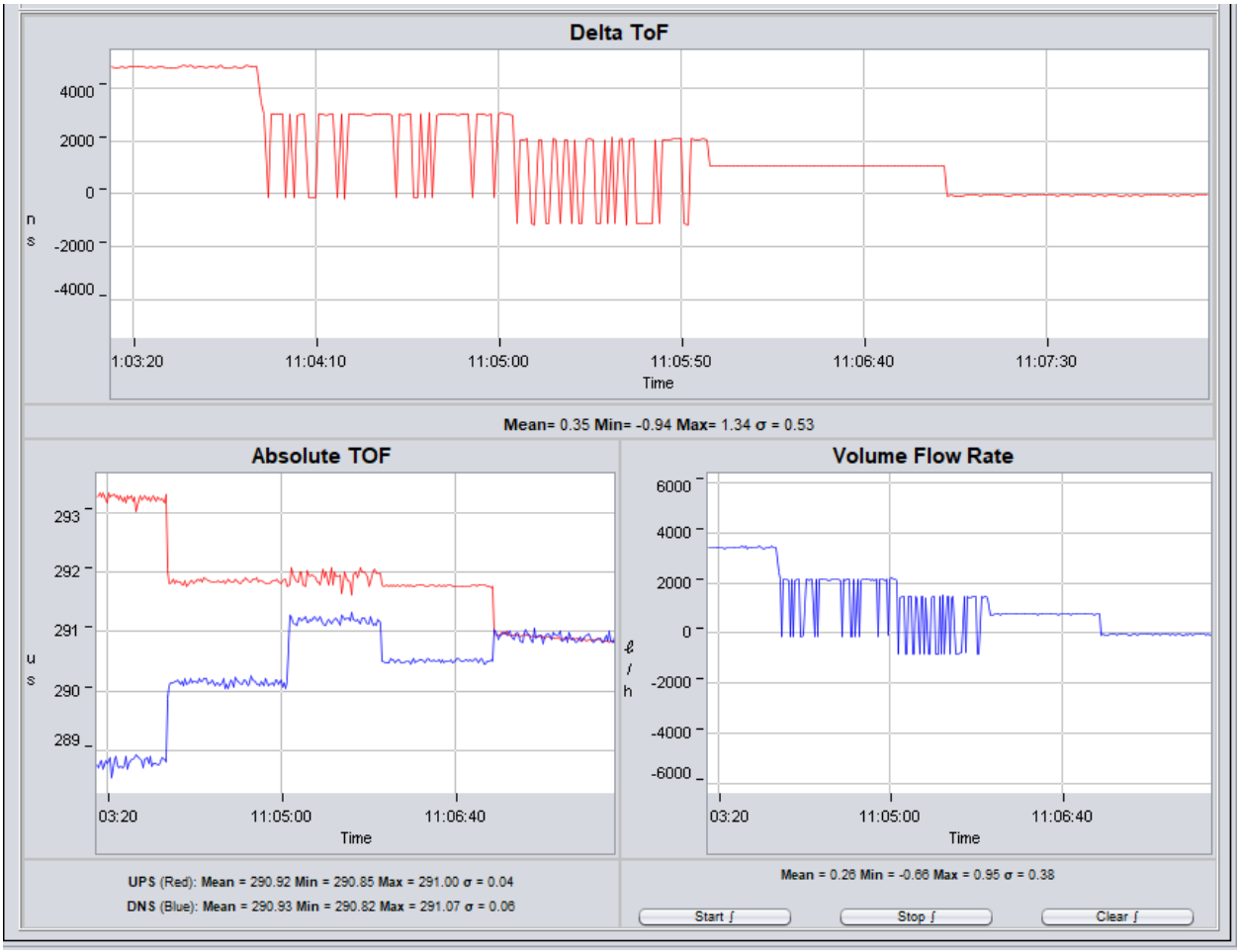
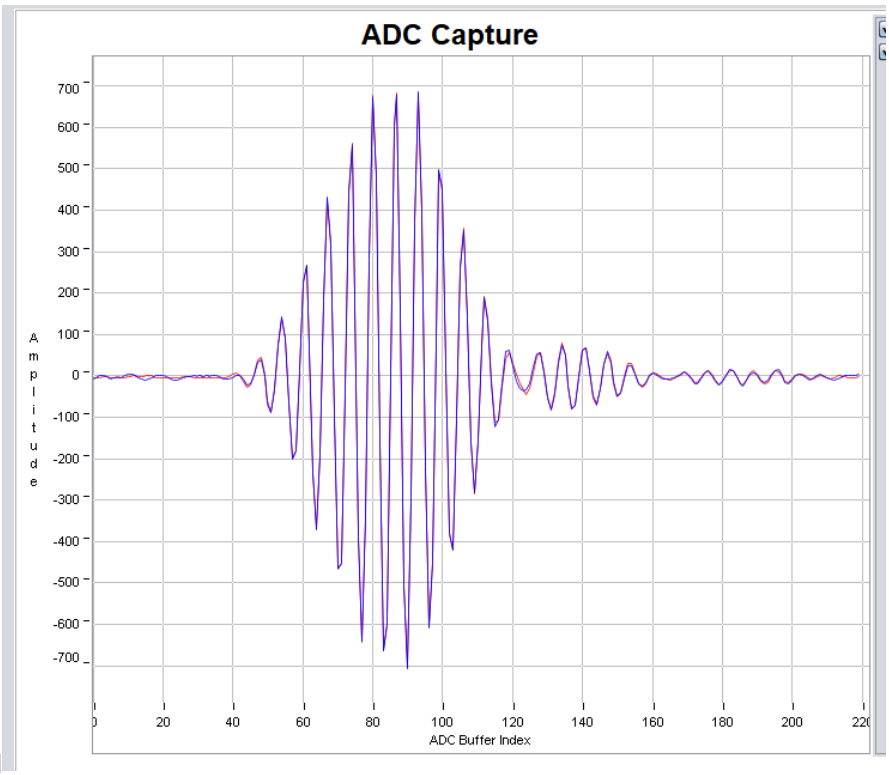
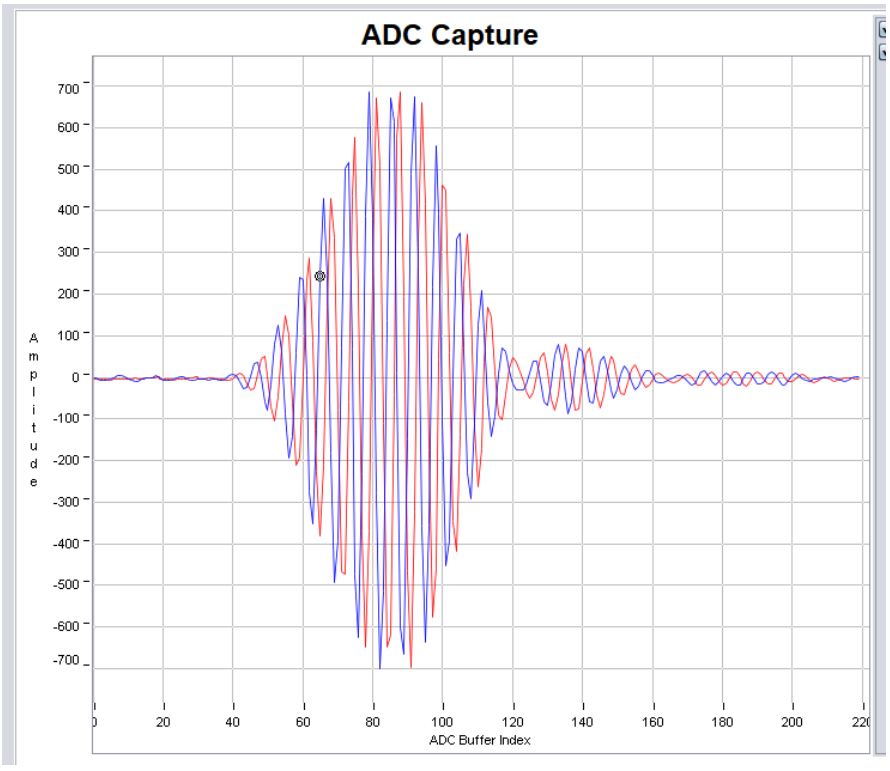
1 minute each at the following flow rates: 10, 6, 4, 2, 0 L/min



The fundamental frequency of this transducer is about 310 kHz, so the period is about 3.22us. The spikes we see in the Delta ToF chart are also very close to 3.2us, so it appears that the algorithm is getting out of phase by 1 period. Notice in the following ADC captures that the UPS and DNS are shifted by about 1 period. It appears that the algorithm is having trouble distinguishing 6 L/min from zero flow.

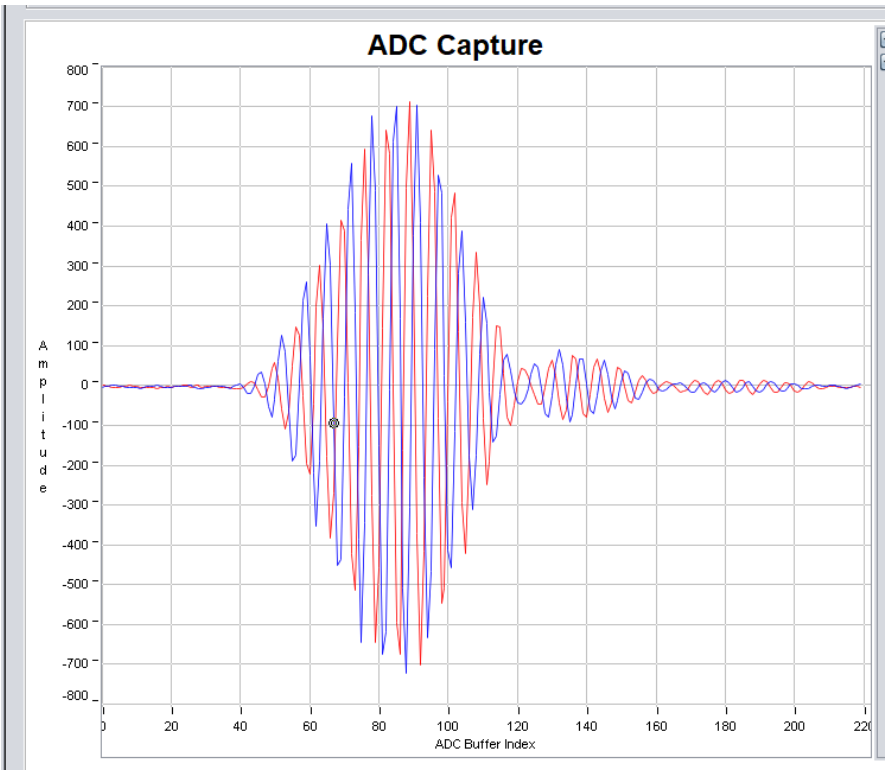

ADC Capture
Amplitude
ADC Buffer Index

0 LPM

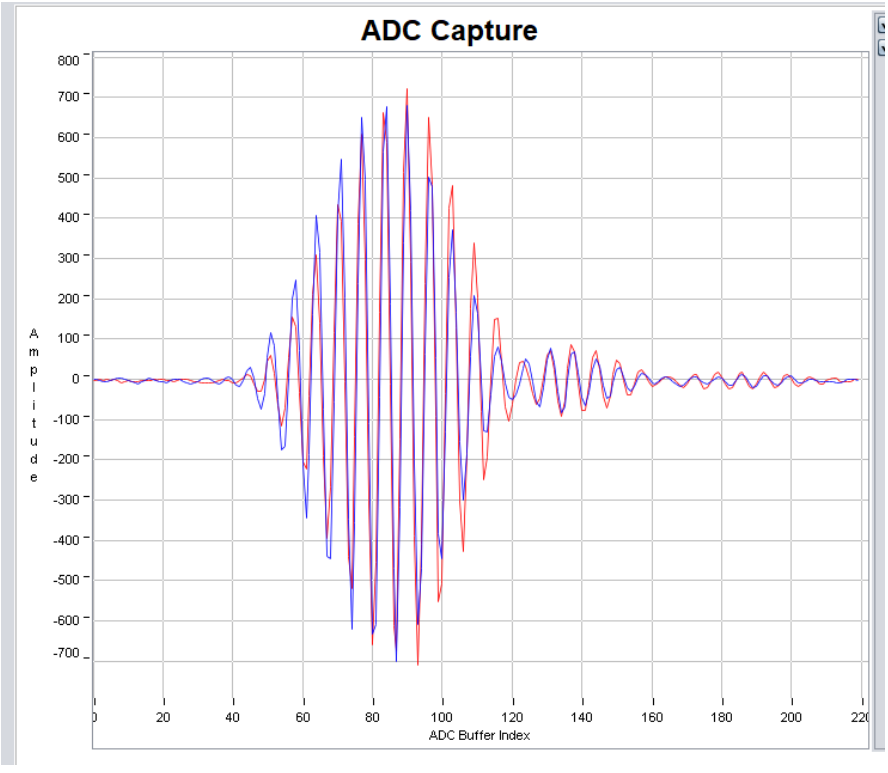

ADC Capture
Amplitude
ADC Buffer Index

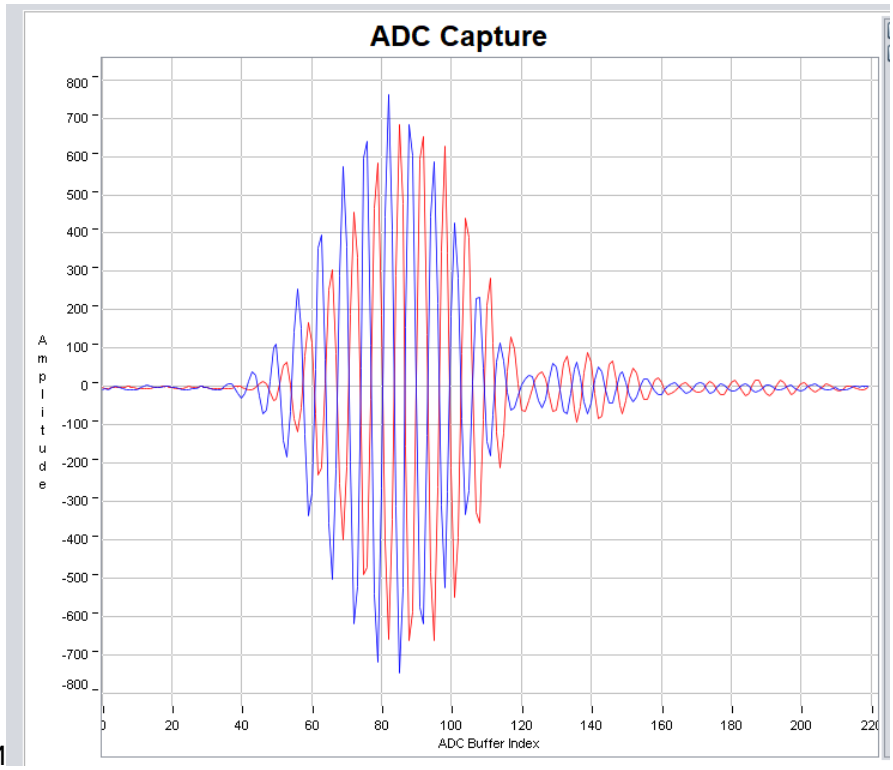
2 LPM

4lpm


ADC Capture
Amplitude
ADC Buffer Index

6LPM


ADC Capture
Amplitude
ADC Buffer Index

10LPM 

Depending on the frequency sweep and number of pulses we use, we can get different results, but they are not consistent from day to day.