

**CHAPTER 7019**  
**MINNESOTA POLLUTION CONTROL AGENCY**  
**AIR QUALITY DIVISION**  
**EMISSION INVENTORY REQUIREMENTS**

7019 3010 CALCULATION OF ACTUAL  
EMISSIONS FOR EMISSION  
INVENTORY

**7019.3010 CALCULATION OF ACTUAL EMISSIONS FOR EMISSION INVENTORY.**

Subpart 1. **Method.**

A Except as provided in item B, all calculations of actual emissions required under part 7019 3000 shall be based on the operating data supplied in the emission inventory, multiplied by an emission factor. The emission factor used in this calculation shall be an EPA emission factor or, where no EPA emission factor is available, an emission factor generated by the agency. An emission factor generated by the agency shall be calculated using engineering methods consistent with the methods used by the EPA to calculate EPA emission factors. Control equipment efficiency shall be based on the average of the range of EPA efficiency factors or shall be based on the efficiency verified by a performance test conducted according to parts 7017 2001 to 7017 2060, provided the performance test took place in the year for which emissions are being calculated.

*[For text of item B, see M R ]*

*[For text of subp 2, see M.R.]*

Subp 3 **Stack test data.** Emission factors from stack tests may be used for the calculation of emissions, provided that the following conditions are met:

A all the requirements of parts 7017 2001 to 7017 2060, all other applicable state and federal laws, and all applicable air emission permit conditions relating to stack testing have been complied with, and

*[For text of item B, see M R ]*

Subp 4 **Volatile organic compound (VOC) material balance.** A material balance method may be used to calculate VOC emissions. A person using material balance to calculate VOC emissions shall determine the total VOC emissions (E) as follows:

$$E = (a - b - c) * (1 - d)$$

where,

a = the amount of VOC entering the process. A signed statement from the supplier or the material safety data sheet must be submitted stating the maximum amount of VOC in any material that was used in the process.

b = the amount of VOC incorporated permanently into the product. This includes VOC's chemically transformed in production. It does not include latent VOC remaining in the product that will at some time be released to the atmosphere. An explanation of this calculation must also be submitted.

c = the amount of VOC, if any, leaving the process as waste, or otherwise not incorporated into the product and not emitted to the air.

d = the overall efficiency, or the product of capture efficiency and control efficiency, of any device used to capture and/or control VOC emissions, expressed as a decimal fraction of 1.00. This overall efficiency shall be based on the average of the range of EPA efficiency factors, or shall be based on the overall efficiency verified by a performance test conducted according to parts 7017 2001 to 7017 2060, provided that the performance test took place in the year for which emissions are being calculated.

*[For text of subps 5 and 6, see M R ]*

**Statutory Authority:** *MS s 116 07*

**History:** *18 SR 1412*