

Frame Advanced Tactical Electronics Suite

The Frame Advanced Tactical Electronics Suite, or FATE suite, was designed in [YE 33](#) to replace the [PAWN-IES](#) for use on Powered Frames.

History

After it was discovered that the [PAWN-IES](#) was insufficient for use by large, complex frames, even with the help of such supplemental suites as the [Silhouette](#) and [CECS](#), a more powerful system was devised, by pooling the strengths of the three systems into one seamless electronics Suite, that could more properly run the large numbers of systems present on the large powered Frame units. On top of this optimization, it includes an enhanced sensor and target control suite meant specifically for the type of combat Frames are most effective in: heavy support against large numbers of smaller, lighter targets. While the Suite does help in this endeavor, it is no replacement for pilot skill and proper support in a combined arms doctrine, and should not be relied upon too heavily.

Types

There are two types of FATE-Suite, the Type S (Standard) and Type A (Advanced) The standard is essentially just a boosted PAWN-IES with the Silhouette and CECS integrated, while the Type A has a more advanced AI based off of a combination of the PAWN AI structure, and the Silhouette's learning abilities, with the CECS integrated.

Both Types

Both the Type S and Type A FATE suites have the following systems and capabilities.

Sensors

The FATE suite has sensors which, in passive mode, can detect things up to 4 AU away, and in active mode can detect and provide information (Heading, velocity, size, ship type, energy signatures) on objects up to 2 AU away. It uses many types of sensors to do this, including:

- Electromagnetic sensors
- Electrogravitic sensors ¹⁾
- Soliton sensors ²⁾
- Unified field mass/energy sensors ³⁾
- Neutrino sensors ⁴⁾
- Tachyon sensors ⁵⁾

- Aether detectors
- Visual sensors
- Mass Detectors

Targeting control

The FATE Suite has a targeting control system capable of giving detailed information (Heading, velocity, size, ship type, energy signatures) on 100 targets, as well as simply tracking the position and orientation (IFF) of up to 200 more targets. The System can identify targets via threat levels, and can more actively track more threatening targets, as well as actively track munitions deployed by said targets.

Communications

Hyperspace

Transmission of laser and radio communications through a hyperspace conduit, hyperspace being a dimension where the distances between points is shorter. The technology itself is based on the same premise as Hyperspace Travel. The sender has to know the location of the receiver. In general unless the distance between the transmitter and the receiver is more than a few hundred light years are real-time. Transmissions can be blocked by Anti-FTL Fields.

Laser

Used for close range transmissions, and cannot be intercepted unless the receiver is directly in contact with the beam. Limited by the the laser's light-speed and any bloom due to particulates.

Radio

Full spectrum, Dual-Modulation, with a range theoretically unlimited. The practical range is short, as the waves only travel at light-speed and may degrade due to interstellar radiation over vast distances.

Electronic Warfare

The FATE-Suite uses an integrated [CECS](#) for electronic warfare duties.

Type S only

The following is found only in Type S FATE Suites.

Computing

The heart of the FATE-S suite is an extremely advanced quantum computer, capable of performing nearly endless amounts of data-churning and possessing untold memory. Quantum computers, unlike old computers which could only process 1 and 0, can process an effectively infinite range of digits.

This Quantum computer is bolstered by the [Silhouette/Mirror](#) which works by artificially speeding up a pilot's reaction times by creating a short-lived AI based directly off of their own mental structure. Increases in reaction time up to 400% have been recorded, but the AI does not learn anything more than what the pilot that it is based off of knows, and is completely erased when the frame shuts down.

Type A only

The following is found only in Type A FATE suites.

Computing

The FATE-A uses an Artificial Intelligence construct based off the original DESTINY pattern, as opposed to being based off the pilot. The AI is quantum-computer based, and operates at greater speed due to its infinite number of variables, as opposed to binary, making it more suited to its own intelligence. This AI, because of the intimate relationship it is intended to have with the pilot, is known as the 'Consort' AI.

Using lessons learned from the Silhouette, the consort was designed to be able to remember specific things that the pilot tends to do, and is capable of correcting small errors without overriding the pilot. The Consort is very loyal to its first pilot/s, and while it take time to properly synchronize, the results are higher reaction times and less strain on the pilot, because the consort effectively acts as a second pilot, performing secondary duties to ease a pilot's workload. If a new Pilot is paired with the Consort, it will take considerably longer to resynchronize, and the Consort may directly disobey orders given to it if it feels they go against what it has learned from its previous pilot/s.

In terms of Personality, the Consort tends to start off very androgynous, with a bland, businesslike personality. As the Consort begins to Sync with its pilot/s however, it will develop a personality that is intended to complement that of the pilot/s. This personality can remain Androgynous, or become either male or female, depending on how a pilot treats and interacts with it. Generally, if a Pilot has an amicable relationship, the Consort will act like a friend and partner, whereas a pilot who treats the Consort badly will tend to have very timid personality, and is less likely to help the pilot. If a Pilot greets the Consort with utter indifference, it may develop no personality at all, and continue to act similar to how it began its 'life'. The Consort is also capable of gaining sentience, though this generally takes a very long time, and there are some safeguards in place to keep it from happening if the AI shows signs of disloyalty.

1)

scalar

2)

Wave Packets

3)

Field of force sensors (Ie, Gravity, Radioactivity, and Energy

4)

nuclear reaction sensors

5)

faster than light

From:

<https://wiki.stararmy.com/> - **STAR ARMY**

Permanent link:

https://wiki.stararmy.com/doku.php?id=corp:origin:frame_advance_tactical_electronics_suite

Last update: **2023/12/21 00:58**

