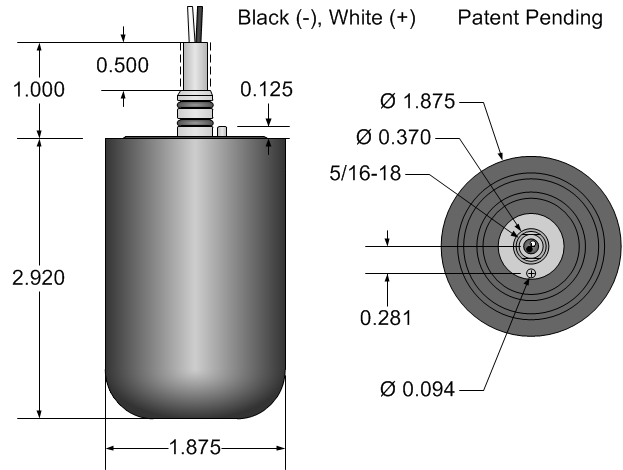


# Model BT-28UF

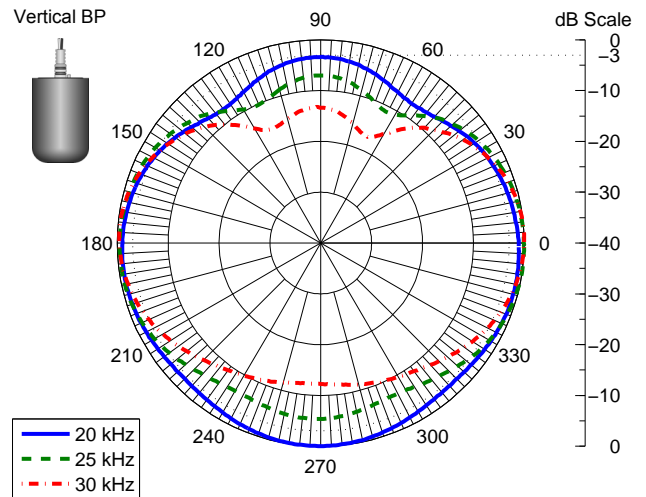
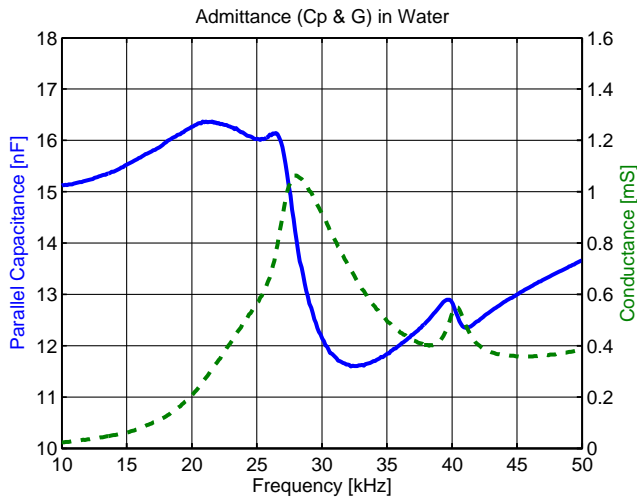
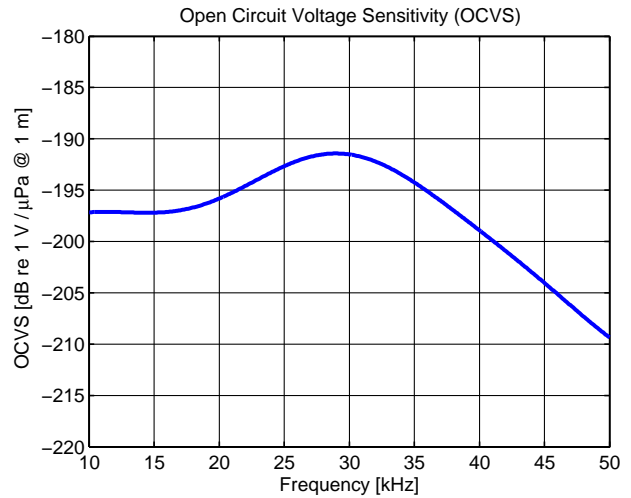
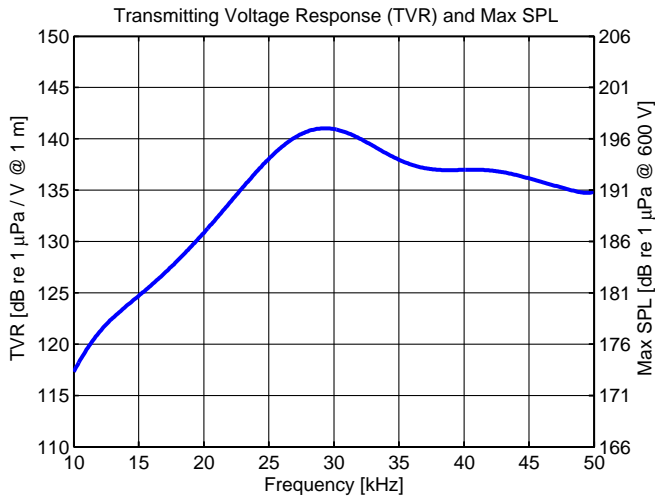
BTech's Model BT-28UF transducer is a proven standard for underwater acoustic communication (AComms).

### Specifications (Nominal):

- Resonance Frequency ( $f_r$ ): 28 kHz
- Coupling Coefficient ( $k_{eff}$ ): 0.33
- TVR at  $f_r$ : 141 dB re 1  $\mu\text{Pa}/\text{V}$
- SPL (max) at  $f_r$  (@ 1 m): 197 dB re 1  $\mu\text{Pa}$
- OCVS at  $f_r$ : -191 dB re 1  $\text{V}/\mu\text{Pa}$
- Horizontal Beam Pattern: Omnidirectional
- Vertical Beam Pattern: Toroidal
- Depth (max): 700 m
- Voltage (max): 600 Vrms
- Weight (in air, in water): 235 g (a), 85 g (w)

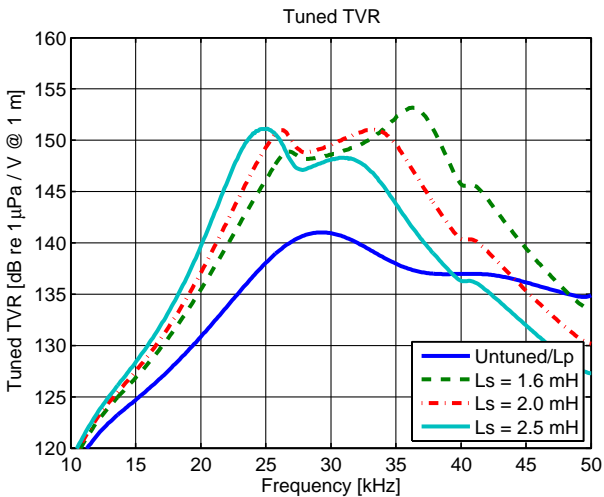
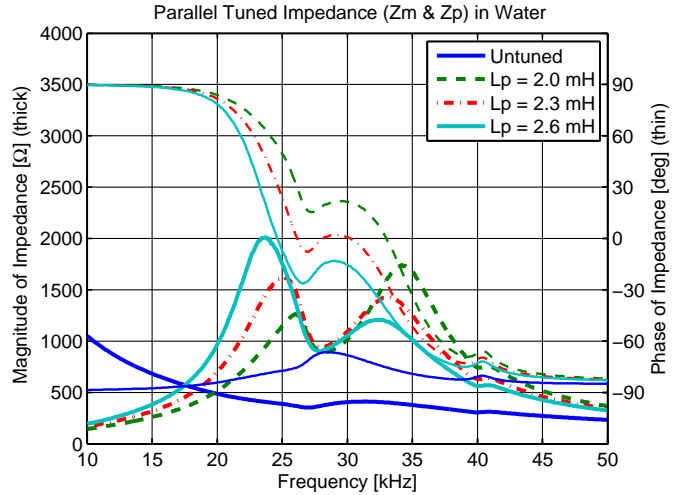
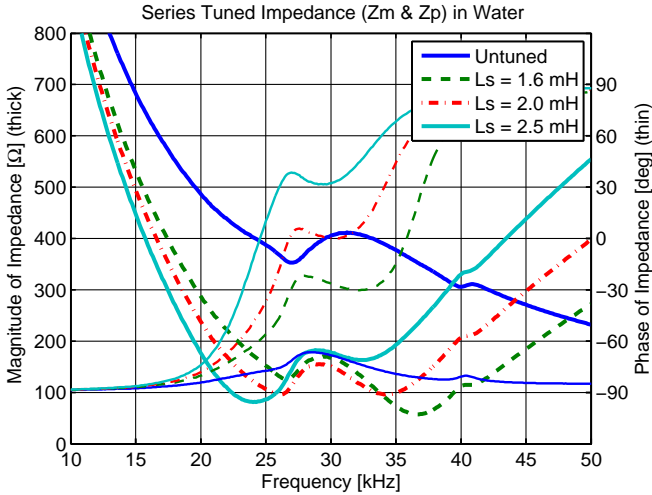
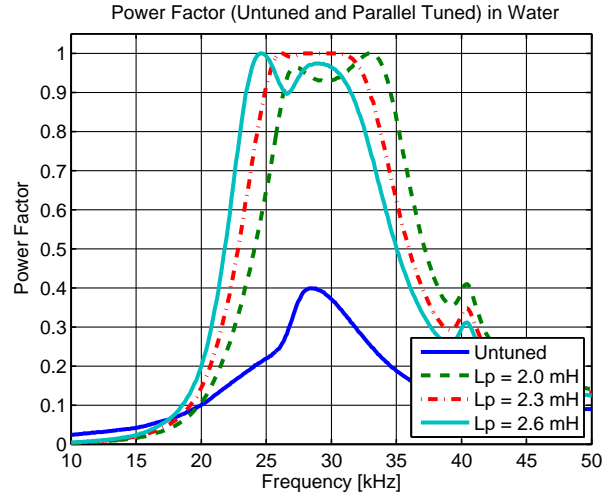
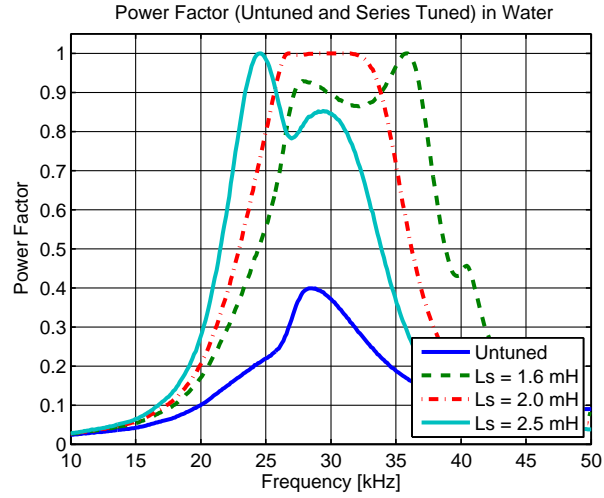


### Performance Curves (Nominal):



# Model BT-28UF

## Tuned Performance Curves (Nominal):



Tuning and Matching is required for highly effective power delivery to the transducer. The impact on system performance for several values of series and parallel inductive tuning elements are provided.

BTech has extensive modeling capabilities to optimize any system configuration for greater bandwidth and efficiency. We also have rapid prototyping and testing capabilities for your specialized needs.