

**Advanced Products** is a business group of Epsilon Systems specializing in the design and manufacture of diverse solutions for military and commercial applications.

We offer turnkey engineering, ISO 9000:2015-certified design, assembly, and testing, and uncompromising quality and technical support to our customers.



## Manufacturing

### *Ground Support Equipment (GSE)*

- Compact Aircraft Support Cart (CASC): Model 125P-CASC35DC, NSN 1730-01-650-9192
- Oxygen Servicing Cart: Model A/M26U-14, NSN 3655-01-513-4318
- Logistics and spare parts support for DLA and NAVSUP

### *Electronic Rack Build-to-Print Fabrication and Assembly*

- Turnkey systems
  - Populated/non-populated (components and wiring)
  - Single and multiple rack systems
- MIL-STD Testing (Shock, Vibration, EMI, Environmental)
- Fabrication



### *Junction Box Build-to-Print Fabrication and Assembly*

- Power entrance panels, power distribution units, transformers, etc.
- Signal entrance panels, signal interface panels, etc.
- RF entrance panels, patch panels, etc.
- Component types such as
  - Terminal boards, lugs, in-box wiring, etc.
  - Circuit breakers, relays, etc.
  - Electrical connectors, bulkheads, etc.
  - Power supplies, transformers, etc.
  - EMI / RFI filters
  - Grounding and bonding components



# Advanced Products Group Capabilities

## Certified ISO 9001:2015

- Full Design (both locations)

## Customers

- Naval Air Warfare Center (NAWC)
- Naval Surface Warfare Center (NSWC)
- Naval Undersea Warfare Center (NUWC)
- National Aeronautics and Space Administration (NASA)
- Naval Ship Systems Engineering Station (NAVSES)
- Various Commercial Aerospace and Aviation Companies
- Foreign Militaries

## Manufacturing (continued)

### *Wire Harness Design, Fabrication, and Assembly*

- Power cables and wiring
- Signal / data cables and wiring
- MIL-STD-1553 data bus
- RF cables and wiring
- Connector types such as
  - MIL-circular (MIL-DTL-22992, MIL-DTL-26482, MIL-DTL-38999, etc.)
  - N-type, C-type, BNC, SMA, etc.
  - U-183, U-228, U-229, six-pin audio, XLR, etc.
  - DB-type, HD-type, USB, etc.
  - IT / telephonic (RJ45, RJ11 etc.)
  - Fiber optic ST, SC, FDDI, T-FOCA family, etc.

### *Training Equipment Design, Fabrication, and Assembly (Surface, Subsurface, and Aviation)*

- Partial Task Trainers (PTT)
- Technical Training Equipment (TTE)
- Technical Manual Development
- On-site Training



### *Ruggedized Flat Panel Displays*

- Customize design to meet customer/SOW requirements
- Current available sizes: 6.5" to 24"; 4x3 or 16x9 Format
- All sizes, formats and mounting options can be designed to customer requirements
- Sunlight readable
- Bonded anti-glare/anti-reflection protective glass window
- High resolution up to 1920x1200
- HDMI/DVI/composite video inputs
- Touch-screen or RS232 control options
- Real-time enhanced video for better visibility through haze and fog
- Shipboard, airborne, and land-base application
- Designed and built to meet military standards (shock, vibration, EMI, environmental)

# Advanced Products Group Capabilities

## Contact

**Advanced Products Group West** – 1HQ30

**Ron Klein**

Vice President of Information Technology

Vice President & General Manager

Advanced Products Group West

Direct: 858-740-0572

[rklein@epsilonsystems.com](mailto:rklein@epsilonsystems.com)

5482 Complex St. Suite 109

San Diego, CA 92123

Tel: 619-702-1700 Fax: 619-702-1711

**Advanced Products Group East** – 74WY5

**Keith Cole**

Vice President & General Manager

Advanced Products Group East

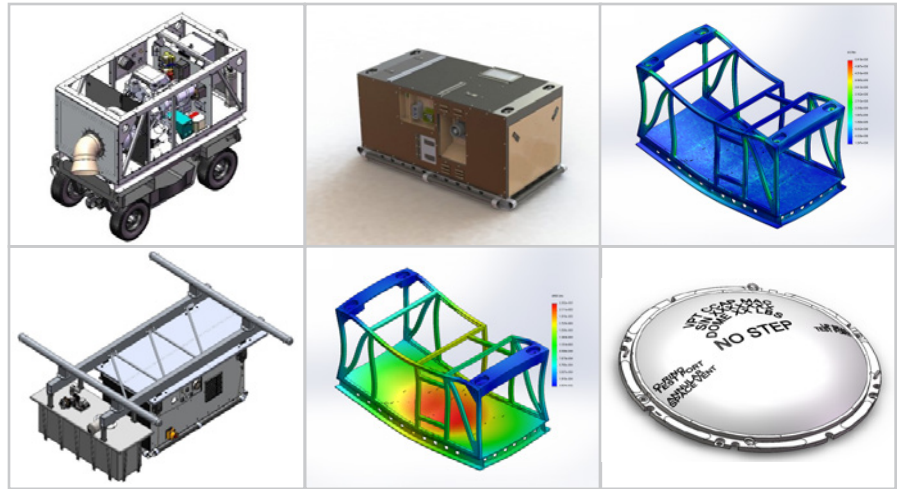
Direct: 757-270-7573

[kcole@epsilonsystems.com](mailto:kcole@epsilonsystems.com)

500 Woodlake Circle Suite E

Chesapeake, VA 23320

Tel: 757-961-4526 Fax: 757-961-6281



## Services

### *Manufacturing Services*

- Build-to-print manufacturing
- Laser etching and marking

### *Engineering Services*

- Finite Element Analysis (FEA)
- Computational Fluid Dynamics (CFD)
- Thermal analysis
- Integrated System Design (electrical and mechanical design from prototype to final product)
  - Validation and verification
  - Critical and final design review
- Engineering test plans
  - Mechanical and electrical test plans
  - Design and development of test fixtures and systems
- SOLIDWORKS models for concept, prototyping, detailed design and manufacturing

### *Technical Drawings IAW ANSI Y14, NAVSEA, and NAVAIR Formats*

- Conceptual level
- Developmental level
- Production level
- Electrical schematics and wiring diagrams