



**U.S. Environmental Protection Agency  
Office of Water**

**Office of Science & Technology**  
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**Biosolids Fact Sheet**

December 2001

**Final Decision Not to Regulate Dioxin and Dioxin-like Compounds in Sewage Sludge which Is Placed in a Surface Disposal Unit or Fired in a Sewage Sludge Incinerator (40 CFR Part 503)**

In December 1999, EPA proposed not to regulate dioxins in sewage sludge that is placed in a surface disposal unit or fired in a sewage sludge incinerator. The Agency based its proposed decision not to establish numeric standards or management practice requirements for sewage sludge placed in surface disposal units or incinerated on the results of risk assessments for dioxins. These results determined that the presence of dioxins in sewage sludge does not pose a significant risk to public health to warrant regulation of sewage sludge through the management practices of surface disposal or incineration. Today's final decision sustains that determination.

**The Round 1 Sewage Sludge Regulation**

Part 503 is the comprehensive regulation for land application, surface disposal and incineration of sewage sludge under section 405 of the Clean Water Act. Section 405 calls for two "rounds" of regulation: Round 1 addresses pollutants for which information was available at the time, and Round 2 addresses additional pollutants. Because EPA did not meet the statutory deadline for the Round 1 regulations, the Agency was sued and entered into a consent decree establishing a schedule for both the Round 1 and 2 regulations.

On February 19, 1993, EPA published the Standards for the Use or Disposal of Sewage Sludge. Known as the Round 1 sewage sludge regulation, these standards contain the requirements for sewage sludge that is applied to the land, placed in a surface disposal unit, or fired in a sewage sludge incinerator. The Round 1 Rule has been amended several times since it was first published in 1993.

**Final Decision Not To Regulate Dioxins in Sewage Sludge Placed In a Surface Disposal Unit Or Fired In A Sewage Sludge Incinerator (Round 2)**

The no action determination is based on evaluations and risk assessments showing cancer risks of one in one million or less for both surface disposal and incineration. The risk assessments evaluated multiple pathways of exposure for highly exposed individuals. The incineration risk assessment also evaluated cancer risks to infants and children exposed to dioxin from sewage sludge incinerators. Risks from incineration of sewage sludge were estimated to be equally as low for infants and children (i.e., one in one million or less.) Additionally, based on the very low

exposure and estimated risk for surface disposal of sewage sludge, a significant cancer risk also would not be expected for infants and children exposed to dioxins from sewage sludge surface disposal units.

We received very few comments on the "no action" proposal for surface disposal and incineration. Most of those who commented supported the proposed decision not to regulate dioxins for these disposal practices. Negative comments concerned specific features of the underlying risk assessment rather than the "no action" conclusion. The Agency has appropriately revised the incineration risk assessment in response to technical comments and responded to all public comments for both surface disposal and incineration.

#### Proposed Round 2 Rule: Land Application, Surface Disposal & Incineration of Sewage Sludge

On December 23, 1999, EPA proposed to amend numerical standards for sewage sludge by adding a numeric concentration limit of 300 parts per trillion for dioxins when it is applied to the land. The proposal also included monitoring, record keeping and reporting requirements for these pollutants in sewage sludge that is land applied. The proposed action also presented results of risk assessments for dioxins in sewage sludge upon which the Agency based its decision not to propose numeric standards for these compounds or management practice requirements for sewage sludge placed in surface disposal units or incinerated. The proposal required preparers of sewage sludge that is to be land applied to analyze and routinely monitor the sewage sludge to determine the concentration of dioxins. These land application requirements for sewage sludge in the proposed rule are not the subject of today's final decision; they are still under deliberation.

#### **For More Information**

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