

# sip SNMP/vIQ



## INTRODUCTION

The SIP SNMP/vIQ interface is one of a range of innovative Trend interface products available for various applications and protocols. They have been developed to help reduce engineering time and cost, and to meet the demand for more information and better energy control.

These products, used in conjunction with a Trend BMS, can help ensure a building complies with latest Part L2 Building regulations.

## SPECIFICATION

### Features

SNMP v1 and SNMP v2c  
Communications failure  
Hostname  
DHCP  
Read Only - Counter, Gauge, Integer and String

### SNMP

Max. 40 points per agent including optional communication failure point  
Any agent can be added more than once, but each addition will account for another device

### vIQ

Trend compatible Sensor, Digital Input, Knob, and Switch modules  
Max. 1000 Calculations per unit, e.g. energy usage  
Max. 1024 plots per unit @ 1000 values per plot

### Dimensions

78W (exc. brackets) x 108H x 32D mm  
102W (inc. brackets) x 108H x 32D mm  
330g per unit including DIN Rail clips  
410g shipped including DIN Rail clips

### Default Setup Parameters

IP address - 192.168.1.63 (255.255.255.0)

### Power Input

24VDC ±15V regulated

### Power Consumption

300mA @24VDC

### Storage Temperature

0 to 70°C (32 to 158°F), 0 to 70% Relative Humidity

### Operating Temperature

0 to 70°C (32 to 158°F), 0 to 90% Relative Humidity

### Connection Type

1 x 10/100Mbps for TCP/IP network

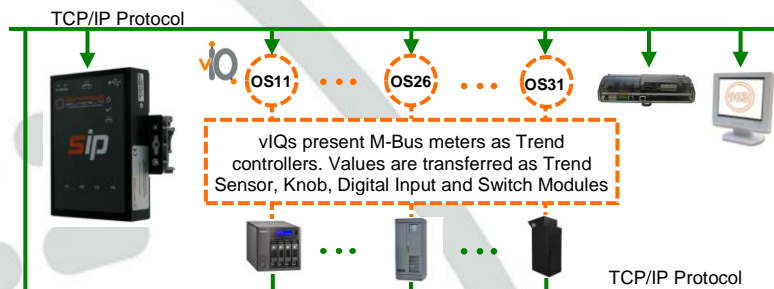
## APPLICATION

The SIP SNMP/vIQ product range interfaces 3<sup>rd</sup> party SNMP (Simple Network Management Protocol) agents, e.g. DC Supply units, UPS units, CRAC units and Alarm monitoring units in Data Centres, and a Trend B(e)MS (Building (energy) Management System).

## DESIGN AND FUNCTION

The product displays information recorded by SNMP devices communicating via SNMP protocol. It exploits their data capability, by retrieving, logging ('Map points' page) and presenting ('vIQ' page) selected types of data, e.g. memTotalFree, CPU-Temperature, or SystemFreeMem, in real time. This information can alert Data Centre managers when parameter move towards or reach critical control limits. It can be used to

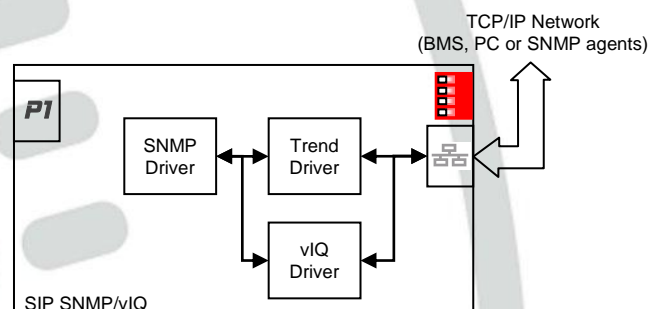
- manage network performance, ensuring the optimum balance between condition, energy usage and operating requirements.
- detect network problems, ensuring a loss of efficiency and economy is kept to a minimum.



Each SIP includes vIQ (Virtual IQ) software that allows

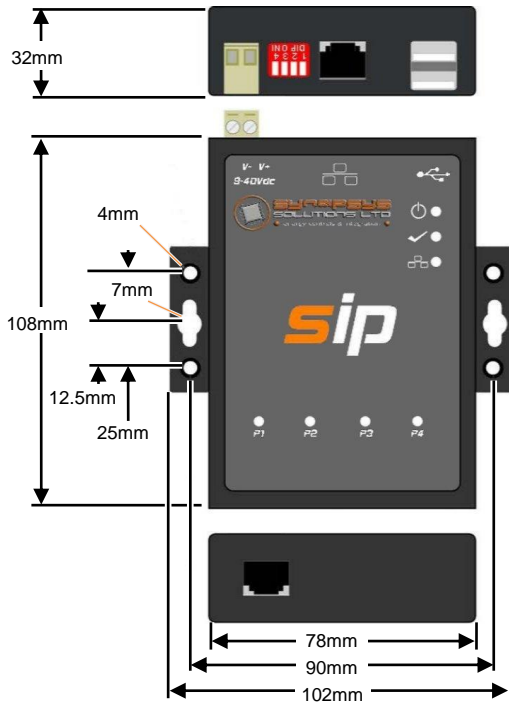
- it to connect to a Trend IQ3 network,
- the SNMP agents to appear as Trend controllers,
- it to display information that appears in the Trend BMS,
- it to monitor standard or IP alarm conditions.

## SIMPLIFIED BLOCK DIAGRAM



Note

Refer to Installation Guide for wiring details.



## INSTALLATION

Din rail mounting (TS35) using DIN rail clips provided or direct enclosure mounting using the brackets attached.

**Note** Contact the SNMP Agent manufacturer for cable recommendations.

## CONFIGURATION

Specifically designed web pages support

- Local IP communications configuration
- SNMP communication options
- MIB file and point management
- Agent (Host) and point mapping configuration
- vIQ out-station, module and security configuration
- vIQ calculation configuration

## REGULATIONS

Designed and manufactured to comply with CE Class A, FCC Class A, WEEE (Waste Electrical and Electronic Equipment) and RoHS (Restriction of Hazardous Substances) regulations.

It also complies with the Council Directive on the Approximation of the Laws of the Member States relating to Electromagnetic Compatibility (89/336/EEC). For the evaluation regarding the electromagnetic compatibility, the following standards were applied

- EN55022:1998/A1:2000+A2:2003 (class A)
- EN61000-3-2:2000
- EN61000-3-3:1995/A1:2001
- EN55024:1998/A1:2001+A2:2003
- IEC61000-4-2:1995+A1:1998+A2:2000
- IEC61000-4-3:1995+A2:2002
- IEC61 000-4-4:1995+A1:2000+A2:2001
- IEC61000-4-5:1995+A1:2000
- IEC61000-4-6:1996+A1:2000
- IEC61 000-4-8:1993+A1:2000
- IEC61000-4-11:1994+A1:2000

## PRODUCT CODES

ORDER CODE	DESCRIPTION
SIP/SNMP/P/1VIQ	Up to 100 points from multiple agents (mapped to 1 vIQ and any combination of sensors, digital inputs, knobs and switches) shown on Trend network.
SIP/SNMP/D/4VIQ	Up to 40 points from 4, 8, 16, 24 or 32 agents (mapped 1 agent per vIQ and any combination of sensors, digital inputs, knobs and switches) shown on Trend network.
SIP/SNMP/D/8VIQ	
SIP/SNMP/D/16VIQ	
SIP/SNMP/D/24VIQ	
SIP/SNMP/D/32VIQ	
SIP/SNMP/BS/VIQ	Customer defined number of points and agents (mapped as required using any combination of sensors, digital inputs, knobs and switches) shown on Trend network.
PS/24VDC/1A	24v DC Power Supply

With a comprehensive range of interface products for ModBus, M-Bus and SNMP protocols we can help you easily interface meters, sub-meters and plant to BeMS systems with energy management and monitoring functionality, and virtual metering.

**Download brochures and datasheets from our website. Alternatively, contact us for more information or to request a quote.**

