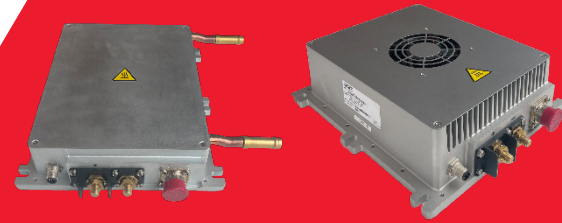


# HVC Series

## 3kW DC-DC



## Product Overview

400S12.3KOHVC is a series of 3 kW auxiliary power modules that provide high performance under extreme conditions. The 400S12.3KOHVC accepts input voltage from 230Vdc to 420Vdc and provides a single-isolated 12Vdc output for powering auxiliary equipment. The fully isolated low voltage supports positive or negative output polarity and associated grounding configurations.

HVC series are available in air-cooled or liquid-cooled rugged, fully IP rated, vibration resistant, thermally optimized enclosures. Threaded through holes to allow easy mounting or for the addition of a heatsink for extended temperature operation for further flexibility. The power module latches off upon detection of the OVP condition. To clear the latch and resume operation requires the input source to be recycled.

## Features

- Wide 230-420 VDC High Side Voltage Input
- Supports 12Vdc battery configurations
- Efficiency >94%
- Liquid-cooled and Air-cooled configurations
- IP6K9K Ingress protection
- Excellent shock and vibration damping
- High-power density
- Fully protected and recoverable from Over-Current, Short Circuit and Over-Temperature faults
- Highly reliable
- SAE J1939 Protocol via CAN Bus interface (contact Calnex for latest message support)
- Dual CAN bus digital interface

## Input Characteristics

Parameter	Min.	Typ.	Max.	Units
Voltage Range	230		420	Vdc
Turn-on Threshold	220		230	
Turn-off Voltage	210		220	
Overvoltage Protection	421		437	
Input Current		14.2		Adc
Peak Inrush Current		20	50	
Efficiency		94		%

## Output Characteristics

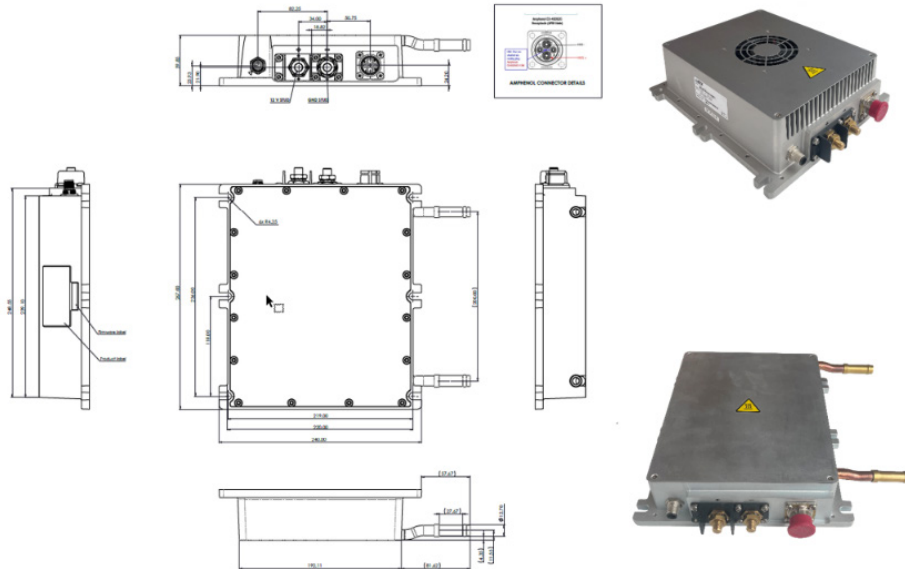
Parameter	Min.	Typ.	Max.	Units
Voltage Range	9	12	16	Vdc
Output Ripple & Noise			±120	mV p-p
Output Current Range	3		250	Adc
Ove Current Protection	251		300	
Overvoltage Protection	16		19	Vdc
Stand-by Leakage Current		1.3		mA
Efficiency		94		%

## ORDERING GUIDE

Model	Input Voltage	Output Voltage	Output Current	Max. Output
400S12.3KOHVC-A (air-cooled)	230-420	9-16VDC	250A	3KW
400S12.3KOHVC-L (liquid-cooled)				

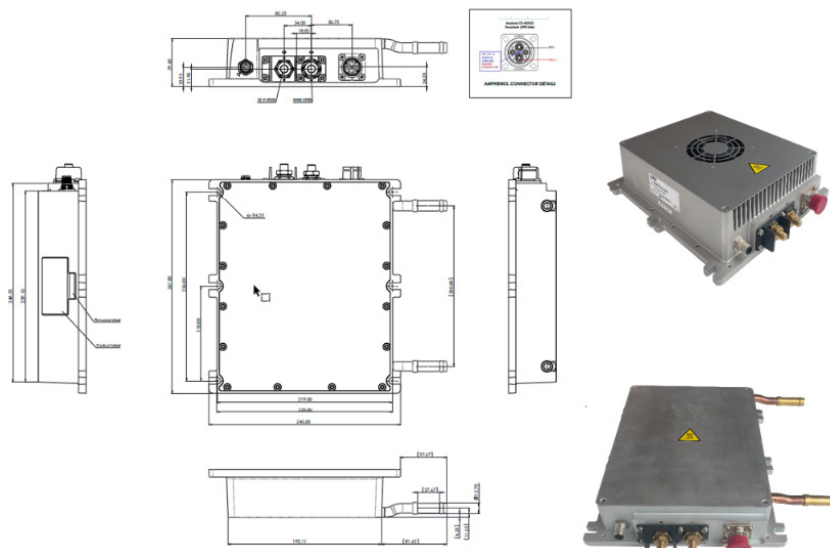
## Mechanical Specifications

### Air-Cooled Model: 400S12.3K0HVC-A



**NOTE:** (X.X) are dimensions for reference only.

### Liquid-Cooled Model: 400S12.3K0HVC-L



#### Notes:

1. (X.X) are dimensions for reference only.
2. Suggested torque for M10 nuts at 60 in.-lbs.
3. 400S12.3K0HVC is supplied with jumper harness part # 10123714 attached to the low voltage signal connector of the unit.