

HIGH GUARD : DEPLOYMENT SHUTTLE



SCIENCE FICTION ADVENTURE IN THE FAR FUTURE

HIGH GUARD : DEPLOYMENT SHUTTLE

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T R A V E L L E R INTRODUCTION

High Guard: Deployment Shuttle is a supplement for *High Guard*, introducing a new class of ship and exploring its construction, specifications and roles undertaken through Charted Space.

As well as presenting full High Guard rules for the deployment shuttle, the use of Marine Assault Forces, often carried on board, are studied, as well as the use of this vessel in boarding actions and customs inspections. The tactics used in both are covered, showing how the deployment shuttle is utilised within a war zone and during peace time to help police the space lanes. A number of variants of the deployment shuttle are also presented, demonstrating how truly versatile this craft is and where else it may be encountered.

Finally, several missions, encounters and jobs are given, all revolving around the use of a deployment shuttle or one of its variants, either by the Travellers or someone they meet in the course of their adventures.



C H A P T E R - O N E DESIGN NUMBER L C S - O O 2 4 A

The deployment shuttle is known by many designations applied by its operators, but its builders typically refer to it by its yard designation: *Design Number LCS-OO24A*, usually abbreviated to simply *24A*. The craft is optimised for the assault role; getting personnel on the ground or to a target as quickly as possible. To this end, the 24A is sufficiently well-armoured to take a direct hit from a pulse laser without a significant chance of disabling damage. However, its primary defence is its speed.

Built on a 50-ton hull, the 24A is capable of high-g manoeuvres in space and can turn hard in atmosphere using its retractable aerofins. Whilst unpleasant for the crew and personnel carried aboard this does make it hard to target. The craft's two firmpoints normally mount a fixed sandcaster and beam laser, enabling the 24A to be pressed into service as a patrol craft at need. It is even capable of engaging other small craft, its armour making the 24A more or less impervious to most aerospace and fighter-mounted weapons. This is a rather wasteful use of a specialised asset however; the anti-fighter or patrol role can be carried out just as effectively – and more effectively – by cheaper craft.

In addition to its anti-space vessel armament – and arguably more important – the 24A has four antipersonnel mounts which are usually fitted with PGMP-13 support weapons. These are effective against personnel and some vehicle targets as well as bunkers and light installations. They are sometimes used to remove obstructions from a landing zone, such as foliage and trees, and concentrated fire can flatten an area of rough ground. Some assault shuttles mount alternative or upgraded support weapons. PGMP-14s are popular but the mountings are versatile enough to take a wide array of weaponry.

The 24A is fitted with a breaching tube for the shipboard assault role, and an armoury for the stowage of personal weapons. Many operators use the personnel compartment of the craft as an armament maintenance bay, holding all weapons in the deployment shuttle armoury and not taking anything other than sidearms aboard the parent craft. This saves time on a

deployment and space aboard the parent vessel, though some operators prefer to lock all weapons in main armoury until action is expected.

The 24A has a crew of two; a pilot and a co-pilot/ navigator/communications specialist. The craft has a good sensor suite and in theory is capable of a four-week deployment. In practice, the lack of accommodation for the crew and any additional personnel makes this extremely uncomfortable if anyone other than the crew is aboard. Thus, a deployment shuttle will normally undertake missions of a few hours' duration at most. The majority of 'hot trips' aboard this craft are short and characterised by highly unpleasant high-g manoeuvres, ending in the sort of landing typically known as a 'slamdown' and rapid exit into a combat zone. The craft has extremely robust landing gear to enable it to land in this manner.

One feature of the 24A Deployment Shuttle that is rarely used is the provision of firing ports for the marines or combat personnel carried aboard. In theory, these allow those inside the craft to fire their personal weapons at ground targets from behind cover and armour. In practice, it is only possible to hit anything when the craft is firmly on the ground, at which point the marines are typically busy exiting the shuttle. The feature is occasionally useful and so has not been deleted in design revisions over the years. One modification that has been made is a central sealing of weapons ports from the bridge; assault craft have been known to take off with ports open or even with a weapon sticking out. Whilst there is still a reasonable seal around the barrel of such weapons, nobody likes to see the co-pilot running around manually closing weapon ports while atmosphere leaks out.

The LCS-0024A Deployment Shuttle is built at TL13, and its design is on file at almost every yard capable of building such craft. Although rather obviously a military craft, the 24A and its variants require no special licensing. This is partly because it is not a highend combat craft and partly because it has so many alternative applications. Numerous variants do exist and can be encountered almost anywhere.

TL13		TONS	COST (MCR)	CRE	w
Hull	50 tons, Streamlined	-	3		
Armour	Crystaliron, Armour: 13	8.125	1.95	PILOT, CO)-PILOT
M-Drive	Thrust 9	4.5	9		
Power Plant	Fusion, Power 60	4	4		
Fuel Tanks	4 weeks operation	1	-		
Bridge		3	0.5	RUN	NING COST
Computer	Computer/15	-	2	MAINTENA	
Sensors	Military Grade	2	4	Cr2981/	
Weapons	Fixed Mount (beam laser/sandcaster)	-	0.85	PURCHAS	••
	Anti-Personnel (PGMP-13 x 4)	1	0.261	MCr35	
Ammunition	5 Sandcaster Barrels	0.25	-		
Systems	Armoury	11	2.8		
	Breaching Tube	3	3		/
	Acceleration Benches (36 personnel)	9	0.9	POWER REQ	UIRMENTS
	Aerofins	2.5	0.25	45	10
Software	Manoeuvre/O Fire Control/3 Evade/2	- -	- 6 2		BASIC SH
				DRIVE	SYSTEN

Built on a 50-ton hull, the Deployment Shuttle is capable of both high-G manoeuvres in space and in atmosphere (using retractable aerofins). While unpleasant for crew and personnel this agility makes the shuttle hard to target. The craft's two firmpoints normally mount a fixed sandcaster and beam laser, enabling it to also be pressed into service as a patrol craft. It is even capable of engaging other small craft, its armour making the Deployment Shuttle more or less impervious to most aerospace and fighter-mounted weapons.





C H A P T E R - T W O OPERATIONS

The 24A Deployment Shuttle has two main roles as designed. Both revolve around making a hostile intrusion into a dangerous place, though of course not all deployments are 'hot'. Troops can be put on the ground somewhere safe, or delivered from a starship to a ground position without anyone firing a shot. Indeed, most of the work done by deployment shuttles is entirely mundane; personnel and equipment are ferried to and from orbiting spacecraft on a near-constant basis. These tasks can be undertaken by conventional shuttles, but what civilian craft cannot do – not without taking very heavy damage – is to land troops under fire.

This is the primary combat role of the 24A shuttle; getting personnel on the ground as fast as possible, with minimal casualties taken on the way down. The shuttle is tough enough to take a few hits from ground fire without ill-effects – in an ideal world the landing is rougher than the incoming fire, though most marines would consider that a good day to be dreamed about. More commonly, a shuttle is bounced all over the sky by the pilot and incoming fire – it is not always possible to say whether the pilot or the attacks are controlling the craft – and suffers multiple hits on the way down.

A catastrophic hit will cause the shuttle to crash, more than likely killing everyone aboard, but this is fortunately uncommon. More often, crew and passengers are hurt by secondary causes such as spallation – impacts or energy delivery to the outer armoured hull can cause small fragments to come loose and fly about the internal spaces. The shuttle's armour includes a spall lining to reduce this, but after a hot landing it is not uncommon to sweep up bits of the bulkheads off the floor.

The deployment shuttle's other primary application is hot boarding of suspect or enemy vessels. Any shuttle can dock with another ship and transfer personnel, but the deployment shuttle's breaching tube permits this to be done with a greater degree of security even if personnel enter by the other vessel's airlock. In the case where the target will not (or perhaps cannot) cooperate, the breaching tube can be used to force entry at any suitable point. Of course, a hostile crew will position themselves to resist the boarding, and will know where it is likely to be made from the position of the breaching tube. For this reason, it is not uncommon to breach the enemy hull then disengage, breaching at several points before finally making an assault. As the main force enters through the tube, other personnel can gain entry to the hostile vessel through the holes in its hull. These personnel will normally wait on the outer hull of the target vessel until the main entry force is ready, but may in some cases seek other points of access such as maintenance hatches, thus gaining surprise on an enemy force that does not yet know it has been boarded.

Often, the breaching tube is used to pin down defenders at one point, waiting for the main force to come in hard. This permits other groups to quickly gain control of the hostile vessel by entering elsewhere, overrunning minor resistance and potentially outflanking the main defensive force. The tube is rarely used as a complete bluff, as there is always a chance the enemy might try counter-boarding. It is instead used as a main and highly visible threat, and if the enemy is distracted into massing near the tube, they can be attacked from other points. If they disperse personnel to cover other access points, the main assault force may be able to force an entry. Large ships can be breached at several points by multiple shuttles.

More commonly, the breaching tube is used as a secure means of access to a vessel that has accepted boarding for inspection. The tube might be lost if the target vessel begins to manoeuvre suddenly, but the shuttle will survive. The tube also provides a measure of environmental security if there is a problem aboard the target vessel. It is equipped to be purged of toxic or corrosive gases, radioactive coolant and the like. Personnel returning to the shuttle can be decontaminated in the tube before entering the main crew area. Airlocks are generally equipped to do this but it is far more efficient to decontaminate a whole boarding crew at once. Many deployments are of course entirely routine, with craft simply acting as transport to and from a secured landing zone. However, the deployment shuttle's reason for existing – and justifying its high price tag compared to a standard shuttle – is its ability to conduct vertical or orbital envelopment operations.

A vertical envelopment can be carried out by any form of air transport or grav vehicles, and consists of bringing troops from some other point on the ground into a combat or operational area. It is not uncommon to land the ground force somewhere distant from the target area and make preparations groundside before 'bouncing' the marine force into the combat zone.

Using a laager point in this manner can be a risk under some circumstances, but if properly secured it offers several advantages over a direct assault from orbit. Traffic control is one; orbital space can become quite crowded in a major operation. Placing some forces on the ground can greatly simplify the commanders' problem when coordinating the approach to the target, as well as reducing the chance of an accident. High-speed descents through atmosphere are also hazardous, and take their toll on a shuttle over time even if it does not receive combat damage. The strain of flying low over the ground is much less, and of course terrain features can provide approaching force some cover. It is true that a landed shuttle is vulnerable to artillery or even ground attacks, but a well-chosen laager with proper security is often safer than waiting in orbit where there is nowhere to hide.

A vertical envelopment may be made in conjunction with other forces. Grav tanks and similar vehicles can attack from orbit but are more vulnerable in this mode than when speeding low over ground. Thus it is not uncommon to find deployment shuttles mixed with grav tanks, G/carriers and grav sleds mounting support weapons for an all-arms assault.

Not all vertical envelopment operations are directly on to a target. Sometimes an infantry force will be deployed into a blocking position to prevent an enemy retreat or delay the arrival of reinforcements. Quite large enemy forces of a lower Tech Levels can be tied down



or pulled out of position by landing a force to cut a line of communication and pulling it out as a large-scale response approaches. Smaller forces can be ambushed or driven off.

Since the shuttle is the only source of mobility for its complement of marines, deployment must be in the vicinity of the target or area of operations. This kind of force is best suited to assaults or static defensive operations, and cannot control a large area unless vehicles are obtained locally. This is not uncommon, with marines patrolling in commandeered civilian trucks and supported by their shuttle's plasma guns. Where possible, however, security operations of this sort are passed to regular ground forces, with marines retaining the 'spear tip' role or specialising in clearance and security of small urban areas and installations.

Thus for marines deployed groundside, warfare typically consists of a series of vertical envelopment operations followed by a period of defensive preparedness in a laager or secured location. Marines are also often used as a rear-guard when regular forces are pulling out, as they can quickly retire to their shuttle and withdraw under cover of its guns.

Although less common, the orbital envelopment is the hallmark of marine forces. This is a deployment directly from orbit and is almost always conducted into a 'hot' landing zone or one suspected of being highly dangerous. The only real difference between landing under fire in a defended area and deploying a marine platoon somewhere that may or may not be hostile is the amount of gunfire covering the deployment. Similar tactics are used in both cases; fire teams spread out and secure a small perimeter, then once the marines have got their bearings they proceed with the mission.

Orbital envelopment is normally used to gain tactical surprise – troopships overhead will strongly suggest something is about to happen, but the exact target may not be obvious. At times there is little warning at all, such as when a marine transport emerges from jump and deploys its shuttles for a high-speed dash to the target. An enemy who is already on alert can react effectively, and if this is expected a more cautious vertical envelopment may be used instead, but one that is not prepared may not be able to mobilise a response in time to prevent the capture of key installations.

Orbital envelopments into a hot landing zone are almost always supported by fighters or grav craft. Many operators use atmosphere-capable fighters crewed by naval or marine pilots to escort shuttles to close orbit and then follow them down to clear pockets of strong resistance. Orbital artillery (ortillery) can be used to soften up a landing zone but is too destructive for the close support role. Once an assault has begun, ortillery normally switches to more distant targets such as concentrations of enemy reinforcements or heavy weapons. Orbital envelopment is sometimes used in less violent situations or to defuse a potential conflict. The sudden arrival of a platoon or larger force of marines can make everyone take a step back and perhaps prevent bloodshed. Marine forces have also been known to arrest (or eliminate) political or serious-crime figures by this method, overwhelming any resistance in what is sometimes known as a decapitation strike.



C H A P T E R - T H R E E MARINE ASSAULT FORCE

The Deployment Shuttle is designed to carry up to 36 personnel in addition to its own crew. Not surprisingly, the standard Marine platoon is 35 personnel leaving room for one additional officer or specialist. The platoon is organised as a command section plus three rifle sections, each of which consists of eight marines in two squads (or fire teams) of four.

Each section also has two specialists attached to it. These often operate detached or are moved to whatever section requires their skills. Alternatively, they might be held with the command section or simply sent into action alongside their section-mates. Some of these specialists might have areas of expertise that are not applicable to the platoon's present role, but every marine is first and foremost a rifleman. On another deployment their specialist skills will be of great importance, but for now they provide additional firepower.

It is common for a detached Marine platoon to have two officers. This ensures the force retains a commander in the event of an officer becoming a casualty, and allows the force to be broken down further if necessary. Marine section and squad leaders are typically sergeants or corporals, with the exact dispersion of ranks varying somewhat.

All Marines are trained in vacc suit operations, and may be qualified for battle dress if it is available to their parent force. Marines are optimised for the assault or light infantry (i.e. without much in the way of armoured or artillery support) role, and for 'ship's troops' operations. This means providing security aboard a starship or installation and conducting boardings. Most boardings are simply a matter of accompanying officers or naval personnel inspecting a vessel, but Marines can and do make hostile boarding actions to capture a ship or rescue a hijacked crew.

Weaponry for Marine forces varies. Some governments prefer to use laser weapons for all applications. They are ideal for low-g work as they lack recoil and are still effective groundside. This permits Marine forces to be equipped with a single weapon for all occasions. However, it is common for Marines to have a mix of weapons available. The extra expense is justified by the fact that they are seen as elite forces with greater capabilities than 'ordinary' infantry, and provide a function that can be essential.

Marine Command Section

- 1x Platoon Commander (1st Lieutenant)
- 1x Platoon Second-in-Command (2nd Lieutenant)
- 1x Platoon Senior NCO (1st Sergeant)
- 1x Platoon Medic (Corporal)
- 1x Communications Specialist (Corporal)

1st Section

- SUPPORT SQUAD
 - 1x Section Leader
 - 1x Marine Grenadier
 - 1x Support Gunner
 - 1x Marine Rifleman

RIFLE SQUAD

1x Squad Leader

3x Marine Rifleman

ATTACHED SPECIALISTS

2x Vehicle Crew or Boarding Specialists

2nd Section

SUPPORT SQUAD 1x Section Leader 1x Marine Grenadier 1x Support Gunner 1x Marine Rifleman RIFLE SQUAD 1x Squad Leader 3x Marine Rifleman ATTACHED SPECIALISTS 2x Designated Marksmen

3rd Section

SUPPORT SQUAD 1x Section Leader 1x Marine Grenadier 1x Support Gunner 1x Marine Rifleman RIFLE SQUAD 1x Squad Leader 3x Marine Rifleman ATTACHED SPECIALISTS 2x Demolitions Specialists

The traditional Marine melee weapon is the cutlass, which serves a ceremonial purpose as well as a practical one. Hand weapons have certain advantages in a closequarters fight aboard a spacecraft. They will make big holes in a vacc suit – far bigger than a bullet – which will necessitate a rescue or rapid withdrawal of the victim even if he is not seriously harmed. A cutlass will cause tremendous damage to a person but will not harm the critical systems of a starship, and more importantly it has a profound psychological effect that can deter resistance entirely. If matters do come to a closequarters scramble, the cutlass also offers a measure of defence against an enemy's blows.

The standard naval cutlass as used by naval ratings and marine personnel is a heavy-bladed cutting sword whose point is sharp but not well positioned for thrusting. The user's hand is protected by an oversized guard which can accommodate a vacc suit gauntlet. It is surprisingly versatile, allowing the marine to use it as a baton or sword.

The blade is razor-sharp but normally covered by an extremely resilient polymer strip which allows the cutlass to be used as a non-lethal security baton. The strip is black, and obvious when in place. This allows the marine to draw his weapon 'blunt' then make a very visual threat by stripping away the protective cover. This can be done in a single split-second gesture. Sometimes the act of 'making sharp' is enough to deter otherwise quite aggressive opponents. The cutlass scabbard is designed with a catch that allows the weapon to be inserted with the strip in place, and then drawn 'sharp' or 'blunt' depending on the catch position. Marines will draw their swords with the strip in place on the command of 'deploy swords', but 'deploy blades' means that the weapons are coming out ready to cut. Again, this can have an intimidating effect.

Obviously, being hit with even a blunted metal blade is a seriously unpleasant experience, but the ability to use their weapons to cut or not gives marine security personnel a range of options backed up by punches with the heavy brass handguard.

For shipboard security operations, Marines normally carry either a cutlass or pistol (either an autopistol or snub pistol) or both. A patrol aboard a major warship, or a response force, will contain at least some personnel armed with more potent weapons, either shotguns, flechette guns, snub carbines or submachineguns. The same applies to boarding parties when trouble is not expected. All members will have a sidearm and cutlass, and at least some will carry more powerful weapons. If a fight is anticipated, the Marines go in armed for bear.

For groundside operations, Marines are typically issued gauss rifles and light gauss support weapons. Grenadiers are trained to operate light anti-armour weapons and carry a disposable missile launcher in addition to their kit. Although Marine forces typically act in the assault role or as light infantry, they are trained to operate in conjunction with armoured forces, artillery or any other forms of support that may be available. Some Marine formations actually include armour and artillery, but for the most part the Marines rely on support from naval vessels and their own ground-attack craft.

C H A P T E R - F O U R BOARDING ACTIONS AND INSPECTIONS AND

One of the commonest uses for a deployment shuttle is for customs and spaceworthiness inspections. These are routine, but there is always a chance a crew may have something to hide. If so, flight or violence become possibilities, placing the boarding team at risk. One way to greatly reduce this hazard is to conduct the boarding under the guns of an installation, naval vessel or flight of fighters. It is generally preferable for a naval ship to send over a shuttle to conduct the inspection rather than docking directly. Not only does this prevent a counter-boarding but it allows the warship to use its guns if necessary.

That would be bad news for the boarding team, of course, but most navies have a 'no hostage' policy. That is, no vessel that takes a boarding team hostage will be allowed to leave the area. If necessary the hostagetakers will be shot to pieces and if the team become collateral casualties, so be it. Hostage-takers are not (usually) immediately fired upon; they will be offered a chance to surrender. This harsh policy makes hostagetaking pointless – you die or you go to jail... or get spaced as a pirate after a summary trial. It is deemed necessary in order to ensure the practice does not become widespread.

If the deterrent does not work, the boarding party will vigorously defend themselves and all efforts will be made to rescue them or effect their release. Boarding parties tend to be alert and cautious, and usually wellarmed. Policy varies, but the standard six-personnel model is widespread. Under this model, a minimum of six personnel go aboard the suspect vessel, in addition to at least two remaining in the shuttle.

Under the 'six' model, two personnel guard the docking point and prevent any access to the shuttle whilst two pairs conduct the inspection. The usual setup is: an officer looks over the ship's papers, bridge and cargo manifest, and possibly checks personnel records, whilst a specialist tours the cargo bay and drive spaces. Each has a Marine as a bodyguard.

Large vessels or those suspected of wrongdoing may receive much larger boarding parties. An entire Marine platoon plus a naval officer can be put aboard a vessel by a single deployment shuttle, creating a very visible deterrent. Most of the Marines will be present only for security purposes and will not take part in the inspection as such, but may still spot someone or something out of place. However, some Marines are trained in inspection techniques and will cover part of the vessel or some aspect of its activities. These will always be protected by other Marines who are not distracted by any task other than security.

If wrongdoing is discovered, it may be possible to put a prize crew on board the suspect vessel and take off the entire crew, but this is not always feasible. If necessary, the suspect vessel will be escorted into port with Marines or a boarding party aboard, securing the drive room and bridge at the very least. The crew will be disarmed in this case and will be considered potential hostiles. The usual practice is to confine non-essential personnel to quarters or a location where they can be easily watched, whilst critical areas are covered by armed Marines or boarding party members.

It is also commonplace to disable the ship's jump drive, usually by shutting down the fuel valves. This can be undone readily enough but takes time and is easy to detect. Thus a ship secured in this manner is unable to rapidly escape even if the bridge and drive rooms are retaken. The combination of Marines aboard and guns outside deters most crews from even trying.

C H A P T E R - F I V E VARIANTS

Although the heavy armour and very high thrust represent overkill for most applications, older deployment shuttles are often available at a discount price. These vessels are often pretty banged-about, and may have had damage to critical systems such as the drives that made them uneconomical to return to frontline service. In such cases the hull can often be bought quite cheaply and fitted with a less powerful drive system which is still entirely adequate for non-combat applications. Thus converted deployment shuttles can be found in a variety of roles, and some of these conversions have become more or less a standard type in their own right in some areas of space.

In addition, numerous variants of the deployment shuttle are built using the basic hull and systems. These retain the full performance of the original design and are mainly used for naval and military applications.

MEDICAL SHUTTLE

The Medical Shuttle variant is built on the standard hull with no changes in performance and capabilities. There are two sub-variants; the surgical shuttle and evacuation shuttle. Both have a casualty reception area in place of acceleration couches, with equipment for triage and treatment of relatively minor injuries. In an evacuation shuttle the armoury is replaced with a second version of the reception area, allowing more casualties to be accommodated. The purpose of this shuttle is to get injured personnel to a proper medical facility as quickly as possible rather than to treat them in situ, but the inner casualty area does have the facility to support very badly injured patients, and can be used as a treatment room at need. The surgical version of the shuttle is designed to provide a forward operating theatre – often very far forward – and replaces the inner casualty reception area with a small surgical ward with two operating tables. Conditions are very cramped but automation and good layout allows effective procedures to be undertaken. This vessel can bring emergency trauma aid right up to a combat or disaster site, and can be used to treat casualties who will not survive long enough to transfer to a more capable unit. Surgical shuttles are used by some disaster-management agencies and in some cases may be the only medical units able to reach a remote area.

In both cases, the breaching tube is retained and can be used to decontaminate personnel who have been exposed to toxins. It is also used as a rather quick-anddirty method of reducing wound contamination. This is usually by maintaining a mist of antiseptic vapour in the tube, but dust or other contaminants can also be rinsed off using the water jet system. The downside of this is that stretcher-bearers end up going about their business soaking wet and pick up yet more contaminants that need to be rinsed off again.

The medical shuttle variant has saved countless lives, and most Marine troopships carry at least a few examples of this type along with their standard deployment raft.

RECONNAISSANCE BOAT

The reconnaissance version of this craft is little more than an internally reconfigured deployment shuttle. The acceleration couches and armoury are replaced with additional crew consoles, allowing an intelligence team to collate and analyse information garnered from a variety of sources. Foremost among these is the shuttle's own military sensor suite, which might be upgraded in some instances but often is not.

In addition, the sandcaster is replaced by a missile rack, which can be used to deploy remote reconnaissance drones. The shuttle itself is not stealthy but the drones are small and difficult to detect. Their range is extremely long; if the recon boat crew do not mind a lag in data and command transmission times they can launch a drone halfway across a solar system. More commonly, drones are launched in a pattern to cover a wide area, and can be put into orbit around a planet.

Orbital endurance is measured in days, but for that time a recon boat using a pattern of drones can observe most of a planetary surface. For this reason, reconnaissance boats are sometimes used in exploration or survey work, typically in high-threat or unknown-threat areas where their high speed and survivability may be necessary to completion of the mission.

FIGHTER CONTROL CRAFT

The fighter control craft is similar to the reconnaissance boat variant, in that its armoury and main passenger compartment are replaced with additional crew spaces. These are used by Fighter Control Officers, who are often unkindly referred to as 'scopedopes' by the fighter crews they control. Some navies place their fighters under very tight control, with pilots making specific manoeuvres as instructed by their controller. Others use the control officers as advisors, who keep pilots informed of changes in the tactical situation and warn them of new threats but allow the fighter crews to make their own decisions. In this case a given control officer might be in charge of more than one fighter, perhaps even an entire squadron.

Both of these approaches require quick and effective communications, which necessitates a forwardpositioned control craft. The 24A's tough armour and high manoeuvrability makes it suitable for such a role; it can make a quick getaway if enemy craft come after it, perhaps leading them into an ambush by the fighters it controls.

The use of a well-equipped control craft enables fighters to be given a very basic sensor fit without compromising effectiveness. This drives down the unit cost of fighters, though obviously the price of the control vehicle might outweigh the saving if the ratio of control craft to 'teeth' is miscalculated.

RESCUE CRAFT

The deployment shuttle makes an excellent basis for a rescue craft. It is fast enough to reach a distressed vessel and powerful enough to tow most smaller ships. The breaching tube allows forced access to a crippled vessel, bypassing airlocks that might be in a hazardous condition. The armoured hull is also useful in areas where there may be debris floating free of a wreck. Some are used for salvage work, but the majority of craft converted to this role are operated by port authorities or navies and used to assist vessels that might yet be saved.

The armoury in this case is converted into a workshop for the maintenance of rescue equipment as well as to provide assistance; often a component from a damaged ship can be jury-rigged or a replacement fabricated aboard a rescue craft, allowing the distressed vessel to limp into port under its own power. For more heavily damaged vessels, the crew area is used as a staging point for boarding missions. These usually have the retrieval of survivors as a priority, and there are facilities (albeit very basic ones) to bring distressed starfarers aboard and look after them.

Even something as basic as being guided to a seat and given a hot drink can save lives – someone who makes it uninjured to a rescue ball might still collapse from shock after being rescued. Rescue crews usually include a 'survivor-wrangler' who is part medical technician, part amateur psychiatrist and part interrogator. The wrangler's job is to look after casualties and obtain information about what happened and how... and most importantly where other survivors might be found.

Rescue teams may enter a hull through the breaching tube, which allows atmospheric integrity to be maintained in an undamaged but otherwise inaccessible area of the distressed vessel. They may also cut their way in from the hull or locate openings to use. These are often jagged, and debris is always a hazard, so even though heavy-duty vacc suits are commonly used, it is preferable to find an airlock or use the breaching tube. The latter can also be used to supply power and even air to the target vessel via a series of hook-ups installed in the tube's contact surface.

Rescue craft are rarely armed for combat, but typically swap their main and anti-personnel weapons for cutting lasers or impeller charge launchers. The latter are used to move or disperse clumps of debris by the rather unscientific method of shooting small explosive charges into them. A good operator can scatter a debris field as the craft approaches, creating a much safer working environment and allowing the craft's sensors a clearer look at the target.



PRISONER HOLDING/ TRANSFER CRAFT

Most prisoners taken in a boarding can be transferred to a parent vessel using a shuttle. Handcuffs and armed guards will typically suffice for most prisoners, but sometimes a crew must be held for an extended period before being allowed back onto their ship. This is common where there are reasons to suspect criminal or pirate activity but the crew may well be innocent. Placing them in a holding room aboard a shuttle is an effective way of ensuring nothing untoward occurs during a boarding without handcuffing.

This variant of the deployment shuttle can also be used to hold highly dangerous prisoners whilst they are being transferred from ship to installation, or when they are being taken for trial. The breaching tube is fitted with advanced weapon scanners which can detect many devices that might assist in a jailbreak attempt. It is also sometimes used as an execution chamber. In this case the usual practice is to convey the condemned prisoner(s) to their place of execution – usually a symbolic location in space, such as the point where a pirate attack took place, or orbit over a particular gas giant – before expelling the convict through the airlock. Sometimes, but not always, the convict is drugged or shot first.

Prisoner transfer craft or execution vessels are usually escorted by fighters or other armed small craft, and carry additional guards with a mix of lethal and lesslethal weaponry. The armoury is converted into a holding room or several cells, with the crew area often subdivided to put an extra door between any prisoners and the bridge.





ARMOURED SURVEY/ RESEARCH SHUTTLE

The majority of scientific vessels do not need a heavily armoured hull and powerful drives, but those undertaking survey or research work in high-hazard areas such as gas giant atmospheres sometimes do. Converted deployment shuttles are used for deep-dive surveys of gas giants, mapping the temperature and wind conditions as well as atmospheric composition. This is useful for a variety of scientific purposes, including general research into gas giant worlds as well as specific conditions at a given point.

Surveys of this sort are used by chemical-extraction companies to determine the suitability of a given gas giant for exploitation. Some are too radioactive or turbulent, others have insufficient quantities of useful compounds in their atmosphere. The rigs that extract the chemicals have to be optimised for operations at a particular altitude and a set of atmospheric conditions, so regular surveys are necessary to ensure that extraction operations are as profitable as possible whilst remaining within safe operating parameters.

Converted deployment shuttles are used for other high-risk research and survey missions, including close approaches to stars and descents into corrosive or otherwise hazardous atmospheres. The shuttle's ability to rapidly escape from a dangerous situation, and its high resilience, makes it a natural choice for operations of this kind.

The shuttle's existing military sensor package is suitable for a range of scientific applications, and can be augmented with specialist systems as required. The shuttle's armament is usually removed to make room for additional instruments such as probe launchers and deployable sensor arrays.

PATROL BOAT

The deployment shuttle is sometimes converted into a long-range patrol boat. Some vessels of this type have their high-powered drives removed and used elsewhere (or a battle-damaged system might be replaced with a lower powered one), though the ability to accelerate hard for a long period is useful in a long-range patrol asset. A patrol craft of this kind will usually have a complement of four or six personnel, enabling boardings to be made and assistance offered to distressed vessels.

It is common practice with craft of this type to convert the armoury into sleeping quarters and the main crew space into a common area and galley. A total of 20 tons of useable space is available, but for patrols that might be ten to twenty-five days in length this is still a small area to be cooped up in. The 11-ton armoury can be turned into two or three stateroom-equivalents, but is more commonly set up as a cramped bunking area with the rest of the space used for freshers, entertainment consoles and similar amenities. This maximises the amount of room the crew have, but it is still not much. The common area formed out of the 9-ton crew space has to serve as a living, working and everything-else area for the crew. When not on the bridge or asleep in a bunk, the crew will be in this small room, in close proximity to one another, for days on end. Service on such a craft is rarely popular, but for some minor naval forces it is the only way to project an armed presence into the more distant parts of the star system.

Patrol boats typically have their antipersonnel armament removed, and are often given a missile rack in place of the sandcaster. Other weapon fits are possible however, depending upon the needs and desires of the operator. Despite being fairly unpleasant to crew for a long period, craft of this sort are reasonably effective in projecting power. They can reach distant parts of the star system and chase down almost any craft, and can outrun almost any vessel they cannot outfight.

C H A P T E R - S X MISSIONS

The following missions, encounters and jobs all revolve around the use of a deployment shuttle or one of its variants, either by the Travellers or someone they meet in the course of their adventures.

EXPEDITION TO MOUNT RHUED

Doctor Vicot Borannsenn is the head of a geophysical research team. He needs a crew to operate a small craft in support of his scientific expedition, and is willing to be a little economical with the truth in order to find them. He has obtained an old LCS-24A deployment shuttle in banged-up but serviceable condition, but cannot find anyone willing to pilot it or take part in his expedition.

This is perhaps not surprising, since what he wants to do is enter the crater of an active volcano and undertake a close-up study of the tensions and stresses in the rock during an eruption. He has learned that when he mentions this part of the mission, most prospective pilots decide there is not enough money in creation to make them want to take part.

Borannsenn is thus a little vague about exactly what he wants to do. His version of the mission brief sounds innocuous; he wants to study geophysical stresses in a major mountain chain, and needs a shuttle for mobility. Ideally, he hopes to recruit two pilots plus a couple of people who can help his two assistants set up instruments and monitor them from the converted shuttle's scientific operations bay. This used to be the armoury, but now contains an advanced data processing suite and array of metallurgical and chemical analysis equipment. The shuttle's plasma guns have also been replaced with remote data-gathering probes.

The early part of the mission actually follows Borannsenn's brief; the crew might be a bit alarmed to see an active volcano in the area but, as the good doctor says, it is not *very* active at present. The shuttle will be used to transport personnel from the expedition's base camp all over the mountain chain, placing seismic and stress sensors and collecting quantities of rock samples. These, and the data from the sensors, will be analysed aboard the shuttle in a methodical and not at all exciting manner.

There will be a little tension caused by what Borannsenn calls 'grumbly old Mount Rhued', which has been sort-of-erupting for a generation. This sort-of-eruption consists of little more than an intermittent flow of lava from tubes on the mountainside and a fair amount of smoke and ash. There are ominous rumbles from time to time, and the occasional shower of lava bombs, but for the most part Mount Rhued is a distant presence rather than an imminent threat.

As the data and sample collection proceeds, Dr Borannsenn begins to operate closer to the volcano. He attempts to be nonchalant about this, as if he is just conducting his research in places that happen to be somewhere near it, but astute Travellers will realise they have been spiralling in towards the mountain all along. If confronted, Borannsenn says that he needs 'some data from the volcano area' but is vague about exactly what he plans. He tries to give the impression that he does not intend to go dangerously close, and that he can predict the 'grumbles' from Mount Rhued well enough to ensure there is no threat to the shuttle or its crew.

Eventually, the crew will find themselves setting down beside lava streams to plant stress sensors, and occasionally chucking things in the stream to watch them burn or explode. Borannsenn encourages this sort of playful behaviour, since it inoculates the crew to the volcano's presence. His own research assistants are almost cavalier about working close to lava, but they are still cautious enough not to get hurt. Finally, when he can stall no longer, Borannsenn comes out and says that he wants to collect data from the crater itself. This is not all that dangerous if done between 'grumbles', and it will be possible to land the shuttle safely within the crater if a suitable spot can be located. There is a pool of lava in the bottom of the crater, but it is actually quite unimpressive, and although the dust and smoke coming from the vents makes breathing equipment or at least a filter mask necessary, it is possible to move around the crater without undue hazard. It is, however, very hot and the occasional lava bomb can make life quite interesting.

During the course of their research, Borannsenn's team comes to the alarming conclusion that a major eruption – of gigantic proportions – is imminent. The smart thing to do would be to get far away, but there are settlements that will be threatened. The longer the team can stay in the increasingly hazardous crater, the better the data that can be provided to the authorities. That in turn translates to an effective evacuation plan that could save thousands of lives... but leaving it too late might make escape impossible.

OUTPOST ADOWSA

The Adowsa Proving Site is owned and operated by Haplin Colonial Services, a small firm specialising in reconnoitring and 'proving' colony sites. This is mainly a matter of sending some people to live there for a year or two, thus experiencing what new colonists would have to deal with. Following the old adage that 'you don't know a place until you've lived there for a year', the proving teams are tough and resourceful, since they often have to deal with unexpected threats, equipment breakdowns and assorted other misfortunes.

The Adowsa site is located in a marginal area, prone to high winds and dust storms that limit visibility as well as damaging light vehicles and equipment. The area is known to have deposits of useful minerals, and might be a profitable colony site with the right investment. In order to correctly estimate the mix of personnel and equipment needed to make a go of Adowsa, a prospective client has hired Haplin Colonial Services to put a couple of dozen people there for a two-year contract.



The project is currently about 15 months in, and up to now has been going acceptably well. The site has proven unusually hard for the proving team, but they have figured out how to overcome most of the problems associated with the region. However, a few weeks ago the proving team stopped reporting. At first this was not a cause for much concern, as contact tended to be intermittent anyway. After days became weeks, it was decided to send a team to investigate. That operation was delayed by a two-week-long dust storm, but finally it will be possible to send people to find out why the outpost has gone dark.

Transportation for the mission will be a 24A deployment shuttle, which is heavy enough and has sufficiently powerful engines to be able to punch through a dust storm or high winds. The Travellers might crew it, or may be passengers along with additional personnel. These include a handful of security 'experts', a medic and a couple of technicians in case there is a communication system problem the proving team cannot fix.

The approach to the outpost is rough for much of the way, with the tail-end of a dust storm blowing and unpredictable wind gusts bouncing the shuttle alarmingly. There is no response from the outpost, and it is difficult to see anything but the outline of buildings. Radar and other sensors show no movement, but that it to be expected.

The outpost consists of a small complex of interconnected prefabricated huts, with flexible tubes between them. It is possible to move from one to another hut by more than route, even without going outside. There is power – that is obvious from the fact the external lights are on – but beyond that it is difficult to predict what will be found inside.

The mission runs into problems straight away. The 'security experts' are mainly gung-ho wannabee mercenaries whose confidence greatly exceeds their competence. None of them is inclined to take orders from anyone else, and even suggestions can provoke a confrontation if someone's ego is bruised. The security team are not exactly well motivated either. They are eager enough when the mission is nothing more than strutting about looking tough, but they lack the professionalism and determination to get the job done when things start to go awry. Which naturally they do.

The outpost had a population of 27 a couple of weeks ago. Now there are less than ten survivors. About half of them are holed up in one of the huts, scared and in an unstable frame of mind. The others are completely psychotic and spend their time sneaking about the camp looking for someone to kill. The reason for this is a contaminant in the dust that has been getting into the food and water for over a year. Harmless in small doses, it can eventually cause a form of violent insanity. Not everyone goes that way; some people just become nervous and confused, making them easier victims for those who have succumbed completely.

As soon as the team enters the complex the worst of the psychotics will start to hunt them. They are insane (but treatable, if they can be subdued and brought to a medical facility) rather than stupid. Thus the psychotics will seek to pick off individuals rather than charging headlong onto the guns of the security team. They are armed with light weapons – handguns, shotguns and a couple of civilian rifles – as well as knives, clubs and a penchant for booby-traps.

Once the killings start, the Travellers will have to deal with gun-happy security 'experts', terrified and unstable colonists and a collection of psychotic but cunning murderers who have already taken out most of the settlement's population. It is probable that the site will be listed as non-viable... if anyone survives to make the report.

DECAPITATION STRIKE

The so-called Autonomous Region of Karstchen has been in a state of polite rebellion against the central world government for decades. There has been little actual fighting, just a great deal of posturing between the Karstchen militias and the forces of the central government. The region is of little importance, and the rebels have been careful not to escalate matters to the point where intervention is necessary for the sake of external political opinion. For their part, the government does not want to get dragged into a counter-insurgency war that it might not be able to win.

Thus, apart from the occasional contact between patrols and high-profile operations to grab some 'strategic' location and hold it for a few weeks – which do not really achieve anything except make it look like the government is doing something – the status quo has remained unchanged for years. The rebels make a little bit of defiant noise and the government forces send out patrols to show they have not accepted the situation as permanent.

Until now, nothing much has changed. However, the rise of a new and charismatic leader among the rebels is a cause for concern on both sides. Argan Resniche is a hard-liner who has gained a great deal of support among the younger and more aggressive rebels. His tough talk of driving back the government forces and grabbing new territories has alarmed his own side more than the authorities – after all, it is them that will do most of the dying if he launches an offensive and the government finally has to respond in force. The established rebel leaders are realistic enough to realise that they have reached a comfortable state of violent co-existence with the central government, and that their best chance for true independence is to let things simmer along for a few more years. Rocking the boat will force the government to act, creating a situation in which the rebellion will eventually be crushed, but only at great cost on both sides.

Argan will not see reason (as the established leaders describe it) and has sent envoys from the other leaders away after beating them. Some have even been killed. With so much popular support it is inevitable that he will be able to launch his campaign sooner or later, unless he is stopped. The only way to do that is to kill him.

The rebel leaders cannot be seen to act against their own popular hero, so they have turned to outsiders for help. They need a team to eliminate Argan and be seen doing it. The assassination will be pinned on rogue elements within the militias; perhaps relatives or friends of the murdered envoys seeking revenge. There will be ill-feeling against the government but it will subside once the accusations stop flying. This is, the rebel leaders are sure, for the best.

The Travellers will be provided with a deployment shuttle and sufficient small arms to get the job done. Argan is usually surrounded by his close followers, who are armed and ruthless, and is rarely far from a larger force of militia. However, he sometimes likes to withdraw to a more remote location to rest and plan the coming great offensive with his hangers-on. If a strike can be launched whilst he is there, casualties can be minimised and the Travellers will be reasonably sure that everyone they see is a close supporter of Argan – and therefore fair game.

The mission should be straightforward. A rapid approach and deployment, followed by a sharp action to reach the target before his followers can make much of a response. The patrons want Argan eliminated, but kidnapping him might also be useful. However, there are complications in the form of bystanders.

Not everyone at Argan's base is a close follower of his. There are numerous people there who are simply employed as cooks, cleaners and staff, or who live in the local area. Hosing the base down with plasma guns will slaughter these people along with Argan's supporters, which will ultimately have a serious backlash among the rebellion's supporters.

In order to avoid collateral casualties it will be necessary to land and enter the base on foot, engaging Argan's guards as they appear. The guards are armed with midtech small arms – assault rifles and submachineguns for the most part – and will not hesitate to open fire. Argan himself is armed and will resist a kidnapping attempt, perhaps forcing the Travellers to kill him even if they do not intend to.

If the Travellers fail to plan their withdrawal, they may find themselves in trouble as the guards and nearby militia begin to react. Most deployment shuttle operators build exfiltration into their operational plans, but the Travellers might forget that... to their detriment.