ISC50 series

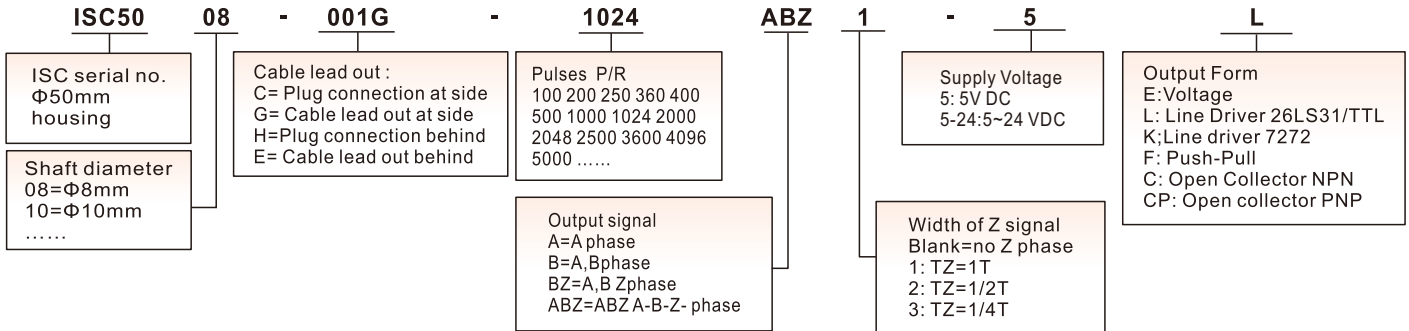## Solid-Shaft Incremental Rotary Encoder

YUMO®

◆ **Application**

- Measure the distance, angle, position acceleration , automatic control , robot, X-Y labor ,printing, molding machine, packing machine, machine tool and etc.

◆ **Features**

- Miniature size, easy assembling
- 2 quadrature output channel (A&B) + index signal
- Resolution up to 3600 pulses

◆ **Ordering Information**

ISC50　08　-　001G　-　1024　ABZ　1　-　5　　　　L

ISC serial no. Φ50mm housing	
Shaft diameter 08=Φ8mm 10=Φ10mm ……	

Cable lead out :
C= Plug connection at side
G= Cable lead out at side
H=Plug connection behind
E= Cable lead out behind

Pulses P/R
100 200 250 360 400
500 1000 1024 2000
2048 2500 3600 4096
5000 ……

Output signal
A=A phase
B=A,Bphase
BZ=A,B Zphase
ABZ=ABZ A-B-Z- phase

Supply Voltage
5: 5V DC
5-24:5~24 VDC

Width of Z signal
Blank=no Z phase
1: TZ=1T
2: TZ=1/2T
3: TZ=1/4T

Output Form
E:Voltage
L: Line Driver 26LS31/TTL
K;Line driver 7272
F: Push-Pull
C: Open Collector NPN
CP: Open collector PNP

◆ **Note:**

1.Please contact sales representative to confirm the correctness and availability of the part number

◆ **Technical Specifications**

Electrical Specification				
Output circuit	Open collector	Voltage output	Push pull output	Line driver output
Power Vcc	5~30	5~30	5±0.25 5~30	5±0.25 5~30
Current	≤80mA	≤80mA	≤80mA	≤150mA
Load current	40mA	40mA	40mA	60mA
High-level output	Min Vcc*70%	Min Vcc-2.5V	Min Vcc-1.5V	Min 3.4V
Low-level output	Max 0.4V	Max 0.4V	Max 0.8V	Max 0.4V
Rise Time Tr	Max 1us	Max 1us	Max 1us	Max 200ns
Fall Time Tr	Max 1us	Max 1us	Max 1us	Max 200ns
Max Responding Frequency	300kHz	300kHz	300kHz	300kHz
Mechanical Specification				
Max speed(r/min)	Starting Torque	Max. Shaft Loading	Shocking	Vibration
6000	<0.01Nm	Radial:60N, Axial:30N	50G/11ms	10G 10-2000Hz
Rotor Inertia	Working Temperature	Storage Temperature	Protection Grade	Weight
$4*10^{-8}$ Kgm^2	-30~85℃	-35~95℃	IP51	250g

◆ **Connection Table**

Signal	A	B	Z	Ā	B̄	Z̄	Vcc	GND
Color	Green	White	Yellow	Brown	Grey	Orange	Red	Black

◆ **Dimensions(mm)**