

MAIN FEATURES

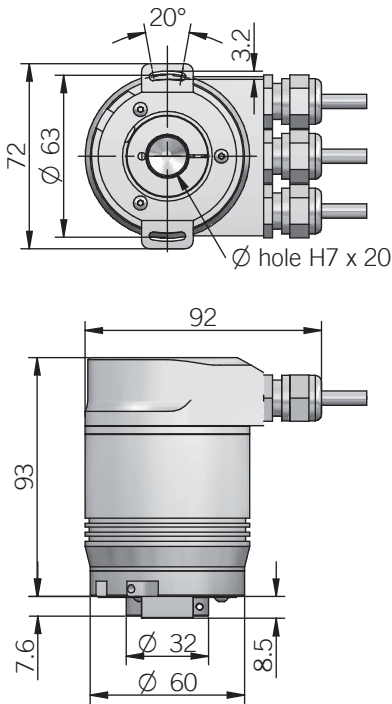
Industry standard multiturn absolute encoder for factory automation applications.

- Optical sensor technology (OptoASIC + gears)
- 25 bit total resolution (13 bit single turn (8192 ppr) + 12 bit multiturn (4096 turns))
- Power supply up to +28 V DC with Profibus DP as electrical interface
- Intelligent status leds
- Terminal box or M12 connector for fast setup
- Blind hollow shaft up to 15 mm diameter
- Mounting by stator coupling, torque stop slot or torque pin



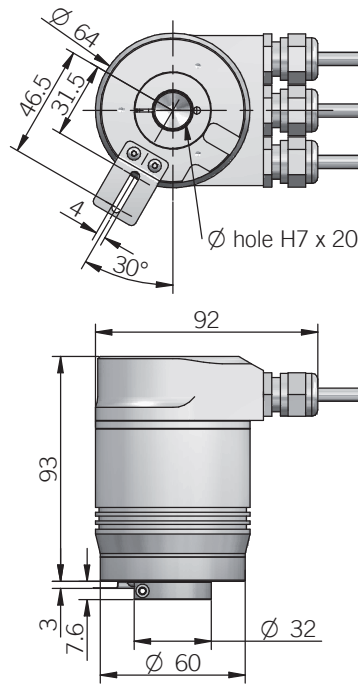
ORDERING CODE	EAM	63F	R	4096 / 4096	B	12/28	FXX	8	X	3	P3R	.XXX
SERIES multiturn absolute encoder EAM												
MODEL blind hollow shaft with stator coupling 58F blind hollow shaft with torque stop slot 63F blind hollow shaft with torque pin 63G												
rev. 2.0 R												
MULTITURN RESOLUTION turns 4096												
SINGLETURN RESOLUTION ppr 4096 / 8192												
CODE TYPE binary B												
POWER SUPPLY 12 ... 28 V DC 12/28												
ELECTRICAL INTERFACE PROFIBUS DP V0 CLASS 2 FXX												
BORE DIAMETER mm 8 (3/8") 9,52 mm 9 mm 10 mm 12 mm 14 mm 15												
ENCLOSURE RATING IP 54 X												
MAX ROTATION SPEED 3000 rpm 3												
OUTPUT TYPE terminal box - radial cable glands P3R radial M12 connectors M12R												
mating connectors included, without mating connectors please add 162 as variant code												
VARIANT custom version XXX												

58 F



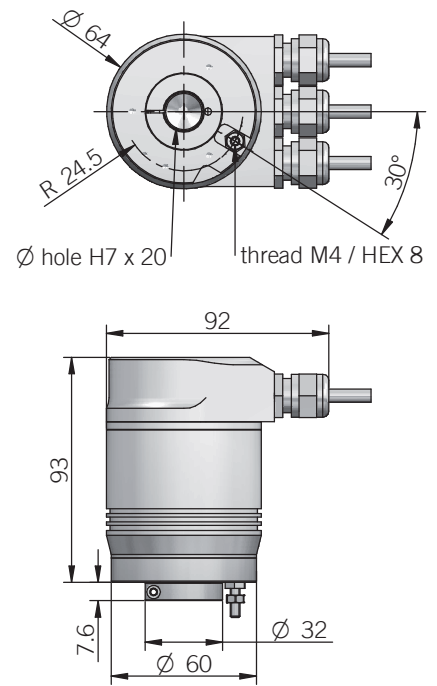
dimensions in mm

63 F



for torque pin please refer to Accessories

63 G



torque pin is included

ELECTRICAL SPECIFICATIONS

Multiturn resolution	1 ... 4096 turns programmable during commissioning
Singleturn resolution	2 ... 4096 / 2 ... 8192 ppr programmable during commissioning
Power supply¹	11,4 ... 29,4 V DC
Current consumption without load	300 mA
Electrical interface²	RS 485 galvanically isolated
Max bus frequency	12 Mbaud
Diagnostic features	frequency warning position warning / alarm please refer to installation manual for more informations
Max frequency	max 25 kHz LSB
Code type	binary
Counting direction	programmable during commissioning
Start-up time	500 ms
Accuracy	± 1/2 LSB
Electromagnetic compatibility	according to 2014/30/EU directive
RoHS	according to 2015/863/EU directive
UL / CSA	certificate n. E212495

CONNECTIONS

Function	POWER	LINE OUT	LINE IN
+ V DC	2		
0 V	4		
A		2	
B		4	
A			2
B			4

MECHANICAL SPECIFICATIONS

Bore diameter	∅ 8* / 9* / 10* / 12* / 14 / 15 mm * with supplied shaft adapter
Enclosure rating	IP 54 (IEC 60529)
Max rotation speed	3000 rpm
Shock	50 G, 11 ms (IEC 60068-2-27)
Vibration	10 G, 10 ... 2000 Hz (IEC 60068-2-6)
Moment of inertia	5 x 10 ⁻⁶ kgm ² (119 x 10 ⁻⁶ lbfm ²)
Starting torque (at +20°C / +68°F)	< 0,02 Nm (2,83 Ozin)
Bearing stage material	EN-AW 2011 aluminum
Shaft material	1.4305 / AISI 303 stainless steel
Housing material	painted aluminium
Bearings	n.2 ball bearings
Bearings life	10 ⁹ revolutions
Operating temperature^{3,4}	0° ... +60°C (+32° ... +140°F)
Storage temperature⁴	-15° ... +70°C (+5° ... +158°F)
Fixing torque for collar clamping	1,5 Nm (212 Ozin) recommended
Weight	650 g (22,93 oz)

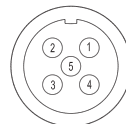
¹ as measured at the transducer without cable influences

² for further details refer to OUTPUT LEVELS on TECHNICAL BASICS section

³ measured on the transducer flange

⁴ condensation not allowed

POWER connector (5 pin)
M12 A coded
view solder side FV



LINE OUT - female (5 pin)
M12 B coded
solder side view FV



LINE IN - male (5 pin)
M12 B coded
solder side view MV

