Military Display Solutions
Recommended for land-based, avionics or naval applications, DSE’s military LCD displays and rugged vetronics are field-proven and battlefield tested. Modular in design, the military-grade monitors are customizable for ease of integration into all vetronics, avionics and marine applications. DSE offers advanced LCD enhancements for optimal viewing in any ambient light condition - from direct sunlight to leading-edge NVIS compatibility (MIL-STD 3009). Rugged touch screens, digital video recording, advanced image processing and various input configurations (DVI, HD-SDI, HDMI, RGB, RS170, RS232, RS422, PAL, NTSC and USB) allow for seamless adaptation to any mobile platform.

Recommended applications include:
- Avionic and Cockpit Displays
- Digital Video Recording and Playback
- Enhanced Situational Awareness
- Infrared Video Surveillance
- FLIR or Night Vision Applications
- Pan, Tilt, Zoom (PTZ) Control
- Military Vetronics
- Rear-view or Driver Enhancements
- Search and Rescue
- Topographical or GPS Mapping
- Thermal Imaging Gunsight
- Unmanned Aerial Vehicles (UAV)
- View Charts, Maps, Weather Reports
- View Tactical Data from Command
- Vehicle Repair Manuals
- Vehicle Diagnostics
ADVANCED VIDEO DISPLAYS (AWMV4)
Notably rugged 4-channel video displays feature: Electronic Zoom (EZoom), electronic contrast enhancement, graphic overlays, horizontal image mirroring for rearview cameras, multi-channel windowing, Picture-By-Picture (PBP), Picture-In-Picture (PIP), Picture-Over-Picture (POP) and Quad View.

DRIVER'S VISION ENHANCERS (DVE)
Rugged 8.4" and 10.4" Driver's Vision Enhancer (DVE) displays give Drivers and Crew a tactical advantage whatever the situation presents; backwards compatible with legacy DVE system installations.

MIL SPEC MONITORS (MSM)

PROGRAMMABLE TACTICAL AWARENESS CONTROLLERS (PTAC)
Engineered with Programmable Button Interface for ASCII or HEX code (via RS232) protocol providing control of external systems.

TACTICAL VIDEO RECORDERS (TVR)
Integrated Digital Video Recorder (DVR) offers real-time recording and on-display playback of high quality, full-frame rate video with H.264/MPEG-4 compression and embedded time stamping; Downloadable via USB.

CUSTOMIZED OEM DISPLAYS
Custom displays with optimizable designs allow for seamless integration into existing mechanical subsystems, open architectures and I/O electrical platforms. Custom prototyping, electrical, mechanical and firmware are available.

HI-DEF JUST GOT RUGGEDIZED.

The new High Definition Rugged Monitors (HDRM) offer up to full 1080p full motion HD video ensuring complete optical performance and full reliability while providing a small footprint for small spaces.

- Up to 1080p HD
- HD-SDI In/Out Up to 3Gb/s
- (3) RS-170 In
- (1) RS-170 Out
- (1) HDMI In
- (1) DVI In
- (15) User Programmable Buttons
- 9.0" - 17.5" LCD Sizes
Enhanced Situational Awareness Features
- Electronic Zoom (EZoom)
- Electronic Contrast Enhancement
- Graphic Overlays
- Horizontal Image Mirroring for Rearview Sensors
- High Definition Video (Up to 1080p)
- Internal Digital Video Recording (DVR)
- Multi-Channel Windowing
- Multiple Video Inputs
- Picture-By-Picture (PBP)
- Picture-In-Picture (PIP)
- Picture-Over-Picture (POP)
- Quad View

Rugged Digital Video Recording Features
- Up to 32 Hours Record Time (8, 16, 32 GB)
- Records 24-bit High Frame-Rate Video (30 fps)
- H2.64/MPEG-4 Data Compression
- Time Stamping (1/100th of a Second)
- Video Thumbnail View File Management
- FF, RW, Pause, Stop, Play Bezel Buttons
- Secure Erase
- Download via USB

DSE Military Cots Displays Meet and Exceed Key Military Specifications.

| MIL-STD-461 EMI                  | MIL-STD-810 Method 512; Immersion |
| MIL-STD-704 Aircraft Power Requirements | MIL-STD-810 Method 513; Acceleration |
| MIL-STD-810 Method 500; Altitude       | MIL-STD-810 Method 514; Procedure I, II, V, VI; General Vibration Category 14 - Aircraft; Category 20 - Ground Mobile |
| MIL-STD-810 Method 502; Low Temperature | MIL-STD-810 Method 520; Temp, Humidity, Vibe and Altitude |
| MIL-STD-810 Method 503; Temperature Shock | MIL-STD-810 Method 523; Vibro-Acoustic/Temperature |
| MIL-STD-810 Method 505; Solar Radiation | MIL-STD-1275 Vehicle Power Requirements |
| MIL-STD-810 Method 506; Rain | MIL-STD-1472 Thermal Contact Hazard |
| MIL-STD-810 Method 507; Humidity | MIL-STD-3009 Optional NVIS Compatibility |
| MIL-STD-810 Method 508; Fungus | MIL-PRF-22885 Sunlight Readability for Push Buttons |
| MIL-STD-810 Method 509; Salt/Fog | MIL-A-8625 Standard Finish |
| MIL-STD-810 Method 510; Blowing Sand and Dust | MIL-PRF-22750F Optional Painted Finish |
| MIL-STD-810 Method 511; Explosive Atmosphere | MIL-DTL-38999 Connectors; Qualified |

Quality Design, Engineering and Manufacturing
Digital Systems Engineering’s (DSE) ability to consistently manufacture first-rate high-quality US-made products in today’s international market is supported by a documented quality management system; DSE is registered to AS9100C, which emphasizes risk management, substantial recordkeeping, and continual process improvement. This robust QMS foundation supports DSE’s efforts to identify, coordinate, and control all key activities necessary to produce consistently premium products.

Custom Product Design and Engineering Services for Application-Specific Requirements
DSE offers a total package of design, engineering, manufacturing and life-cycle management services to support Customer-driven requirements. Our expert team of engineers have immeasurable experience in rugged mobile design, rapid prototyping, product validation, quality control and mass production. DSE is recognized for industry leadership and commitment to providing high-quality, innovative display and computer solutions.

About Digital Systems Engineering, Inc. (DSE)
Since 1995, as a privately held U.S.-owned small business (FAR 19.102), DSE has achieved an international reputation for excellence in the design and manufacture of leading-edge technology-driven display and computer products. DSE has a long-standing history of exceeding Customer expectations in the ongoing development of mutually beneficial business relationships.