a call through for me to Wainham, will you? I want to speak to the officer in charge—Group Captain Boyle, isn't it? Anyhow, get him for me."

The call wasn't long in coming through. The inspector told his story, then Furness was called to the telephone to tell his. Welsh went back to the instrument then, talked for a few more minutes before hanging up.

"Back to Hanman's Wood, Mr. Furness," he said. "The Group Captain's sending a couple of experts here by helicopter."

Furness stood with the inspector and watched the helicopter coming in. The light from the crater caught it, pinned it against the black sky like some huge, silvery insect in a showcase. It came in slowly, carefully, grounding at last about fifty yards

from the thing from the sky. Two dark figures tumbled out hastily; as soon as they were clear of the aircraft it lifted again, flew away in the direction of Wainham.

Furness and the inspector walked up to them.

"I'm Inspector Welsh," said the police officer, "and this is Mr. Furness. He saw the thing come down."

"My name is Brown," said the taller of the two airmen. "Wing Commander Brown. This is Squadron Leader Kennedy." He began to walk towards the crater. "You saw the thing come down, Mr. Furness. Did it seem to you to be a rocket?"

"No," said Furness slowly. "There didn't seem to be any exhaust. It seemed to behave, until it hit, like all the meteorites—the ones that have reached the Earth's surface, that is—I've ever read about—"

"It's certainly not behaving like one now," said Brown. "Have you got the goggles, Kennedy? There's a couple of spare pairs, Mr. Furness—you and the inspector had better have one each—"

The polarized goggles helped. It was possible, now, to look directly at the glowing ovoid. The four men stumbled over the rim of the crater, walked cautiously down to its center. Furness was surprised that there was so little heat, realized that the thing, now, must be barely warm.

"No sign of a venturi," muttered the Wing Commander. "Any joy from the Geiger counter, Kennedy?"

"No."

"I suppose you've a field telephone rigged, inspector. We were going to use our walkie-talkie, but there's too much interference from this thing—"

"A field telephone—" muttered the inspector. "I thought that you gentlemen—"

"Oh, well, if it goes up we all go up together, and the world will never know what we've done to earn our posthumous VC's. Got your tape handy, Kennedy? Four foot six, you make it, by

three feet. . . . Hm-m-m. Noisy brute, isn't it? Much more of this confounded whistling will give me a really vile headache—"

"Is that lettering on the side of it?" asked the inspector suddenly. "It's very worn, if it is—"

"You're right, inspector. Could be Russian? No. But it looks almost familiar. . . . Almost—"

"That symbol there could pass for the Greek letter *pi*," said Furness.

"It could, at that," admitted Brown. "Well, inspector, I don't think that there's any danger of twenty square miles of countryside being wiped out by an atomic explosion. All the same, keep your road blocks up and, whatever else you do or don't do, chase the small boys away from here. They'll be round in the morning, never fear."

"What are your intentions, sir?"

"Oh, Squadron Leader Kennedy and I will stay around to find out what we can. The helicopter will be back and forth a few times with more gear and all the rest of it. Then . . . well . . . I have an idea that this affair is going to finish up at a *very* high level. Oh, Mr. Furness, the inspector will know where to find you, won't he?"

"Within the next two weeks," said Furness. "Not after. My leave will be up by then."

"R.N.?"

"No. Merchant Navy."

"Thanks anyhow, Mr. Furness. We'll let you know if we should want you. Meanwhile—don't talk about what you've seen."

The police car took Furness to his parents' home, where, by his refusal to answer the questions of his father and mother, he conveyed the impression that he had witnessed either the beginning of a long-range rocket bombardment or the arrival of the advance guard of the Martians.

The following day Furness saw the thing from space for the last time. He was eating a belated and leisurely breakfast when Welsh called for him.

"Better get dressed quick, Mr Furness," said the inspector. "There is all sorts of high brass out at the site. They want to hear you say your piece."

"I want to finish my toast," said Furness.

"Does it mean war, Inspector?" asked Furness's mother anxiously. "With Jimmy at sea—"

"I don't know what it means, madam," replied the inspector.

"I can tell you this—that rocket, or whatever it is, never came from either Russia or America. And it's not one of ours.... *Please* hurry, Mr. Furness."

"All right," said Furness. He wiped the marmalade from his lips, threw down his napkin. With a visible effort the inspector restrained himself from following him upstairs. Furness, submitting to the excitement that he had not shown in front of the police officer, hastily got out of his pajamas and dressing gown, climbed into flannel slacks and a sweater. When he came down again, Welsh was still assuring Mrs. Furness that a shooting war was not imminent.

The two men left the house, climbed into the car. The driver took them to the site at a speed which would have earned an ordinary citizen a stiff fine. Furness was amazed at the crowd of men and vehicles around the crater. He saw the uniforms of all three British services as well of those of the American Air Force.

A sentry challenged them as the car drew to a halt. The inspector barked a few words to the soldier, who replied, "Go right through, sir. You'll find the professor at the bomb site."

Welsh and Furness made their way through the crowd. The crater itself had been kept clear; only three men, civilians, were

in the center of it, standing by the strange ovoid. This, Furness saw, was still glowing, still flashing, but—it may have been the effect of the daylight—dimly. It seemed that the high-pitched whistling was much fainter, too.

The inspector approached the more elderly of the three men, saluted, said, "Mr. Furness, sir."

"Oh, yes. Thank you, inspector."

Furness looked at the scientist, recognized the upstanding brush of white hair, the thin, lined features. It was a face that he had seen often in the pages of the illustrated press.

"Ah, Mr. Furness—You saw this... ah... *thing* land, I believe?"

"Yes, sir."

"From which direction did it approach?"

"From the east, sir. I was looking towards Jupiter at the time, and it first appeared just a few degrees below the planet."

"Ah. An amateur astronomer?"

"No, sir. A professional navigator."

"I see. Now—"

"Professor!" yelled one of the other two men. "Down! Something's happening!"

Furness, from his prone position, heard a sharp crack. Cautiously, he lifted his head, looked towards the ovoid. It had fallen apart, into four neat segments. A white mist, slowly dissipating, hung over the center of the crater. The sailor got to his feet, looked down into the opened canister. There was the gleam of yellow metal there, and there were sheets of what looked like paper.

One of the scientists was already examining this strange treasure. He turned to Furness, a golden disk on the palm of his outstretched hand.

"Coins," he was saying. "Coins. *Look!*"

Furness took one of the gold pieces, examined it curiously. On one side there was the head of a man, helmeted; on the other was a galley, a bireme.

"Greek?" he muttered. "But—"

The professor pushed him to one side.

"Never mind the money, Burgess," he snapped to his assistant. "That won't blow away. The papers, man. The papers!"

"But what's the language?" demanded Burgess of nobody in particular. He was waving one of the paperlike sheets in front of his face. "I thought at first that it was Russian. But it's not."

"Gentlemen!"

Furness, with the three scientists, turned to face the new arrival. He was, obviously, somebody. His black jacket and black homburg hat were like a uniform, and there was the royal cipher on his briefcase.

"Gentlemen," he said again. "I must insist that these... pieces of evidence be removed at once to Whitehall." He looked at Furness. "I must insist, too, that all unauthorized personnel leave this site. Inspector!"

"Sir?"

"See to it, will you?"

"That means you, Mr. Furness," said the inspector apologetically. "All right. I'll see that you're taken home."

For the remainder of his leave Furness went through every newspaper every day to learn more, to learn something, of the mysterious missile. Most evenings he would meet Welsh in the Rose and Crown, would try to pump the inspector about what, if anything, had been discovered—but the inspector knew as little as he did, knew only that the affair had passed from the hands of the physicists into those of the experts on languages.

Furness never mentioned the coin that he had, inadvertently,

slipped into his pocket. He carried it with him always as a good luck piece.

Standing on the boat deck, by number three hatch, the archaeologist saw the Third Officer walk to the wing of the bridge. What he was carrying was, indubitably, a gin bottle. The Third threw the bottle out and away, watched it until it fell into the water well clear of the ship's side, then returned to the wheelhouse.

"Really, Chief," said the professor, "your junior officers go altogether too far—"

"What do you mean?" asked the Chief Officer.

"Drinking on watch. I saw the Third dumping the empties just now."

"It was an empty, all right," said the Mate, "but it wasn't emptied on the bridge. It was one of mine, as a matter of fact. And it had a message in it."

"I'd no idea that the twentieth century was so romantic! Pirates? Buried treasure?"

"No, professor. Just date and time and position of dumping. We do it for the Hydrographic Office. It gives 'em data—if the bottles ever are picked up—for their current charts and such. Drift, and all that."

"I see," said the scientist. "It reminds me rather of a queer business I was mixed up in some years ago. . . . It was near Wainham, the Air Force Station, you know. It. . . ." He paused. "I'm not sure that I can tell you. It was very much Top Secret at the time."

"Near Wainham. . .," said the Chief Officer. "Would it have been a sort of guided missile from—Outside?"

"I'm sorry. I can't tell you."

"Come up to my room," said the Mate. "We'll start to empty another gin bottle, and I'll show you something."

He led the way up the ladder, into his cabin. After he had seated his guest he opened his wine locker, took out the necessary bottles and glasses, poured two drinks. He went to his desk, then, pulled out a drawer, took from it a small, gleaming object. He handed it to the archaeologist.

"Did they show you any of these?" he asked.

The scientist looked at the coin — at the helmeted head, at the bireme.

"How did you get this? It can't have all been a hoax. Surely not —"

"I saw the missile land. Then I was there at the site — Sir Humphrey Williams, although he wasn't Sir Humphrey then, had sent for me to tell him all that I'd seen when the thing came in — when it broke open. One of his assistants handed me this coin, and then some cove from one of the Ministries took charge and I was hustled away pronto. I never found out what it was all about."

"Neither did they," chuckled the archaeologist, "until they thought of calling in those more concerned with the past than with the future. Oh . . . it was tough. I had to work back from the comparatively modern Greek of Homer. Grimm's Law came into it, of course — but you wouldn't know anything about that. I had to make allowances for periods of absolute savagery during which only a handful of scholarly priests kept the written word alive."

He held the coin on the palm of his left hand, pointed to the script around its circumference with a gnarled forefinger.

"D'ye know what this says? I'll translate it for you. REPUBLIC OF ATLANTIS, YEAR THIRTEEN HUNDRED AND FOURTEEN —"

"And what about the papers?"

"You've already told me, Mr. Furness."

"I've told you?"

"Yes. Date and time and position — and the promise of a reward if they were posted back to Port Anachreon without delay. And a lot of stuff altogether over my head about etheric currents and such. . . . Oh, it had the physicists crazy, I can tell you —"

"But the ship," said Furness intensely. "The ship —"

"Let me see, now . . . Atlanta . . . Bound Sol III to Procyon. . . ."

Furness refilled the glasses.

"Gin bottles are cheaper," he said. "And they don't take such a long time getting there."

Ghost

OUR LANDING ON WELDON, third world of the planetary system of Alpha Gruis, was unscheduled. No ships ever called at Weldon any more; it had dropped from its importance—never a great one—in the scheme of interstellar commerce with the exhaustion of its mineral resources. Man had come. Man had gutted the planet of its wealth. Man had left.

We hoped that the spaceport was still in a fit state for a landing. We hoped that the supplies of spare parts, of repair equipment, had not deteriorated too badly with the passage of the years. We hoped that the Pilot Book, according to which large quantities of such material had been left behind, as a cheaper alternative to its being shipped to a “live” planet, was not lying.

We could, of course, have hoped that our Drive would hold out until we reached the busy, prosperous worlds of the Centaurian system, to which we were bound. We could have done so—and, in all probability, made one of the swelling number of ships listed as “Overdue, believed lost”. Nobody is

quite sure what happens when the Mannschenn Drive gets out of control—according to some authorities one is slung into the remote past, according to others one finishes up in the remote future. They agree on one point—there's no returning.

I'm no technician, but I had been uneasily aware for some time that all was not well with the intricacy of spinning, precessing wheels that is the Drive. The note—which should be high, steady, almost supersonic—wavered, at times deepening to a low hum, at times rising painfully above normal aural range. And with almost every action there was the haunting sense of familiarity, the feeling of I've-done-this-before.

I was trying to check freight lists, and not making much of a job of it, when the buzzer of my telephone sounded. I picked up the instrument.

It was the Old Man on the other end.

"Mr. Rayner," he said, "come up to Control, will you?"

I wasn't sorry to leave my papers. I unbuckled myself from my chair, pulled myself out from my office to the axial shaft, caught the guide-line and pulled myself towards the nose—and the brains—of the ship. On the way I passed a few of the passengers, and I could see that they, like me, were aware that something was wrong. I didn't stop to answer their questions, which, even though I didn't know the answers, was rather foolish of me.

When I reached the Control Room it was obvious that some sort of conference was in progress. The Old Man was there, looking even more worried than the Master of an interstellar ship usually looks; I swear that the lines on his face had deepened, that his hair had become appreciably greyer in the few hours since I had last seen him. Caulfield, the Navigator, was there; the wrinkles on his brow seemed to be spreading up and over his glistening bald scalp. Welles, the Drive Engineer,

was there, looking as miserable as only a fat man can look.

"All right, Mr. Welles," the Old Man was saying. "So you can't make repairs in space. You *think* that you can keep the Drive running for two more days, ship's time, but no longer."

"That's the strength of it, Captain," said Welles sullenly.

"Weldon's our best chance, sir," said Caulfield. "A ghost planet, but according to the book it has a breathable atmosphere, no lethal extremes of temperature and, even better, a stock of spares. The planet was evacuated when the mines closed down but, as there are no inquisitive natives, we have every reason to hope that we shall find the stocks intact."

"Weldon it has to be," said the Old Man. "You, Mr. Welles, will have to keep the Drive running for three more days." He turned and saw me. "You, Mr. Rayner, will inform the passengers. Whatever you do, don't frighten them."

"On the intercom, sir?" I asked, reaching for the microphone.

"No. Of all the instruments devised by man for spreading panic, the loudspeaker's the worst. The customers know that there's something wrong. An authoritative, reassuring statement over the intercom will be anything but reassuring. We want the personal touch—and that's the Purser's job. Circulate, Mr. Rayner. Tell them that everything's under control. Tell them how lucky they are to get a look at a ghost planet—and all for free. Blind them with science. . . ."

"But I don't know anything about the Drive, sir."

"Neither do they. Off you go, now. We're going to be very busy here until we arrive. *If* we arrive."

It's hard to be reassuring if you're feeling very badly in need of reassurance yourself. I was remembering all the horrid stories I'd heard of ships—and people—being turned inside out with a malfunctioning of the Drive. I was wondering which would be preferable—being marooned in the remote past or the remote

future — and was not wildly enthusiastic about either prospect. I was wondering what would be the best line of approach to take with the passengers.

They were gathered in the Lounge — all twenty-four of them. They knew that there was something wrong; the behavior of the Mannschenn Drive had worsened since I had left my office. They looked at me with mingled distrust and distaste; my uniform made me one of *Them*, one of the rulers of this little world who had failed, lamentably, in their duties.

"I hope you aren't worried," I said brightly.

My answer was a growl such as one would expect from the jungle, not from a gathering of allegedly civilized human beings.

"When do we take to the boats?" asked one of the men, a burly individual called Etheridge.

"We do not take to the boats," I told him. "The boats cannot be used in interstellar space, only in the vicinity of planetary systems. But I did not come here to tell you that. I came here with good news."

"So they've fixed the Drive," said Miss Hall, a tall, angular spinster. "It doesn't sound like it, young man."

"I'm afraid the Drive has not been fixed," I admitted. "Not yet. But there is no danger. Anyhow — here is the *good* news. You'll have all heard of the ghost planets — worlds that have been exploited and then abandoned. We're headed towards such a world now — Weldon, otherwise Alpha Gruis III. The mines were worked out all of fifty Earth years ago. . . ."

"*Why* are we going there?" asked Etheridge.

I tried to smile brightly. "I *could* say that we're going there to give all you people the opportunity, which very few travelers ever get, to look at a ghost planet. I *could* say that, but I won't. Even so, you'll be very foolish not to make the most of the opportunity. The reason, however, is this. There are large

stocks of spares and repair equipment at the spaceport. We shall make use of them."

"Suits me," said Susan Willoughby.

"I am pleased that *someone* can afford the delay," remarked Miss Hall acidly.

"The delay, I hope, will be to my financial advantage," replied the girl sweetly.

"Why, Miss Willoughby?" I asked—although I had guessed the reason. Her profession, as listed on her passport, was that of writer.

"Local color," she said. "My next novel's going to be about one of the mining planets—the first discovery, the prospecting, the exploitation and, finally, the decay."

"So long as *someone's* happy," snapped Miss Hall.

"I don't see why we shouldn't all be happy," said Etheridge suddenly. "As the Purser has told us, this is a chance that comes to very few people. We shall be fools not to make the most of it—fools not to make the most of it. . . ." He paused, then said, "I seem to be repeating myself."

"You will," said Miss Hall, "until somebody repairs the drive."

I returned her glare.

"I'm sorry," I told her, "but I'm the Purser, not a Drive Engineer."

"Have we got one aboard?" she asked.

"I'm sorry," I told her, "but I'm the Purser, not a Drive Engineer."

"Have we got one aboard?" she asked.

"I'm sorry," I began.

"Must we have all that again?" she demanded.

"Not if I can help it," I said. "All I can do, ladies and gentlemen, is to assure you that there is no danger and that

everything is well in hand. You will all—we shall all—suffer slight inconvenience until repairs have been effected. I trust that you will be able to endure this inconvenience for another three days. It will be no longer.

“Should any of you require any further information, I shall be in my office. Thank you.”

Susan Willoughby came into my office while I was trying to check the freight lists.

She said, “Men amuse me.”

I looked up from my papers. She was better worth looking at than they were—that is, if you like redheaded women. Some people don’t; I do.

She said, “Men amuse me.”

I said, “I heard you the first time, Miss Willoughby. Of course, things being as they are, you may have actually said it only once.”

“I said it twice.”

“Then, why do men amuse you?”

“Their passion for routine work in the face of catastrophe.”

“If there’s any catastrophe in here, you must have brought it in yourself,” I said, joking feebly.

“I can see it all,” she said half to herself. “The Captain daren’t come to see us himself, or send one of his executive officers. They—and he—all know too much. They wouldn’t have been able to lie convincingly. You, knowing nothing, could lie. I heard Mary Hall talking to Bill Etheridge. ‘It can’t be really serious,’ she was saying. ‘Mr. Rayner was a little worried, but he wasn’t frightened—and he’s the kind that scares easily....’”

“Thank you,” I said.

She said, “I hope we do come through. This’ll be first-class material—and so will be the ghost planet. If we get there.”

"We shall," I said.

She ignored this.

"I've done quite a lot of research into the various losses of interstellar ships. Most of them seem to have been due to Drive failure. Did you hear about Mitsubishi's discovery on Antares VII?"

"Who's Mitsubishi?" I asked.

"The archaeologist. He discovered what must have been the remains of a spaceship, all of fifty thousand years old. There was a mass of corroded machinery that could have been, that must have been..."

"What?" I asked.

"A Mannschenn Drive Unit."

"Some race, fifty thousand years ago, had interstellar travel."

"That's possible," she admitted. "But the other solution is possible, too. Correct me if I'm wrong. Remember that I'm a writer, not a physicist. The principle of the Drive is precession—precession in time as well as in space. Thanks to those fancy gyroscopes that aren't, at the moment, behaving too well, the ship goes astern, as it were, in time while going ahead in space..."

"You know as much as I do," I said. "I'm only the Purser."

"What a pity that the temporal precession can't be used to drive a time machine," she murmured. "As you know, historical novels are my specialty. If one could be on the Moon to watch Corderoy's landing—the first man to set foot on a world other than his own! If one could witness the early struggle of the Martian colony!"

"Once you have time travel," I said, "you have paradox."

"And what's wrong with paradox?" she demanded.

"Nothing—except that you just can't have it. You just can't have people going back in time and murdering their grandfathers."

"I admit," she said sweetly, "that it's not done."
We both laughed.

The Drive held out until we made planetfall.

Weldon lay below us—a grey-green globe, with wide white belts of cloud—when we flickered into normal space-time. Landing, we knew, would be a protracted business; the last Survey ship that had been in the vicinity of the planet had reported that the automatic beacon was no longer functioning. We should, therefore, have to circle Weldon until our telescopes picked up the city—also called Weldon. Whether or not this task would be easy would depend upon how much the buildings were overgrown by the native plant life.

Things went surprisingly smoothly.

On our third circuit of the planet we picked up the city. All that remained then was the stern-first dropping through the atmosphere, our speed adjusted to match the speed of rotation of the planet so that, in effect, we achieved a vertical descent. All, I say—but it wasn't as simple as that. What had been the daylight hemisphere at the beginning of landing operations became, inevitably, the night side. There were no lights to guide us.

We seemed, too, to be bringing the bad weather with us. We commenced our long fall from a cloudless sky; the latter part of it was through driving rain and, if the drift indicators were to be believed, gale-force winds. When at last we touched the wet concrete, we were enveloped in clouds of steam of our own making as our rocket exhausts vaporized the deep pools and puddles that had collected on the apron.

When the steam had cleared there was not much more to see. Dimly, through the driving rain, loomed a low huddle of buildings. There were no lights, no signs of life. We hadn't been

expecting any, but this did not make the overall effect any the less depressing.

"Landing has been accomplished," I said into the microphone through which I had been delivering a running commentary to the passengers and crew. "Landing has been accomplished. Repairs will be put in hand at once."

"Mr Rayner," said the Old Man coldly, "by whose authority did you make that last rash promise? Even you must realize that Mr. Caulfield, Mr. Welles and myself have been three days and nights without sleep, and the other officers are in little better case. Repairs will be put in hand as soon as *I* see fit."

"Even so, sir," put in Caulfield, "there's no reason why *we* shouldn't investigate the stores around the spaceport, get some idea of what materials we shall have to work with."

"In the morning," said the Captain. "Or the afternoon. Or whenever we wake up. We're far too tired to do any work on the Mannschenn Drive Unit—the state we're in now, we couldn't reassemble a cheap alarm clock without having at least six parts left over. Mr. Rayner—amend your message."

"Attention, please," I said. "Here is an amendment. Repairs will be put in hand as soon as possible."

There was nothing further for me to do in the Control Room; the necessary entries in the Official Log I would make in my own office. I slid down the guide-line in the axial shaft, disdaining the ladder rungs. I stopped for a brief word with those passengers who were still in the Lounge. Most of them had turned in, finding the gravity tiring after the weeks of free fall.

Susan Willoughby followed me into the office.

"Men," she said, "amuse me. This passion for routine."

"I always," I said, "make it a practice to get this sort of thing clewed up as soon as possible after arrival."

"Interstellar vessel *Delta Cygni*," she read aloud, peering

over my shoulder. "Arrival at Port Weldon, on Weldon, Alpha Gruis III. Time, G.M.T. Subjective: 05.45 hours. Time, Local..." She laughed. "What is the local time, James?"

"Search me, Susan," I admitted.

"But you must put in something, mustn't you? You must do it now. The ghostly Port Doctor, accompanied by the spectral Immigration Officer and the phantom Customs Officials, will be boarding any time now..."

I listened to the wind whose howling I could hear even through our insulated plating. I decide that I did not envy the cadets, who would be standing airlock watch throughout what remained of the night.

"You know," she said, "I'd like to be the first, James. Well, not *the* first—but the first after fifty years. Do you think...?"

"No," I said.

"Why not?"

"The Old Man hasn't granted shore leave."

"But he hasn't *not* granted shore leave."

"Anyhow—the ship's not cleared inwards."

"By whom, James? By whom? It seems to me—of course, I'm no authority on interstellar law—that you've done all the clearing possible with your Log Book entries."

I remembered, then, Caulfield's suggestion that an immediate investigation be made of what facilities for repair and replacement the spaceport offered. If I were able to greet my superiors, when they at last awakened, with a neat list of the contents of storerooms and workshops, they would have to admit that I had made a material contribution towards getting the ship under way once more for the Centaurian system.

"Do you want a job?" I asked Susan. "Acting Temporary Purser's Pup, Unpaid?"

"Doing what? Helping you make silly entries in the Log Book?"

"No." I told her my scheme.

"I'm with you," she said, "on one condition — that you let me be first out of the ship."

Susan went to her cabin and I climbed the shaft up to the officers' flat. Nobody—excepting, of course, myself—was awake in the accommodation. I collected a heavy raincoat and a powerful torch. Pen and notebook I stuck into my pockets almost as an afterthought.

Susan was waiting for me in the Lounge when I got down. She, too, had dressed against the weather. She, too, was carrying a torch. She was talking with Miss Hall and Etheridge.

"I think you're crazy, Miss Willoughby," the spinster was saying. "And that Purser boyfriend of yours is crazier."

"I rather wish that I were going with them," said Etheridge.

"Then you're crazy too."

"All right—we're all crazy." He noticed me. "Just one thing I'd like to ask, Rayner. Are there any dangerous animals on this planet?"

"None—according to the Pilot Book."

"Even so," he said, "fifty years is a long time. There were probably a few domestic animals left, inadvertently, at the time of the evacuation. Cats, perhaps, and dogs. You'd better take this—I don't suppose that the ship carries any firearms."

"No," I said, "we don't. But I can use a pistol. Thanks a lot."

I took the heavy automatic from him, checked the magazine, then slid it into my pocket.

"The odds are that you won't need it," said Etheridge.

"I should think not!" snapped Mary Hall.

We said goodnight to them and descended the companionway to the airlock. The cadet on duty was reluctant to let us out, but finally did so when I made him admit that no orders had been issued about restriction of shore leave.

As I had promised, I let Susan first down the ramp. She staggered as the wind caught her, and the beam of her torch waved wildly. A second or so later I was by her side and, heads down, we were pushing through the wind and the freezing rain towards the nearer of the low buildings. As we approached it we found ourselves in a lee, for which we were grateful. The beams of our torches were reflected from rows of windows, all of which seemed to be intact. Almost directly ahead of us was a door.

It wasn't locked—but fifty years is a long time. We got it open at last, the protesting shriek of the long idle hinges audible even above the howling wind. I cried out as I saw two glowing green eyes in the darkness—then laughed. The owner of the eyes was only a cat, a Terran cat—lean and wild, a reversion to its savage ancestors, but nothing to be afraid of.

"Puss!" I said. "Puss! Pretty Pussy!"

The animal swore at me and made off.

We were in a passageway, and we advanced along it with caution. We opened, without much trouble, the first door that we came to on our right. The room behind it must have been an office of some kind—there were stools and there were desks and filing cabinets. On one of the desks was an open book—a ledger of some kind.

"We'll see what the last entry was," said Susan, shining her torch onto the yellowed pages.

Already this is a ghost planet. There is still life, the city still lives, the spaceport is busy as the ships come in to take off personnel and such equipment as is worth the expense of shipping out and away. But today I saw a ghost—two ghosts. I saw them in broad daylight. Ghosts of the pioneers, they must have been—some long dead prospector and his wife, returned to see the ending of the dream that once was theirs, of which they

were once a part. A man and a woman they were, dressed in heavy outdoor clothing. Each of them carried a torch—or so it seemed. The man carried a pistol as well, in his right hand.

I was in the main equipment storeroom, checking the Mannschenn Drive Units. The orders are that they are to be left here, so that any ship in trouble on the Centaurian run can put into Port Weldon for spares and repairs. I was applying the coat of oil that should last, if necessary, a hundred years or more.

Suddenly, I heard a man's voice say, "That's the one."

I looked up. They—the ghosts—were standing there. I don't know for how long they had been there, but I am certain they had not come through the door, which I was facing as I worked. There was this man—an ordinary-looking sort of fellow with brown hair—and the rather striking redhaired woman. The man pointed his pistol at me.

"You," he said, "You left the safety clamps off the main rotor."

"What if I did?" I asked.

"Make sure that they're on," he ordered. "Tight."

"It's no business of yours," I told him.

"It is," he said. "Take the pistol," he said to the woman. "If he tries to interfere, shoot."

I didn't know that they were ghosts. I stood still, and watched the man tighten the clamps on the main rotor. And then—they were gone. Both of them. Vanished.

I'm leaving this here in the office. Sooner or later a ship will be coming in for repairs. This is just to let you—whoever you are—know that the main equipment storeroom is haunted.

"Some people," said Susan, "have—or had—a weird sense of humor."

"Shall we find the main equipment storeroom?" I asked.
"Are you afraid of the ghosts?"

"Of course not," she said. "And if there are ghosts, it's all material."

So we found the main equipment storeroom. It was easy enough—on the wall of the office in which we had found the ledger with its odd entry there was a plan of the spaceport buildings. We didn't find any ghosts in the storeroom—but we found the dogs.

Six of them there were—huge brutes, with something in them of Alsatian and something of mastiff, and they were fierce and they were hungry. Luckily—I had half believed the ghost story—I had shifted my torch to my left hand and held the pistol—cocked, and with the safety catch off—in my right. I fired when they rushed us, killing one of the brutes. The others—all save one—turned tail and bolted.

I emptied my magazine at the one who did not run. My last shot must have wounded him—even so, he was on me, and bore me down, his jaws at my throat. I tried to fight him off, but it was a losing struggle. He was strong. Then, suddenly, he collapsed on me—dead. By the light from my torch, which was still burning, I saw Susan standing over us. Her own torch was out. It had never been designed for use as a club.

"Thanks," I said inadequately.

She pulled the stinking carcass off me, helped me to my feet.

I shone the beam of my torch around the storeroom, fearing further attack from the surviving dogs. They might well, I thought, be lurking behind the machines, gathering their courage for a fresh attack.

Then, somehow, I became interested in the machines themselves. The only ones that I was able to identify were the Mannschenn Drive units—there was no mistaking that complexity of gleaming wheels that, even in rest, seemed to draw the eye down unimaginable vistas. Several of my bullets, I saw, had hit the nearer of the Drive Units. One bullet—there was no mistaking that bright, silvery splash of metal—had struck the rim of the main rotor a glancing blow.

Suppose the wheel had turned, I thought. Suppose the wheel had turned.... Suppose that, somehow, a temporal field had been set up.... What would have happened? Nothing—according to widely publicized laboratory experiments. Or—to judge from the rumors one heard of other experiments that were given no publicity—quite a lot.

The thought of what might have happened scared me. I blessed the technician who had set up the safety clamps tightly enough to hold the rotor immobile, even under the impact of a bullet.

But...

I remembered the absurd entry in the ledger in that deserted office.

Who had tightened those clamps?

I've been writing this to pass the time for the remainder of the voyage. I have to pass the time somehow. Rayner the Leper—that's me. I'm in bad with the Old Man and the senior officers, and once *that* happens aboard any ship you might as well pack your bags. The Captain has not forgiven me—I don't think he ever will—for disturbing his sleep that night; the duty cadet sounded the General Alarm when he heard the shooting inside the spaceport buildings. All in all, I shan't be sorry to arrive at Port Austral. I've asked for a transfer and I pay off there.

What really does hurt is the lack of any sympathy from Susan Willoughby. I think I'm entitled to it, but I'm not getting it. She had a long session with Welles and Caulfield, apparently, and thinks that she knows *all* about the Mannschenn Drive now. She thinks that if those clamps had not been tightened, if the main rotor had turned, she and I would have gone back in time, would have found ourselves in Port Weldon at the time of the evacuation of the planet—and that, she says, would have been

material of a kind that comes once in a lifetime, if then.

I raised the point of the impossibility of our returning to our own time—except by the slow way—and she said that it didn't matter, that good writing sells no matter when it's written. I pointed out that she had held the pistol on the technician while I tightened the clamps."

"But," she said, "I can't remember it."

"No," I said, "you can't—because it never happened. But it *would* have happened if I hadn't tightened those clamps.

"So you admit it," she flared. "I'll never forgive you for it!" And that was that.

When I first got to know her I had allowed myself to dream, to hope that a casual, shipboard acquaintanceship might develop into something more permanent.

That's all over now—and all because I'm haunted by my own ghost!

—It's back there on a planet in deep space. And I can't help wondering if I'll ever be tightening those clamps again—for another ship putting in for repairs. Most of all, I wonder if I'll be on it. . . .

A New Dimension

NOT LEAST AMONG THE effects of the Australian Revolution was the sudden modernization of the art of warfare. In 1880 there were already in existence many weapons, or potential weapons, which, thanks to the conservatism of the admirals, generals and politicians, were either derided or completely ignored. There was, for example, the steam-operated Gatling cannon, with its rate of fire far higher than that of the hand-operated models. There was the Andrews Airship, a dirigible that flew successfully, with a crew of four, over New York in 1865. Quite fantastically its inventor, Dr. Solomon Andrews, was unable to obtain the backing of either military or commercial interests. (Today's readers, of course, will be familiar with the Andies, the small, unpowered airships that are now used only for sport and pleasure.)

It was the Andrews Airship that added an extra dimension to warfare.

Nonetheless it cannot be denied that chance played a great part in the history of our infant nation. Had it not been for the

severe injuries sustained by Ned Kelly at the Second Battle of Glenrowan, as a result of which his days as a horseman were finished, it is unlikely that, even though he was an innovator, he would have taken the interest that he did in what many of his lieutenants referred to as "new-fangled contraptions."

As it was, however, he took personal command of the first of the armored trains—although it is said that he wept openly when his quick-firing Gatling guns mowed down Colonel Sturrock's cavalry in the action just south of Wangaratta. He never took kindly to the painfully slow, armored traction engines, effective war vehicles though they were.

But Francis Bannerman's salesman, representing both his employer and Solomon Andrews II (the son of the inventor), had no great difficulty in interesting him in the Aereon. One attractive feature was that the ship—or ships—could be manufactured locally. The gas cells would be made from varnished linen. There was plenty of light wood—or even bamboo—for the basket. The necessary cordage could soon be obtained from the Port Melbourne ship chandlers.

With every ship constructed, however, a substantial royalty would have to be paid to Mr. Solomon Andrews in Perth Amboy. It is said that this factor almost persuaded Kelly not to go ahead with the deal, notwithstanding the substantial monetary contributions pouring in from Kelly sympathizers in the United States and elsewhere.

The salesman played his trump card. If the deal were made regarding the Andrews Airship, then the Army of the Revolution could have, for no charge whatsoever, the complete specifications of Professor Lowe's mobile hydrogen gas generator, the device used for inflating the Northern observation balloons during the War Between the States.

"What about an instructor?" asked Kelly, on the point of signing on the dotted line.

"Surely you've a balloonist or two in your country, General," countered the salesman. "And don't forget that I'll be supplying all of old Dr. Andrews' records. Why, once you get the hang of it it'll be as easy as riding a horse!"

For a moment—if we are to believe Kelly's own records of the war—it was touch and go. That reference to horses hit him where it hurt. And yet... like riding a horse? Would it be like riding a horse? There would be skill required, great skill not unlike the skills of horsemanship. There would be speed, and the sensation of speed, and the wind in his hair and his beard.

He signed.

In essential details those early Andrews dirigibles differed little from today's racing models, although, of course, they were much larger. Positive buoyancy, however, was attained by the dumping of ballast; for negative buoyancy it was necessary to valve gas. Helium, as a lifting medium, was not yet dreamed of—but, apart from its flammability, hydrogen is superior. The battery-driven compressor, by means of which, in the modern Andy, lift is reduced, was still many years in the future.

But there was the double "hull", the two side-by-side sausages. There was the intricate network of cordage from which depended the almost canoe-like basket. There was the rudder, mounted abaft the gasbags, with the control lines from it to a simple tiller. Just forward of the tiller and to one side was the inclinometer, no more than a pendulum and a graduated scale.

In those days, however, there were no easily handled cylinders of helium gas. Instead there was the lead-lined wooden tank on wheels, in which were the shelves upon which the iron filings were spread. There were the carboys of undiluted sulphuric acid and the barrels of water and, from the tank itself, the pipe running first to the box-like purifier (in which a lime

solution removed undesirable taints from the hydrogen), then to the cooler (in which the gas was bubbled through water), then to the slowly swelling balloons.

It was a "Professor" Duval who became General Kelly's Chief Aeronaut.

Duval, with free ballooning experience in both Europe and the USA, had come to Australia some weeks prior to the First Battle of Glenrowan (still referred to by the English as the Glenrowan Massacre), hoping to make money for himself by exhibition flights. With the outbreak of the Revolution, however, there was no great demand for such entertainment. The Francis Bannerman salesman knew of him, however, found him in his squalid lodgings in Melbourne, and persuaded him to enlist under the banner of the Harp and Southern Cross.

His expertise was of great value in the construction of the first Aereon. He was inclined to sulk because there was no silk available for making the gasbags, but, said Kelly, if varnished linen had been good enough for Dr. Andrews it should be good enough for him. He refused, too, to have anything to do with Lowe's mobile hydrogen gas generator.

"I'm an aeronaut, General!" he exclaimed, "not a chemist!"

"How did ye fill yer balloons, then?" asked Kelly.

"Even in Australia," said Duval, "almost every town has its gasworks."

"An' am I to fight my battles, Mr. Duval, only in places where there's a gasworks handy?" Kelly asked rhetorically.

"But . . . but, General, do you mean to *fight* in that thing?"

"What else?"

"But I thought it was just for observation."

"Who wants to observe when he can be doing something useful?"

So it was a Mr. Brown, erstwhile chemist's assistant, who

became what was, in effect, Chief of the Ground Staff. The men detailed to assist him hated the work.

But Brown drilled them, and drilled them, and by the time that the first dirigible was completed the chemist was confident that, using two generators, inflation could be carried out in less than six hours.

Actually it was nearer to seven.

Work was commenced at sunrise, at about 5:30 AM, and at 12:30 the double gasbag was taut-skinned, the sunlight reflected from the shiny brown surface. The bottom of the car, however, was resting on the ground, Duval having seen to it that a considerable weight of stones had been loaded into it. Fortunately there was no wind; the ground crew had yet to gain experience in handling an airship prior to lift-off in all conditions.

Kelly emerged from the tent in which he had been lunching with his officers. He looked, Joe Byrne said later, as though he were dressed for a wedding. He was wearing a well-tailored green uniform, high-collared, double-breasted, with brightly gleaming brass buttons. There was more gold at his collar and on his sleeves, and the golden harp badge shone brightly on the band of his wide-brimmed green hat. His flared breeches were thrust into highly polished black boots.

"All that was missing," said Byrne, "was a pair of golden spurs. . . ." But he was limping badly, lurching, almost. It must have spoiled the effect.

Duval, too, was in uniform, one of his own design, based on that of a Hungarian Hussar officer. (It was the rig that he had always worn as a showman when making his free balloon ascents. He looked, said Byrne, like an organ grinder's monkey.) He was a little man, dwarfed by the giant, bearded Kelly.

According to all accounts, despite the bravely upthrusting points of his waxed moustache, he looked scared. "But Ned," (Byrne again), "he looked like a boy on his way to tumble some fair colleen. . . ."

While Brown, in his shabby, acid-spotted clothing, fussed around like an anxious mother hen, the two men clambered into the car—first Duval, then the General. Duval—who, after all, was an experienced balloonist—negotiated the network of suspension lines without great difficulty. The much larger Kelly had trouble. But he got through at last.

Then an argument started, audible to all around the dirigible.

Kelly, it was obvious, was insisting that he was in command for this maiden flight.

"But, General," Duval was expostulating, "you're not a balloonist. I am. Am I not your Chief Aeronaut?"

"Have ye ever flown one o' these things, before, Mr. Duval? Tell me the truth."

"No, but. . . ."

"Then just do as ye're told. Start heavin' out the rocks!"

The little man obeyed while General Kelly stood in the after part of the car, his big right hand grasping the tiller. Brown was looking more and more worried. According to his calculations—and to those of Duval—there was enough lift in those two-hundred-foot-long sausages to carry five men of Kelly's weight aloft, all being well. . . .

Then the forward end of the car was lifting from the ground. There was a ragged cheer as men saw that the dirigible was gliding ahead, was lifting. She was airborne, gliding upwards at a shallow angle, with General Kelly standing tall and proud at the tiller. She was increasing speed through the air as she lifted. Something green fell from the car, fluttered slowly earthwards. It was the General's hat.

But would she clear those tall eucalyptus trees? Men heard, faintly, Kelly roaring orders to Duval. More rocks were jettisoned and then the little man scampered aft to trim the ship further by the stern. She cleared the treetops with feet to spare.

She was turning then, coming around in a great, lazy arc, still rising. When she returned over the camp she was all of a thousand feet high. "It ain't natural!" somebody was shouting. "It ain't natural! It's the Devil's own work!"

"God made the laws of nature," said Brown, who, it seems, had his pious moments. "God made the laws of nature, and we're doing no more than to use what He gave us. . . ."

The airship was no more than a speck in the northern sky, almost invisible in the glare of the sun, when she turned again. She was losing altitude slowly, gliding in at a shallow angle. Before long those with keen eyesight could see that Duval was now at the tiller and that Kelly was in the middle of the car, leaning outwards. He was holding something in his hands.

In spite of Brown's protests somebody had lit a cooking fire, although it was some distance from the gas generators. Over it was a tripod, and hanging from this a cauldron in which was cooking a mutton stew for an evening meal for some of the men. The falling rock struck one leg of the tripod, which collapsed. Contents of the cauldron were scattered over the grass and into the fire.

Everybody, except the men whose meal had been ruined, thought that it was very funny.

Then, slowly, the ship settled, almost in exactly the same place from which she had lifted. Brown and his men took hold of the edges of the car and the suspension network, while others hurried to the scene with more rocks. It would not do to waste too much hydrogen to compensate for the loss of weight when the two aeronauts disembarked.

Joe Byrne lounged up.

"And so ye're goin' ter drop rocks on the English bastards, Ned?"

"Not rocks, Joe," said the General. "Not rocks. . . ."

At that time the only military explosive in general use was gunpowder. The bombshell, fired from muzzle-loading cannon, was a hollow ball filled with black powder and with a fuse ignited by the discharge. Nonetheless dynamite was in existence, although used only in mining operations. Fulminate of mercury and guncotton were both available.

Until the Australian Revolution, Francis Bannerman in New York had dealt only in second-hand arms. Among his employees, however, were those who were sympathetic to the Australian rebels (as he was himself) and who, like Ned Kelly, were innovators. It could be argued, of course, that Kelly's use of body armor during his early career was a backward rather than a forward step—but had it not been for this protection it is probable that he would not have survived to become the founding father of the Australian Republic.

There are fragmentary records of a meeting held between Francis Bannerman and his more imaginative salesmen in the offices of the Army & Navy Surplus Stores on Broadway, New York.

One of the salesmen said, "The trouble with you, Frankie, is that you're selling the weapons of yesterday's war to fight today's battles."

"As long as the customers pay, cash on the nail, why should I worry, Mick?"

"Sure, Frankie, they're paying. But that's not the way for us to make *real* money."

"Show me a better one."

"Sell the customers the weapons of tomorrow's war to fight

today's battles. We've a marvelous proving ground Down Under. There'll be observers from all the major powers. We'll buy the rights to construct the Andrews Airship from old Dr. Solomon Andrews' son. We'll encourage Dr. Gatling to do what he's always talking about—make a machine gun worked by a little steam engine instead of some poor bastard sweating his guts out turning a handle. We'll. . . .”

“That airship,” said Bannerman thoughtfully. “Would it carry guns? Could it lift one of those new-fangled Gatlings you're talking about, complete with ammunition *and* the steam engine *and* the coal to boil the boiler. . . .?”

“The Steam Gatling,” said the salesman, “will be an ideal weapon to fit aboard steamships and armored trains. But not aboard an airship. Apart from anything else there's the fire hazard. . . .”

“So what'll your bold aeronauts be using, Mick? Bows and arrows?”

“No, Frankie. Bombs.”

“Then, taking the words from your own mouth, what about the fire hazard? Somebody'll have to strike a match to light the bomb fuses before droppin 'em.”

“I've a man, Frankie, who's a mining engineer. He's used to working with dynamite. He's told me how a dynamite bomb could be made. There'll be the main charge and, sitting inside it in its own little cannister, what he calls the primer. Guncotton he's thinking of using. And inside of the primer there'll be the detonator—fulminate of mercury. I don't need to tell you that *that's* very touchy stuff. So—you drop the bomb. It hits, hard. The fulminate goes off. The guncotton goes off. Then the dynamite. I, for one, wouldn't want to be around when the Big Bang happens.”

“And if these bombs work,” said Bannerman thoughtfully, “we'll be in on the ground floor. If the airships work, that

is. . . All right, Mick, you just carry on unloading the second-hand stuff on to Hanrahan so that the next shipload of Irish Volunteers is armed as well as the Union Army was at Gettysburg. And I'll be seeing Mr. Solomon Andrews in Perth Amboy and Dr. Gatling at Hartford. . . .

"I'll say this for you—you're a salesman. I like the way you put it—fighting today's war with the weapons of the next one. Now all you have to do is convince the man Kelly and his American backers. I hope you do—if only to wipe the grin off the faces of the lousy British!"

The eventual success of the Australian Revolution owed much to the inventive genius of two men—Solomon Andrews and Richard Gatling. Both were prolific inventors. Both were more than merely competent physicians—and yet they owe their fame to the killing machines that they produced. The British and pro-British forces fighting in Australia were, of course, equipped with Gatling guns but, once the supply of arms from the USA was in full swing, only the Australian Army and Navy had at their disposal the steam-operated weapons with their bigger caliber and far higher rate of fire. It is on record that both Francis Bannerman and Dr. Gatling tried to interest the British military establishment in these weapons. One elderly General is supposed to have said, "Damn it, sir! Warfare is for soldiers, not engineers!"

Similarly, neither the War Office nor the Admiralty wanted anything to do with Dr. Solomon Andrews' Aereon. High-ranking bureaucrats, admirals, and generals were quite unanimous: "If God had meant us to fly, He'd have given us wings."

British sympathizers must have seen the test flights of the first of the Andrews airships—*Pride of Erin*. Word must have reached Imperial Army Headquarters in Sydney of the thing that flew

against the wind, swooping and soaring, circling. But neither for the first time in history nor the last were eyewitness reports disbelieved and derided.

So the rebels had a balloon. So what? Observation balloons were nothing new. They had their uses but, in the long run, they were rather more trouble than they were worth. A balloonist could watch a cavalry charge but he couldn't do anything to stop it.

Meanwhile the first consignment of dynamite bombs arrived in Adelaide—then still in Imperial hands—packed in cases which, according to the ship's manifest, contained canned meats. By an overland route they found their way first to Melbourne and then to General Kelly's headquarters at Glenrowan.

The arrival of the train with the new bombs was the only good news that day. The pro-British forces were making a determined thrust south from the New South Wales border, with horse, foot and artillery. General Kelly had sent one of his armored trains, under Colonel Hart, north to stem the advance. In an earlier action, near Wangaratta, the Imperial cavalry had attempted to charge one of these monsters but had been mown down—but even the cavalry commanders of those days were capable of learning by experience.

This time there was a pretended retreat, a withdrawal before the deadly 1½-inch Gatling cannon, firing cannister, could be brought to bear. A small party of brave men, hidden in the bushes at the side of the track, remained behind. It was their duty to jerk the wires that would initiate the detonation of the mines buried under the permanent way.

It was a Lieutenant Coverley of the Royal Artillery who was in charge. Had he survived the engagement it is probable that he would have reached high rank in the military profession. He

allowed the two leading cars, which were forward of the locomotive, to pass over the explosive charges, giving the order to fire only when the engine was almost at the danger point.

According to contemporary accounts the locomotive rose bodily into the air in a cloud of smoke and steam, disintegrating as it did so. When it came down there was another explosion—this time the boiler. Colonel Hart, the driver, Angus McPhail, and the two firemen, Peter Wherret and Isaac Sangster, were all killed.

But, fantastically, none of the cars was overturned although those behind the engine, four of them, were all derailed. In one of these were six horses. Captain McVicar ordered these disembarked and then sent Sergeant Murphy and Private Kennedy galloping to Wangaratta, which was in Rebel hands, so that an urgent telegram, with news of the disaster, could be despatched to Glenrowan.

The news reached Kelly while Brown—now Major Brown—the pharmacist turned military engineer, was supervising the unpacking of the dynamite bombs. They had been shipped unassembled—the bombs themselves, plain metal cylinders with open tubes running through them longitudinally, the primers, smaller cylinders that would fit inside the tubes, and the “pistols”, each with a nipple containing fulminate of mercury that, when the bomb was armed, would fit snugly into the can of guncotton. Each item, of course, was in its own packing case and the detonators were nested in cotton wool.

Major Brown became aware that Kelly was bellowing orders.

“Duval—I want the *Pride of Erin* airborne! Yes, now! Never mind the leak—just daub it with tar or something! Brown! Where the hell are ye? Get that generator o’ yours workin’! An’ how many riflemen can the *Pride* carry?”

Brown walked to where Kelly was still roaring orders.

"What's wrong, General?"

"What's wrong, ye ask? The bastard British have got Steve and his train, that's what. At Byawalla. The only way that we can get help to them in time is by air. . . ."

"With four riflemen in an airship, General?"

"How else, damn ye?"

"But the bombs have come."

"The bombs. . .," repeated Kelly. "The bombs. . . ." Then, "Are ye sure they'll work?"

"The thing that scares me," said Brown, "is that they might work too soon!"

Fortunately his men were capable of operating the hydrogen gas generator without his supervision, and while he was assembling the bombs—priming but not arming them—the *Pride of Erin*, the wrinkles smoothing out from her starboard gasbag (the one with the slow leak), was straining at the mooring lines that secured her to the ground. Duval—according to Joe Byrne—looked as though he were about to shit himself as he watched. Kelly had decided that the Chief Aeronaut would be the pilot and that he, himself, would be the bombardier. Apart from anything else, he was one of the few men in the camp capable of lifting one of the dynamite cannisters by himself.

Brown had four of the bombs loaded into the car and ballast thrown out to compensate. Using a fifth bomb he gave Kelly hasty instructions. "When the bombs are primed, General, they're still fairly safe—but once you shove home the 'pistol,' the detonator, like so, the slightest jar is apt to set them off. Here are the four 'pistols' for the bombs that you'll be carrying. . . ."

"Arm the bombs now!" ordered Kelly.

"But, General. . . ."

"When I carry a weapon, *Major* Brown, I want it ready for use at once, not after ten minutes or so fartin' about!"

So Brown armed the four bombs in the airship's car.

At three o'clock on the afternoon of a fine summer's day, with the wind blowing from the north at about five knots, the *Pride of Erin* lifted sluggishly from the Kelly headquarters. Many history books give this date, December 14, 1883, as that of the first bombing raid in history. This is not correct. In 1849 the Austrians attempted to bomb Venice from unmanned Montgolfier balloons. Nonetheless the Battle of Byawalla was the first occasion when bombs were dropped from a manned aircraft.

Despite the head wind the *Pride of Erin* made good time. The hastily applied patch on the envelope of the starboard gasbag—a square of linen stitched on with coarse thread and smeared with hot beeswax—seemed to be holding. Ballast—there was not much of it to play with—was dumped, and the dirigible glided skywards at a shallow angle. At about 2000 feet Duval, increasingly worried about the untested repairs, valved hydrogen and made a downwards swoop. It was a shallow dive; of necessity he was sacrificing speed for the conservation of lift and ballast.

There was an altercation between the General and his Chief Balloonist, but Kelly finally saw reason—or Duval's version of it—and allowed the aeronaut to do things his way. (It has been suggested that Duval was afraid that too steep an ascent or descent might cause the primed and armed dynamite bombs to roll, to come into violent contact with each other, thus jarring the unstable fulminate of mercury into premature detonation.)

The Aereon passed over Wangaratta, where people in the streets of the little town stared upwards, pointed, and waved. She followed the railway line to the north-east. Duval climbed

again in preparation for the final swoop. The armored train was within sight. Its crew was still holding out. They were protected by the armored sides of the cars and, very fortunately as it turned out, Colonel Hart had insisted that rifles and ammunition for the entire crew be carried. Somebody had managed to convert one of the Gatlings to manual operation, but its fire was slow and hesitant.

On both sides of the track were the Imperial forces, pouring volley after disciplined volley into the crippled train. Perhaps they were not—as yet—doing much damage, but their supply of ammunition was not likely to run out.

And there was the artillery that had been brought up, two six-pounders. The guns had not yet been brought into action but they were being deployed, the crews manhandling them to a position on a low hill to the east of the railway track. The gunners, in their blue and scarlet uniforms, must have been sweating like pigs in the hot afternoon sun but they were working with calm efficiency, hauling up the ammunition carts with balls and powder, the water tubs, and the sponges on their long handles.

Nobody, either aboard the train or on the ground, looked up as the *Pride of Erin* swept overhead.

It was General Kelly's intention to turn and to bomb the six-pounder battery on the return run to the southward. The wind, however, was now somewhat west of north and increasing, and the dirigible was blown off course. Duval did his best to cope with the changing circumstances, but on her final, downswopping run the airship was coming from almost directly behind the gunners, who were in a direct line with the crippled armored train. And those cannon were now loaded, were being laid and trained.

Kelly, grunting with the effort, lifted the first of the dynamite bombs, held it out over the side of the car. He dropped

it. He turned and stooped, picked up the second one, then the third, then the fourth. The *Pride of Erin* was rising steeply now, almost out of control. Looking down and astern Kelly saw the first bomb hit, saw the flash, and heard the ear-shattering roar. It was not quite a direct hit, but the two guns were knocked off their wheeled carriages. There was a secondary explosion as the ammunition cart went up. He saw the second and third bombs strike — falling, as he had intended, among the infantrymen.

The fourth bomb, he was to admit afterwards, he should never have dropped. He should have realized that with the rapidly increasing altitude of the airship its trajectory was extended. It scored a direct hit on that car of the armored train in which the bulk of the Gatling ammunition had been stored.

But that, at the moment, was the least of his worries.

The hastily applied patch had blown and the airship was losing altitude. Fortunately, with all his faults, Duval had developed into a superb airshipman and the *Pride of Erin*, with the following wind assisting her, almost made it back to Glenrowan, finally touching down on the railway lines with everything possible jettisoned, even to the uniforms of the two men, in the fight for buoyancy.

"'Tis a pity, Ned," said Joe Byrne, "that ye had to get *our* train as well as the British guns. . . . Sort of throwing out the baby with the bath water. . . ."

"Such is life," the General is supposed to have growled.

AUTHOR'S NOTE:

Dr. Solomon Andrews (1806-1872) was both a physician and a remarkably prolific inventor. His "Aereon" was patented in 1864, after its first successful flights. Quite fantastically, he was unable to gain support from either military or commercial interests and, even more fantastically, he is not represented in the Lighter Than Air Gallery of the National Air and Space Museum in Washington, D.C. Nonetheless, I have to thank Mr. Philip D. Edwards, one of NASM's Technical Information Specialists, for finally unearthing for me the patent taken out by Dr. Andrews.

Professor Lowe was the Union Army's Chief Balloonist during the War Between The States. He invented the mobile hydrogen gas generator, which was used for the inflation of observation balloons. I must thank Miss Brenda Beasley, of the National Archives, Washington, D.C., for helping me to find the specifications and operating instructions for this device.

Francis Bannerman set up as a second-hand arms merchant shortly after the conclusion of the War Between the States, purchasing both Union and Confederate weaponry and selling it to anybody as long as it was "cash on the nail." He is reputed to have armed just about every South American revolution during the late 1800's. I am indebted to Mr. Goins, curator of the Division of Military History, Smithsonian Institution, Washington, D.C., for valuable information regarding Bannerman and his activities.

Dr. Richard Gatling invented the machine gun that bears his name, patenting it in 1862. Perhaps the steam-operated Gatling is my invention—although Gatling himself must have toyed with the idea. Nonetheless he did produce an electrically-operated gun, with a very high rate of fire, in 1890. So far as I know there were no buyers. The electrically operated Vulcan machine gun, however, used by today's American air forces, is a direct descendant of the Gatling.

With respect to the dynamite bombs used in this story, I admit that they are modeled very closely on the depth charges that were among my toys

during World War Two, although with these the "pistol" was fired hydrostatically and not by impact. In actual history the first use of modern high explosive in warfare was during the Russo-Japanese War (1904-1905).

Finally, as we know from comparatively recent history, civil wars are ideal opportunities for helpful outsiders to try out new and hitherto untested weapons.

The Unharmonious Word

THEY COME AND THEY go, these parlor games played on fancy boards and with fancy counters, tiles or whatever. Mah Jong had its day, as did Monopoly. Now Scrabble is all the rage—and I, for one, will be rather relieved to see it superseded by some other ingenious method of wasting time. It's . . . dangerous. Oh, I admit that the conditions were just right—but I'm not altogether convinced that the pentagram was essential, not for the actual *calling*, that is. There's always the chance, and not overly slim, either, that some desperate, point-hungry player might stumble again upon that literally unholy combination of vowels and high-scoring consonants. (Frankly, I shouldn't mind doing it again myself just once; just once and with proper safeguards.)

We were three nights out from Liverpool when I saw the game for the first time. I'd left the bridge at eight p.m., as usual, and had made my usual rounds; then, on my way back to the officers' flat, I looked into the Smoking Room. There were three of them playing Scrabble—the others, with the Old Man,

were playing cards. There was Mrs. Wade, a middle-aged schoolmistress, Mrs. Haldane, the widow of an Australian businessman, and Mr. Whitley, who was supposed to be an author of sorts—although I've yet to see anything of his in print.

Mrs. Wade and Whitley were quarreling violently.

"It is a verb!" Whitley was saying. "Mind you," he went on virtuously, "I wouldn't use it as such. I have too much respect for syntax. But it is a verb."

"It's *not*, I'm telling you. Oh, here's the Chief Officer. What do *you* think, Chief?"

"What's it all about?" I asked.

"Oh, you play the game like a crossword puzzle. Whoever starts does so in the middle, using as many tiles as possible—there's a bonus of fifty points if you use all seven. Then the others build up and down and out from the original word—but it must be words, *real* words. . . ."

"It is a real word," said Whitley. "Look, Mrs. Haldane went across from TAX, adding E and I and T, and made EXIT. I added E and D, and got my D on a Double Word square, to make EXITED."

"'Exit' is *not* a verb!" almost screamed Mrs. Wade.

"But it is." Whitley picked up a heavy book. "It's in the dictionary. Here we are. 'Exit. Verb intransitive. To go out; depart.'"

"Yes. It's in your dictionary. Your *American* dictionary."

"Has anybody a better one?" asked Whitley, reasonably enough.

"I *think* I've seen it used in *Time*," I said cautiously.

"Yes—and 'balding' too, no doubt. *Americanisms!*"

Well, they went on arguing about it until Whitley, with a very bad grace indeed, withdrew the offending ED. The game finished shortly thereafter and Whitley excused himself, saying

that he was going to write at least another chapter of his novel.

"Going away to sulk, he means!" snorted Mrs. Wade. "What about you, Chief? Will you play?"

"I'd like to," I told her.

Oh, it's a fascinating game all right, especially if one happens to be, as I am, a crossword-puzzle addict. Every night after dinner I'd make up the four—it was always the same: Mrs. Wade, Mrs. Haldane, Whitley and myself. At times both Mrs. Wade and Whitley would get rather peeved with me; they—one, as I have said, a schoolteacher and the other a writer—thought that they were the only ones who knew anything at all about words, and I was able, now and again, to score heavily with the name of some essentially maritime article. Mrs. Haldane was less egotistical than the others, but played a sound, cautious game, never leaving the way open for those following her to make a really high score.

Did I say that we played every night? No—it wasn't quite every night, as a matter of fact. There were the five films—our ration for the voyage—to be shown, and one evening one of the other passengers, a rather too hearty life-and-soul-of-the-party type, decided to give an amateur conjuring show. It wasn't bad—although we would far sooner have played our usual Scrabble—and I don't think that anybody saw through more than half of his tricks.

It was for one of his tricks that he used the pentagram. He had borrowed some black, greasy crayon (used for making separation marks on butter cartons, apple crates and the like) from the Second Mate, and with it drew the five-pointed star on the linoleum of the Smoking Room deck. In the middle of this star he put a bucket, and in the bucket he burned an envelope alleged to contain a pound note borrowed from the Captain. The trouble started when it was discovered that something had gone wrong somewhere, and that the incinerated envelope *had*

contained the pound note.... The Old Man was still more annoyed the next morning when the Chief Steward reported to him that neither scrubbing brushes, soap, water nor new-fangled detergents would shift that pentagram.

The night after the conjuring show we played Scrabble as usual. One of us remarked that our table was standing right in the middle of the pentagram, and suggested that "pentagram" would be quite a good word to use, although it would have to be built up from "pen" or "pent." We were the only ones in the Smoking Room—the others were in the Lounge, where the life-and-soul-of-the-party type was maltreating the piano.

It was an uncomfortable sort of night—hot, and sticky, and the ship was lurching just enough to make movement awkward and, for some reason, creaking far more than usual. We hadn't been playing for five minutes when Whitley and Mrs. Wade were at each other's throats. She used a word—"leet"—and claimed that it was old Anglo-Saxon for a meeting. Whitley, having looked for it in vain in his dictionary, said that there was no such word and refused to allow the score. There was the inevitable squabble about the American origin of the dictionary, and Mrs. Wade, as she always did on these occasions, wished audibly for a *real* dictionary—the *Oxford Dictionary*, for example—and told me that my employers had been very remiss in not providing one.

Anyhow, we played on, and eventually the game reached the stage when there were very few tiles left in the box, and very few squares on the board on which to place tiles—to place tiles *and* to make sense, that is. It was my turn, and I was able, rather to my surprise, to get rid of four tiles—S, I, O and N went on to TEN to make TENSION. I picked up the last four letters, saw to my horror that I had Q (and I hadn't got a U either), X, Z and two W's.

The others played. Whitley put an A onto a vacant I and scored a humble two; that three-toed sloth is to the Scrabble addict what the gnu is to the crossword-puzzle compiler. Mrs. Wade got a couple of EN's with one E and exclaimed, "Thank God for the printer's measure!" Mrs. Haldane found another vacant I and added a D to it.

It was my turn again.

I looked at the board; I looked at the seven quite impossible letters in their rack. I looked at the board again. What actually happened, I can't tell you. I can't remember picking up the tiles, I can't remember putting them down. But I must have done so. Suddenly, quite suddenly, I was staring at what seemed, even then, to be a most unholy combination of letters.

"There's no such word!" exploded Mrs. Wade.

"There is so!" said Whitley automatically. "I'll check in my dictionary."

"Your *American* dictionary! Why, you can't even pronounce it!"

"I can," said Whitley.

He did.

There are some sounds not meant to be heard, ever. That WORD was one of them. Whitley slumped back in his chair, deathly white. Mrs. Wade's florid complexion faded to a dirty grey. Mrs. Haldane, naturally sallow, showed her horror by staring eyes and open mouth. Myself? Well, if I looked as bad as I felt I must have looked overdue for the graveyard.

And suddenly it was quiet. The normal creakings of the ship's uneasy movement were stilled. The crash and tinkle of the piano in the nearby Lounge were no more than a ghostly tintinnabulation, incredibly distant, thin and dreary.

Overhead, the lights dimmed and faded, dimmed and faded,

glowed faintly with a color that was neither red nor blue, yet somehow had the worst qualities of each.

And it was cold.

Over the table, over the board, there was... *something*. A mist it was at first—a pallid, greenish mist, swirling sluggishly, congealing slowly. The thing that, at last, stood on the board was not human—neither was it anything else. Its body could almost have been that of one of the smaller dinosaurs.... Almost. Its head was more apelike than reptilian. It stank of burning sulphur.

"Well?" it asked irritably. "I haven't got all night, you know."

As it spoke, one horny toe was disarranging the tiles on the Scrabble board, shuffling them.

"Well?" it asked again.

Whitley started to laugh. It wasn't hysterical laughter—the man seemed genuinely amused at something.

Tough guy, I thought. *All right—I'll be tough too.*

"What's the joke?" I asked (I hope) calmly.

"It is funny, Chief," he said. "Really funny. The pentagram—and I must warn you not to let any part of your bodies get inside it, its function is to stop the demon from getting at us—the sacrifice, and then the WORD.... I did some research on demonology once, for a novel."

"The sacrifice?" asked Mrs. Wade. "I can't remember any virgins getting their throats cut in here tonight."

"Last night," said Whitley. "In spite of the time lag it worked."

"*Last night?* Even then there wasn't a sacrifice."

"There was so. The Old Man's pound note."

"You called me away from a poker session," said the demon sulkily. "No less than fifty-two souls in the kitty."

"That's just too bad," said Whitley. The color was back in his face now. "I suppose that the usual rules are still in operation."

"We play deuces wild, of course. . . ."

"No, *no*. Wishes, and all that."

"Yes. I obtain my release by granting a wish."

"One wish each," said Mrs. Wade.

"No. One wish. Period. Haven't you heard of the Award?"

"I wonder if I dare. . . .," Mrs. Haldane was murmuring.

"But. . . 'The Monkey's Paw' . . ."

I looked at Whitley, knew that he was thinking as I was, was remembering Jacobs's tale of the three wishes, and the mutilated man called from the grave and knocking at the door, and the last wish being used to send him back. . . .

"We shall have to be careful," said Whitley, then. "A foolproof wish. . . h'm. . . my novel. . . Hollywood. . ."

"I've got a ticket in the Irish Sweep," I said.

"But you didn't *say* the WORD. I did."

"But I put it down."

"And *you*," said Mrs. Wade to Whitley, "only said the WORD because *I* told you to."

"We're all in this," said Mrs. Haldane. "I think that we should be able to handle it like civilized people."

The demon laughed. "When you mortals start using *that* phrase, the Old Man puts on an extra shift of stokers!"

The widow ignored this.

"You'll admit, all of you, that what has happened has happened as a direct consequence of the interaction of the personalities involved. As I said—we're all in this together. The Wish, when it is made, should be something for the common good."

I could, I thought, give each of the others a quarter share in my Sweep ticket. . . .

"The common good," repeated Mrs. Wade. "That's easy." We waited to hear her proposal. "Bring us," she ordered, addressing the demon as though he were a half-witted juvenile delinquent, "a *good, English* dictionary."

I have never been able to condemn Whitley for throwing that thick, heavy book over the side, and the Scrabble board and tiles after it.

This book was designed by D. Christine Benders, set in 10-point Bembo by Chip Hitchcock and Greg Thokar at Typo-Tech Reproduction Center, and printed on Pinehurst 60# white offset by McNaughton & Gunn Lithographers, Chelsea, Michigan.

