

DESCRIPTION

The pipe::scan is a sensor system for monitoring drinking water quality in pipes that are under pressure. It measures up to 10 parameters in one device:

- TOC
- DOC
- UV254
- Turbidity
- Color
- UVT
- Chlorine
- pH/Redox
- Conductivity
- Temperature and pressure

The water quality data can be sent to any central database via almost any protocol. Multiple pipe::scans are the ideal solution to monitor drinking water at any point in the network.

FEATURES

- Multiparameter spectrophotometer probe
- Enclosure for additional sensor and operator security
- One chlori::lyser and two additional sensors (condu::lyser, pH::lyser or redo::lyser) can be installed
- Two inch pipe saddle for hot tap installation that is available for pipes from DN80 to DN600
- Nano pump for water flow even during periods of stagnation
- Optional Autobrush provides automatic brush cleaning for i::scan



PIPE::SCAN VERSIONS

Part Number	Article Name
P-450-PS-SET-024-DW	pipe::scan base unit: flow cell including adapter plate, nano pump, insertion nozzle, vent valve, enclosure, pipe::scan cable hub includes 10 m connection cable to con::cube, pressure sensor con::cube V3 24V incl. D-303-LX, S-08-MONI, S-11-BASIC-PLC, D-315-IN-MA with drinking water certificate
P-450-PS-SET-230-DW	pipe::scan base unit: flow cell including adapter plate, nano pump, insertion nozzle, vent valve, enclosure, pipe::scan cable hub includes 10 m connection cable to con::cube, pressure sensor con::cube V3 230V incl. D-303-LX, S-08-MONI, S-11-BASIC-PLC, D-315-IN-MA with drinking water certificate
P-450-PS-SET-012-DW	pipe::scan base unit: flow cell including adapter plate, nano pump, insertion nozzle, vent valve, enclosure, pipe::scan cable hub includes 10 m connection cable to con::line, pressure sensor con::line 12V incl. S-500-08-IO with drinking water certificate
Y01-1-D-000-DW	FTU/NTU with i::scan (includes Autobrush for pipe::scan)
Y02-1-D-000-DW	FTU/NTU + COLOR with i::scan (includes Autobrush for pipe::scan)
Y04-2-D-000-DW	FTU/NTU + COLOR + UV245 with i::scan (includes Autobrush for pipe::scan)
Y06-2-D-000-DW	FTU/NTU + COLOR + UV245 + TOC with i::scan (includes Autobrush for pipe::scan)
Y03-2-D-000-DW	FTU/NTU + UV245 with i::scan (includes Autobrush for pipe::scan)
Y05-3-D-000-DW	FTU/NTU + UV245 + TOC with i::scan (includes Autobrush for pipe::scan)
E-520-1-S-000	Free chlorine sensor, 0–2 mg/l, pressure resistant
E-525-1-S-000	Total chlorine sensor, 0–2 mg/l, pressure resistant
E-514-2-000-DW	pH sensor, pressure resistant
E-513-2-000-DW	ORP sensor, pressure resistant
E-511-2-000-DW	Conductivity sensor, pressure resistant

TECHNICAL SPECIFICATIONS

Measuring Interval	1 min (minimal)	Operating Pressure	1–10 bar
Precalibrated Ex Works	All parameters	Installation / Mounting	On 2 in. Hawle pipe saddle (order separately)
Integration Via	con::line	Other Operating Limits	Pipeline must be vented Installation must be on top of pipe No direct sunlight
Power Supply	Via con::line or con::cube	pH Range	4–12
Power Consumption (Typical)	14 W	pH Range Free Chlorine	4–9
Power Consumption (Max.)	35 W	Automatic Cleaning	Autobrush (for i::scan)
Wetted Materials	POM Stainless steel Fine brass EN 12165 & EN 12164 EPDM	Storage Temperature	0 to 45 °C
Dimensions (W × H × D)	220 × 475 × 340 mm	Conformity - EMC	EN 61326-1
Weight (Min.)	Approx. 8 kg	Conformity - Safety	EN 61010-1 RoHS
Operating Temperature	0 to 40 °C	Drinking Water Safety Certificate	ACS (Attestation de Conformité Sanitaire) NSF/ANSI/CAN 61 & 375
Storage Humidity	0–95%	Protection Class (-000)	IP67

PARAMETERS

i::scan

		Parameter								Part Number
		Turbidity [FTU/ NTU]	Color (app) [Hazen]	Color (tru) [Hazen]	TOC [mg/l]	DOC [mg/l]	UV254 [Abs/m]	UV254 f [Abs/m]	UVT10 [%]	
i::scan FTU/NTU	min.	0	—	—	—	—	—	—	—	Y01-1-D-000-DW
	max.	800	—	—	—	—	—	—	—	
i::scan FTU/NTU+Color	min.	0	0	0	—	—	—	—	—	Y02-1-D-000-DW
	max.	800	500	500	—	—	—	—	—	
i::scan FTU/NTU+UV254	min.	0	—	—	—	—	0	0	25	Y03-2-D-000-DW
	max.	800	—	—	—	—	70	70	100	
i::scan FTU/ NTU+UV245+Color	min.	0	0	0	—	—	0	0	—	Y04-2-D-000-DW
	max.	800	500	500	—	—	70	70	—	
i::scan FTU/NTU+TOC_ eq+UV254	min.	0	—	—	0	0	0	—	—	Y05-3-D-000-DW
	max.	800	—	—	25	25	70	—	—	
i::scan FTU/NTU+TOC_ eq+UV254+Color	min.	0	0	0	0	0	0	—	—	Y06-3-D-000-DW
	max.	800	500	500	25	25	70	—	—	

chlori::lyser (Stainless Steel)

		Parameter			Part Number
		Free Chlorine [mg/l]	Total Chlorine [mg/l]	Temperature [°C]	
chlori::lyser (FCI)	min.	0	—	0	E-520-1-S-000
	max.	2	—	40	
chlori::lyser (TCI)	min.	—	0	0	E-525-1-S-000
	max.	—	2	40	

pH::lyser

		Parameter		
		pH [pH]	Temperature [°C]	Part Number
pH::lyser (pH)	min.	4	0	E-514-2-000-DW
	max.	10	40	

redo::lyser

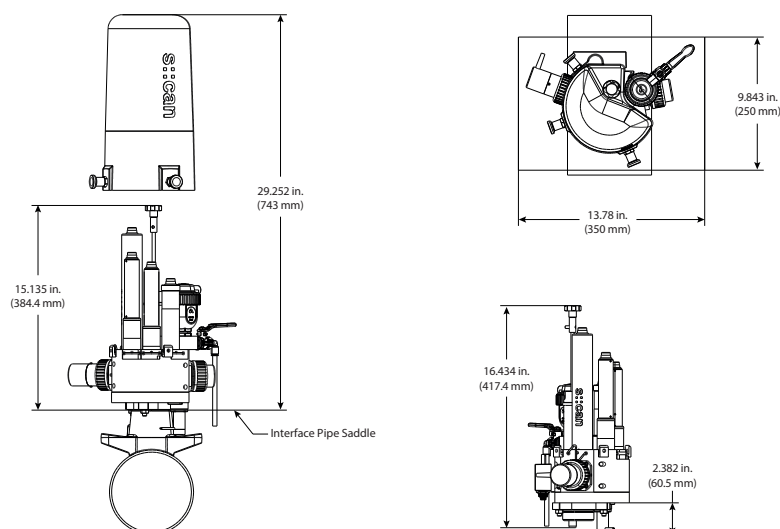
		Parameter		
		redox [mV]	Temperature [°C]	Part Number
redo::lyser (redox)	min.	-2000	0	E-513-2-000-DW
	max.	2000	40	

condu::lyser

		Parameter		
		Conductivity [μS/cm]	Temperature [°C]	Part Number
condu::lyser (Conductivity)	min.	0	0	E-511-2-000-DW
	max.	500000	40	

RECOMMENDED ACCESSORIES

Part Number	Article Name
D-500-012	con::line
D-330-xxx	con::cube V3
F-160-SP-SET-DKxxx	Hawle shutoff pipe saddle DK75 - DK315, includes saddle blade (for PE and PVC pipes)
F-160-SP-SET-DNxxx	Hawle shutoff pipe saddle DN80 - DK600, includes saddle blade (for ductile iron pipes)
S-500-08-IO	lo:Tool - s::can monitoring station software for 8 parameters
S-11-xx-moni	moni::tool software
S-14-vali	vali::tool - s::can data validation software
S-15-ana	ana::tool - s::can event detection software

DIMENSIONS

EXPLODED VIEW

