Part Numbers: 250046-xxxx-yy
where -xxxx represents the magnetic matching network required for a particular transducer and -yy represents the magnetic module form factor.

Weight: 0.75lbs / 340g for the electronics stack only. See OBM weights.

Input Voltage Range: 10.5V-48VDC (>36VDC may require special configuration)

Power Consumption (As of 2018-01 with appropriate hardware firmware revisions):
- Hibernate: 0.96mW @ 12VDC
- Idle: 0.82W @ 12VDC
- Receive (FSK): 0.82W @ 12VDC
- Receive (S-PSK): 2.74W @ 12VDC
- Receive (M-PSK): xxW @ 12VDC with 4-Element Array Dependent on Array Used

Handling: High voltage DC components are present and exposed on the bottomside of the power amplifier. Please take the necessary precautions to avoid shorting circuitry on the board. A minimum of 0.313” clearance is recommended between the bottom side of the circuit board and the nearest mechanical component.

Schematic: Refer to 250046-SCH for typical wiring inter-connects.
250046-xxxx-01

Designed for AMCC-40 Magnetics
Fits inside a 4.0" ID Housing
OBM Weight: ~3.25 lbs / 1.47kg

Drawing Number: 250046-ASM
Drawing Title: Micromodem Multi-RX PSK Stack with RFF OBM Power Amplifier
Size: C
Rev: A

Woods Hole Oceanographic Institution
Acoustic Communications Group
86 Water Street, Dept. 4 MS 18, Woods Hole, MA 02543

Designer: Keenan Ball
Engineer: Keenan Ball

Unless Otherwise Noted:
1. Tolerances: ±0.01
2. Dimensions are in inches
3. Break All Sharp Edges
4. Surface Finishes Critical for O-Ring Surfaces
5. Material:
6. Finish:

Engineer:
Keenan Ball
11/16/2018

Dimensions:

- AMCC-40 Transformer: 0.688 x 1.757 x 1.750
- AMCC-40 Inductor: 0.812 x 0.250
- Heatsink: 2.625 x 3.250
- Power Resistors: 2.228 x 0.217 + 2.156 x 0.688 + 0.438 x 0.812

OBM Weight: ~3.25 lbs / 1.47kg
250046-xxxx-02

Designed for AMCC-40 Magnetics
Fits inside a 6.0" ID Dual Band Housing
OBM Weight: ~3.25 lbs / 1.47kg

AMCC-40 Transformer
AMCC-40 Inductor
Power Resistors

Drawing Title:
Micromodem Multi-RX PSK Stack with RFF OBM Power Amplifier

Woods Hole Oceanographic Institution
Acoustic Communications Group
86 Water Street, Dept. 4 MS 18, Woods Hole, MA 02543

Drawing No.:
Micromodem Multi-RX PSK Stack with RFF OBM Power Amplifier

Designer:
Keenan Ball
11/16/2018

Engineer:
Keenan Ball
11/16/2018

Sheet 3 of 5

Unless Otherwise Noted:
1. Tolerances: ±0.005 ±1 Deg
2. Dimensions are in inches
3. Break All Sharp Edges
4. Surface Finishes Critical for O-Ring Surfaces
5. Material:
6. Finish:

OBM Weight: ~3.25 lbs / 1.47kg

AMCC-40 Inductor
AMCC-40 Transformer
Power Resistors
250046-xxxx-03

Designed for AMCC-100 Magnetics
Fits inside a 7.0” ID Dual Band Housing
OBM Weight: ~6.18 lbs / 2.81kg

Woods Hole Oceanographic Institution
Acoustic Communications Group
86 Water Street, Dept. 4 MS 18, Woods Hole, MA 02543

Unless Otherwise Noted:
1. Tolerances: Decimal
   JJJ ± 0.001
   XXX ± 0.015
2. Dimensions are in inches
3. Break All Sharp Edges
4. Surface Finishes Critical for O-Ring Surfaces
5. Material:
6. Finish:

AMCC-100 Transformer
AMCC-100 Inductor
Power Resistors

8X #0.180 THRU

Drawing Title:
Micromodem Multi-RX PSK Stack with
RFF OBM Power Amplifier
250046-xxxx-04

Designed for AMCC-100 Magnetics
Fits inside a 4.0" ID Housing
OBM Weight: ~6.18 lbs / 2.81kg

Drawing Title:
Micromodem Multi-RX PSK Stack with
RFF OBM Power Amplifier

Woods Hole Oceanographic Institution
Acoustic Communications Group
86 Water Street, Dept. 4 MS 18, Woods Hole, MA 02543

Cage Code:
88846

Engineer:
Keenan Ball

Unless Otherwise Noted:
1. Tolerances: ±0.005 ±1 Deg
2. Dimensions are in inches
3. Break All Sharp Edges
4. Surface Finishes Critical for O-Ring Surfaces
5. Material:
   Finish:

11/16/2018