# SVAC3-Q-E220

Q Programmable Servo Drive w/ Ethernet

1pc. - 726.00 50pc. - 544.50



#### **Product Features**

- Programmable digital servo drive in a compact package
- DSP-based current control
- Operates from 220 VAC
- Provides motor current up to 1.8 A rms continuous, 3.75 A rms peak
- Fast 10/100 Ethernet for programming and communications
- 744 lines of stored Q program capability
- Math calculations using analog and digital parameters
- Supports all SVAC3-S control modes as well
- UDP & TCP support
- 12 digital inputs, 6 digital outputs, all optically isolated
- 1 analog input, +/-10 volt range
- Jerk filter for S-curve acceleration ramps



#### Description

The SVAC3-Q-E220 is a compact and cost-effective servo drive that is compatible with a variety of servo motors and a great choice for many OEM applications. Its all-digital design and DSP-based current control allow for smooth motion and a quick response from the specially matched set of Applied Motion motors available with it. Power to the drive comes from single-phase 220 VAC and the drive can output up to 1.8 A rms continuous, 3.75 A rms peak to the servo motor. The drive also has built-in protection features like over-voltage, over-temperature, and over-current, which prevent damage to the drive while running in adverse conditions.

The SVAC3-Q-E220 can operate in all of the same control modes as a SVAC3-S drive (analog torque/velocity, pulse & direction, streaming commands), plus it has the ability to run stand-alone Q programs stored in non-volatile memory. Q programs are created using the *Q Programmer™* software, and provide multi-tasking, math functions, conditional processing, data register manipulation, and more features in a robust yet simple text-based programming language. Initial setup of the drive, including selecting the control mode, tuning the servo motor and configuring the drive is done with the *Quick Tuner™* software.

For connecting to external devices such as limit switches, proximity or photoelectric sensors, PLC I/O, lamps, and other devices, the drive comes with 12 digital inputs, 6 digital outputs, and 1 analog input. The drive also features an Ethernet port for configuration and communications. The Ethernet port is fast 10/100 Mbit, and the drive supports both TCP and UDP communication protocols.

This servo motor drive is UL Recognized (File No. E332730), CE approved, and RoHS compliant.

## Specifications

Model Number:	SVAC3-Q-E220
Part Number:	5000-225
Supply Voltage:	108-242 VAC
Supply Voltage Type:	AC
<b>Control Modes:</b>	Streaming Commands Analog Positioning Encoder Following Q Programming
Output Current, Continuous:	1.8
Output Current, Peak:	3.75
Communication Ports:	Ethernet
Feedback:	Halls + Incremental encoder
Setup Method:	Software setup
Digital Inputs:	12
Digital Outputs:	6
Analog Inputs:	1 single-ended
Dimensions:	5.5 x 4.5 x 2.0 inches
Weight:	22.4 oz
Operating Temperature Range:	0 to 70 °C
Ambient Temperature Range:	0 to 55 °C
Ambient Humidity:	90% max, non-condensing
Status LEDs:	1 red, 1 green
Circuit Protection:	Short circuit Over-voltage Under-voltage Over-temp

#### Software

Software: ARM Firmware Downloader

**DSP Firmware Downloader** 

Q Programmer™ Quick Tuner™ SCL Utility

NB6\_UDP\_example.zip

WB6\_TCP\_example.zip

#### Downloads

Manuals: 

SVAC3 Hardware Manual 920-0028.pdf

SVAC3 QuickSetupGuide 920-0052.pdf

Host Command Reference Rev I.pdf

**■** eSCL Comm Reference.pdf

Datasheet: <a href="http://s3.amazonaws.com/applied-motion-pdf/SVAC3-Q-E220.pdf">http://s3.amazonaws.com/applied-motion-pdf/SVAC3-Q-E220.pdf</a>

Family Datasheet: Servo-Products-Datasheet-925-0008.pdf

**2D Drawing:** SVAC3.pdf

**3D Drawing:** SVAC3.igs

Speed-Torque Curves: 

SVAC3 speed-torque.pdf

Agency Approvals: 

STAC5 SVAC3 CE DOC.PDF

· / 11

Application Notes: APPN0026B-LabVIEW-communication-using-streaming-commands.zip

APPN0020-Maple-Systems-with-Ethernet-Drive.zip

APPN0019\_Analog-positioning-using-Q-program.zip

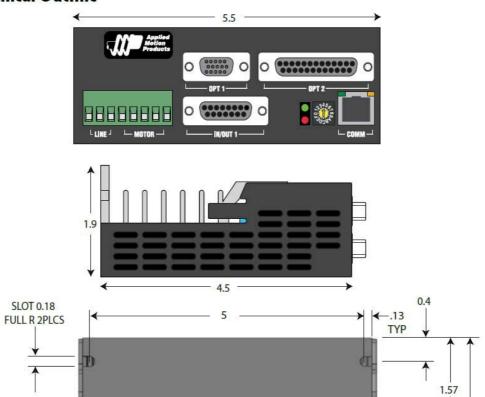
APPN0016\_Simple-25-pin-mating-connections.pdf

### **Pricing**

	<b>SVAC3-Q-E220</b> Part No. 5000-225
1pc.	\$726.00
25рс.	\$624.36
50pc.	\$544.50
100pc.	Request a Quote for 100+ piece pricing.

## 2D Drawings

### **Mechanical Outline**



1.90