PUGET SOUND CLEAN AIR AGENCY

Additional Notice of Construction
Application Requirements for

THERMAL DESORPTION (SOIL REMEDIATION)

General

Description of Equipment and its Purpose *[Specify the type of thermal desorption equipment (rotary dryer or oven) and the reason for using it (remediation of soil on-site or from other sites)]*

Identify which of the following categories the project fits into:

1. New Construction *(New construction also includes existing, unpermitted equipment or processes*)
2. Reconstruction *(Reconstruction means the replacement of components of an existing facility to such an extent that the fixed capital cost of the new components exceeds 50% of the fixed capital cost that would be required to construct a comparable entirely new facility)*
3. Modification *(Modification means any physical change in, or change in the method of operation of, a source, except an increase in the Hours of Operation or production rates (not otherwise prohibited) or the use of an alternative fuel or raw material that the source is approved to use under an Order of Approval or operating permit, that increases the amount of any air contaminant emitted or that results in the emission of any air contaminant not previously emitted)*
4. Amendment to Existing Order of Approval Permit Conditions

Estimated Hours of Operation (hr/day, day/wk, wk/yr) *[Estimate the hours of operation for the new thermal desorption equipment - not necessarily the entire facility.]*

Estimated Installation Date *[Estimate the date when the new thermal desorption equipment will be put into service]*

Estimated Removal Date *[Estimate the date when the new thermal desorption equipment will be taken out of service]*

Contaminant Properties

Contaminants to be Vented *[Specify the chemicals to be vented from the soil]*

Concentration of Each Contaminant (mg/l or ppm) *[Specify the initial (present) chemical concentration of each contaminant]*

Emission Estimates for Each Contaminant (total lb, maximum lb/yr) *[Estimate the total emission of each contaminant emitted during the course of the remediation (the mass of soil times the difference in concentration), and the maximum annual emissions]*

Design ***[Most design information is available from the manufacturer or vendor. Submittal of a brochure, scale drawing or process and instrumentation diagram will facilitate the review of the permit application]***

Make & Model *[Specify the manufacturer and model of the dryer or oven - not the serial number]*

Rated Capacity (ton/hr) *[Specify the maximum amount of soil that can be processed per hour]*

Estimated Annual Processing (ton/yr) *[Estimate the annual amount of soil to be processed]*

Type of Fuel *[Specify natural gas, propane, #2 fuel oil, or other (be specific).]*

Rated Heat Input (Million Btu/hr) *[Specify the rated heat input (the maximum fuel firing rate times the upper heating value of the fuel).]*

Estimated Annual Fuel Usage (Million cu ft/yr, thousand gal/yr) *[Estimate how many million cubic feet of gaseous fuel or thousands of gallons of liquid fuel will be burned annually. Alternatively, specify how many billion Btu/yr.]*

Stack ***[Required only for units without additional control equipment. Otherwise, use the appropriate permit forms for control equipment (thermal oxidizer, baghouse, absorber)]***

Stack Height (ft) *[Specify the height of the top of the stack above ground level - not above the building or sea level]*

Stack Diameter or Rectangular Cross-Sectional Dimensions (inches) *[Specify the internal dimensions - not the external dimensions]*

Exhaust Flowrate (acfm) *[Specify the airflow in actual cubic feet per minute]*

Exhaust Temperature (°F) *[Specify the temperature of the exhaust leaving the stack*]:

Distance to Nearest Property Line (ft) *[Specify the distance from the base of the stack to the nearest property line.]*

Height, Length and Width of Buildings (ft) *[Specify the approximate dimensions of any buildings that are >40% of the stack height and are located within 5 building heights from the stack.]*

Operation and Maintenance

Method Used to Monitor Emission Rates *[Specify the test method and frequency used to monitor the pollutant emission rate to the atmosphere.]*

Describe Preventive Maintenance *[Specify the periodic maintenance recommended by the manufacturer and its frequency]*