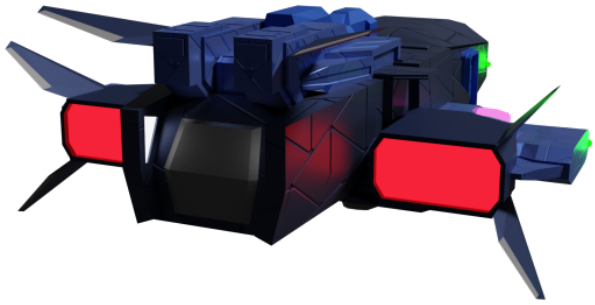
Taka-Class Shuttle

A fast, luxurious transport that is agile, armored, and indulgently comfortable, the Taka-Class is easily configurable for a variety of missions.

Taka-Class Shuttle	
	
Front	Rear

History

Fix Me! Needs history section.

About the Taka-Class Shuttle

Like many Yugumo Fleetworks vessels, the Taka is based on an upgraded version of an existing design: in this case, the Journey-Class Shuttle. Like other recent Yugumo Fleetworks efforts, it's a collaboration with Osman Heavy Industries. Taka (鷹) means “hawk” in Yamataigo.

SAoY Variant

There is a 1B variant that conforms to Star Army of Yamatai standards.

Mission Specialization

This ship is ideal for fulfilling the following mission profiles.

- Personal or VIP transport
- Cargo operations
- Troop transport

Appearance of the Taka-Class

With the typical Yugumo Fleetworks combination of sleek and chunky, the Taka features sharp angles and an aggressive, somewhat maritime look. Even if more angular and less curved than ships like the Misha, it still fits in well with the current design ethos.

Statistics and Performance

The Taka-Class Shuttle is a high-performance luxury shuttle that does not sacrifice comfort for endurance, speed, and maneuverability.

General Statisics

- Class: Yu-T1-1A
- Type: Shuttle
- Designers: Yugumo Fleetworks and Osman Heavy Industries
- Manufacturer: Yugumo Corporation, Jiyuu System
- Fielded by: Yugumo Corporation and Yamatai Star Empire
- Production: Mass Production
- Production Notes: Customizations can be made upon request.
- Price: 48,000 KS
- With Chairman Package: 300,000 KS
- Umikagami Subsurface Operations Suite: +163,600 KS factory, +204,000 KS refit

Passengers

- **Crew:** 1 individual required, 2 individuals for recommended operation. Up to 2 attendants.
- **Passengers:** None in cargo configuration, 6 in passenger configuration, and 24 in troop carrier configuration.
- **Maximum Capacity:** About 40 people can fit aboard the passenger variant in an emergency, or up to 60 in the cargo and troop carrier variants, but the ship would be extremely cramped.

Dimensions

- Length: 16 meters (52.5 feet)
- Width: 14 meters (45.93 feet) widest, 6m (19.69 feet) fuselage
- Height: 3.5 meters (11.48 feet)
- Decks: 1.5 (2.25m high)

Propulsion and Range

In compliance with the Starship Speed Standard:

- Mizu II Series - Nami II CDD: 18,750c
- Yumeoibito Hyperspace Fold Drive: 0.75ly/m
- Hoshi III Series Multi-stage Turbo Plasma Drives: 0.425c
- Ground Speed (Hovering): 420km/h
- Max. Atmospheric Speed: Mach 2.2
- Range: Unlimited
- Lifespan: Review every 10 years
- Refit Cycle: Every 5 years or as needed

Damage Capacity

See Damage Rating (Version 3) for an explanation of the damage system.

- Hull: Tier 8 (Medium Mecha)
- Shields: Tier 8 (Medium Mecha)

Inside the Ship

The Taka-Class Shuttle is a well-appointed, comfortable, and luxurious ship.

Deck Layout

The Taka-Class Shuttle is a single-deck vessel, equipped with facilities to fit adventure and travel. Wing access is gained through crawlspace conduits in the stern compartment and from the exterior of the vessel when it is landed or in the dock.

Deck	Compartments
Deck 1	Crew Deck
Deck 1.5	Cargo Space, Engineering Panel Access

Compartments

Below is a listing of compartments aboard the Taka-Class.

Upper Deck

There is a some cargo storage space here, though the area lacks any cargo handling systems. In the rear are panels to access the engineering compartment and other systems.

Cockpit

The cockpit features stations for the pilot and copilot, who are beside one another, facing a 200° wrap-around viewscreen over their shared console. All functionality of the ship is redundantly duplicated in full for both stations. The comfortable, ergonomic, multi-adjustable seats feature cupholders, adjustable armrests, massage, ventilation, lumbar support, SQUID interfaces, Virtual Home Sleep.

Behind them, against the rear cockpit bulkhead on the starboard side is a Star Army Bunk Bed, Type 40 in the *Deluxe Three Bunks, Desk, and Drawer/Wheels* configuration, with the bottom one typically collapsed beneath the middle for extra space. On the port side are lockers for the crew's personal items, and a pair of Yugumo Standard Anthroform Drone Berth with storage.

Emergency lockers are easily accessible by the crew.

Attendant Area

Comfortable seating for two attendants faces aft, towards the main cabin and galley, against the bulkhead to the cockpit, one to either side of the door. There are storage lockers for the attendants' personal possessions, a flight information terminal, and intercom to communicate with the pilots and make announcements in the main cabin.

Galley

Located in an alcove on the starboard side, between the cockpit and the rest of the cabin, the somewhat cramped galley is patterned after a System Kitchen, and has pantry, refrigerator, and freezer space, and cookware, glassware, utensil, and tableware storage. There is a combination microwave-convection oven with a fish grill below it, Emrys Quik Paks Processor, instant hot water dispenser, and toaster oven. A plumbed-in Coffee and espresso machine, with steamer and drain has its own built-in bean grinder. There is limited counter space for prep, as the galley is intended for serving primarily pre-prepared or minimal-preparation food. A double sink, dishwasher, and plasma incinerator maintain sanitation, and there is ample lighting and ventilation. Portable small appliances must be used to satisfy any needs the built in equipment cannot.

Bar

With wine storage, both chilled and ambient, a small refrigerator, zero-g-certified storage for glassware, a bar wand, taps for kegged beverages, and a sink and prep surface, the small bar faces aft. In passenger configurations, it has a roll-up opening to the main cabin and stools with footrails on the other

side.

Laundry

To the forward side of galley there is a small laundry area with utility sink, folding table with a hanging rod and storage shelf above it, and combination washer-dryer with steam and ultrasonic modes atop a storage pedestal with drawers below it.

Hygiene

Opposite the ship from the galley, on the port side near the front is a pair of latrines and a single shower. There is a double sink and vanity just outside, with a wall-mounted hairdryer and a lighted mirror on an articulated arm. Next to it is a housekeeping closet.

First Aid Station

Across from the vanity is a small, enclosed room with basic medical diagnostic and monitoring equipment, as well as a fold out bed from the wall and a first aid locker.

Main Cabin

The configuration of the main cabin is the primary differentiator among Taka-Class variants. Latching sockets, molecure connectors, and other features make the cabin easily reconfigurable and customizable. It is possible to configure the cabin for multiple roles, but space for each will be more limited.

The cost of the vessel includes the parts and accessories to configure the shuttle in any of the listed manners.

Cargo Configuration

In this variant, the entirety of the main cabin is open, and equipped as a very small Yugumo Standard Cargo Bay. The escape pods are removed for space. There is an aft-facing belly ramp that can be lowered to bring cargo or small vehicles aboard. There is just barely enough space to load two SSCC-Large side-by-side.

Passenger Configuration

In this format, there is comfortable lounge or club-style seating for six. There are surfaces for work and dining, and the seating and surfaces are reconfigurable to form couches, loveseats, beds, or individual

bucket seats. There is an additional pair of latrines and a shower at the rear of the main cabin, along with a similar vanity as the hygiene area. Also in the rear is a small cargo area for supplies and passenger luggage. The belly-ramp is deactivated in this configuration, and sealed shut with physical, magnetic, and force-field locks.

Troop Carrier Configuration

Similar to the Cargo Variant, The Troop Carrier is mostly open space and the aft-facing belly-ramp is functional. There is fold-down webbing for seating with safety harnesses against the side bulkheads of the ship for personnel not wearing power-armor, and bicycle-style seats with Durandium Alloy restraining bars for power-armored troops. The escape pods are removed in this configuration for more room inside the bay. The narrowed cargo-handling space in the center is optimized for orbital and air dropping small vehicles and cargo pallets, as well as power-armored troops.

Engineering

Further in the back of the Taka behind protective panels is access to some of the shuttle's critical systems. These are only to be opened in the event of field repair. Otherwise they must remain close lest over exposure to outside elements affect their performance. In addition to the power and propulsion systems, the KAIMON and various other systems are as well.

Other systems are accessed by removable floor panels. Each has a quarter-turn lock at each corner that requires positive pressure downward during torque to unlock. Floor panels over junctions, ports, and outlets have a retractable access cover that is secured with a single, smaller lock otherwise identical to the ones that secure the panel itself. This system also facilitates the easy conversion between the passenger and cargo variants.

Systems

Below are the systems of the Taka-Class Shuttle.

Taka-Class Hull and Frame Construct

The Taka utilizes a primarily Durandium Alloy hull structure. All windows and viewports utilize Transparent Durandium.

Taka-Class Hull and Frame Assembly	
Primary SpaceFrame	Forcefield Reinforced Durandium Alloy Major Truss
Secondary SpaceFrame	Durandium Alloy Secondary Truss and Rod Assembly
Outer Plates	Sitearium coated Durandium Alloy Plate with Omnihue matrix

Taka-Class Hull and Frame Assembly	
Lining	Yarvex Lining

Power Systems

The Taka uses Kaminari Quantum Foam Generators for its primary power system. The supercapacitor banks have enough backup power for 48 hours of minimal operation, 18 hours of moderate-load operation, and 3 hours of intense operation such as high-speed maneuvering or full-power shield deployment.

Backup Power

A Tsuyosa Series Matter-Antimatter Reactor with Matter Collection System provides backup and auxiliary power.

Propulsion Systems

The Taka utilizes a modified Mizu II Series - Nami II CDD which maximizes the CDD performance at 18,750c. Distortion coils are located in the wing pods on both sides of the craft.

In addition to the CDD, the Taka is equipped with two Hoshi III Series Multi-stage Turbo Plasma Drives for sublight speed. They are located in the rear of the ship. Sublight performance for this craft usually can withstand up to 0.40c. Maneuvering Thrusters (ion thrusters) are used primarily for attitude adjustment, docking, and station keeping.

For hyperspace fold, the Taka uses the Yumeoibito Hyperspace Fold Drive.

The Taka also has an Anti-Gravity System for landing and atmospheric operations.

Integrated Eletronics

The Taka-Class Shuttle is equipped with the KAIMON-Portal suite with its included communications and sensor systems. It also has the uplink and PANTHEON/SYNC connect module.

In addtion to its KAIMON Kagami sensors, and the Sorakagami Aerospace Operations Suite, there are also a Mineral Scanner and SachiTech Tech-Scanner available to the helm.

For authorized operators, ELECTRA may be enabled.

Life Support and Environmental

The Taka-Class Shuttle is equipped with Yugumo Standard Life Support Systems.

Shielding

The Taka-Class Shuttle's Mizu II Series - Nami II CDD is equipped with a (Civilian) Combined Field System, supplementary shields, and navigational shielding. The primary shields create a conformal or bubble barrier.

Supplementary Shielding

For times when the (C)CFS is unavailable or its operation is undesirable such as when sitearium is energized. Running both supplementary defensive systems at the same time does not increase the effective tier of the barrier, rather, they are used against different threats and the responding selected in realtime after threat analysis by the computer. As the supplementary shields do not contribute to the ship's defensive profile when the (C)CFS is active, it is wasteful to have the supplementary shields active while the primary shields are as well.

Electromagnetic shielding

The Electromagnetic shields are particularly good at deflecting the charged particles in many beam weapons. The shield created is a conformal or bubble barrier.

Gravitic shielding

Gravitic shielding are effective against kinetic weaponry and collisions. This shield also serves the special purpose of counteracting graviton beams. The shield created is a conformal or bubble barrier.

Navigational Shielding

Not intended for, or effective at, defense against starship weaponry, navigational shielding protects the ship against navigational hazards, such as fast-moving small masses and slow collisions with large masses. The deflectors allow for safe maneuvering without raising the profile of its sensor signature as much as the defensive shielding.

Emergency Systems

The *Taka*-class Shuttle is equipped with Yugumo Standard Emergency Systems and reactive atmospheric force fields in the event of vacuum exposure. Should the craft's power or communication's systems be inoperable it comes with a built in subspace distress beacon with its own power source, good for 120 hours of continuous operation.

In the event of a catastrophic failure or impending doom, the ship has ten "Ikigai" Type 43 Escape Pod, four to each side of the ship and two in the cockpit.

Internal Security

Internal security systems and are only included with the Chairman Upfit Package.

Internally, there are enough pop-out automated weapons turrets positioned as to cover the entire interior, with at least three of them able to aim at any one spot with no blind spots or effective cover. These weapons are equivalent to a Yugumo E2 Energy Pistol each, but draw power directly from the ship's power systems[1)]. They are capable of firing in lethal and nonlethal modes, independently of each other. They are not capable of firing at targets outside of the ship. Additionally, hidden, armored vaults in strategic places around the ship contain actual Yugumo E2 Energy Pistols, ready to open at the mental command of an authorized person[2)].

Emergency Lockers

There are two each of Yugumo Standard Damage Control Alcoves, Yugumo Standard First Aid Lockers, Yugumo Standard Armory Lockers, and Yugumo Standard Survival Lockers, one each port and starboard, amidships right behind the helm, and another of each in the cockpit. easily accessible and fully-stocked, for any emergency.

Landing Struts

The Taka-Class Shuttle is equipped with landing struts, they are pneumatically driven and are used to raise or lower the ship, and level it once it is in place.

Signature Reduction

The armor layer is impregnated with an Omnihue matrix, allowing effectively unlimited control over the coloration, pattern, text, and insignia of the surface. This serves as thermoptic camouflage and signature reduction, if set properly.

Sitearium

The Taka's armor, in addition to the Omnihue, has layers of sitearium coating it, that allow for even more effectively reduced signature than the Omnihue alone. Note that when the sitearium is energized, acceleration or maneuvering under power, or moving in an atmosphere, disrupts the signature reduction effect, and any zero-point energy such as QF Generator or Aether Generator onboard must be shut down, switching to more traditional forms of secondary power, or the ship remains detectable by anyone looking for such signatures.

Utility Turrets

In various places around the outside of the ship are mounted pop-out turrets for a few of the Medium variant of the MultiStruct Multitool for collecting matter and resources from nearby asteroids and debris, and several strategically-placed Scalable Graviton Beam Projector Array.

Weapons

A transport, not a fighter, the ship is not armed for ship-to-ship combat. However, possesses some point defenses for protection from missiles and other small threats. For those purposes, there is a more security and combat focused variant, the Mōkin-Class Patrol Craft.

Plasma Projection System

The Taka is armed with a Plasma Projection System array comprising various sizes of emitters. These also serve as secondary engines and maneuvering verniers, increasing the acceleration profile, maximum speed, and maneuverability of the ship. Both the point-defense and anti-starship turret systems are pop-up/retractable so during non-combat situations they are enclosed beneath the hull plates. By redirecting power from the plasma system that powers the ship's propulsion, it may use excess weapons limitation capacity, up to a maximum of two Tier Equivalent Weapon Groups[3)] worth of firepower in variably-sized plasma cannons and smaller plasma guns by using magnetic direction to weaponize the ship's drive and maneuvering engine nozzle output. This negatively impacts the ships speed and maneuverability, however, the more power diverted from propulsion to weaponry. The effect is more and more pronounced the more free capacity that is used in this manner.

Default Defensive Loadout

Per corporate policy, the ship may only be sold armed within the Yamatai Star Empire. It is sold commensurately more cheaply if unarmed.

- 8 x "Tachikaze" Point Defense Cannons Type 43 (Tier 6 Heavy Anti-Armor Point Defense)
- Plasma Projection System (Variable-Tier Multipurpose Weapons System)

OOC Notes

Yuuki created this article on 2022/10/21 11:27. Approved by Wes.

Art by Alex Hart.

Products & Items Database	
Product Categories	small craft
Product Name	Taka-Class Shuttle
Nomenclature	Yu-T1-1A
Manufacturer	Yugumo Corporation, Yugumo Fleetworks
Year Released	YE 44
Price (KS)	48 ,000.00 KS
DR v3 max	Tier 8

1)

With backup power equivalent to its typical battery.

2)

or the correct keypad sequence

3)

individual weapons limited to a maximum DR 7

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Last update: **2024/03/10 09:09**