DATASHEET - E58-30RS18-HLP



Retroflective sensing sensor, Sn=18m, 4L, 10-30VDC, light, NPN, PNP, M30, metal, M12



Part no. E58-30RS18-HLP

Catalog No. 135691

Alternate Catalog

E58-30RS18-HLP

No.

(Norway)

EL-Nummer

0004315348

Delivery program

Basic function			Optical sensors
Dasic fulletion			Optical sensors
Product range			E58 Harsh Duty Series
For connection of:			Plug-in connection M12 x 1
Design (outer dimensions)		mm	M30 x 1.5
Rated operational voltage	U _e		10 - 30 V DC
Rated switching distance	S_n	mm	18000
Description			for combination with reflector
Connection			4-wire
Function			Reflex photoelectric sensor
Type of light			Visible red
Material			Stainless steel
Switching type			NPN PNP
Switching principle			Light switching

Information relevant for export to North America

Product Standards UL 508; CSA-C22.2 No. 14; IEC60947-5-2; CE marking

UL File No. E166051

UL Category Control No. NRKH, NRKH7

 $\ensuremath{\mathsf{CSA}}$ File No. UL report applies to both Canada and US

CSA Class No. -

North America Certification UL listed, certified by UL for use in Canada

Max. Voltage Rating 30 V DC

 $Degree \ of \ Protection \ IEC: IP68, IP69K; UL/CSA \ Type: 1, 2, 3, 3R, 3S, 4, 4x, 6, 6P, 12, 12K, 13 \\$

Technical data

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Standards			IEC/EN 60947-5-2
Ambient temperature			-40 - +55
Mechanical shock resistance		g	100 Shock duration 3 ms
Degree of Protection			IP69
Characteristics			
Rated switching distance			
Rated switching distance	S_n	mm	18000
Range		mm	18
Rated operational voltage	U _e		10 - 30 V DC
Maximum load current	I _e	mA	< 100
Response time		ms	1.6
Switching state display		LED	Red
Protective functions			Short-circuit protective device Protection against polarity reversal Protection against wire breakage
Connection			4-wire
Style			
Design (outer dimensions)		mm	M30 x 1.5
For connection of:			Plug-in connection M12 x 1

Design verification as per IEC/EN 61439

Technical data for design verification		
Operating ambient temperature min.	°C	-40
Operating ambient temperature max.	°C	55

Technical data ETIM 7.0

Technical data ETIM 7.0			
Sensors (EG000026) / Reflection light barrier (EC002717)			
Electric engineering, automation, process control engineering / Binary sensor (ecl@ss10.0.1-27-27-09-02 [AKP251013])	technology, safety-rela	ated s	ensor technology / Optoelectronic sensor / Reflection light barrier
Pre failure notice			No
With time function			No
Rated switching distance	mr	m	18000
Max. switching distance	mr	m	0
Max. output current	m/	Α	100
Reflector included			No
Analogue output 0 V 10 V			No
Analogue output 0 mA 20 mA			No
Analogue output 4 mA 20 mA			No
Analogue output -10 V +10 V			No
With other analogue output			No
Setting procedure			Other
With communication interface analogue			No
With communication interface AS-Interface			No
With communication interface CANOpen			No
With communication interface DeviceNet			No
With communication interface Ethernet			No
With communication interface INTERBUS			No
With communication interface PROFIBUS			No
With communication interface RS-232			No
With communication interface RS-422			No
With communication interface RS-485			No
With communication interface SSD			No
With communication interface SSI			No
Number of semiconductor outputs with signalling function			2
Number of contact energized outputs with signalling function			0
Number of protected semiconductor outputs			0
Number of protected contact energized outputs			0
Type of interface for safety communication			
Type of electric connection			Connector M12
Type of switching output			PNP/NPN
Type of switch function			Other
Operation agent-safety class			
Explosion safety category for gas			None
Explosion safety category for dust			None
Construction type housing			Cuboid
Width sensor	mr	m	0
Diameter sensor	mr	m	30
Height of sensor	mr	m	0
Length of sensor	mr	m	111
Sensing mode			Light switching
Material of optical surface			Glass
Material housing			Metal
Max. output current at protected output	mA	Α	0
Min. reflector distance	mr	m	0

Time of reaction ms 0 Transmission range of the safety field m 0 Switching frequency Hz 312 Type of safety acc. IEC 61496-1 "Switching voltage of OSSD at state "high" V 30 Rated control supply voltage Us at AC 50HZ V 0-0 Rated control supply voltage Us at AC 60HZ V 0-0 Rated control supply voltage Us at AC 60HZ V 0-0 Rated control supply voltage Us at AC 60HZ V 0-0 With monitoring function downstream switching devices DC V 10-30 With monitoring function class None Wavelength of the sensor None Wavelength of the sensor None With the sensor None With the sensor None With the sensor None With restart blockage Note None With restart blockage None With restart plockage None With restart plockage None None With restart plockage None None None None None None None None			
Transmission range of the safety field me Switching frequency Hz Type of safety acc. IEC 61496-1 Type of Safety acc. IEC 61496-1 Switching voltage of OSSD at state "high"** No Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at AC 60HZ No Rated control supply voltage Us at DC Voltage type With monitoring function downstream switching devices Laser protection class Wavelength of the sensor None Wavelength of the sensor Type of light Light dot With restart blockage Suitable for safety functions Degree of protection (IP) Rated Control supply voltage Us at AC 60HZ No Rated Control supply voltage Us at AC 60HZ V 0 - 0 0 -	Ambient temperature	°C	40 - 55
Switching frequency Type of safety acc. IEC 61496-1 Switching voltage of OSSD at state "high"" Switching voltage of OSSD at state "high"" Switching voltage Us at AC 50HZ Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at DC Voltage type With monitoring function downstream switching devices Laser protection class Wavelength of the sensor Inm Volter	Time of reaction	ms	0
Type of safety acc. IEC 61496-1 Switching voltage of OSSD at state "high" No - 0 Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 60HZ No - 0 Rated control supply voltage Us at AC 60HZ Voltage type With monitoring function downstream switching devices Laser protection class None Wavelength of the sensor Type of light Light dot mm² Other With restart blockage Suitable for safety functions No No No No No No No No No N	Transmission range of the safety field	m	0
Switching voltage of OSSD at state "high"" Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at DC V 10 - 30 Voltage type DC With monitoring function downstream switching devices Laser protection class Wavelength of the sensor None Type of light Light dot mm² 0 With restart blockage Suitable for safety functions Degree of protection (IP) P 30 0 - 0	Switching frequency	Hz	312
Rated control supply voltage Us at AC 50HZ Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at AC 60HZ V 0 - 0 Rated control supply voltage Us at DC Voltage type Voltage type With monitoring function downstream switching devices Laser protection class None Wavelength of the sensor Inpe of light Cight dot With restart blockage With restart blockage Suitable for safety functions Degree of protection (IP) V 0 - 0 C 0 C 0 C 0 C 0 C 0 C 0 C	Type of safety acc. IEC 61496-1		
Rated control supply voltage Us at AC 60HZ Rated control supply voltage Us at DC V 10 - 30 Voltage type DC With monitoring function downstream switching devices None Laser protection class Wavelength of the sensor mm 0 Type of light Light dot mm² 0 With restart blockage No Suitable for safety functions Degree of protection (IP) N 0 - 30 V 10 - 30 No No No No No In 10 - 30 No No No In 10 - 30 No No In 10 - 30 In 10 - 30 No In 10 - 30 In 1	"Switching voltage of OSSD at state ""high"""	V	30
Rated control supply voltage Us at DC Voltage type With monitoring function downstream switching devices Laser protection class Wavelength of the sensor Inm Other Light dot Min Pestart blockage With restart blockage Suitable for safety functions Degree of protection (IP) V 10 - 30 No 10 - 30 No No No No Inm Other No Inm Other Inm Inm Inm Inm Inm Inm Inm In	Rated control supply voltage Us at AC 50HZ	V	0 - 0
Voltage type With monitoring function downstream switching devices Laser protection class Wavelength of the sensor Inm Other Light dot With restart blockage Suitable for safety functions Degree of protection (IP) DC No No No No Pegree of protection (IP)	Rated control supply voltage Us at AC 60HZ	V	0 - 0
With monitoring function downstream switching devices Laser protection class None Wavelength of the sensor None Type of light Light dot With restart blockage Suitable for safety functions Degree of protection (IP) No None None None No Other No Other No IP67	Rated control supply voltage Us at DC	V	10 - 30
Laser protection class Wavelength of the sensor Inm Other Light dot Mith restart blockage Suitable for safety functions Degree of protection (IP) None None None None None Inm Other No IP67	Voltage type		DC
Wavelength of the sensor nm 0 Type of light Other Light dot mm² 0 With restart blockage No Suitable for safety functions No Degree of protection (IP) IP67	With monitoring function downstream switching devices		No
Type of light Light dot mm² 0 With restart blockage No Suitable for safety functions Degree of protection (IP) Other mm² 0 No IP67	Laser protection class		None
Light dot mm² 0 With restart blockage No Suitable for safety functions No Degree of protection (IP) IP67	Wavelength of the sensor	nm	0
With restart blockage No Suitable for safety functions No Degree of protection (IP) IP67	Type of light		Other
Suitable for safety functions No Degree of protection (IP) IP67	Light dot	mm²	0
Degree of protection (IP)	With restart blockage		No
	Suitable for safety functions		No
Degree of protection (NEMA) 4X	Degree of protection (IP)		IP67
	Degree of protection (NEMA)		4X

Approvals

UL 508; CSA-C22.2 No. 14; IEC60947-5-2; CE marking
E166051
NRKH, NRKH7
UL report applies to both Canada and US
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UL listed, certified by UL for use in Canada
30 V DC
IEC: IP68, IP69K; UL/CSA Type: 1, 2, 3, 3R, 3S, 4, 4x, 6, 6P, 12, 12K, 13

Dimensions

