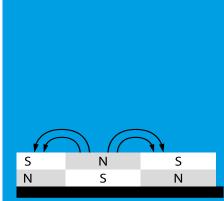


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# BML magnetically coded position and angle measurement systems







# Magnetically Coded Position and Angle Measurement Systems

# Flexible solutions for a variety of demands

#### Precision for fast applications

A large range of position and angle measurement tasks or the dynamic, accurate detection of speed and rotational speeds of rotating shafts are solved in a wide variety of industries with using magnetically coded systems. A magnetic tape system consists of the sensor head, a tape for linear or rotary use, and accessories such as a counter display or guide system. The measured value is available as an incremental or absolute output signal.

#### Why magnetically coded systems?

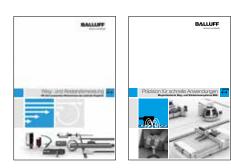
- Wear-free, non-contact operating principle for long service life
- Insensitive to dirt and soft magnetic particles high machine and equipment availability even in extreme environmental conditions
- Simple length trimming of the magnetic tape optimizes installation and inventory costs
- Ease of handling can be adapted to virtually any installation scenario

#### Why BML magnetically coded measuring systems from Balluff?

- Proven Permagnet<sup>®</sup>technology with strong perpendicular magnetization – high accuracy and low sensitivity to demagnetizing
- Compact sensor heads, can be mounted in line with or perpendicular to the travel direction – universal integration in machines and systems, even in tight mounting conditions
- Full metal encapsulation or in plastic housing optimal protection of the electronics for maximum system availability

## Absolute or incremental?

- Absolute: Position value is available as soon as power is turned on (no homing move required), increased security for man and machine
- Incremental: Cost-effective system for virtually any length, reference points possible to fit the individual requirements, can be integrated into virtually any controller



For more information refer to our "Position and Distance Measurement" catalog, our brochure "Precision for Fast Applications", or online at **www.balluff.com** 

# Wide product range – universal application



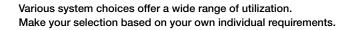
Sensor heads

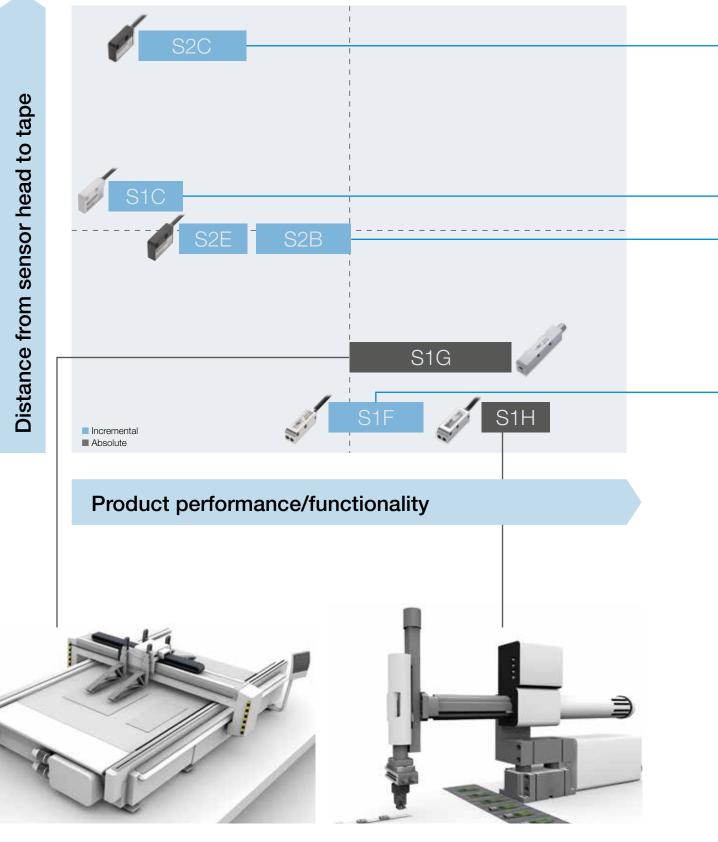
- Linear tapes, rings and discs
- Display units
- Connection technology
- Mounting Accessories
- and much more



## Service and support Haven't found the right product yet? We will be happy to assist.

# www.balluff.com/services





# Cutting systems

In cutting equipment BML measuring systems check the cut dimension as well as the longitudinal and lateral stop of the workpiece.

**Electronics manufacturing** BML absolute magnetically coded position and rotary encoder systems ensure high-dynamic and precise positioning of the components when assembling circuit boards.





In solar power facilities BML incremental magnetically encoded position and encoder systems have been used successfully for years in high-precision mirror guiding according to the position of the sun. Wind energy is another ideal application for these measuring systems. Here they control the rotor speeds.

### Beverage industry

BML magnetically coded position and angle measurement systems in bottling plants monitor time transport of the crates and support high-efficiency logistics.



### Wood processing

In universal milling machines, magnetically coded position and angle measurement systems BML are used for accurate positioning of the x, y, and z axes.



#### Motors and drives

The BML measurement system with sensor head and toroidal tape ensures accurate speed monitoring including detection of direction in the drive train.





Systems and Service

Industrial Networking and Connectivity



Industrial Identification



Object Detection



Linear Position Sensing and Measurement



↗

Condition Monitoring and Fluid Sensors

Accessories

# Headquarters

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