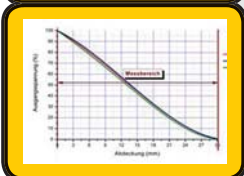


Compact and robust:

Light band fork sensors

- ▶ Special line optics produce a light band of high uniformity
- ▶ Very high resolution and best linearity
- ▶ Space-saving, robust construction and metal housing
- ▶ Ideal for use as optical web edge sensors with high precision
- ▶ For detecting and counting fast objects
- ▶ Also available as a high-vacuum version for process technology

The fork sensors generate a light band with even intensity distribution. Combined with an analogue amplifier, the sensors deliver a linear output signal analogue to the coverage of the measuring range. The sensors are therefore ideally suited for high-resolution web edge controls. In conjunction with a dynamic amplifier, fast processes can be reliably recorded over the entire measuring range.



Special advantages for you as a user:

1. Low space requirement – suitable geometry:
 - two different window widths
 - two different fork widths
 - customized housing dimensions
2. Separate amplifier delivers an output signal analogous to the coverage of the light band. Depending on the selected evaluation unit, with current output (4 - 20 mA) or voltage output (0 - 10 V)
3. The uniformly good linearity over the entire fork width ensures exact edge detection, even with heavily sagging webs
4. Can be used with a dynamic amplifier as a space-saving alternative to frame light barriers for fast counting and detection tasks

| Light band fork sensor | | | Analog amplifier | |
|------------------------|------------|------------|------------------------------------|---------|
| Typ | Light band | Fork width | Typ | Output |
| EG-40-0-Q30 | 30 mm | 40 mm | OV-1001-CU | 0–10 V |
| EG-80-0-Q30 | 30 mm | 80 mm | OV-1001-DU | 4–20 mA |
| EG-40-0-Q8 | 8 mm | 40 mm | Dynamic switching amplifier | |
| | | | OV-1001-HUP | PNP |

Analog amplifier or
dynamic switching amplifier

Inline quality monitoring

EG-3-0-Q4

Light band fork sensor

- For quality monitoring on high-speed threads, wires or filaments, detect knots, thickening, and fanning out
- Object resolution better than 100 µm
- Can be combined with the new dynamic amplifier OV-1001-HUP
- Compact and robust construction
- Glass protected optics

EG-3-0-Q44 reliably detects knots and flaws in wafer-thin threads or wires, even at high throughput speeds



Dynamic switching amplifier OV-1001-HUP



Special advantages for you as a user:

1. In a conventional light beam, fast-moving threads or wires generate signal fluctuations with high dynamics due to their transverse vibrations, which can hardly be distinguished from defects such as knots, thickening and fanning out. This is different with our light band fork sensor EG-3-0-Q4.
2. The special optics ensure very even illumination of the 4 mm wide working window. Despite the object's own movement, a very uniform basic signal is produced.
3. In the event of diameter deviations, this results in clear signal swings that can be clearly evaluated for shape and size.

| Light band fork sensor | | | Dynamic switching amplifier | |
|------------------------|--------------------|--------------------|-----------------------------|---------------|
| Typ EG-3-0-Q4 | Light band 4 mm | Fork width 3 mm | Typ OV-1001-HUP | Output PNP |

Meyer Industrie-Electronic GmbH - MEYLE acquired the assets of Beta SENSORIK GmbH on Feb. 01, 2022. MEYLE is hereby expanding the existing range of sensors with more than 25 years know-how of Beta Sensorik products and services.

www.betasensorik.de
www.betasensorik.biz
www.meyle.de