



- Optical principle
- Incremental measurement
- 6, 8 or 10 mm shaft diameters
- Resolution: 100 to 2.048 pulse
- 300 KHz replying frequency

## TECHNICAL SPECIFICATIONS

Process Temperature	- 25 to 85 °C
Stock Temperature	- 40 to 100 °C
Protection Class	IP54
Chassis	58 mm Diameter
Replying Frequency	300 KHz
Working Speed	6.000 RPM max.
Shaft Diameter	6 mm, 8 mm, 10 mm

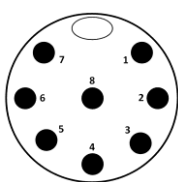
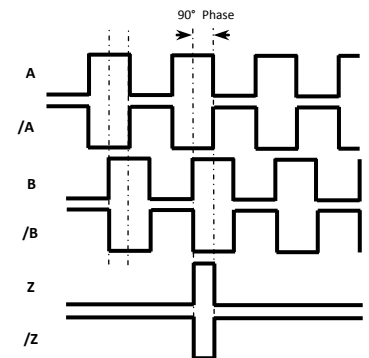
## ELECTRICAL SPECIFICATIONS

Supply Voltage	+5 VDC, +10VDC...30VDC
Supply Current	50mA Nominal
Output Type	Push Pull, TTL Line Driver, Open Collector
Output Signals	A, /A, B, /B, Z, /Z
Output Current	100mA max. (Every Channel)
Connection	8 x 0,14 mm <sup>2</sup> Cable with shield

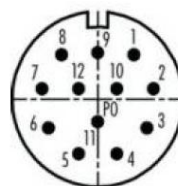
## OUTPUT SIGNALS

PIN NO	SIGNAL	CABLE COLOR
1	A	YELLOW
2	/B	WHITE
3	+V	RED
4	0 V	BLACK
5	/A	BLUE
6	B	GREEN
7	/Z	GREY
8	Z	PINK
9	GROUND	SHIELD

In the left tablet the cable colors of sensors output signals are given. If the control circuit is suitable in the Line Driver sensors of the not output signals (/A, /B, /Z) have to be added to the system. If it is not suitable /A, /B, /Z signal cables must be fixed as insulated separately. Don't forget that these edges have electricity too.



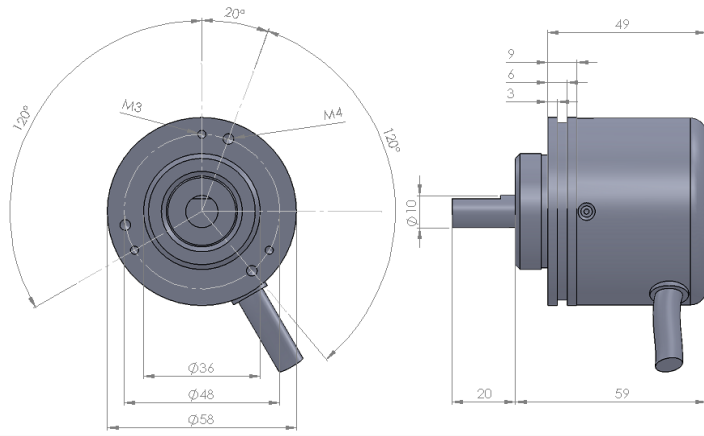
S16 PIN NO	SIGNAL	CABLE COLOR
1	A	YELLOW
2	/B	WHITE
3	+V	RED
4	0 V	BLACK
5	/A	BLUE
6	B	GREEN
7	/Z	GREY
8	Z	PINK
	GROUND	SHIELD



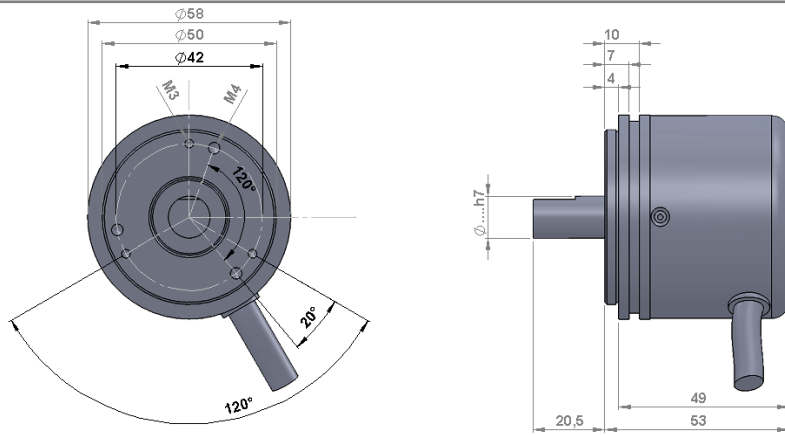
S23 PIN NO	SIGNAL	CABLE COLOR
5	A	YELLOW
1	/B	WHITE
12-2	+V	RED
10-11	0 V	BLACK
6	/A	BLUE
8	B	GREEN
4	/Z	GREY
3	Z	PINK
9	GROUND	SHIELD

MECHANICAL DIMENSIONS

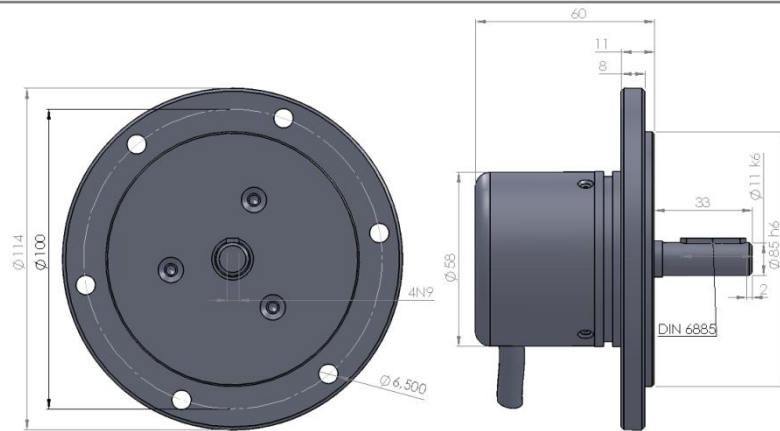
Clamping Flange



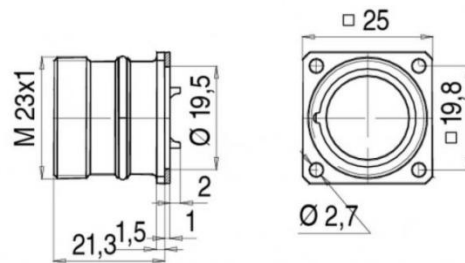
Synchro Flange



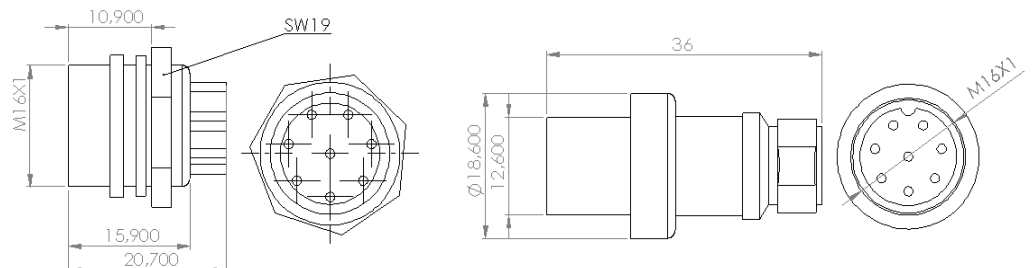
Tacho Flange



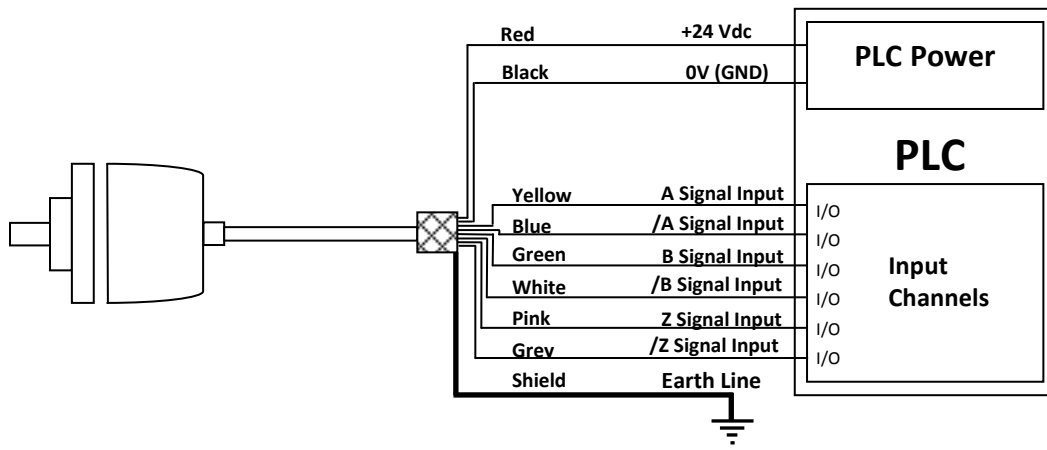
S23 Socket Connector



S16 Socket Connector



**SAMPLE APPLICATION**



S16 (M16, 8 Pin)  
Socket Connector



S23 (M23, 12 Pin)  
Socket Connector



Backside Poliemid  
Spiral



Clamping Flange



Synchro Flange



Tacho Flange

**ORDER CODING**

<p><b>Series</b> ARC : Optical</p>		<p><b>Body Size</b> 58 : 58 mm</p>		<p><b>Power Supply and Output</b>                  PP : 10...30 VDC Supply                  : 10...30VDC Output                  TTL : 5 VDC Supply                  : 5 VDC TTL Output                  HTL : 10...30 VDC Supply                  : 5 VDC TTL Output                  HPL : 5...24 VDC Supply                  : 5...24 VDC Push-Pull Output                  OCL : Open Collector</p>			<p><b>Cable Length</b>                  3M : 3M (Standard)                  5M : 5M                  8M : 8M                  10M : 10M                  S16 : M16 8Pin Socket Connector                  (Only Backside)                  S23 : M23 12 Pin Socket Connector                  (Only Sidewise)                  *Optional up to 35 meters</p>		<p><b>Shaft Diameter</b>                  6 : 6 mm                  8 : 8 mm                  10 : 10 mm</p>									
ARC	-	S	-	58	-	XXX	-	XXX	-	X	-	XM	-	X	-	X	-	X
<p><b>Shaft Type</b> S : Shafted</p>		<p><b>Resolution</b> From 4 Pulse to 5000 Pulse See resolutions*</p>				<p><b>Output Signals</b> 3 : A, B, Z 6 : A, /A, B, /B, Z, /Z</p>		<p><b>Cable Direction</b> A : Backside Y : Sidewise AS : Backside + Spiral</p>		<p><b>Flange Type</b> C : Clamping S : Synchro T : Tacho</p>								

**\*Resolutions:**  
100 – 360 – 500 – 1024 – 2048 (or on request)



**Atek Sensor Technology A.S.**

Cevizli Mah. Bagdat Cad. Guven Sok. No:11 TR-34846 Maltepe-Istanbul-TURKEY  
 Tel: +90 216 399 44 04 Fax: +90 216 399 44 02  
[www.ateksensor.com](http://www.ateksensor.com) [info@ateksensor.com](mailto:info@ateksensor.com)