

In-Light Liquid Subpart BB Document Reference Checklist

Your facility is due for a routine hazardous waste inspection. Please use this checklist as a reference to help you provide your facility’s records to the ADEQ inspector one week prior to the inspection. If you have any questions regarding documents, reach out to the ADEQ inspector for clarification.

This checklist applies to facilities that contains or contacts in-light organic hazardous waste via valves, pumps, compressors, pressure relief devices, sampling systems, open-ended valves or lines, flanges and other connectors. The regulated equipment is specifically those that contain or is in contact with organic hazardous waste of at least 10 percent by weight.

Required Documents:

- Documentation that waste is in-light liquid [40 CFR § 265.1064\(k\)\(3\)](#) and [40 CFR § 265.1064\(b\)\(1\)\(iv\)](#)
 - Product list, Safety Data Sheet list, analytical list of waste constituents
 - Each constituent’s vapor pressure (considered in-light Liquid, if greater than 0.3 kilopascals (kPa) (0.0435 pounds per square inch (PSI)) at 20 degrees Celsius)
 - Total percent by weight of constituents of each constituent with a vapor pressure above 0.3 kPa (subject to Subpart BB, if equal to or greater than 20 percent (200,000 parts per million)

- Identification, either by list or location (area or group) of equipment that contains or contacts hazardous waste with an organic concentration of at least 10 percent by weight for less than 300 hours per calendar year [40 CFR § 265.1064\(g\)\(6\)](#)
 - Equipment may include the following:
 - Pumps [40 CFR § 265.1052](#)
 - Compressors [40 CFR § 265.1053](#)
 - Valves [40 CFR § 265.1057](#)
 - Pressure relief devices [40 CFR § 265.1058](#)
 - Flanges [40 CFR § 265.1058](#)

- For each piece of equipment identified in the checklist item above, submit the following documentation [40 CFR § 265.1064\(b\)\(1\)](#)
 - Equipment identification number and hazardous waste management unit identification
 - Approximate locations within the facility (e.g. facility plot plan)
 - Type of equipment (e.g., a pump or pipeline valve)
 - Percent-by-weight total organics in the hazardous waste stream at the equipment
 - Hazardous waste state at the equipment (e.g. gas/vapor or liquid)
 - Method of compliance with the standard (e.g. “monthly leak detection and repair” or “equipped with dual mechanical seals”)
 - If available, diagrams of equipment subject to this checklist

- A list of equipment in vacuum service [40 CFR § 265.1064\(g\)\(5\)](#)

- Compliance testing [40 CFR § 265.1064\(g\)\(4\)](#)
 - Dates of measurements
 - Background air measurements collected during compliance testing
 - Maximum readings at each location

In-Light Liquid Subpart BB

Document Reference Checklist

- A list of identification numbers for equipment that the owner or operator elects to designate for no detectable emissions, as indicated by an instrument reading of less than 500 parts per million (ppm) above background [40 CFR § 265.1064\(g\)\(2\)\(i\)](#)
 - Equipment may include the following:
 - Pumps (annual measurement) [40 CFR § 265.1052\(e\)](#)
 - Compressors (annual measurement) [40 CFR § 265.1053\(i\)](#)
 - Valves (annual measurement) [40 CFR § 265.1057\(f\)](#)
- Monitoring measurements of pumps [40 CFR § 265.1064\(g\)\(4\)](#)
 - Weekly visual
 - Monthly vapor emissions
- If a facility is proving exemption from pump requirements by installing pumps equipped with a dual mechanical seal system with a barrier fluid, provide documentation of the following [40 CFR § 265.1064\(g\)](#)
 - Barrier fluid pressure compared to stuffing box pressure (must be higher)
 - Show that barrier fluid degassing reservoir is connected by a closed-vent system to a control device (IE: a diagram)
 - Show that when barrier fluid is purged, it is collected into a hazardous waste stream with no detectable emissions to the atmosphere
 - Show that the barrier fluid is not hazardous [40 CFR § 261 Subparts C and D](#)
 - Show that each pump with a barrier fluid has a sensor that is checked daily or has an alarm that is checked monthly
 - Weekly visually inspect each pump
 - Specify indicators of a pump failure, either by design considerations or operating experience
- Documents for compressors, either with a seal system **OR** closed-vent system [40 CFR § 265.1064\(g\)\(4\)](#)
 - Documents for seal system
 - Barrier fluid pressure compared to stuffing box pressure (must be higher)
 - Show that barrier fluid is connected by a closed-vent system to a control device
 - Show that when barrier fluid is purged, it is collected into a hazardous waste stream with no detectable emissions to the atmosphere
 - Show that the barrier fluid is not hazardous [40 CFR 261 Subparts C and D](#)
 - Show that each compressor with a barrier fluid has a sensor that is checked daily **OR** has an alarm that is checked monthly. If the sensor is located in an unmanned part of the site, show that the sensor is checked daily.
 - Specify indicators of a pump failure, either by design considerations or operating experience
 - Documents for closed-vent system
 - See closed-vent systems and control devices document list
- Sampling systems diagrams detailing if they are ex-situ or in-situ (in-situ sampling is performed within the system, preventing the release of emissions). An ex-situ sampling system shall be equipped with a closed-purge, closed-loop, or closed-vent system, and shall provide proof of the following [40 CFR §§ 265.1064\(b\)\(4\) and 265.1064\(e\)](#)
 - Return the purged process fluid directly to the process line; or
 - Collect and recycle the purged process fluid; or
 - Be designed and operated to capture and transport all the purged process fluid to a waste management unit or a control device
- Monitoring records of valves for the following interval (does not include valves with external actuating mechanism)

In-Light Liquid Subpart BB Document Reference Checklist

[40 CFR §§ 265.1064\(a\)\(4\) and 265.1064\(i\)](#)

- Monthly, *or*
- On the first of every quarter if two successive months with no emissions were recorded, *or*
- Once every 6 months (skip one quarterly leak detection period), if no leaks were detected in no more than 2 percent of the valves over two consecutive quarters [40 CFR § 265.1062\(b\)\(2\)](#), *or*
- Annually (skip three quarterly leak detection periods), if no leaks were detected in no more than 2 percent of the valves over five consecutive quarters [40 CFR § 265.1062\(b\)\(3\)](#)

- If a valve is considered unsafe to monitor, submit a written plan of monitoring of unsafe valves as frequently as practicable during safe-to-monitor times

- If a valve is difficult to monitor, submit a written plan of annual monitoring for difficult-to-monitor valves

- Pressure relief valves [40 CFR § 265.1064\(d\)](#)
 - If applicable, monitoring data within 5 days of a potential leak (reading greater than 10,000 ppm indicates a leak)
 - If using construction material exemption, prove that pressure relief devices are made of ceramic or ceramic-lined materials

- Flanges [40 CFR § 265.1064\(d\)](#)
 - If applicable, monitoring data within 5 days of a potential leak (reading greater than 10,000 ppm indicates a leak)
 - If using construction material exemption, prove that flanges are made of ceramic or ceramic-lined materials

- Closed-vent systems and control devices [40 CFR § 265.1064\(b\)\(4\) and 40 CFR § 265.1064\(e\)](#)
 - Design documentation, monitoring, operating, inspection, and performance test results
 - Equipment may include the following:
 - Pumps [40 CFR § 265.1052](#)
 - Compressors [40 CFR § 265.1053](#)
 - Sampling systems [40 CFR § 265.1055](#)

- Documentation for allowing two percent of valves to leak [40 CFR § 265.1061](#)
 - Performance tests upon installation, annually, and requested by the Regional Administrator
 - Leaked valves repaired per requirements listed in the following checklist item
 - Performance tests of all valves must be measured within a week, and those with emissions greater than 10,000 ppm, must only be 2 percent of the number of the total number of valves

- Documentation for leaks (last three years) [40 CFR § 265.1064\(d\)](#)
 - The instrument and operator identification numbers and the equipment identification number
 - The date the leak was detected and the dates of each attempt to repair the leak
 - Repair methods applied in each attempt to repair the leak
 - If applicable, record the reason if a leak was not repaired within 15 calendar days after discovery
 - The signature of the owner or operator (or designate) whose decision it was that repair could not be affected without a hazardous waste management unit shutdown
 - The expected date of successful repair of the leak or the date of a successful repair of the leak