Low Cost PoE module for the Powered Device (PD)

• Cost optimised IEEE802.3af POE
• Small SIL package & SMT option
  SIL-56mm(L)x18mm(W)x14mm(H)
  SMT-32mm(L)x24mm(W)x18mm(H)
• Industrial temperature option (FL)
• Overload & short-circuit protection
• Wide input voltage range
• 3V, 5V or 12V output options
  (24V in FL range only)
• 1500V isolation (input to output)
• Integral DC/DC converter
• Simple integration

Silvertel’s Ag9700 series cost reduced PD modules are designed to extract power from a conventional twisted pair Category 5 Ethernet cable. These modules conform to the 802.3af Power-over-Ethernet (PoE) standard. This total solution includes 1.5kV isolation, PoE signature and integral DC to DC converter. Class programming is available with FL option, the standard unit provides a Class 0 signature.

The modules provide a simple PoE solution using minimal extra low cost components. Ag9700 accepts power from either the spare or data pair of the Ethernet cable, enabling the device to be powered from mid- or end-span PSE. The integrated optimised DC/DC converter operates over a wide input voltage range providing a high efficiency (up to 87%) regulated output. In addition it provides built-in protection against overloads and short-circuits. There are three nominal output voltage options; 3V, 5V and 12V. These are easily adjustable using a simple pull up/down resistor.

The Ag9700 has optional onboard diode bridges (SIL version only) and provides signature and control circuitry to give full PoE compatibility. A signature is needed by the Power Sourcing Equipment (PSE) before it will provide power to the port.

A special industrial temperature version in SIL package (Ag9700-FL) is available with an operating range of -40°C to +85°C and additional 24V output option.

Ag9700 is an ideal cost effective solution for POE for any high volume applications e.g. IP cameras, VoIP telephones, WAPs and door access.