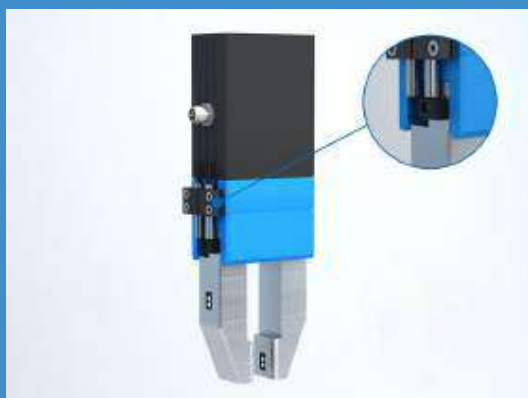


MINIATURE INDUCTIVE SENSORS

FULL FUNCTIONALITY, SMALLEST SIZE



APPLICATION

Miniature inductive sensors ensure gripper jaws are fully open before initiating automated assembly

During automated assembly of delicate components by a multi-finger gripper, impacts between gripper fingers and fragile components cause costly handling errors and damage. To prevent this, the jaws must be fully open before the gripper descends to pick up a component. Miniature inductive sensors with a diameter of just 3 mm are mounted above each gripper finger, detecting the open position and providing reliable confirmation that the jaws are fully open before picking is initiated.

INDUSTRIES

Machine tool, vehicles, assembly, automation, robotics, micromechanics, special purpose machines



Robotics for pick-and-place



Linear drive technology



Machine tool position control



Textile spinning machine automation

Size is often a critical constraint when selecting sensors for position- or presence-sensing. The Contrinex **Miniature** range, which includes the smallest self-contained inductive sensors on the market, meets this constraint without compromising on functionality.

KEY ADVANTAGES

Classics, Extra Distance and Full Inox

- ✓ High quality ASIC sensors with **IO-Link** interface
- ✓ Smallest self-contained inductive sensors on the market
- ✓ Outstanding temperature stability from -25°C (-13°F) to $+70^{\circ}\text{C}$ ($+158^{\circ}\text{F}$) or $+85^{\circ}\text{C}$ ($+185^{\circ}\text{F}$) for Full Inox types
- ✓ High switching frequency up to 8,000 Hz
- ✓ Electronics vacuum potted for optimum long-term reliability under high stress

Full Inox

- ✓ Extremely robust one-piece stainless-steel housing
- ✓ Corrosion resistant
- ✓ Water resistant
- ✓ Pressure resistant up to 120 bar (1,740 psi)

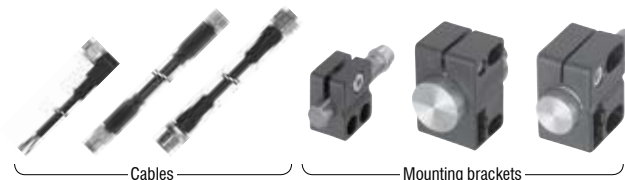


PRODUCT OVERVIEW

IO-Link					
Housing size mm	Ø3	M4	Ø4	M5	C5
Extra Distance	–	–	2.5	2.5	–
Classics	0.6...1	0.6...1	0.8...1.5	0.8...1.5	0.8...1.5
Full Inox	–	–	3	3	–

ACCESSORIES

Go to page 298 to see all the accessories



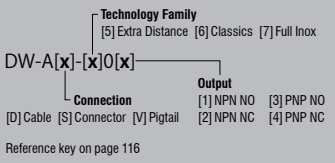


COMMON FEATURES

Supply Voltage range	10 ... 30 VDC
Output	PNP NO*

* Other types available: PNP NC, NPN NC
** 2 m length if not specified

OUTPUT



ACCESSORIES

Group A: M8 3-pin
Sub-group: Field attachable connectors
Sub-group: Distribution boxes

Group B: M8 4-pin

Group C: M12 4-pin
Sub-group: Field attachable connectors
Sub-group: Distribution boxes

Group D: M12 AC/DC 3-pin

Group E: Universal mounting brackets
Sub-group: Mechanical stops

Group F: Photoelectric mounting brackets

Group G: Photoelectric reflectors

Group H: Sensor tester

Go to page 298 for details

CABLES
Cable lengths available:
2 m, 5 m, 10 m
other customised lengths possible

FAMILY	OPERATING DISTANCE (mm)	HOUSING SIZE (mm)	HOUSING LENGTH (mm)	HOUSING MATERIAL		CABLE **	CONNECTOR	IO-Link	SWITCHING FREQUENCY (Hz)	MOUNTING EMB. NON-EMB.	AMBIENT TEMPERATURE	DEGREE OF PROTECTION	PART REFERENCE*	ACCESSORIES (SEE PAGE 50)
EXTRA DISTANCE SERIES 500	2.5	Ø 4	25	Nickel silver		PVC		IO-Link	800	Quasi-embed.	−25 ... +70°C	IP67	DW-AD-503-04	E H
	2.5	Ø 4	38	Nickel silver			M8	IO-Link	800	Quasi-embed.	−25 ... +70°C	IP67	DW-AS-503-04	A E H
	2.5	M5	25	Nickel silver		PVC		IO-Link	800	Quasi-embed.	−25 ... +70°C	IP67	DW-AD-503-M5	E H
	2.5	M5	38	Nickel silver			M8	IO-Link	800	Quasi-embed.	−25 ... +70°C	IP67	DW-AS-503-M5	A E H

CLASSICS – SERIES 600	1	Ø 3	12	Stainless steel V2A		PUR		IO-Link	8,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-03-960	E H
	0.6	Ø 3	22	Stainless steel V2A		PUR		IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AD-603-03	E H
	1	Ø 3	22	Stainless steel V2A		PUR		IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-03	E H
	0.6	Ø 3	22	Stainless steel V2A		0.2 m PUR	M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AV-603-03-276	A E H
	1	Ø 3	22	Stainless steel V2A		0.2 m PUR	M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AV-623-03-276	A E H
	1	M4	12	Stainless steel V2A		PUR		IO-Link	8,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-M4-960	E H
	0.6	M4	22	Stainless steel V2A		PUR		IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AD-603-M4	E H
	1	M4	22	Stainless steel V2A		PUR		IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-M4	E H
	0.6	M4	22	Stainless steel V2A		0.2 m PUR	M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AV-603-M4-276	A E H
	1	M4	22	Stainless steel V2A		0.2 m PUR	M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AV-623-M4-276	A E H
	0.8	Ø 4	25	Stainless steel V2A		PVC		IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AD-603-04	E H
	1.5	Ø 4	25	Stainless steel V2A		PVC		IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-04	E H
	0.8	Ø 4	38	Stainless steel V2A			M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AS-603-04	A E H
	1.5	Ø 4	38	Stainless steel V2A			M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AS-623-04	A E H
	0.8	Ø 4	25	Stainless steel V2A		0.2 m PUR	M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AV-603-04-276	A E H
	1.5	Ø 4	25	Stainless steel V2A		0.2 m PUR	M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AV-623-04-276	A E H
	0.8	M5	25	Stainless steel V2A		PVC		IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AD-603-M5	E H
	1.5	M5	25	Stainless steel V2A		PVC		IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-M5	E H
	0.8	M5	38	Stainless steel V2A			M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AS-603-M5	A E H
	1.5	M5	38	Stainless steel V2A			M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AS-623-M5	A E H
	0.8	M5	25	Stainless steel V2A		0.2 m PUR	M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AV-603-M5-276	A E H
	1.5	M5	25	Stainless steel V2A		0.2 m PUR	M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AV-623-M5-276	A E H



COMMON FEATURES

Supply Voltage range	10 ... 30 VDC
Output	PNP NO*

* Other types available: PNP NC, NPN NC
** 2 m length if not specified

OUTPUT

Technology Family
[5] Extra Distance [6] Classics [7] Full Inox

DW-A[x]-[x]0[x]

Connection
[D] Cable [S] Connector [V] Pigtail

Output
[1] NPN NO [3] PNP NO
[2] NPN NC [4] PNP NC

Reference key on page 116

ACCESSORIES

A Group A: M8 3-pin
Sub-group: Field attachable connectors
Sub-group: Distribution boxes

B Group B: M8 4-pin

C Group C: M12 4-pin
Sub-group: Field attachable connectors
Sub-group: Distribution boxes

D Group D: M12 AC/DC 3-pin

E Group E: Universal mounting brackets
Sub-group: Mechanical stops

F Group F: Photoelectric mounting brackets

G Group G: Photoelectric reflectors

H Group H: Sensor tester

Go to page 298 for details

CABLES
Cable lengths available:
2 m, 5 m, 10 m
other customised lengths possible

FAMILY	OPERATING DISTANCE (mm)	HOUSING SIZE (mm)	HOUSING LENGTH (mm)	HOUSING MATERIAL			CABLE **	CONNECTOR	IO-Link	SWITCHING FREQUENCY (Hz)	MOUNTING EMB. NON-EMB.	AMBIENT TEMPERATURE	DEGREE OF PROTECTION	PART REFERENCE*	ACCESSORIES (SEE PAGE 52)
CLASSICS SERIES 600	0.8	5 × 5 (C5)	25	Nickel-chrome-plated brass			PUR		IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AD-603-C5	H
	1.5	5 × 5 (C5)	25	Nickel-chrome-plated brass			PUR		IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AD-623-C5	H
	0.8	5 × 5 (C5)	25	Nickel-chrome-plated brass			0.2 m PUR	M8	IO-Link	5,000	Embed.	−25 ... +70°C	IP67	DW-AV-603-C5-276	A H
	1.5	5 × 5 (C5)	25	Nickel-chrome-plated brass			0.2 m PUR	M8	IO-Link	3,000	Embed.	−25 ... +70°C	IP67	DW-AV-623-C5-276	A H

FULL INOX SERIES 700	3	Ø 4	30	Stainless steel V2A			PUR		IO-Link	1,200	Non-embed.	−25 ... +85°C	IP67	DW-AD-713-04	E H
	3	Ø 4	30	Stainless steel V2A			0.2 m PUR	M8	IO-Link	1,200	Non-embed.	−25 ... +85°C	IP67	DW-AV-713-04-276	A E H
	3	M5	30	Stainless steel V2A			PUR		IO-Link	1,200	Non-embed.	−25 ... +85°C	IP67	DW-AD-713-M5	E H
	3	M5	30	Stainless steel V2A			0.2 m PUR	M8	IO-Link	1,200	Non-embed.	−25 ... +85°C	IP67	DW-AV-713-M5-276	A E H