



# The Fastest 2 Wire Ultrasonic Transmitters - c/w HART 7 Standard and Sanitary Mtg.



730 The Kingsway Peterborough , Ont. K9J6W6 Canada  
 Tel: (705) 740 – 2010 Web: www.abmsensor.com  
 Fax: (705) 740 – 2563 E-mail: info@abmsensor.com

## FEATURES



- 1) Self adjusting, eliminates unwanted echoes.
- 2) Plug and play, only 4 mA and 20 mA calibration is needed.
- 3) Self cleaning no build-up on transducers faces.
- 4) The shortest blanking; range up to 100 Ft.
- 5) At least 3 updates per second (other brands offer one update per several seconds)
- 6) Temperature from - 40 C to 120°C.
- 7) Sanitary mounting available.
- 8) PVC, SS316L or TEFLON materials for transducers.
- 9) PVC, Aluminum or SS316L for electronics enclosures
- 10) The fastest "HART 7" Communication
- 11) Free communication software with diagnostics, Tools and graphics.



## APPLICATIONS

- 1) Any liquids and solids.
- 2) Food and pharmaceutical.
- 3) High temperature applications.
- 4) Sanitary
- 5) Any slow or fast process, other brands are limited due to their slow response .

## MECHANICAL

Conduit Entry : 1/2" NPT Hole  
 (PVC Conduit only for PVC Housing )  
 Enclosure : Aluminum - 94V0  
 : PVC or SS316L  
 Sensor : Standard - PVC,  
 High Temp. : Optional - Teflon (standard mtg. only)  
 HTP. (5 Bar) : S.S. (1 1/2" or 2" sanitary only)  
 Ingress Protection: NEMA 6 (IP68)

## ENVIRONMENTAL

Temperature :  
 Electronics Enclosure :- 40 to 140°F(- 40 to 60°C)  
 Continuous Operation

PVC & Std. Sanitary Nozzle  
 :- 40 to 140°F(- 40 to 60°C)  
 Teflon Nozzle :- 40 to 266°F(- 40 to 130 °C)  
 S.S. HTP Sanitary :- 40 to 266°F(- 40 to 130°C)  
 for 1/2 Hr. Steam Cleaning.  
 Remove sensor for longer Cleaning cycle ,recommended.  
 Not for Continuous Operation.

Pressure Std. : 2 bar  
 Optional : 5 bar max. using HTP Sanitary Sensor or special HP- PVC Sensor.

Installation Category : Class II

## ELECTRICAL SPEC.

<b>Power ABM200</b>	12 to 30 VDC 0.025 A max @ 24 Vdc
<b>Output</b>	4-20 mA Output 6 uA Resolution Optional Communications with "HART 7"

Approvals : Intrinsic Pending

FM(USA):  
 FM3810 (2005) Electrical Electronic Test, Measuring and Process Control Equipment  
 ANSI/NEMA 250 (1991) :Enclosures for Electrical Equipment

FM(CAN.):  
 CSA C22.2 No. 1010.1 (2004) Safety Requirements for Electrical Equipment for Measurement, Control and Laboratory Use  
 - Part 1: General Requirements  
 CSA C22.2 No. 94 (2011) Special Purpose Enclosures

## OPERATIONAL

Accuracy : +/-0.1% of Max. span  
 (in lab using 4- 20mA current output)  
 +/-0.25% of max. range (typically in field)

Response Time: Standard Unit 3 echo's / sec.

Loss of Echo : Programmable 1 to 4 min.

Calibration : Push-button or  
 "HART 7" Communication

Temperature Comp. : In transducer

Communications: on the following page.

CATALOGUE # - On the Web return to Home Page & Refer to Catalogue Number Structure for ordering Information.

## TECHNICAL SPECIFICATIONS

Range Code	Beam Angle	OPERATING RANGE In Liquids	Resolution	Mounting
025	6°	1.4 - 100 ft. 0.40 - 30 m	0.41" 10 mm	6.0"/1.0" NPT 7.3"Ø x 7.6" H
045	9°	1.0 - 60 ft. 0.30 - 18.2 m	0.27" 6.8mm	3.0" NPT 3.0"Ø x 3.0" H
052	12°	0.9 - 50 ft. 0.27 - 15.2 m	0.23" 5.7mm	3.0"/ 2.0" NPT 2.0"Ø x 2.7" H
070	12°	0.8 - 30 ft.	0.13"	3.0"/ 2.0" NPT
080	12°	0.7 - 20 ft. 0.21 - 6.1 m	0.088" 2.2 mm	3.0"/ 2.0" NPT 1.8"Ø x 2.25" H
081	12°	0.6 - 16 ft. 0.18 - 4.9 m	0.07" 1.8 mm	3.0"/ 1.5" NPT 1.5"Ø x 2.1" H
148	12°	0.4 - 9 ft. 0.12 - 2.7 m	0.04" 0.98 mm	3.0"/ 1.0" NPT 1.1"Ø x 2.0" H