

AIR & RADIATION DIVISION

March 15, 2021

Ms. Donna Harris City Clerk City of Selawik 99 North Tundra Street Selawik, Alaska 99770

Re: Applicability of the Rural Institutional Waste Incinerator Exclusion in NSPS EEEE

Dear Ms. Harris:

This letter is in response to your letter to the U.S. Environmental Protection Agency, Region 10 dated December 30, 2020, requesting exclusion from 40 CFR part 60, subpart EEEE: *Standards of Performance for Other Solid Waste Incineration Units for which Construction is Commenced after December 9, 2004, or for which Reconstruction or Modification is Commenced on or after June 16, 2006* (NSPS EEEE), because the proposed unit qualifies as a rural institutional waste incinerator (RIWI) as described in 40 CFR 60.2887(h). We find that the unit meets the criteria of an RIWI and approve your application for exclusion from NSPS EEEE, as discussed below.

Background

The City of Selawik is a majority Alaska native community located approximately 90 miles east of Kotzebue and 670 miles northwest of Anchorage, at the mouth of the Selawik River in Northwest Arctic Borough. According to the United States Department of the Census, Selawik has an estimated population of 840 people residing in 189 total housing units. Over fifty percent of this population is estimated to live in poverty.

The City of Selawik is not on the road system and is more than 300 miles from the nearest permitted landfill. Ferries serve the community intermittently when waters are ice-free and light aircraft can reach the city.

In December, a representative of the Alaska Department of Environmental Conservation's Spill Prevention and Response unit contacted Region 10 to report that there had been a localized spill of fuel oil at the City of Selawik's water treatment plant on November 25, 2020, and inquired about the regulatory requirements that would apply to a cyclonic burn barrel used to incinerate oil soaked absorbents on site. There is no definition of a cyclonic burn barrel in NSPS EEEE, but according to 40 CFR part 60, subpart CCCC: *Standards of Performance for Commercial and Industrial Solid Waste Incineration Units*, a cyclonic burn barrel is: "*a combustion device for waste materials that is attached to a 55 gallon, open-head drum. The device consists of a lid, which fits onto and encloses the drum, and a blower that forces combustion air into the drum in a cyclonic manner to enhance the mixing of waste material and air."*

The SPAR unit can provide a cyclonic burn barrel at no cost if the city is willing to operate it, which would result in estimated labor costs of about \$1,200.

Transporting the waste material away by barge would not be available until the spring, when oil could contaminate the ground and possibly leach into the river. For this reason, we consider this option to not be available at this time. An airplane could be chartered at a cost of \$12,000 plus \$1 per pound, not including the cost of labor or containers. It is not clear that all oil-soaked materials could fit in a single airplane. Other disposal options are not available to the City of Selawik.

The city has an annual budget of about \$1 million, operating at a net loss of about \$60,000 in 2020. Nearly 78 percent of the city's income consists of state grants and their ability to raise additional funds locally is limited by the low population and subsistence economy.

Regulatory Authority

According to 40 CFR 60.2887(h):

Rural institutional waste incinerators. Your incineration unit is excluded if it is an institutional waste incineration unit, as defined in §60.2977, and the application for exclusion described in paragraphs (h)(1) and (2) of this section has been approved by the Administrator.

(1) Prior to initial startup, an application and supporting documentation demonstrating that the institutional waste incineration unit meets the two requirements specified in paragraphs (h)(1)(i) and (ii) of this section must be submitted to and approved by the Administrator.

(i) The unit is located more than 50 miles from the boundary of the nearest Metropolitan Statistical Area,

(ii) Alternative disposal options are not available or are economically infeasible.

The following definitions in 40 CFR 60.2977 apply to institutional waste incinerators:

Institutional facility means a land-based facility owned and/or operated by an organization having a governmental, educational, civic, or religious purpose such as a school, hospital, prison, military installation, church, or other similar establishment or facility.

Institutional waste means solid waste (as defined in this subpart) that is combusted at any institutional facility using controlled flame combustion in an enclosed, distinct operating unit: whose design does not provide for energy recovery (as defined in this subpart); operated without energy recovery (as defined in this subpart); or operated with only waste heat recovery (as defined in this subpart). Institutional waste also means solid waste (as defined in this subpart) combusted on site in an air curtain incinerator that is a distinct operating unit of any institutional facility.

Institutional waste incineration unit means any combustion unit that combusts institutional waste (as defined in this subpart) and is a distinct operating unit of the institutional facility that generated the waste. Institutional waste incineration units include field-erected, modular, cyclonic burn barrel, and custom built incineration units operating with starved or excess air, and any air curtain incinerator that is a distinct operating unit of the institutional facility that generated in the second term barrel.

Determination

The City of Selawik sought this approval prior to the initial start-up of the institutional incineration unit.

The City of Selawik's water treatment plant is a land-based facility, owned and operated by the community, and serving a governmental function. As the waste proposed for incineration was generated at the water treatment plant and will be combusted at the water treatment plant, the unit will be an institutional waste incineration unit.

Northwest Arctic Borough is located more than 50 miles from either of the Metropolitan Statistical Areas in Alaska (Anchorage and Fairbanks).

The rule does not define "economically infeasible" or set a cost threshold for feasibility. However, according to the preamble of NSPS EEEE's 2005 final rule, the EPA considered entities with a "limited tax base," such as rural school districts, when developing the RIWI exclusion. See 70 FR 74870, December 16, 2005. The City of Selawik depends largely on state grants for operation and has limited ability to collect funds from the community. The cost of transporting the waste to a landfill by chartered barge is not available at this time. The cost of hiring a private airplane to carry the waste to a landfill would be prohibitively expensive based on the city's budget.

For these reasons, we have determined that the RIWI exclusion outlined in 40 CFR 60.2887(h) applies. The cyclonic burn barrel, if operated as proposed by the City, shall be excluded from the requirements of NSPS EEEE. Pursuant to 40 CFR 60.2887(h)(2), this exclusion applies for five years from the date of this letter and a renewal of this approval must be requested for a continuation of the exemption beyond that timeframe.

If you have any questions about this matter, please contact Mr. Geoffrey Glass, of my staff, at (206) 553-1847 or glass.geoffrey@epa.gov.

Sincerely,

KELLY MCFADDEN Date: 2021.03.15 11:44:55-07'00'

Kelly McFadden, Chief Air Permits and Toxics Branch

cc: Mr. James Plosay, ADEC

Ms. Kathie Mulkey, ADEC

Ms. Kimberly Maher, ADEC, SPAR