

## Technical features

| Compliance with EEC Directives | $98 / 37 /$ CE 2006/95/CE |
| :--- | :--- |
| Compliance with rules | CEI EN 60947-1 CEI EN 60947-5-1 |
|  | CEI EN 60204-1 CEI EN 60529 |
| Insulation voltage | $250 \mathrm{~V} \sim$ |
| Maximum operating voltage | $250 \mathrm{~V} \sim$ |
| Casing | reinforced nylon |
| Cover | high mechanical and thermal resistant thermoplastic |
| Operating temperature | $-20{ }^{\circ} \mathrm{C}+60^{\circ} \mathrm{C}$ |
| Drive | worm screw |
| Cable entries | M16 x 1,5 |
| Insulation | according to CEI EN 60947-5-1 |
| Protection degree | IP 65 CEI EN 60529 |
| Protection against contact voltages | double insulation CEI EN 60439-1 |
| Weight | 300 gr. approx. (mod. with 2 contacts) |

## Rotary Limit Switch Driver FRS Series

## Main features

Driver rotary limit switch is a device with IP65 protection degree which allows you to control the movement of industrial and building machines. The shaft is connected to the motor, so that, after a certain number of turns, the cams make the switches work, and then they can carry out their pre-set manoeuvre. The easy and thorough regulation of the cams allows you to set the rapid trip microswitches working point linearly and micrometrically.
The choice of different cam profiles allows you to modify the limit switches function diagram.

## The range

Standard executions have the following reduction ratios:
$1: 15$ turns 2 or 4 contacts
$1: 25$ turns 2 or 4 contacts
$1: 35$ turns 2 or 4 contacts
$1: 50$ turns 2 or 4 contacts
$1: 75$ turns 2 or 4 contacts
$1: 100$ turns 2 or 4 contacts
$1: 150$ turns 2 or 4 contacts
$1: 175$ turns 2 or 4 contacts
You can ask for some data about all the real turns according to the different available types of cams.

Dimensions


## Contacts technical features

Microswitch
Homologation
Insulating voltage $\mathrm{U}_{\mathrm{i}}$
Test voltage
Category of usage
Breaking power
Mechanical lifetime
Terminals

Performances

| AC 15 | V | 24 | 48 | 110 | 230 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | A | 10 | 10 | 6 | 3 |
|  | DC 13 | V | 24 | 48 | 110 |
|  | A | 3 | 1,5 | 0,8 | 0,4 |

## Accessories

## Cog wheels

A series of cog wheels of different diameters allows you to obtain an easy joining through pinions and belts.

Available wheels:

- Module 5 with $\mathbf{1 2}$ teeth
- Module $\mathbf{6}$ with 11 teeth
- Module $\mathbf{8}$ with $\mathbf{1 2}$ teeth
- Module $\mathbf{1 0}$ with $\mathbf{1 2}$ teeth
- Module $\mathbf{1 4}$ with 10 teeth


## Male connection

- The male connection helps the joining to motors or reducing gears



## Flexible shaft

- The flexible shaft allows you to couple the shafts that are not perfectly aligned.


Cam profiles and tripping angles

Type

profile


Grey

Red

## Order codes

The product code is composed this way:


If not specified, limit switches are supplied with white A cams. In case the cam you want to use is different from "A white"type, it is necessary to add at the end of the code:

> B for $45^{\circ}$ lever
> C for $90^{\circ}$ lever

