# MGE™ Upsilon™ STS

Redundant power supply and enhanced distribution

30/60/100/160/250/400/630 800/1200 A



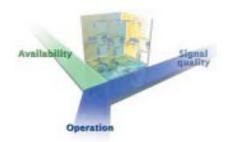


3 phase no transient cross conduction, ultra-fast static transfer switch meets the requirements of Tier IV datacenter architectures, providing distribution redundancy and easy site management.

- > Simplifies installation and maintenance, while minimizing space requirements.
- Independent control boards and dual cooling systems and power supplies ensure high reliability performance.
- Text and mimic diagrams display modes of operation, system parameters and alarms.
- > Allows isolation of a source for maintenance, without interrupting power to the protected loads.
- > Small footprint reduces required floor space.



## **MGE<sup>™</sup> Upsilon<sup>™</sup> STS Features**



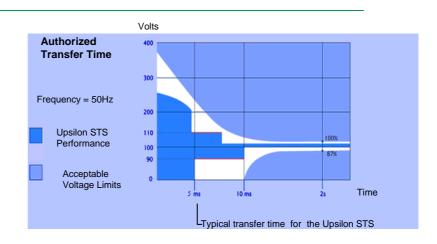
#### High availability of energy: Compliant with data center TIA 942 and TIER IV requirements.

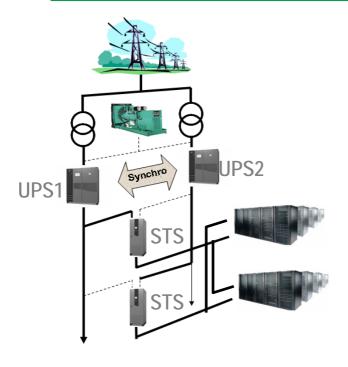
MGE Upsilon™ STS supplies power to a range of equipment from two independent and redundant sources.

Without disconnection, it transfers the supply from a preferred source to a alternate source, in either automatic or manual mode.

## 'Zero-disconnection' transfer

The MGE Upsilon™ STS uses "no transient cross conduction" technology. This 'non-overlap' principle ensures that the sources are not placed in parallel at the moment of transfer, thus eliminating the risk of a fault being propagated between the sources. The performance characteristics of the MGE Upsilon™ STS guarantee a typical transfer within 5 ms, well within the time recommended in the Information Technology Industry Council (STS international Standard CEI 62310-3) Guide.





### Redundancy of distribution and segmentation of loads

MGE Upsilon™ STS facilitates the design of "very high availability" architectures by extending power distribution system redundancy closer to the protected items of equipment. This inherently creates small clusters of loads, simplifying management of the power infrastructure.



## **MGE<sup>™</sup> Upsilon<sup>™</sup> STS Features**

#### **Ease of operation**

- > LCD Multilanguage graphics display for rapid acquisition of measurements and straightforward access to static transfer switch settings.
- > Animated mimic diagram on the front panel for immediate viewing of the energy flows and states
- > Specific Bypass Procedure diagram.
- > Dedicated terminals provided to facilitate load bank testing.
- > Jbus/ModBus Serial interface card provides a PC interface , a relay communication card delivers configurable remote monitoring capability, and an optional XML web card enables Ethernet connectivity
- ➤ Optional STS network management card (NMC) provides SNMP and ISX Central Interface Compatibility. This allows users to monitor Upsilon STS and all ISX compatible components through a common user friendly interface





### Increased safety and Maintainability

MGE Upsilon™ STS can be used to isolate a line which has been scheduled for maintenance, without interrupting the power supply to the protected load. Safety and security features include bypass switches with mechanical interlocks, key lockable load disconnect switches, and password enabled manual transfers

#### **Compact size**

The compact "footprint" of the MGE Upsilon™ STS allows for maximum utilization of available space. Integrating an optional built in PDU Module into the upper section of the STS cabinet, compete with its 36 distribution circuit-breakers, makes Upsilon™ STS the ideal high density solution for bringing redundant power sources closer to critical loads.





### **Technical characteristics**

#### **Principal functions**

- ▶ Selects the best of 2 sources, based on the continuous monitoring of 11 parameters
- Automatic or manual transfer and return without disconnection.
- ▶ 'rolling synch.' function for back-up transfer of unsynchronised sources,
- ▶ Built-in sub-system redundancy within the device (power supply, control, and ventilation),
- Isolation switches for maintenance purposes,
- ▶ 4 slots to accommodate communication cards (2 of which are included: JBus/ModBus card, status information card).

#### **Available options**

- ▶ Connection at the top of the unit
- ▶ ISX Central, SNMP, and TCP/IP compatible Network Management Card (NMC)
- ▶ Additional Jbus/ModBus/ or current loop
- ▶ PDU distribution unit (36 16 A circuit breakers incorporated in the H = 1900 cell, up to 100 A),
- ▶ Open frame version.

Capacities (A)	30	60	100	160	250	400	630	800	1200	
Source Inputs										
Nominal voltages	380 V (-35%) - 400 V – 415 V (+20%)									
Nominal frequency	50 Hz or 60 Hz (+/- 10%)									
Number of phases	3-Phase (3 + N + E or 3-phase + E)									
Operation										
Permissible overloads	110% 15 minutes,150% 2minutes ,600% 20s							Contact us for details		
Efficiency (linear load & PF=0.8)	0.99							Contact us for details		
Transfer time	5 ms (typical)							Contact us for details		
Environment										
Operation	0°C to 40 °C									
Storage temperature	-20°C and +40°C									
Noise level	< 60 dB									
Technical standards										
Construction and safety	IEC 60950 ,GR-63-CORE									
EMC	IEC 61000-6-4 , IEC 61000-6-2 ,EN55011									
Certifications	TÜV , CE									
Dimensions and weights										
Height x Width (mm)	1430 x 610 or 1900 x 715					1900 x 715 Co		Contact	Contact us for details	
Depth H=1400 (mm)	550						- Cont		us for details	
Depth H=1900 (mm)	825				825		Contact us for details			
Weight (kg) for H=1400 mm		193			211	-		Contact us for details		
Weight (kg) for H=1900 mm		215			225	3	27	Contact	us for details	

<sup>1:</sup> Depending on the country, visit www.APC.com.

<sup>1:</sup> except 800 - 1200A: 150% 1 min.

















