

Startup, Shutdown and Malfunction Plans Using the SSMP to Your Advantage

Owners and operators of most MACT sources are required to write and follow a Startup, Shutdown and Malfunction Plan (SSMP). The SSMP must ensure that emissions are minimized during startup, shutdown, and malfunction events and that the owner or operator is adequately prepared to correct malfunctions as soon as practicable.

When properly prepared, these plans can actually be advantageous for owners and operators, as well as fulfilling the regulatory requirement. Here are some of the top reasons for investing extra effort into preparing your SSMP.

Top 5 Reasons you want your SSMP to be accurate and comprehensive:

5. It will help fulfill the general duty to minimize emissions at all times (40 CFR §63.6(e)(1)(i))
4. By anticipating startup, shutdown and malfunction response options, the owner or operator can:
 - Maximize operational flexibility under the plan for startups, shutdowns and malfunctions
 - Reduce the need to take actions that are inconsistent with the plan and that must then be reported to EPA within 2 working days
 - Reduce the need to update the plan and maintain copies of revisions for 5 years
3. A thorough SSMP may help support arguments that will satisfy the owner or operator's burden of proof for an affirmative defense for a malfunction*
2. Improved planning for malfunctions will minimize the time required to take corrective action and get the facility back online
1. By anticipating equipment malfunctions and establishing appropriate preventive maintenance programs, the owner or operator can:
 - Minimize the chance of malfunctions occurring in the first place and
 - Help prevent unplanned shutdowns

More details regarding the SSMP requirements are provided on the following page. For assistance with preparing or revising SSMPs, please contact Waid and Associates at any of the locations shown below.

*The SSMP may help meet the burden of proof for some of the criteria required for an affirmative defense, such as the requirement to demonstrate that, to the maximum extent practicable, the air pollution control equipment or processes were maintained and operated in a manner consistent with good practice for minimizing emissions. However, any activity which could have been foreseen and avoided, or could have been planned, will not be considered as sudden and unavoidable and an affirmative defense will not be allowed for such an activity.

Startup, Shutdown and Malfunction Plan Fundamentals

Who needs an SSMP and when do they need it? Owners and operators of most MACT sources must develop and implement a written SSMP by the compliance date.

What must the SSMP include? The plan must include detailed procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction, and a program of corrective action for malfunctioning process, air pollution control, and monitoring equipment used to comply with the MACT.

Why is an SSMP required? The SSMP is required to fulfill the general duty to minimize emissions at all times, including startup, shutdown, and malfunction, in a manner consistent with safety and good air pollution control practices.

What are the requirements for implementing the SSMP?

- Follow the plan during periods of startup, shutdown and malfunction
- If actions are consistent with the plan, make a record and description of the event
- If actions are not consistent with the plan and the source exceeds any applicable emission limit in the relevant MACT
 - Record the actions taken
 - Report by phone or fax within 2 working days after commencing actions
 - Submit a follow-up letter within 7 working days after the end of the event
- If the plan fails to address or inadequately addresses a malfunction
 - Revise the plan within 45 days (keep previous plans for 5 years)
 - If revisions alter the scope of activities deemed to be startup, shutdown or malfunction, or modify the applicability of any emission limit, work practice requirement, or other MACT requirement, the revisions must be submitted
 - Other revisions may be made without prior approval, unless the permitting authority provides otherwise
 - Include plan revisions and records for each SSM event in the next semiannual SSM report
- Tip: Some MACT rules modify these general recordkeeping and reporting rules.

What methods can help ensure that the plan is accurate and comprehensive?

- Begin with a complete understanding of the applicable rules
- Take into account the extent to which the applicable MACT rule supersedes or modifies the general SSMP provisions
- Develop a detailed list of all equipment that must be included in the plan
 - Tip: Some equipment subject to the MACT may not have to be in the SSMP
- Involve operating personnel in the development of the plan
- Consider using standard operating procedures (SOP), OSHA plans, or other site plans in the SSMP if they are not confidential and can be shared with the public
- Do not use or reference confidential SOPs and plans in the SSMP, or clearly designate confidential business material in any SSMP submittals to authorities.

EPA MACT standards web site: <http://www.epa.gov/ttn/atw/mactfnl.html>