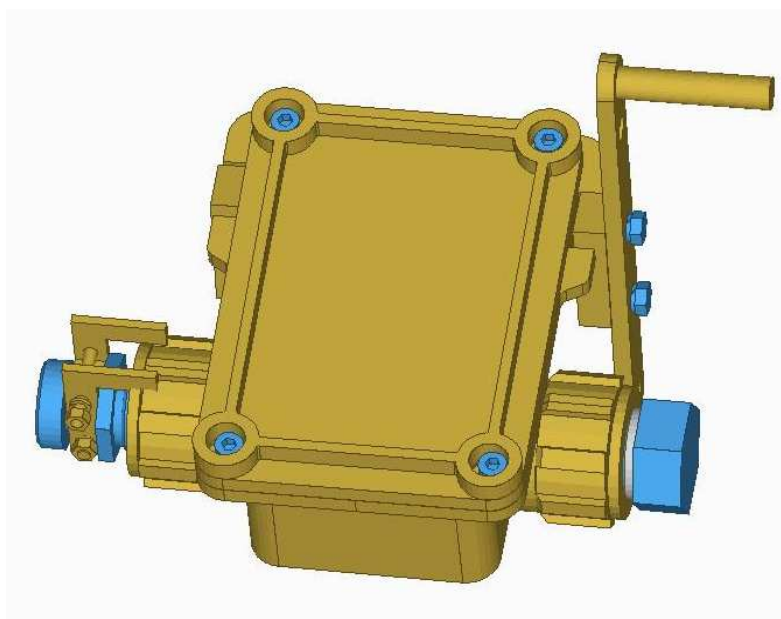


SIGNAL TRANSMITTER KFS-03



KFS-033..



I M2
 II 2G
 EEx d I/II B T6 lub EEx ia I/II B T6
 KDB04ATEX165X

KFS-032..



I M2
 II 2G
 EEx d I/II B T6
 KDB04ATEX165X

Characteristic :

Signal transmitter type KFS-03 are purposed for working in signalling circuits as a limit switch that co-operate with impulse counter. It is generally use in shaftsman's signalling and safety systems of carrying belt conveyor flight. Types of signal transmitters KFS-033... are purposed for working in low voltage (up to 250V AC DC) electric circuits, or only for intrinsic safety devices **ia** or **ib** level.

Types of signal transmitter KFS-032... are assigned for working in low voltage (to 250V AC, DC)

Accordance with standards:

Signal transmitter meet requirements of standards referenced with 94/9/WE Instruction of European Union:

- PN-EN 60079-0: 2006(U)
- PN-EN 60079-1: 2004(U)
- PN-EN 60079-11: 2007(U)

Using conditions.

Signal transmitter type KFS-03 are adapted for working in underground and superficial mining's with methane or/ and carbon dust explosion hazard and in rooms and outer spaces / areas with gases and vapour explosion hazard-class IIB. Devices guarantee high degree of protection accordance with designation

- types compatible with Table 1



I M2
II 2G

and accordance with PN-EN 60079-0: 2006(U) standard, marked with the symbol:

EExdl/IIBT6 lub EExial/IIBT6

- types compatible with Table 2



IM2
II2G

and accordance with PN-EN 60079-0: 2006(U) standard, marked with the symbol:

EExdl/IIBT6

Special using conditions in rooms with explosion hazard.

Signal transmitter type KFS-033.. marked with the symbol: EExdl/IIBT6 or EExial/IIBT6 can be use in intrinsic-proof or non intrinsic-proof electric circuits, in methane fields of mining's, of "a","b", "c" methane explosion or "A" or "B" class explosive conditions of coal dust and can be installed in rooms and outer spaces / areas impending of 1 and / or 2 zones gases and vapour with air (II B, temperature T6 class) explosion.

Signal transmitter type KFS-032.. marked with symbol: EExdl/IIBT6 can be used in non intrinsic-proof electric circuits, in methane fields of mining, in excavation impending of „a”, „b”, „c” methane explosion or „A” or „B” class impending of coaldust explosion and can be used in rooms and outer spaces /areas impending of 1 and / or 2 gases and vapour with air (IIB, temperature T6 class) explosion

Technical data:

Working voltage:

Intrinsic-proof circuits: voltages sum should be less or equal 90V for one connector circuits (for transmitter KFS-033..)

Non explosion-proof circuits: 250 AC; DC (for transmitters : KFS-032.., KFS-033..)

Contacts loading (for all types): 1,6A DC or 4A AC

Nominal frequency of operation (for all types): 120t/h

Clamps for connecting conduits (for all types): to 2,5 mm²

Capacity (for all types): Ci – negligible

Inductance (for all types): Li – negligible

Ambient temperature (for all types): -20°C to +4 0°C

Degree of protection (for all types): IP55

Relative humidity (for all types): to 95%

Position of work (for all types): optional

Weight (for all types): 10 kg

Diameter of insert cable (for all types)

Insert cable seal KVC-011	
Inside seal diameter Ø [mm]	Diameter of insert cable Ø [mm]
12	10 ÷ 12
16	14 ÷ 16
20	18 ÷ 20

The force moment necessary to switch over the lever for:

- transmitter without escapement (Table 1 and 2): 5Nm do 7Nm
- transmitter with non-stable escapement (Table 1 and 2): 7Nm do 9Nm
- transmitter with stable escapement (Table 1 and 2): 8Nm do 10Nm

Types.

Types of signal transmitters (Table 1 and 2).



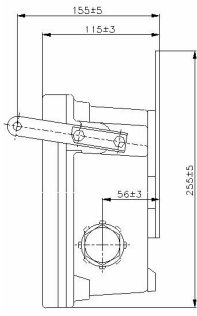
Table 1					
With one cable enter	With two cable enter	Driving lever after drawing	Circuit diagram after drawing	Escapement:	Designation
Assigned: low voltage electric circuits or only intrinsic-proof ia or ib – level electric circuits					
KFS-03311	KFS-03312	Draw. 1	Draw. 5	non-stable	 I M2 II 2G EExdl/IIBT6 or EExial/IIBT6
KFS-03321	KFS-03322	Draw. 1	Draw. 5	without	
KFS-03331	KFS-03332	Draw. 2	Draw. 5	without	
KFS-03341	KFS-03342	Draw. 1	Draw. 6	non-stable	
KFS-03351	KFS-03352	Draw. 3	Draw. 5	without	
KFS-03371	KFS-03372	Draw. 4	Draw. 7	stable	

Table 2					
With one cable enter	With two cable enter	Driving lever after drawing	Circuit diagram after drawing	Escapement:	Designation
Assigned : non intrinsic-proof electric circuits					
KFS-03211	KFS-03212	Draw. 1	Draw. 5	non-stable	 IM2 II2G EExdl/IIBT6
KFS-03221	KFS-03222	Draw. 1	Draw. 5	without	
KFS-03231	KFS-03232	Draw. 2	Draw. 5	without	
KFS-03241	KFS-03242	Draw. 1	Draw. 6	non-stable	
KFS-03251	KFS-03252	Draw. 3	Draw. 5	without	
KFS-03271	KFS-03272	Draw. 4	Draw. 7	stable	

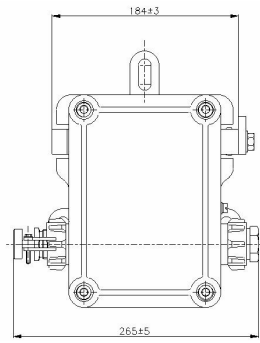
Ordering procedure

You should give designations according to table of type in the order

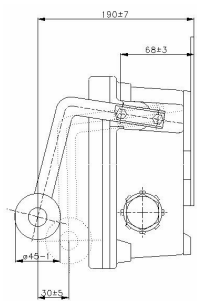
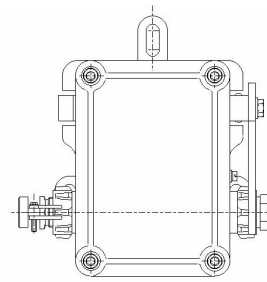
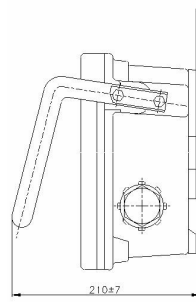
Overall dimension and variations of driving lever.



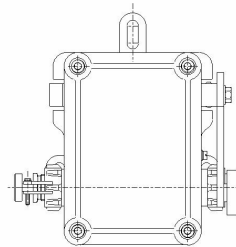
Draw. 1.



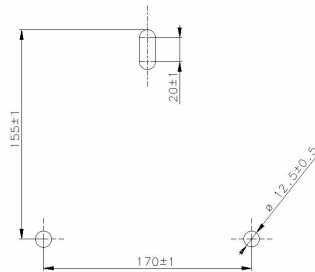
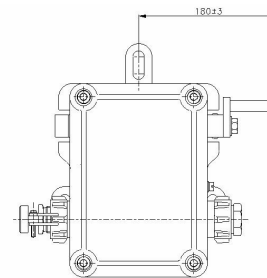
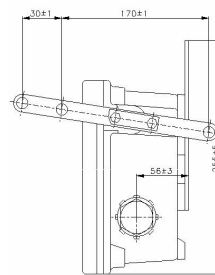
Draw. 2.



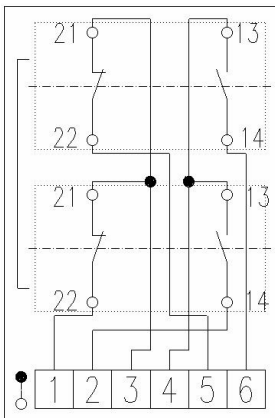
Draw. 3.



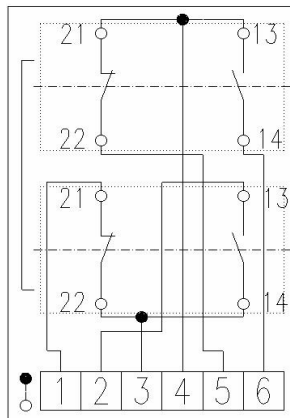
Draw. 4.



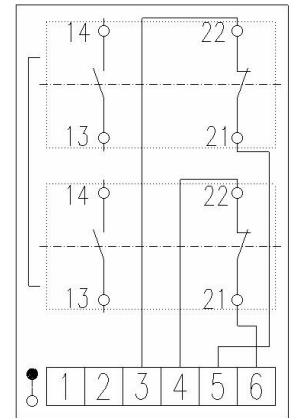
Circuit diagram.



Draw. 5.



Draw. 6.



Draw 7.