LABORATORY INSPECTION CHECKLIST

Yes	No	NA	
☐	☐	☐	Has the facility adopted a QA/QC program for its lab equipment and analytical procedures?
☐	☐	☐	Is the lab clean and organized overall?
☐	☐	☐	Does the lab have the most current copy of Standard Methods for the Examination of Water and Wastewater? (21st Edition, 2005)
☐	☐	☐	Does the lab have an adequate dish washing area?

If available, does the lab have the correct temperatures for following equipment:

Yes	No	NA	
☐	☐	☐	Total Suspended Solids drying oven [104°C ±1°C]
☐	☐	☐	Biochemical Oxygen Demand incubator [20°C ±1°C]
☐	☐	☐	Storage refrigerator [≤ 4°C]
☐	☐	☐	Muffle Furnace [550 °C]

Calibration, maintenance, and certification of equipment:

Yes	No	NA	
☐	☐	☐	Does the lab maintain logbooks for equipment?
☐	☐	☐	Does the logbook include recording calibrations, temperature verifications, routine maintenance, etc.?
☐	☐	☐	Is the balance verified with certified calibration weights and recorded prior to use?
☐	☐	☐	Are the temperatures verified and recorded daily during use?
☐	☐	☐	Are lab thermometers verified with a certified thermometer and results recorded?
☐	☐	☐	Are the flow meters and balances calibrated annually by a certified professional?

Calibration, maintenance, and certification of equipment:
(continued)

Yes	No	NA	
☐	☐	☐	Are all monitoring records kept for at least five years?
☐	☐	☐	Are thermometers located in the refrigerator stored in a sealed water filled flask?
☐	☐	☐	Are dissolved oxygen meters checked using the Winkler titration method and the results recorded?
☐	☐	☐	Are pH meters checked against a certified (known) standard and the results recorded?

Probe storage:

Yes	No	NA	
☐	☐	☐	Is the pH probe stored in either a pH 7 buffer or the manufacturer storage buffer?
☐	☐	☐	Is the Dissolved Oxygen (DO) probe stored in a sponge cap, or deionized (D.I.) water?

Chemicals storage:

Yes	No	NA	
☐	☐	☐	Are chemicals exposed to air?
☐	☐	☐	Are the chemicals labeled?
☐	☐	☐	Do the chemical containers have the receipt date and expiration date listed? Are they rotated according to manufacturer specs?
☐	☐	☐	Are the pH buffers freshly made?
☐	☐	☐	Are the pH buffers stored in a closed container?
☐	☐	☐	Is the water (D.I. or better) stored in a closed container?
☐	☐	☐	Does the lab maintain Material Safety Data Sheets (MSDS) for all chemicals stored onsite?

Bench sheets:

- **Total Suspended Solids (TSS) sheets**

Yes	No	NA	
☐	☐	☐	Are the pads washed and dried prior to measurement?
☐	☐	☐	Are the initial weights recorded?
☐	☐	☐	Is the weight measured, the weight of the pad plus the weight of the sample?
☐	☐	☐	Did the lab dry the pad again and perform a second weighing to verify that the pads are completely dry?
☐	☐	☐	Does the sheet include the dates and initials of staff who collected the samples and who performed the analysis?

- **Biochemical Oxygen Demand (BOD) sheets**

Yes	No	NA	
☐	☐	☐	Does the sheet include the initial D.O. measurements of water blanks and samples (multiple dilutions)?
☐	☐	☐	Was the drop in D.O. greater than 0.2 mg/L for the water blanks for final measurement?

Yes	No	NA	
☐	☐	☐	Do the samples adhere to the 2 & 1 rule, in which one dilution must give at least a 2 mg/L drop in D.O. and cannot go below 1 mg/L oxygen for final measurement?
☐	☐	☐	Is the final calculation corrected for sample size? For example, if the lab has a 1.0 mg/L drop in D.O. and they are using 250 mL BOD bottles, the staff must divide the 1.0 mg/L results by 0.250 L sample size. The final result of this example is a 4.0 mg/L drop.
☐	☐	☐	Does the sheet include the dates and initials of staff who collected the samples and who performed the analysis?