



Updated: March 6, 2017

When to Revise Local Limits

I get a lot of questions about when a POTW is required to should revise local limits. EPA has provided its thoughts in the 2004 Local Limits Guidance (Chapter 7). This re-evaluation must occur at least once per five years as part of the NPDES permit issuance process (see 40 CFR 122.44(j)(2)(ii) and on a continuing basis (40 CFR 403.5(c)(1)). 40 CFR Part 122.44(j)(2)(ii) is a reference to what NPDES permits require when applicable. This CFR section requires a POTW to provide a technical re-evaluation of the need to revise local limits as a permit condition. This is a compliance schedule in the permit. I always recommend that POTWs do a re-evaluation of their local limits as part of the permit application. This is to have a basis for requesting EPA/states remove the compliance schedule from the permit where the POTW local limits are still valid. The POTW should demonstrate that their current Maximum Allowable Headworks Loading (MAHL) and sometimes the Maximum Allowable Industrial Loading (MAIL) are still valid and not of the changed conditions below have been “triggered”.

The following triggers are the most common ones that POTWs use as a justification to revise local limits for one or more pollutants (or that EPA and states use to require updates):

1. Process changes and/or treatment changes at the POTW that could affect the removal efficiency for a pollutant.
2. Where sludge disposal methods have changed (e.g. land application to landfilling or vice versa), the POTW is required to re-evaluate local limits.
3. The measured pollutant loading being measured at the POTW headworks exceeds the MAHL that was calculated in the last local limits evaluation. This data should be reviewed in “real-time” and if a problem is identified, increase monitoring if less than once per month to characterize consistency of the MAHL exceedence. Local limits are not designed to regulate slug discharges. That is why EPA/states expect a POTW to enforce where a Slug Discharge occurs.
4. New industry moves in and the POTW has allocated more loading through IU permits than is available by the MAIL. This is easily evaluate by taking each SIU permit and calculating the lbs/day allowed for each pollutant:

$$\text{lbs/day} = \text{local limit(mg/L)} * \text{max flow (mgd) allowed by IU permit} * 8.345$$

Sum these lbs/day for all permitted IUs (typically, SIUs). Does the total exceed the approved MAIL? If yes, the MAIL may need to be re-calculated or the

POTW needs to use its authority to permit IUs by allocating mass (need this authority in your ordinance/rules).

5. The POTW is observing pollutants that exceed water quality standards or have the potential to violate applicable standards. This is common for organics where new industries start discharging to the POTW (e.g. landfills, CWTs, oil field maintenance, etc.).
6. There have been changes to a Water Quality Standard(s) or another applicable standard that may affect the local limit that had been previously calculated.
7. A new NPDES permit limit, Total Maximum Discharge Limit (TMDL) wasteload allocation has been adopted for your receiving water and incorporated into your NPDES permit.
8. Significantly higher POTW influent flows (dry weather) due to changes in the residential or industrial (including commercial) users. There have been times where significantly lower POTW flows have happened due to drought and water conservation efforts. Some POTWs use those flows as a trigger (but this could require another change when flows go back up).
9. If the POTW violates a NPDES permit, including Whole Effluent Toxicity, and the violations are caused or contributed to by industrial users, including commercial users, the POTW would likely be required to develop a local limit or re-evaluate an existing local limit, as applicable.
10. You cannot find any supporting data from the previous local limits evaluation, new data invalidates the previous assumptions in the calculation or you realize that the local limits are not technically-based due to error. Typically, this is because they are really old.

Your state or EPA region may have other triggers, but these are the most common.