



## Operating Environment

Maximum Working Pressure	20,000 PSI
Pulsation Dampeners	Charged to proper specification
Flow Range	100 – 1,000 GPM
Pressure Drop Across Tool	Approx. 160 PSI at 450 GPM with water
Mud Type	Full Range
Mud Pumps	Duplex or Triplex
Max L.C.M. Size	3/8" diameter
Sand Content	.25% maximum
Temperature Range	175° C. maximum
Surface Mud Screen	Recommended
Float Valve	Required below probe

## System Operation

Toolface Update Rates	Selectable from 14 to 28 seconds
MTF / GTF Crossover	Operator Selectable
Survey Time	160 Seconds
Battery Life	650 plus hours (Utilizing Dual Batteries)
Pulse Type	Positive
Survey Trigger	Stop and Restart mud pumps
Down Link	Change mode of operation
Sensor Measurement Point	18' from bottom of UBHO sub

## Data Specifications

Parameter	Data Range	Resolution
Inclination	0 - 180°	0.1°
Azimuth	0 - 360°	0.1°
Magnetic Toolface	0 - 360°	5.5°
Gravity Toolface	0 - 360° or +/- 180°	5.5°
Probe Temperature	0 - 350°	1.5°
Magnetic Dip	-90 - 90°	0.1°
Total Magnetic Field	0.0 – 1.0 Gauss	100 Gauss
Total Gravity	0.0 – 2.0 G's	0.1 G's

## Probe Dimensions

O.D.	Length	Weight
2.250" Centralizer Fins	26 ft	150 lb
1.875" Pressure Barrels		