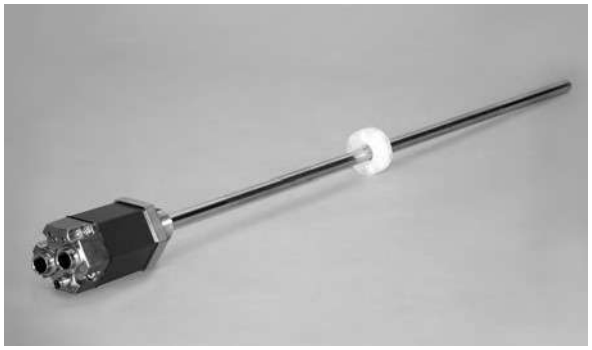
GYSE-EP2 Probe

EtherNet/IP

Noise Cancel

EtherNet/IP interface (detachable probe element)



GYSE-EP2 is EtherNet/IP interface.
It is an adapter device that outputs position/velocity of magnets via EtherNet/IP.
Detecting up to 20 pcs of magnets on one probe is possible.
The inside probe element can be detached from the outer housing.

Specifications

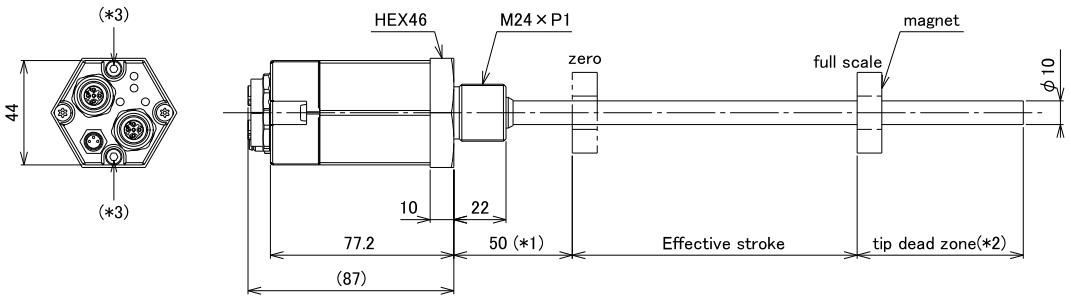
Accuracy	Non-linearity	≦±0.025%FS Typ.
	Resolution	Position: Min. 1μm (multi magnet type : Min. 10μm) Velocity: Resolution 1μm/sec (velocity 1mm/sec or higher) Set by "Configuration Assembly"
	Repeatability	≦±0.001%FS (≦Min.±3μm)
	Temp. drift	≦±15ppmFS/℃
Output		EtherNet/IP
Power supply		+24VDC(±5%)(110mA)
Sampling freq. (＊)		1kHz (≦1300mm) 500Hz (≦2400mm) 250Hz (≧2401mm)
Environment	Max. Pressure	35MPa(probe rod)
	Operating temp.	-20℃～+75℃
	Storage temp.	-40℃～+90℃
	Vibration	15G(10～100Hz)
	Shock	100G(2msec)
	IP grade	IP67

- The above mentioned accuracy applies to sensors with an effective stroke of 300mm or more.
- The specification of stroke less than 300mm is equal that of stroke 300mm.

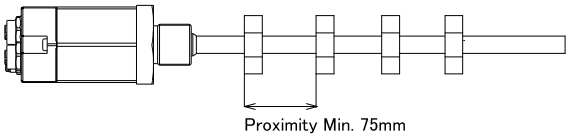
(＊) In case of multi magnets on one probe, sampling frequency is not standard value.

Dimensions

■Probe

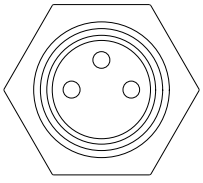


*1) In case of an effective stroke 3001mm or more, head dead zone is 100mm. (Model code ② : 100)
*2) In case of an effective stroke 3001mm or more, tip dead zone is "standard length + 30mm". (Model code ③ : 100/130)
*3) Screws (2 pcs) for detachment.



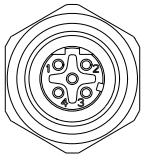
- When multiple magnets (max. 20pcs.) are used, minimum proximity distance between 2 magnets is 75mm.
(The minimum distance between magnets varies depending on magnet type.)

■ Power Connector
(M8 connector (plug))



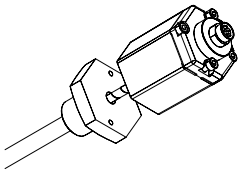
Pin		: Function
1	red	: DC24V
2	—	: —
3	white	: 0V
4	black	: N.C.

■ Communication Connector
(M12 connector : receptacle / D coding)



Pin	: Function
1	: TX(+)
2	: RX(+)
3	: TX(−)
4	: RX(−)
5 (center)	: N.C.

■detachable probe element



Model

■Probe

GYSE-EP2-□□□□-□/□-□-□-CN-□

① ② ③ ④ ⑤ ⑥ ⑦

①Effective stroke
15～7500mm

②Head dead zone
50：50mm（Std.）
□：□mm（specified by customers）

・Possible Min. length depends on the selected magnet.

③Tip dead zone
□：70mm /100mm(Std.)

□	tip DZ	magnet
70	70mm	M2PN, M3, M11N
100	100mm	T144, T163

□ : □mm (option)(specified by customers)

④Thread/Rod diameter
M：M24×P1.0 、φ10mm（Std.）
N：M18×P1.5、 φ10mm
M14：M24×P1.0、φ13.8mm

⑤Associated magnet or float
＜magnet＞
M2PN ：No.2PN（Std.）
M3 ：No.3
M11N ：No.11N
T144 ：No.T14-M4
T163 ：No.T16-M3

・Selecting magnet from page 116～118(GG).
・Please consult our factory in case of requesting special magnet or float.
・This model code means only specifying associated magnet or float.
・Ordering magnet or float individually.

⑥Cable connection
CN：Connector（Std.）

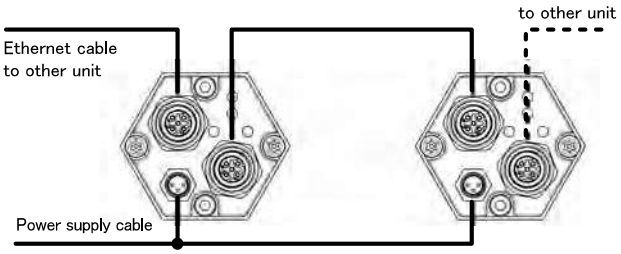
⑦Option
blank：without option
SRT：SRT option

・Please confirm the details of SRT option on page 114.

Wiring

・Stable power supply (24VDC±5%) is necessary.
・Probe has two connectors for communication (PORT1 and PORT2), these ports are the same function and customer can use either.
・Serial wiring connection is possible.
・Category CAT5/5e and above twist pair cable with shield (STP) is recommended for communication and for between the hub and each node, less than 100m length is recommended.
・In case of using several probes, please follow the below sketch.

■Serial wiring



■Case of using switching hubs