

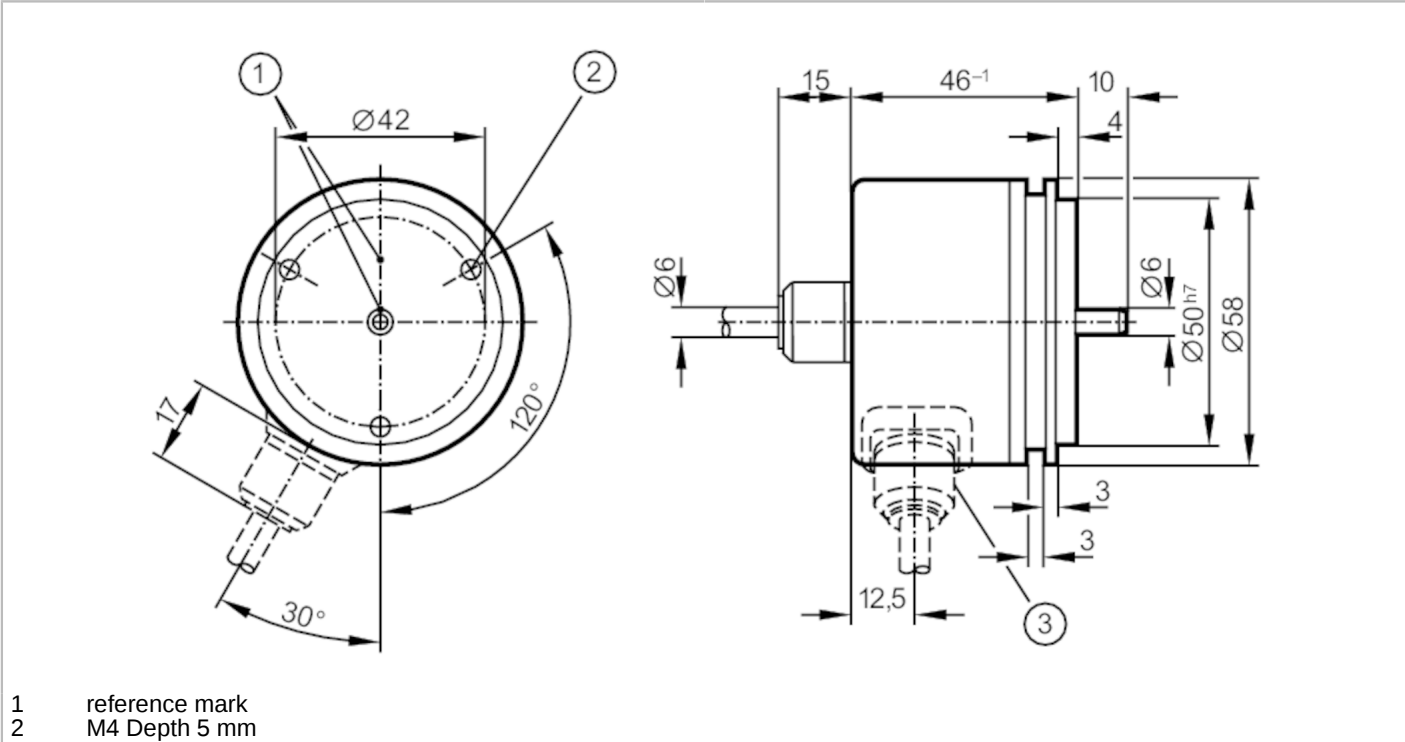
RU1172



Incremental encoder with solid shaft

RU-3000-I05/N2

Article no longer available - archive entry



| Product characteristics      |       |                 |
|------------------------------|-------|-----------------|
| Resolution                   |       | 3000 resolution |
| Shaft design                 |       | solid shaft     |
| Shaft diameter               | [mm]  | 6               |
| Electrical data              |       |                 |
| Operating voltage tolerance  | [%]   | 10              |
| Operating voltage            | [V]   | 5 DC            |
| Current consumption          | [mA]  | 150             |
| Outputs                      |       |                 |
| Electrical design            |       | TTL             |
| Max. current load per output | [mA]  | 20              |
| Switching frequency          | [kHz] | 300             |
| Phase difference A und B     | [°]   | 90              |
| Measuring/setting range      |       |                 |
| Resolution                   |       | 3000 resolution |
| Operating conditions         |       |                 |
| Ambient temperature          | [°C]  | -20...100       |
| Storage temperature          | [°C]  | -30...100       |
| Protection                   |       | IP 64           |
| Tests / approvals            |       |                 |
| Shock resistance             |       | 100 g (6 ms)    |

# RU1172



## Incremental encoder with solid shaft

RU-3000-I05/N2

|                      |                     |
|----------------------|---------------------|
| Vibration resistance | 10 g (55...2000 Hz) |
|----------------------|---------------------|

### Mechanical data

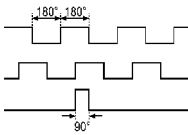
|                                           |         |                |
|-------------------------------------------|---------|----------------|
| Dimensions                                | [mm]    | Ø 58 / L = 46  |
| Material                                  |         | aluminum       |
| Max. revolution, mechanical               | [U/min] | 12000          |
| Max. starting torque                      | [Nm]    | 1              |
| Reference temperature torque              | [°C]    | 20             |
| Shaft design                              |         | solid shaft    |
| Shaft diameter                            | [mm]    | 6              |
| Shaft material                            |         | steel (1.4104) |
| Max. shaft load axial (at the shaft end)  | [N]     | 10             |
| Max. shaft load radial (at the shaft end) | [N]     | 20             |
| Fixing flange                             |         | Synchro-flange |

### Electrical connection

Cable: 2 m, PUR; radial

|             |                  |
|-------------|------------------|
| brown       | A                |
| green       | A inverted       |
| grey        | B                |
| pink        | B inverted       |
| red         | 0 index          |
| black       | 0 index inverted |
| blue        | L+ sensor        |
| white       | 0V sensor        |
| brown/green | L+ (Up)          |
| white/green | 0V (Un)          |
| lilac       | error inverted   |
| screen      | housing          |

### Diagrams and graphs

|               |                                                                                                                                                    |
|---------------|----------------------------------------------------------------------------------------------------------------------------------------------------|
| Pulse diagram |  <p>Direction of rotation clockwise (looking at the shaft)</p> |
|---------------|----------------------------------------------------------------------------------------------------------------------------------------------------|