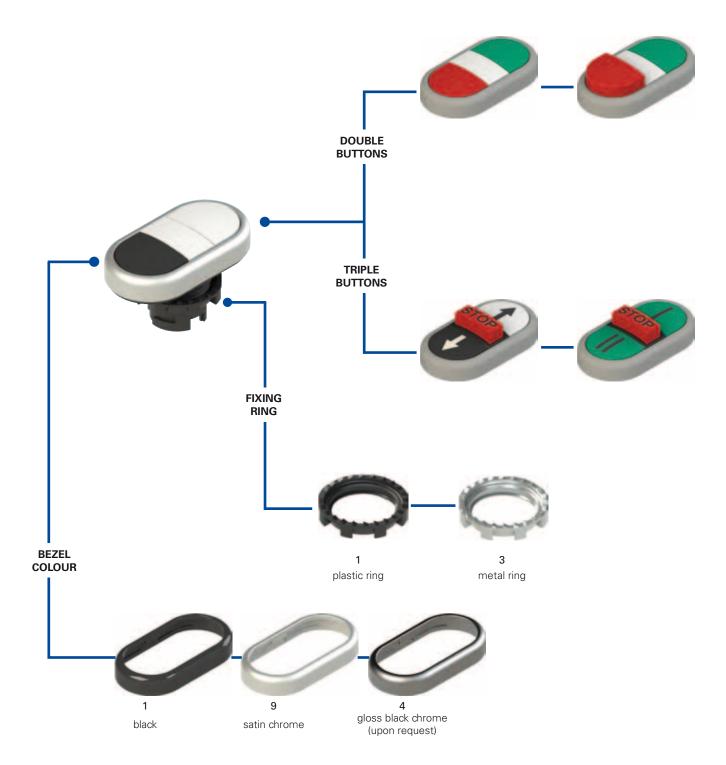
### Selection diagram



5

#### **Code structure**

Attention! The feasibility of a code number does not mean the effective availability of a product. Please contact our sales office.

# E2 <u>1PDRL10423</u>

#### Fixing ring and shaped ring

- 1 plastic ring (standard)
- 2 plastic fixing ring and shaped ring
- 3 metal ring
- 4 metal fixing ring and shaped ring

#### No. of functions

- D dual button
- T triple button

#### Upper and lower button

- A upper projecting, lower flush
- B upper projecting, lower projecting
- **R** upper flush, lower flush
- S upper flush, lower projecting

#### Intermediate element

- L backlit cap (only double buttons)
- **S** projecting button (only triple buttons)
- **Q** cap and actuators for 4-slot base
- (only double buttons)

#### Bezel colour

- 1 black (standard)
- **9** satin chrome (standard)
- 4 gloss black chrome (upon request)

#### Ambient temperature

-25°C ... +80°C (standard)

**T6** -40°C ... +80°C

#### Colours and symbols

	upper button			ntral ap	lower button		
	colour	symbol	colour	symbol	colour	symbol	
0423	green	-	white	-	red	-	
0221	white	-	white	-	black	-	
0222	white	-	white	-	white	-	
0121	black	-	white	-	black	-	
Other combinations on request.							

	upper button			ntral ap	lower button	
	colour	symbol	colour	symbol	colour	symbol
AAAD	green	I	white	-	red	0
AAAP	green	START	white	-	red	STOP
AAAA	white	1	white	-	black	0
AAAN	white	START	white	-	black	STOP
AAAB	black	1	white	-	black	+
AAAC	black	+	white	-	black	-

Other combinations on request.

	upper button		bu	ntral tton ecting	lower button	
	colour	symbol	colour	symbol	colour	symbol
AAAY	green	I	red	STOP	green	- 11
AAAZ	green	+	red	STOP	green	<b>→</b>
AABD	white	<b>→</b>	red	STOP	black	+
AABA	green	Ť	red	STOP	green	Ŧ
AABE	white	1	red	STOP	black	+
AABF	black	1	red	STOP	black	+
AABB	green	+	red	STOP	green	-
AABC	white	+	red	STOP	white	-

Other combinations on request.

## Double and triple buttons



#### **Technical data**

General data Protection dearee:

Maximum travel:

EN 60947-5-1

Ambient temperature: Safety parameters: B<sub>10d</sub>: Mechanical endurance:

Max. actuation frequency:

Utilization requirements:

Actuating force at limit of travel:

Tightening torque of the fixing ring:

IP67 acc. to IEC 60529 IP69K acc. to ISO 20653 -25°C ... +80°C

2,000,000 1 million operating cycles<sup>1</sup> 3600 operating cycles<sup>1</sup>/hour 4.4 N (without contacts) 5 mm 2 ... 2.5 Nm see page 124 (1) One operation cycle means two movements, one to close and one to open contacts, as defined in

#### In conformity with standards:

IEC 60947-1, IEC 60947-5-1, IEC 60204-1, EN 60947-1, EN 60947-5-1, EN 60204-1, UL 508, CSA 22-2 no.14

Use only contact blocks marked with the symbol  $\bigcirc$ . Always connect the safety circuit to the NC contacts (normally closed contacts: .1-.2) as stated in standard

#### Main features

Protection degrees IP67 and IP69K

• Version with 2 or 3 buttons

- 40°C version

• Version with central backlit cap

### EN 60947-5-1, encl. K, par. 2.

A Installation for safety applications:

#### Markings and quality marks:

# C€®EAL

IMQ approval: EAC approval:

CA02.04805 RU C-IT ДМ94.В.01024 In conformity with the requirements of: Low Voltage Directive 2006/95/EC, Machinery Directive 2006/42/EC and EMC Directive 2004/108/EC. Positive contact opening in conformity with standards: IEC 60947-5-1, EN 60947-5-1.

**General data** 

#### **Button profile**

The new EROUND line double and triple buttons are available in two profiles in order to suit any kind of application: projecting and flush. The possibility to choose shapes, colours and symbols allows various code combinations for buttons.

#### **Illuminated version**

For double buttons, the version with central backlit cap is available.

#### Metal fixing ring



The fixing ring in metal is particularly suitable for those applications which require tighter fitting of the panel-mounted device, such as for example in metal panels having holes without reference notches.

#### Shaped ring



The shaped ring can be used when no label holders or other devices are applied; it prevents dirt and other residues from settling between the button and the panel or box.

This turns out to be particularly useful in the sectors where high standards of cleanness and hygiene are required.

#### **Customisable**



In order to satisfy customers' numerous requests and demands, Pizzato Elettrica gives the possibility to customize the control and signalling devices of the EROUND line: the bezels can be requested with different colours (gloss black chrome, black, and satin chrome), whereas the lenses can be customized with a wide range of writings, symbols, and colours.

#### Protection degrees IP67 and IP69K



These devices are designed to be used in the toughest environmental conditions and they pass the IP67 immersion test acc. to IEC 60529. They can therefore be used in all environments where the maximum protection

of the housing is required. Special measures also allow devices to be used even in machines which are subjected to washing with high pressure warm water jets. In fact these devices pass the IP69K test according to ISO 20653, using jets of water to 100 atmospheres at a temperature of 80°C.

#### **Extended temperature range**

This range of switches is also available in a special version with an ambient operating temperature range of -40°C to +80°C.

They can be used for applications in cold stores, sterilisers and other devices with low temperature environments. Special materials that have been used to realize these versions, maintain unchanged their features also in these conditions, widening the installation possibilities.

#### Selection table for double buttons

		9			
	Button colour and engraving	upper bu central c lower but	ap flush	upper bu: central c lower butto	ap flush
		black bezel	satin chrome bezel	black bezel	satin chrome bezel
	green button white cap, illumi- nated red button	E2 1PDRL10423	E2 1PDRL90423	E2 1PDSL10423	E2 1PDSL90423
	" " green button white cap, illumi- nated "O" red button	E2 1PDRL1AAAD	E2 1PDRL9AAAD	E2 1PDSL1AAAD	E2 1PDSL9AAAD
STOP	"START" green button white cap, illumi- nated "STOP" red button	E2 1PDRL1AAAP	E2 1PDRL9AAAP	E2 1PDSL1AAAP	E2 1PDSL9AAAP
	white button white cap, illumi- nated black button	E2 1PDRL10221	E2 1PDRL90221	E2 1PDSL10221	E2 1PDSL90221
	" " white button white cap, illumi- nated "O" black button	E2 1PDRL1AAAA	E2 1PDRL9AAAA	E2 1PDSL1AAAA	E2 1PDSL9AAAA
START	"START" white button white cap, illumi- nated "STOP" black button	E2 1PDRL1AAAN	E2 1PDRL9AAAN	E2 1PDSL1AAAN	E2 1PDSL9AAAN
	"↑" black button white cap, illumi- nated "↓" black button	E2 1PDRL1AAAB	E2 1PDRL9AAAB	E2 1PDSL1AAAB	E2 1PDSL9AAAB

Other combinations on request.

Items with code on green background are stock items

#### Selection table for triple buttons

Button colour and engraving	central butto lower bu	tton flush on projecting tton flush
	black bezel	satin chrome bezel
" " green button "STOP" red button "  " green button	E2 1PTRS1AAAY	E2 1PTRS9AAAY
"←" green button "STOP" red button "→" green button	E2 1PTRS1AAAZ	E2 1PTRS9AAAZ
"→" white button "STOP" red button "←" black button	E2 1PTRS1AABD	E2 1PTRS9AABD
*↑* green button "STOP" red button *↓* green button	E2 1PTRS1AABA	E2 1PTRS9AABA
combinations on requ	est.	

#### Complete units with double buttons



Button colour and engraving			Contacts	;	upper button flush central cap flush lower button projecting
	and ongrowing		pos. 3	pos. 1	black bezel
	"I" green button			1NO	E2 AC-DXBC0601
	black cap		-		E2 1PDSC1AAAK + E2 1BAC11 + F2 CP01G2V1 +
	"O" red button	1NC ↔			E2 CP10G2V1

Other combinations on request.



Button colour and engraving			Contacts	;	upper button flush central cap flush lower button projecting
		pos. 2	pos. 3	pos. 1	black bezel
	" " green button			1NO	E2 AC-DXBC0602 E2 1PDSL1AAAD +
	white cap, illuminated		LED		E2 1BAC11 + E2 CP01G2V1 +
	"O" red button	1NC →			E2 LP1A2V1 + E2 CP10G2V1

Other combinations on request.

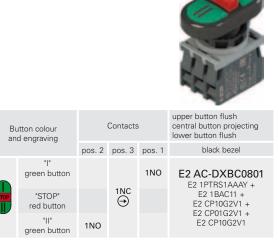
→ For the characteristics of the contact blocks and LED units, refer to the respective chapters.

Shroud		10 pcs. packs	Shaped ring		50 pcs. packs
	Article	Description		Article	Description
	VE CA1C1	Shroud for double and triple projecting buttons	0	VE GP12L1A	Shaped ring for double and triple button E2 1PD•••••• E2 1PT•••••
	VE CA1D1	Shroud for double flush button		With the shaped rir shroud is not allowe	ig, the application of the ed.
	With the shroud it is not possible to apply the		Accessories		
	shaped ring		➔ More ACCESSORIE	S on page 121	

More ACCESSORIES on page 121 →

Items with code on green background are stock items

#### Complete units with triple buttons



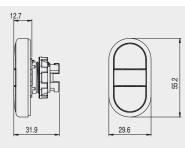
Other combinations on request.

# EROUND 1/0

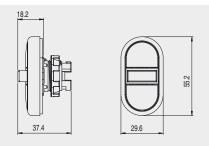
All measures in the drawings are in mm

#### Dimensions

#### Flush double button



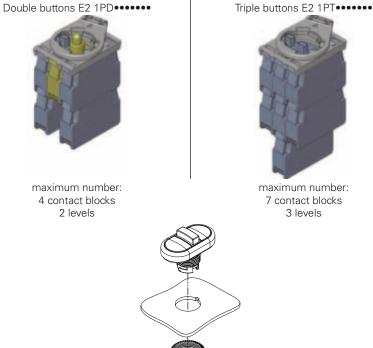
#### **Triple button**



→ The 2D and 3D files are available at www.pizzato.com

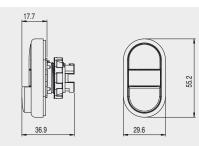
#### Maximum number of contacts

3-slot mounting adapter

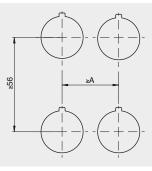


Contact blocks

#### **Projecting double button**



#### Minimum distances for installation



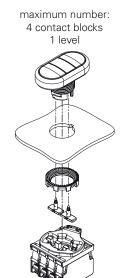
3-slot mounting adapter A=30 mm

4-slot mounting adapter A=40 mm

#### 4-slot mounting adapter

Double buttons E2 1PD•Q•••••





The actuators, with the specific button for 4-slot base, can be mounted only after fixing the button.