PATHOLOGICAL INCINERATOR OPERATOR
ENVIRONMENTAL COMPLIANCE RESPONSIBILITIES

(For assistance, please contact EHS at (402) 472-4925, or visit our web site at http://ehs.unl.edu/)

This Safe Operating Procedure (SOP) provides a summary of the environmental compliance responsibilities for East Campus incinerator operators. Refer to the EHS SOP, Pathological Waste Incinerators - Operating Permit Requirements for additional information regarding air quality regulatory requirements and permit conditions.

To ensure maximum waste combustion efficiency, air quality operating permits require that incinerators be installed, operated, and maintained in good working condition and in accordance with the manufacturer's specifications. Additional limitations, such as restrictions on types of wastes to be incinerated and smoke emissions are imposed in the permits. To ensure the incinerators are maintained in good operating condition and that the air permit conditions are met, incinerator operators are required to:

- Evaluate the acceptability and quantity of waste types to be incinerated.
  - Permit conditions limit the waste types to 90% or more pathological (type 4) wastes based on each calendar quarter.
  - The manufacturer's specified waste charge loading limits must not be exceeded at any time.
- Start, load, and adjust equipment settings as specified by the manufacturer to ensure effective and efficient incineration of materials.
- Adhere to specified secondary burner pre-heat and post-incineration burn-down times.
- Complete all data on the Monthly Incineration Record form as presented in the EHS SOP, Pathological Waste Incinerators - Operating Permit Requirements. Submit these log forms to EHS by the 15th of each month, along with the secondary chamber (afterburner) temperature recording charts and opacity reading forms. See EHS SOPs, Pathological Waste Incinerators – Operating Permit Requirements andOpacity of Emissions from Combustion Sources.
- Monitor automated incinerator operating systems, coordinate a response to system failures, and document corrective actions. Examples include: burners failing to operate at appropriate temperatures or for appropriate time cycles, stack fan failures, continuous afterburner temperature monitoring or recording device failures, etc.
- Perform minor equipment maintenance such as cleaning around burner nozzles, changing paper in the continuous afterburner temperature recorder, making
minor adjustments to valves, instruments, burners, or other components, as needed.

- Coordinate, direct, and document the work of journey-level personnel in the repair and maintenance of incinerator components and systems, as needed.
- Handle and dispose of ash and other residual material from incineration in accordance with EHS procedures.
  - Clean ash and bone out of the primary burn chamber after completing each daily burn event.
  - Periodically clean ash out of the secondary burn chambers.
  - Store ash and bone in metal waste containers labeled "Bottom Ash" with lids kept closed.
  - Once ash is cool, transfer to EHS provided 55 gallon open top metal drum. Make sure lids are closed after adding ash.
  - Contact EHS when 55 gallon drum is full for pick-up.
- Maintain cleanliness in areas surrounding the incinerator.
- Notify EHS as soon as possible of incinerator malfunctions, instances where the maximum opacity readings are exceeded, problems with fugitive emissions, or other deviations from permit requirements.
- Incinerator operators must complete training prior to operating any of the University's incinerators. Operators must:
  - Be trained to conduct opacity readings according to EPA's Method 9 by attending an EPA-certified Method 9 "Smoke School" or attending an EHS Visible Emissions Training session.
  - Read the manufacturer's operators manual and/or other available technical instructions for the incinerator they operate, as well as the East Campus Operating Permit.