CSM_E39-L/E39-S/E39-R_DS_E_19_2

Mounting Brackets [Refer to Dimensions on page 6.]

	Fitting		Acce		Applicable sensor	Page		
Model	materials	Count	Description	Material	Count	(mounting pitch on sensor side)	Dimensions	
E39-L31	Iron, zinc plating	1	Slotted/Phillips screws, M3 × 12 (with spring washers)	Iron, zinc plating	2	E3C-S50 (8)		
E39-L40	Iron, zinc plating	1	Phillips screws M4 × 25 (with spring and plain washers)	Iron, zinc plating	2	E3JK		
			Nuts M4	Iron, zinc plating	2			
E39-L41	Iron, zinc plating	2	Phillips screws M3 × 14 (with spring washers)	Iron, zinc plating	4	E3C-1 (10)	5	
			Plain washer M3	Iron, zinc plating	4			
E39-L42	Iron,	2	Phillips screws M3 × 10 (with spring washers)	Iron, zinc plating	4	E3C-2 (20) E3C-DS10 (19)		
L03-L42	black coating		Plain washer M3	Iron, zinc plating	4	E3C-VS1G (19) E3C-VS3R (19)		
E39-L43	Stainless steel (SUS304)	1	Slotted/Phillips screws M3 × 8 (with spring and plain washers)	Stainless steel (SUS304)	2	E3Z pre-wired model (25.4)		
E39-L44	Stainless steel (SUS304)	1	Slotted/Phillips screws M3 × 8 (with spring and plain washers)	Stainless steel (SUS304)	2	E3Z pre-wired model (25.4)		
E39-L51	Iron, zinc plating	1	Slotted/Phillips screws M4 × 30 (with spring and plain washers)	Iron, zinc plating	2	E3JM (40)	7	
			Nuts M4	Iron, nickel plating	2		_ ′	
E39-L53	Iron, zinc plating	1				E3JM (40)		
E39-L54V	Stainless steel (SUS304)	1				E32-T54V		
E39-L83	Stainless steel	1				E32-T24S E32-A03		
E39-L85	Stainless steel (SUS304)	1	Hexagonal bolts M4 × 12 (with spring and plain washers)	Iron, zinc plating	2	E3S-C (25.4)	8	
E39-L86	Stainless steel (SUS304)	1	Hexagonal bolts M4 \times 12 (with spring and plain washers)	Iron, zinc plating	2	E3S-C (25.4)	_	
E39-L87	Stainless steel (SUS304)	1	Hexagonal bolts M4 × 12 (with spring and plain washers)	Iron, zinc plating	2	E3S-C (25.4)		

Note: Applicable models that appear shaded come with the Mounting Brackets at left as accessories.

	Fitting		Acce	ssories		Applicable sensor	Page	
Model	materials	Count	Description	Material	Count	(mounting pitch on sensor side)	Dimensions	
	04-1-1		Holder (upper)	Heat-resistant ABS resin	1	,		
E39-L93FH	Stainless steel (SUS304)		Holder (lower)	66 nylon	1			
	(303304)		Pipe	Stainless steel (SUS304)	1			
E39-L93FV	Stainless steel	1	Bolts M4 × 12 with Hexagonal holes	Iron, nickel plating	2			
	(SUS304)		Bolts M4 × 30 with hexagonal holes	Iron, nickel plating	1	E3Z (25.4) E39-R1/E39-R3	9	
E39-L93H	Stainless steel (SUS304)	1	Phillips screws M3 × 12 (with spring and plain washers)	Stainless steel (SUS304)	2			
	0		Spring washer M4	Iron, nickel plating	1			
E39-L93V	Stainless steel (SUS304)	1	Plain washer M4	Iron, nickel plating	1			
	(303304)		Nuts M4	Iron, nickel plating	3			
			Holder	66 nylon	1			
E00 1 00VV			Pipe	Stainless steel (SUS304)	1	E3Z (25.4)		
E39-L93XY			Bolts M5 × 16 with hexagonal holes	Stainless steel (SUS304)	2	E39-R1/E39-R3		
			Nuts M5	Stainless steel (SUS304)	2			
			Phillips screws M3 × 10	Iron, zinc plating	4	E32-T16P (19)	1	
E39-L94	Iron, zinc plating	inc plating 2	Nuts M3	Iron, zinc plating	4	E32-T16PR (19)		
E39-L96			Tate inc	p.ag			10	
* For installation of Sensor Adjuster E39- L93	Stainless steel (SUS304)	1	Phillips screws M3 × 6 (with spring and plain washers)	Iron, nickel plating	2	E39-R1		
E39-L98	Stainless steel (SUS304)	1	Slotted/Phillips screws M3 × 12 (with spring and plain washers)	Stainless steel (SUS304)	2	E3Z pre-wired model (25.4)	-	
E39-L102	Stainless steel (SUS304)	1	Hexagonal bolts M4 × 12 (with spring and plain washers)	Iron, zinc plating	2	E3S-C (horizontal type) (25.4)		
E39-L103	Stainless steel (SUS304)	1	Hexagonal bolts M4 × 12 (with spring and plain washers)	Iron, zinc plating	2	E3S-C (vertical type) (25.4)	11	
E39-L104	Stainless steel (SUS304)	1	Slotted/Phillips screws M3 × 8 (with spring and plain washers)	Stainless steel (SUS304)	2	E3Z pre-wired model (25.4) E32-R21 (for installation of E39-R3) (25.4)	- 11	
E39-L116	Stainless steel (SUS304)	1	Nut plate	Stainless steel (SUS304)	1	E3T-S (9/15)		
E39-L117	Stainless steel (SUS304)	1	Nut plate	Stainless steel (SUS304)	1	E3T-S (9/15)		
E39-L118	Stainless steel (SUS304)	1	Nut plate	Stainless steel (SUS304)	1	E3T-S (9/15)		
E39-L119	Stainless steel (SUS304)	1				E3T-F (8)		
E39-L120	Stainlass staal					E3T-F (8)	12	
E39-L127-T1	Iron, zinc plating	1	Phillips screws M2.3 × 8 Spring washer M2.3	Iron, zinc plating Iron, zinc plating	4 4		1	
E39-L127-T2	Iron zine pletine	4	Phillips screws M2.3 × 8	Iron, zinc plating	4	E2C S10 (7.5)		
E39-L12/-12	non, zinc plating	n, zinc plating 1	Spring washer M2.3	Iron, zinc plating	4	E3C-S10 (7.5)		
E20 107 E2	lean sine platin	-	Phillips screws M2.3 × 8	Iron, zinc plating	4			
E39-L127-T3	Iron, zinc plating	1	Spring washer M2.3	Iron, zinc plating	4			

Note: Applicable models that appear shaded come with the Mounting Brackets at left as accessories.

NA1 - 1	Fitting		Acc	essories		Applicable sensor	Page					
Model	materials	Count	Description	Material	Count	(mounting pitch on sensor side)	Dimension					
			Slotted/Phillips screws M4 × 25	Stainless steel (SUS304)	2							
	Stainless steel		Spring washer M4	Stainless steel (SUS304)	2	E3G-R1□ (25)						
E39-L131	(SUS304)	1	Plain washer M4	Stainless steel (SUS304)	2	E3G-L7 (25)						
	(00000)		Nuts M4	Stainless steel (SUS304)	2							
				,	2							
			Slotted/Phillips screws M4 × 25	Stainless steel (SUS304)								
E39-L132	Stainless steel	1	Spring washer M4	Stainless steel (SUS304)	2	E3G-R1□ (25)						
	(SUS304)		Plain washer M4	Stainless steel (SUS304)	2	E3G-L7□ (25)						
			Nuts M4	Stainless steel (SUS304)	2							
			Slotted/Phillips screws M4 × 35	Stainless steel (SUS304)	2							
	Stainless steel		Spring washer M4	Stainless steel (SUS304)	2	E3G-MR19 (T)						
E39-L135	(SUS304)	1	Plain washer M4	Stainless steel (SUS304)	2	E3G-ML79 (T)						
	(00000.)		Nuts M4	Stainless steel (SUS304)	2		13					
			1	, ,								
			Slotted/Phillips screws M4 × 35	Stainless steel (SUS304)	2							
E39-L136	Stainless steel	1	Spring washer M4	Stainless steel (SUS304)	2	E3G-MR19 (T)						
-03-L100	(SUS304)		Plain washer M4	Stainless steel (SUS304)	2	E3G-ML79 (T)						
			Nuts M4	Stainless steel (SUS304)	2							
	Stainless steel		Slotted/Phillips screws M3 × 8		_	E3Z pre-wired model						
E39-L142	(SUS304)	1	(with spring and plain washers)	Stainless steel (SUS304)	2	(25.4)						
	(00000.)		(mar opining and plant machine)			E3X-DA-S/MDA						
						E3X-NA						
E39-L143	Stainless steel	1	None			E3C-LDA						
L00 L140	(SUS304)		None			E2C-EDA						
						E4C-UDA						
	Stainless steel		Slotted/Phillips screws M3 × 12			E3Z pre-wired model						
E39-L144	(SUS304)	1	(with spring and plain washers)	Stainless steel (SUS304)	2	(25.4)						
			(With Spring and plain washers)			(23.4)						
E39-L148	Stainless steel (SUS304)	1	None			E3X-NA						
	, ,											
E39-L149	Iron,	1	None			E3Z-G						
	black coating											
			Holder/bracket	PBT (polybutylene tereph-	1							
				thalate)								
	0		Shaft (brace)	Stainless steel (SUS304) 1 E3Z (25.4)	E3Z (25.4)							
E39-L150	Stainless steel (SUS304)	1 7	Bolt with hexagonal hole	Stainless steel (SUSXM7)	1	E3S-R6□/R8□ (20)						
				-			·		Nut	Stainless steel (SUS304)	1	E39-R3
				Phillips screw	Stainless steel (SUSXM7)	1		14				
				, ,								
			Slotted/Phillips screws	Stainless steel (SUS304)	2							
			Holder/bracket	PBT (polybutylene tereph-	1							
				thalate)								
	0		Shaft (brace)	Stainless steel (SUS304)	1	E3Z (25.4)						
E39-L151	Stainless steel					1	Bolt with hexagonal hole	Stainless steel (SUSXM7)	1	E3S-R6□/R8□ (20)		
	(SUS304)		Nut	Stainless steel (SUS304)	1	E39-R3						
			Phillips screw	Stainless steel (SUSXM7)	1							
			Slotted/Phillips screws	Stainless steel (SUS304)	2							
	0		-	, ,		507						
E39-L153	Stainless steel	1	Slotted/Phillips screws M3 × 8	Stainless steel (SUSXM7)	2	E3Z pre-wired model						
	(SUS304)		(with spring and plain washers)	Stainless steel (SUS304)		(25.4)						
E39-L166	Stainless steel	1	Nut plate	Stainless steel (SUS304)	1	E3T-S□□M (13/16)						
	(SUS304)						15					
E39-L167	Stainless steel	1				E3T-FD□□M (8)						
_03-L107	(SUS304)	'										
E20 160	PBT (polybutylene	1				EST EDDDM						
E39-L168	terephthalate)	'				E3T-FD□□M						
E00 I 400	Stainless steel		Phillips screw	Stainless steel	2	ZX1-LD50□						
E39-L180	(SUS304)	1	Nut plate	Stainless steel	1	ZX1-LD100□						
	Stainless steel		Phillips screw	Stainless steel	2	ZX1-LD300□						
E39-L181	(SUS304)	1	Nut plate	Stainless steel	1	ZX1-LD600□	16					
	Stainless steel		•	Stainless steel		ZXI EBOOG						
E39-L185		1	Phillips screw Nut plate	Stainless steel Stainless steel	2	E3NC-LH02						
	(SUS304)	1	•				4					
E39-L186	Stainless steel	1	Phillips screw	Stainless steel	2	E3NC-LH01						
	(SUS304)		Nut plate	Stainless steel	1							
	Stainless steel		Phillips screw	Stainless steel	2	E3NC-SH250H						
E39-L187	(SUS304)	1	Nut plate	Stainless steel	1	E3NC-SH250						
	(00000+)		ivat plate	Giairiiess steet	'	E3NC-SH100						
	Otalialaa		District	Otaliala a ata d	_	E3NC-SH250H						
E39-L188	Stainless steel	1	Phillips screw	Stainless steel	2	E3NC-SH250	17					
	(SUS304)		Nut plate	Stainless steel	1	E3NC-SH100						
			DI W	0	-		-					
E39-L190	Stainless steel	1	Phillips screw	Stainless steel	2	E3NC-LH03						

Note: Applicable models that appear shaded come with the Mounting Brackets at left as accessories.

Slits

Model	Slit width	Installation procedure	Applicable type	
E39-S39	Width 1 × 20 mm	Seal type	E3JM-10□4 (T)-N	
E39-S61	Width 0.5, 1, 2, 4 × 11 mm		E3S-CT□1	
E39-S63	0.5-mm dia., 1 mm		E3T-ST1□	
E39-S64	0.5-mm dia., 1 mm		E3T-FT1□	
E39-S65A	0.5 mm dia.			
E39-S65B	1-mm dia.	Plug-in type	E3Z-T□□	
E39-S65C	2-mm dia.			
E39-S65D	Width 0.5 × 10 mm			
E39-S65E	Width 1 × 10 mm			
E39-S65F	Width 2 × 10 mm			
E39-S68	Width 0.5, 1 × 13.4 mm	Seal type	E32-T16P E32-T16PR	
E39-S76A	0.5-mm dia.	Dhua in tuno	FOT CT M	
E39-S76B	1-mm dia.	Plug-in type	E3T-ST□M	

Note:

Applicable models that appear shaded come with the Slits at left as accessories

Reflectors (Refer to Dimensions on page 18.)

	Name	Refle	ectors	Non-fogging reflective plate	Reflectors		Special	ecial Reflector for E3ZM-B		
Item	Model	E39-R1	E39-R1S	E39-R1K	E39-R2	E39-R6	E39-R10	E39-RP1	E39-RSP1	E39-RP37
Directional an	gle		30° min. *1		30° min. *2			30° min.		
Ambient operating temperature range		-25 to 55°C -40 to 60°C						−40 to 60°C	−25 to 55°C	
Ambient stora temperature ra		-40 to	o 70°C	−40 to 55°C		-40 to 70°C			0 to	40°C
Ambient opera humidity rang				35% to 85%	35% to 95%				35% to 85%	
Ambient stora humidity rang		:			35% to 95%				35% to 85%	
Degree of prof	tection				IEC IP67				-	
Accessories					-					Phillips screws M3 × 8, spring washers M3, nuts M3

^{*1. 40°} or higher for E3JM-R and E3JK-R. *2. 40° or higher for E3G-R.

Name			Small re	eflector	Tape reflector *			
Item	Model	E39-R9	E39-R3	E39-R4	E39-R37-CA *	E39-RS1 E39-RS1-CA	E39-RS2 E39-RS2-CA	E39-RS3 E39-RS3-CA
Directional a	angle				30° min.			
Ambient operature		−25 to 55°C						
Ambient sto temperature		-40 to 70°C 0 to 40°C						
Ambient open humidity rar		35% to 95%	35% to 85%					
Ambient sto humidity rar			35% to 95% 35% to 85%					
Degree of pr	rotection	IEC IP67						
Accessories	s		Mounting Brack- ets E39-L104 (with screws)		Phillips screws M3 × 8, spring washers M3, nuts M3			

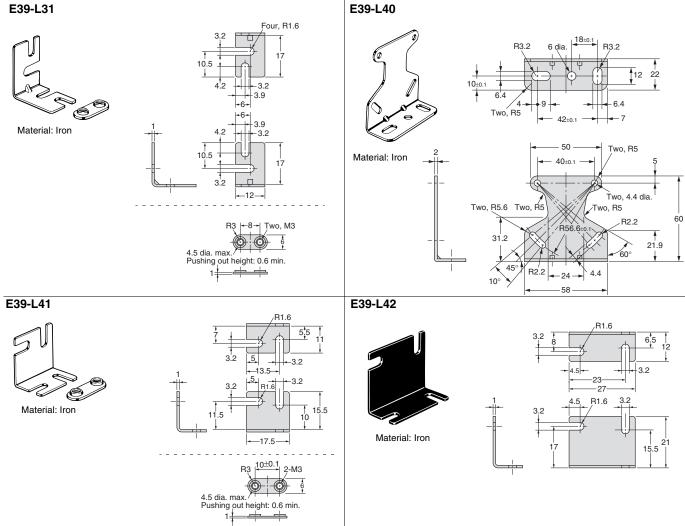
^{*} Models ending in the suffix "-CA" are reflectors only for E3T-SR4.

	Name	Laser Reflectors								
		Standard S		Short-distance transparent object detection	She	eets				
Item	Model	E39-R12	E39-R13	E39-R14	E39-RS4	E39-RS5				
Ambient operating temperature range		−10 to 55°C (No icing)								
Ambient sto	•	−25 to 70°C (No icing)								
Ambient operating humidity range 35 to 85% (No conde				35 to 85% (No condensation)						
Ambient sto				35 to 85% (No condensation)						

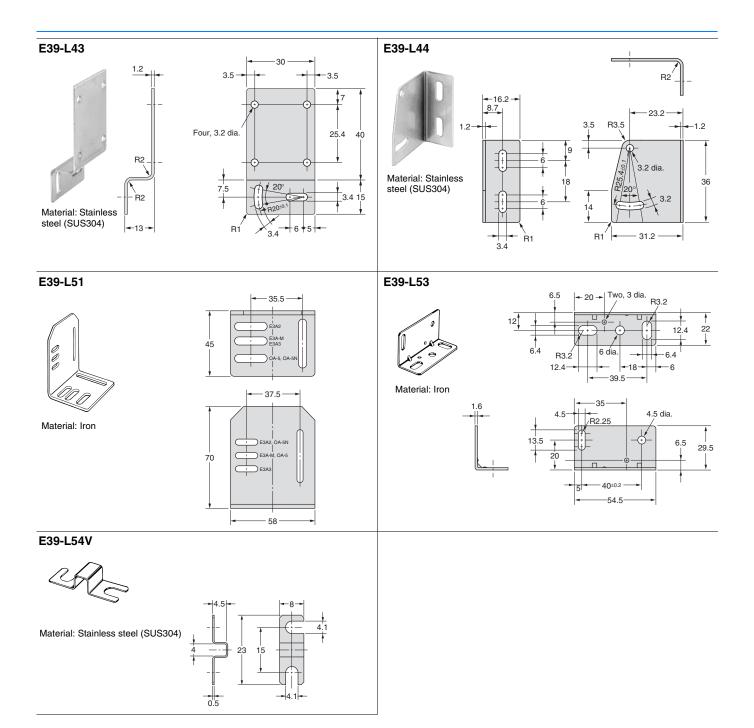
	Name		Laser Reflectors						
		Stan	dard	She	eets				
Item	Model	E39-R21 *	E39-R22 *	E39-RS10 *	E39-RS11 *				
Ambient op temperature		−10 to 55°C (No icing and no condensation)							
Ambient sto	_	-25 to 70°C (No icing and no condensation)							
Ambient op humidity ra	nt operating ity range 35 to 85% (No condensation)								
Ambient sto			condensation)						

^{*} Models only for E3NC-LH03

(Unit: mm) Tolerance class IT16 applies to dimensions in this datasheet unless otherwise specified. E39-L40

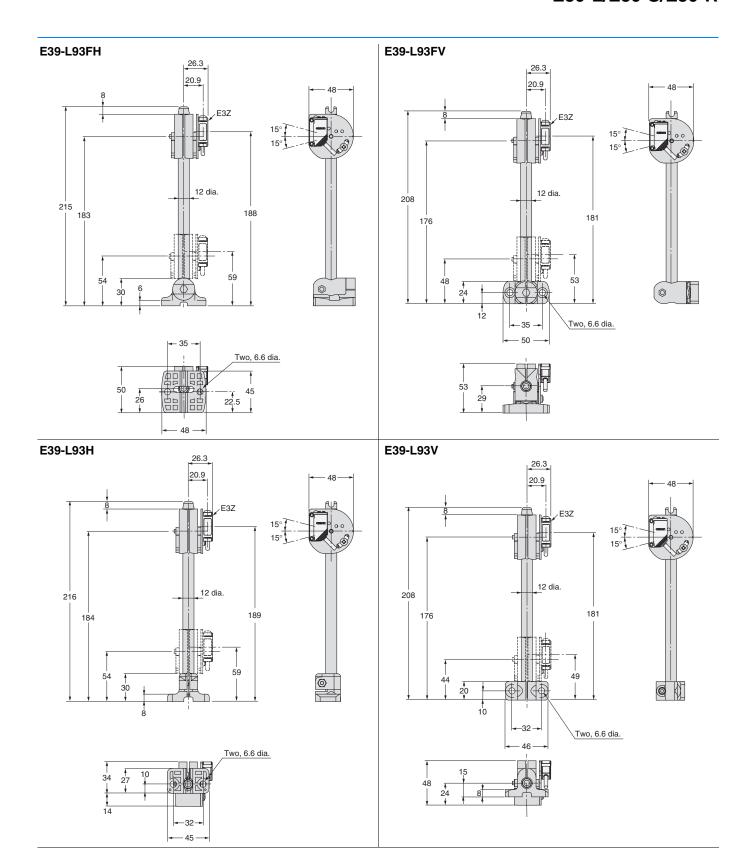


E39-L/E39-S/E39-R

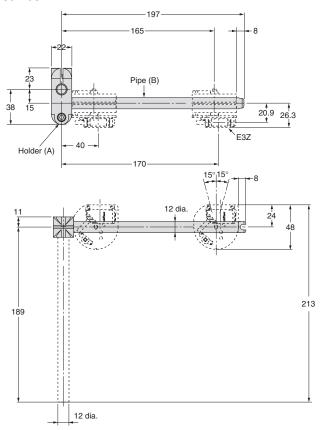


E39-L83 E39-L85 |+9.8+|--15.6− Six, R1.2 (44.7) 4.3 Two, R1.6 2.6-Material: Stainless steel (SUS304) 4.2 -31 3.2 -10 Material: Stainless steel (SUS304) 43.8 28.9 32.2 15.1 E39-L86 E39-L87 25.4 41 Material: Stainless steel (SUS304) Material: Stainless steel (SUS304) 43.7

E39-L/E39-S/E39-R

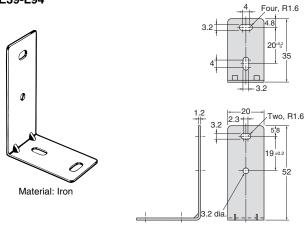


E39-L93XY

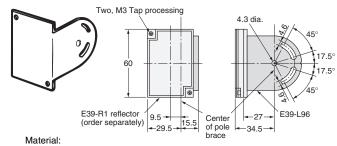


Note: The E39-L93XY consists of only the one joint holder (A) and pipe, and the two hexagonal bolts and nuts. It cannot be mounted to the Sensor alone.

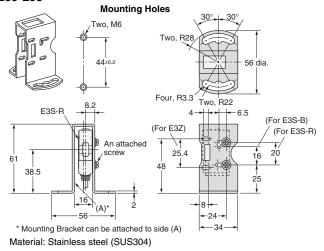
E39-L94



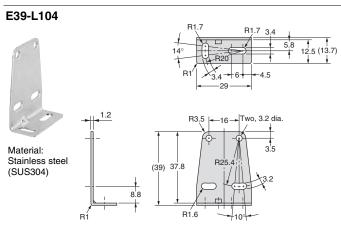
E39-L96



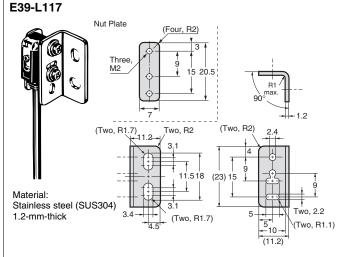
Stainless steel (SUS304) 2-mm-thick

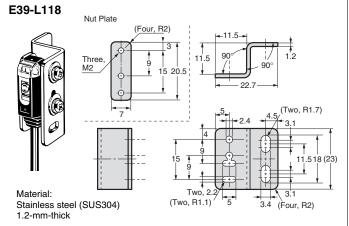


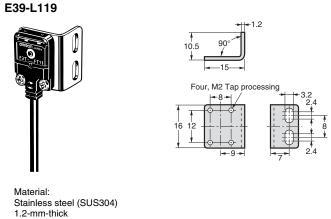
E39-L102 E39-L103 E39-L103 E39-L103 E39-L103 E39-L103 E39-L103 E39-L104

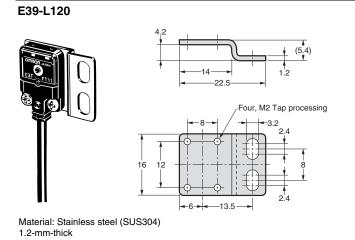


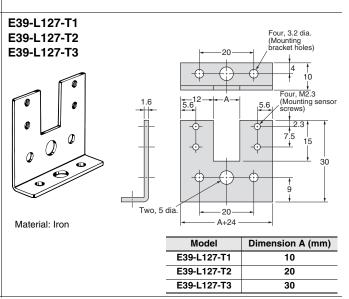
E39-L116 Nut Plate (Four, R2) (Two, R1.7) Three, M2 1,5 = 15 = 20.5 (Two, R2) (Two, R1.1) (Two, R1.1) (Two, R1.1) (Two, R1.2) 2.4

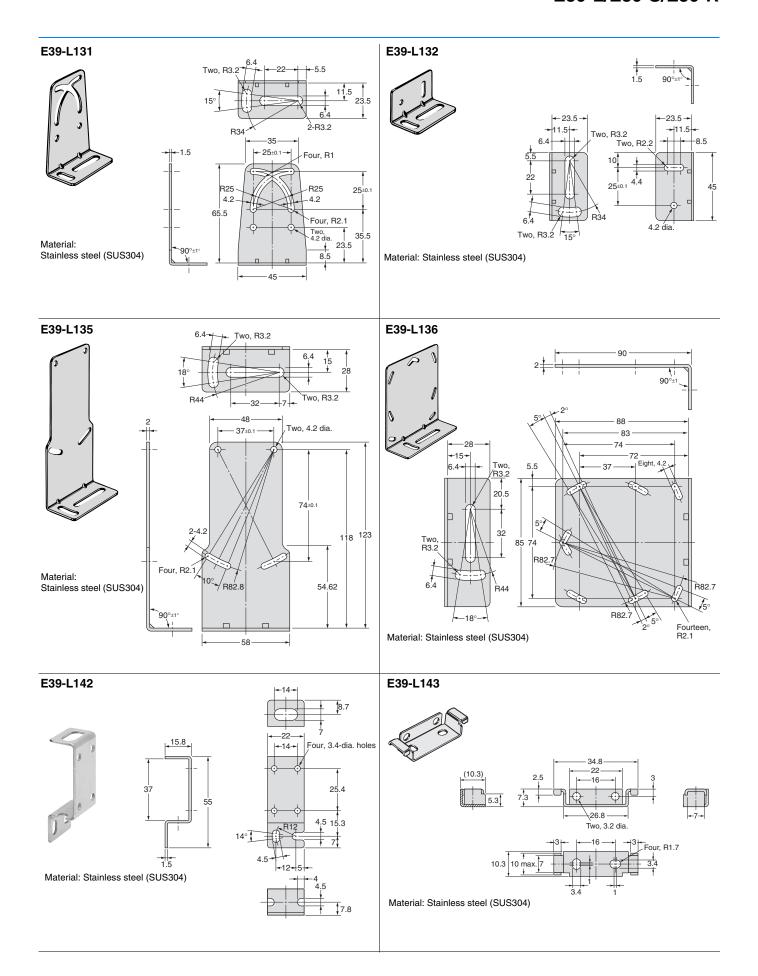


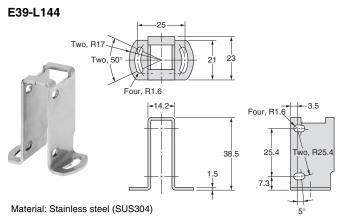


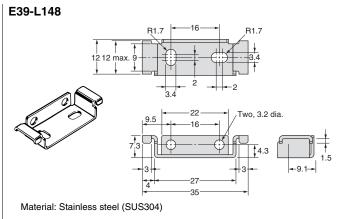




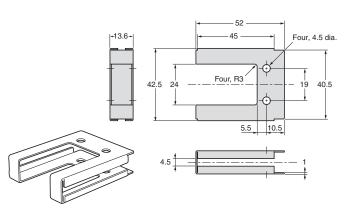




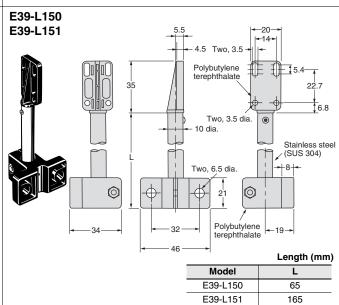


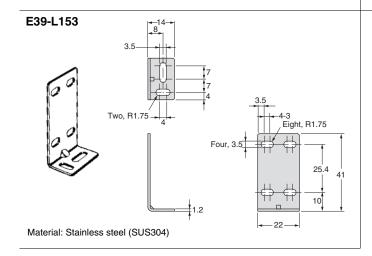


E39-L149

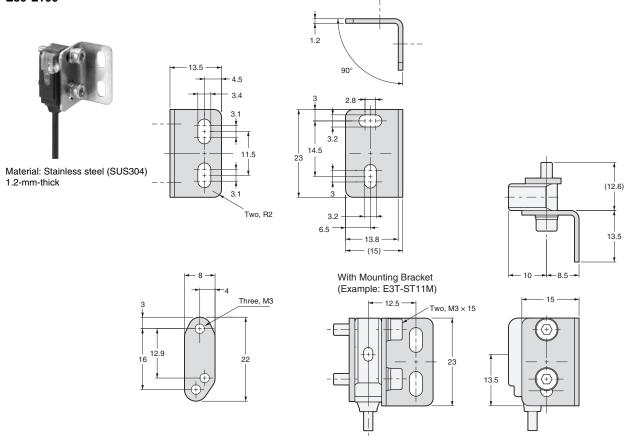


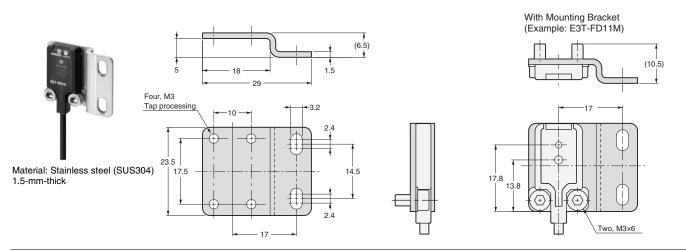




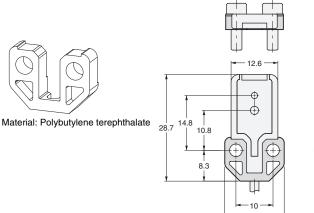


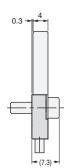
E39-L166





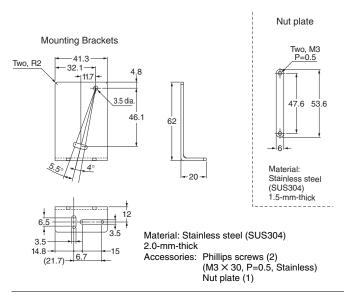
E39-L168



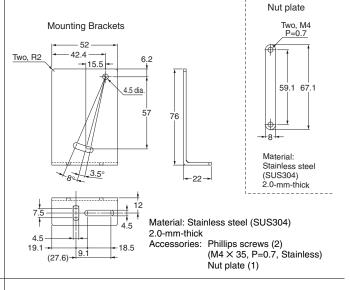


Note: Use this Spacer when mounting the Sensor from the back.

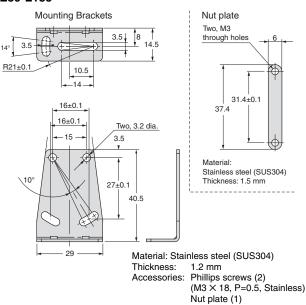
E39-L180

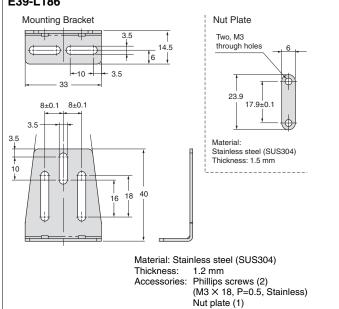


E39-L181

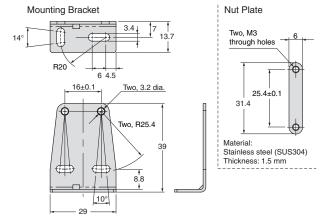


E39-L185





E39-L187

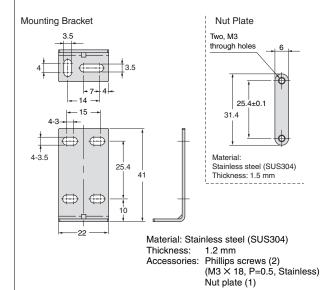


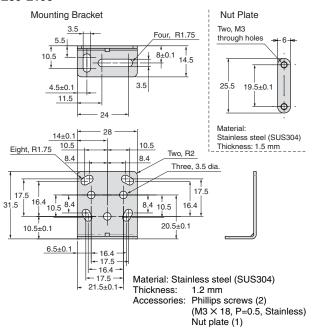
Material: Stainless steel (SUS304)

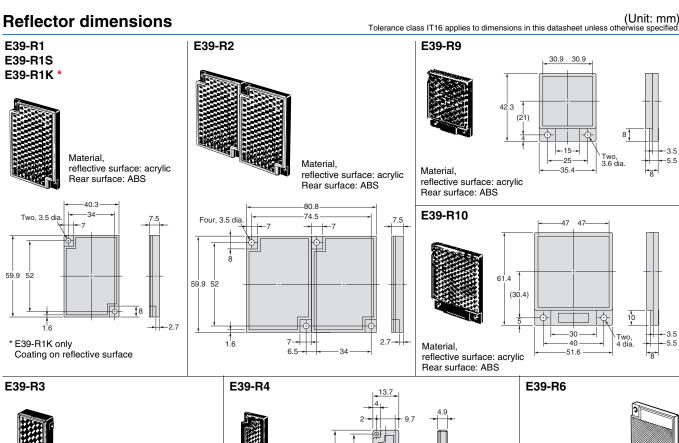
Thickness: 1.2 mm

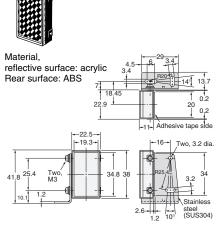
Accessories: Phillips screws (2) (M3 × 18, P=0.5, Stainless) Nut plate (1)

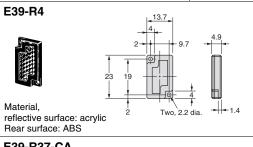
E39-L188

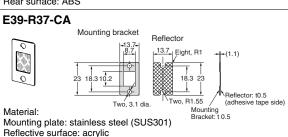












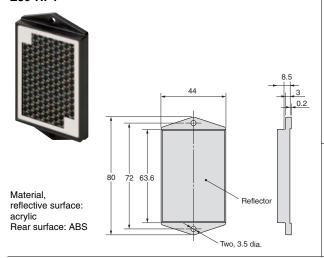


- 34

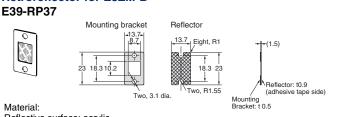
Material.

reflective surface: acrylic Rear surface: ABS

Retroreflector for E3ZM-B E39-RP1



Retroreflector for E3ZM-B

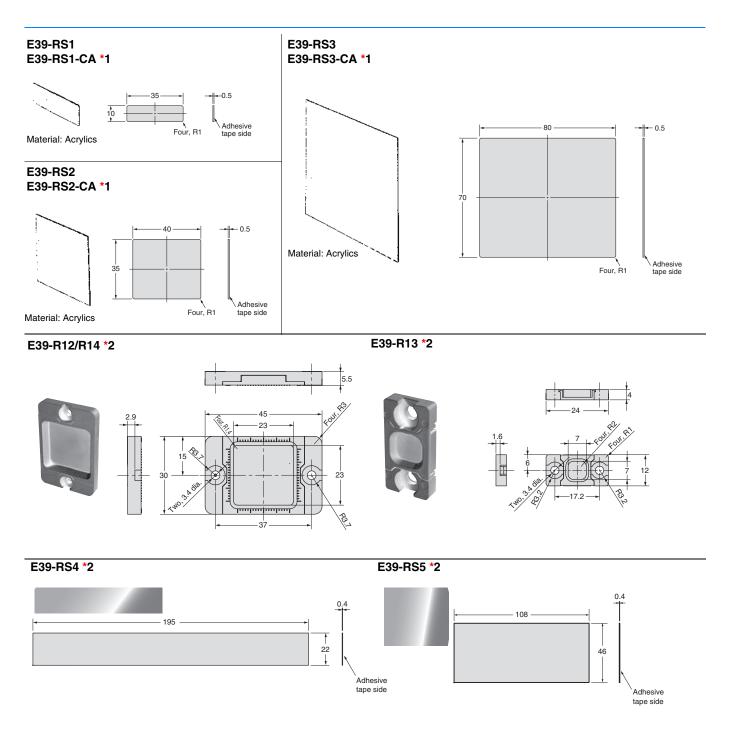


Reflective surface: acrylic Mounting plate: stainless steel (SUS301)

Note: The reflective plate and mounting plate (1) come as a set.

Retroreflector for E3ZM-B

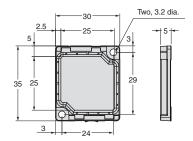
E39-RSP1



^{*1.} Models ending in the suffix "-CA" are reflectors only for E3T-SR4□.
*2. These Reflectors are for E3C-LDA-series Sensors. However, the E39-R12 can also be used with an E3Z-LR□ Retroreflective Laser Sensor.

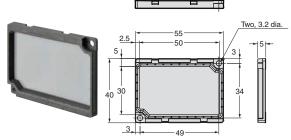
E39-R21 *3





Material, reflective surface: methacrylic resin (PMMA) Rear surface: Polybutylene terephthalate (PBT)

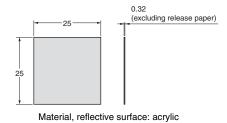
E39-R22 *3



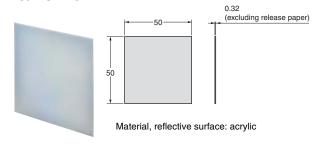
Material, reflective surface: methacrylic resin (PMMA) Rear surface: Polybutylene terephthalate (PBT)

E39-RS10 *3





E39-RS11 *3



^{*3.} Models only for E3NC-LH03

Terms and Conditions Agreement

Read and understand this catalog.

Please read and understand this catalog before purchasing the products. Please consult your OMRON representative if you have any questions or comments.

Warranties.

- (a) Exclusive Warranty. Omron's exclusive warranty is that the Products will be free from defects in materials and workmanship for a period of twelve months from the date of sale by Omron (or such other period expressed in writing by Omron). Omron disclaims all other warranties, express or implied.
- (b) Limitations. OMRON MAKES NO WARRANTY OR REPRESENTATION, EXPRESS OR IMPLIED, ABOUT NON-INFRINGEMENT, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OF THE PRODUCTS. BUYER ACKNOWLEDGES THAT IT ALONE HAS DETERMINED THAT THE

PRODUCTS WILL SUITABLY MEET THE REQUIREMENTS OF THEIR INTENDED USE.

Omron further disclaims all warranties and responsibility of any type for claims or expenses based on infringement by the Products or otherwise of any intellectual property right. (c) Buyer Remedy. Omron's sole obligation hereunder shall be, at Omron's election, to (i) replace (in the form originally shipped with Buyer responsible for labor charges for removal or replacement thereof) the non-complying Product, (ii) repair the non-complying Product, or (iii) repay or credit Buyer an amount equal to the purchase price of the non-complying Product; provided that in no event shall Omron be responsible for warranty, repair, indemnity or any other claims or expenses regarding the Products unless Omron's analysis confirms that the Products were properly handled, stored, installed and maintained and not subject to contamination, abuse, misuse or inappropriate modification. Return of any Products by Buyer must be approved in writing by Omron before shipment. Omron Companies shall not be liable for the suitability or unsuitability or the results from the use of Products in combination with any electrical or electronic components, circuits, system assemblies or any other materials or substances or environments. Any advice, recommendations or information given orally or in writing, are not to be construed as an amendment or addition to the above warranty.

See http://www.omron.com/global/ or contact your Omron representative for published information.

Limitation on Liability; Etc.

OMRON COMPANIES SHALL NOT BE LIABLE FOR SPECIAL, INDIRECT, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, LOSS OF PROFITS OR PRODUCTION OR COMMERCIAL LOSS IN ANY WAY CONNECTED WITH THE PRODUCTS, WHETHER SUCH CLAIM IS BASED IN CONTRACT, WARRANTY, NEGLIGENCE OR STRICT LIABILITY.

Further, in no event shall liability of Omron Companies exceed the individual price of the Product on which liability is asserted.

Suitability of Use.

Omron Companies shall not be responsible for conformity with any standards, codes or regulations which apply to the combination of the Product in the Buyer's application or use of the Product. At Buyer's request, Omron will provide applicable third party certification documents identifying ratings and limitations of use which apply to the Product. This information by itself is not sufficient for a complete determination of the suitability of the Product in combination with the end product, machine, system, or other application or use. Buyer shall be solely responsible for determining appropriateness of the particular Product with respect to Buyer's application, product or system. Buyer shall take application responsibility in all cases.

NEVER USE THE PRODUCT FOR AN APPLICATION INVOLVING SERIOUS RISK TO LIFE OR PROPERTY OR IN LARGE QUANTITIES WITHOUT ENSURING THAT THE SYSTEM AS A WHOLE HAS BEEN DESIGNED TO ADDRESS THE RISKS, AND THAT THE OMRON PRODUCT(S) IS PROPERLY RATED AND INSTALLED FOR THE INTENDED USE WITHIN THE OVERALL EQUIPMENT OR SYSTEM.

Programmable Products.

Omron Companies shall not be responsible for the user's programming of a programmable Product, or any consequence thereof.

Performance Data.

Data presented in Omron Company websites, catalogs and other materials is provided as a guide for the user in determining suitability and does not constitute a warranty. It may represent the result of Omron's test conditions, and the user must correlate it to actual application requirements. Actual performance is subject to the Omron's Warranty and Limitations of Liability.

Change in Specifications.

Product specifications and accessories may be changed at any time based on improvements and other reasons. It is our practice to change part numbers when published ratings or features are changed, or when significant construction changes are made. However, some specifications of the Product may be changed without any notice. When in doubt, special part numbers may be assigned to fix or establish key specifications for your application. Please consult with your Omron's representative at any time to confirm actual specifications of purchased Product.

<u>Errors and Omissions.</u> <u>Information presented by Omron Companies has been checked and is believed to be accurate; however, no responsibility is accurate.</u> assumed for clerical, typographical or proofreading errors or omissions.

2015.4

In the interest of product improvement, specifications are subject to change without notice.

