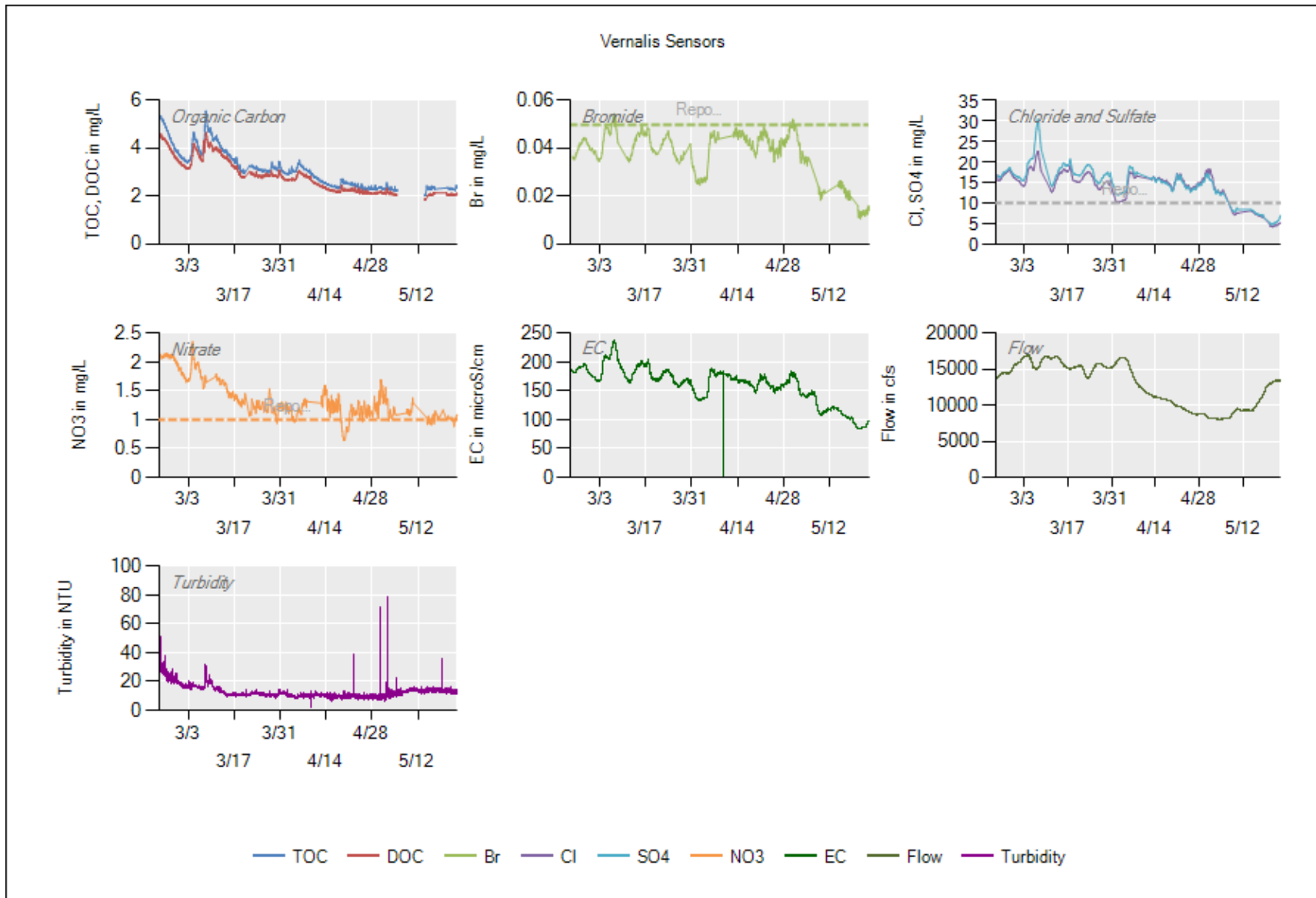
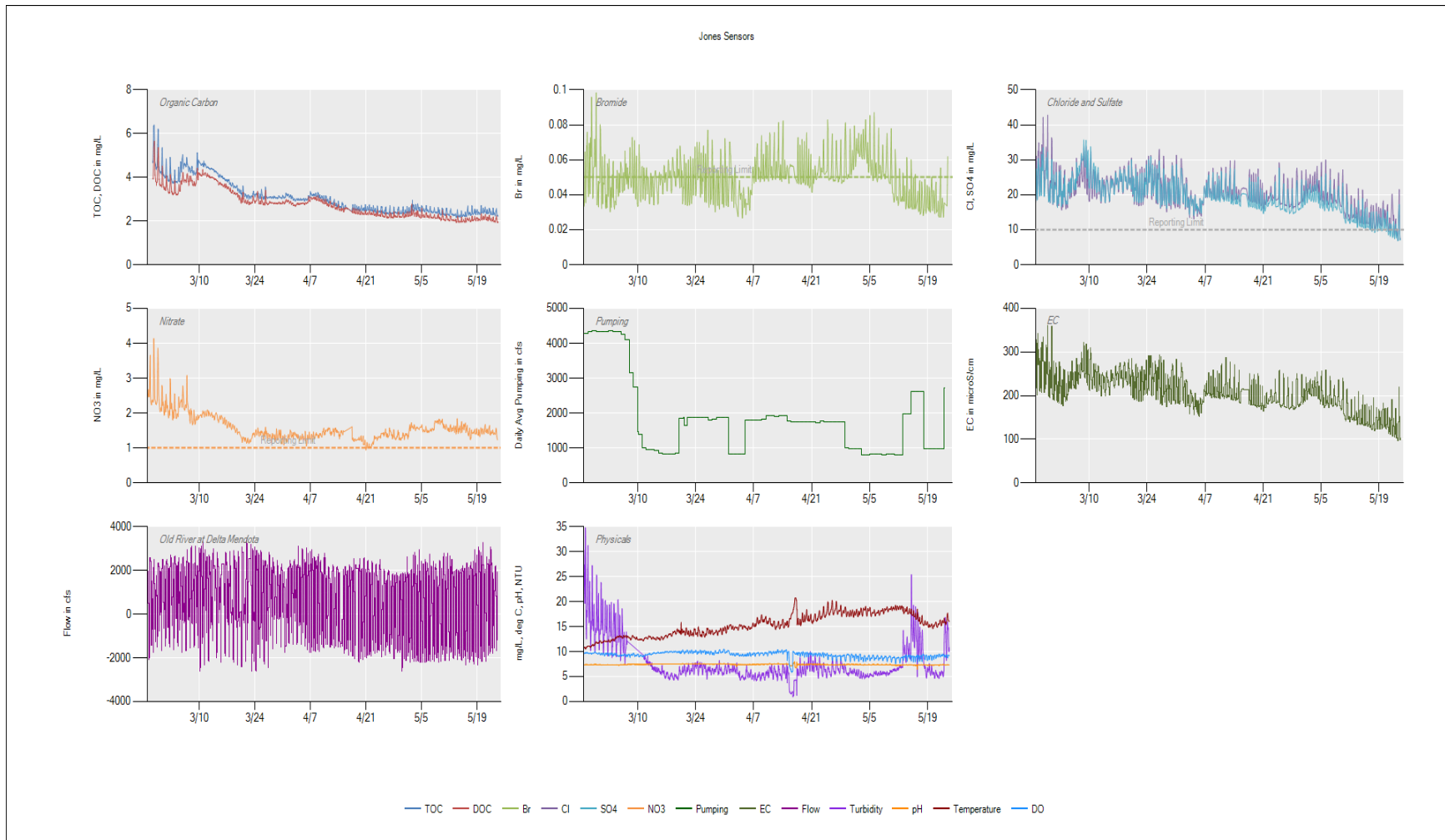


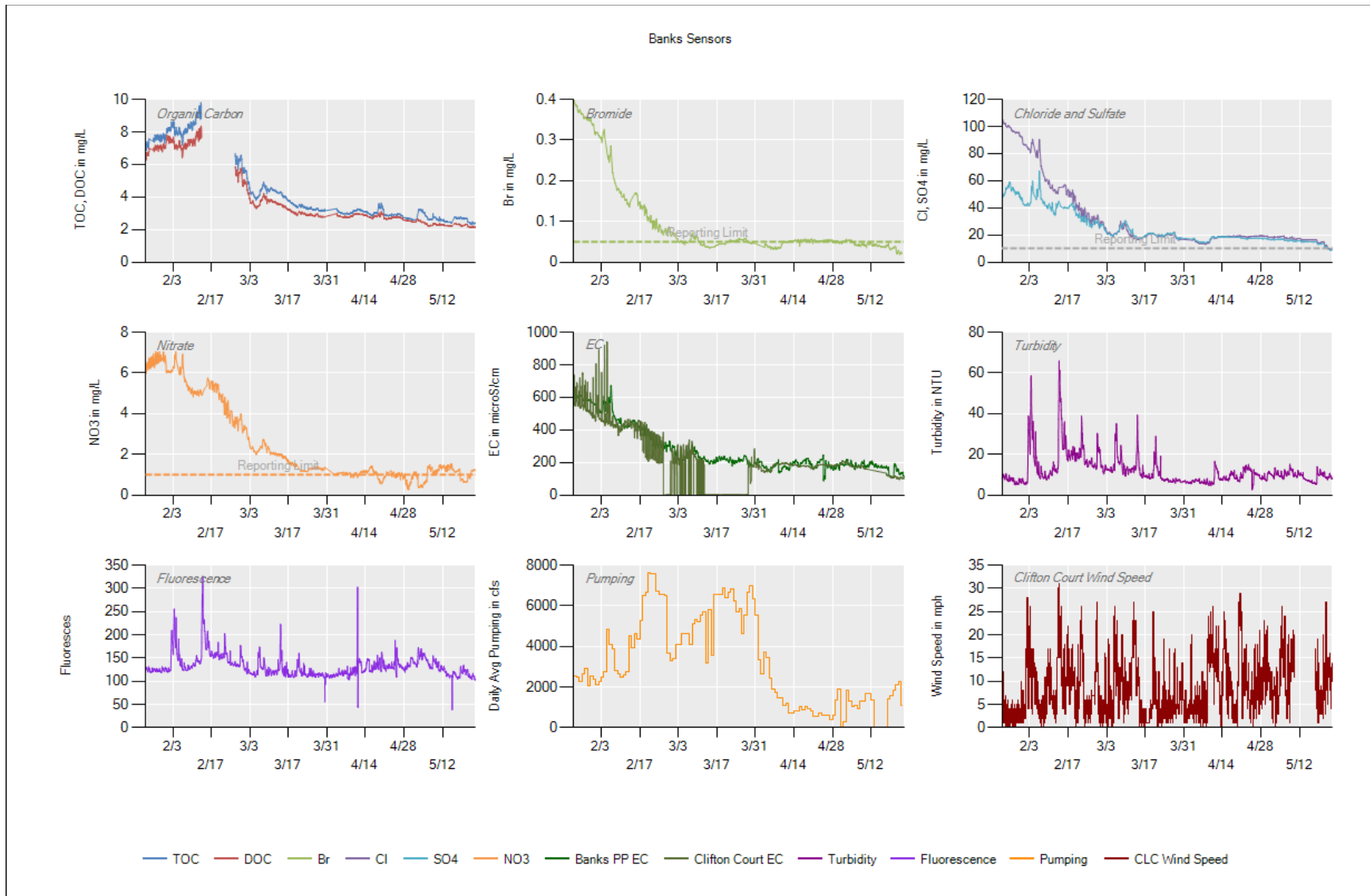
3/22: QC/Maintenance 4/2: Probable power outage, replaced all filters 4/17: All filters replaced 5/23: Carbon analyzer stopped operation. Re-started. No major incidents over the time-period. You can see that carbon followed flow and turbidity as is expected.



Outage Events: 3/20-21 = Pump motor failure. 4/8-12 = Anion analyzer memory full/data transfer. 5/5-8 = Power outage/modem outage. 5/10-14 = Power outage, organic carbon analyzer continued to operate. 5/17-20 = Pump tubing kinked as river stage/flow increased.

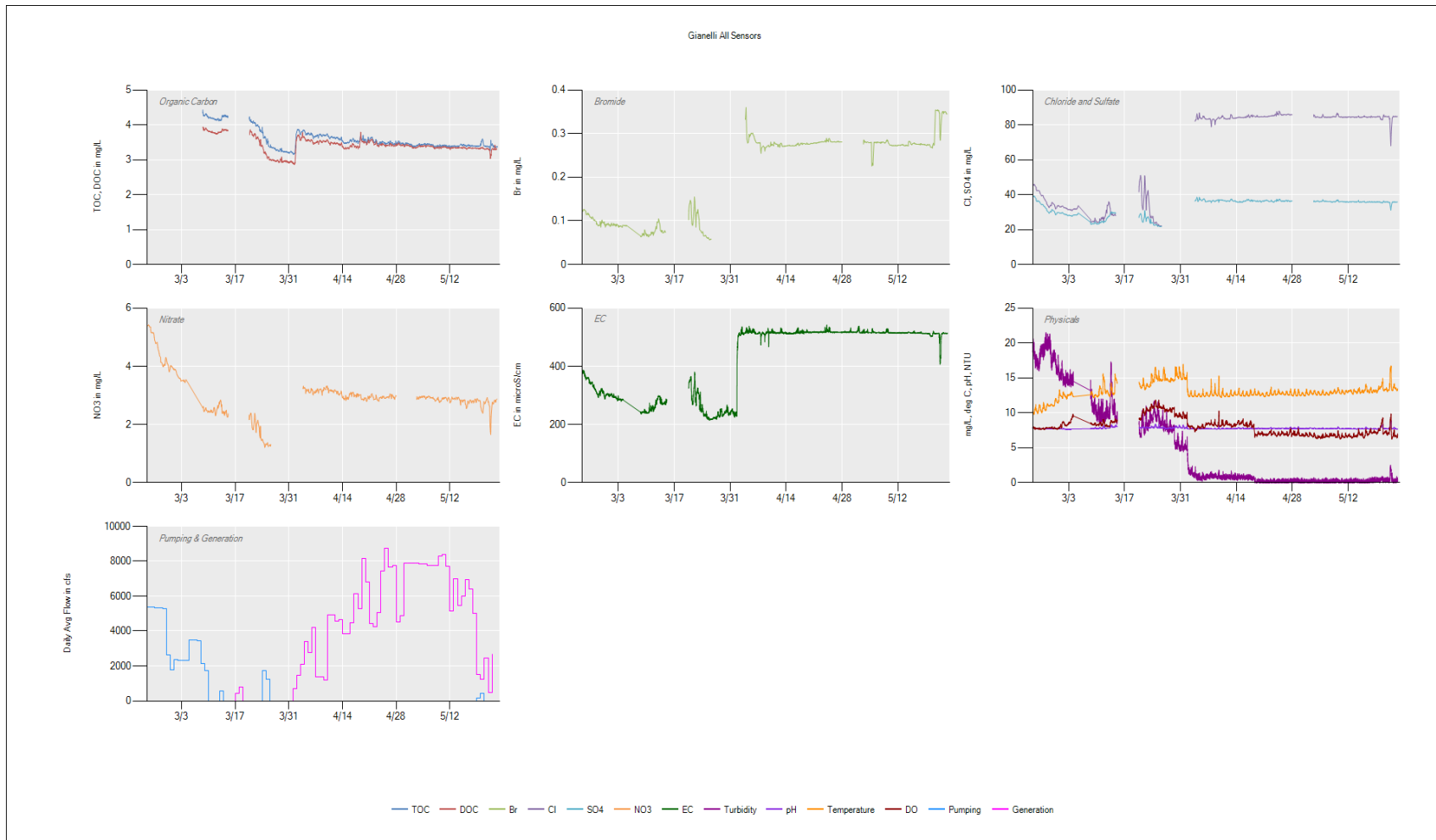


The station continues to operate without any complications. Organic carbon concentrations have decreased over the last three months and currently remains stable at 2.3 ppm. Bromide, chloride and sulfate concentrations remain near their reporting limits of 0.05 ppm and 10 ppm respectively. Nitrate levels have leveled out just above the reporting limit of 1.0 ppm. Pumping at the station has consistently remained low with brief periods of increased pumping around 2600 cfs. Physical parameters have remained steady aside from turbidity. High outflow and low pumping have caused lower OC, anion and physical levels and decreased variance.



Significant Events: January 24th, 2019 to May 24th, 2019

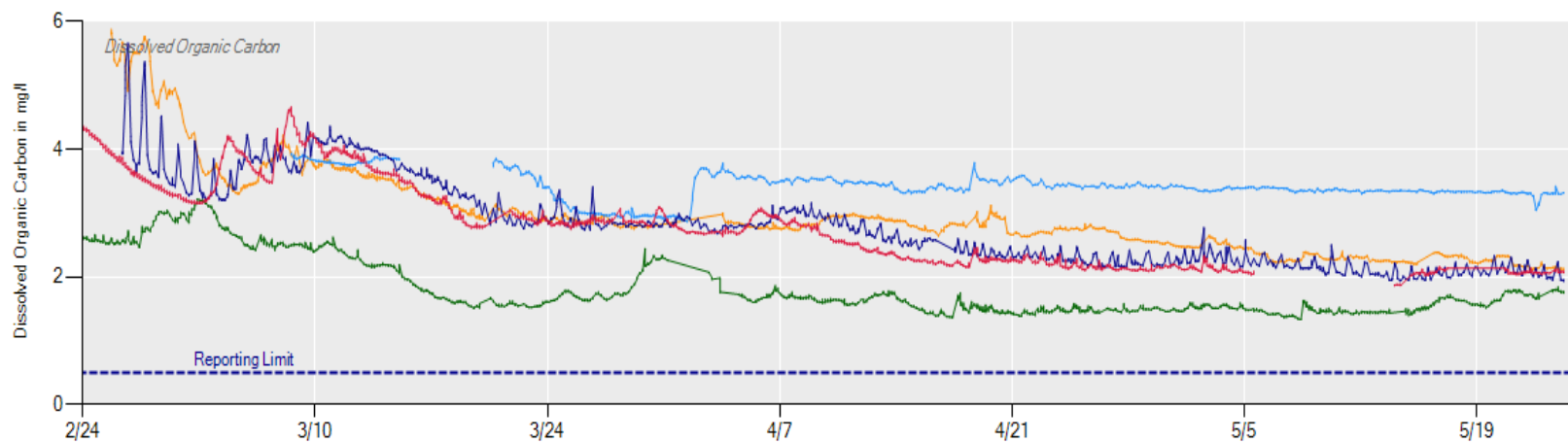
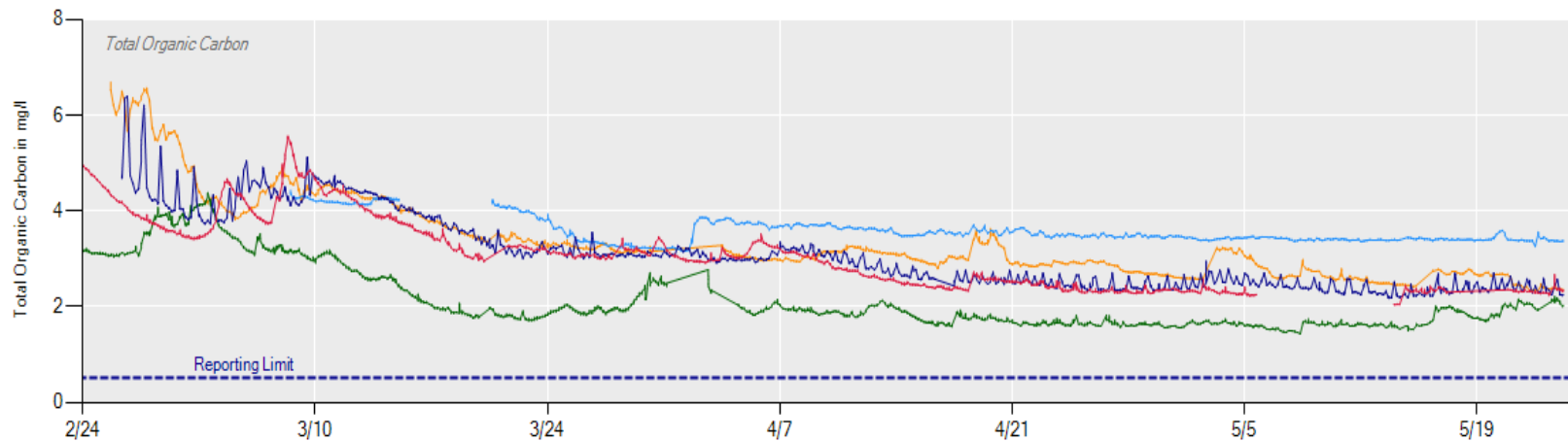
- 2/17 Sievers Yearly Maintenance.



- 1/23 – 3/8 -- The Sievers started reported questionable OC values. Repairs were done during the annual maintenance and the instrument is functioning correctly again.
- 3/5 – 3/8 -- The station pump went down and needed to be replaced.
- 3/15 – 3/20 -- The replacement pump went down and was replaced. The intake lines were cleared to relieve strain on the pump and the replacement was plugged into the battery backup for extra control and protection.
- 3/26 – 4/3 -- The Dionex suppressor was bad and needed to be replaced.
- 4/27 – 5/3 -- The Dionex column was faulty and needed to be replaced.

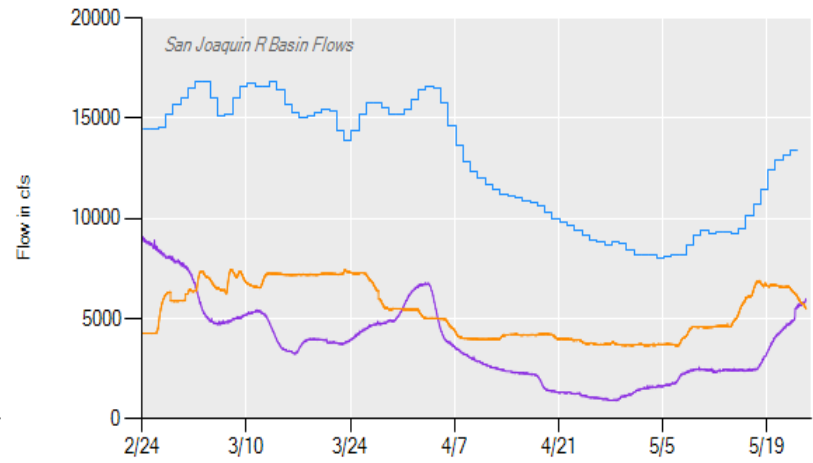
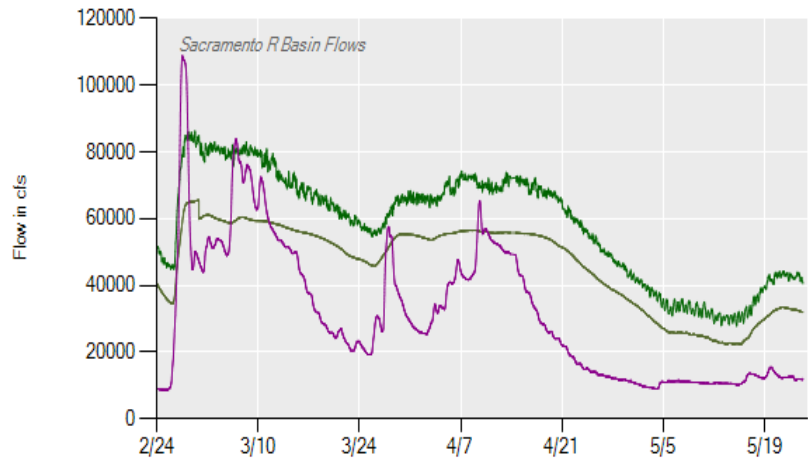
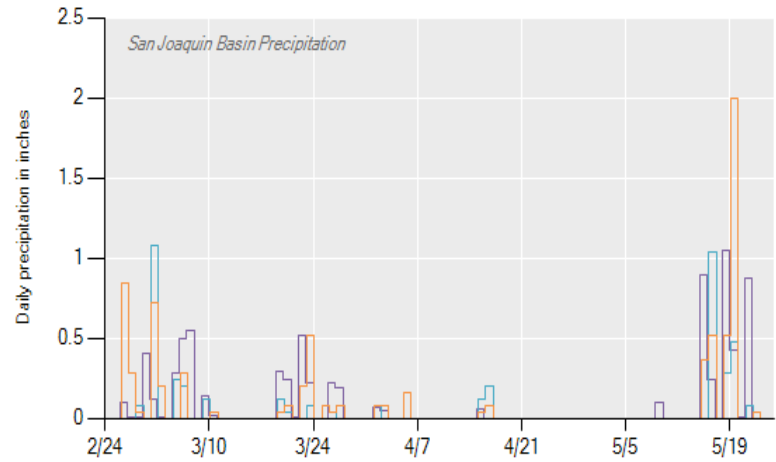
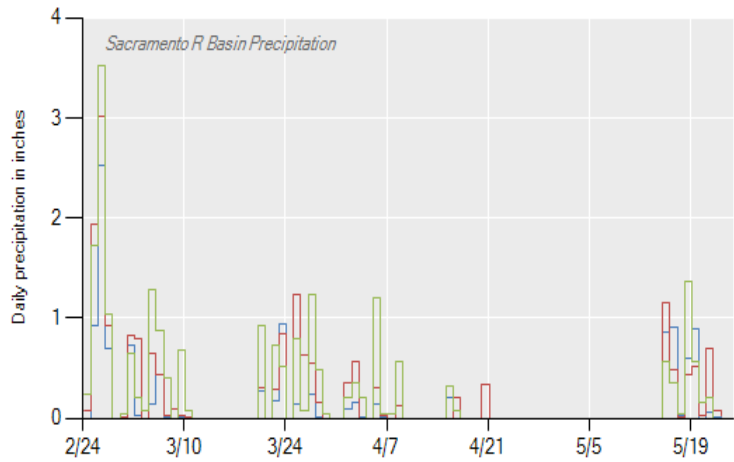


Organic Carbon Summary



Legend: Banks (orange), Gianelli (light blue), Hood (green), Jones (dark blue), Vernalis (red)

Precipitation & Flow



- CSU Sacramento
- Redding Fire Station
- Friant Dam
- Sac R at Freeport
- Sac R at Vina-Woodson Br
- Tuolumne R at Modesto
- SJR R at Vernalis
- Oroville Dam
- Exchequer Dam, Merced R.
- Stockton Fire Station
- Sac R at Verona
- SJR at Crows Landing
- Stanislaus R at Ripon