

SSI output: 24/25 bit binary/Gray code



GB-Series Sensor

GB series products with electronic head size 34 mm, suitable for U-shaped hydraulic cylinder installation, compact structure, strong anti-interference ability, fully sealed design for oil fouling resistant and waterproof, is widely used in engineering machinery, power machinery.

Features

- Rugged and reliable, oil fouling resistant
- Non-contact sensing technology
- No zero, absolute displacement output
- Modular design, replaced by convenience
- Easy to diagnosis, LED lamp real-time display
- Low power design, reduce the heat

Parameters Specifications

INPUT

Measured variables: Displacement
 Measured range: 50mm-3250mm
 Measured points: 1

OUTPUT

SSI signal: 24/25 bit binary/Gray code

Transmission speed: 70kBd-1Mb

Wire length: <3 <50 <100 <200 <400 m

Speed: 1000<400 <300 <200 <100 kBd

ACCURACY

Non-linearity : $\pm 0.02\%$ full stroke(Min.60um).

Repeatability: $\pm 0.001\%$ of full stroke.(or equal to Resolution)

Updated time: >1.5KHz

Resolution: 5/10/20/50/100 um

Operation conditions

Magnet speed: Any

Operating Temperature: -40°C to +85°C

Storage Temperature: -40°C to +85°C

Relative humidity: 90% no condensation

Electronic protection: IP67 for Aviation connector

IP68 for waterproof connector

Pressure rating: PN: 35Mpa , Pmax: 70Mpa

Electronic connection

Wiring type: Waterproof connector or 7 pin Aviation connector

Operating voltage: 24Vdc(-15/+20%)

Polarity protection: up to -30Vdc

Overvoltage protection: up to 36Vdc

Temperature coefficient: <15ppm°C

Mounting and attachment

Mounting type: 6 pieces of M6x16 flange pressure seal

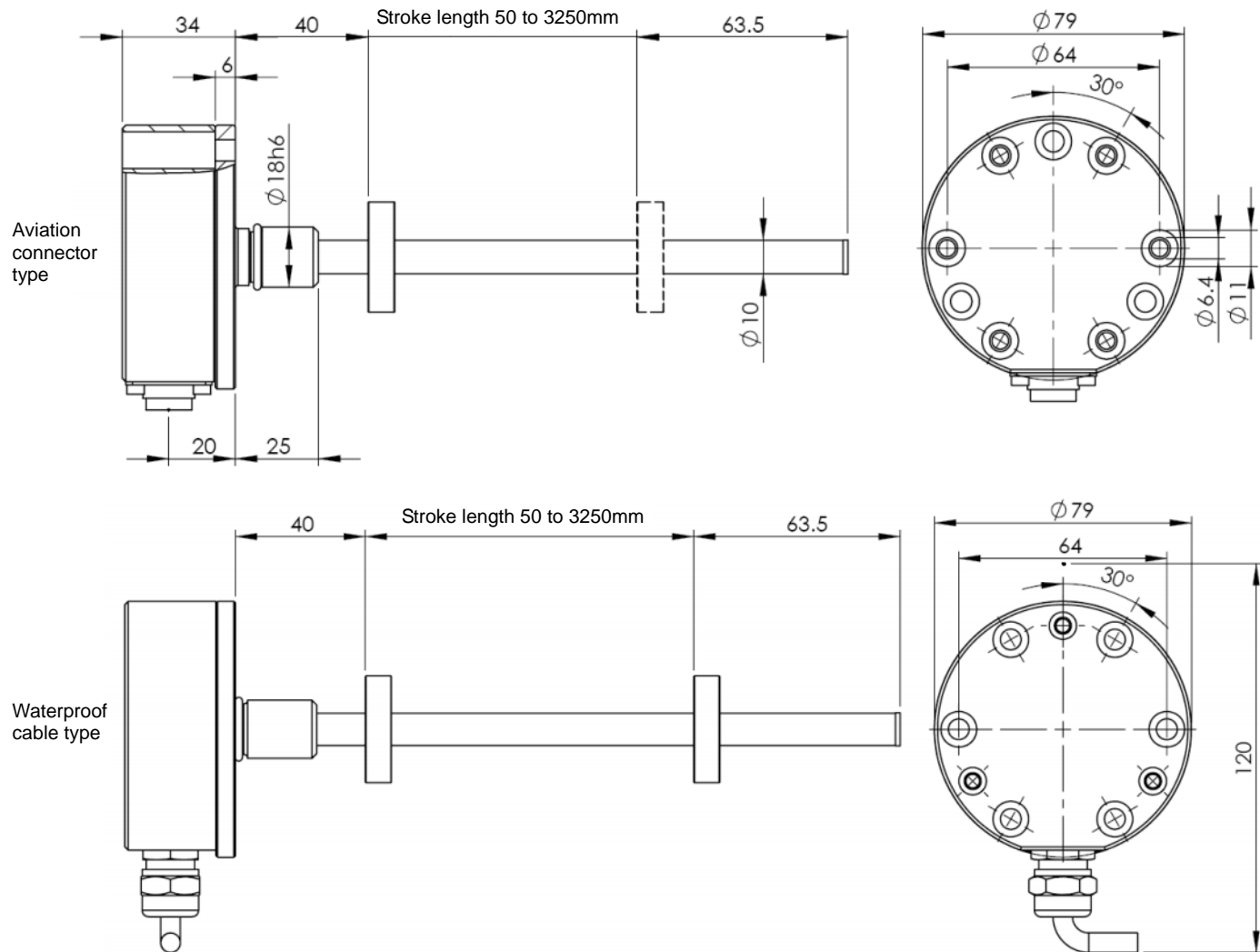
Mechanical assembly: O-sealing ring 15.3x2.2 mm, FPM75,

Magnet type: Ring magnet OD33, OD25.4, OD17.4

SSI Output

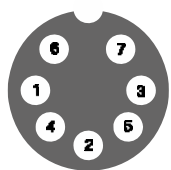
Model GB sensor dimension reference

Model GB Sensor: Drawing is for reference only, contact applications engineering for tolerance specific information



Note: Sensor head with flange installation, 6 pieces of M6x16xA2-70(ISO4762) screw through the head mounting on the end surface

Electronic wiring



Male connector
(Face to sensor
head)

Pin	Color	Description
1	Gray	(-)Output Signal
2	Pink	(+)Output Signal
3	Yellow	(+) Clock
4	Green	(-) Clock
5	Brown	(+) Power +24Vdc(-15/+20%)
6	White	(GND) Power
7	N.C.	

Standard magnet selections

SELECTION OF POSITION MAGNETS

A choice of three magnets are available with the Model GB series sensor. Magnets must be ordered separately with Model GB position sensors. The Magnet with holes for fixing is suitable for most applications.

MAGNET MAGNET(OD33)

with holes(Ø4.3) for fixing



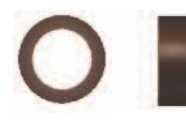
Material: Ferrite PA
O.D.: 33mm(1.3 in.)
I.D.: 13.5mm(0.53in.)
Thickness: 8mm(0.31in.)

RING MAGNET(OD25.4)



Material: Ferrite PA
O.D.: 25.4mm(1 in.)
I.D.: 13.5mm(0.53in.)
Thickness: 8mm(0.31in.)

RING MAGNET(OD17.4)



Material: Ferrite PA
O.D.: 17.4mm(0.68 in.)
I.D.: 13.5mm(0.53in.)
Thickness: 10.5mm(0.41in.)

Ordering Information

