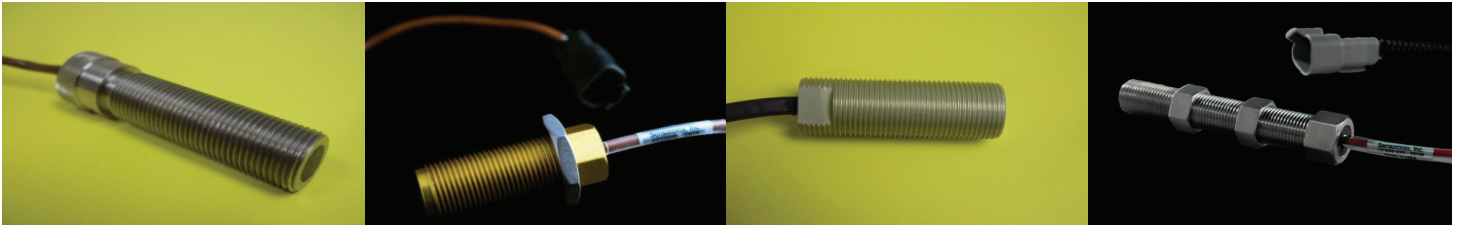
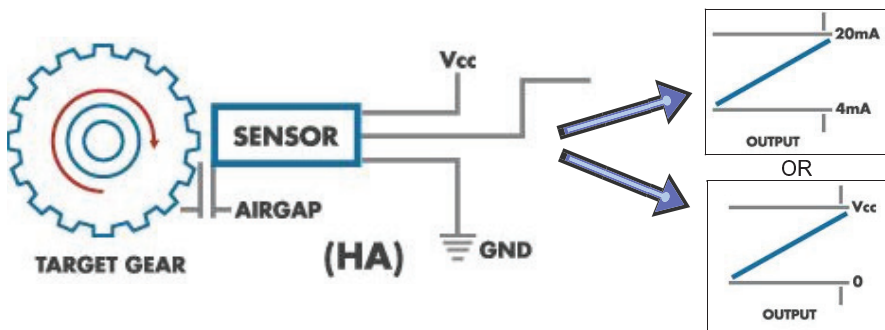


# Hall-Effect Speed Sensor W/ Linear Output (HA)



Non-contact linear speed magnetic sensors that uses Hall effect technology to measure the velocity of a rotating object. This sensor is a complex device with signal conditioning that is powered and provides a 4 - 20 mA or a 0 - 10 VDC linear output for velocity measurement.

**Common Applications:** Wind velocity meter measurement, Radar speed measurement, Linear output rotary measurement.



CASE TYPES	DESCRIPTION	A
	SMOOTH	0
	ALL THREAD	1
	HEX HEAD	2
	KNURL HEAD	3
	CONNECTOR HEAD	4
	WRENCH FLAT HEAD	5
	SMOOTH / THREAD	6
	WITH FLANGE	7

**Target:** Ferrous Material Gear Tooth with range of Min 4 to 32 Gear Pitch.

$$P = \frac{N + 2}{OD}$$

P = Gear Pitch  
N = Num. of Teeth  
OD = Outside Diameter

**Frequency:** 15 KHZ Max

**Output Type:** Analog (Linear) Output Speed Sensor

## PROTECTIONS

**Short circuit:** Lead to Lead

**Supply overvoltage:** 40 VDC

**Reverse polarity:** -50 V reverse transient.

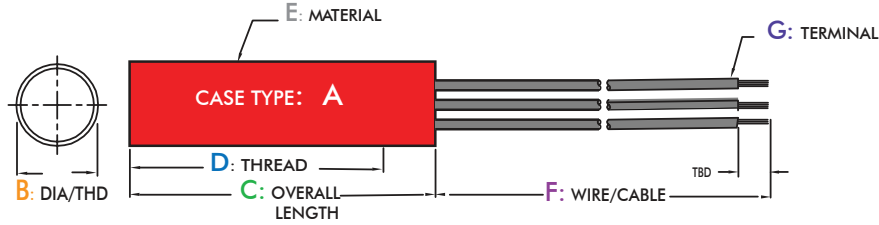
**Load Dump:** 60 V

## Part Number Nomenclature

Sensor Type	HA	X	X	X	-	X	X	Special Modifications
Case Type "A"								Output: 0 - 10 VDC 10 Output: 4 - 20 mA 20
Case Diameter "B"								Terminal "G"
1/4" (0.250")	2X,	Others	9X					Connector 0
3/8" (0.375")	3X,	M-12	12					Conn. & Wire 1
15/32"(0.468")	4X,	M-16	16					Conn. & Cable 2
1/2" (0.500")	5X,	M-18	18					Lead Wires 3
5/8" (0.625")	6X,	M-20	20					Cable 4
3/4" (0.750")	7X,	M-22	22					
7/8" (0.875")	8X							

# Standard (HA) Products Available

Please contact Sensoronix for more detailed information on the standard sensors listed below. All Sensoronix products are custom designed to meet your exact specification requirements.



Products P/N	MECHANICAL SPECIFICATIONS							ELECTRICAL SPECIFICATIONS						ENVIRONMENT
	A	B	C	D	E	F	G	INPUT Voltage (VDC)	INPUT Current (mA)	OUTPUT Range	OUTPUT Current (mA)	Frequency Range (Hz)	Sensitivity (mV/Hz)	TEMPERATURE RANGE ° C
<b>5/8" Diameter Series</b>														
HA260-410	2	5/8 - 18	3.31	3.00	303 S.S.	120 ± 3	22 AWG PVC CABLE	24	35	0 - 10 VDC	10	0 To 2500	50	0 To 85
HA360-410	3	5/8 - 18	2.72	2.14	303 S.S.	72 ± 3	22 AWG PVC CABLE	10 to 24	26	0 - 10 VDC	10	0 To 500	50	0 To 85
HA260-420	2	5/8 - 18	3.30	3.00	Alum.	120 ± 3	22 AWG PVC CABLE	24	26	4 - 20 mA	10	0 To 83	.8	0 To 85
HA261-420	2	5/8 - 18	3.31	3.00	303 S.S.	396 ± 3	22 AWG PVC CABLE	24	26	4 - 20 mA	10	0 To 4300	.8	0 To 85
HA360-420	3	5/8 - 18	2.72	2.14	303 S.S.	72 ± 3	22 AWG PVC CABLE	24	35	4 - 20 mA	10	0 To 500	.8	0 To 85
<b>3/4" Diameter Series</b>														
HA270-410	2	3/4 - 16	2.34	2.00	Alum.	72 ± 3	22 AWG PVC CABLE	24	26	0 - 10 VDC	10	0 To 200	50	0 To 70
HA270-420	2	3/4 - 16	2.34	2.00	Alum.	72 ± 3	22 AWG PVC CABLE	24	26	4 - 20 mA	10	0 To 1000	.8	0 To 70
HA271-420	2	3/4 - 16	2.34	2.00	Alum.	120 ± 3	22 AWG PVC CABLE	24	26	4 - 20 mA	10	0 To 50	.8	0 To 70
<b>M18 Diameter Series</b>														
* HA118-420	1	M18 x 1.5	3.31	3.13	303 S.S.	80 ± 3	22 AWG PVC CABLE	24	26	4 - 20 mA	10	0 To 50	.8	0 To 70
<b>M22 Diameter Series</b>														
* HA222-220	2	M22 x 1.5	3.31	3.00	303 S.S.	118 ± .5	22 AWG TEF. CABLE W/ DEUTCH CONN.	24	35	4 - 20 mA	10	0 To 133	.8	-20 To 95

NOTE: ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE SPECIFIED

\* SEALED FRONT