

Guidance for 30 TAC, Chapter 101, Opacity Reporting and Demonstration Reviews

This is an addition to the September 26, 2003, document of guidance which should be used to provide assistance for the electronic reporting of opacity events with unauthorized air contaminants and for opacity only events. This document provides additional guidance for the reporting of opacity events in Subsection 101.201 and Subsection 101.211, and the evaluation of these event reports under the demonstration criteria in Subsection 101.222.

Opacity Reporting and Demonstration Reviews Resulting from Non-SMSS Events

Example 1A: Emission Event – Opacity above a regulatory limit with unauthorized air contaminants above a reportable quantity (RQ)

Opacity above a regulatory limit is not subject to reporting under Subsection 101.201(a)(2)(H) and is not evaluated under the demonstration criteria in Subsection 101.222. The unauthorized air contaminants above the RQ are subject to reporting in the initial notification according to Subsection 101.201(a)(2). Evaluate the final report for this emissions event according to the demonstration criteria in Subsections 101.222(a) and (b) for the air contaminants emitted.

Example 2A: Emission Event - Opacity \geq 15% above a regulatory limit with unauthorized air contaminants below an RQ

The opacity is reported in an initial notification according to Subsection 101.201(e). A final report is not required for reports under Subsection 101.201(e). Evaluate the opacity portion of this event according to the demonstration criteria in Subsection 101.222(d).

The unauthorized air contaminants below an RQ are separately recordable as an emissions event. A final record for the air contaminants is created within two weeks after the end of the emissions event according to Subsection 101.201(b). The final record created for this emissions event is kept on-site. Evaluate the air contaminants in the final record according to the demonstration criteria in Subsections 101.222(a) & (b).

Example 3A: Excess Opacity Event - Opacity \geq 15% above a regulatory limit with no unauthorized air contaminants

Excess opacity is reported in an initial notification according to Subsection 101.201(e). A final report is not required. Evaluate these opacity only events according to the demonstration criteria in Subsection 101.222(d).

Example 4A: Emissions Event – Opacity \geq 15% above a regulatory limit for boilers and combustion turbines

Opacity is reported according to Subsection 101.201(a)(3). Air contaminants from emission events involving boilers and combustion turbines are not required to be reported in the initial notification or the final report [101.201(b)(8)]. Evaluate the final report according to the demonstration criteria in Subsections 101.222 (a) & (b).

Opacity Reporting and Demonstration Reviews from Scheduled Maintenance Startup & Shutdown (SMSS) Activities that Become Emissions Events

Scheduled maintenance, startup, and shutdown activities reported in a prior notification according to Subchapter 101.211(a) that exceed the estimates for opacity and unauthorized air contaminants become emissions events. Emissions events resulting from SMSS activities are reported according to Subchapter 101.201(a)(2).

Example 1B: Emission Event - Actual opacity exceeding the opacity estimate in a prior notification with unauthorized air contaminants above an RQ

Since this is an emission event, as stated in 101.211(a), the opacity is "applicable" and reported according to Subsection 101.201(a)(2)(H) along with the air contaminants. Evaluate the final report according to the demonstration criteria in Subsection 101.222 (a) & (b).

Example 2B: Emission Event - Actual opacity exceeding: the opacity estimate in a prior notification with unauthorized air contaminants below an RQ

Since this is an emission event as stated in 101.211(a), the opacity is "applicable" and reported according to Subsection 101.201(a)(2) along with the air contaminants. Evaluate the final report according to the demonstration criteria in Subsection 101.222(a) & (b).

Example 3B: Emissions Event - Actual opacity exceeding the opacity estimate in a prior notification without unauthorized air contaminants

Since this is an emission event as stated in 101.211(a), the opacity is "applicable" and reported according to Subsection 101.201(a)(2). Evaluate the final report according to the demonstration criteria in Subsection 101.222(a) & (b).

Example 4B: Emissions Event - Actual opacity exceeding the opacity estimate in a prior notification for boilers and combustion turbines

Actual opacity exceeding the opacity estimate for boilers and combustion turbines during SMSS activities is reported according to Subsection 101.201(a)(3). Air contaminants from emission events involving boilers and combustion turbines are not required to be reported in the initial notification or the final report [101.201(b)(8)]. Evaluate the final report according to the demonstration criteria in Subsections 101.222(a) & (b).

Opacity Reporting and Demonstration Reviews from Scheduled Maintenance Startup & Shutdown (SMSS) Activities That Do Not Become Emissions Events

Examples 5B - 8B are scheduled maintenance, startup, and shutdown activities that do not require prior notification.

Example 5B: SMSS Activity - Actual opacity greater than a limit established in a permit authorization, but less than 15% above the permit authorized limit with unauthorized air contaminants below an RQ

A prior SMSS notification is not required, since opacity and unauthorized air contaminant estimates are below 15% and any RQ, respectively. A final record is required to be created and kept on site according to 101.211(b). Evaluate the final record according to the demonstration criteria in Subsection 101.222(c). Emissions from this SMSS activity must be permitted, if the nine criteria in 101.222(c) cannot be met.

Example 6B: SMSS Activity - Actual opacity greater than a limit established in a permit authorization, but less than 15% above the permit authorized limit, with no unauthorized air contaminants (see 7B & 8B for boilers and combustion turbines)

A prior SMSS notification is not required. A final record is not required to be created according to 101.211(b), since there are no unauthorized air contaminants. When discovered, evaluate this SMSS activity according to the demonstration criteria in Subsection 101.222(e). If the nine demonstration criteria in Subsection 101.222(e) cannot be met, then evaluate this activity according to the opacity requirements in Subchapter 111.111(a).

Note: It would seem this example could be evaluated according to the demonstration criteria in Subsection 101.222(d), because of the statement "...other opacity events...". However, Subsection 101.222(d) is used exclusively to evaluate excess opacity events only ($\geq 15\%$) as defined in 101.201(e) that do not originate from SMSS activities.

Example 7B: SMSS Activity - Actual opacity greater than a limit established in a permit authorization for boilers and combustion turbines; opacity less than the 15% RQ for boilers and combustion turbines; and no unauthorized air contaminants reported

A prior SMSS notification is not required. A final record of emissions is required to be created according to 101.211(b). Evaluate the final record according to the demonstration criteria in Subsection 101.222(e). If the demonstration criteria in Subsection 101.222(e) cannot be met, then this SMSS activity is subject to the requirements of Subchapter 111.111(a).

Example 8B: SMSS Activity - Actual opacity greater than a limit established in a permit authorization for boilers and combustion turbines; opacity less than the 15% RQ for boilers and combustion turbines; and unauthorized air contaminants reported below an RQ

A prior SMSS notification is not required. A final record is required to be created for the unauthorized air contaminants below an RQ. Evaluate the final record according to the demonstration criteria in Subsection 101.222(c).