



Octave brings the latest in ultrasonic metering technology to Commercial/Industrial (C&I) water meters and puts precise measurement where the real flows exist. An excellent alternative to mechanical compound, single-jet, floating ball, fire-service type and turbine meters, Octave excels at maintaining sustained accuracy for the life of the meter while providing smart AMR capabilities.

### Technical Specifications:

**Working Pressure** - 175 PSI

**Liquid Temperature** - 32° - 122 °F

**Metrological Characteristics** - Meets AWWA Standard C-750-10, ISO 4064 rev. 2005

**Configuration** - Compact-Display built into unit

**Power Source** - 2 x D Size Lithium Thionyl Chloride batteries - 10 year warranted life time

**Environmental Protection** - NEMA 6P+ (IP68+), Ambient operation temp. -13 °F / +131 °F for the display

**Display Units** - Multi line 9 digit LC (Programmable USG, Cu Ft, M³, Acre Feet for volume with GPM or metric flow rate choices)

**Output** - Programmable single/dual open collector pulse output, encoder OR externally powered loop 4-20 mA

### Features & Benefits:

- Flow sensitivity starting as low as 1/16 GPM
- Grade 316 Stainless Steel or Epoxy Coated Ductile Iron body design provides full compliance with ANSI/NSF 372 (AB1953 or NSF61G)
- No moving parts. Minimal flow intrusion. Enduring accuracy.
- No required strainer
- Double beam ultrasonic measurement sensors for high accuracy and reliable operation
- FM Approved\*
- Industry standard communication protocol for integration with most third-party AMR/AMI systems
- Active leak, theft, backflow, meter damage/tamper, rate of flow, and battery life indication
- Detailed LCD display features immediate reporting and visual indicators for 8 critical conditions
- Ruggedized NEMA 6P/IP-68+ construction; fully submersible design
- Designed to meet standards for both North American and International C&I water meters
- Optional flow measurements; Forward Only, Net Volume or Alternating Display (Forward and Reverse Consumption displayed separately)

## Performance Data

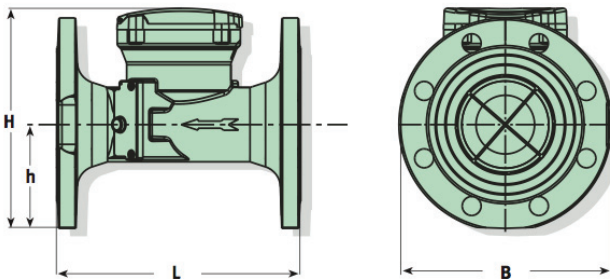
Octave Nominal Size inch (mm)	† Typical Starting Flow GPM (Lt/s)	Extended Low Flow 95% - 105% Accuracy GPM (Lt/s)	Normal Flow Range 98.5% - 101.5% Accuracy GPM (Lt/s)	‡ Continuous Safe Max Flow GPM (Lt/s)	Linearity Range +/- 0.5% Maximum Deviation GPM (Lt/s)
2" (50mm)	1/16 (.004)	1/4 (.016)	1/2 - 250 (.032 - 15.77)	250 (15.77)	4 - 200 (.25 - 12.62)
3" (80 mm)	1/16 (.004)	1/2 (.032)	1 - 500 (.06 - 31.54)	500 (31.54)	5 - 350 (.32 - 22.08)
4" (100 mm)	1/16 (.004)	3/4 (.047)	1-1/2 - 1,000 (.09 - 63.09)	1000 (63.09)	15 - 700 (.94 - 44.16)
6" (150 mm)	3/4 (.047)	2 (.13)	3 - 1,600 (.19 - 100.94)	1,600 (100.94)	20 - 1,150 (1.26 - 72.55)
8" (200 mm)	3/4 (.047)	4 (.25)	5 - 2,800 (.32 - 176.65)	2,800 (176.65)	50 - 2,000 (3.15 - 126.18)
10" (250 mm)	2.5 (.16)	8 (.50)	14 - 5,500 (.88 - 346.99)	5,500 (346.99)	400 - 4,000 (25.24 - 252.36)
12" (300 mm)	2.5 (.16)	8 (.50)	14 - 5,500 (.88 - 346.99)	5,500 (346.99)	400 - 4,000 (25.24 - 252.36)

† Starting flows vary per meter but can go as low as the above listed flow rates.

‡ Continuous Safe Max Flow ranges listed for the Octave are for accurate flow measurement only and do not limit the Octave from meeting the Short-term Deluge Flow for fire services.

## Dimensions

Model	Octave							
Nominal Size	2" SS (50 mm)	2" DI (50 mm)	3" (80 mm)	4" (100 mm)	6" (150 mm)	8" (200 mm)	10" (250 mm)	12" (300 mm)
L - Length	10" (250 mm)	17" (432 mm)	12" (305 mm)	14" (356 mm)	18" (457 mm)	20" (508 mm)	18" (457 mm)	20" (508 mm)
B - Width	5 3/4" (146 mm)	5 3/4" (146 mm)	7 1/2" (190 mm)	9" (229 mm)	11" (280 mm)	13 1/2" (343 mm)	16" (406 mm)	19 1/4" (489 mm)
H - Height	6 3/4" (172 mm)	6 3/4" (172 mm)	8 1/2" (216 mm)	9 7/8" (250 mm)	10 7/8" (276 mm)	12 7/8" (327 mm)	15" (383 mm)	18" (456 mm)
h - Height	2 1/8" (54 mm)	2 1/8" (54 mm)	3 1/2" (90 mm)	4 1/2" (115 mm)	5 1/8" (130 mm)	6 3/8" (162 mm)	8" (203 mm)	9 5/8" (245 mm)
Weight - Ductile Iron	N/A	24 lbs. (11 kg)	36 lbs. (16 kg)	48.5 lbs. (22 kg)	76 lbs. (34 kg)	108 lbs. (49 kg)	150 lbs. (68 kg)	210 lbs. (96 kg)
Weight - Stainless Steel	15 lbs (7 kg)	N/A	28 lbs (13 kg)	40 lbs. (18 kg)	62 lbs. (28 kg)	88 lbs. (40 kg)	N/A	N/A



**Master Meter, Inc.**

**Toll Free: 800.765.6518**

**Fax: 817.842.8100**

**innovate@mastermeter.com**

\*FM Approval currently pending on 10" and 12" Octave meters.

**NOTE** — For Performance charts please see **Engineering Document - Octave | Version 8.13**