

PN KEY ENGINEERING PN

E

4

6

2

X

X

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X

X

E - Packing without bag
W - Single Packing

Number of wires:
2 - 2 Wires + Earth

Cable type:
See Table

Head Colour:
G - Grey
N - Black
A - CSA-UL Black
B - CSA-UL Grey

Cable Length in[cm]
050 = 50cm
300 = 300cm
10K = 1000cm

Earth PIN location (see insert orientation table):
2 = Earth on H12
6 = Earth on H6

Wiring Configuration:
See sheet 3

Voltage and Led Colour

Red Led:	Green Led:	Yellow Led:
1 = 12V	A = 12V	G = 12V
2 = 24V	B = 24V	H = 24V
3 = 48V	C = 48V	K = 48V
4 = 115V	D = 115V	L = 115V
5 = 230V	E = 230V	M = 230V

Type of Gasket and Screw (see sheet 1):
1 = NBR Profile Gasket + Fixing Screw M3x25mm
2 = NBR Flat Gasket + Fixing Screw M3x25mm
3 = Silicone Profile Gasket + Fixing Screw M3x25mm
4 = Silicone Flat Gasket + Fixing Screw M3x25mm
P = NBR Integrated Gasket + Fixing Screw with Washer M3x27mm Assembled on Connector
R = NBR Integrated Gasket + Fixing Screw with Washer M3x27mm NOT Assembled on Connector
T = NBR Profile Gasket + Fixing Screw with Washer M3x27mm

CABLE TYPE	NO. OF WIRES	CROSS SECTION	CABLE O.D.	CABLE JACKET	UL	CSA	STATIC: TEMP. / BENDING RADIUS	DYNAMIC: TEMP. / BENDING RADIUS	SHIELD
A2	3	AWG 20	5.6mm±0.2	PVC BLACK	UL 2661	CSA C22.2	-30°C to +105°C, 10xO.D.	-5°C to +105°C, 15xO.D.	-
A3	3	AWG 18	6.5mm±0.25	PVC BLACK	UL 2661	CSA C22.2	-30°C to +105°C, 10xO.D.	-5°C to +105°C, 15xO.D.	-
B2	3	AWG 20	5.6mm±0.2	PUR BLACK	UL 20668	CSA C22.2	-40°C to +90°C, 5xO.D.	-25°C to +90°C, 10xO.D.	-
B3	3	AWG 18	6.5mm±0.2	PUR BLACK	UL 20668	CSA C22.2	-40°C to +90°C, 5xO.D.	-25°C to +90°C, 10xO.D.	-
F4	3	1mm²	7.1mm+0.2	PVC GREY	-	-	-15°C to +70°C, 10xO.D.	-5°C to +60°C, 15xO.D.	-
I0	3	1mm²	7.6mm±0.2	PVC GREY	-	-	-25°C to +70°C, 10xO.D.	-5°C to +70°C, 15xO.D.	YES
I2	3	0.5mm²	5.5mm+0.3	PVC GREY	-	-	-25°C to +70°C, 10xO.D.	-5°C to +70°C, 15xO.D.	-
I3	3	0.75mm²	6.0mm±0.2	PVC GREY	-	-	-25°C to +70°C, 10xO.D.	-5°C to +70°C, 15xO.D.	-
I4	3	1mm²	7.1mm+0.2	PVC GREY	-	-	-25°C to +70°C, 10xO.D.	-5°C to +70°C, 15xO.D.	-
N2	3	0.5mm²	5.6mm±0.7	PVC BLACK	-	-	-20°C to +70°C, 3xO.D.	-15°C to +70°C, 5xO.D.	-
N3	3	0.75mm²	6.8mm±0.8	PVC BLACK	-	-	-20°C to +70°C, 3xO.D.	-15°C to +70°C, 5xO.D.	-
N4	3	1mm²	7.15mm±0.85	PVC BLACK	-	-	-20°C to +70°C, 3xO.D.	-15°C to +70°C, 5xO.D.	-
P1	3	0.34mm²	5.3mm±0.2	PUR BLACK	-	-	-25°C to +80°C, 10xO.D.	-5°C to +80°C, 15xO.D.	
P2	3	0.5mm²	5.5mm+0.3	PUR BLACK	-	-	-40°C to +90°C, 7.5xO.D.	-15°C to +90°C, 12.5xO.D.	-
P3	3	0.75mm²	6.5mm±0.2	PUR BLACK	-	-	-40°C to +90°C, 7.5xO.D.	-15°C to +90°C, 12.5xO.D.	-

Notes:

1. Please see excel sheet 1210501000_PDP for currently configured part numbers.
2. Drawing is a replacement for: SD-121050-003

SYMBOLS	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX ELECTRONIC TECHNOLOGIES, LLC AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION					
	 = 0	<table><tr><td>DIMENSION UNITS</td><td>SCALE</td></tr><tr><td>mm</td><td>1:1</td></tr></table>	DIMENSION UNITS	SCALE	mm	1:1
	DIMENSION UNITS	SCALE				
	mm	1:1				
	 = 0	GENERAL TOLERANCES (UNLESS SPECIFIED)				
	 = 0					
 = 0	ANGULAR TOL ± °					
 = 0	4 PLACES ±					
 = 0	3 PLACES ±					
 = 0	2 PLACES ± 0.05					
 = 0	1 PLACE ± 0.1					
 = 0	0 PLACES ±					
= 0	DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS					
= 0	THIRD ANGLE PROJECTION					
	DRAWING					
	SERIES					
	MATERIAL NUMBER					
	CUSTOMER					
	SHEET NUMBER					

CURRENT REV DESC:

EC NO: 603741

DRWN: APAWLAK01 2018/07/16

CHK'D: RSILLER 2018/08/31

APPR: RSILLER 2018/08/31

INITIAL REVISION:

DRWN: APAWLAK01 2018/07/16

APPR: RSILLER 2018/08/31

molex

STANDARD E462 DIN FORM INDUSTRIAL

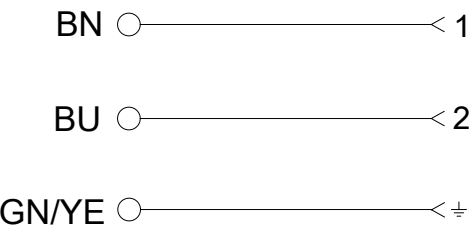
PRODUCT CUSTOMER DRAWING

DOCUMENT NUMBER	DOC TYPE	DOC PART	REVISION
1210501000	PSD	000	A

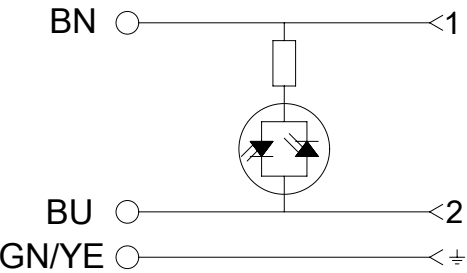
A3-SIZE	121050	SEE 1210501000_PDP	GENERAL MARKET	2 OF 3
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WIRING DIAGRAMS

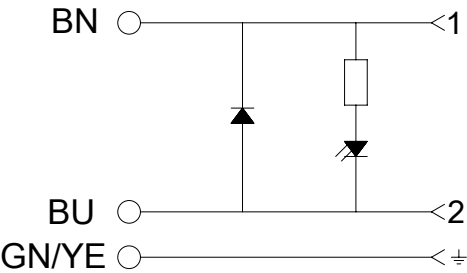
ELECTRICAL DIAGRAM 00



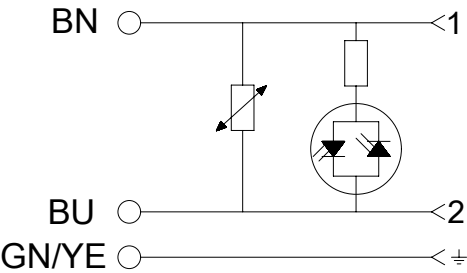
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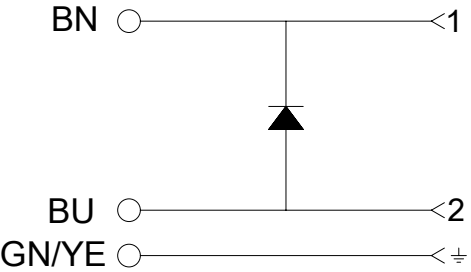
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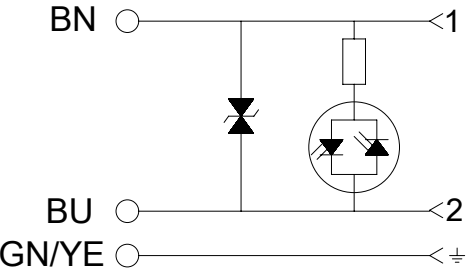
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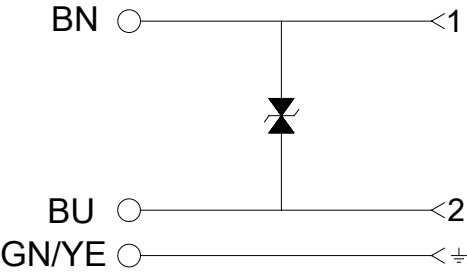
ELECTRICAL DIAGRAM E0



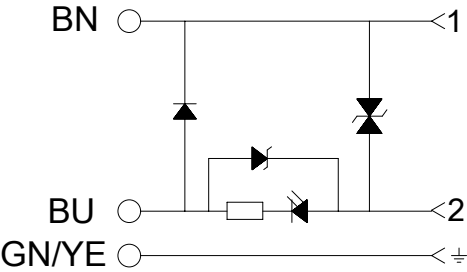
ELECTRICAL DIAGRAM S0



ELECTRICAL DIAGRAM S1



ELECTRICAL DIAGRAM NS



Technical Spec:
Supply Voltage: See PN KEY
Max. current: 5A; A1-C4-S0
1,5A; R2
Contact Resistance: ≤15milliohms max.
Operating Temperature:
with NBR Gasket: -40°C +90°C
with Silicone: -40°C +125°C

SYMBOLS	THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX ELECTRONIC TECHNOLOGIES, LLC AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION										
 = 0	DIMENSION UNITS		SCALE		CURRENT REV DESC:			molex			
	mm		1:1								
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 = 0											
 = 0	ANGULAR TOL ± °				DRWN: APAWLAK01 2018/07/16			PRODUCT CUSTOMER DRAWING			
 = 0	4 PLACES ±										
 = 0	3 PLACES ±				APPR: RSILLER 2018/08/31						
 = 0	2 PLACES ± 0.05							INITIAL REVISION:			DOCUMENT NUMBER
 = 0	1 PLACE ± 0.1				DRWN: APAWLAK01 2018/07/16						
 = 0	0 PLACES ±							APPR: RSILLER 2018/08/31			DOC PART
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= 0	MUST REMAIN WITHIN DIMENSIONS										1210501000
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= 0								SERIES			000
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= 0								121050			MATERIAL NUMBER
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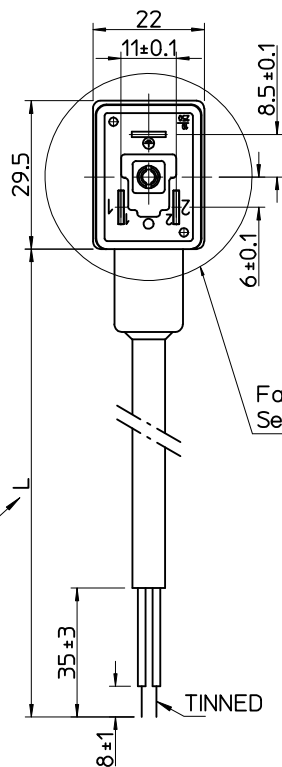
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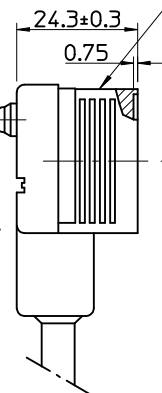
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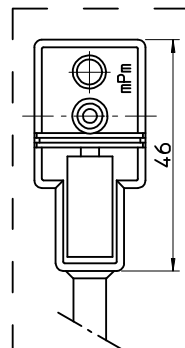


Screw and gasket,
see sheet 2, PN Key

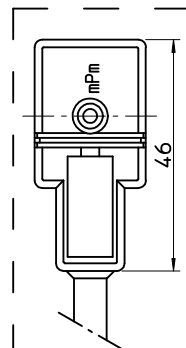
CIRCUIT PRINTOUT/WHITE



View for H12



View for H6



View without LED

INSERT ORIENTATION

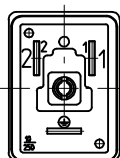
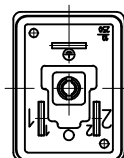
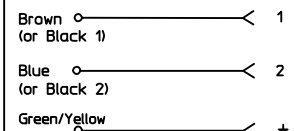
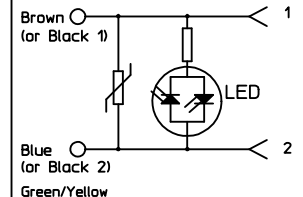
EARTH PIN ON 12H
E462XXXXXX2XXXXEARTH PIN ON 6H
E462XXXXXX6XXXX

Table of length tolerances [mm]

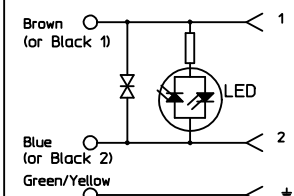
Over	Up to and including	Tolerance (+)
0	1000	±20
1000	3000	±30
3000	5000	±40
5000	10000	±50
10000	15000	±100
15000	20000	±150
20000		±L/100

ELECTRICAL DIAGRAM [00]
WITHOUT LED

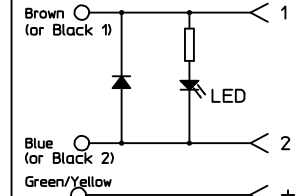
ELECTRICAL DIAGRAM [C4]



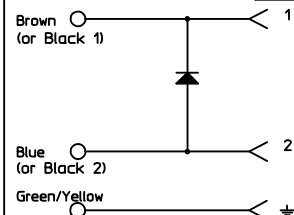
ELECTRICAL DIAGRAM [S0]



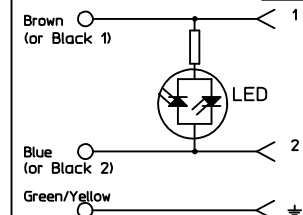
ELECTRICAL DIAGRAM [C3]



ELECTRICAL DIAGRAM [E0]



ELECTRICAL DIAGRAM [A1]



DRAWING UPDATED EC NO: IPG2013-1493 DRWN:MDYSZEWSKA 2013/03/27 CHKD: JMARSZALEK 2013/03/27 APPR:MIWASIECZKO 2013/03/28	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE	SCALE	DESIGN UNITS	FIRST ANGLE PROJECTION
	▽=0	mm INCH	MM ONLY		METRIC	
	▽=0					

4 PLACES	±---	±---
3 PLACES	±---	±---
2 PLACES	±---	±---
1 PLACE	±---	±---
0 PLACE	±---	±---
ANGULAR ±---°		
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		

DRAWN BY	DATE
JMARSZALEK	2012/10/31
CHECKED BY	DATE
MSZWAJKOWSKI	2012/10/31
APPROVED BY	DATE
MIWASIECZKO	2012/11/09
MATERIAL NO.	
MATRIX DRAWING	
THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION	

TITLE	E462XXXXXXXXXX FORM INDUSTRIAL
DOCUMENT NO.	SD-121050-003
SHEET NO.	1 OF 4

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1

	10	9	8	7	6	5	4	3	2	1		
F	E	4	6	2	X	X	X	X	X	X	X	F
	E - Packing without bags W - Single packing Q - Quick packing											
E	NUMBER OF WIRES: 1=2 WIRES 2=2 WIRES + EARTH											
	CABLE TYPE SEE TABLE 1											
	CABLE CROSS SECTION AREA SEE TABLE 2											
	HEAD COLOUR: G=GREY; N=BLACK; T=TRANSPARENT; A=CSA-UL BLACK; B=CSA-UL GREY.											
D	CABLE LENGHT IN CM Eg:050=50 CM, 300=300 CM, 10K=1000 CM.											
	EARTH PIN LOCATION: 2=EARTH ON 12H, 6=EARTH ON 6H.											
	GASKET SCREWS: 1=NBR PROFILE GASKET+FIXING SCREWS (M3x25 mm). 2=NBR FLAT GASKET+SCREW (M3x25 mm). 3=SILICONE PROFILE GASKET+SCREW (M3x25 mm). 4=SILICON FLAT GASKET+SCREW (M3x25 mm). P=INTEGRATED GASKET+FIXING SCREW+GROMMET (M3x27 mm). R=INTAGRATED GASKET+SCREW+GROMMET (M3x27 mm). T=PROFILE GASKET+SCREW+GROMMET (M3x27 mm).											
C	INTERNAL CIRCUIT WIRING CONFIGURATION											
	VOLTAGE AND LED COLOUR: 1= 12V 2= 24V 3= 48V 4= 115V 5= 230V A= 12V B= 24V C= 48V D= 115V E= 230V G= 12V H= 24V K= 48V L= 115V M= 230V RED LED GREEN LED YELLOW LED											
B												
A												
ib_frame_A3_P_AM_F Rev E1 2012/01/25												

DRAWING UPDATED EC NO: IPG2013-1493 DRWN:MDYSZEWSKA 2013/03/27 CHKD:JMARSZALEK 2013/03/27 APPR:MIWASIECZKO 2013/03/28	DESCRIPTION REV	QUALITY SYMBOLS ▽=0 ◻=0	GENERAL TOLERANCES (UNLESS SPECIFIED)		DIMENSION STYLE MM ONLY		SCALE 1:1	DESIGN UNITS METRIC	FIRST ANGLE PROJECTION				
			mm	INCH	DRAWN BY JMARSZALEK	DATE 2012/10/31	TITLE E462XXXXXXXXXX FORM INDUSTRIAL						
					CHECKED BY MSZWAJKOWSKI	DATE 2012/10/31							
							APPROVED BY MIWASIECZKO	DATE 2012/11/09	DOCUMENT NO. SD-121050-003				
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS			SIZE A3		THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION								

9	8	7	6	5	4	3	2	1
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TABLE 2 - CABLES

Molex PN	mPm	Code	Wires	Cross Section	Material	Color	Diameter Ø	DIN A-B	DIN C
1210180080	I	0	3	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180467	A	2	2	20 AWG	PVC CSA/UL 2661	Black	5,5+/-0,2 mm	OK.	OK.
-	A	2	3	20 AWG	PVC CSA/UL 2661	Black	5,6+/-0,2 mm	OK.	OK.
1210180394	A	2	4	20 AWG	PVC CSA/UL 2661	Black	6,2+/-0,2 mm	OK.	OK.
-	A	2	5	20 AWG	PVC CSA/UL 2661	Black	7+/-0,2 mm	OK.	-
1210180297	B	2	2	20 AWG	PUR CSA/UL 20668	Black	5,5+/-0,2 mm	OK.	OK.
1210180126	B	2	3	20 AWG	PUR CSA/UL 20668	Black	5,6+/-0,2 mm	OK.	OK.
1210180367	B	2	4	20 AWG	PUR CSA/UL 20668	Black	6,2+/-0,2 mm	OK.	OK.
-	B	2	5	20 AWG	PUR CSA/UL 20668	Black	7+/-0,2 mm	OK.	-
1210180122	D	2	3	0,5 mm2	PVC TI2 CEI 20-20	Grey	-	-	-
-	F	2	3	0,5 mm2	CNOMO	Grey RAL7000	5,5+/-0,2 mm	OK.	OK.
1210180047	I	2	2	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	5,5+/-0,2 mm	OK.	OK.
-	I	2	3	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	5,5+/-0,2 mm	OK.	OK.
1210180146	I	2	4	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	6,5+/-0,2 mm	OK.	-
1210180177	I	2	5	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7+/-0,2 mm	OK.	-
1210180022	N	2	2	0,5 mm2	PVCH03	Black	5,1+ 0,2-0 mm	OK.	OK.
1210180064	N	2	3	0,5 mm2	PVCH03	Black	5,4+ 0,2-0 mm	OK.	OK.
1210180153	N	2	4	0,5 mm2	PVCH03	Black	5,75+0,2-0 mm	OK.	OK.
1210180046	P	2	2	0,5 mm2	PUR - BLEND	Black	5,5+/-0,2 mm	OK.	OK.
-	P	2	3	0,5 mm2	PUR - BLEND	Black	5,6+/-0,2 mm	OK.	OK.
1210180302	P	2	4	0,5 mm2	PUR - BLEND	Black	-	-	-
-	P	2	5	0,5 mm2	PUR - BLEND	Black	7+/-0,2 mm	OK.	OK.
1210180409	A	3	2	18 AWG	PVC CSA/UL 2661	Black	6,5+/-0,2 mm	OK.	-
1210180129	A	3	3	18 AWG	PVC CSA/UL 2661	Black	6,5+/-0,2 mm	OK.	-
1210180159	A	3	4	18 AWG	PVC CSA/UL 2661	Black	7+/-0,2 mm	OK.	-
-	A	3	5	18 AWG	PVC CSA/UL 2661	Black	7,8+/-0,2 mm	OK.	-
1210180351	B	3	2	18 AWG	PUR CSA/UL 20668	Black	6,5+/-0,2 mm	OK.	-
1210180127	B	3	3	18 AWG	PUR CSA/UL 20668	Black	6,5+/-0,2 mm	OK.	-
1210180127	B	3	4	18 AWG	PUR CSA/UL 20668	Black	7+/-0,2 mm	OK.	-
-	B	3	5	18 AWG	PUR CSA/UL 20668	Black	7,8+/-0,2 mm	OK.	-
1210180073	D	3	3	0,75 mm2	PVC TI2 CEI 20-20	Grey	-	-	-
1210180145	D	3	4	0,75 mm2	PVC TI2 CEI 20-20	Grey	-	-	-
1210180120	I	3	3	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180143	I	3	4	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180032	N	3	2	0,75 mm2	PVCH05	Black	6,2+ 0,2-0 mm	OK.	-
1210180069	N	3	3	0,75 mm2	PVCH05	Black	6,6+0,2-0 mm	OK.	-
-	N	3	4	0,75 mm2	PVCH05	Black	7,15+0,2-0 mm	OK.	-
1210180174	N	3	5	0,75 mm2	PVCH05	Black	8,0+0,2-0 mm	OK.	-
-	P	3	2	0,75 mm2	PUR - BLEND	Black	6,5+/-0,2 mm	OK.	-

E

D

C

B

A

F

E

D

C

B

A

TABLE 2 - CABLES

Molex PN	mPm	Code	Wires	Cross Section	Material	Color	Diameter Ø	DIN A-B	DIN C
1210180071	P	3	3	0,75 mm2	PUR - BLEND	Black	6,5+/-0,2 mm	OK.	-
1210180152	P	3	4	0,75 mm2	PUR - BLEND	Black	7+/-0,2 mm	OK.	-
1210180384	R	3	3	0,75 mm2	TPR HAL. FREE	Black	8,5+/-0,2 mm	OK.	-
1210180094	T	3	3	0,75 mm2	PUR CSA/UL	Yellow	-	-	-
1210180309	Y	3	3	0,75 mm2	SIL/0300	Red	6,5+/-0,2 mm	-	-
1210180081	F	4	3	1 mm2	CNOMO	Grey RAL7000	-	-	-
-	F	4	4	1 mm2	CNOMO	Grey RAL7000	7,1+0,2-0 mm	OK.	-
1210180042	I	4	2	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7,1+0,2-0 mm	OK.	-
1210180079	I	4	3	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7,1+0,2-0 mm	OK.	-
1210180036	N	4	2	1 mm2	PVCH05	Black	6,5+0,2-0 mm	OK.	-
1210180082	N	4	3	1 mm2	PVCH05	Black	6,9+0,2-0 mm	OK.	-
1210180117	R	4	3	1 mm2	TPR HAL. FREE	Black	-	-	-
1210180085	N	5	3	1,5 mm2	PVCH05	Black	8,3+0,2-0 mm	OK.	-
1210180313	I	6	2	0,35 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
-	A	7	3	20 AWG	PVC CSA/UL 2661	Yellow	5,6+/-0,2 mm	OK.	OK.
1210180149	I	9	4	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-

TABLE 1 - CABLES TYPE

Code	Cable types	Features	Stranding
N	PVC	Application general purpose cable which has good resistance to water, but usually poor oil resistance.	0,5 mm2 = 15 x 0,20 0,75 mm2 = 21 x 0,20 1 mm2 = 28 x 0,20
I	CEI	Approved to IEC 332-2A, flame retardant and self extinguishing. Limited resistant to mineral oils.	0,5 mm2 = 28 x 0,15 0,75 mm2 = 42 x 0,15 1 mm2 = 32 x 0,20
P	PUR	Offer good resistance to oil and chemicals. Can swell when constantly immersed in water.	0,5 mm2 = 28 x 0,15 0,75 mm2 = 42 x 0,15 1 mm2 = 32 x 0,20
A	PVC CSA-UL	Approved to CSA-UL 2661, application general purpose cable which has good resistance to water, but usually poor oil resistance.	20 AWG = 32 x 0,15 18 AWG = 52 x 0,15
B	PUR CSA-UL	Approved to CSA-UL 20668, very good resistance to oil and chemicals.	20 AWG = 32 x 0,15 18 AWG = 52 x 0,15

DRAWING UPDATED
EC NO: IPG2013-1493
DRWN:MD/SZEMSKA 2013/03/27
CHKD:JMARSZALEK 2013/03/27
APPR:MIWASIECZKO 2013/03/28

DESCRIPTION

REV

QUALITY SYMBOLS

▽=0
◻=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± ---
2 PLACES	± ---	± ---
1 PLACE	± ---	± ---
0 PLACE	± ---	± ---

ANGULAR ±---°

DRAFT WHERE APPLICABLE
MUST REMAIN
WITHIN DIMENSIONS

DIMENSION STYLE
MM ONLY

DRAWN BY	DATE
JMARSZALEK	2012/10/31
CHECKED BY	DATE
MSZWAJKOWSKI	2012/10/31
APPROVED BY	DATE
MIWASIECZKO	2012/11/09

MATERIAL NO.

MATRIX DRAWING

SIZE
A3

THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX
INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION

SCALE
1:1

DESIGN UNITS
METRIC

FIRST ANGLE
PROJECTION

TITLE
E462XXXXXXXXXX
FORM INDUSTRIAL

molex

DOCUMENT NO.
SD-121050-003

SHEET NO.
3 OF 4

10

9

8

7

6

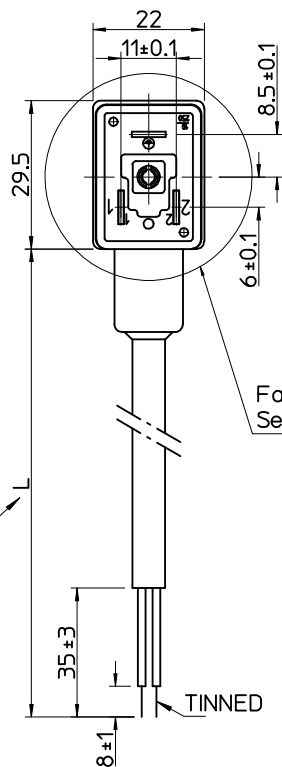
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4

3

2

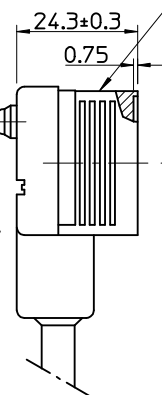
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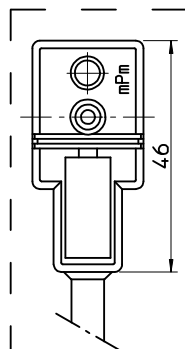
Screw and gasket,
see sheet 2, PN Key

Face View
See Insert Orientation

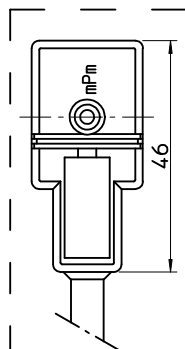
CIRCUIT PRINTOUT/WHITE



View for H12



View for H6



View without LED

INSERT ORIENTATION

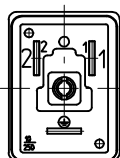
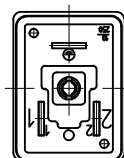
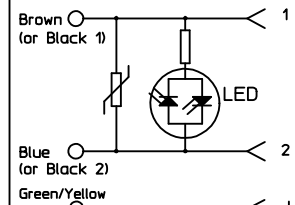
EARTH PIN ON 12H
E462XXXXXX2XXXXEARTH PIN ON 6H
E462XXXXXX6XXXX

Table of length tolerances [mm]

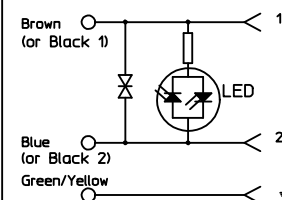
Over	Up to and including	Tolerance (+)
0	1000	±20
1000	3000	±30
3000	5000	±40
5000	10000	±50
10000	15000	±100
15000	20000	±150
20000		±L/100

ELECTRICAL DIAGRAM [00]
WITHOUT LED

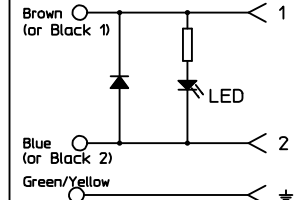
ELECTRICAL DIAGRAM [C4]



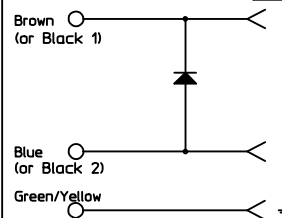
ELECTRICAL DIAGRAM [S0]



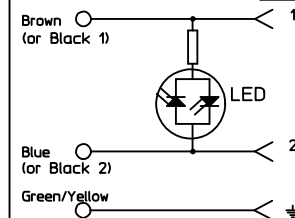
ELECTRICAL DIAGRAM [C3]



ELECTRICAL DIAGRAM [E0]



ELECTRICAL DIAGRAM [A1]



DRAWING UPDATED EC NO: IPG2013-1493 DRWN:MDYSZEWSKA 2013/03/27 CHKD: JMARSZALEK 2013/03/27 APPR:MIWASIECZKO 2013/03/28	QUALITY SYMBOLS	GENERAL TOLERANCES (UNLESS SPECIFIED)	DIMENSION STYLE	SCALE	DESIGN UNITS	FIRST ANGLE PROJECTION
	▽=0	mm INCH	MM ONLY		METRIC	
	▽=0					

4 PLACES	±---	±---
3 PLACES	±---	±---
2 PLACES	±---	±---
1 PLACE	±---	±---
0 PLACE	±---	±---
ANGULAR ±---°		
DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS		

DRAWN BY	DATE
JMARSZALEK	2012/10/31
CHECKED BY	DATE
MSZWAJKOWSKI	2012/10/31
APPROVED BY	DATE
MIWASIECZKO	2012/11/09
MATERIAL NO.	
MATRIX DRAWING	
THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION	

TITLE	E462XXXXXXXXXX FORM INDUSTRIAL
DOCUMENT NO.	SD-121050-003
SHEET NO.	1 OF 4

9

8

7

6

5

4

3

2

1

	10	9	8	7	6	5	4	3	2	1		
F	E	4	6	2	X	X	X	X	X	X	X	F
	E - Packing without bags W - Single packing Q - Quick packing											
E	NUMBER OF WIRES: 1=2 WIRES 2=2 WIRES + EARTH											
	CABLE TYPE SEE TABLE 1											
	CABLE CROSS SECTION AREA SEE TABLE 2											
	HEAD COLOUR: G=GREY; N=BLACK; T=TRANSPARENT; A=CSA-UL BLACK; B=CSA-UL GREY.											
D	CABLE LENGHT IN CM Eg:050=50 CM, 300=300 CM, 10K=1000 CM.											
	EARTH PIN LOCATION: 2=EARTH ON 12H, 6=EARTH ON 6H.											
	GASKET SCREWS: 1=NBR PROFILE GASKET+FIXING SCREWS (M3x25 mm). 2=NBR FLAT GASKET+SCREW (M3x25 mm). 3=SILICONE PROFILE GASKET+SCREW (M3x25 mm). 4=SILICON FLAT GASKET+SCREW (M3x25 mm). P=INTEGRATED GASKET+FIXING SCREW+GROMMET (M3x27 mm). R=INTAGRATED GASKET+SCREW+GROMMET (M3x27 mm). T=PROFILE GASKET+SCREW+GROMMET (M3x27 mm).											
C	INTERNAL CIRCUIT WIRING CONFIGURATION											
	VOLTAGE AND LED COLOUR: 1= 12V 2= 24V 3= 48V 4= 115V 5= 230V A= 12V B= 24V C= 48V D= 115V E= 230V G= 12V H= 24V K= 48V L= 115V M= 230V RED LED GREEN LED YELLOW LED											
B												
A												
DRAWING UPDATED EC NO: IPG2013-1493 DRWN:MDYSZEWSKA 2013/03/27 CHKD:JMARSZALEK 2013/03/27 APPR:MIWASIECZKO 2013/03/28 DESCRIPTION REV B QUALITY SYMBOLS =0 =0 GENERAL TOLERANCES (UNLESS SPECIFIED) mm INCH 4 PLACES ± --- ± --- 3 PLACES ± --- ± --- 2 PLACES ± --- ± --- 1 PLACE ± --- ± --- 0 PLACE ± --- ± --- ANGULAR ± --- ° DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS DIMENSION STYLE MM ONLY DRAWN BY DATE JMARSZALEK 2012/10/31 CHECKED BY DATE MSZWAJKOWSKI 2012/10/31 APPROVED BY DATE MIWASIECZKO 2012/11/09 MATERIAL NO. MATRIX DRAWING SCALE 1:1 DESIGN UNITS METRIC FIRST ANGLE PROJECTION TITLE E462XXXXXXXXXX FORM INDUSTRIAL molex DOCUMENT NO. SD-121050-003 SHEET NO. 2 OF 4 THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION												
tb_frame_A3_P_AM_F Rev E1 2012/01/25	9	8	7	6	5	4	3	2	1			

F

TABLE 2 - CABLES

Molex PN	mPm	Code	Wires	Cross Section	Material	Color	Diameter Ø	DIN A-B	DIN C
1210180080	I	0	3	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180467	A	2	2	20 AWG	PVC CSA/UL 2661	Black	5,5+/-0,2 mm	OK.	OK.
-	A	2	3	20 AWG	PVC CSA/UL 2661	Black	5,6+/-0,2 mm	OK.	OK.
1210180394	A	2	4	20 AWG	PVC CSA/UL 2661	Black	6,2+/-0,2 mm	OK.	OK.
-	A	2	5	20 AWG	PVC CSA/UL 2661	Black	7+/-0,2 mm	OK.	-
1210180297	B	2	2	20 AWG	PUR CSA/UL 20668	Black	5,5+/-0,2 mm	OK.	OK.
1210180126	B	2	3	20 AWG	PUR CSA/UL 20668	Black	5,6+/-0,2 mm	OK.	OK.
1210180367	B	2	4	20 AWG	PUR CSA/UL 20668	Black	6,2+/-0,2 mm	OK.	OK.
-	B	2	5	20 AWG	PUR CSA/UL 20668	Black	7+/-0,2 mm	OK.	-
1210180122	D	2	3	0,5 mm2	PVC T12 CEI 20-20	Grey	-	-	-
-	F	2	3	0,5 mm2	CNOMO	Grey RAL7000	5,5+/-0,2 mm	OK.	OK.
1210180047	I	2	2	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	5,5+/-0,2 mm	OK.	OK.
-	I	2	3	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	5,5+/-0,2 mm	OK.	OK.
1210180146	I	2	4	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	6,5+/-0,2 mm	OK.	-
1210180177	I	2	5	0,5 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7+/-0,2 mm	OK.	-
1210180022	N	2	2	0,5 mm2	PVCH03	Black	5,1+ 0,2-0 mm	OK.	OK.
1210180064	N	2	3	0,5 mm2	PVCH03	Black	5,4+ 0,2-0 mm	OK.	OK.
1210180153	N	2	4	0,5 mm2	PVCH03	Black	5,75+0,2-0 mm	OK.	OK.
1210180046	P	2	2	0,5 mm2	PUR - BLEND	Black	5,5+/-0,2 mm	OK.	OK.
-	P	2	3	0,5 mm2	PUR - BLEND	Black	5,6+/-0,2 mm	OK.	OK.
1210180302	P	2	4	0,5 mm2	PUR - BLEND	Black	-	-	-
-	P	2	5	0,5 mm2	PUR - BLEND	Black	7+/-0,2 mm	OK.	OK.
1210180409	A	3	2	18 AWG	PVC CSA/UL 2661	Black	6,5+/-0,2 mm	OK.	-
1210180129	A	3	3	18 AWG	PVC CSA/UL 2661	Black	6,5+/-0,2 mm	OK.	-
1210180159	A	3	4	18 AWG	PVC CSA/UL 2661	Black	7+/-0,2 mm	OK.	-
-	A	3	5	18 AWG	PVC CSA/UL 2661	Black	7,8+/-0,2 mm	OK.	-
1210180351	B	3	2	18 AWG	PUR CSA/UL 20668	Black	6,5+/-0,2 mm	OK.	-
1210180127	B	3	3	18 AWG	PUR CSA/UL 20668	Black	6,5+/-0,2 mm	OK.	-
1210180127	B	3	4	18 AWG	PUR CSA/UL 20668	Black	7+/-0,2 mm	OK.	-
-	B	3	5	18 AWG	PUR CSA/UL 20668	Black	7,8+/-0,2 mm	OK.	-
1210180073	D	3	3	0,75 mm2	PVC T12 CEI 20-20	Grey	-	-	-
1210180145	D	3	4	0,75 mm2	PVC T12 CEI 20-20	Grey	-	-	-
1210180120	I	3	3	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180143	I	3	4	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
1210180032	N	3	2	0,75 mm2	PVCH05	Black	6,2+ 0,2-0 mm	OK.	-
1210180069	N	3	3	0,75 mm2	PVCH05	Black	6,6+0,2-0 mm	OK.	-
-	N	3	4	0,75 mm2	PVCH05	Black	7,15+0,2-0 mm	OK.	-
1210180174	N	3	5	0,75 mm2	PVCH05	Black	8,0+0,2-0 mm	OK.	-
-	P	3	2	0,75 mm2	PUR - BLEND	Black	6,5+/-0,2 mm	OK.	-

E

D

C

B

A

TABLE 2 - CABLES

Molex PN	mPm	Code	Wires	Cross Section	Material	Color	Diameter Ø	DIN A-B	DIN C
1210180071	P	3	3	0,75 mm2	PUR - BLEND	Black	6,5+/-0,2 mm	OK.	-
1210180152	P	3	4	0,75 mm2	PUR - BLEND	Black	7+/-0,2 mm	OK.	-
1210180384	R	3	3	0,75 mm2	TPR HAL. FREE	Black	8,5+/-0,2 mm	OK.	-
1210180094	T	3	3	0,75 mm2	PUR CSA/UL	Yellow	-	-	-
1210180309	Y	3	3	0,75 mm2	SIL/0300	Red	6,5+/-0,2 mm	-	-
1210180081	F	4	3	1 mm2	CNOMO	Grey RAL7000	-	-	-
-	F	4	4	1 mm2	CNOMO	Grey RAL7000	7,1+0,2-0 mm	OK.	-
1210180042	I	4	2	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7,1+0,2-0 mm	OK.	-
1210180079	I	4	3	1 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	7,1+0,2-0 mm	OK.	-
1210180036	N	4	2	1 mm2	PVCH05	Black	6,5+0,2-0 mm	OK.	-
1210180082	N	4	3	1 mm2	PVCH05	Black	6,9+0,2-0 mm	OK.	-
1210180117	R	4	3	1 mm2	TPR HAL. FREE	Black	-	-	-
1210180085	N	5	3	1,5 mm2	PVCH05	Black	8,3+0,2-0 mm	OK.	-
1210180313	I	6	2	0,35 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-
-	A	7	3	20 AWG	PVC CSA/UL 2661	Yellow	5,6+/-0,2 mm	OK.	OK.
1210180149	I	9	4	0,75 mm2	PVC CEI 2022 II O.R.	Grey RAL7035	-	-	-

F

E

D

C

B

A

TABLE 1 - CABLES TYPE

Code	Cable types	Features	Stranding
N	PVC	Application general purpose cable which has good resistance to water, but usually poor oil resistance.	0,5 mm2 = 15 x 0,20 0,75 mm2 = 21 x 0,20 1 mm2 = 28 x 0,20
I	CEI	Approved to IEC 332-2A, flame retardant and self extinguishing. Limited resistant to mineral oils.	0,5 mm2 = 28 x 0,15 0,75 mm2 = 42 x 0,15 1 mm2 = 32 x 0,20
P	PUR	Offer good resistance to oil and chemicals. Can swell when constantly immersed in water.	0,5 mm2 = 28 x 0,15 0,75 mm2 = 42 x 0,15 1 mm2 = 32 x 0,20
A	PVC CSA-UL	Approved to CSA-UL 2661, application general purpose cable which has good resistance to water, but usually poor oil resistance.	20 AWG = 32 x 0,15 18 AWG = 52 x 0,15
B	PUR CSA-UL	Approved to CSA-UL 20668, very good resistance to oil and chemicals.	20 AWG = 32 x 0,15 18 AWG = 52 x 0,15

DRAWING UPDATED
EC NO: IPG2013-1493
DRWN:MD/SZEMSKA 2013/03/27
CHKD:JMARSZALEK 2013/03/27
APPR:MIWASIECZKO 2013/03/28

DESCRIPTION

REV

QUALITY SYMBOLS

▽=0
◻=0

GENERAL TOLERANCES (UNLESS SPECIFIED)

	mm	INCH
4 PLACES	± ---	± ---
3 PLACES	± ---	± ---
2 PLACES	± ---	± ---
1 PLACE	± ---	± ---
0 PLACE	± ---	± ---

ANGULAR ±---°

DRAFT WHERE APPLICABLE MUST REMAIN WITHIN DIMENSIONS

DIMENSION STYLE
MM ONLY

DRAWN BY	DATE
JMARSZALEK	2012/10/31
CHECKED BY	DATE
MSZWAJKOWSKI	2012/10/31
APPROVED BY	DATE
MIWASIECZKO	2012/11/09

MATERIAL NO.

MATRIX DRAWING

SIZE
A3

THIS DRAWING CONTAINS INFORMATION THAT IS PROPRIETARY TO MOLEX INCORPORATED AND SHOULD NOT BE USED WITHOUT WRITTEN PERMISSION

SCALE
1:1

DESIGN UNITS
METRIC

FIRST ANGLE PROJECTION

TITLE
E462XXXXXXXXXX
FORM INDUSTRIAL

molex

DOCUMENT NO.
SD-121050-003

SHEET NO.
3 OF 4

