

## Quick Reference Guide



New Products



**Modular prewired switches NA-NB-NF series**

- Switches with connectors
- Positive opening contact blocks with 1-2-3-4 poles
- Adjustable cables output
- Rotating and unidirectional heads
- IP67 Type 1, 4x "indoor use only", 12
- Switch components available separately

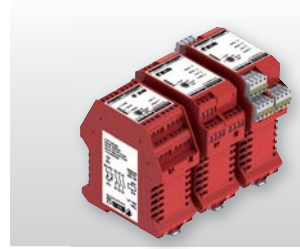


**Hinge switch HP AB series, versions for glass or polycarbonate doors**

- Wider supporting arm
- Spaced fixing points

**Hinge switch HP series, variations of the activation base angle**

- Switch activation angle equal to a multiple of 15°
- Possibility to adjust the operating point through the switch adjusting screws



**Safety modules**

- Standstill monitor safety module CS AM
- Safety timer CS FS-20, CS FS-30 and CS FS-50
- Expansion module for optical barrier with EDM CS ME-03
- Safety modules CS AR-24, CS AR-25



**Additional metal protection for single and double foot switches PA series**

- For hard work environments
- Higher dimensions for safety shoes
- With hole for carrying rod

2

Position switches



**2A Position switches for heavy duty**

page 3



FD series



FP series



FL series



FC series

**2B Position switches for normal duty with or without reset**

page 5



FR series



FM series



FX series



FZ series

**2C Modular prewired switches**

page 9



NA-NB series



NF series

**2D Microswitches**

page 11



MK series

3

Man-machine interface



**3A Single foot switches PX-PA series**

page 13



**3B Modular multiple foot switches PC series**

page 14



# 4

## Safety devices



### 4A Switches with separate actuator

page 15



For heavy duty



For normal duty

### 4B Safety magnetic sensors

page 15



Coded magnetic sensors

### 4C Hinge operating safety switches

page 16



Hinge switches



For hinged protections for heavy duty



For hinged protections for normal duty



With slotted hole lever for normal duty

### 4D Switches with separate actuator with lock

page 17



With solenoid FG series



With solenoid FS series



With manual mechanical delay



With lock

### 4F Rope switches

page 18



With reset for emergency stop



Without reset for simple stop



Accessories for rope switches

## Safety modules



### 4H Safety modules

page 19



For emergency stop and gate monitoring

CS AR series



For emergency stop and gate monitoring with delayed contacts

CS AT series



Safety timer module

CS FS series



Safety modules for bimanual controls or synchronism check

CS DM series



Standstill monitor safety modules

CS AM series



Expansion modules for output contacts

CS ME series

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## Accessories

page 21





## FD series

Housing made of metal  
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:   
 Ambient temperature: -25°C to +80°C



snap action contacts 1NO+1NC
slow action contacts 1NO+1NC
slow action contacts 2NC
slow action contacts 1NO+2NC
snap action contacts 2NC-2NO

FD 501	FD 502	FD 505	FD 510	FD 511	FD 515	FD 516	FD 520
FD 601	FD 602	FD 605	FD 610	FD 611	FD 615	FD 616	
FD 901	FD 902	FD 905	FD 910	FD 911	FD 915	FD 916	
FD 2001	FD 2002	FD 2005	FD 2010	FD 2011	FD 2015	FD 2016	FD 2020
FD 201	FD 202	FD 205	FD 210	FD 211	FD 215	FD 216	FD 220

## FL series

Housing made of metal  
 Three conduit entries PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:   
 Ambient temperature: -25°C to +80°C



snap action contacts 1NO+1NC
slow action contacts 1NO+1NC
slow action contacts 2NC
slow action contacts 1NO+2NC
snap action contacts 2NC-2NO

FL 501	FL 502	FL 505	FL 510	FL 511	FL 515	FL 516	FL 520
FL 601	FL 602	FL 605	FL 610	FL 611	FL 615	FL 616	
FL 901	FL 902	FL 905	FL 910	FL 911	FL 915	FL 916	
FL 2001	FL 2002	FL 2005	FL 2010	FL 2011	FL 2015	FL 2016	FL 2020
FL 201	FL 202	FL 205	FL 210	FL 211	FL 215	FL 216	FL 220

## FC series

Housing made of metal  
 One conduit entry PG 11 (M16 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:   
 Ambient temperature: -25°C to +80°C



snap action contacts 1NO+1NC
slow action contacts 1NO+1NC
slow action contacts 2NC

FC 301	FC 302	FC 305	FC 310	FC 311	FC 315	FC 316	FC 320
FC 3301	FC 3302	FC 3305	FC 3310	FC 3311	FC 3315	FC 3316	FC 3320
FC 3401	FC 3402	FC 3405	FC 3410	FC 3411	FC 3415	FC 3416	FC 3420

## FP series

Housing made of polymer glass-reinforced   
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:   
 Ambient temperature: -25°C to +80°C



snap action contacts 1NO+1NC
slow action contacts 1NO+1NC
slow action contacts 2NC
slow action contacts 1NO+2NC
snap action contacts 2NC-2NO

FP 501	FP 502	FP 505	FP 510	FP 511	FP 515	FP 516	FP 520
FP 601	FP 602	FP 605	FP 610	FP 611	FP 615	FP 616	
FP 901	FP 902	FP 905	FP 910	FP 911	FP 915	FP 916	
FP 2001	FP 2002	FP 2005	FP 2010	FP 2011	FP 2015	FP 2016	FP 2020
FP 201	FP 202	FP 205	FP 210	FP 211	FP 215	FP 216	FP 220

### Accessories

See on page 21.  
 For the whole accessories list please see the general catalogue.





Round rod

With two stable positions

FD 521	FD 525	FD 531 ⊕	FD 532	FD 535	FD 536	FD 542 ⊕	FD 551 ⊕	FD 552 ⊕	FD 553-E11V9 ⊕	FD 576
		FD 631 ⊕	FD 632	FD 635	FD 636		FD 651 ⊕	FD 652 ⊕	FD 653-E11V9 ⊕	FD 676
		FD 931 ⊕	FD 932	FD 935	FD 936		FD 951 ⊕	FD 952 ⊕	FD 953-E11V9 ⊕	
FD 2021	FD 2025	FD 2031 ⊕	FD 2032	FD 2035	FD 2036		FD 2051 ⊕	FD 2052 ⊕	FD 2053-E11V9 ⊕	
FD 221	FD 225	FD 231	FD 232	FD 235	FD 236		FD 251	FD 252	FD 253-E11	FD 276

Round rod

With two stable positions

FL 521	FL 525	FL 531 ⊕	FL 532	FL 535	FL 536	FL 542 ⊕	FL 551 ⊕	FL 552 ⊕	FL 553-E11V9 ⊕	FL 576
		FL 631 ⊕	FL 632	FL 635	FL 636		FL 651 ⊕	FL 652 ⊕	FL 653-E11V9 ⊕	FL 676
		FL 931 ⊕	FL 932	FL 935	FL 936		FL 951 ⊕	FL 952 ⊕	FL 953-E11V9 ⊕	
FL 2021	FL 2025	FL 2031 ⊕	FL 2032	FL 2035	FL 2036		FL 2051 ⊕	FL 2052 ⊕	FL 2053-E11V9 ⊕	
FL 221	FL 225	FL 231	FL 232	FL 235	FL 236		FL 251	FL 252	FL 253-E11	FL 276

Round rod

FC 321	FC 325	FC 331	FC 332	FC 335	FC 336	FC 351	FC 352	FC 353-E11	FC 376
FC 3321	FC 3325	FC 3331 ⊕	FC 3332	FC 3335	FC 3336	FC 3351 ⊕	FC 3352 ⊕	FC 3353-E11V9 ⊕	FC 3376
FC 3421	FC 3425	FC 3431 ⊕	FC 3432	FC 3435	FC 3436	FC 3451 ⊕	FC 3452 ⊕	FC 3453-E11V9 ⊕	FC 3476

Round rod

With two stable positions






FP 521	FP 525	FP 531 ⊕	FP 532	FP 535	FP 536	FP 542 ⊕	FP 551 ⊕	FP 552 ⊕	FP 553-E11V9 ⊕	FP 576
		FP 631 ⊕	FP 632	FP 635	FP 636		FP 651 ⊕	FP 652 ⊕	FP 653-E11V9 ⊕	FP 676
		FP 931 ⊕	FP 932	FP 935	FP 936		FP 951 ⊕	FP 952 ⊕	FP 953-E11V9 ⊕	
FP 2021	FP 2025	FP 2031 ⊕	FP 2032	FP 2035	FP 2036		FP 2051 ⊕	FP 2052 ⊕	FP 2053-E11V9 ⊕	
FP 221	FP 225	FP 231	FP 232	FP 235	FP 236		FP 251	FP 252	FP 253-E11	FP 276

Position switches without actuator, see page 7









































Items with green background normally in stock at factory in Italy



## FR series






Housing made of polymer glass-reinforced   
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:      
 Ambient temperature: -25°C to +80°C

- snap action contacts 1NO+1NC
- slow action contacts 1NO+1NC
- slow action contacts 2NC
- slow action contacts 1NO+2NC
- snap action contacts 2NC-2NO
































							
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FR 901 	FR 902 	FR 905 	FR 907 	FR 908 	FR 913 	FR 915 	FR 915-1 
FR 2001 	FR 2002 	FR 2005 	FR 2007 	FR 2008 	FR 2013 	FR 2015 	FR 2015-1 
FR 201	FR 202	FR 205	FR 207	FR 208	FR 213	FR 215	FR 215-1

Polymer roller  
Stainless steel roller

## FX series





Housing made of polymer glass-reinforced   
 Two conduit entries PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:      
 Ambient temperature: -25°C to +80°C

- snap action contacts 1NO+1NC
- slow action contacts 1NO+1NC
- slow action contacts 2NC
- slow action contacts 1NO+2NC
- snap action contacts 2NC-2NO



							
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FX 601 	FX 602 	FX 605 	FX 607 	FX 608 	FX 613 	FX 615 	FX 615-1 
FX 901 	FX 902 	FX 905 	FX 907 	FX 908 	FX 913 	FX 915 	FX 915-1 
FX 2001 	FX 2002 	FX 2005 	FX 2007 	FX 2008 	FX 2013 	FX 2015 	FX 2015-1 
FX 201	FX 202	FX 205	FX 207	FX 208	FX 213	FX 215	FX 215-1

Polymer roller  
Stainless steel roller

## FM series





Housing made of metal  
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:      
 Ambient temperature: -25°C to +80°C

- snap action contacts 1NO+1NC
- slow action contacts 1NO+1NC
- slow action contacts 2NC
- slow action contacts 1NO+2NC
- snap action contacts 2NC-2NO









































							
FM 501 	FM 502 	FM 505 	FM 507 	FM 508 	FM 513 	FM 515 	FM 515-1 
FM 601 	FM 602 	FM 605 	FM 607 	FM 608 	FM 613 	FM 615 	FM 615-1 
FM 901 	FM 902 	FM 905 	FM 907 	FM 908 	FM 913 	FM 915 	FM 915-1 
FM 2001 	FM 2002 	FM 2005 	FM 2007 	FM 2008 	FM 2013 	FM 2015 	FM 2015-1 
FM 201	FM 202	FM 205	FM 207	FM 208	FM 213	FM 215	FM 215-1

Stainless steel roller

## FZ series

Housing made of metal  
 Two conduit entries PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:      
 Ambient temperature: -25°C to +80°C

- snap action contacts 1NO+1NC
- slow action contacts 1NO+1NC
- slow action contacts 2NC
- slow action contacts 1NO+2NC
- snap action contacts 2NC-2NO

							
FZ 501 	FZ 502 	FZ 505 	FZ 507 	FZ 508 	FZ 513 	FZ 515 	FZ 515-1 
FZ 601 	FZ 602 	FZ 605 	FZ 607 	FZ 608 	FZ 613 	FZ 615 	FZ 615-1 
FZ 901 	FZ 902 	FZ 905 	FZ 907 	FZ 908 	FZ 913 	FZ 915 	FZ 915-1 
FZ 2001 	FZ 2002 	FZ 2005 	FZ 2007 	FZ 2008 	FZ 2013 	FZ 2015 	FZ 2015-1 
FZ 201	FZ 202	FZ 205	FZ 207	FZ 208	FZ 213	FZ 215	FZ 215-1

Stainless steel roller

### Accessories

See on page 21.  
 For the whole accessories list please see the general catalogue.





Round rod

FR 520	FR 521	FR 525	FR 530 ⊕	FR 550	FR 551 ⊕	FR 553-E0V9 ⊕	FR 554 ⊕	FR 555	FR 569	FR 576
			FR 630 ⊕	FR 650	FR 651 ⊕	FR 653-E0V9 ⊕	FR 654 ⊕	FR 655	FR 669	FR 676
			FR 930 ⊕	FR 950	FR 951 ⊕	FR 953-E0V9 ⊕	FR 954 ⊕	FR 955	FR 969	
FR 2020	FR 2021	FR 2025	FR 2030 ⊕	FR 2050	FR 2051 ⊕	FR 2053-E0V9 ⊕	FR 2054 ⊕	FR 2055	FR 2069	
FR 220	FR 221	FR 225	FR 230	FR 250	FR 251	FR 253-E0	FR 254	FR 255	FR 269	FR 276

Round rod

FX 520	FX 521	FX 525	FX 530 ⊕	FX 550	FX 551 ⊕	FX 553-E0V9 ⊕	FX 554 ⊕	FX 555	FX 569	FX 576
			FX 630 ⊕	FX 650	FX 651 ⊕	FX 653-E0V9 ⊕	FX 654 ⊕	FX 655	FX 669	FX 676
			FX 930 ⊕	FX 950	FX 951 ⊕	FX 953-E0V9 ⊕	FX 954 ⊕	FX 955	FX 969	
FX 2020	FX 2021	FX 2025	FX 2030 ⊕	FX 2050	FX 2051 ⊕	FX 2053-E0V9 ⊕	FX 2054 ⊕	FX 2055	FX 2069	
FX 220	FX 221	FX 225	FX 230	FX 250	FX 251	FX 253-E0	FX 254	FX 255	FX 269	FX 276

Round rod

FM 520	FM 521	FM 525	FM 531 ⊕	FM 550	FM 551 ⊕	FM 553-E0V9 ⊕	FM 554 ⊕	FM 555	FM 569	FM 576
			FM 631 ⊕	FM 650	FM 651 ⊕	FM 653-E0V9 ⊕	FM 654 ⊕	FM 655	FM 669	FM 676
			FM 931 ⊕	FM 950	FM 951 ⊕	FM 953-E0V9 ⊕	FM 954 ⊕	FM 955	FM 969	
FM 2020	FM 2021	FM 2025	FM 2031 ⊕	FM 2050	FM 2051 ⊕	FM 2053-E0V9 ⊕	FM 2054 ⊕	FM 2055	FM 2069	
FM 220	FM 221	FM 225	FM 231	FM 250	FM 251	FM 253-E0	FM 254	FM 255	FM 269	FM 276

Round rod

FZ 520	FZ 521	FZ 525	FZ 531 ⊕	FZ 550	FZ 551 ⊕	FZ 553-E0V9 ⊕	FZ 554 ⊕	FZ 555	FZ 569	FZ 576
			FZ 631 ⊕	FZ 650	FZ 651 ⊕	FZ 653-E0V9 ⊕	FZ 654 ⊕	FZ 655	FZ 669	FZ 676
			FZ 931 ⊕	FZ 950	FZ 951 ⊕	FZ 953-E0V9 ⊕	FZ 954 ⊕	FZ 955	FZ 969	
FZ 2020	FZ 2021	FZ 2025	FZ 2031 ⊕	FZ 2050	FZ 2051 ⊕	FZ 2053-E0V9 ⊕	FZ 2054 ⊕	FZ 2055	FZ 2069	
FZ 220	FZ 221	FZ 225	FZ 231	FZ 250	FZ 251	FZ 253-E0	FZ 254	FZ 255	FZ 269	FZ 276

Position switches without actuator, see page 7

Items with green background normally in stock at factory in Italy



### Position switches without actuator FD, FL, FC and FP series

Housing made of polymer glass-reinforced or metal

One or three conduit entries PG 13.5  
(M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:



snap action contacts 1NO+1NC	FD 538	FD 558	FL 538	FL 558	FC 338	FC 358	FP 538	FP 558
slow action contacts 1NO+1NC	FD 638	FD 658	FL 638	FL 658	FC 3338	FC 3358	FP 638	FP 658
slow action contacts 2NC	FD 938	FD 958	FL 938	FL 958	FC 3438	FC 3458	FP 938	FP 958
slow action contacts 1NO+2NC	FD 2038	FD 2058	FL 2038	FL 2058			FP 2038	FP 2058
snap action contacts 2NC-2NO	FD 238	FD 258	FL 238	FL 258			FP 238	FP 258

### Loose actuators

Round rod      Square rod



VF L31   VF L32   VF L33   VF L34   VF L35   VF L36   VF L51   VF L52   VF L53   VF L56   VF L57

10 pcs pack. Only orders for quantities multiple of the packs are accepted.

Attention! These loose actuators must be used with FD, FL, FC and FP series only.



### Position switches without actuator FR, FX, FM and FZ series

Housing made of polymer glass-reinforced or metal

One or two conduit entries PG 13.5  
(M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:



snap action contacts 1NO+1NC	FR 538	FX 538	FM 538	FZ 538				
slow action contacts 1NO+1NC	FR 638	FX 638	FM 638	FZ 638	FR 638-W3	FX 638-W3	FM 638-W3	FZ 638-W3
slow action contacts 2NC	FR 938	FX 938	FM 938	FZ 938	FR 938-W3	FX 938-W3	FM 938-W3	FZ 938-W3
slow action contacts 1NO+2NC	FR 2038	FX 2038	FM 2038	FZ 2038	FR 2038-W3	FX 2038-W3	FM 2038-W3	FZ 2038-W3
snap action contacts 2NC-2NO	FR 238	FX 238	FM 238	FZ 238				

### Loose actuators

Square rod      Round rod



VF LE30   VF LE31   VF LE33   VF LE34   VF LE50   VF LE51   VF LE52   VF LE53   VF LE54   VF LE55   VF LE56   VF LE69   VF LE57

10 pcs pack. Only orders for quantities multiple of the packs are accepted.

Attention! These loose actuators must be used with FR, FX, FM and FZ series only.

### Accessories

See on page 21.


For the whole accessories list please see the general catalogue.










## FR series

Housing made of polymer glass-reinforced 

One conduit entry PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:   

Ambient temperature: -25°C to +80°C

contacts 1NO+1NC

contacts 2NC

contacts 1NO+2NC




FR 601-W3  FR 602-W3  FR 605-W3  FR 607-W3  FR 615-W3  FR 630-W3  FR 651-W3  FR 654-W3 

FR 901-W3  FR 902-W3  FR 905-W3  FR 907-W3  FR 915-W3  FR 930-W3  FR 951-W3  FR 954-W3 




FR 2001-W3  FR 2002-W3  FR 2005-W3  FR 2007-W3  FR 2015-W3  FR 2030-W3  FR 2051-W3  FR 2054-W3 

## FX series

Housing made of polymer glass-reinforced 

Two conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:   

Ambient temperature: -25°C to +80°C

contacts 1NO+1NC

contacts 2NC

contacts 1NO+2NC



FX 601-W3  FX 602-W3  FX 605-W3  FX 607-W3  FX 615-W3  FX 630-W3  FX 651-W3  FX 654-W3 

FX 901-W3  FX 902-W3  FX 905-W3  FX 907-W3  FX 915-W3  FX 930-W3  FX 951-W3  FX 954-W3 




FX 2001-W3  FX 2002-W3  FX 2005-W3  FX 2007-W3  FX 2015-W3  FX 2030-W3  FX 2051-W3  FX 2054-W3 

## FM series

Housing made of metal

One conduit entry PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:   

Ambient temperature: -25°C to +80°C

contacts 1NO+1NC

contacts 2NC

contacts 1NO+2NC



FM 601-W3  FM 602-W3  FM 605-W  FM 607-W3  FM 615-W3  FM 631-W3  FM 651-W3  FM 654-W3 

FM 901-W3  FM 902-W3  FM 905-W3  FM 907-W3  FM 915-W3  FM 931-W3  FM 951-W3  FM 954-W3 




FM 2001-W3  FM 2002-W3  FM 2005-W3  FM 2007-W3  FM 2015-W3  FM 2031-W3  FM 2051-W3  FM 2054-W3 

## FZ series

Housing made of metal

Two conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:   

Ambient temperature: -25°C to +80°C

contacts 1NO+1NC

contacts 2NC

contacts 1NO+2NC



FZ 601-W3  FZ 602-W3  FZ 605-W3  FZ 607-W3  FZ 615-W3  FZ 631-W3  FZ 651-W3  FZ 654-W3 

FZ 901-W3  FZ 902-W3  FZ 905-W3  FZ 907-W3  FZ 915-W3  FZ 931-W3  FZ 951-W3  FZ 954-W3 

FZ 2001-W3  FZ 2002-W3  FZ 2005-W3  FZ 2007-W3  FZ 2015-W3  FZ 2031-W3  FZ 2051-W3  FZ 2054-W3 



Pizzato Elettrica has developed an innovative reset device code W3 to make perfectly simultaneous the actuator and the contact block tripping. The new device is a block inserted between the switch body and the head, and could be rotated independently from this last one. This new device has following advantages:

\* The reset device integrate in any standard actuation head

\* Contact blocks with snap action are no more necessary because the tripping movement is made by the reset device itself

\* Unlike some previous versions, the reset device can be rotated independently from the head for the maximum flexibility during the assembling.



## NA series ★

Housing made of metal  
 Cable length 2 m  
 Distance between fixing holes 20 mm  
 IP67 Type 1, 4x "indoor use only", 12  
 Markings and marks:



snap action contacts 1NO+1NC	<span style="background-color: #e0ffe0;">NA B110AB-DN2</span> <span style="background-color: #e0ffe0;">NA B110BB-DN2</span> NA B110EB-DN2  NA B110FB-DN2  NA B110HB-DN2	NA B110HE-DN2	<span style="background-color: #e0ffe0;">NA B112KC-DN2</span> NA B112KD-DN2
snap action contacts 1NO+2NC	NA B120AB-DN2  NA B120BB-DN2  NA B120EB-DN2  NA B120FB-DN2  NA B120HB-DN2	NA B120HE-DN2	NA B122KC-DN2  NA B122KD-DN2
snap action contacts 2NO+2NC	NA B220AB-DN2  NA B220BB-DN2  NA B220EB-DN2  NA B220FB-DN2  NA B220HB-DN2	NA B220HE-DN2	NA B222KC-DN2  NA B222KD-DN2
slow action contacts 1NO+1NC	<span style="background-color: #e0ffe0;">NA G110AB-DN2</span> <span style="background-color: #e0ffe0;">NA G110BB-DN2</span> NA G110EB-DN2  NA G110FB-DN2  NA G110HB-DN2	NA G110HE-DN2	<span style="background-color: #e0ffe0;">NA G112KC-DN2</span> NA G112KD-DN2
slow action contacts 1NO+2NC	NA G120AB-DN2  NA G120BB-DN2  NA G120EB-DN2  NA G120FB-DN2  NA G120HB-DN2	NA G120HE-DN2	NA G122KC-DN2  NA G122KD-DN2
slow action contacts 1NO+2NC	NA G220AB-DN2  NA G220BB-DN2  NA G220EB-DN2  NA G220FB-DN2  NA G220HB-DN2	NA G220HE-DN2	NA G222KC-DN2  NA G222KD-DN2

Housing NB series (Distance fixing holes 25 mm)	M12 connector output from right	M12 connector output from bottom
<p><b>In order to buy a NB series product:</b> substitute on above mentioned codes NA with NB.                  Example:  <b>NA B110AA-DN2 → NB B110AA-DN2</b></p>	<p><b>In order to buy a product with M12 connector output from right</b> substitute on above mentioned codes DN2 with DMK. Example:  <b>NA B110AA-DN2 → NA B110AA-DMK</b></p>	<p><b>In order to buy a product with M12 connector output from bottom</b> substitute on above mentioned codes DN2 with SMK. Example:  <b>NA B110AA-DN2 → NA B110AA-SMK</b></p>

## NF series ★

Housing made of polymer  
 glass-reinforced   
 Cable length 2 m  
 Distance between fixing holes 20 mm  
 IP67 Type 1, 4x "indoor use only", 12  
 Markings and marks:



snap action contacts 1NO+1NC	<span style="background-color: #e0ffe0;">NF B110AB-DN2</span> <span style="background-color: #e0ffe0;">NF B110BB-DN2</span> NF B110EB-DN2  NF B110FB-DN2  NF B110HB-DN2	NF B110HE-DN2	NF B112KC-DN2  NF B112KD-DN2
snap action contacts 1NO+2NC	NF B120AB-DN2  NF B120BB-DN2  NF B120EB-DN2  NF B120FB-DN2  NF B120HB-DN2	NF B120HE-DN2	NF B122KC-DN2  NF B122KD-DN2
snap action contacts 2NO+2NC	NF B220AB-DN2  NF B220BB-DN2  NF B220EB-DN2  NF B220FB-DN2  NF B220HB-DN2	NF B220HE-DN2	NF B222KC-DN2  NF B222KD-DN2
slow action contacts 1NO+1NC	<span style="background-color: #e0ffe0;">NF G110AB-DN2</span> <span style="background-color: #e0ffe0;">NF G110BB-DN2</span> NF G110EB-DN2  NF G110FB-DN2  NF G110HB-DN2	NF G110HE-DN2	NF G112KC-DN2  NF G112KD-DN2
slow action contacts 1NO+2NC	NF G120AB-DN2  NF G120BB-DN2  NF G120EB-DN2  NF G120FB-DN2  NF G120HB-DN2	NF G120HE-DN2	NF G122KC-DN2  NF G122KD-DN2
slow action contacts 1NO+2NC	NF G220AB-DN2  NF G220BB-DN2  NF G220EB-DN2  NF G220FB-DN2  NF G220HB-DN2	NF G220HE-DN2	NF G222KC-DN2  NF G222KD-DN2

M12 connector output from right	M12 connector output from bottom	AMP superseal 1.5 connector
<p><b>In order to buy a product with M12 connector output from right</b> substitute on above mentioned codes DN2 with DMK. Example:  <b>NA B110AA-DN2 → NA B110AA-DMK</b></p>	<p><b>In order to buy a product with M12 connector output from bottom</b> substitute on above mentioned codes DN2 with SMK. Example:  <b>NA B110AA-DN2 → NA B110AA-SMK</b></p>	<p><b>In order to buy a product with AMP type connector output</b> substitute on above mentioned codes DN2 with SAK. Example:  <b>NA B110AA-DN2 → NA B110AA-SAK</b></p>

### Accessories

By interposing spacers between the switches, it is possible to join two or more prewired switches, preventing them from moving one against the other.

Article	Description
VF DT1F	Spacers for NA-NF series
VF D16B	Spacers for NB series

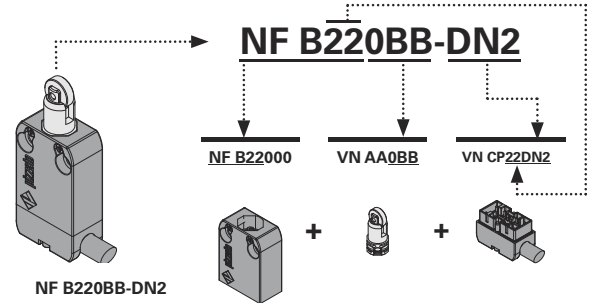
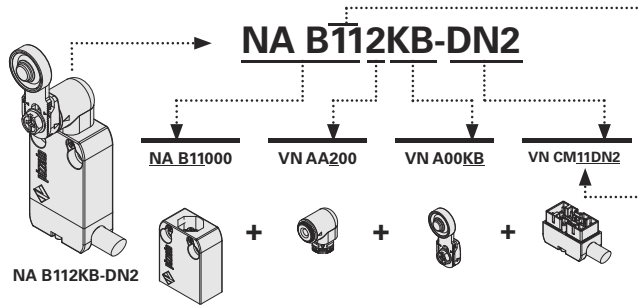
10 pcs pack. Only orders for quantities multiple of the packs are accepted.

### Accessories

See on page 21.  
 For the whole accessories list please see the general catalogue.



Examples of article code composition



Housings

metal housing NA (Distance fixing holes 20 mm)    metal housing NB (Distance fixing holes 25 mm)    polymer housing NF (Distance fixing holes 20 mm)



NA B11000	⊖ 1NO+1NC	R	NB B11000	⊖ 1NO+1NC	R	NF B11000	⊖ 1NO+1NC	R
NA G11000	⊖ 1NO+1NC	L	NB G11000	⊖ 1NO+1NC	L	NF G11000	⊖ 1NO+1NC	L
NA B12000	⊖ 1NO+2NC	R	NB B12000	⊖ 1NO+2NC	R	NF B12000	⊖ 1NO+2NC	R
NA G12000	⊖ 1NO+2NC	L	NB G12000	⊖ 1NO+2NC	L	NF G12000	⊖ 1NO+2NC	L
NA B22000	⊖ 2NO+2NC	R	NB B22000	⊖ 2NO+2NC	R	NF B22000	⊖ 2NO+2NC	R
NA G22000	⊖ 2NO+2NC	L	NB G22000	⊖ 2NO+2NC	L	NF G22000	⊖ 2NO+2NC	L

Contacts type:  
**R** = snap action    **L** = slow action

Connector with cable

metal connectors for NA and NB housing    polymer connectors for NF housing



VN CM11DN2	1NO+1NC	VN CP11DN2	1NO+1NC	2
VN CM11DN5	1NO+1NC	VN CP11DN5	1NO+1NC	5
VN CM12DN2	1NO+2NC	VN CP12DN2	1NO+2NC	2
VN CM12DN5	1NO+2NC	VN CP12DN5	1NO+2NC	5
VN CM22DN2	2NO+2NC	VN CP22DN2	2NO+2NC	2
VN CM22DN5	2NO+2NC	VN CP22DN5	2NO+2NC	5

Cable length(m)

M12 or AMP connector

M12 connector from right for NA and NB housing    M12 connector from bottom for NA and NB housing    M12 connector from right for NF housing    M12 connector from bottom for NF housing    AMP super seal 1.5 connector for NF housing



VN CM11DMK	1NO+1NC	VN CM11SMK	1NO+1NC	VN CP11DMK	1NO+1NC	VN CP11SMK	1NO+1NC	VN CP11SAK	1NO+1NC
VN CM22DMK	2NO+2NC	VN CM22SMK	2NO+2NC	VN CP22DMK	2NO+2NC	VN CP22SMK	2NO+2NC	VN CP02SAK	2NC

Actuators

Unidirectional roller lever



VN AA0AA	⊕	VN AA0AB	⊕	VN AA0AC	⊕	VN AA0AE	⊕	VN AA0BB	⊕	VN AA0BE	⊕	VN AA0CB	⊕	VN AA0CH	⊕	VN AA0CP	⊕
----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---

Plunger with Ø 6 mm sphere



VN AA0CV	⊕	VN AA0EB	⊕	VN AA0EE	⊕	VN AA0FB	⊕	VN AA0GB	⊕	VN AA0HB		VN AA0HE		VN AA0HH		VN AA0BB-W5	⊕
----------	---	----------	---	----------	---	----------	---	----------	---	----------	--	----------	--	----------	--	-------------	---

Revolving levers

ATTENTION: These loose actuators can be used with products of series NA, NB and NF only.



VN A00KA	⊕	VN A00KB	⊕	VN A00KC	⊕	VN A00KD	⊕	VN A00KE	⊕	VN A00KF	⊕	VN A00KG	⊕	VN A00KH	⊕	VN A00KP	⊕
----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---	----------	---

Square stainless steel rod 3x3x125 mm

Adjustable stainless steel rod Ø3x125 mm

Adjustable fiber glass rod Ø6x200 mm

Metal head for actuators with revolving lever

Transmission block

Installation for persons protection applications:

In order to obtain a safety switch with positive opening ⊕, assemble housings having the positive opening symbol next to the code ⊖ with actuators having the positive opening symbol next to the code ⊕.

Example:  
**VN A00KB ⊕ + VN AA200 ⊖ + NA B11000 ⊖**

VN A00LB	VN A00LE	VN A00LH	VN A00LL	VN AA200	⊕	VN AA000-W5	⊕
----------	----------	----------	----------	----------	---	-------------	---

Items with green background normally in stock at factory in Italy



## MK V series

Housing made of polymer glass-reinforced  
Positive opening ⊖ versions  
Protection degree from IP20 to IP65  
Markings and marks:

### Direct action

10 pcs pack



Screw terminals (IP40)  
Screw terminals (IP65)

MK V11D01	MK V11D02	MK V11D03	MK V11D04	MK V11D05 ⊕	MK V11D06 ⊕	MK V11D08 ⊕
MK V12D01	MK V12D02	MK V12D03	MK V12D04	MK V12D05 ⊕	MK V12D06 ⊕	MK V12D08 ⊕

### Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK V11D09 ⊕	MK V11D10 ⊕	MK V11D12 ⊕	MK V11D13 ⊕	MK V11D15 ⊕	MK V11D17 ⊕	MK V11D18 ⊕
MK V12D09 ⊕	MK V12D10 ⊕	MK V12D12 ⊕	MK V12D13 ⊕	MK V12D15 ⊕	MK V12D17 ⊕	MK V12D18 ⊕

### Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK V11D19 ⊕	MK V11D30	MK V11D31	MK V11D32	MK V11D35	MK V11D37	MK V11D40
MK V12D19 ⊕	MK V12D30	MK V12D31	MK V12D32	MK V12D35	MK V12D37	MK V12D40

### Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK V11D42	MK V11D45	MK V11D46	MK V11D47	MK V11D53	MK V11D59
MK V12D42	MK V12D45	MK V12D46	MK V12D47	MK V12D53	MK V12D59

### Back direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK V11F30	MK V11F31 ⊕	MK V11F32	MK V11F40	MK V11F42 ⊕	MK V11F45 ⊕	MK V11F46 ⊕
MK V12F30	MK V12F31 ⊕	MK V12F32	MK V12F40	MK V12F42 ⊕	MK V12F45 ⊕	MK V12F46 ⊕

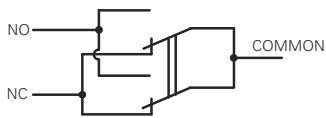
### Back direct action



Screw terminals (IP40)  
Screw terminals (IP65)

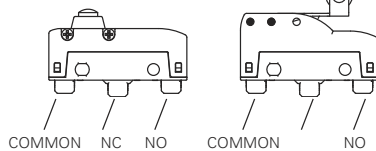
MK V11F47 ⊕	MK V11F49 ⊕	MK V11F59 ⊕
MK V12F47 ⊕	MK V12F49 ⊕	MK V12F59 ⊕

### Wire diagram



Contacts with single interruption and double contacts

With direct and back direct action (F, D)



### Rotating actuators



Thanks to the patented new lateral fixing system, it's possible to rotate the roller of microswitches MK ●●15 and MK ●●17 in 90° steps.

### Terminals type



**V** (Example: MK V11D04)  
screw terminals with self-lifting plate



**H** (Example: MK H11D04)  
6.3 mm vertical faston

### Protection degree

Protection degree:

IP20 (with protection VF C01 - VF C03)  
IP40 (with protection VF MKC●1● - VF C02)  
IP65 (with protection VF MKC●22 - VF MKC●23)  
according to EN 60529

Items with green background normally in stock at factory in Italy

# MK H series

Housing made of polymer glass-reinforced  
Positive opening ⊖ versions  
Protection degree from IP20 to IP65  
Markings and marks:

## Direct action

10 pcs pack



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11D01	MK H11D02	MK H11D03	MK H11D04	MK H11D05 ⊕	MK H11D06 ⊕	MK H11D08 ⊕
MK H12D01	MK H12D02	MK H12D03	MK H12D04	MK H12D05 ⊕	MK H12D06 ⊕	MK H12D08 ⊕

## Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11D09 ⊕	MK H11D10 ⊕	MK H11D12 ⊕	MK H11D13 ⊕	MK H11D15 ⊕	MK H11D17 ⊕	MK H11D18 ⊕
MK H12D09 ⊕	MK H12D10 ⊕	MK H12D12 ⊕	MK H12D13 ⊕	MK H12D15 ⊕	MK H12D17 ⊕	MK H12D18 ⊕

## Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11D19 ⊕	MK H11D30	MK H11D31	MK H11D32	MK H11D35	MK H11D37	MK H11D40
MK H12D19 ⊕	MK H12D30	MK H12D31	MK H12D32	MK H12D35	MK H12D37	MK H12D40

## Direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11D42	MK H11D45	MK H11D46	MK H11D47	MK H11D53	MK H11D59
MK H12D42	MK H12D45	MK H12D46	MK H12D47	MK H12D53	MK H12D59

## Back direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11F30	MK H11F31 ⊕	MK H11F32	MK H11F40	MK H11F42 ⊕	MK H11F45 ⊕	MK H11F46 ⊕
MK H12F30	MK H12F31 ⊕	MK H12F32	MK H12F40	MK H12F42 ⊕	MK H12F45 ⊕	MK H12F46 ⊕

## Back direct action



Screw terminals (IP40)  
Screw terminals (IP65)

MK H11F47 ⊕	MK H11F49 ⊕	MK H11F59 ⊕
MK H12F47 ⊕	MK H12F49 ⊕	MK H12F59 ⊕

## Protections (terminals covers)



Protection terminal cover for faston terminals snap-in assembled and with wire trap cable gland. It allows the installation of more switches side by side.

Article	Description	Prot. degr.
VF MKCH11	without gasket for cables from Ø 5 to Ø 7.5 mm	IP40
VF MKCH12	without gasket for cables from Ø 4 to Ø 7.5 mm	IP40
VF MKCH13	without gasket for cables from Ø 2 to Ø 5 mm	IP40
VF MKCH22	with gasket for cables from Ø 4 to Ø 7.5 mm	IP65
VF MKCH23	with gasket for cables from Ø 2 to Ø 5 mm	IP65



Protection terminal cover for vertical screw terminals snap-in assembled and with wire trap cable gland. It allows the installation of more switches side by side.

Article	Description	Prot. degr.
VF MKCV11	without gasket for cables from Ø 5 to Ø 7.5 mm	IP40
VF MKCV12	without gasket for cables from Ø 4 to Ø 7.5 mm	IP40
VF MKCV13	without gasket for cables from Ø 2 to Ø 5 mm	IP40
VF MKCV22	with gasket for cables from Ø 4 to Ø 7.5 mm	IP65
VF MKCV23	with gasket for cables from Ø 2 to Ø 5 mm	IP65



Protection terminal cover for screw terminals.  
Protection degree IP20

Article	Description
VF C01	Protection terminal



Protection terminal cover for screw terminals with cable gland PG9 for multipolar cables from Ø 5 to Ø 7 mm.  
Protection degree IP40

Article	Description
VF C02	Protection terminal






Protection terminal cover for screw terminals snap-in assembled. It allows the installation of more switches side by side.  
Protection degree IP20

Article	Description
VF C03	Protection terminal

10 pcs pack. Only orders for quantities multiple of the packs are accepted.












## PA, PX series

Housing made of polymer glass-reinforced   
 One conduit entry PG 13.5 (M20 available)  
 Two knock out conduit entries  
 Protection degree IP53 or IP65  
 Markings and marks:   (contact block)

With M25 hole for VF KIT31



snap action contacts 1NO+1NC	PX 10110 	PA 2010 	PX 10110-B 
snap action contacts 2NO+2NC	PX 10210 	PA 20200 	PX 10210-B 
slow action contacts 1NO+1NC	PX 10310 	PA 20300 	PX 10310-B 

### Code structure

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

article options  
**PX 10110-AM2**

Foot switches	
PX	with pedal actuator protection
PA	without pedal actuator protection

Protections color	
1	yellow RAL 1023
2	red RAL 3020
4	grey RAL 7040
5	black (on request)
6	blue RAL 5017 (on request)

Threaded conduit entry	
	PG 13.5 (standard)
M2	M20

Accessories (only PX series)	
	No accessories (standard)
A	Supplied with polymer carrying rod (400 mm)
B	With M25 hole for VF KIT31
C	With M25 hole for VF KIT31 complete with stabilizing plate
D	Supplied with polymer carrying rod (660 mm)

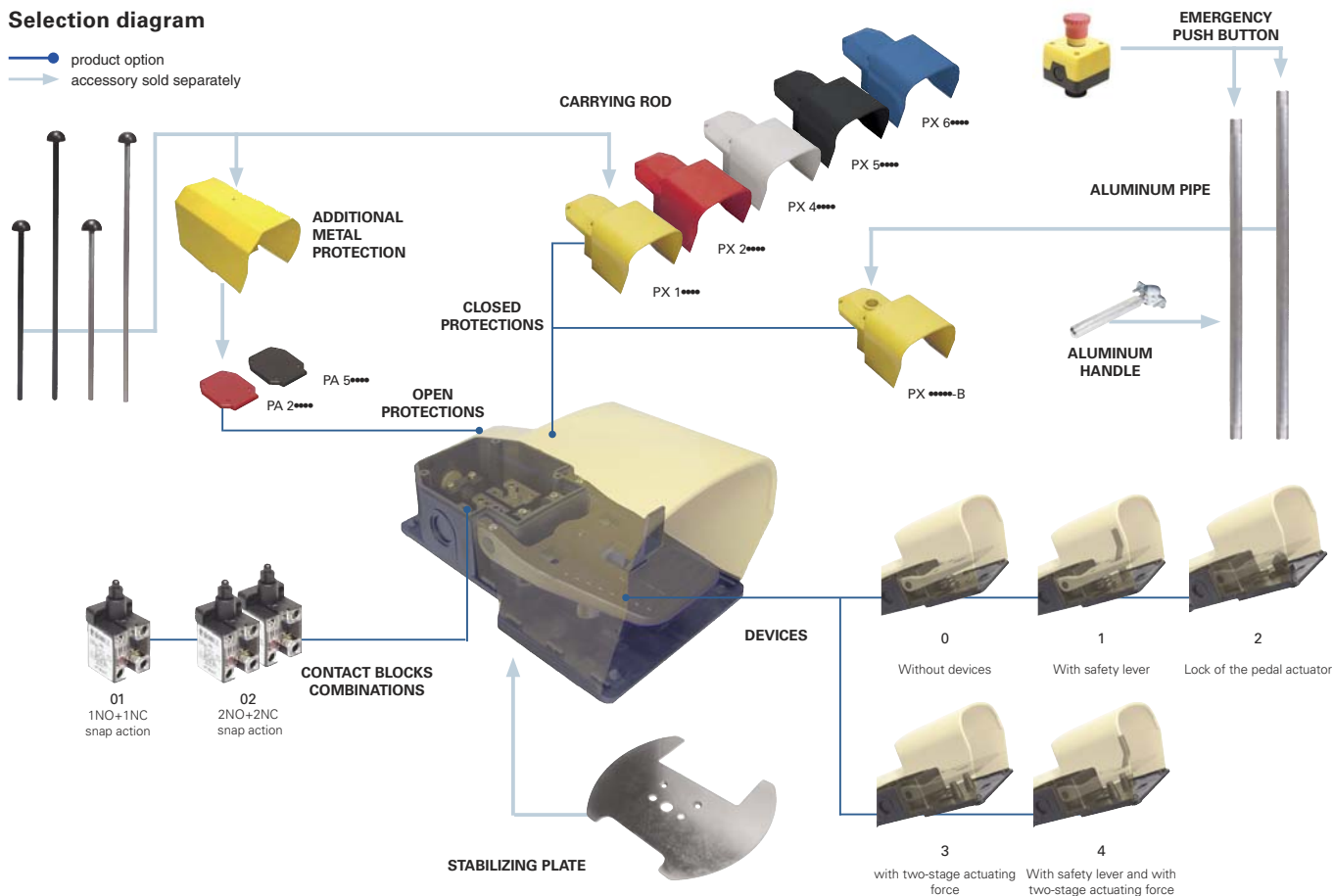
Contact blocks combinations	
01	1NO+1NC, snap action
02	2x(1NO+1NC), snap action
03	1NO+1NC, slow action
04	2x(1NO+1NC), slow action
05	2x2NO, slow action
06	2x2NC, slow action
07	2NC, slow action
08	2NO, slow action
09	1NO+1NC, slow action overlapped contacts
20	2x(1NO+1NC), snap action shifted contacts

Devices	
0	Without devices
1	With safety lever
2	Lock of the pedal actuator
3	Without safety lever and with two-stage actuating force (only for contact block combination 20)
4	With safety lever and with two-stage actuating force (only for contact block combination 20)

Protection degrees	
0	IP53
1	IP65

### Selection diagram

- product option
- ➔ accessory sold separately





<b>VF KIT20</b>	<b>VF KIT30</b>	<b>VF KIT21 (L=400 mm)</b> <b>VF KIT22 (L=660 mm)</b>	<b>VF KIT25 (L=400 mm)</b> <b>VF KIT26 (L=660 mm)</b>	
Foot switches joining devices made of polymer thermoplastic resin with a hole for a carrying rod, supplied with nuts, gaskets and self-tapping screws to fasten two single foot switches. Protection degree IP65	Foot switches joining devices made of polymer thermoplastic resin with threaded hole M25x1.5 supplied with nuts, gaskets and self-tapping screws to fasten two single foot switches. Protection degree IP65	Carrying rod (to be connected to VF KIT20) supplied with the self-tapping screw to fasten it.	Aluminum carrying rod (to be joined to VF KIT20) supplied with the self-tapping screw to fasten it.	
<b>VF KIT31 (L=660 mm)</b> <b>VF KIT29 (L=740 mm)</b>	<b>VF KIT18</b>	<b>VF KIT32 (1NC)</b> ⊕ <b>VF KIT33 (1NC+1NO)</b> ⊕ <b>VF KIT34 (2NC)</b> ⊕ <b>VF KIT35 (ø 20 mm hole)</b>	<b>VF KIT50</b>	
Aluminum pipe ø 25 mm with threaded ends M25x1.5 supplied with brass nuts and gaskets.	M25x1.5 brass nuts, use with VF KIT31 or VF KIT29 for commercial boxes.  10 pieces in each pack.	Emergency push button kit with mechanical positive action complying with IEC 60947-5-1 and EN 418, to be combined with VF KIT31 or VF KIT29. Protection degree IP65	Aluminum handle kit for pipe kit (VF KIT31 or VF KIT29).	
<b>VF KIT60</b>	<b>VF KIT61</b>	<b>VF KIT71</b>	<b>VF KIT81</b>	<b>VF B501</b> ⊕ (1NC+1NO, snap action) <b>VF B601</b> ⊕ (1NC+1NO, slow action)
Metallic stabilizing plate for single foot switches	Metallic stabilizing plate for double switches	Additional metal protection for single foot switch PA. For hard work environments. Higher dimensions for safety shoes	Additional metal protection for modular foot switch PC. For hard work environments. Higher dimensions for safety shoes	Additional contact block for foot switches (all foot switches are supplied with contact blocks).

## Examples of foot switches sets

Using the joining kits VF KIT20 or VF KIT30 the single foot switches can be joined (through knock out openings) in many different combinations.



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**Switches with separate actuator  
FD, FL, FC and FP series**

Housing made of polymer glass-reinforced or metal  
One or three conduit entries PG 13.5 (M20 available)  
IP67 Type 1, 4x "indoor use only", 12, 13  
Markings and marks:



slow action contacts 1NO+1NC	FD 693	FL 693	FC 3393	FP 693
slow action contacts 2NC	FD 993	FL 993	FC 3493	FP 993
slow action contacts 1NO+2NC	FD 2093	FL 2093		FP 2093

**Separate actuators**



VF KEYF

VF KEYF1

VF KEYF2

VF KEYF3

VF KEYF7

VF KEYF8

Attention! These loose actuators must be used with FD, FL, FC and FP series only.

**Switches with separate actuator  
FR, FX, FK and FW series**

Housing made of polymer glass-reinforced   
One, two or three conduit entries PG 13.5 (M20 available)  
IP67 Type 1, 4x "indoor use only", 12, 13  
Markings and marks:

3 conduit entries M20



slow action contacts 1NO+1NC	FR 693	FX 693	FK 3393	FW 3392-M2
slow action contacts 2NC	FR 993	FX 993	FK 3493	FW 3492-M2
slow action contacts 1NO+2NC	FR 2093	FX 2093		FW 2092-M2

**Separate actuators**



VF KEYD

VF KEYD1

VF KEYD2

VF KEYD3

VF KEYD5

VF KEYD6

VF KEYD7

VF KEYD8

VF KEYD10

VF KEYD11

Attention! These loose actuators must be used with FR, FX, FK and FW series only.



**Safety magnetic sensor  
SR series**

Housing made of polymer glass-reinforced  
2 m cable or integrated M8 connector versions  
IP67 and IP69K Type 1, 4x "indoor use only", 12  
Markings and marks:

with M8 connector

with M8 connector



contacts 2NC (with closed protection)	SR BD40AN2-B02F Actuation distance 8 mm	SR BD40ALK-B02F Actuation distance 8 mm	SR AD40AN2-A01N Actuation distance 5 mm	SR AD40ALK-A01N Actuation distance 5 mm
---------------------------------------	--	--	--	--



For safety applications, connect exclusively with safety modules CS AR-05, CS AR-06, CS AR-08, CS AT-0, CS AT-1, CS AT-2. See page 19.





## Hinged switches

### HP AA series

Metal housing, 2 m cable with output from top, from bottom or from back

M12 connector versions

IP67 & IP69K Type 1, 4x "indoor use only", 12

Markings and marks:

slow action contacts 1NO+2NC



HP AA052F-2SN HP AA052F-2AN HP AA052F-2PN HP AA052FKSM HP AA052FKAM

## Additional hinge



HC AA HC LL

## Hinged switches

### HP AB series



Metal housing, 2 m cable with output from top, from bottom or from back

M12 connector versions

IP67 & IP69K Type 1, 4x "indoor use only", 12

Markings and marks:

slow action contacts 1NO+2NC



HP AB052F-2SN HP AB052F-2AN HP AB052F-2PN HP AB052FKSM HP AB052FKAM

HC AB

## Switches for hinged protections

### FD, FL and FC series

Housing made of metal  
One or three conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:

slow action contacts 1NO+1NC

slow action contacts 2NC

slow action contacts 1NO+2NC



FD 1895 FL 1895 FC 3395   
FD 995 FL 995 FC 3495   
FD 2095 FL 2095

## Accessories

See on page 21.  
For the whole accessories list please see the general catalogue.



## Switches for hinged protections FR, FX, FK, FM and FZ series

Housing made of polymer or metal  
One or two conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:

slow action contacts 1NO+1NC

slow action contacts 2NC

slow action contacts 1NO+2NC



FR 1896 FX 1896 FK 3396 FM 1896 FZ 1896   
FR 996 FX 996 FK 3496 FM 996 FZ 996   
FR 2096 FX 2096 FM 2096 FZ 2096

## Switches with slotted hole lever FR, FX series

Housing made of polymer

One or two conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:

slow action contacts 1NO+1NC

slow action contacts 2NC

slow action contacts 1NO+2NC



FR 18C1 FR 18C2 FR 18C3 FX 18C1 FX 18C2 FX 18C3   
FR 9C1 FR 9C2 FR 9C3 FX 9C1 FX 9C2 FX 9C3   
FR 20C1 FR 20C2 FR 20C3 FX 20C1 FX 20C2 FX 20C3

## Switches with slotted hole lever FM, FZ series

Housing made of metal

One or two conduit entries PG 13.5 (M20 available)

IP67 Type 1, 4x "indoor use only", 12, 13

Markings and marks:

slow action contacts 1NO+1NC

slow action contacts 2NC

slow action contacts 1NO+2NC



FM 18C1 FM 18C2 FM 18C3 FZ 18C1 FZ 18C2 FZ 18C3   
FM 9C1 FM 9C2 FM 9C3 FZ 9C1 FZ 9C2 FZ 9C3   
FM 20C1 FM 20C2 FM 20C3 FZ 20C1 FZ 20C2 FZ 20C3

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**Switches with solenoid FG series**

Housing made of metal  
 4 poles contact blocks  
 Actuator holding force 2500 N  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Signaling LED  
 Three conduit entries M20  
 Markings and marks:

Locked actuator with **De-energized** 24 Vac/dc solenoid

Locked actuator with **Energized** 24 Vac/dc solenoid

Locked actuator with **De-energized** 24 Vac/dc solenoid.  
 With lock release device.

Locked actuator with **De-energized** 24 V ac/dc solenoid.  
 With lock release device and release push button.

Locked actuator with **De-energized** 24 Vac/dc solenoid. With release push button.



contacts 1NO+1NC (solenoid)+1NO+1NC (actuator)

contacts 2NC (solenoid)+1NO+1NC (actuator)

contacts 3NC (solenoid)+1NC (actuator)

FG 60AD1D0A	FG 60AD1E0A	FG 60AD5D0A	FG 60AD6D0A	FG 60AD7D0A
FG 60BD1D0A	FG 60BD1E0A	FG 60BD5D0A	FG 60BD6D0A	FG 60BD7D0A
FG 60CD1D0A	FG 60CD1E0A	FG 60CD5D0A	FG 60CD6D0A	FG 60CD7D0A

**Separate actuators**



VF KEYF20

VF KEYF21

VF KEYF22

VF KEYF28

Attention! These loose actuators must be used with FG series only.

**Switches with solenoid FS series**

Housing made of polymer glass-reinforced   
 Three conduit entries PG 13.5 (M20 available)  
 IP66 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:

Locked actuator with **De-energized** 24 Vac/dc solenoid

Locked actuator with **Energized** 24 Vac/dc solenoid



**Separate actuators**



VF KEY

VF KEYF1



VF KEYF2

VF KEYF3



VF KEYF7

VF KEYF8

Attention! These loose actuators must be used with FD, FS and FP series only.

**Switches with manual mechanical delay FD, FP series**

Housing made of polymer glass-reinforced or metal  
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:

With actuator **locking/unlocking** manually timed (20 s)

With actuator **locking/unlocking** manually timed (10 s)



slow action contacts 1NO+1NC  
 slow action contacts 2NC  
 slow action contacts 1NO+2NC

FD 6R2	FP 6R2	FD 6R2-L10
FD 9R2	FP 9R2	FD 9R2-L10
FD 20R2	FP 20R2	FD 20R2-L10

**Switches with lock FD, FP series**

Housing made of polymer glass-reinforced or metal  
 One conduit entry PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:



slow action contacts 1NO+1NC  
 slow action contacts 1NO+2NC

FD 1899	FP 1899
FD 2099	FP 2099



## Rope switches for emergency stop FD, FL, FC and FP series

Housing made of polymer glass-reinforced or metal  
 One or three conduit entries PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:

contacts 1NO+1NC
contacts 2NC
contacts 1NO+2NC

Longitudinal head				Transversal head			

## Rope switches for simple stop FD, FL, FC and FP series

Housing made of polymer glass-reinforced or metal  
 One or three conduit entries PG 13.5 (M20 available)  
 IP67 Type 1, 4x "indoor use only", 12, 13  
 Markings and marks:

contacts 1NO+1NC
contacts 2NC
contacts 1NO+2NC

Longitudinal head				Transversal head	

## Rope installation accessories



Article	VF AF-TR5	VF AF-TR8	VF AF-MR5	VF AF-ME78	VF AF-ME80	VF F05-100	VF AF-IF1GR03	VF AF-CA5	VF AF-CA10
Description	Adjustable stay bolt	Stay bolt	End clamp	Safety spring for longitudinal heads	Safety spring for transversal heads	Ø 5 mm rope 100 m roll	Rope function indicators. Text "STOP"	Pulley	Angular pulley

## Rope installation accessories kits, FAST line

Article	Kit content
	1x VF AF -TR5 1x VF AF -MR5 1x VF F05-010
	1x VF AF -TR5 1x VF AF -MR5 1x VF F05-020
	1x VF AF -TR5 1x VF AF -MR5 1x VF F05-035

10 m

20 m

35 m

Items with green background normally in stock at factory in Italy



The CS series safety modules have been studied with clear aims of safety and reliability for the product. The design, development and production of these units have been faced with the passion for quality that distinguishes Pizzato Elettrica, adding further controls where possible. Maximum safety is the basic principle for this range of products.

During the design phase, principles of over-sizing were adopted, and the circuit schemes have been checked by independent third party institutes. Also the selection of the components used has been made with accurate quality aims, and the basic parts, such as relays with forced guided contacts, have been chosen among the best brands existing. The production phase itself, completely developed within the company Pizzato Elettrica, is supervised with a functional testing on 100% of the production. Every single piece produced is verified in a computerised testing station that prints the safety module label, identified from a unique serial number, only when the product passes every test.

Pizzato Elettrica has improved also the more practical aspects, using compact housings and with LED signals of the operation state of the modules. Particular attention has been paid to the connection possibilities, allowing the customer to choose between fixed clamps or plug-in connectors and screw or spring terminals. Finally, the range of products provides different supply tensions with a wide tolerance on nominal values to avoid any problem in the less industrialised countries.

## Safety modules for emergency stop and gate monitoring



Product code	Supply voltages	Output contacts instantaneous	For applications up to			Autom. or manual start	Monitored start	Type of inputs (⑦)				Kind of connection ④			Housing dimensions (mm)
			PL	SIL	Saf. Cat.			⌚	⌚	⌚	V	M	X		
CS AR-01V024	24 Vac/dc	2NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-01V120	120 Vac	2NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-01V230	230 Vac	2NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-02V024	24 Vac/dc	3NO	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-02V120	120 Vac	3NO	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-02V230	230 Vac	3NO	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-04V024	24 Vac/dc	3NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-04V120	120 Vac	3NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-04V230	230 Vac	3NO+1NC	e	3	4	■	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-05V024	24 Vac/dc	3NO+1NC	e	3	4	■	-	■	■	■	-	■	■	■	22.5 x 114
CS AR-05V120	120 Vac	3NO+1NC	e	3	4	■	-	■	■	■	-	■	■	■	22.5 x 114
CS AR-05V230	230 Vac	3NO+1NC	e	3	4	■	-	■	■	■	-	■	■	■	22.5 x 114
CS AR-06V024	24 Vac/dc	3NO+1NC	e	3	4	-	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-06V120	120 Vac	3NO+1NC	e	3	4	-	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-06V230	230 Vac	3NO+1NC	e	3	4	-	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-07M024	24 Vac/dc	4NO+1NC	e	3	4	■	■	■	-	-	-	-	■	■	22.5 x 149
CS AR-08V024	24 Vac/dc	2NO	e	3	4	■	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-08V120	120 Vac	2NO	e	3	4	■	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-08V230	230 Vac	2NO	e	3	4	■	■	■	■	■	-	■	■	■	22.5 x 114
CS AR-20V024	24 Vac/dc	2NO	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-20V120	120 Vac	2NO	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-20V230	230 Vac	2NO	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-21V024	24 Vac/dc	2NO	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-21V120	120 Vac	2NO	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-21V230	230 Vac	2NO	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-22V024	24 Vac/dc	3NO+1NC	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-22V120	120 Vac	3NO+1NC	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-22V230	230 Vac	3NO+1NC	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-23V024	24 Vac/dc	3NO+1NC	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-23V120	120 Vac	3NO+1NC	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-23V230	230 Vac	3NO+1NC	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-24V024	24 Vac/dc	4NO+1NC	e	3	3	■	-	■	-	-	-	■	■	■	22.5 x 114
CS AR-25V024	24 Vac/dc	4NO+1NC	e	3	3	-	■	■	-	-	-	■	■	■	22.5 x 114
CS AR-40V024	24 Vac/dc	2NO	d	2	2	■	-	■	-	-	-	■	■	■	22.5 x 91
CS AR-41V024	24 Vac/dc	2NO	d	2	2	-	■	■	-	-	-	■	■	■	22.5 x 91
CS AR-46V024	24 Vac/dc	1NO	c	1	1	■	-	■	-	■	-	■	■	■	22.5 x 91



## Safety modules for safety mats and safety edges with 4 wires technology



Product code	Supply voltages	Output contacts instantaneous	For applications up to			Autom. or manual start	Monitored start	Type of inputs (⑦)				Kind of connection ④			Housing dimensions (mm)
			PL	SIL	Saf. Cat.			⌚	⌚	⌚	⌚	V	M	X	
CS AR-51V024	24 Vac/dc	2NO	e	3	4	■	■	■	-	-	■	■	■	■	22.5 x 114

### Code structure

## CS AR-01V024

Kind of connection		Supply voltage		
<b>V</b>	screw terminals	<b>024</b>	24 Vac/dc	±15%
<b>M</b>	connector with screw terminals	<b>120</b>	120 Vac	±15%
<b>X</b>	connector with spring terminals	<b>230</b>	230 Vac	±15%



V screw terminals

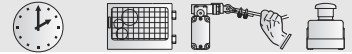


M connector with screw terminals



X connector with spring terminals

Safety modules for emergency stop and gate monitoring with delayed contacts at de-energizing



Product code	Supply voltages	Output contacts			For applications up to			Autom. or manual start	Monitored start	Type of inputs (7)				Kind of connection (4)			Housing dimensions (mm)
		instantaneous	delayed	feedback	PL	SIL	Saf. Cat.			Electromechanical	Electrosensible	Safety magnetic	Safety mats	V	M	X	
CS AT-0(3)V024	24 Vac/dc	2NO+1NC	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-0(3)V120	120 Vac	2NO+1NC	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-0(3)V230	230 Vac	2NO+1NC	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-1(3)V024	24 Vac/dc	3NO	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-1(3)V120	120 Vac	3NO	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-1(3)V230	230 Vac	3NO	2NO	-	e	3	4 (2)	■	■	■	■	■	-	■	■	■	45 x 114
CS AT-2(3)V024	24 Vac/dc	2NO	1NO	-	e	3	4 (2)	■	■	■	-	■	-	■	■	■	22.5 x 114

Safety timer module with delayed contacts at energizing



Product code	Supply voltages	Output contacts			For applications up to			Autom. or manual start	Monitored start	Type of inputs (7)				Kind of connection (4)			Housing dimensions (mm)
		instantaneous	delayed	feedback	PL	SIL	Saf. Cat.			Electromechanical	Electrosensible	Safety magnetic	Safety mats	V	M	X	
CS FS-0(3)V024	24 Vac/dc	-	1NO+2NC	-	①	①	①	-	-	■	-	-	-	■	■	■	22.5 x 114
CS FS-0(3)V120	120 Vac	-	1NO+2NC	-	①	①	①	-	-	■	-	-	-	■	■	■	22.5 x 114
CS FS-0(3)V230	230 Vac	-	1NO+2NC	-	①	①	①	-	-	■	-	-	-	■	■	■	22.5 x 114
CS FS-2(3)U024	24 Vdc	-	1NO+1NC+1CO	-	d	2	3	-	-	■	-	-	-	■	■	■	45 x 114
CS FS-2(3)V120	120 Vac	-	1NO+1NC+1CO	-	d	2	3	-	-	■	-	-	-	■	■	■	45 x 114
CS FS-3(3)U024	24 Vdc	-	1NO+1NC+1CO	-	d	2	3	-	-	■	-	-	-	■	■	■	45 x 114
CS FS-3(3)V120	120 Vac	-	1NO+1NC+1CO	-	d	2	3	-	-	■	-	-	-	■	■	■	45 x 114
CS FS-5(3)U024	24 Vdc	-	1NO+1NC+1CO	-	d	2	3	■	■	■	-	■	-	■	■	■	45 x 114
CS FS-5(3)V120	120 Vac	-	1NO+1NC+1CO	-	d	2	3	■	■	■	-	■	-	■	■	■	45 x 114



Safety modules for bimanual controls or synchronism check



Product code	Supply voltages	Output contacts			Safety category	Autom. or manual start	Monitored start	Type of inputs (7)				Kind of connection (4)			Housing dimensions (mm)
		instantaneous	delayed	feedback				Electromechanical	Electrosensible	Safety magnetic	Safety mats	V	M	X	
CS DM-01V024	24 Vac/dc	3NO+1NC	-	-	IIIC (EN 547)	-	-	■	-	-	-	■	■	■	22.5 x 114
CS DM-01V120	120 Vac	3NO+1NC	-	-	IIIC (EN 547)	-	-	■	-	-	-	■	■	■	22.5 x 114
CS DM-01V230	230 Vac	3NO+1NC	-	-	IIIC (EN 547)	-	-	■	-	-	-	■	■	■	22.5 x 114

Safety module for standstill monitor



Product code	Supply voltages	Output contacts			For applications up to			Autom. or manual start	Monitored start	Type of inputs (7)				Kind of connection (4)			Housing dimensions (mm)
		instantaneous	delayed	feedback	PL	SIL	Saf. Cat.			Electromechanical	Electrosensible	Safety magnetic	Safety mats	V	M	X	
CS AM-01VE01	24 ... 230 Vac/dc	2NO+1NC	-	-	d	2	3	-	-	-	-	-	-	■	■	■	45 x 114



Expansion modules with instantaneous contacts or delayed contacts at de-energizing



Product code	Supply voltages	Output contacts			For applications up to			Releasing time at de-energization	Type of inputs (7)				Kind of connection (4)			Housing dimensions (mm)
		instantaneous	delayed	feedback	PL	SIL	Saf. Cat.		Electromechanical	Electrosensible	Safety magnetic	Safety mats	V	M	X	
CS ME-01V024	24 Vac/dc	5NO+1NC	-	1NC	①	①	①	-	■	-	-	-	■	■	■	22.5 x 114
CS ME-03U024	24 Vdc	3NO	-	1NC	①	①	①	-	■	■	-	-	■	■	■	22.5 x 91
CS ME-20VU24-TF(5)	24 Vdc	-	4NO+2NC	1NC	①	①	①	up to 3 s (fixed)	■	-	-	-	■	■	■	22.5 x 114
CS ME-30VU24-TF(6)	24 Vdc	-	4NO+2NC	1NC	①	①	①	up to 12 s (fixed)	■	-	-	-	■	■	■	45 x 114
CS ME-31VU24-TS12	24 Vdc	-	4NO+2NC	1NC	①	①	①	from 1 to 12 s (adjustable)	■	-	-	-	■	■	■	45 x 114



Legend

- Available with this product
- Not available with this product
- ① Dependent from the base module
- ② Safety category 4 for instantaneous contacts, category 3 for delayed contacts
- ③ Delayed contacts releasing time
  - 0 fixed time
  - 1 from 0.3 to 3 s, step 0.3 s
  - 2 from 1 to 10 s, step 1 s
  - 3 from 3 to 30 s, step 3 s
  - 4 from 30 to 300 s, step 30 s
- ④ Kind of connection
  - V screw terminals
  - M connector with screw terminals
  - X connector with spring terminals
- ⑤ Releasing time in absence of power supply
  - TF0.5 0.5 s fixed time
  - TF1 1 s fixed time
  - TF2 2 s fixed time
  - TF3 3 s fixed time
- ⑥ Releasing time in absence of power supply
  - TF1 1 s fixed time
  - TF12 12 s fixed time
- ⑦ Type of inputs
  - Electromechanical contacts
  - Electrosensible devices with PNP output
  - Safety magnetic sensor
  - Safety mats and safety edges with 4 wires technology

Markings and quality marks



Items with green background normally in stock at factory in Italy



**Male connector M12**  
Protection degree IP68.  
Wall side thread PG 13.5.

Article	Description
VF CNM4PM	4 poles M12 connector made of metal
VF CNM5PM	5 poles M12 connector made of metal
VF CNM8PM	8 poles M12 connector made of metal
VF CNP4PM	4 poles M12 connector made of plastic
VF CNP5PM	5 poles M12 connector made of plastic
VF CNP8PM	8 poles M12 connector made of plastic



**Wiretrap cable gland**  
The new design and technology allows this type of cable gland to offer a higher resistance to cable tractions. Every cable gland can also accept a wider diameter cable range.  
Protection degree IP67.

10 pcs pack.

Article	Description
VF PAM16C5N	Cable gland M16x1.5, cable from Ø 5 to Ø 10 mm.
VF PAM16C3N	Cable gland M16x1.5, cable from Ø 3 to Ø 7 mm.
VF PAM20C5N	Cable gland M20, cable from Ø 5 to Ø 10 mm.
VF PAM20C3N	Cable gland M20, cable from Ø 3 to Ø 7 mm.
VF PAM13C6N	Cable gland PG 13.5, cable from Ø 6 to Ø 12 mm.
VF PAM13C3N	Cable gland PG 13.5, cable from Ø 3 to Ø 7 mm.
VF PAM11C5N	Cable gland PG 11, cable from Ø 5 to Ø 10 mm.
VF PAM11C3N	Cable gland PG 11, cable from Ø 3 to Ø 7 mm.
VF PAM16C3N	Cable gland M16x1.5, cable from Ø 3 to Ø 7 mm.



**Protection plugs**  
Protection plug for threaded conduit entries.  
Protection degree IP67.

100 pcs pack.

Article	Description
VF PTG13.5	Protection plug PG13.5
VF PTM20	Protection plug M20
VF PTG11	Protection plug PG11
VF PTM16	Protection plug M16x1.5



**Light indicators**  
A light indicator is used in order to visualize a change of state of the electric contacts inside the switch. It can be installed only in the series FL, FX, FZ or FS by screwing it on one of the conduit entries not used for electric cables.  
Protection degree IP67.

5 pcs pack.

Article	Description
VF ILI024GP	Light indicator yellow, 24 Vac/dc
VF ILI024VP	Light indicator green, 24 Vac/dc
VF ILI024RP	Light indicator red, 24 Vac/dc
VF ILX000TP	Transparent light indicator, without lamp



**Fixing plates for ceiling installations**  
Metal fixing plate, designed to fix rope switches on ceiling. The plate is provided with many fixing holes suitable for all switches series. It is supplied without screws.

Article	Description
VF SFP2	Fixing plates for ceiling installations



**Female connector M8 and M12**  
- Self-locking vibration-damping ring nut.  
- High flexibility wire suitable to be used in movable chains  
- Protection degree IP68  
- Gold plated contact (resistance < 5 mΩ)  
- Connector body in polyurethane

Article	Description
VF CA4PD3K	4 poles straight M8 connector, length 3 m
VF CA4PD5K	4 poles straight M8 connector, length 5 m
VF CA4PD3M	4 poles straight M12 connector, length 3 m
VF CA4PD5M	4 poles straight M12 connector, length 5 m
VF CA5PD3M	5 poles straight M12 connector, length 3 m
VF CA5PD5M	5 poles straight M12 connector, length 5 m
VF CA8ED5M	8 poles straight M12 connector, length 5 m



**Thread adapters**  
With these adapters it is possible to offer to the customers the same product with different threaded cable entries, while only having to stock a single product and many kinds of adapters.

100 pcs pack.

Article	Description
VF ADPG13-PG11	Adapter from PG 13.5 to PG 11
VF ADPG13-M20	Adapter from PG 13.5 to M20
VF ADPG13-1/2NPT	Adapter from PG 13.5 to 1/2 NPT
VF ADPG11-1/2NPT	Adapter from PG 11 to 1/2 NPT



**Chock plug for cable**  
Chock plug for multipolar cable, threaded M20x1.5.  
Protection degree IP54.

100 pcs pack.

Article	Description
VF PFM20C8N	Chock plug for cable from Ø 8 to Ø 12 mm, threaded M20
VF PFM20C4N	Chock plug for cable from Ø 4 to Ø 8 mm, threaded M20



**Plastic threaded nuts**  
Plastic nuts for fixing of cable glands or connectors on wall.

100 pcs pack.

Article	Description
VF DFPP13	Plastic threaded nuts PG13.5
VF DFPM20	Plastic threaded nuts M20



**Fixing plates for FR, FX series**  
Fixing plate (complete with fastening screws) provided with long slots for the adjustment of the actuating point.  
Every plate has double couple of fixing holes, one for standard switches and the other one for switches with reset device. In this way the actuator will always have the same actuating point.

Article	Description
VF SFP1	Fixing plates for FR series
VF SFP3	Fixing plates for FX series



**Actuator entry locking devices.**  
Padlockable device to lock the actuator entry in order to prevent from the accidental closing of the door behind operators while they are inside the machine. To be used only with series with metal heads.

Article	Description
VF KB1	Actuator entry locking device for FD, FL, FC and FS series only
VF KB2	Actuator entry locking device for FG series only

Any information or application example, included the connection diagrams, described in this document are to be intended as purely descriptive. The choice and application of the products within the limits prescribed in the general catalogue or in the documentation supplied with the product and in conformity with the Standards in force, in order to avoid damages to persons or goods, is under the responsibility of the user. The drawings and data contained in this catalog are not binding, and we reserve the right to improve the quality of our products to modify them at any time without prior notification. This publication cannot be copied in whole or in part without prior permission from the publisher.



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Production program



ATEX brochure



Lift devices  
brochure



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