Ke-T8 "Kuma" Multi-role Shuttle
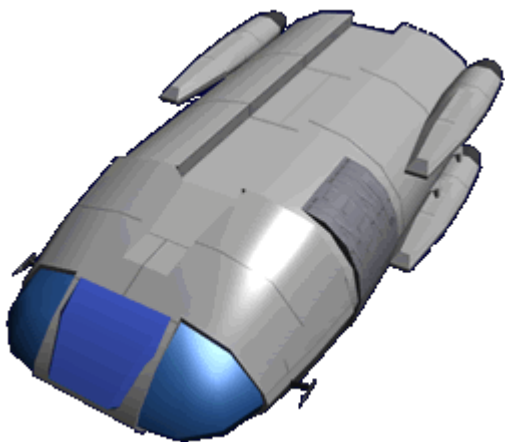
The Kuma T8 Series shuttle was developed as a replacement for the *Ke-T4 "Fox" Combat Aeroshuttle* series. It became available in YE 31.

About the Kuma T8

The *Kuma* (Bear) was named for the bears living in the mountains of Yamatai (Planet), because the profile of the shuttle when seen from above resembles the bear.

History

The *Kuma T8* is an upgrade to the reliable *Fox T4*. Design work was done by Takumi and started in mid YE 31. The goal was to create a replacement that had all the aspects of the original *Fox T4*, but with lower costs, and additional capabilities.

Appearance

The *Kuma* has a tapered body for atmospheric streamlining with four small engine nacelles positioned around the rear door. It has three windshields across the nose; one in the center, and two side windows that run the height of the shuttle.

Statistics and Performance

The Kuma has the following metrics

General

1. Class: Ke-T8-1x
2. Type: Shuttle
3. Designers: Ketsurui Fleet Yards
4. Manufacturer: Ketsurui Fleet Yards, Scientific Studies Service, Geshrinari Shipyards
5. Production: Mass Production

Dimensions

1. Length: 6 meters (19.68 feet)
2. Height: 2 meters (6.56 feet)
3. Width: 3 meters (9.84 feet) *(Fuselage)*
4. Width: 3.5 meters (11.48 feet) *(Overall)*

Speeds

The *Kuma* is an nimble craft.

- Atmospheric: Cruise: 2,143 kmph (1,332 mph) Maximum: 6,125 kmph (3,806 mph)
- Sublight Engines: .375c (~112,422 kilometers per second) (~69,856 miles per second)
- Hyperspace Drive: *(Only with Ke-T8-P3102 Hyperspace Fold Module attached)*

Passengers

1. Crew: 2 operators are recommended, but only one is required.
2. Passengers: 6
3. Maximum Capacity: There are accommodations for 8 people (2 crew, 6 passengers)

Variant Differences

The *Kuma* is available in several different models. The information below identifies the differences.

Ke-T8-1a - Military

Manufactured by: Ketsurui Fleet Yards

Used by: Star Army of Yamatai

- Ke-T8-E3100 Basic Sensors Package
- Ke-T8-E3102 Tactical Sensors Package
- SPINE interface in pilot seat
- Yamataium hull with Durandium Alloy frame
- Ke-T8-W3100 Aether Beam
- Ke-T8-W3104 Weapon Pod Mounts
    - Ke-T8-W3101 Mini-Missile Launcher Pod
    - Ke-T8-W3103 Countermeasure Module

Ke-T8-1b - Science

Manufactured by: Ketsurui Fleet Yards, Scientific Studies Service

Used by: Star Army of Yamatai, Scientific Studies Service

- Ke-T8-E3100 Basic Sensors Package
- Ke-T8-E3101 Science Sensor Package
- Ke-T8-E3102 Tactical Sensors Package - (SAoY Only)
- Yamataium hull with Durandium Alloy frame
- Ke-T8-W3100 Aether Beam
- Ke-T8-W3104 Weapon Pod Mounts - (SAoY Only)
    - Ke-T8-W3101 Mini-Missile Launcher Pod - (SAoY Only)
    - Ke-T8-W3103 Countermeasure Module - (SAoY Only)

Ke-T8-1c - Civilian

Manufactured by: Geshrinari Shipyards (Under a special license with Ketsurui Fleet Yards)

- Ke-T8-E3100 Basic Sensors Package
- Ge-T8-E3103 Computer Array
- Durandium Alloy hull with Durandium Alloy frame

Ke-T8-1d and Ke-T8-1e Medevac

See: Kuma T8 Medevac Shuttle

Damage Capacity

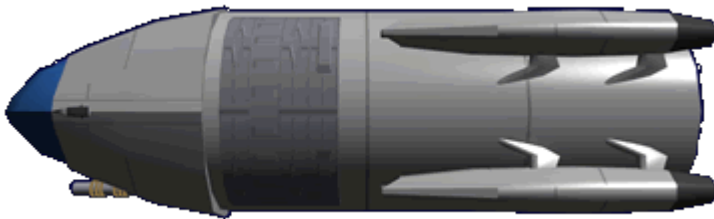See *[Damage Rating (Version 3)](#)* for an explanation of the damage system.

T8-1a & 1b

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

T8-1c

- Hull: Tier 7 (Light Mecha)
- Shields: Tier 7 (Barrier)

Inside the Shuttle

Cockpit

The cockpit of the *Kuma* has two stations, the pilot and the systems operator. The cockpit has a pressure door sealing it from the passenger compartment. The door can be locked from the cockpit side. A Fire Extinguisher 🔗 is mounted in the cockpit on the port side next to the entrance. A Type 31A Standard Size Survival Kit is located in the cockpit in a locker on the port side of the cockpit.

Pilot Station

This is where the pilot flies the shuttle. The pilot actually sits in the center of the front of the shuttle, in a fighter type configuration. The controls and displays wrap around the pilot station. Features of the pilot station include:

- Touch console
- Customizable volumetric displays
- Pilot Couch Features
    - Acceleration foam cushions
    - Dual shoulder belt & lap belt restraint system
    - Adjustable headrest
    - Manual controls (Joystick and throttle) integrated into chair. Retract when not in use.

Systems Operator Station

The Systems Operator station is oriented on the starboard side. This station allows the person to monitor and control the various subsystems. In a combat situation they control the equipment attached to the Ke-T8-W3104 Weapon Pod Mounts, or the Ke-T8-M3101 Dorsal Mission Package. When the occupant turns to the front they are positioned to the right and rear of the pilot. The station has the following features:

- Touch console
- Customizable volumetric displays
- Operator Couch Features
    - Acceleration foam cushions
    - Dual shoulder belt & lap belt restraint system
    - Rotates 180° for launch and landings
    - Adjustable headrest

Passenger area

The passenger area is capable of being reconfigured depending upon the mission.

Airlock

The *Kuma* features a compact standard airlock on the port side behind the cockpit; it is intended for a single person to cycle through at a time. The outer door splits in the center and the top portion swings up and the lower part swings down and is used as a step.

Bathroom

The *Kuma* features a compact 1 person bathroom. It is located across from the port airlock.

Passenger seats

The *Kuma* comes with six automatic folding/stowing passenger seats. These are controlled by a set of switches in the front of the compartment. This allows easy transition between passenger and cargo mode.

Each seat has the following features:

- Acceleration foam cushions
- Dual shoulder belt & lap belt restraint system
- Rotates 180° for launch and landings
- Reclines for passenger comfort
- Adjustable headrest

With the passenger seats stowed the shuttle has 2.75 meters x 2.5 meters of cargo space.

Overhead lockers

There are six overhead lockers in the passenger area where additional equipment is stored. By mounting them high leaves all of the passenger floor space free.

These items are typically stored here:

- 8 Star Army Environmental Suit, Type 28 (AMES)s or EM-G1 Emrys Dusk Suit for civilians
- 6 Web hammocks w/inflatable pillows
- Cargo nets and restraining straps

Emergency Equipment (Such as)

- 72 standard Star Army Field Rations
- 1 Type 31B Survival Kit
- 1 Star Army Medical Kit, Type 31
- 2 Type 35 Body Bags

Systems

Ke-T8-E3103 Computer Array

The *Kuma* Computer Array is a pair of [Isolated Computer Pads (ICPs)](#) working in parallel. They are mounted in a rack in the cockpit which connects them to all shuttle subsystems. One is primary and the other acts a redundant unit in case of damage or malfunction. Any indicator lamp above each ICP shows the status of the system.

Their programming includes the ability to

- [ICPs](#) can respond to verbal, psionic, and direct input
- [ICPs](#) monitors all shuttle systems.

- [ICPs](#) can operate and diagnose primary systems.

Ge-T8-E3103

[Geshrinari Shipyards](#) civilian models Ke-T8-1c are equipped with the [Ge-T8-E3103 - Computer Array](#).

Ke-T8-E3104 Communications Array

- [Subspace](#) - Capable of multi-stream message transmission and reception. Transmission range: 40LY. Secure communication mode is capable providing the operators have access to the codes.
- [Radio](#) - Full spectrum, dual-modulation; range limited by speed of light. Capable of [frequency-hop](#) and multiple-channel transmission/reception. Secure communication mode is capable providing the operators have access to the codes.
- Distress beacon - can be switched on manually, or activates when the shuttle is heavily damaged or crashes. It has an independent power supply.

Ke-T8-E310x Sensors

Ke-T8-E3100 Basic Sensors Package

This sensor package is standard with all variants of the *Kuma*. It provides the sensors needed to operate the shuttle safely.

- View more details on the [Ke-T8-E3100 Basic Sensors Package](#)

Ke-T8-E3101 Science Sensor Package

This sensor package is added to the 1b variant. It expands the shuttles sensor capability to include numerous Science sensors.

- View more details on the [Ke-T8-E3101 Science Sensor Package](#).

Ke-T8-E3102 Tactical Sensors Package

This sensor package is a tactical upgrade for the 1a & 1b variants. It is limited to [Star Army of Yamatai](#). It is needed to make use of the various modules that attach via the [Ke-T8-W3104 Weapon Pod Mounts](#)

- View more details on the [Ke-T8-E3102 Tactical Sensors Package](#)

Ke-T8-G3100 Aether Generator

The primary power for the *Kuma* is a [KFY](#) designed [Aether Generator](#).

Ke-T8-G3101 Fusion Generator

The *Kuma* uses a [KFY](#) designed fusion generator for emergency power. It has enough fuel to operate for 24 hours. It provides power for the following systems:

- [Ke-T8-E3100 Basic Sensors Package](#)
- [Ke-T8-E3103 Computer Array](#)
- [Ke-T8-E3104 Communications Array](#)
- [Ke-T8-P3100 Aether Plasma Drive](#)
- [Ke-T8-P3101 Maneuvering Thruster](#)
- [Ke-T8-V3100 Environmental System](#)

Propulsion

The Kuma has the following propulsion systems:

Ke-T8-P3100 Aether Plasma Drive

This drive is available on the 1a and 1b variants. The *Kuma* has four (4) compact [Turbo Aether Plasma Drive](#) drives for its STL travel.

Ke-T8-P3101a Plasma Drive

The 1c variant of the *Kuma* uses a [Geshrinari Shipyards](#) compact version of the [Ge-Y1-P3104 Booster Drive](#) for STL travel.

Ke-T8-P3101 Maneuvering Thruster

These Maneuvering Thrusters are updated versions of the *KiMT-n2419 Maneuvering Thrusters* they are used for docking and attitude adjustments.

Ke-T8-P3102 Hyperspace Fold Module

This module gives the *Kuma* FTL capability. It is an optional item that can be mounted on all versions. It mounts on the top of the shuttle towards the rear.

- View details about Ke-T8-P3102 Hyperspace Fold Module

Ke-T8-P3103 Combined Field System

For atmospheric travel the *Kuma* uses the Combined Field System for propulsion. It is modified so that it can only be used for propulsion or shields.

Ke-T8-W310x Weapons

The Kuma has the following armaments available:

Ke-T8-W3100 Aether Beam

This is the default weapon system for all *Kuma* shuttles. It is located in the nose under the cockpit. It is an upgraded version of the weapon on the Ke-T4 "Fox" Combat Aeroshuttle

- View details about Ke-T8-W3100 Aether Beam

Ke-T8-W3101 Mini-Missile Launcher Pod

Typically carries one per side of shuttle in the forward Ke-T8-W3104 Weapon Pod Mounts position. For Star Army of Yamatai use only.

- View details about Ke-T8-W3101 Mini-Missile Launcher Pod

Requires Weapon Pod Mounting.

- View details about Ke-T8-W3104 Weapon Pod Mounts

Ke-T8-W3103 Countermeasures Pod

Typically carried in the rear Ke-T8-W3104 Weapon Pod Mounts position. For Star Army of Yamatai use only.

- View details about Ke-T8-W3103 Countermeasure Module

Requires Weapon Pod Mounting.

- View details about Ke-T8-W3104 Weapon Pod Mounts

Ke-T8-W3104 Weapon Pod Mounts

The *Kuma* has four locations where these can be attached.

- View details about the Ke-T8-W3104 Weapon Pod Mounts

Ke-T8-V3100 Environmental System

The Kuma's environmental system comprises the following subsystems:

Gravity Controls

The *Kuma* uses standard KFY artificial gravity systems. They serve two purposes: first is to provide standard 1G gravity for occupant comfort, secondly they provide inertial compensation to reduce the effects of extreme acceleration on the occupants. The gravity levels can be controlled independently in each section.

Atmosphere

The *Kuma* atmosphere processing subsystem uses a combination of ⊙scrubbers. The system has an emergency reserve for twelve hours should all power fail.

Water

The *Kuma* water processing system filters out waste products which are then compressed and dried. The water itself is run through an osmosis processing mechanism. Capacity is 189.25 liters (50 gallons) of potable Water.

Ke-T8-S3100 Combined Field System

The *Kuma* uses a standard Ketsurui Fleet Yards Combined Field System for protection. It is modified so that it can only be used for propulsion or shields.

Ke-T8-M3100 Landing Struts

The *Kuma* has four landing struts that extend from the bottom of the shuttle fuselage. Each of them is on a hydraulic system that allows the shuttle to auto-level if on a slope of up to 15º. In flight the landing struts retract completely.

Ke-T8-M3101 Dorsal Mission Package

This is an optional item that can be configured for specific missions. The actual package provides a frame with power connections, and data lines to interface with the shuttle. It mounts on the top of the shuttle in front of the Ke-T8-P3102 Hyperspace Fold Module.

- View more details on the Ke-T8-M3101 Dorsal Mission Package.

Ke-T8-M3102 Comfort Module

This is an optional item that can be installed for crew and passenger comfort during extended missions. It mounts in the passenger area next to the bathroom, and is tied into the water and power system.

- View more details on the Ke-T8-M3102 Comfort Module.

OOC Notes

Authored by Nashoba and approved by Wes on Aug 29, 2009 [1]

Artwork created by Nashoba from DOGA.

Yuuki updated this article for Damage Rating (Version 3) on 2020/03/07 04:31.

Star Army Logistics	
Supply Classification	Class B - SMALL CRAFT
Products & Items Database	
Product Categories	small craft
Product Name	"Kuma" Multi-Role Shuttle
Nomenclature	Ke-T8-1A
Manufacturer	Ketsurui Fleet Yards

[1]
https://stararmy.com/roleplay-forum/index.php?threads/yamatai-kuma-t8-multi-role-shuttle.4454/