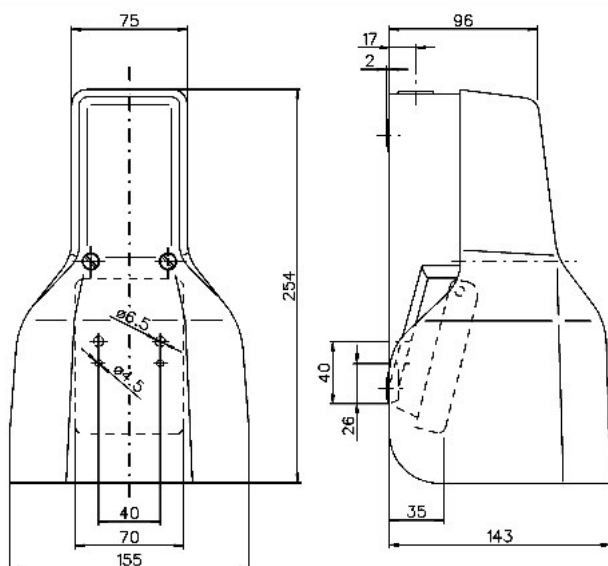
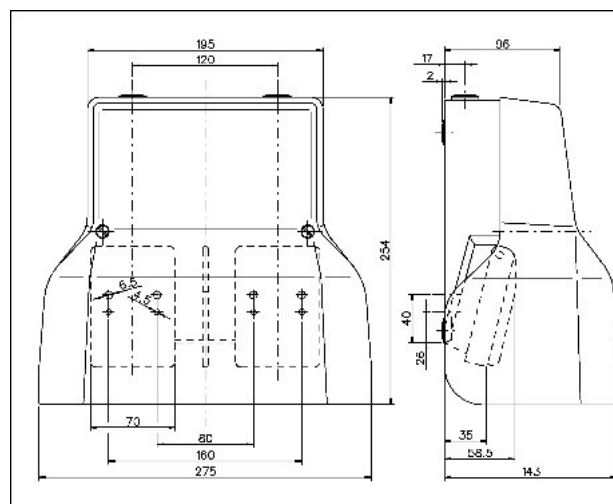




Safety foot-switch, single pedal



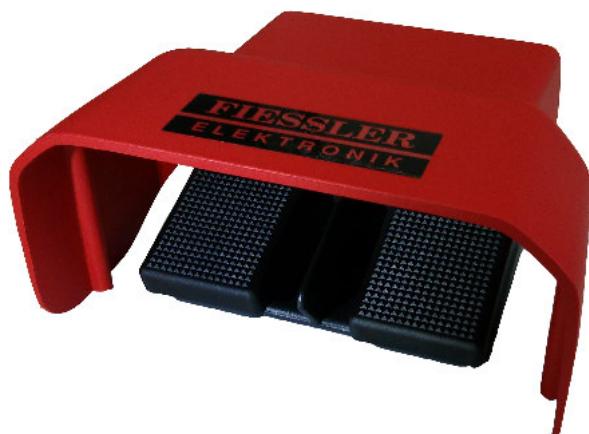
Foot-switch, single pedal



Safety foot-switch, double pedal



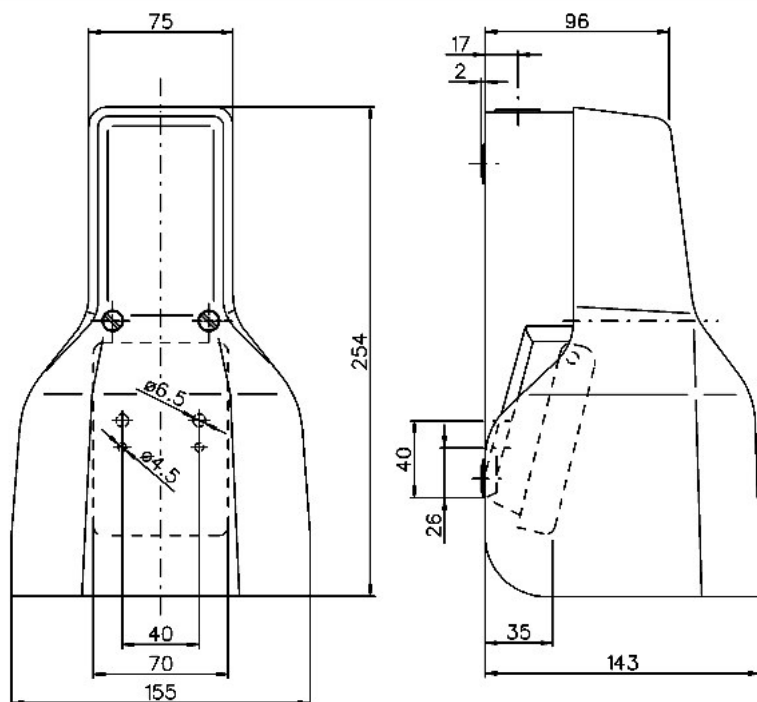
Safety foot-switch with Pedallock and/or Lever



Here you will find an overview about the deliverable foot pedals.

Divergent configurations are possible, please request an offer.

	Page
- Single pedal foot switch	3 - 6
- Double pedal foot switch	7
- Single pedal safety foot switch	9 - 16
- Double pedal safety foot switch	17 - 34



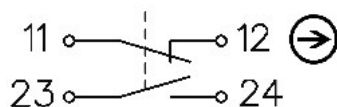
The foot pedal FE-FS1-U1-U is equipped with a switching element, which contains one NC and one NO contact. It may e.g. be used for the selection of AKAS® Box bending function or opening of a press.

Switching diagram:

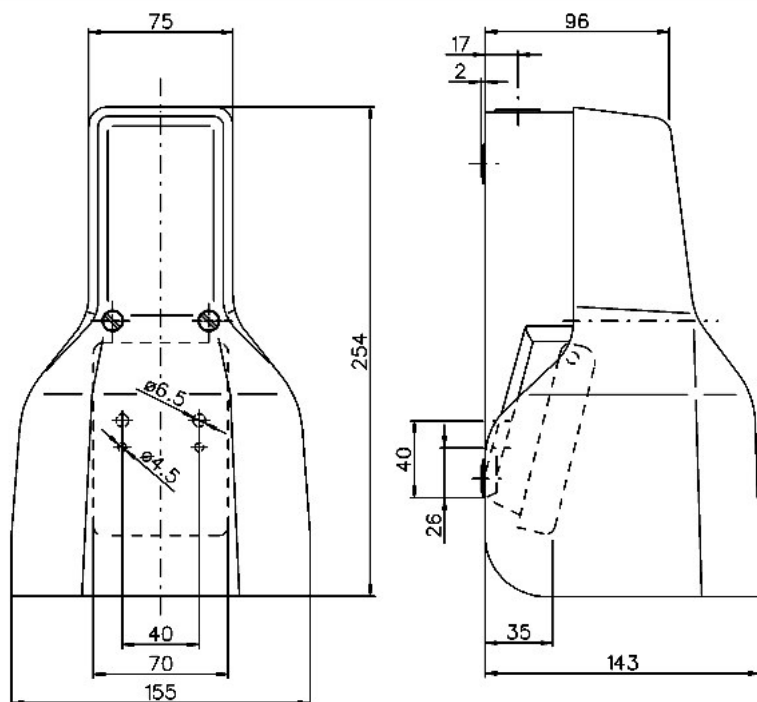
	free position	pressed down
23-24		
11-12		

Contact closed
 Contact open

Switching elements:

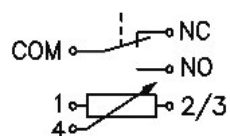


Execution	1-aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	1 changeover contact, positive opening
Switching function	Changeover
Switching system	Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-U1-U-xx (xx = RD = cover firered RAL 3000) (xx = YE = cover yellow RAL 1021)

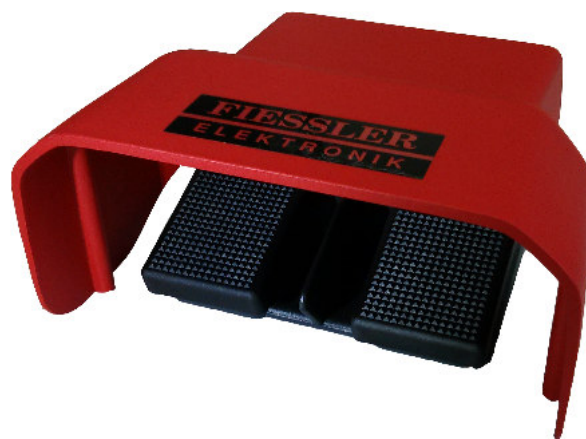
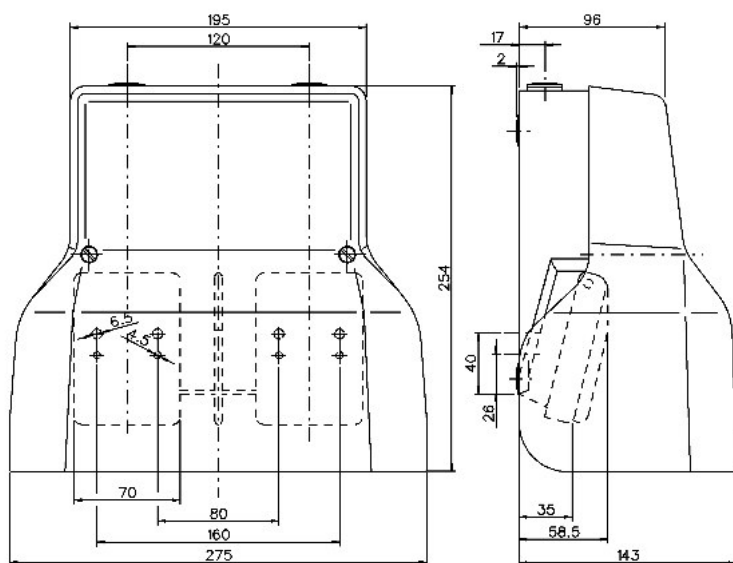


The foot pedal FE-FS1-SU1P10-U is equipped with a change-over contact with potentiometer. It may e.g. be used for continuous control tasks.

Switching elements:



Execution	1-aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 250 VAC, 40-60Hz
Switching current	max. 6 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	1 changeover contact 1 potentiometer
Switching function	Changeover
Switching system	Jump mechanism
Potentiometer	0 - 10kOhm ±3%, 0,5W, 35mA
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-SU1P10-U (xx = RD = cover firered RAL 3000)



The foot pedal FE-FS1-U1/U1-U is equipped with switching elements, which contains one NC and one NO contact. It may e.g. be used for the selection of AKAS® Box bending function or opening of a press.

Switching diagram:

Left pedal:

	free position	pressed down
23-24		
11-12		

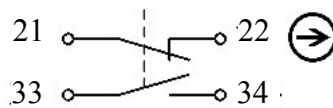
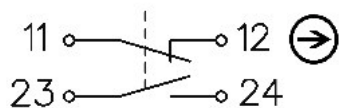
Contact closed 
 Contact open 

Right pedal:

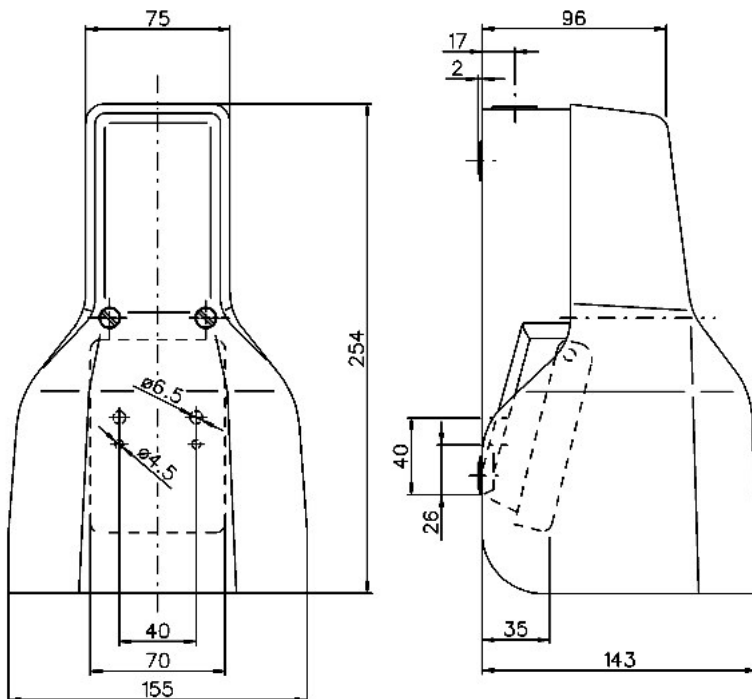
	free position	pressed down
33-34		
21-22		

Contact closed 
 Contact open 

Switching elements:



Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact, positive opening
	Rigth pedal: 1 changeover contact, positive opening
Switching function	Left pedal: Changeover
	Right pedal: Changeover
Switching system	Left pedal: Creep mechanism
	Right pedal: Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-U1/U1-U-XX (XX = RD = cover firered RAL 3000)

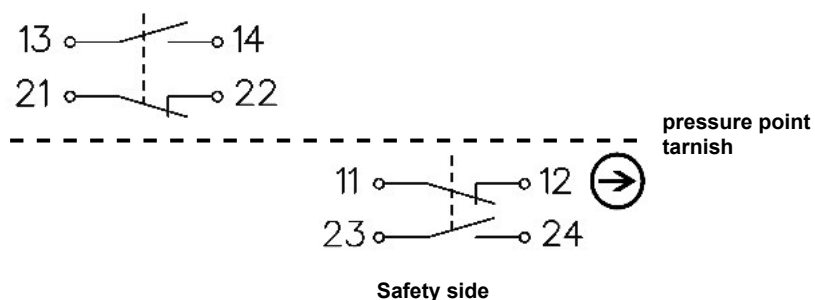


The foot pedal FE-FS1-SU1ASDU1-U have 3 positions with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switches (1 positive opening NC contact + 1NO) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

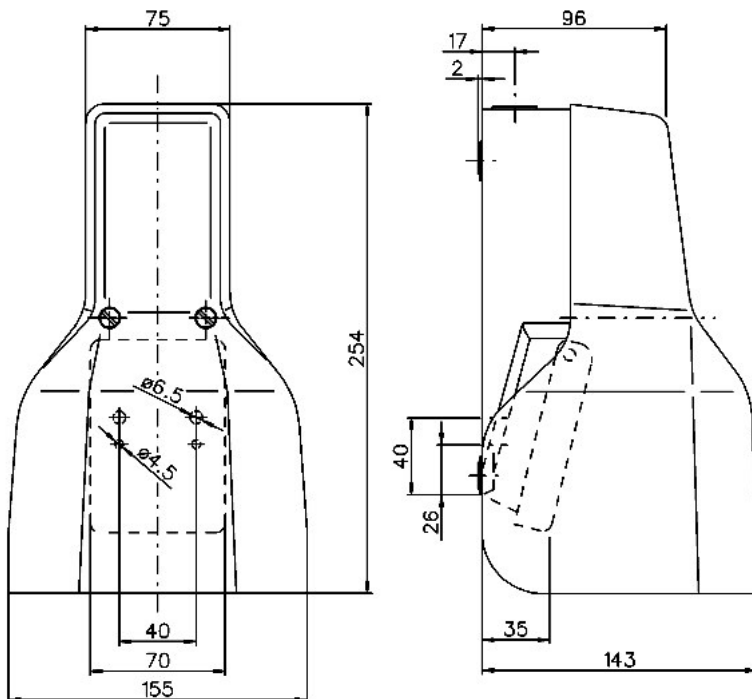
Switching diagram:



Switching elements:

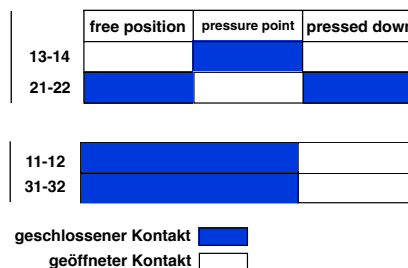


Execution	1-aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	1 changeover contact with tarnish, after pressure point 1 changeover contact, positive opening
Switching function	Sequential circuit with pressure point
pressure point	Min. 200 N operating force when use as intended
Switching system	Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-SU1ASDU1-U-xx (xx = RD = cover firered RAL 3000)

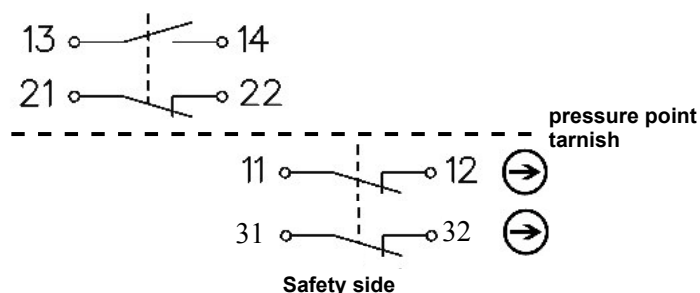


The foot pedal FE-FS1-SU1ASDO2-U have 3 positions with a pressure point to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NO and 1NC) to drive the movement and one safety switches (2 positive opening NC contacts) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

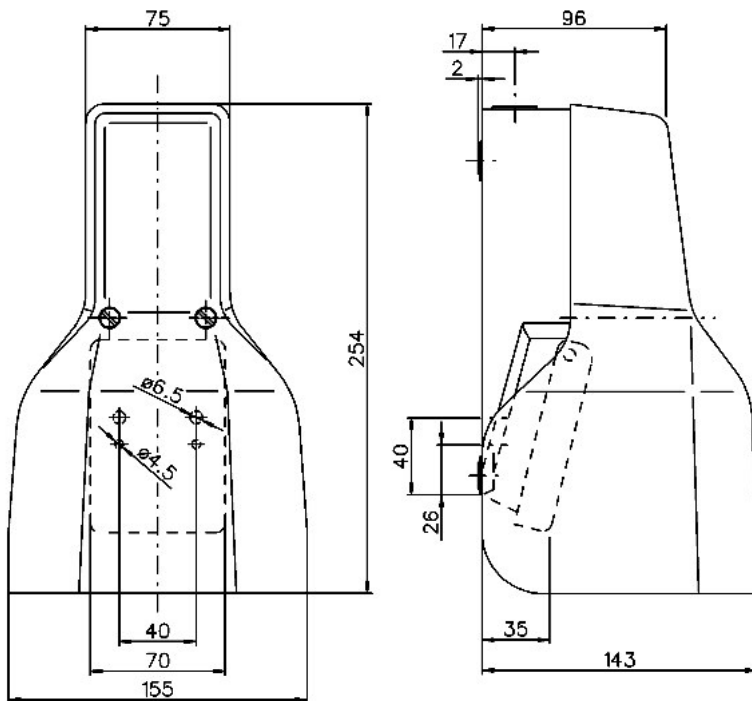
Switching diagram:



Switching elements:



Execution	1-aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	1 changeover contact with tarnish, after pressure point 2 NC contacts, positive opening
Switching function	Sequential circuit with pressure point
pressure point	Min. 200 N operating force when used as intended
Switching system	Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-SU1ASDO2-U-xx (xx = RD = cover firered RAL 3000)



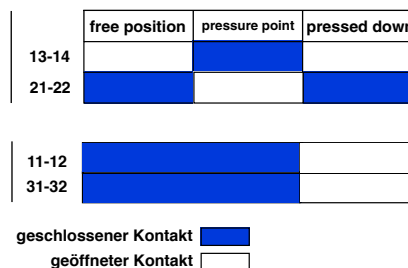
The foot pedal FE-FS1-SU1ASDO2V-U have 3 positions with a pressure point and a pedal lock with manual release, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NO and 1NC) to drive the movement and one safety switches (2 positive opening NC contacts) to stop the movement.

Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement.

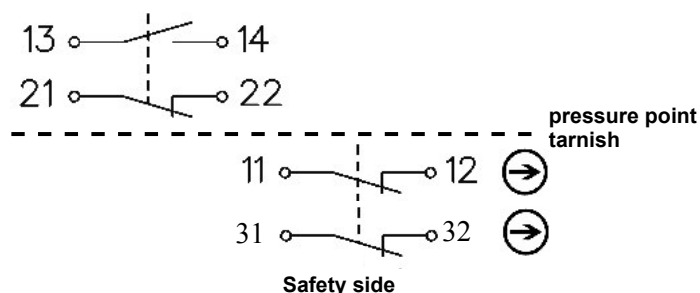
Thus a redundant information for the safety circuit is available.

A restart of the machine is only possible after releasing the foot switch.

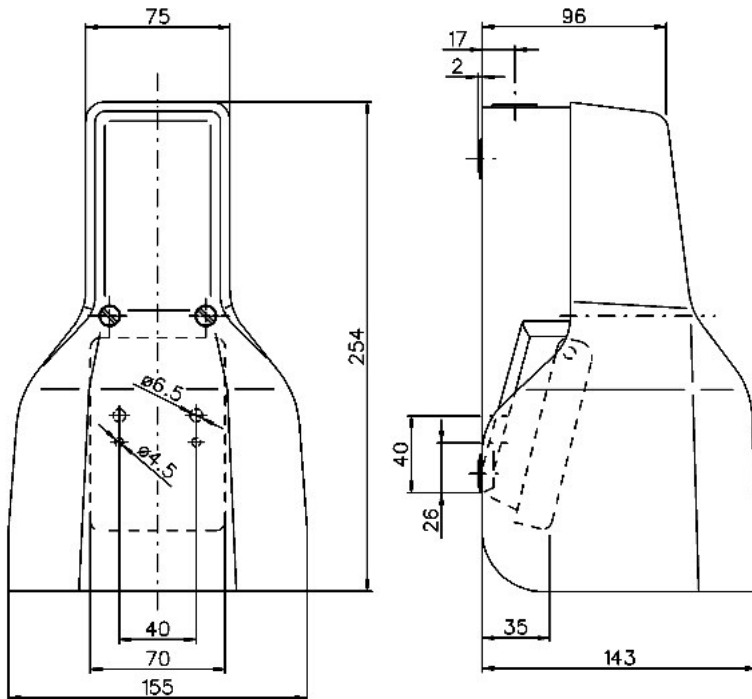
Switching diagram:



Switching elements:



Execution	1-aluminum foot pedal heavy version, Pedal lock with manual release, free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	1 changeover contact with tarnish, after pressure point 2 NC contacts, positive opening
Switching function	Sequential circuit with pressure point
pressure point	Min. 200 N operating force when used as intended
Switching system	Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-SU1ASDO2V-U-xx (xx = RD = cover firered RAL 3000)



The foot pedal FE-FS1-S2DO2V-U have 3 positions with a pressure point and a pedal lock with manual release, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (2NO) to drive the movement and one safety switches (2 positive opening NC contacts) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the positive opening safety contact is activated in order to initiate immediately the dangerous movement.

Thus a redundant information for the safety circuit is available.

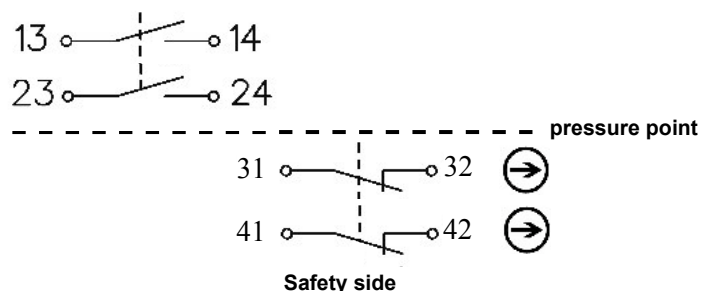
A restart of the machine is only possible after releasing the foot switch.

Switching diagram:

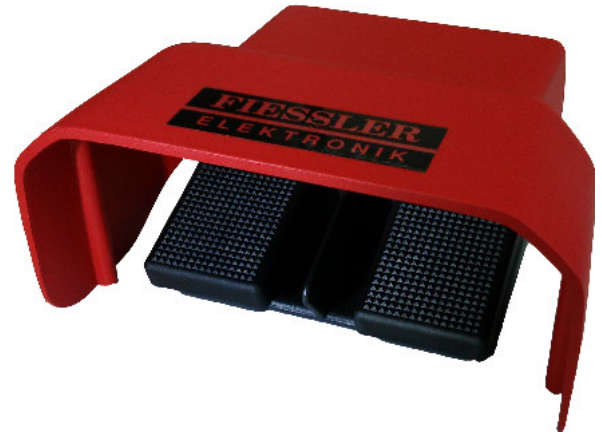
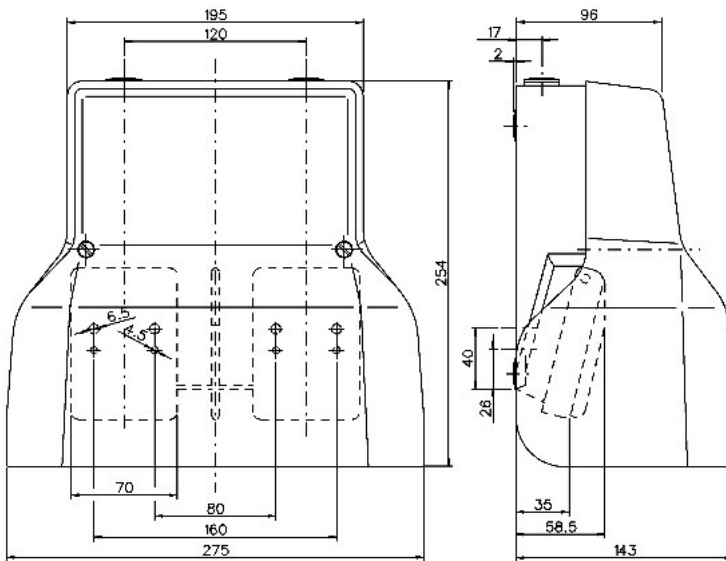
	free position	pressure point	pressed down
13-14			
23-24			
31-32			
41-42			

Contact closed
Contact open

Switching elements:



Execution	1-aluminum foot pedal heavy version, Pedal lock with manual release, free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	M20x1,5
Switching insert	2 NO contacts, after pressure point 2 NC contacts, positive opening
Switching function	Sequential circuit with pressure point
pressure point	Min. 200 N operating force when use as intended
Switching system	Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS1-S2DO2V-U-xx (xx = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-SU1ASDU1/U1-U use safety switches.

The right foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The left foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (1 positive opening NC contact + 1NO) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available.

A restart of the machine is only possible after releasing the foot switch.

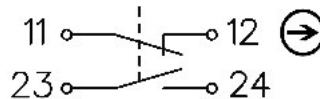
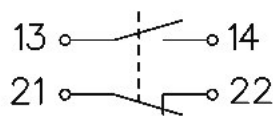
Left pedal:

Switching diagram:

	free position	pressure point	pressed down
13-14			
21-22			
11-12			
23-24			

Switching elements:

Contact closed 
Contact open 

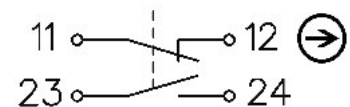


Safety side

Right pedal:

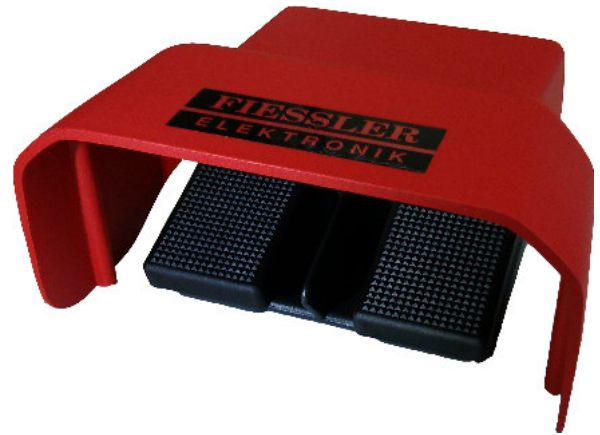
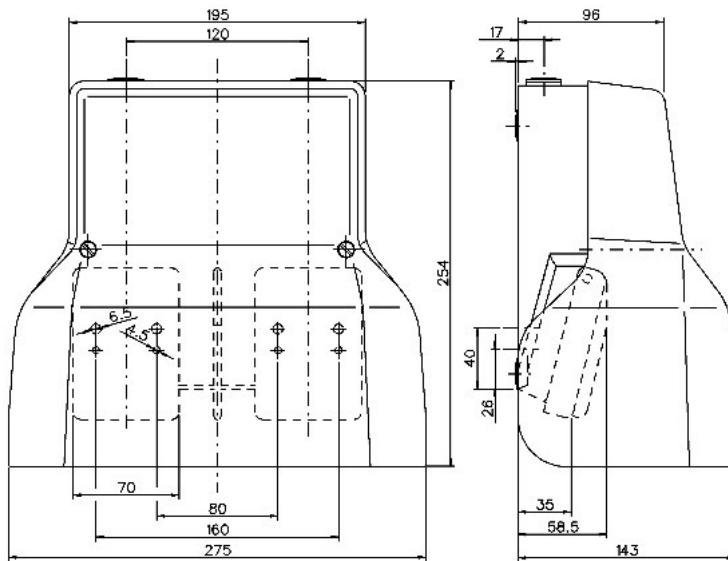
	free position	pressed down
23-24		
11-12		

Contact closed 
Contact open 



! The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact with tarnish, after pressure point 1 changeover contact, positive opening Right pedal: 1 changeover contact, positive opening
Switching function	Left pedal: sequential circuit with pressure point
Pressure point	Left pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Jump-/ creep mechanism Right pedal: Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-SU1ASDU1/U1-U-xx (xx = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-U1/SU1ASDU1-U use safety switches.

The left foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The right foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (1 positive opening NC contact + 1NO) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

Left pedal:

Right pedal:

Switching diagram:

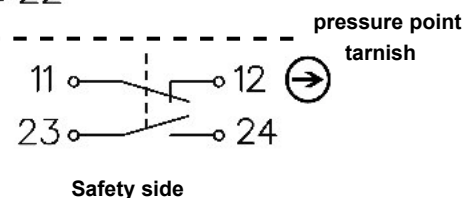
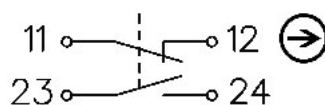
	free position	pressed down
23-24		
11-12		

Contact closed
Contact open

	free position	pressure point	pressed down
13-14			
21-22			
11-12			
23-24			

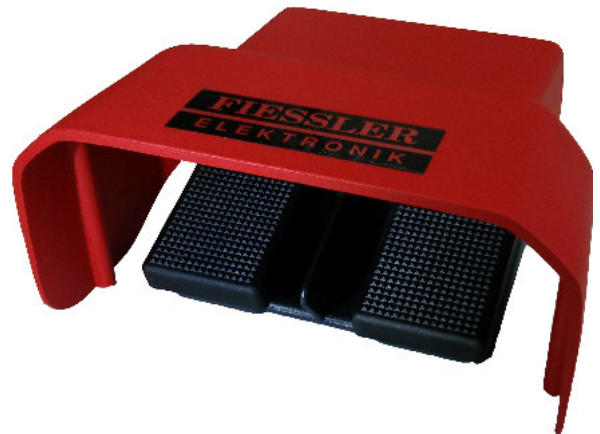
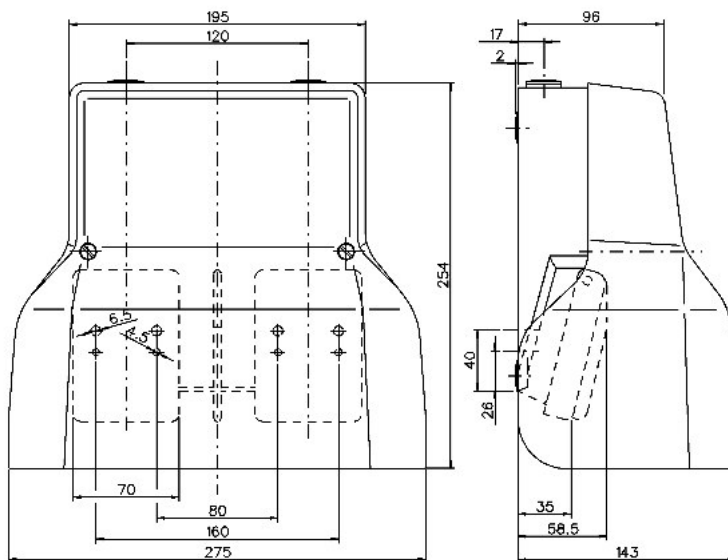
Contact closed
Contact open

Switching elements:



! The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact, positive opening Right pedal: 1 changeover contact with tarnish, after pressure point 1 changeover contact, positive opening
Switching function	Right pedal: sequential circuit with pressure point
Pressure point	Right pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Creep mechanism Right pedal: Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-U1/SU1ASDU1-U-xx (xx = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-S2ASDO2/U1-U use safety switches.

The right foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The left foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (2NO) to drive the movement and one safety switch (2 positive opening NC contact) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available.

A restart of the machine is only possible after releasing the foot switch.

Left pedal:

Switching diagram:

	free position	pressure point	pressed down
13-14			
23-24			
11-12			
21-22			

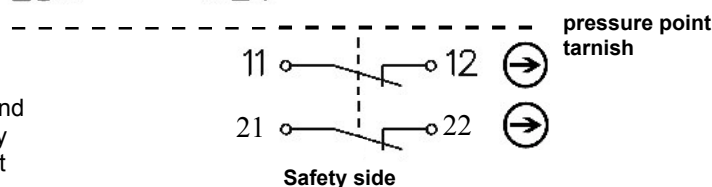
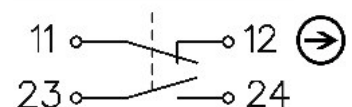
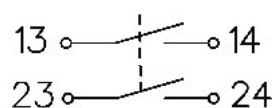
Contact closed ■
Contact open □

Right pedal:

	free position	pressed down
23-24		
11-12		

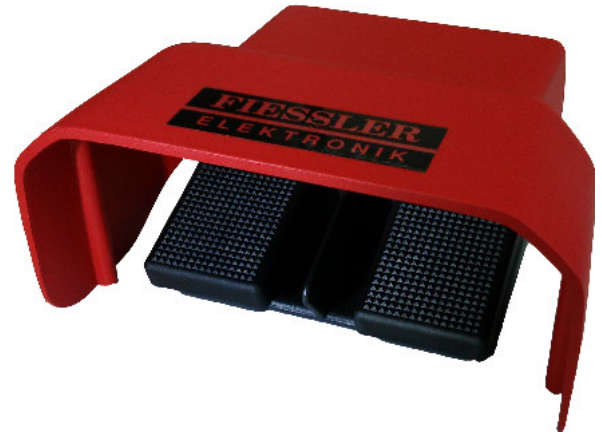
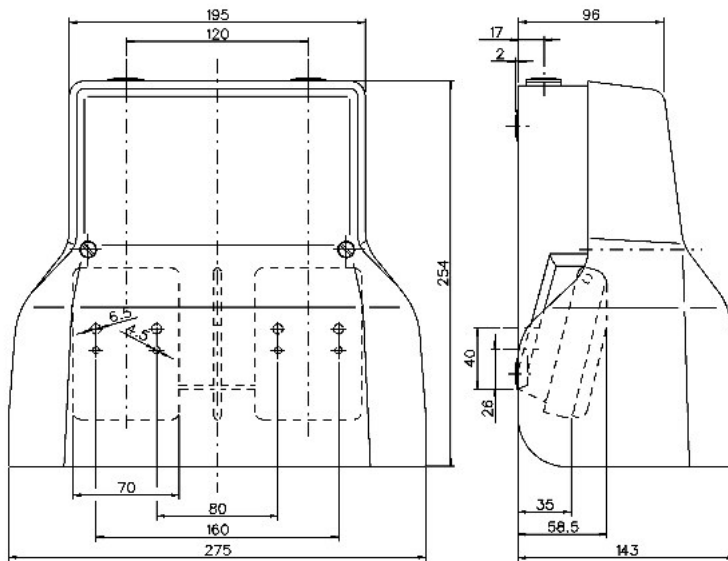
Contact closed ■
Contact open □

Switching elements:



! The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 2 NO contacts with tarnish, after pressure point, 2 NC contacts, positive opening Rigth pedal: 1 changeover contact, positive opening
Switching function	Left pedal: sequential circuit with pressure point
Pressure point	Left pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Jump-/ creep mechanism Right pedal: Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-S2ASDO2/U1-U-XX (xx = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-SU1ASDO2/U1-U use safety switches.

The right foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The left foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (2 positive opening NC contacts) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available.

A restart of the machine is only possible after releasing the foot switch.

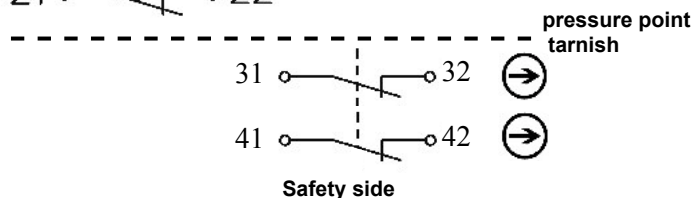
Left pedal:

Switching diagram:

	free position	pressure point	pressed down
13-14			
21-22			
31-32			
41-42			

Switching elements:

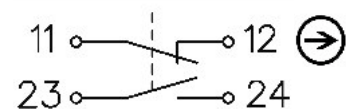
Contact closed 
Contact open 



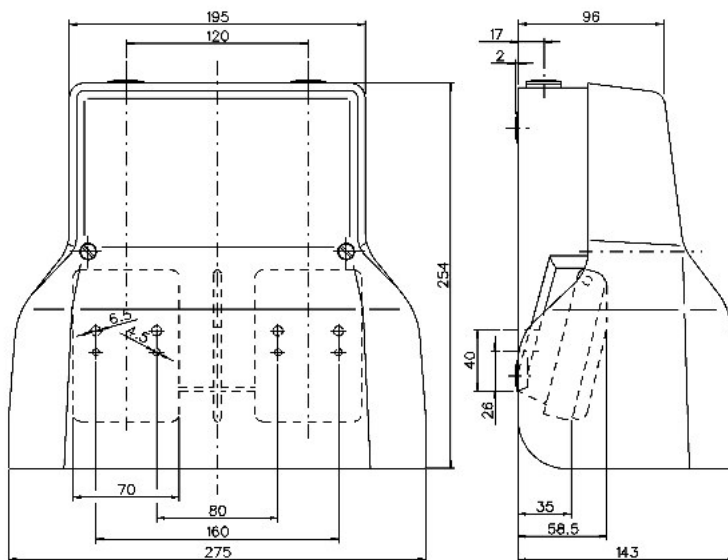
Right pedal:

	free position	pressed down
23-24		
11-12		

Contact closed 
Contact open 



Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact with tarnish, after pressure point 2 positive opening contacts Righth pedal: 1 changeover contact, positive opening
Switching function	Left pedal: sequential circuit with pressure point
Pressure point	Left pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Jump-/ creep mechanism Right pedal: Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes . Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-SU1ASDO2/U1-U-XX (XX = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-U1/SU1ASDO2S-U use safety switches and a lever.

The left foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The right foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (1 positive opening NC contact + 1NO) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

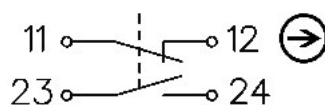
Left pedal:

Switching diagram:

	free position	pressed down
23-24		
11-12		

Contact closed 
 Contact open 

Switching elements:

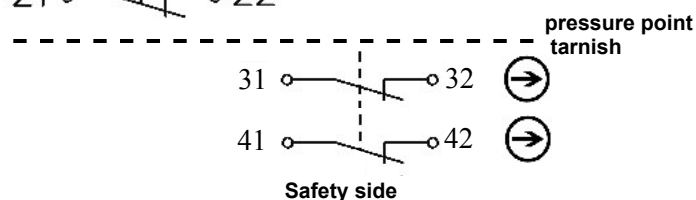
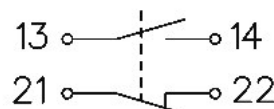


Right pedal:

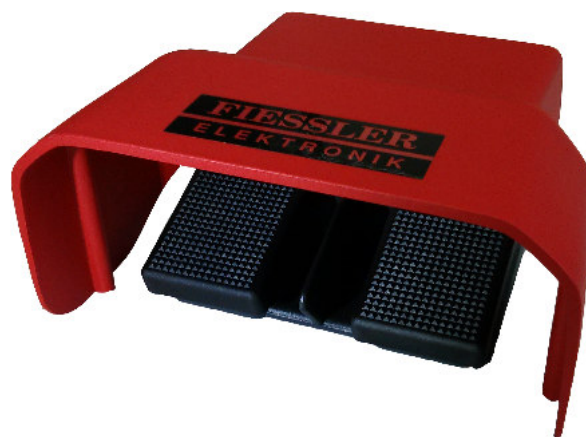
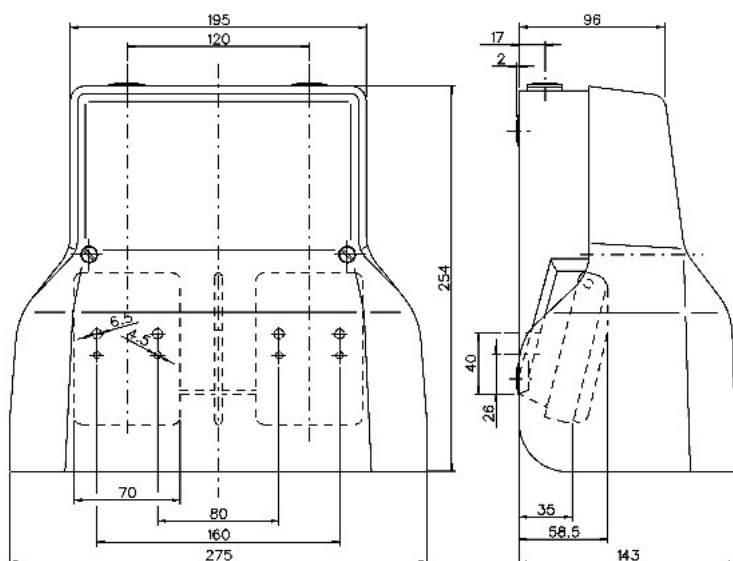
	free position	pressure point	pressed down
13-14			
21-22			
31-32			
41-42			

Contact closed ☒

Contact open ☐



Execution	2 aluminum foot pedal heavy version, with lever, free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact, positive opening Right pedal: 1 changeover contact with tarnish, after pressure point 2 positive opening contacts
Switching function	Right pedal: sequential circuit with pressure point
Pressure point	Right pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Creep mechanism Right pedal: Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-U1/SU1ASDO2S-U-xx (xx = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-SU1ASDO2/SU1ASDO2-U use safety switches.

The two foot pedals have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). Each pedal has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (2 positive opening NC contacts) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

Left pedal:

Right pedal:

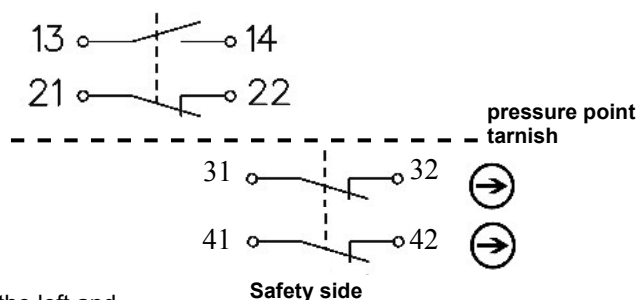
Switching diagram:

	free position	pressure point	pressed down
13-14			
21-22			
31-32			
41-42			

Switching elements:

Contact closed ☒

Contact open ☐

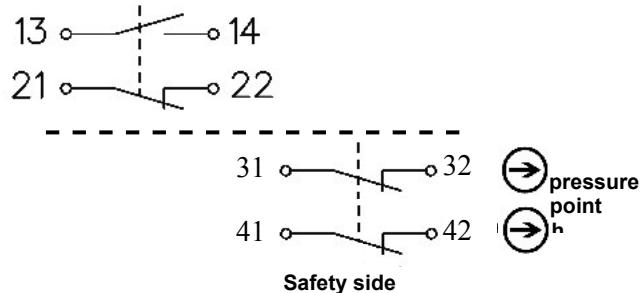


The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

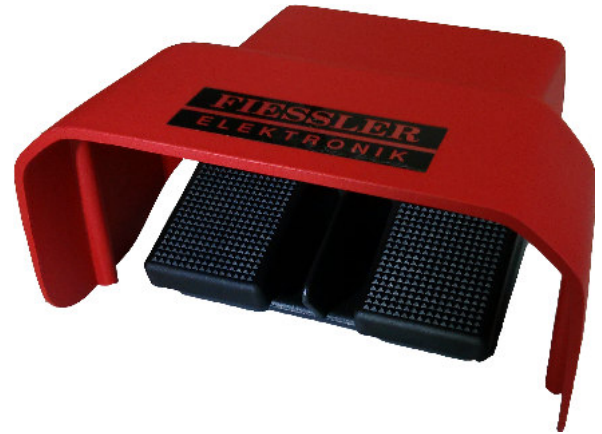
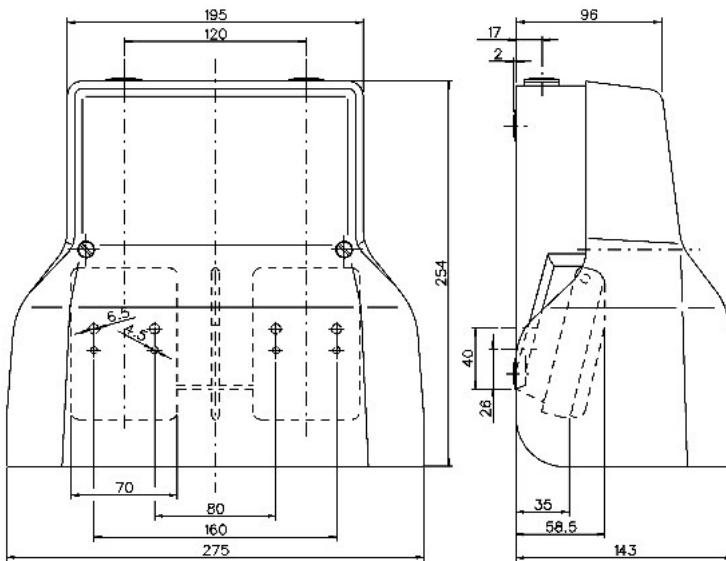
	free position	pressure point	pressed down
13-14			
21-22			
31-32			
41-42			

Contact closed ☒

Contact open ☐



Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact with tarnish, after pressure point 2 positive opening contacts
	Right pedal: 1 changeover contact with tarnish, after pressure point 2 positive opening contacts
Switching function	Left pedal: sequential circuit with pressure point Right pedal: sequential circuit with pressure point
Pressure point	Left/Right pedal: min. 200 N operating force when use as intended
Switching system	Left pedal: Jump-/ creep mechanism Right pedal: Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-SU1ASDO2/SU1ASDO2-U-XX (XX = RD = cover fire rated RAL 3000)



The safety foot pedal FE-FS2-SU1ASDU1/SU1ASDU1-U use safety switches.

The two foot pedals have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). Each pedal has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (1 positive opening NC contact and 1 NO contact) to stop the movement.

Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

Left pedal:

Right pedal:

Switching diagram:

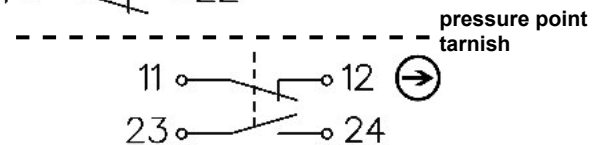
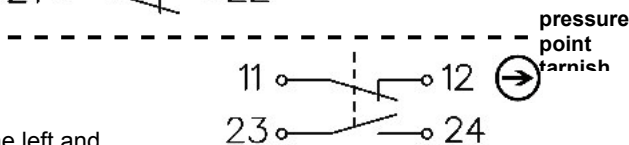
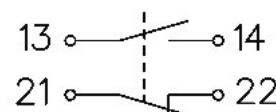
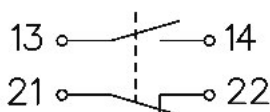
	free position	pressure point	pressed down
13-14			
21-22			
11-12			
23-24			

	free position	pressure point	pressed down
13-14			
21-22			
11-12			
23-24			

Switching elements:

Contact closed 
Contact open 

Contact closed 
Contact open 

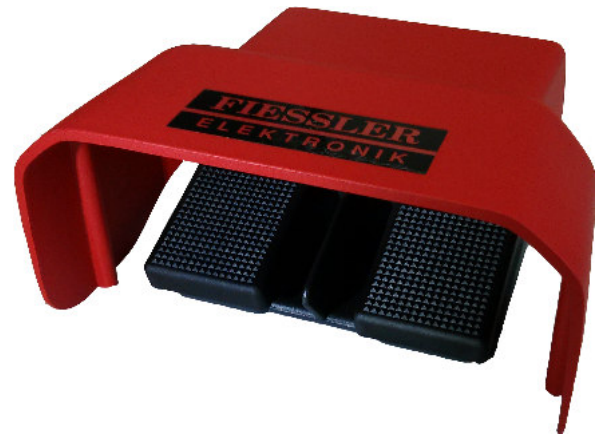
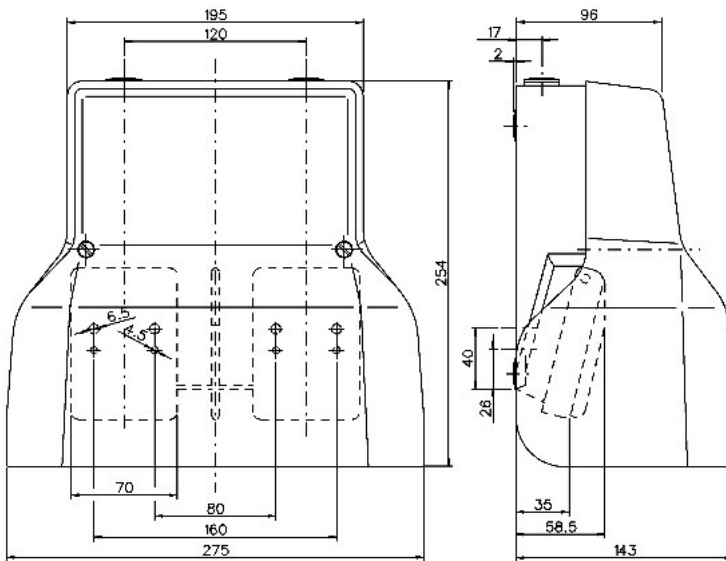


! The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

Safety side

Safety side

Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Left pedal: 1 changeover contact with tarnish, after pressure point 1 changeover contact, positive opening Right pedal: 1 changeover contact with tarnish, after pressure point 1 changeover contact, positive opening
Switching function	Left pedal: sequential circuit with pressure point Right pedal: sequential circuit with pressure point
Pressure point	Left/Right pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Jump-/ creep mechanism Right pedal: Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-SU1ASDU1/SU1ASDU1-U-XX (XX = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-U1/SU1ASDO2-U use safety switches.

The left foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The right foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (2 positive opening NC contacts) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available.

A restart of the machine is only possible after releasing the foot switch.

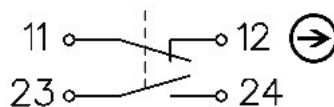
Left pedal:

Switching diagram:

	free position	pressed down
23-24		
11-12		

Contact closed
 Contact open

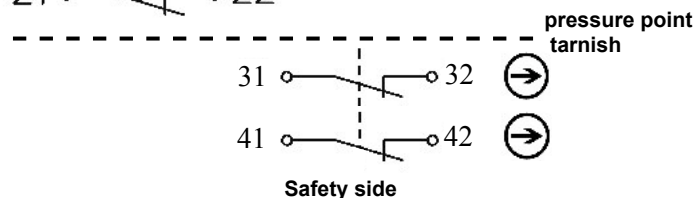
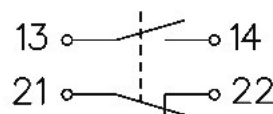
Switching elements:



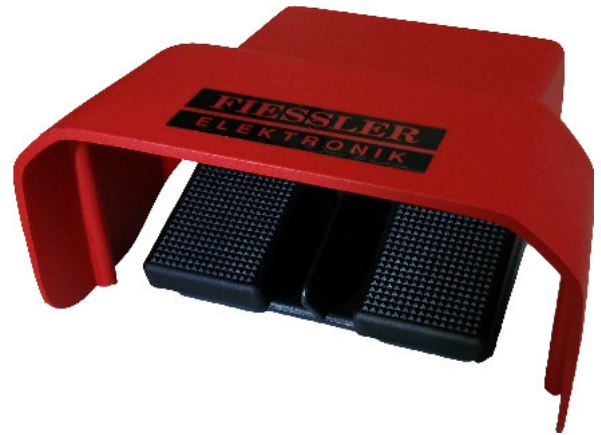
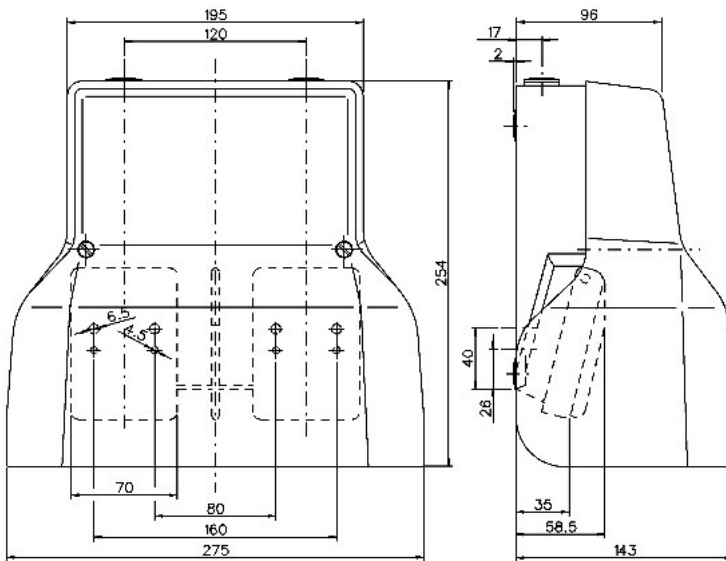
Right pedal:

	free position	pressure point	pressed down
13-14			
21-22			

Contact closed
 Contact open



Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 2x PG13,5
Switching insert	Right pedal: 1 changeover contact with tarnish, after pressure point 2 positive opening contacts Left pedal: 1 changeover contact, positive opening
Switching function	Right pedal: sequential circuit with pressure point
Pressure point	Right pedal: Min. 200 N operating force when used as intended
Switching system	Right pedal: Jump-/ creep mechanism Left pedal: Creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-U1SU1ASDO2-U-XX (XX = RD = cover firered RAL 3000)



The safety foot pedal FE-FS2-U2/SU2ASDU1-U use safety switches.

The left foot pedal have two positions (free position and pressed down position). It may e.g. be used for the selection of AKAS® Box bending function or opening of a press. The right foot pedal have 3 positions, with a pressure point, to control dangerous movements (for instance get down of a press brake ect...). It has 2 working contacts (1NC+1NO) to drive the movement and one safety switch (1 positive opening NC contact + 1NO) to stop the movement. Pressing the foot pedal, till the pressure point, allows the changeover of the 2 working contacts. Once the pressure point is got over, the 2 working contacts return to their first position and the positive opening safety contact is activated in order to initiate immediately the dangerous movement. Thus a redundant information for the safety circuit is available. A restart of the machine is only possible after releasing the foot switch.

Left pedal:

Right pedal:

Switching diagram:

	free position	pressed down
23-24		
11-12		

	free position	pressed down
33-34		
41-42		

Contact closed ■
Contact open □

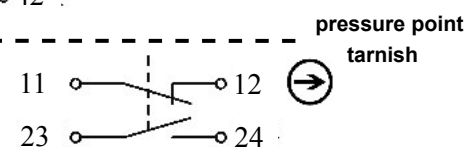
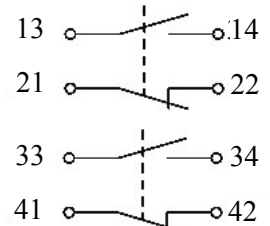
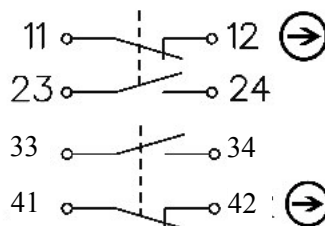
	free position	pressure point	pressed down
13-14			
21-22			

	free position	pressure point	pressed down
33-34			
41-42			

	free position	pressure point	pressed down
11-12			
23-24			

Contact closed ■
Contact open □

Switching elements:



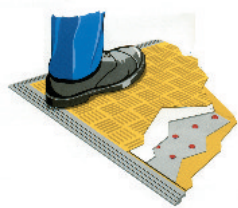
Safety side



The contacts for the left and right pedal must be clearly identified during the circuit diagram creation!

Execution	2 aluminum foot pedal heavy version free standing on slip elastic feet
Operating voltage	max. 500 VAC, 40-60Hz
Switching current	max. 10 A. For inductive and capacitive loads, a contact protection must be provided.
Operations	min. 10 Mio.
Contact Material	Silver
Connection type	Screwterminal
Electrical connection	0,5-1,5 mm ²
Cable entry	1x M20x1,5 (middle), 1x PG13,5
Switching insert	Left pedal: 2 changeover contacts, positive opening Right pedal: 2 changeover contacts with tarnish, after pressure point 1 changeover contact, positive opening
Switching function	Right pedal: sequential circuit with pressure point
Pressure point	Right pedal: Min. 200 N operating force when used as intended
Switching system	Left pedal: Creep mechanism Right pedal: Jump-/ creep mechanism
Housing	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Pedal	Die cast aluminum, powder-coated RAL 7021 (dark gray)
Accident cover	Die cast aluminum, powder-coated
Attachment	For mounting of the footpedal in the housing bottom (pedal area) are provided 2xØ4,5 and 2xØ6,5 holes (see drawing). Here threads can be cut. Alternatively, the rubber feet can be removed and these threads can be used as a mounting option.
Protection type	IP65 to IEC/EN 60529
Operating temperature	-30°C to +80°C
Regulations	IEC/EN 60947-5-1
Order code	FE-FS2-U2/SU2ASDU1-U-xx (xx = RD = cover firered RAL 3000)

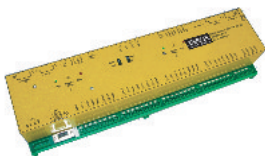
other Safety products



Safety Mats



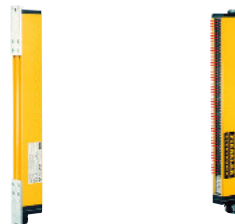
Safety-Footpedal



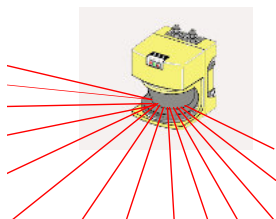
Parametricable
Safetycontrol FPSC



Press Brake Protection
System AKAS



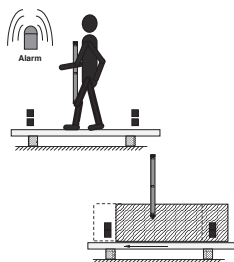
Safety-Light-Curtain



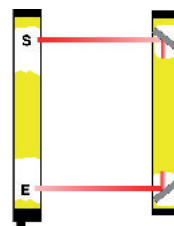
Proximity Laser Scanner



Single-Safety-Beam



Safety-Light-Grid with muting function



Safety-Light-Grid

Service

As a special feature for training our customers, Fiessler Elektronik offers one-day safety workshops. Our service team provides you with expert advice and information for the reliable integration of our safety equipment into your machine.

HOMOLOGATIONS

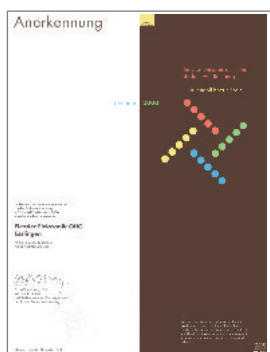
In order to ensure and maintain the high quality level of the Fiessler safety products, a quality control security system has been established early. Fiessler Elektronik holds the DIN ISO EN 9001 Certificate and, thanks to the company-owned EMC laboratory, all products must pass a inspection without exception before they leave the company. All safety equipment comply with the applicable national and international standards. Development and Design is made in close cooperation with the German employer's liability insurance associations. All homologations are obtained only after having passed strict tests by the German surveyor organisation TÜV.



AWARD OF APPRECIATION

for exemplary performance in the development of the press brake protection system AKAS.

The award was bestowed upon Fiessler Elektronik by the ministry of trade and commerce of the federal state of Baden-Württemberg.



**Fiessler Elektronik
GmbH & Co. KG
Kastellstr. 9
D-73734 Esslingen**

Telefon: ++49(0)711-91 96 97-0
Fax: ++49(0)711-91 96 97-50
Email: info@fiessler.de
Internet: www.fiessler.de

Fiessler Elektronik has representations in all major industrial nations.

