

7/25/05:

Today we have 4 realizations from section 1: afternoon of Jul 25, morning and afternoon of Jul26, and morning of Jul27. Yoyo control was implemented in the 2 scenarios in file sound\_faf05\_jul26\_06\_day.5\_2\_sec1.ma

**Optimal: points=30, threshold=0.1 for afternoon of Jul 25**

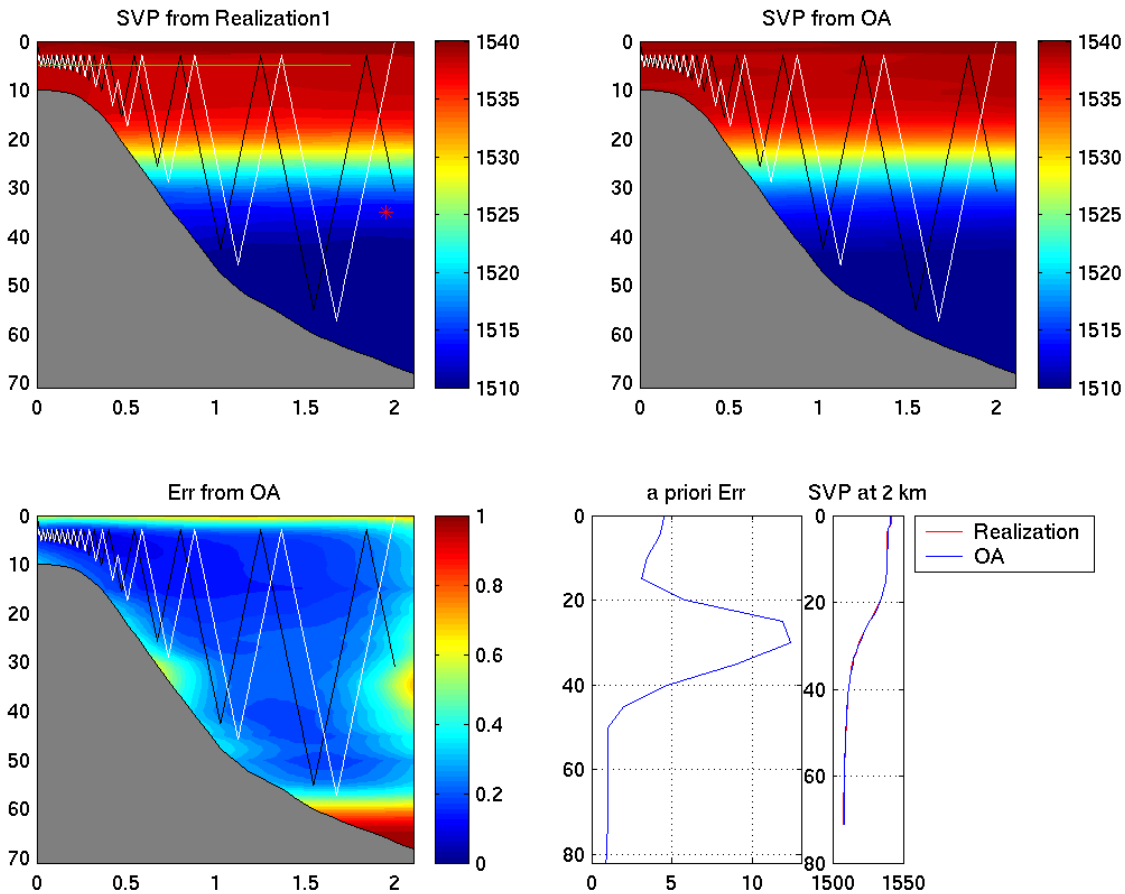


Figure 47: Yoyo control implementation. Afternoon 7/25/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat. Black line is the forward path; White line is the backward path. Note that to avoid bottom AUV turns around at 5 m above bottom.

**Optimal: points=30, threshold=0.1 for morning of Jul 26**

**Optimal: points=30, threshold=1000 for afternoon of Jul 26**

**Optimal: points=30, threshold=1000 for morning of Jul 27**

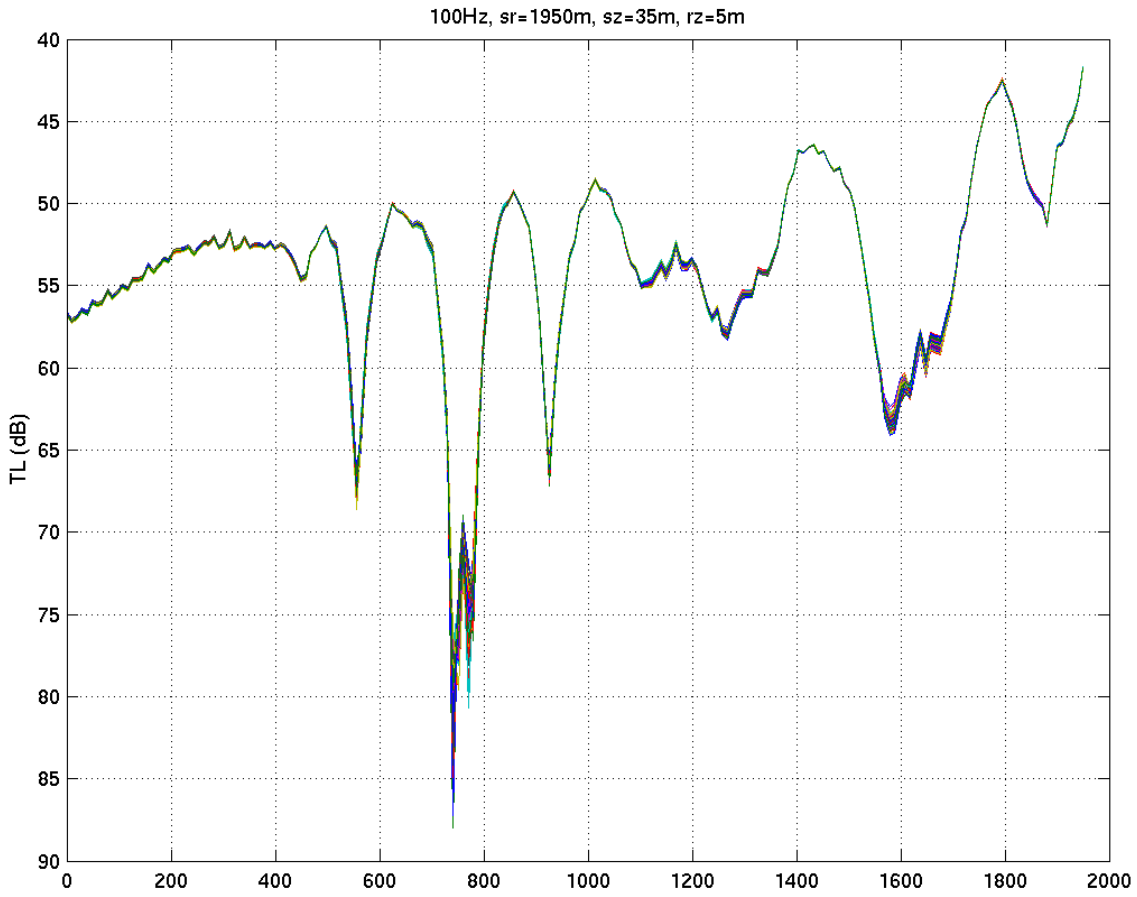


Figure 48: Afternoon 7/25/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat.

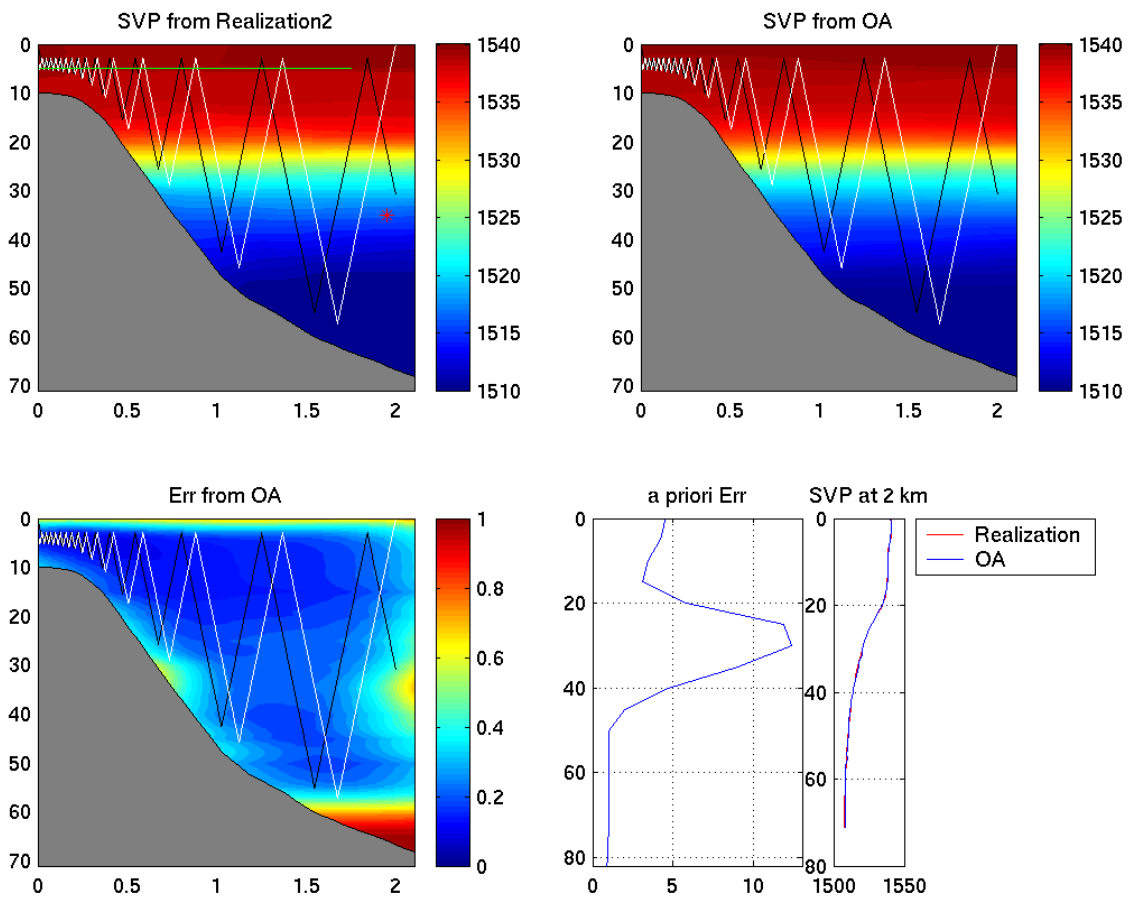


Figure 49: Yoyo control implementation. Morning 7/26/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat. Black line is the forward path; White line is the backward path. Note that to avoid bottom AUV turns around at 5 m above bottom.

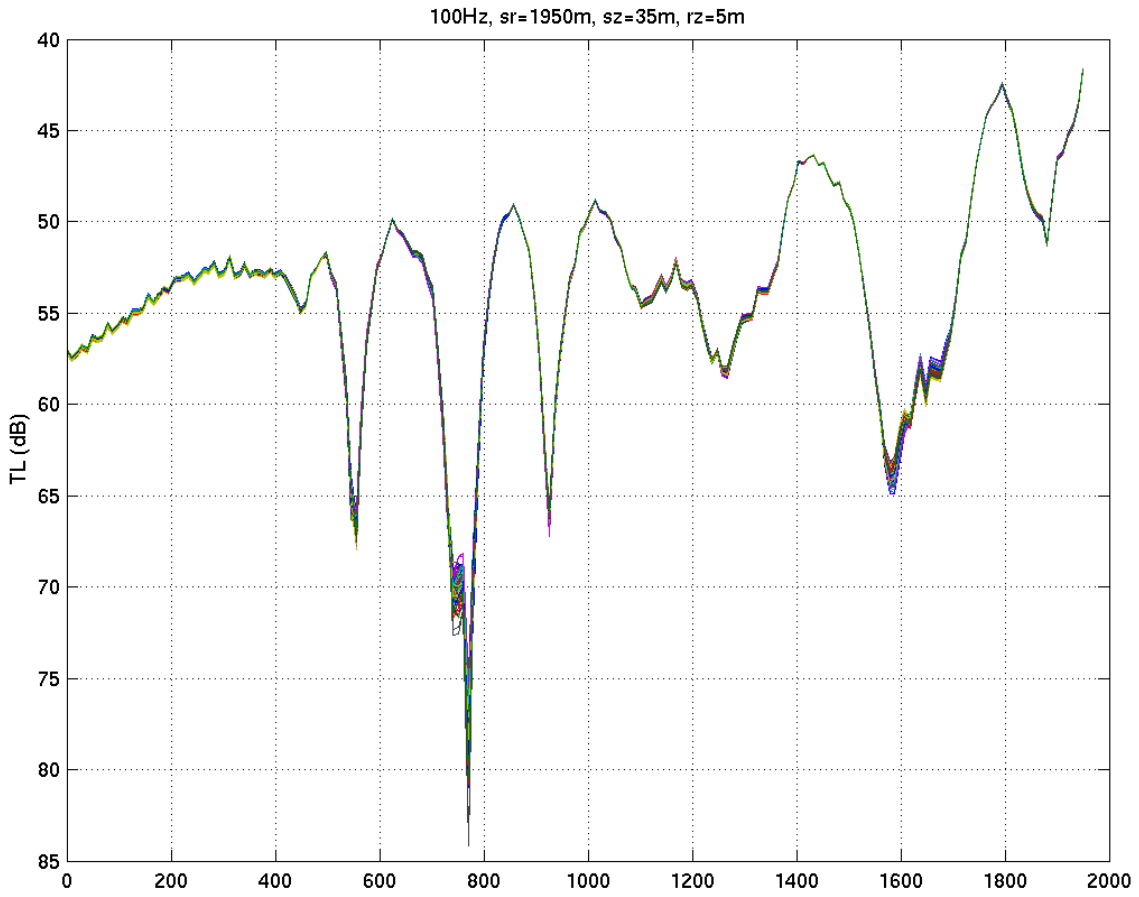


Figure 50: Morning 7/26/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat.

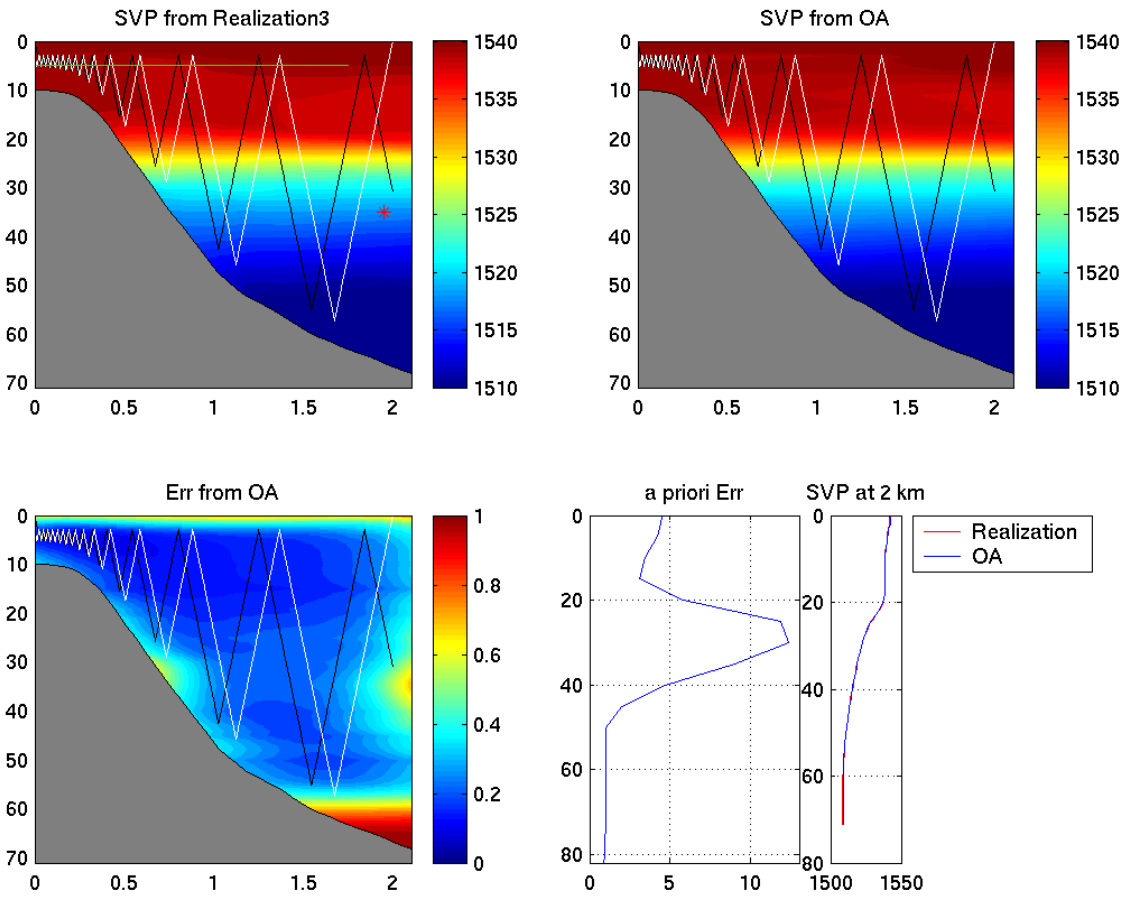


Figure 51: Yoyo control implementation. Afternoon 7/26/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat. Black line is the forward path; White line is the backward path. Note that to avoid bottom AUV turns around at 5 m above bottom.

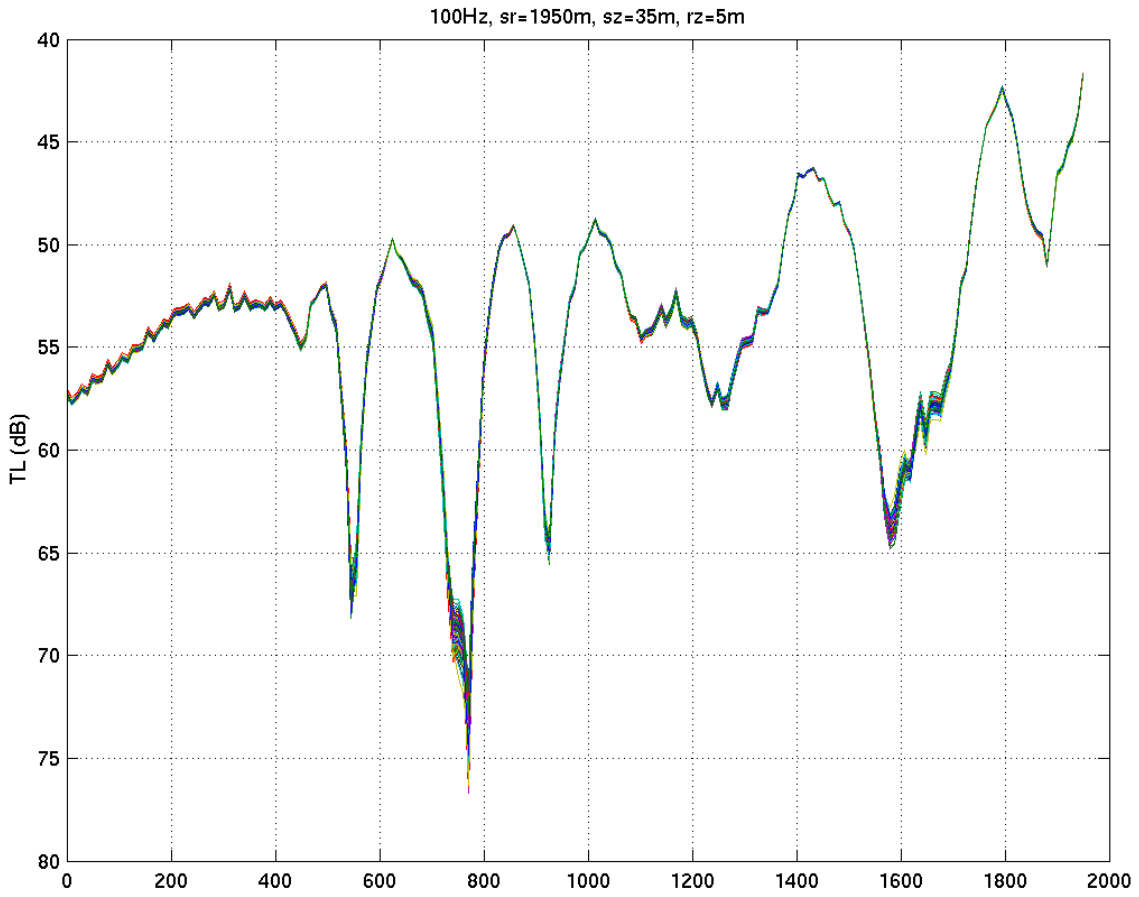


Figure 52: Afternoon 7/26/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat.

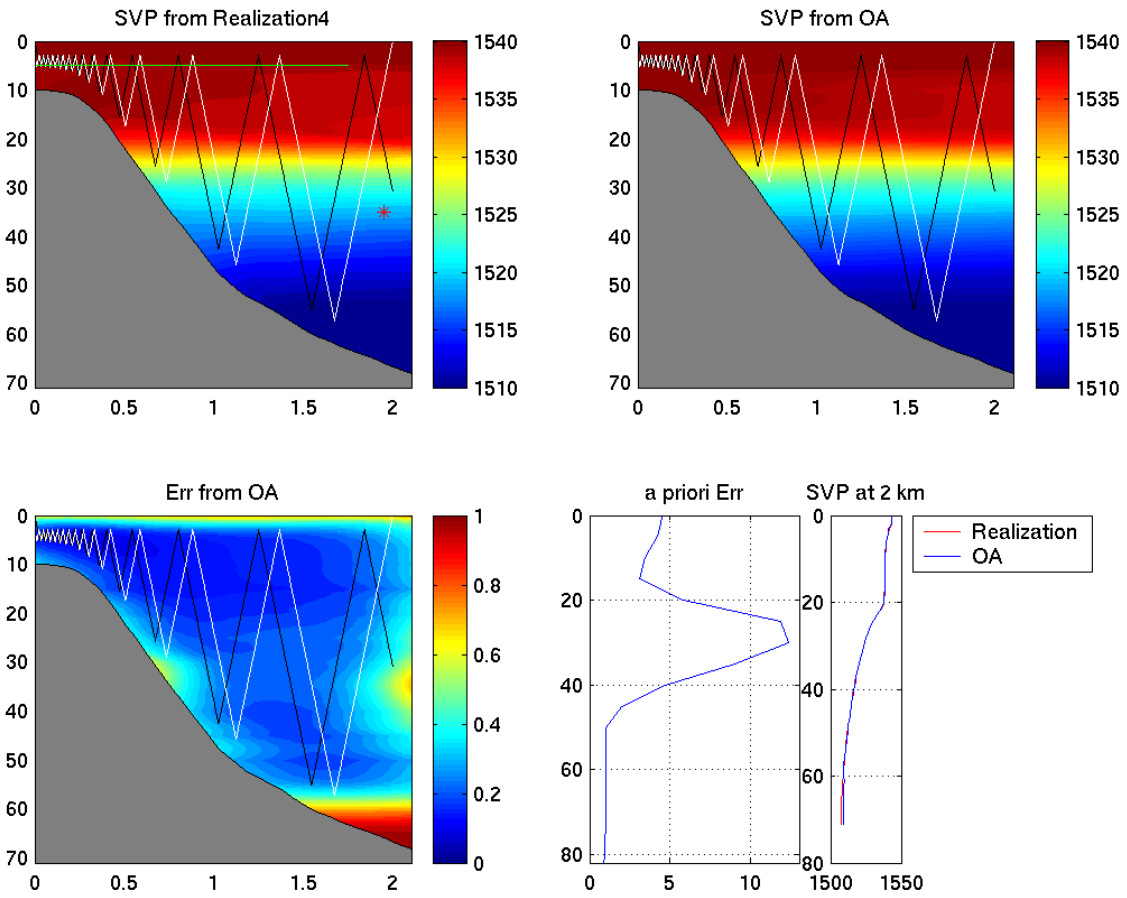


Figure 53: Yoyo control implementation. Morning 7/27/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat. Black line is the forward path; White line is the backward path. Note that to avoid bottom AUV turns around at 5 m above bottom.

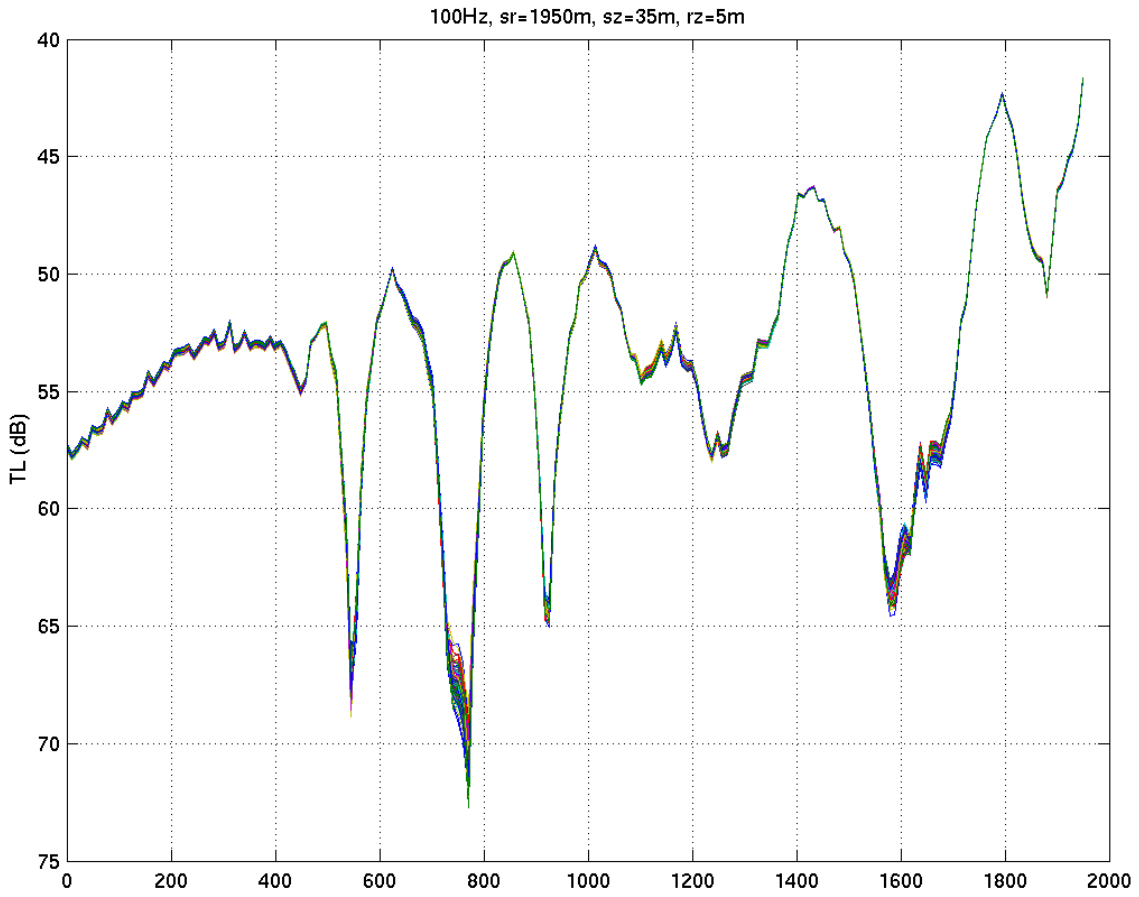


Figure 54: Morning 7/27/05. sound\_faf05\_jul26\_06\_day.5\_2\_sec1.mat.