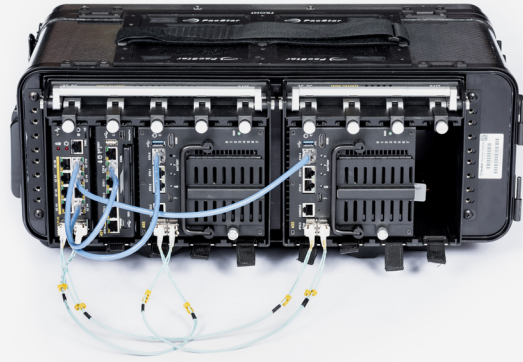




PacStar Modular Data Center

2-Node vSAN™ Cluster

PacStar Modular Data Center (MDC) 2-Node vSAN™ Cluster provides high reliability compute and storage in a small size, weight, and power (SWaP) form factor, ideal for mission-critical applications and large volumes of storage.

PacStar MDC 2-Node vSAN Cluster enables tactical and expeditionary teams to access all of the data and compute resources they need, even in disconnected, intermittent, and limited (DIL) environments where WAN connectivity is not assured.

PacStar MDC 2-Node vSAN Cluster combines compute and data storage resources in a single platform to provide an automated storage solution that minimizes data loss while providing rapid recovery times using VMware vSphere High Availability (HA). PacStar MDC 2-Node vSAN Cluster is a cost-effective platform for running a variety of virtual machine workloads. It also allows for critical applications and services to benefit from shared storage without the added cost and complexity of dedicated storage devices. A 2-Node deployment enables a simple, scalable strategy maximizing application uptime by allowing application maintenance to be scheduled on each host in a series. Additionally, VMware vSphere HA and vSphere Replication facilitate quick recovery from unplanned downtime.

The PacStar 400-Series platform is widely deployed in the U.S. Army and U.S. Marine Corps, having been selected and deployed by the U.S. Army PM TN T2C2, SFAB, and ESB-E programs and the U.S. Marines Networking-on-the-Move (NOTM) program. Additional customization is possible with other PacStar 400-Series modules.

PacStar MDC 2-Node vSAN Cluster is VMware® Ready - Storage certified. See VMware Solution Exchange for more details.

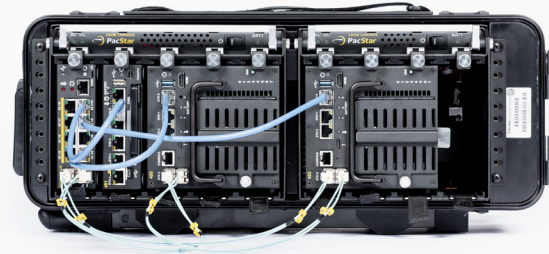
Key Features

- **High-density compute, storage, and networking** capable of handling large loads with industry-leading SWaP reduction
- **Multiple levels of HA available** with VMware vSAN; includes ability to move VM workloads between PacStar 455 ESXi hosts
- **Expandable/modular system** may be customized with added networking or alternative component technologies
- **Based on rugged PacStar 400-Series modules and packages** ideal for fly-away, command post, ground vehicle and aircraft-mounted use cases
- **Managed by PacStar IQ-Core® Network Communications Manager (NCM)**, providing network and server management capabilities for the tactical communicator

Solution Overview

The hardware configuration for PacStar MDC 2-Node vSAN Cluster with 10 GigE Direct Connect includes:

- (2) PacStar 455 ESXi vSAN hosts: Xeon D 1559 12-core CPU, 128 GB RAM, 64 TB of storage, with (2) SFP+ 10 GigE ports
- (1) PacStar 451 ESXi vSAN witness host: Xeon D 1559 12-core CPU, 128GB RAM, with (2) SFP+ 10 GigE ports
- (1) PacStar 444 Switch: (10) Ports Total:
 - (4) RJ45 GigE ports
 - (4) RJ45 GigE ports with PacStar PoE Plus
 - (2) SFP+ 10 GigE ports
- (2) PacStar Smart Chassis: 1x 5 slot, 1x 4 slot
- (1) PacStar TSA-compliant (airline carry-on size) Carbon Fiber Transit Case: 22" x 14" x 9"
- (1) PacStar removable rack-mount bracket, compatible with industry standard 19" equipment racks
- Aggregate resources: 36 Intel CPU Cores, 384 GB RAM, 136 TB SSD storage



PacStar MDC 2-Node vSAN Cluster includes 10 GigE to 10 GigE direct connect between PacStar 455s for maximizing vSAN replication and recovery performance. GigE management network access, GigE production network access, and 10 GigE vMotion data is enabled through PacStar 444 switch. Optional PacStar 448 switch for 10 ports of 10 GigE connectivity.

PacStar 400-Series Modules

Key Features

- Dimensions: 5.3" x 7.1" x 1.6" (each PacStar 455 is 3x wide)
- Weight: ~2.5 lbs. to 6 lbs. (each, depending on model)
- Operational temperature -20C to 60C
- Tested to MIL-STD 810 (contact PacStar for details)
- Wide range DC input, 10-35 V DC
- Worldwide AC power input (with adapter cable)
- Power draw: Nominal 20 watts per module (depending on module type)
- PacStar 444 PoE power output: Up to 60 watts available PoE power



PacStar 444



PacStar 451



PacStar 455

PacStar Modular Data Center