# LabVIEW notes

Good guide to why we were getting buffer errors: [NI forums](http://forums.ni.com/t5/LabVIEW/DAQmx-Numerical-indicators-go-blank-intermittently-using-DAQmx/td-p/491213)

Need to pull at least 1000 samples but if there are more than, 1000, then pull them ALL!

Never run the loop with less than 1000 samples

Get rid of software wait

## Todo:

* 1000 samples or all available, remove delay  Durability Flow Quality
  + Does this fix null/zero data points? Flow Quality
* Disable auto error handling  Durability Flow Quality
* Update enable/record usability Flow Quality
  + For flow: add Clear button, make sure record is a toggle not a latch
* Typedef logic from quality  Durability Flow
* Reorder graphs  Durability Flow Quality
* Install DIAdem  Durability
* Install Office  Durability
* Add FH 0427 zero torque constant until we get datasheet  Durability Flow

## Long Term Todo

* Dataflow producer/consumer design?

Dynamic Data Write Order: Quality

0 Time

1 RMS Current

2 RMS V

3 RPM

4 Amplitude V

5 Torque

6 Elec Power

7 Mech Power

8 Motor Eff

9 Fail

10 Supply Current

11 Supply Power

12 Esc Eff

Graph Order

10, 4, 11, 12, 1, 2, 6, 8, 5, 3, 7

Dynamic Data Write Order: Durability 8

0 Time

1 RMS Current

2 RMS V

3 RPM

4 Amplitude V

5 Torque

6 Elec Power In

7 Mech Power Out

8 Motor Eff

9 Fail

10 Tank Temp (F)

11 Motor Temp (F)

Graph Order

4, 1, 2, 6, 8, 5, 3, 7, 10, 11