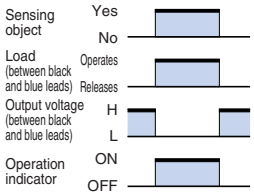
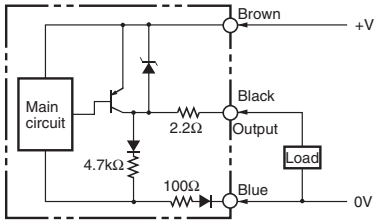
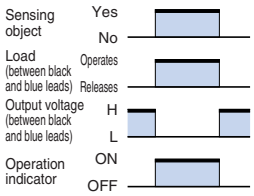
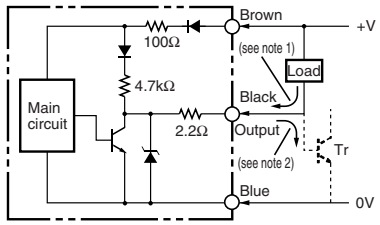
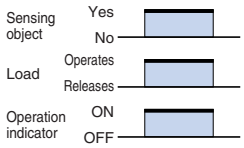
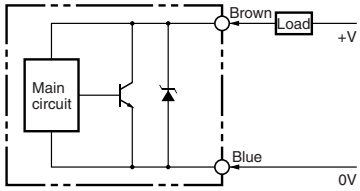
Output Circuit Diagram

Operating status	Output specifications	Model	Timing chart	Output circuit
NO	PNP	**E2FQ-X□F1**		
	NPN	**E2FQ-X□E1**		 Note: 1. 200 mA max.(load current) 2. When a transistor is connected
	DC 2-wire	**E2FQ-X□D1**		 Note: The load can be connected to either the +V or the 0-V line.

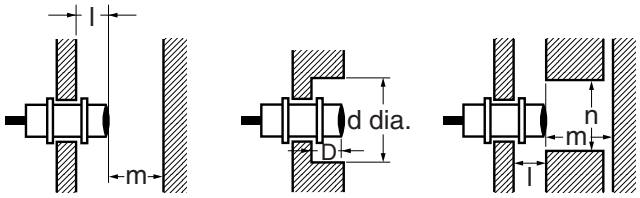
Precautions

Correct Use

Design

Effects of Surrounding Metal

Provide a minimum distance between the Sensor and the surrounding metal as shown in the table below.



Effects of Surrounding Metal (Unit: mm)

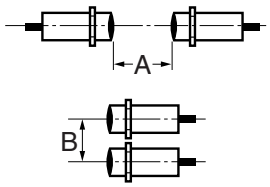
Model / Item	l	d	D	m	n
E2FQ-X2□	0	12	0	8	18
E2FQ-X5□		18		20	27
E2FQ-X10□		30		40	45

Mutual Interference

If more than one Proximity Sensor is installed face to face or in parallel, ensure that the distances between two Units adjacent to each other are the same as or larger than the corresponding values shown in the following table.

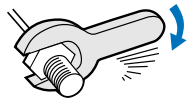
Mutual Interference (Unit: mm)

Model / Item	A	B
E2FQ-X2□	30	20
E2FQ-X5□	50	35
E2FQ-X10□	100	70



Installation

Do not tighten the nut with excessive force. A washer must be used with the nut.



Note: The table below shows the value of tightening torques when using toothed washers.

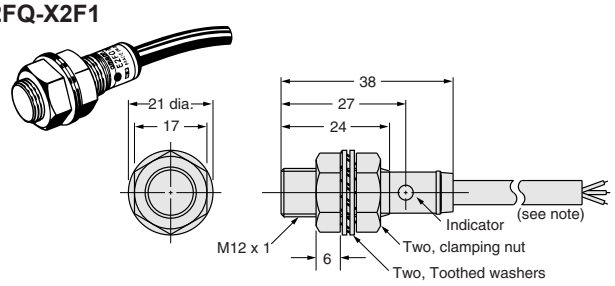
Model / Torque	Tensile strength (torque)
E2FQ-X2□	0.98 Nm
E2FQ-X5□	2 Nm
E2FQ-X10□	

Others

Chemical resistance

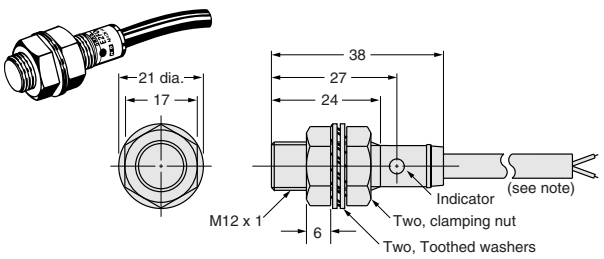
Dimensions (Unit: mm)

E2FQ-X2E1
E2FQ-X2F1



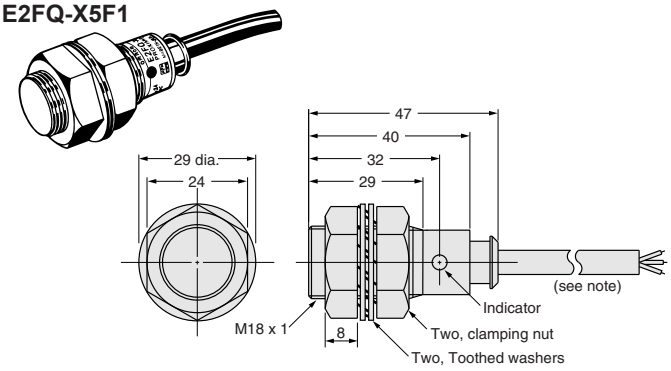
Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 3 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

E2FQ-X2D1



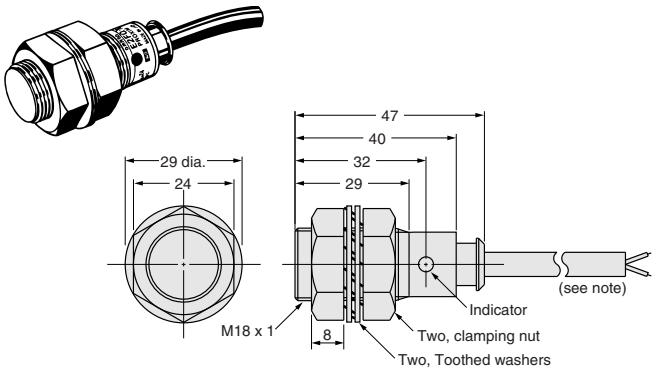
Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 2 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

E2FQ-X5E1
E2FQ-X5F1



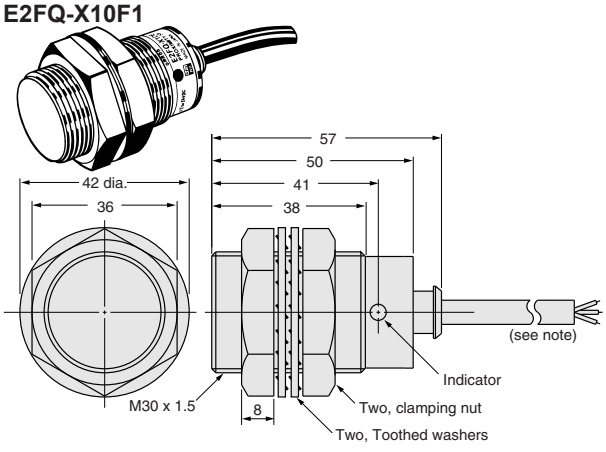
Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 3 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

E2FQ-X5D1



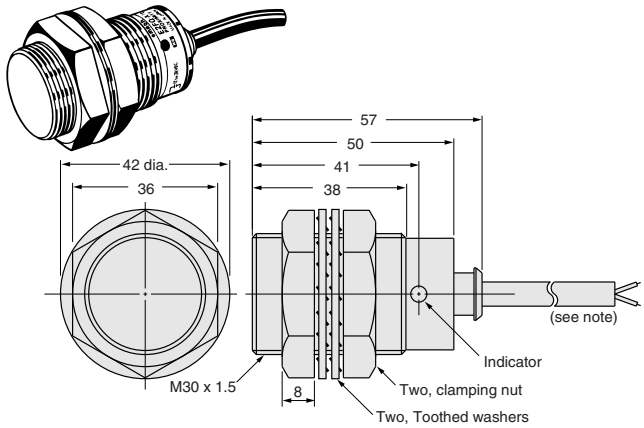
Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 2 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

E2FQ-X10E1
E2FQ-X10F1



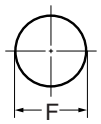
Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 3 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

E2FQ-X10D1



Note:
Oil-resistant, vibration-resistant, and fire-retardant vinyl-insulated round cord, 6 dia. x 2 cores, standard length: 2 m
The cord can be extended in an independent conduit for 200 m maximum.

Mounting Holes



Model	F (mm)
E2FQ-X2□	12.5 mm dia. $^{+0.5}_{0}$
E2FQ-X5□	18.5 mm dia. $^{+0.5}_{0}$
E2FQ-X10□	30.5 mm dia. $^{+0.5}_{0}$