

DIFFERENTIAL PRESSURE FLOW METER

CAE520 COMPRESSED AIR NETWORK AUDITING SYSTEM

Flow Measurement
& Monitoring



DESCRIPTION

CAE520 Compressed air network auditing system offers efficient and convenient measurement and monitoring of compressor and compressed network energy. The standard system includes a PTF520 pitot tube flow meter which support hot tap installation and a IoT data logger that transmits the data to corresponding cloud server via 4G wireless network. Users can access and monitor the data anywhere and at anytime, on an Internet enabled device.

After hardwares are installed and powered, users can log in to the COMATE compressor monitoring system website to review real time and historical data. Measurement data are stored and reports can be generated remotely, without the site visits.

(Optional parts include KW110M IoT power meter for power consumption measurement, hot tap drilling tool for installations, and clamp on socket for installations without welding.)

FEATURES

- ✓ Compressed air network auditing system
- ✓ Remote monitoring and reporting
- ✓ View real time data via COMATE compressor monitoring system website or Andoid APP (for tablet)
- ✓ System includes:
 - PTF520 Pitot Tube Flow Meter
 - IoT data logger
 - KW110M IoT power meter (optional)
 - Drilling tool (optional)
 - Clamp on socket (optional)
 - Cables
 - Case

TECHNICAL FEATURES

System power supply	AC 220V +/-5%; AC/DC 85 to 265V; AC 380V ±5%
Ambient temperature	-40 to 80°C
Monitoring method	COMATE compressor monitoring system website; or Android APP (for tablet)
Power meter	
Wiring	3 phase 3-wire or 3 phase 4-wires
Voltage measurement range	2nd grade voltage test AC 0 to 400V
Voltage accuracy	0.20%
Current measurement range	2nd grade 0~5A (transformer ratio 500:5)
Current accuracy	0.20%
Power efficiency range	Up to 250KW
Power efficiency accuracy	0.50%
Pipe size for flow meter	DN25 to DN300
Range & accuracy	1.5% of reading+ 0.3% of full scale

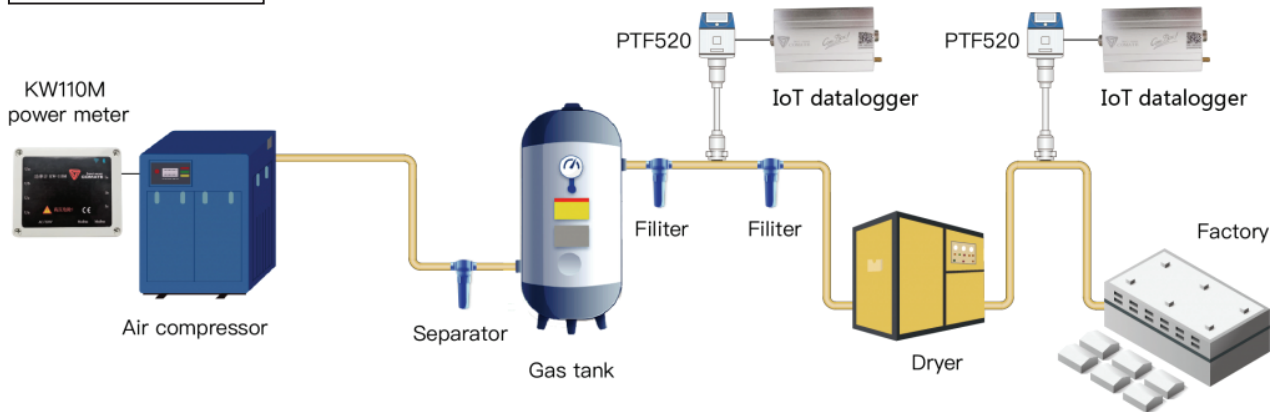
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WORKING METHOD



SAMPLE REPORTS



*Compressor Air System*Report

Print Time: 2020-12-30

Instrument Info

Name:	PTS	Instrument ID:	PTS-2048221
Model:	PTS	Description:	

Running Analysis

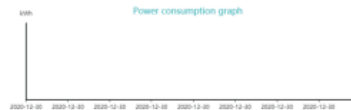
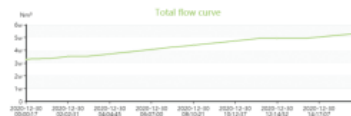
Running Period:	2020-12-30 00:00:17 ~ 2020-12-30 15:59:58		
Total flow in searched time:	28115.46 Nm ³	Power consumption in selected section:	--
Power consumption per unit of air ¹ :	-- kWh/Nm ³		
Power off Times:	--	Duration of power failure:	--
Max flow rate:	146.51 Nm ³ /min	Min flow rate:	0 Nm ³ /min
Avg flow rate:	28.8546 Nm ³ /min	Min press:	0.46 Mpa
Max press:	0.64 Mpa	Min press:	0.46 Mpa

Monthly

Month	Total flow	Total power consumption	Power consumption per unit of air ¹
2020-12-30	28115.46 Nm ³	--	--/Nm ³

2020-12-30 00:00:17 ~ 2020-12-30 15:59:58

Running curve display



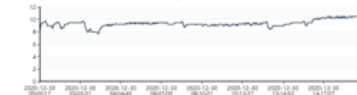
Flow rate against power efficiency graph



Pressure against Power efficiency graph



Temperature curve



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