

VELA 60



VELA UPS stands out for its durability, dependability, and efficiency as a power backup solution. Designed to safeguard critical loads, it leverages advanced SCR-IGBT technology to deliver superior power Conversion efficiency and exceptional input protection against grid-related issues such as spikes, fluctuations, and disturbances, making it an ideal choice for demanding and sensitive environments.

100% made in Italy

The **Vela UPS** series by Powertronix is a robust and reliable power backup solution tailored for critical environments. It integrates advanced SCR-IGBT technology to deliver high power conversion efficiency while providing resilience against input anomalies like spikes, voltage fluctuations, and grid disturbances.

VELA UPS is equipped with a 6-pulse rectifier (upgradable to 12) with a harmonic filter for stable input.

Its transformerless IGBT inverter ensures high efficiency, and it supports three-phase setups with generator compatibility.

TYPICAL APPLICATION:

- Offices & IT;
- Telecommunications;
- Servers/ Datacenter;
- Medical/ Hospitals;
- Broadcasting;
- Access & Presence

SPECIAL APPLICATION:

- EN 50171
- Critical electrical environments

VFI-SS-111

3-3

60kVA

UPS MODEL	VELA 60
UPS NOMINAL RATING	60kVA
UPS ACTIVE POWER	54kW
UPS PART NUMBER	VL60-000

FRONT VIEW



- A FRONT ACCESS DOOR***
- B FRONT DISPLAY***
- C EPO BUTTON***
- 1 CABLE ENTRY**
- 2 BATTERY CONNECTION**
- 3 INPUT SWITCH**
- 4 INPUT RESERVE SWITCH**
- 5 MANUAL BYPASS**
- 6 OUTPUT SWITCH**
- 7 MAINTENANCE AND CONTROL ACCESS PANEL**
- 8 RS-232***
- 9 SMART SLOT***

* Accessible from the front
** Accessible from the Back

General:

UPS TOPOLOGY	VFI On-Line, double conversion, with pure sine-wave output
CONVERTER/INVERTER	SCR based PFC ,IGBT-based INV, high frequency, TRAFOLESS
STATIC SWITCH	Electronic + Contactors
COOLING SYSTEM	Air Cooled with sturdy redundant centrifugal fans

Input:

INPUT NOMINAL VOLTAGE	3P+N 380/400/415VAC
INPUT VOLTAGE TOLERANCE	340÷460VAC 100% load - Factory setting $\pm 10\%$ nominal voltage
INPUT NOMINAL FREQUENCY	50/60Hz
INPUT FREQUENCY TOLERANCE	40 ÷ 70 Hz
INPUT POWER FACTOR	0.99
MAX ABSORBED CURRENT	3PH+N @ 400V 108A
INPUT THDI	For VL xxx-000 < 20% // w/+D option < 10% //w/+DF option < 5%

Output:

OUTPUT NOMINAL VOLTAGE	3P+N 380/400/415VAC
OUTPUT POWER FACTOR	0.9
OUTPUT THDV	< 3% with linear load & < 6% with non linear load
OVERLOAD	125% for 10 minutes - 150% for 10 seconds
OUTPUT NOMINAL FREQUENCY	50/60Hz $\pm 0.1\%$ stability
SOFT START	Available , 30 Seconds (factory selectable)

Bypass:

BYPASS NOMINAL V&F*	3P+N 380/400/415VAC 50/60Hz
BYPASS VOLTAGE TOLERANCE	$\pm 20\%$ - Factory setting $\pm 10\%$
BYPASS ACCEPTED OVERLOAD	150% 30 min - 1000% 100ms
MANUAL BYPASS	Available, with mechanical security

Battery:

BATTERY CONFIGURATION	384VDC -EXTERNAL ONLY
BATTERY CHARGING I&V*	Factory setting 0.1C / 13,5VDC/block charging current selectable up to 25A
BATTERY COMPATIBILITY	VRLA-AGM / VRLA-GEL / NiCd / Lithium / Others
BATTERY MANAGEMENT	Auto Test/ Equalization / Smart-battery management/ Optional: temperature compensation w/ external sensor

Environment:

DIMENSION	1230x350x950(h)mm - metal case - IP20 - complete with castors
WEIGHT (W/O Battery)	STD version 190Kg +D version 310Kg +DF version 345Kg
TEMPERATURE & RH%	0÷40°C – RH% up to 95% non-condensing - 1.000m asl 1% derating every +100Mt up to 2000 asl
EXT INTERFACE	Standard: RS-232/RS485 + dry contacts +LED Status Display Optional: MODBUS / SNMP via external card; Remote panel

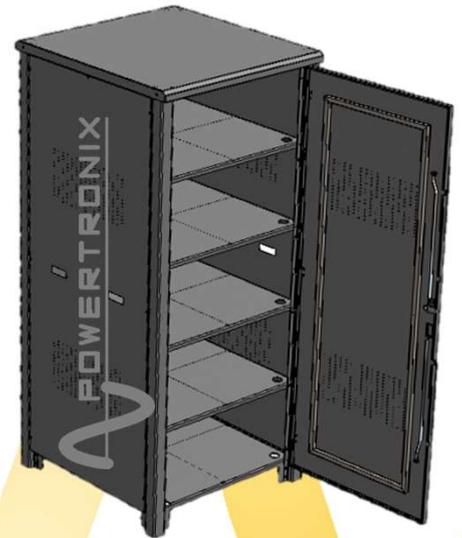
Others:

EUROPEAN DIRECTIVES	LV 2014/35/EU Low Voltage Directive EMC 2014/30/EU Electromagnetic Compatibility Directive / CE marks
STANDARDS	Safety IEC EN 62040-1;IEC EN 62040-2 EMC;RoHS Compliance; IEC EN 62040-3 (Voltage and Frequency Independent)VFI-SS-111

➤ + BATTERY CABINET

The EN32-XXX battery cabinets by Powertronix are expertly designed to accommodate up to 32 battery blocks in a highly efficient and functional structure, maximizing space optimization while ensuring ease of access and superior functionality. The aesthetics of the EN32-XXX battery cabinets are delivering a **practical, solid and visually appealing solution.**

MODEL	DIMENSIONS	WEIGHT	CAPACITY
ENV6168140	610x680xh1400	160Kg	Up to 32x60Ah or 40x40Ah
ENV8198140	810x880xh1400	200Kg	Up to 32x120Ah or 40x80Ah
ENV8189190	810x980xh1900	280Kg	Up to 32x150Ah or 40x140Ah



Customization is a core value of Powertronix's customer-focused approach. Alternative layouts and cabinet configurations can be tailored to meet specific space requirements and autonomy demands, ensuring maximum flexibility in both design and size.

➤ + SNMP/TCP-IP

The VELA series offers the possibility to integrate the UPS into your **Local Area Network**, enabling remote monitoring and control of the UPS status. The **0X-MGTBX506/4 SNMP** card provides full control over thresholds, allowing **alarms to be triggered and notifications to be sent via email** to the entire team or selected personnel.

The freeware ViewPowerPro gives customers free access to a simple yet comprehensive monitoring tool



➤ + RELAY CARD

The VELA series **comes standard with CS0118 cards.** Powertronix's exclusive CS0118 card design **ensures full integration** of the VELA series into your **Building Management System (BMS)** via RS232 com-protocols.

It supports five simultaneous active connections:

- Potential-free contacts (NO/NC)
- RS232 port with DB9 connector
- rEPO (Remote Emergency Power Off)



➤ + VELA ADDITIONAL OPTIONS

VL-XX-D	12 Pulse Input Option VELA 60 for (reduced input THDi value <10%)	OSDE1127	VELA parallel capability - Optical fiber connection for Ups's parallel connection (one per unit)
OSDE1168	Additional Input Filter for VELA (reduced input THDi value <5%) applicable only to 12 pulse input systems	OSDE1184	60KVA built in backfeed protection

POWERTRONIX
Secure Power
Innovation That Saves