Conveyor Belt Misalignment Switch

## APPLICATION

Kiepe Belt Misalignment Switches are used in conveyor installations for monitoring the true running of conveyor belts. The switches, when mounted at the running edges of a conveyor belt, will be operated if the belt deviates from it's designed running line by more than a permissable distance.

The switches will then stop the conveyor drive, avoiding spillage of material or damage to the plant. The Belt Misalignment Switches can be optionally supplied with a pre-alarm position for an alert signal at slight deviation and a final cut-out and lock.

## PRODUCT DESCRIPTION

The switch enclosure consists of corrosion-resistant aluminium alloy. All external parts are either of stainless steel or have been especially plated. The actuating roller is of polyamide. All VGtypes ars fitted with snap acting switches. The actuating head is removable from the main switch body and may be re-fitted in any of four positions. This, together with re-positioning of the switch trip bar allows the actuating roller to operate in any of four directions giving greater mounting versatility. All this will insure extremely safe operation, permitting to use the switch for severe operation and in outdoor installations.

No maintenance will be required. For the Models VG.../5 and 6 the switching point has been set at the manufacturer's plant to approx. $12^{\circ}$ from vertical and can be continuously readjusted in the field. The Model VG.../6 switch will latch as the admissible amount of out-of-line running is exceeded. It is unlatched locally by resetting the actuating roller. The VG 133/6 switch is equipped with two snap acting switches. An alert signal will be provided at approx. $12^{\circ}$, the final cut-out and latch will occur at $45^{\circ}$. For unlatching, the actuating roller is reset by hand.

## SELECTION TABLE

| Type Ref. | Pre-Alarm not included/included | Latching not included/included | No. of Contacts Switching Point at |  |  |  | Order number | Weight kg/each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | $15^{\circ}$ |  | $45^{\circ}$ |  |  |  |
|  |  |  | NC | NO | NC | NO |  |  |
| VG 03/5 | X | X | 1 | 1 |  |  | 92.038143 .501 | 0,75 |
| VG 033/5 | X | X | 2 | 2 |  |  | 92.038143 .511 | 0,75 |
| VG 03/6 | X | X | 1 | 1 |  |  | 92.038143 .601 | 0,75 |
| VG 033/6 | X | X | 2 | 2 |  |  | 92.038143 .611 | 0,75 |
| VG 133/6 | X | X | 1 | 1 | 1 | 1 | 92.038143 .615 | 0,75 |

## Spares and Options

| Actuating roller for type VG $\varnothing 25 \mathrm{~mm}$ | 94.037860 .001 |
| :--- | :--- |
| Switch element for type VG | 215.15 .14 .10 .00 |
| Ventilation duct | 580.00 .16 .01 .01 |

## TECHNICAL DATA

Device complies with
Enclosure
Finish
Fastening
Cable Entry
Protection
Rated Insulation Voltage $\mathrm{U}_{\mathrm{i}}$
Earthing
Admissible Ambient Temperatures ${ }^{1)}$
Switching Elements
Number of Contacts
Conventional Thermal Current $I_{\text {th }}$
Breaking Capacity $\mathrm{I}_{\mathrm{e}} / \mathrm{U}_{\mathrm{e}}$
Operation per Hour
Connections
Mechanical Life
Type of Operation
Actuating Roller
Switching Point

## Excursion

Mounting Position
Maintenance free Options

EN 60947-5-1
Aluminium alloy GK-ALSi 12
2 - Component DD - tile enamel, yellow
By means 2 oblong holes for M6 bolts
$3 \times \mathrm{M} 20 \times 1,5$
IP 65 according to EN 60529
AC $380 \mathrm{~V} / \mathrm{DC} 440 \mathrm{~V}$
Within Enclosure M5
$-25^{\circ} \mathrm{C} \ldots+70^{\circ} \mathrm{C}$
Snap acting Switches
1 NC + 1 NO or $2 N C+2$ NO
10 A
5 A/AC 250 V
1500
Screw clamp terminals for a wire gauge of $2,5 \mathrm{~mm}^{2}$
$3 \times 10^{6}$ Switching Cycles
Actuating Roller; with or without latch
Polyamid 25 mm diameter
At approx. $12^{\circ}$ from vertical. With devices designed for pre-alarm, this alarm will be tripped at approx. $12^{\circ}$ without latching action, whereas cut-out will occur at $45^{\circ}$, with the device then being latched
$90^{\circ}$ max.
vertical
Ventilation duct to avoid condensation

[^0]
## TECHNICAL DATA

Terminal Markings (maximum configuration)

Position of Roller


| 33 |  |
| :--- | :--- |
|  | 34 <br> 41 |
| 42 |  |

## DIMENSIONS

maximum range of operation




[^0]:    ${ }^{1)}$ Deviating ambient temperature upon request

