



Embedded Avionics Military Computer

AYESAŞ Embedded Avionics/Military Computer is a rugged computer that can be installed on civilian and/or military air platforms where durability, high level safety, and environmental conditions are paramount. With its DO-254 and DO-178 B certifiable design artifacts and flexible architecture, the embedded computer can easily be utilized as an avionics LRU.



Standards

- Hardware designed to be certifiable in accordance with DO-254
- Bootloader firmware, Board Support Package and device drivers for Linux and GHS Integrity, developed to be certifiable in accordance with DO-178 B
- Environmental conditions testing per MIL-STD-810 or DO-160
- EMI/EMC testing per MIL-STD-461
- Electrical connector assemblies are compatible with MIL-DTL-38999

Specifications

- Can be used at safety-critical or mission-critical environments
- Appropriate for real-time, near-real-time, and non-real-time systems
- High MTBF, low MTTR
- Expandable design for customizable capabilities and interfaces
- Safety analyses performed on the embedded computer



Advantages

- Choice of a variety of operating systems (Embedded Linux, GHS Integrity, GHS Integrity-178 B, GHS Integrity-178 tuMP)
- Freescale QorIQ single-core/multi-core microprocessors on scalable single board computers
- Support for various interfaces such as ethernet, RS-232/RS-422/RS-485, MIL-STD-1553, ARINC-429, discrete I/O, video, audio, etc.
- Rugged platform version is capable of working with 28 VDC, whereas lab version works with 220 VAC.