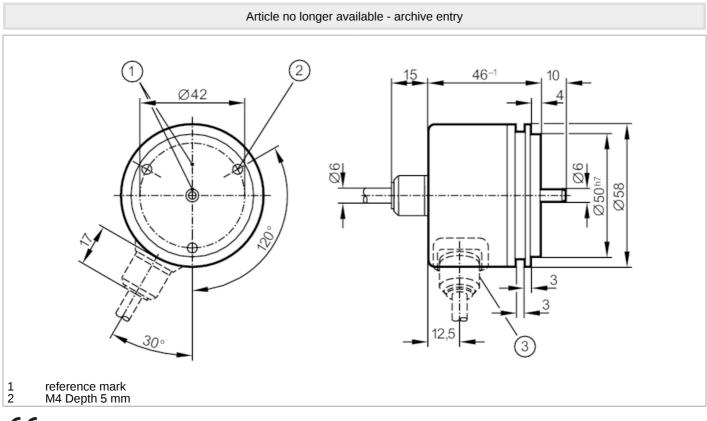
## RU1093

#### Incremental encoder with solid shaft



RU-1000-I05/N2



# CE

| Product characteristics      |       |                 |  |
|------------------------------|-------|-----------------|--|
| Resolution                   |       | 1000 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                   |       | 1000 resolution |  |
| Operating conditions         |       |                 |  |
| Ambient temperature          | [°C]  | -20100          |  |
| Storage temperature          | [°C]  | -30100          |  |
| Protection                   |       | IP 64           |  |
| Tests / approvals            |       |                 |  |
| Shock resistance             |       | 100 g (6 ms)    |  |

## RU1093

### Incremental encoder with solid shaft

RU-1000-I05/N2



| Vibration resistance                                                                                                                                                                                                           | 10 g (552000 Hz) |  |  |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------|--|--|
| Mechanical data                                                                                                                                                                                                                |                  |  |  |
| Dimensions [mm                                                                                                                                                                                                                 | Ø 58 / L = 46    |  |  |
| Material                                                                                                                                                                                                                       | aluminum         |  |  |
| Max. revolution, mechanical [U/min                                                                                                                                                                                             | 12000            |  |  |
| Max. starting torque [Nm                                                                                                                                                                                                       | 1                |  |  |
| Reference temperature [°C torque                                                                                                                                                                                               | 20               |  |  |
| Shaft design                                                                                                                                                                                                                   | solid shaft      |  |  |
| Shaft diameter [mm                                                                                                                                                                                                             | 6                |  |  |
| Shaft material                                                                                                                                                                                                                 | steel (1.4104)   |  |  |
| Max. shaft load axial (at the [N shaft end)                                                                                                                                                                                    | 10               |  |  |
| Max. shaft load radial (at the [N shaft end)                                                                                                                                                                                   | 20               |  |  |
| Fixing flange                                                                                                                                                                                                                  | Synchro-flange   |  |  |
| Electrical connection                                                                                                                                                                                                          |                  |  |  |
| Cable: 2 m, PUR; radial                                                                                                                                                                                                        |                  |  |  |
| brown A<br>green A inverted<br>grey B<br>pink B inverted<br>red 0 index<br>black 0 index inverted<br>blue L+ sensor<br>white 0V sensor<br>brown/green L+ (Up)<br>white/green 0V (Un)<br>lilac error inverted<br>screen housing |                  |  |  |
| Diagrams and graphs                                                                                                                                                                                                            |                  |  |  |
| Pulse diagram                                                                                                                                                                                                                  |                  |  |  |

Direction of rotation clockwise (looking at the shaft)