# STARTUNG STORIES

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#### **A Complete Novel**

#### THE SHADOW MEN By A. E. VAN VOGT

When he allowed Marie Chanette to die, Lieutenant Cargill tore open the fabric of time to come and found himself haunted by an inescapable destiny!

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- THE RETURN OF CAPTAIN FUTURE........Edmond Hamilton

  Curtis Newton, the Man of Tomorrow, and his inseparable comrades clash in

  fierce combat against Mankind's deadliest enemy—the Linid!

#### **Short Stories**

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### the LAST ADMINAL

They scrapped the Navy, and they told old Admiral Barnell he
was through—but even these politicians of the future
should have known you can't teach an old space dog new tricks!

## A Story in the Scries on the Conquest of Space



Biddle. He was the last admiral, as David Glasgow Farragut had been the first. It was hard to take, hard to be the last man to be piped over the side of a gleaming man-of-war, hard to know that after him the traditions of the blue and gold were dead.

He stood up and pulled his boat cloak from the rack and wrapped it around him. The offices were empty as it was late, but the sight of these desks chilled him with their bare expanses, clean of all work. These desks would be serving tailors and bonfires in another week.

He went into the yard, walking slowly over the wet and grimy cobblestones, holding his boat cloak up against the steady rain which drummed on Portsmouth. He should have gone home but he did not and wandered instead down toward the fingers of light which reached to him across the water from the town. The docks were deserted. Half a dozen men-of-war, all but one of them decommissioned and all of them scheduled for scrap, lay in their berthings, silent, gloomy in the downpour.

These were the last ships: a cruiser, three submarines, a tanker and an old destroyer, unseaworthy and eaten up with rust, foul with barnacles and salt rime. Soon they would be ships no more but twisted metal plates at so much the pound.

"An indulgence of a sentimental and conservative society," General of the Air Gonfallon had called this ghost of a navy, and Admiral Barnell, sitting in the dark and rain stirred uneasily as he remembered those words. They had somehow included himself yet he was only fifty-four.

THE scene of the final hearings rose before him out of the mists. The politicians, the generals, and only himself from the Navy. The lofty, grating patronage of them had eaten into him deeply. They humored him. They laughed "understandingly" about his "hobby" and they cut the Navy off from all appropriation of any kind whatever.

He had faced them then like a bad-

gered old sea lion. "You tell me," he had said, "that the day of navies is done, that man has transferred all his fighting techniques to the air! I want to remind you, gentlemen, that there is yet another arena of battle about which you have no thought. The Army has placed satellites spinning around Earth to guard her from illegal atomic manufacture. Airplanes can land in any weather and carry any troops to any scene of action in a matter of hours. But, gentlemen, there is this one thing on which you have not thought: space."

They had looked at him with pleasant smiles. They could understand the reluctance of a "battleship admiral" to see his service vanish forever from the eyes of men. A few words from him could do no harm; he was entitled to say them, of course.

to say them, of course.

"Two hundred years ago," he contimued, "the Navy attempted to carry out a project of a voyage to the Moon. Private researches and Army jealousies forestalled that effort; but it was naval research data which actually made space flight possible. You are entered now upon a period of space conquest. Every few weeks explorational expeditions return from the stars to tell us of even wider horizons for man. Daily, exploitational vessels put out from cur major spaceports. And five major colonies have been planted on as many planets. The significance of these things should not be lost upon you.

"Far colonies mean commerce. Commerce will come to mean piracy. The day is already over when the mere fact of being a space voyageur makes one a noble hero. There are lawless elements already adrift amongst the far planets and there will come a time when these constitute a real menace to our expansion into the stars."

They heard him out. After all, the old gentleman had a right to say his say. After all, he was losing a good job.

"I wonder if any one of you have given any thought," continued Barnell, "to the problems incident to warfare in space. And yet those problems are complex and in need of solution. An airplane, even a stratosphere airplane, is one thing. A space vessel is quite another. A service which has the somewhat hit-or-miss experience of piloting aircraft of various small sizes is entirely and completely incapable of appreciating the problems of manning, handling and controlling space craft.

"Gentlemen, a space man-of-war is essentially no different from a large submarine. It is not and will not be a gigantic aircraft, up for a few hours or days and then back to solid ground again. Sloppy discipline, lack of routine and bad morale are relatively unimportant to aircraft. But in a space manof-war we will have to return to the days of Nelson to discover the means of keeping crews in close confinement, in strict and alert obedience for possible years at a time.

"Have you ever thought of planetary blockade? I think not. Have you ever conceived the mathematics necessary to space gunnery where one ship's speed combined with its opponent's may amount to hundreds of light speeds? I think not.

"A man-of-war is essentially a gun platform. She is devoted to seeking and destroying enemies, to blockading and to punishing whole communities. She is a vibrant life force in herself and is not only a complicated mechanism of machinery but also a complicated and intricate problem in humanity.

"If you, gentlemen, with your aircraft, your infantry and your space transports can solve these problems, then I willingly abandon this fight for my service. But you have not solved them, gentlemen. And there will come a time when the very existence of Earth itself will depend upon the learning and tradition which has now its last repository in a service you are disbanding—the United States Navy."

They smiled and the chairman thanked him. And they cut off the last appropriation. And sitting here in the dark and rain with the final orders like an ache in his mind, old Admiral Barnell knew how much he had failed. But he was failing not only himself. He was

failing the few hundred bright young officers and technicians and the few thousand men who remained. He was failing John Paul and Farragut. And he was failing Earth.

Tomorrow he would have to brace into the last task. He had better go home and get some rest. He had dismissed his aide earlier with his car and he went down to the gate to find a cab. The two marines in the box, apprehensive and sensing the doom which was overtaking their proud service in common with the Navy, hurriedly stood to attention while the corporal of the guard ducked across the street to the cab stand.

The old admiral stood, unseeing, beside the guardroom table, steadying himself with one hand. He felt strangely ill. The evening paper was under his fingers where the corporal had hastily dropped it. To distract himself from the way the room had sought to tip he looked fixedly at the headlines.

#### COLONY BLOWN UP

Johnsonville on Twain Destroyed

Expedition Reports
. Disaster

Barnell shook his head sadly and was about to put the paper away from him when the text caught his eye:

"According to the expedition commander, the attack must have come from outer space. The 116th Cavalry post and the 96th Anti-Aircraft battery were evidently unwarned and the majority of the soldiers were found in the ruins of their buildings. The entire area was still radioactive and Expeditionary Engineer Martin Thomas expressed the opinion that a crude order of atomic fission had been used, such as plutonium. The planes of the Twain continental patrol were still in their hangars.

"Discounting all possibility of alien invaders, pointing out that foodstuffs

and equipment which would be known and useful only to men had been looted and that the wealth of Johnsonville radium had been the evident goal of the raiders, Extra-Terrestrial Secretary Sime warned against panic, 'Earth,' he said, 'is amply and adequately protected against such raids and has been for the past century. There has been no relaxation of the atomic defense organizations nor will there be. This is obviously the work of some anti-social group of men who have possessed themselves of the means for one raid. We do not expect any repetition. I have asked the army to send relief transports and further garrison to these invaluable possessions...'"

Barnell had been holding the paper closer and closer to his face as he read. Now he thrust it from him with an anger which tore it. At that moment the corporal of the guard, startled by the expression on the admiral's face and the sound of the paper, stood stiffly to attention.

"Your cab, sir."

"Confound the cab! No, keep it there. Where's your phone? Where's your phone?" He snatched it off the desk and called the civil airfield.

The Navy had no planes now, having long since lost them to the Air Command of the Department of Military Defense. But his quarterdeck voice brought the admiral a civilian plane on charter in less than a minute. He rang again and futilely fumed into the mouthpiece at aides who disappeared when they were needed. Leaving orders for Lieutenant Mandville to follow him as soon as possible, he got into the cab, headed for the airport. Ten minutes later he was roaring upward through the rain toward the nation's capital.

Washington received him coolly. It had no time at the moment for admirals. Officialdom was trying to press into service transport by which to send to outflung colonies the means of defending themselves against raids and was discovering that whereas spaceships could carry men and animals and baggage with ease, the number of ships

available which could transport a 10,000 ton psi-screen dynamo was exactly none

Old Admiral Barnell spent what he considered three precious hours trying to catch Extra-Terrestrial Sime. Cooling his heels in that gentleman's office put Barnell in no mood for further attempts. He took himself on an even more complicated search, the discovery of Defense Secretary Montgrove.

It was three o'clock in the afternoon before Admiral Barnell could finally lay a few salvos across the desk at this florid politician. Montgrove had been distractedly cordial at first greeting but that had cooled quickly when the admiral's proposal was only half stated.

"My dear sir," interrupted Montgrove, "you fail to realize that you have not, in all your organization, one man competent to pilot and navigate a space vessel. Further, there is no existing appropriation—"

Barnell exploded. "Confound appropriations! Are you not aware, sir, that out there somewhere is a condemned, cowardly crew, a pirate, sir, a condemned pirate! And since when, in all the annals of time, can you find where the army has run down pirates? You can't, sir. I defy you to, sir. And all the anti-attack forces in the world, mounted around the colonies will not do more than protect the immediate confines of some town. Sir, you don't understand the situation. It is beyond you, sir. And I am going beyond you, sir. I am going to the president by right of national security. Forbid me to see him, sir. I defy you to forbid me!"

Montgrove had been raised a ward heeler for all his bluster. He folded fast before the noble rage of old Barnell and was heard to utter a relieved "Whew!" when that officer had gone his angry way.

BUT the president, like all presidents, had "entrusted these matters to competent authority and reliable men" and "disliked to interfere with the duties of his departments."

"You have no department with that duty, Mr. President," said old Barnell. "I respectfully ask you to call any or all of your departments to discover whether or not there is a single effort afoot to patrol planets in outer space or even to perform that most vital function, the seeking out and shooting into splinters, sir, shooting into splinters of that condemned pirate!"

"There has never been an occasion," said the president, "to delegate such a duty, but I am sure the Department of Air has some thought for this."

"Call them!" demanded Barnell.

The call was made and then several calls. And at last, with a puzzled look on his face, the president stared at the old admiral.

"They hadn't," he said slowly, "thought of it. Not until just now. I—" His phone rang and he picked it up, talked for a moment and looked relieved. "Well," he said, brightening, "I was wrong. The Army is going to man a transport and send it out looking."

"A what?" cried Barnell.

"Why, a transport. One of their troopcraft. I imagine-"

"Mr. President," said the admiral, "since time immemorial the Army has had troop transports. And since the first day they got them the Navy has been pulling them off rocks and convoying them through danger."

"But you have no crews. You have

no competent navigators-"

And now Admiral Barnell could smile craggily. "Mr. President, in the past hundred and some years we have had very little work for our officers. We were called the idle service and the burden on the public purse. So we have been happy to loan officers to private enterprises." He leaned forward in triumph. "Thirty percent of the membership roll of the Explorers' Club is composed of naval officers or exnaval officers. Navigation, sir, is the Navy's strong forte! I have the men!"

This was a stopper to objection. But only for a moment. "My dear admiral, even if, as you say, naval officers have been commanding private expeditions for a very long time into space, there is still the matter of a ship. I am sure your sea vessels cannot cope with space. and I am equally sure that funds could not be made available in so short a time to purchase such a ship—"

"Mr. President, what are those things which whir past Washington every day hundreds of miles out? Sir, they are satellites."

"But satellites! Good heavens! They've been abandoned for these many years. Just the other day the Army engineers were debating whether or not it was worthwhile to salvage them. They decided that until they were proved a serious menace to navigation they should remain-"

"I want those satellites!" said Barnell. "The Army put them out there a couple of hundred years ago. There is no corrosion in space. They have never served any purpose whatever. Now I want them."

"But what could you possibly do with them?"

"A naval vessel is a gun platform. I've got the guns. I've got guns that will shoot charge enough to destroy town five hundred miles away. But they need a platform-"

"This is going to take money," said the president, getting confused.

"I have several old naval bases, two navy yards and a few ships to sell for scrap. I can raise a hundred and ninety million dollars in twenty-four hours and use it if you will direct that all naval property be struck off as expended."

"Isn't that a war measure?"

"This is war," said old Barnell, And he so thoroughly looked it that by six he was in the one remaining office the Navy had left in the Defense Building, burning phone wires, authority gripped in a big, seamanlike hand.

And outside the window a newsboy was hawking his wares with, "Mines on Ballerdice Raided! Five hundred Dead in New Disaster! Army despatching forces to stop space raider. Read all about it!"

Barnell didn't care to read. From the files he had records of thirteen officers, engineers, ordnance men, former expedition men and electronics experts. And by long distance they were replying to his barked commands, "Aye, aye, sir. Right away, sir."

Manville, the aide, a harassed young man, entered, already briefed by the old chief yeoman in the outer office, somewhat stunned by all this activity in a place which had slept for generations.

"Any orders, sir?" said Mandville.
"Yes!" barked Barnell. "Get the chief
of supplies and accounts and start him
unloading naval property and have him
grab up, commandeer if necessary, every
scrap of space equipment on the continent not already in Army hands. Get
recruiting to grab, press gang if necessary, every space mechanic they can
find. Tell hydrographic to collect all the
space charts they can locate. And have
ordnance down at Portsmouth start
getting ready to receive Commander
Stapleton tomorrow when he goes down
to break out guns!"

"Will that be all, sir?"

"Oh, yes. Have somebody bring me in some dinner. On the double."

"Aye, aye, sir!"

The United States Navy had begun to move into space.

DURING the ensuing days, while the newspapers unknowingly played up Army relief attempts and civilian experts offered sage opinions on how to make a colony safe, Admiral Barnell and a frantic staff scooped together the ingredients of the first space battleship. It would be cumbersome and uncomfortable and it would never be able to land anywhere. But it could carry guns—missile atom guns and lots of them.

In their files they had found the design, drawn by a naval architect long since dead, of an "ideal" space dreadnaught. It had features which they could not even approximate, not for lack of technology but for lack of time. Appended to that drawing were a series

of comments which had followed its publication in a magazine after the Navy had smiled on it. Chief amongst those comments was one which hurt.

"Who would be so stupid as to drain the public treasuries for the construction of such a useless monstrosity? It cannot carry freight. Its two hundred and fifty man crew would be useless in any construction project. Its bases would place undesirable population in the vicinity of our colonies—"

They could not build that battleship. They could not even attempt it. But it had several features which they used. Its principles were sound. A space man-of-war would have to be able to depart from any course and assume new courses hurriedly. This meant "sidewheeler" drives which were mounted in turrets like guns and which could be swung in any direction, imparting, without upsetting the ship itself, new courses. Four such drives were instantly begun—exterior enginerooms to be fitted in a girdle around a hull.

The next principle was conservation of air in event of hits, which meant intricate compartmentation. The satellites had this but they planned to double it.

The next principle was steady gravity. An electronically inclined commander, by a simple device, tuned the ordinary gravity circuits to the engine throttles so that all acceleration would be attended by proper resetting of gravity, a thing which would keep men comfortable and, more important, would make for steadiness at the guns.

Another principle was the ordnance recoil adjuster which operated to adjust automatically the turret engines each time hits upset the speed and direction of the vessel.

A detector arrangement was developed and built in two hectic days which, using fifth order magnetism, instantly located anything within four light years and trained the guns upon it

They stripped twenty cargo vessels, hurriedly commandeered, of their drives to fit up the four turrets. They gutted them of gear. They compounded their meteor force screens into a kind of force armor. Then, in a mad scramble, they loaded all they had in the twelve freighters they had charted and roared out in a ragged flotilla to intercept the first satellite. Out of the eight satellites available, Commander Simpson had chosen this one in an initial scout. But even so its long, disused condition made the Navy men heavy of heart when they grappled to its sides and boarded.

These satellites had been built by dumping materiel in orbit and then assembling it in space at the speed of twenty-five thousand miles an hour. It had been quite a feat at the time—two hundred years before. The engineer and spotting crews, alert for atomic work below, had idly rebuilt the interiors now and then so that little of the original was as it had been planned.

Nevertheless, despite the ragged and insecure bulkheads, the ancient metal, the fouled oxygen machinery and a hundred other drawbacks, Admiral Barnell tackled the work with a fury before which anything would have surrendered.

Bluejackets in space suits swarmed over the old satellite, burning and welding, fitting and throwing away. For some thousand years or more before that ancient time sailors had carried well the repute of getting things done. And their ingenuity was displayed now in a hundred ways.

For two weeks, living aboard the grappled freighters which remained while the balance ferried up new materials, officers and men hammered away at the satellite. And then, out there in the absolute zero of space, unattended by throngs or bands, old Admiral Barnell and his bluejackets cracked a bottle of champagne across her hitherto unchristened bows and blazoned upon her nose in red lead the scrawled name, "U.S.S. Constitution."

A brief pause of pride and a few shy grins to hide emotion and that weary, grimy lot heaved aboard her supplies, pulled her throttles and broke her out of the orbit which she had followed for two centuries as a hulk.

Old Ironsides did not at first lend herself to man-of-war routine. She was crude, cold and uncomfortable. Her "Officers' Country" was a ledge of bunks with no springs just abaft her bridge. Crew's berthing was anywhere a man could find to put his blankets down and not get stepped on. The galley for the first week consisted of burning torches aimed precariously at coffee pots. Her battle stations were wherever a man thought he should be when action came.

But there was Navy about her. Not just in the dungarees and the lace on the officers' dirty caps. Boatswain's pipes peepled and shrilled through her and commands were received with a cheery aye, aye. Where she was going now, heading out well over ten light speeds and building up, up, up with every hour under the able hands of her conning officers, was known only to her captain and Admiral Barnell.

HER captain, "Ten-Ike Mike" Mc-Granger had received his orders in a brisk, brief quarterdeck snap and he was obeying them. He was a full captain and the veteran of five space expeditions on loan to the Explorers' Club and he had ten officers who had tasted space before.

"Sir," said Admiral Barnell, "you will head in the general direction of Twain with all speed and there rendezvous with supply vessels. You will not, under any circumstances, contemplate the landing of this ship anywhere since I conceive that battleships, to be effective, must be big enough to fight and that's too big to handle alongside a planet. You will keep all detectors alert and report any other craft. And you will hold the usual drill and general quarters to fit the men for their duties. The ship is yours. I shall not interfere. Carry on."

And the days narrowed their distance to destination. Old Admiral Barnell stayed cooped up in his cabin with mounds of space charts. All they saw of him was his aide, his yeoman and his steward. They came to quarters twice each day. They held battle practice. And worked out their various bills for fire and damage control. But no one even tried to figure out how one would go about abandoning ship. That would be something to think about when the time came.

They held target practice with their batteries and coordinated their fire so that, by the time they had held five drills they could pick off a meteor or bit of dust at six thousand miles with a considerable air of confidence. With all formulae relating to gravity not counting, with their missile projectors unimpeded by air, they were finding that their sea weapons had surprising potentialities. The proximity fuses they managed to stretch so that a mile miss was a clear hit. And well before the rendezvous was reached they had screens so rigged that a fifteen thousand mile salvo could be fired with an accuracy of three hits out of ten shots.

They reached Twain and had to wait two days for their supply vessels which, however tardily, finally came up. The assorted cargoes were insufficent in many instances and failed to fill up the lists which department officers had anxiously and hopefully made of things they could use. One set of drives had soured and they gutted a freighter to get another.

Admiral Barnell, in a fast gig he had had made en route, went down to Johnsonville to see what they faced.

He came back grim and tired. They piped him in through the airlock and he stiffly returned the salutes of the sideboys. To Captain Ten-Ike Mike he said:

"All officers in wardroom country, sir."

When they were there he sat at the head of the green-covered board, head sunk on his chest, looking tired and old.

They waited quietly until he told them to sit down and then Ten-Ike said, "Things pretty tough down there, sir?"

Old Admiral Barnell raised hot eyes to the Constitution's captain. "Sir, you

are not old enough to recall the last atom war. I myself was a boy. But Johnsonville is old Chicago again. Dead."

The officers waited. Barnell brushed the ugly scene from his eyes. "They were attacked without warning from outer space. The missiles were probably fired from six or eight hundred miles. Eighteen thousand men, women and children are down there—cooked."

Faces grew hard around the board and the younger officers fidgeted, anxious to slash out to a new destination and come to grips with an enemy.

Barnell looked at them. "I understand your feelings, gentlemen. Atomic war was theoretically banished forever from Earth. It was 'banished forever' five times. And now it's out here in the stars. It means that every small community, every mine and trading post amongst the planets is open to attack. Gold doesn't burn. Radium and uranium aren't affected. And while there is greed among men, these things will continue to happen—unless we are successful in this initial quest. I do not need to remind you, gentlemen, that the life term of our service is short. This will be the end of the road unless we succeed. Naval tradition has been fully ten thousand years in building. If we vanish as a service, there will be none to undertake this task of guarding space. There is more at stake here than Johnsonville, gentlemen, although heaven knows, that's enough.

"Have any of you looked at space charts? Some of you are old hands in absolute zero. Most of you are not. But all of you realize, I think, the immensity of space. There are literally millions of stars within a few hundred light years of this point and thousands upon thousands of habitable planets. We do not have much time for several reasons. Have any of you any suggestions as to how we should locate and destroy the perpetrators of this crime?"

THEY had several suggestions. And after listening to them a few minutes, the old admiral nodded.

"You are all too right in that we work under enormous difficulties," he said. "We have invented insufficent technologies, we have a battleship that doesn't dare touch ground anywhere, lacking chemical jets and proper stress analysis. We have no intelligence force in operation and we have no escorts. But we have some advantages, gentlemen. We are on the scene and we have good guns and brave men.

"Commander Thorpe, I am assigning you to the command of the freighter Gaston. Mount one of our spare missile racks in her bows and take her crew and twenty men from this vessel. I am commissioning the Gaston as a cruiser. You will proceed to Radioville on Carnova Bear. On arrival you will ground and search all space vessels for any of the goods which might have come from here and for all suspicious characters. Act with a high-hand even if the Army tries to stop you: there is no defined authority in space.

"Lieutenant Carter, I appoint you—"
He spoke for twenty minutes and at
the end of that time the only experienced
space officer he had left was Captain
Ten-Ike. The others had been given
the freighters, newly created "cruisers,"
and various destinations in space.

"Gentlemen," he told them as they stood up to leave. "you are a scout force. You are poorly manned, undergunned and may well be in dangerous situations. The merchant ships which you are using are badly fitted for their tasks. But those tasks are important. You must procure intelligence as to the whereabouts of a raider base and protect at all costs the planets and colonies to which you have been assigned. You are empowered to act with complete discretion to achieve these ends. And you are reminded that upon you and your judgment rests not only the future of our service but the safety of all commerce throughout space. That will be all."

The designated ten officers took their caps and filed out. And then Barnell looked at Ten-Ike.

"Now whip the rest of these people

into top desk watch officers, Captain. By trial of arms and the taking of prizes they may be commanding vessels of their own before this year is out."

It was ambitious. But that it was nearly hopeless old Admiral Barnell dared not think. What he had seen on Johnsonville had told him that the enemy was powerful. Very powerful. Johnsonville had been heavily protected by a major action force screen, a thing he had not known, by six batteries of excellent area defense weapons and by adequate warning systems. Yet, even though she had been commanded by an Army colonel whom Barnell knew by repute to be astute and alert, Johnsonville had fallen like a card house before a hurricane.

The enemy they faced was ruthless, well-informed and greedy. And he had bigger and better guns.

During the next watches the old admiral paced the bridge, pausing from time to time to watch units of his newly commissioned flotilla, weirdly silver in the bright blaze of Mizar and backed by the absolute black of space, depart upon their missions. He had left one freighter and one passenger craft, the first to service him and the other to carry the marine expeditionary force of two companies which had tardily arrived. He didn't like to think how undermanned was the Constitution now or how she would fare with inexperienced deck officers. Instead he indulged himself in hope that one of his scouts would bring him intelligence and that he could soon close for action.

With only his two remaining vessels beside his flag, he turned to his orderly.

"My compliments to the commanding officer and he will get underway immediately for Rangerton of Beta Centauris."

There, he thought to himself, in that welter of outcast humanity and amid the pooled riches of six planets he could most likely find 1. vital information and 2. men to replenish his crews. And he would be in the hub of the wheel he was scouting, ready to strike in any direction.

The big craft began to shudder under the impetus of drives. They were getting underway.

But Admiral Barnell need not have been quite so impatient for news. Less than one week later the battle circuit opened up with a message from Lieutenant Carter commanding the *Miami*.

INTERCEPTED BY HOSTILE CRAFT AND FIRED UPON. AM REPLYING. EVIDENTLY OUTRANGED . . . ATTEMPTING TO CLOSE . . . SEEM TO BE . . .

That was the end of the message. No further word of any kind ever came from the *Miami*.

CAPTAIN ALONZO SCHMIDT sprawled on a rug in the shade of a large rock and watched his shipfitters patch up the gap in the keel of the Guerra. To hand was a gallon of lemonade liberally spiked and served up by a girl scantily clothed.

"Ach, Emanuel! What nonsense, Emanuel," said Schmidt. "Some expedition with naval men loaned. You haf heard of such. Ach, such worryings. No

wonder you are anemic!"

Emanuel, a dandified little Argentinian, a full Spaniard unlike Schmidt whose people had come to the country only a couple centuries before, dabbed daintily at his forehead. He found more than the rays of Aldeberan hot this day. He was a very brave man. But he was cautious.

"But they have never carried guns before." he protested.

"Ach, pop-guns. Shooting corks! So they haf heard of trouble in space and they mount pop-guns. Darling, more lemonade."

"They fired remarkably well," said Emanuel. "And I myself saw the bodies in the debris. They were naval officers and men. United States."

"What would they be doing in space, now? Hein? What? Just some private expedition that wanted to fight."

"I didn't see a single piece of expedition equipment," said Emanuel.

"Ach, worrying. Always it gives worryings. Besides, we outranged him at least ten thousand miles. My little dar-

lings. My own poppets. They shoot so sweet, ya!"

"Admitted your people have a flair for invention," said Emanuel. "You've practically taken over our whole country with them. But..."

"Ya," said Schmidt, suddenly dark, "and they kick the best of us out because we are too smart. But never mind, Emanuel. Someday we go home. We make a big colony, a big navy and we go home. And we take what we want, va?"

"I think we ought to quit for a while," said Emanuel. "Besides we require people for our project and all I have seen so far is murder for baubles. We should stay right here and build up our ships with what we have already. It is risky. Our guns are good. Our technicians good. We will soon be able to return and do what we wish with Earth. But that ship last month, it worries me. Naval officers, naval crew. And no equipment."

"Bah, my chicken-livered friend," said Schmidt, "you get goose bumps in any zephyr, ya? Didn't we shoot him to pieces? Was there enough left to bury? Could we even salvage that old tub? No. Well—"

"She had 'Miami' painted in red lead on her bow. I saw it. The United States Navy used to name ships after towns and Miami is a town."

"Bah. She's dead. They're all dead. Forget it, Two-three days we get word from Don Alvaro about Rangerton and back to work we go again. I hear it is heavy with gold shipments. Nice, yellow gold." And he chuckled in sheer good nature and reached toward the girl.

. . . . .

Admiral Barnell sat on a packing box in an office the marines had tossed together for him on the outskirts of Rangerton. His five star flag hung limply in the blazing breath of Beta Centauri. The khaki of the sentries outside was black with sweat.

The man between the two intelligence j.g.'s was also sweating but it was not from heat. Water dripped from his palms and ran from his brow into his

eyes. He had a frantic air about him and he kept twitching his head as though to get it out of a vice.

"Now let's be calm about it," said Barnell. "We do not intend to torture you—"

"I've had no food or water!" whimpered Don Alvaro Mendoza. "I'm dying of uncertainty. That's torture enough!"

"Pirates," said the old admiral, "I think we hang in chains to dry. That's right, isn't it, Colbright?"

Colbright, a clever young officer, nodded brightly. It was he who had spread the report of rich shipments while pretending drunkenness and had brought Don Alvaro prying down upon him.

"Of course we try them first," he added. "Unless they tell what they know when it is some use to us."

"But the Army post never bothered me! What are you doing here? This is a nightmare!" cried Don Alvaro. "What is the Navy doing here?"

"Protecting commerce, guaranteeing the freedom of space and just now," said Barnell, "questioning a renegade and a thief. You are an Argentinian. You admit you are descended from the Germans who migrated there. You admit you were thrown out of the country about ten years ago for plotting its overthrow. Now tell us where your friends keep their ships."

Don Alvaro went white. He could see Schmidt smiling while he flogged a man to death. He could see Schmidt shooting a traitor, wounding him here and there. He could see Schmidt sticking a seaman's hand out of the airlock into space and then bringing him in to knock the

frozen member off like a piece of glass. He began to sweat harder.

"The difference is," said Barnell acutely, "that you are in our hands. How far away is your leader?"

"Sir, I don't think he'll talk," said Colbright. "I have his code. I'll just send a message to space at large that he has told all. That will save a lot of trouble."

With a thin scream Don Alvaro leaped back. "No!" he said, chattering with fear. "No! I'll tell you. This is the next place of raid. They'll be here in five days. Capitan Schmidt is the leader. We intended to build up a fleet and attack the Argentine, using Schmidt's developments. Now the base—"

THE Guerra sailed down toward Rangerton. It was a bright afternoon there, rewarding his calculations. It would make gunnery simple. Good Don Alvaro. Schmidt trusted his friend had wit enough to stay clear of the firing area. Rangerton would make a good haul in metal and perhaps there would be two or three ships at the spaceport.

The planet looked pretty, he thought, as his detectors sought the concentration of metal which would train him dead on the town. This was his fifth attack on such places and he felt very sure of himself. The Army had nothing which could worry him and these persistent rumors about naval vessels were so much beer froth. Nobody had guns which could touch him. Nobody. Hadn't his own people shown him how to make guns? And did anyone else know? They'd brought all that from Germany a long time ago

at the end of some lost and forgotten war. There. He was just about dead center. Now—

"Capitan!" said Emanuel. "There's a ship!"

"Ah, more for the pot. Let him land and we'll--"

"No, no," said Emanuel, excitedly, staring into the screen. "It is coming toward us, about thirty thousand miles, closing fast. A small ship. A freighter. Very fast. Twenty-one thousand—nineteen thousand—sixteen thousand—"

The Guerra bucked under an impact and Schmidt reeled at his station. In a sudden fury he trained his guns and pressed all firing trips. The Guerra rolled as her course shifted and the planet was lost for an instant. Then there was a bright blaze in the sky off to port, a blaze which had bursts in it.

"Hit him!" said Emanuel. "He's done for. But I don't like it. He almost did for us. Our steering jets are ruined!"

"Ya, got him," said Schmidt, all cheers again. "What a pretty lot of fire. Emanuel, I am a gunner. Now we change course with the main drives and get back to business."

A DMIRAL BARNELL'S face was grim and hard as he stood, hands jammed angrily in his pockets, on his bridge, glaring at the sputtering fire which was all that remained of Commander Thorpe's Gaston. But it had served. It had clearly served. And swooping up from the protection of a low moon, drives all out, the Constitution was cutting down the range. "Eighteen thousand miles, sir," said the range-finder.

"Captain," said old Admiral Barnell, "you may fire when on target."

A moment later the Constitution was shaken by a blast. A damage control circuit clanged shut, isolating the hit. A minute and a half later the Constitution shrilled with the whistle of launching missiles.

There was a sharp crash abaft the bridge and the emptiness around the ship blazed furiously. She bucked again under a second salvo. Damage control circuits began to close swiftly. A strained voice somewhere said, "Number Four Engine Room gone."

The shrill of a third salvo screamed through the ship. The starboard side dissolved in sparks and melting metal.

"Put on your space helmet, sir," said Mandville. "Pressure's gropping in here. We're bad hit starboard."

Barnell did not need a detector now to see the *Guerra*. The range was closed to forty miles. All drives were furiously backing and the quartermasters were trying to swing the *Guerra* alongside.

Point-blank the Constitution let go a salvo from her remaining guns. And then Barnell saw what was wrong. A force screen of an advanced design blocked most of the impact of their proximity shells.

"Stand by to ram!" he barked.

The quartermasters hesitated for a brief second, automatically waiting for their captain to relay. But Ten-Ike was dead on the cold steel deck and the after bulkhead was in flames.

The helm jets strained, turning into the Guerra's force screen. The drives shuddered in their turrets. They were inside the Guerra's shooting range and now at three miles any salvo hitting them would also destroy the Guerra.

The quartermasters looked whitefaced at the looming side of the Guerra. They were coming fast, too fast. The turrets bucked harder in an effort to hold down the impact.

Mandville snatched tight the old admiral's helmet strap and then fell himself, choking with fumes of metal turning into gas.

They crashed. There was a fiery fanfare of sparks as metal sawed through metal. Plates buckled. The bridge glass curved, almost stood the strain and then flicked into splinters.

Air whistled out of the Guerra in a dying gasp. Shattered bow into rent side, they were tangled in death.

An ensign and two sailors burst through the melted compartment wall, glanced hurriedly over the bodies on the bridge and snatched Barnell from the wreckage. They stepped out into space, out of the inferno which was licking through both vessels and fought free.

The ships did four circuits of the planet before they crashed. It was long enough for the *Memphis* to take off thirty wounded from the *Constitution* and two sailors from the *Guerra*. They to und old Admiral Barnell and the three who had rescued him. Admiral Barnell was dying. His chest had been crushed.

But the old man's dying injunction was messaged back to Earth and has come down to us in our distant time in the form of Article Ten, Naval Regulations, governing the conduct of officers:

There will be times, as there have been, when political or economic concerns seek to handicap the initiative and performance of duty of officers. It must at all times be remembered that lawless and self-seeking elements among men must be curbed by strong and effective action, often extraordinary in scope and that whosoever threatens duty or the means to perform it threatens also the security and therefore the existence of mankind. No measure taken, no matter how far beyond the call of duty, which tends to secure to mankind the advantages of safe commerce should

e censured in any officer or man.

To the army belongs the planets. To the air departments belong their atmospheres. But only to a navy and its officers can belong the outer marches of absolute zero, the depth, the length and breadth in all their infinity, of space.

Provided with guns from the Guerra's base, equipped with new knowledge and technologies, supported by generous appropriations from an appreciative nation and heralded everywhere by popular demonstrations, the United States Navy, within two years, was competently discharging its duties in space. And after it and securely founded upon its practices came the United Continents Navy, the Earth Navy, the Confederated Planets Navy and through a host of others to our own time when the Intergalactic Department of the Navies regulates for us our own commerce and keeps for us peace amongst the hundred million worlds.

Old Admiral Barnell, sleeping in his tomb at Annapolis in the Earth National Monument of Mankind, must sleep very peacefully and content.