



ATW0077 and ATW0083 APTAMER INFORMATION IL6 sandwich pair

ATW0077

Description:

- **Identifiers:** EALRN
- **Number of DNA nucleotides:** 32 bases
- **Target for selection:** Recombinant mouse interleukin 6, IL6 (BioLegend Cat# 575706)

Aptamer was proudly selected at Base Pair Biotechnologies from a randomized 32-mer DNA library against the target protein. Proprietary methods were then used to select the aptamer.

Aptamer folding instruction before use:

Once the aptamer is in its working concentration, it needs to be heated to 85-95 °C for 5 minutes, and then cooled to room temperature (~ 15 minutes) before use.

Validation data by Microscale Thermophoresis (MST) analysis:

- **Buffer used for validation:** 1X PBS, pH = 7.4, 1 mM MgCl₂, 0.05% Tween
- **Average K_d:** 7.4 ± 1.7 nM

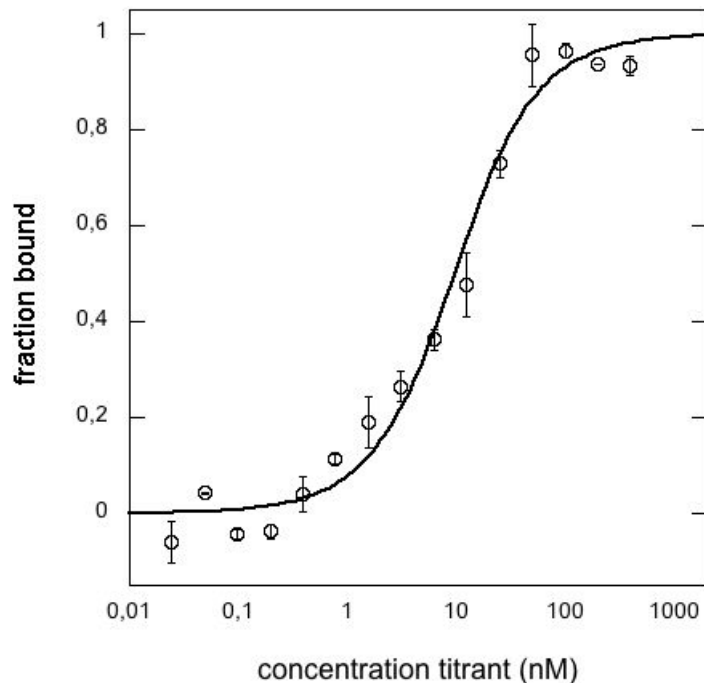


Figure 1. Aptamer-IL6 binding. The fraction of bound aptamer is plotted versus the titrated target aptamer concentration, R²=0.981.





ATW0083

Description:

- *Identifiers:* D95W1
- *Number of DNA nucleotides:* 32 bases

Aptamer was selected to form a sandwich pair with the EALRN-mouse recombinant interleukin 6 protein complex as shown in Figure 2.

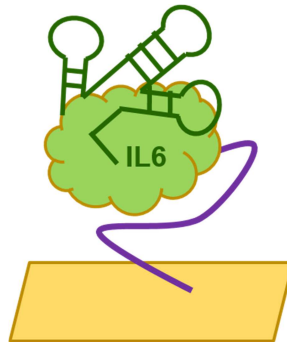


Figure 2. Sandwich assay. Aptamer D95W1 binds aptamer EALRN-mouse recombinant interleukin 6 protein complex.

Validation data by Microscale Thermophoresis (MST) analysis:

- *Buffer used for validation:* 1X PBS, pH = 7.4, 1 mM MgCl₂, 0.05% Tween
- *Average K_d:* 28.3 ± 5.0 nM

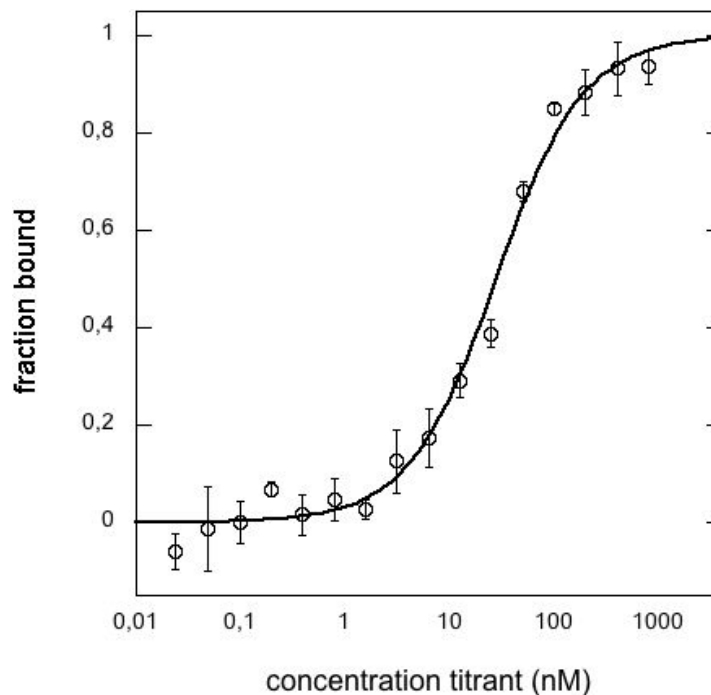


Figure 3. Aptamer-IL6 sandwich pair binding. The fraction of bound secondary aptamer is plotted versus the titrated target-IL6 aptamer concentration, R² = 0.985.

