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## **Halogenated Solvent Question and Answers (Q&As)**

12/98 (updated 11/7/02)

### **Applicability**

**QUESTION:** In the definition of a solvent cleaning machine, it says that "buckets, pails, and beakers with capacities of 7.6 liters (2 gallons) or less are not considered solvent cleaning machines." Are there specific definitions for 'buckets, pails, and beakers'? We have a source that has a cold batch cleaning unit that is approximately 10" x 10" x 6"...therefore, they do not meet the appropriate freeboard, but the total capacity of the unit is definitely less than 2 gallons. Are they subject?

**ANSWER:** You are correct we did not define buckets, pails or beakers. EPA excluded buckets, pails and beakers with less than 2 gallons capacity to make sure we were not requiring small operations (such as a lab or someone cleaning by dipping it a small bucket) to comply with the rule. Nevertheless, if the equipment is designed for carrying out solvent cleaning operations and is less than 2 gallons capacity (as some bench top models are) it is subject to the rule.

**QUESTION:** Does the Halogenated Solvent NESHAP apply to paint stripping operations?

**ANSWER:** No. The rule states that the provisions apply to each solvent cleaning machine using methylene chloride, etc. Solvent cleaning machine is defined as "any device or piece of equipment that uses halogenated HAP solvent liquid or vapor to remove soils from the surfaces of materials." Also, "Soils means contaminants that are removed from the parts being cleaned. Soils include, but are not limited to grease, oils, waxes, metal chips, carbon deposits, fluxes, and tars." Stripping operations will be covered under a separate rule to be developed by 2000. EPA's [Applicability Determination Index \(ADI\) at http://www.epa.gov/Compliance/planning/data/air/adi.html](http://www.epa.gov/Compliance/planning/data/air/adi.html). Control Number M960059 (7/17/1996) pertains to paint stripping operations and their applicability under Subpart T.

**QUESTION:** Does the Halogenated Solvent NESHAP apply only to metal cleaning?

**ANSWER:** No, the rule applies to all types of cleaning operations including metal, plastic, composite, etc. The rule regulates the removal of soils and does not specifically exempt non-metal cleaning.

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**QUESTION:** What is the status on Web & Wire cleaning?

**ANSWER:** EPA published an compliance extension for web & wire cleaning machines in the 12/11/98 Federal Register (63 FR 68398). The Federal Register notices are available for download on the Unified Air Toxics Website ([www.epa.gov/ttn/uatw/deagrea/halopg.html](http://www.epa.gov/ttn/uatw/deagrea/halopg.html)).

**QUESTION:** Are R&D facilities exempt from the rule?

**ANSWER:** No, all facilities/plants who have solvent cleaning machines as defined by the rule are required to comply with the rule. The issue of exempting R&D facilities was raised in the BID to the final rule, Page 2-18, commenter IV-D-21. The EPA response was:

"The EPA is required by the Act to establish a separate category covering research or laboratory facilities, as necessary to assure the equitable treatment of such facilities. There is nothing inherently different about research and laboratory facilities that would justify a separate category or exemption. The proposed and final regulation for halogenated solvent cleaning machines provide for equitable treatment of all halogenated HAP solvent cleaning machine sources, by not exempting sources, such as the ones described by the commenter."

## **Definitions**

**QUESTION:** I've talked to several people about lip exhausts and one particular woman said that many facilities out there are having a tough time understanding what a lip exhaust is, that is, it isn't defined very specifically and a lot of issues have arisen from this particular piece of equipment. Local agencies have been telling these companies that it is in the process of being defined - do you know if that is true and if not, is there some way to get a more specific definition or at least more criteria for what is or isn't a lip exhaust?

**ANSWER:** EPA, at this time, is not planning on clarifying the definition in rulemaking. Lip exhaust is an integral part of the machine (meaning that it is actually attached to the perimeter of the opening of the solvent cleaning machine in the case of an open top; and for an in-line machine, it is a stack attached to the machine that is drawing air/solvent from the inside of the solvent cleaning machine). Ventilation systems which are not part of the solvent cleaning machine itself and are located around or above the solvent cleaning machine would not be considered lip exhaust. These ventilation systems could affect the work practice requirement of windspeed of less than 50 fpm across the degreaser.

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### **Batch Vapor/In-Line Machines**

**QUESTION:** A facility has two 22 square feet solvent sumps. From the two sumps the sides of the machine extend to form a funnel like area where the vapor cleaning takes place (the primary condensers are also located in this funnel like area). This area measures 60 feet long and is 5 feet wide. The 1995 EPA guidance document and the definition of solvent/air interface area in the rule says that "...for an in-line cleaning machine, it is the total surface area of all the sumps...". But EPA also states that "solvent/air interface means, for a vapor cleaning machine, the location of contact between the concentrated solvent vapor layer and the air. This location of contact is defined as the mid-line height of the primary condenser coils....".

In the first case the sources solvent/air interface area would be 44 square feet, and in the other it would be 300 square feet. The source is looking for an EPA interpretation on which is the right way of calculating so he can determine his potential to emit, which is tied to the machine's solvent/air interface area, and also to determine what would be his allowable emissions under the alternative standard (§63.464).

**ANSWER:** The solvent air interface area is the area where the solvent vapor are mixing with air -- 300 sq. ft.

**QUESTION:** My company is operating a batch vapor degreaser >1.21 m<sup>3</sup>. Our only real choice of compliance options is Option #2 in Table 2. We can meet draft and reduced room draft with no problem, but we have a problem meeting the freeboard refrigeration device part. Superheated vapor is not an alternative since we do not have a closed system. We just tested this machine and found that in the midpoint of the blanket (said something about having a cooling jacket 8") is reading 82 F. Under 63.463(e)(2)(i), we must ensure that the chilled air blanket temperature measured at the center of the air blanket is no greater than 30 % of the solvents boiling point. The boiling point of the solvent is 250 F, 30% of that would be 75 F.

We would like to increase the cooling zone of the machine by using 6-9" "ropes" of copper tubing. These secondary coils would be above the cooling jacket and would decrease the diameter of the machine by about 1". This would still be large enough to set his basket into the machine in accordance with the rule. This is much less expensive for him than his other option of (I think he said) increasing the size of the machine? Does the rule allow us to do this?

**ANSWER:** The rule does not stipulate how many or the configuration of the cooling coils as long as

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the requirements in 63.463(1) through (7) are met. If modifications to the machine are made, you must ensure that the machine still complies with all applicable requirements, including 63.463(d)(2) (i.e., the basket or parts being cleaned do not occupy more than 50% of the solvent/air interface area or ensure that the basket/parts are introduced at a speed of 3 fpm or less).

**QUESTION:** My facility/plant uses an existing batch vapor machine which has chosen the following options: The idling and downtime cover in 63.463(a)(1)(i), the base design requirements in 63.463(a)(2) through (a)(7), and the idling emission limit in 63.463(b)(2)(ii). Under 63.466, do I have to monitor only those sections that indicate compliance with the equipment or idling standards (i.e., 63.466(c) and (f)) or do I have to monitor everything that I use on that machine even if I use a control (i.e., superheated vapor) that is not part of this option. The reason I am asking is that in 63.466(f)(1), it refers you back to the requirements in (a)( through (e).

**ANSWER:** Under 63.466(f)(1), you would have to monitor any controls listed in (a) through (f). This means that if you are using superheated vapor, comply with 63.466(2), unless you can show that the superheated vapor does not effect your ability to meet compliance with the idling emission limit.

Under the idling emission limit, you must meet base design requirements including, freeboard ratio, automated parts handling, sump heat shutoff, vapor level control device, and use of primary condenser. If 63.466 lists any of these controls, you must monitor in accordance with that section. In your original question, the machine you described would be monitored for (under 63.466(f)) : 63.466(a)(2) - superheated vapor; 63.466(b)(1) - cover; 63.466(c)(1) to (c)(4) - hoist speed.

**QUESTION:** Section 63.463(d)(12) states “sponges, fabric, wood and paper products shall not be cleaned”. Our company currently has a metal tag system on the baskets (for production control purposes). We are looking into a new labeling system where we would use a paper label. The label would be on the basket when it is lowered into the solvent. Can we do this under 63.463(d)(12)?.

**ANSWER:** Section 63.463(d)(12) was added to the rule to prevent the use of a product during the cleaning process that would adsorb halogenated solvents and then later release the vapors into the atmosphere. Sponges, paper, fabric and wood are adsorbent materials and should not be used in the cleaning process. Even if the owner/operator has allowed the equipment to “cease dripping” in accordance with the regulation, these adsorbent materials would continue to release halogenated solvents into the atmosphere. A non-adsorbent material should be used for your labeling system.

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**QUESTION:** I have a question regarding the monitoring procedures (§63.466) for the Alternative Standards. Does §63.466(e) apply to the alternative standard (monitoring requirements for the carbon absorber)?

**ANSWER:** No, sources complying with the Alternative Standards (§63.464) are not required to comply with the monitoring procedures provided in §63.466.

### **Cold Cleaning Machines**

**QUESTION:** A plant uses a batch cold cleaning machine which has a tightly fitted lid that is kept closed except when introducing or removing parts or when adding perchloroethylene into the tank. The plant can not meet the requirements for the 2.5 cm water layer as described in 63.462(a)(1) and proposes to use the (a)(2) compliance option (freeboard ratio  $\geq 0.75$ ). The machine in question has a ventilation system present which was installed primarily for Safety and Health reasons. The ventilation system is kept on except when the machine is idle. Does running the ventilation system cause me to be out of compliance with the rule?

**ANSWER:** Section 63.462 requires that batch cold cleaning machines meet the following options. (1) for immersion batch cold cleaning machines, comply with either 63.462(a)(1) or (a)(2); or (2) for a remote reservoir machine, meet 63.462(b). In your case, you have a immersion batch cold cleaning machine and have chosen to meet (a)(2) which requires you to employ a tightly fitting cover that is closed at all times except during parts entry and removal and has a freeboard ratio of  $\geq 0.75$ .

The rule requires that those complying with (a)(2) or (b), to also comply with work and operational practice requirements in 63.462(c)(1) through (8). Section 63.462 does not require, nor prohibit, the use of a ventilation system. However, under 63.462(c)(7), the owner/operator needs to ensure that when the cover is open, the cold cleaning machine is not exposed to drafts greater than 132 feet per minute. If your facility/plant were operating a batch vapor or in-line cleaning machine and used a lip exhaust ventilation system, you would be required to collect vapors through a carbon absorber or meet an alternative standard. Since your cleaning machine is a batch cold, however, such a requirement does not exist.

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### **Test Methods**

**QUESTION:** I have a question about the requirement to use an inclined liquid gauge in accordance with test method 307 (idling emission standard) I have contracted various gauge manufacturers and they do not know what this is. We are currently using a sight glass to check the liquid level. Is there another name for this liquid gauge? Who manufacturers it? Is this a manometer we are talking about?

**ANSWER:** With regard to Test Method 307, it was brought to our attention that the “inclined liquid level indicator” referenced in the test methodology is not readily available for purchase. EPA/state inspectors and compliance assistance providers should be aware that owners and operators implementing Test Method 307 may be using alternative apparatus capable of measuring the solvent level in solvent cleaning machines. (See Memorandum of 12/11/97, Reporting Dates and Test Method 207, which can be downloaded at [www.epa.gov/ttn/uatw/degrea/halopg.html](http://www.epa.gov/ttn/uatw/degrea/halopg.html)).

**QUESTION:** How many idling emission tests must be performed to comply with §63.463(b)(1)(ii) or §63.463(b)(2)(ii)?

**ANSWER:** Subpart T specifies what is required to demonstrate idling emission standard compliance through the use of the EPA test method 307 and control device monitoring.

### **Reporting**

**QUESTION:** I have a question regarding the Exceedance Report that is required by the Halogenated Solvent NESHAP regulations. I have a client that has both existing (pre-11/29/93) and new (post-11/29/93) cleaning machines, covered by the NESHAP. We are presently submitting quarterly exceedance reports for the new machines and we are trying to determine when we need to start including the existing machines in these reports. For existing machines, 40 CFR 63.468(d) states that the initial statement of compliance must be submitted within 150 days of Dec. 2, 1997 (by 5/2/98), but it doesn't really state when these units need to be included in exceedance reporting. We will be submitting an exceedance report for the new machines, covering the first three months of 1998. Do the existing machines need to be included on this first quarter report or do we wait until after the initial statement of compliance has been submitted?

**ANSWER:** See time line and OECA policy memo Dec 11, 1997 “Compliance Issues for the Halogenated Solvent Cleaner MACT.” Both are available for download at

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**QUESTION:** If the compliance date is in December and the Initial Statement of Compliance is due in May 98, do we have to submit the first annual report in Feb 98 or can we wait until 99?

**ANSWER:** See time line and OECA policy memo Dec 11, 1997 "Compliance Issues for the Halogenated Solvent Cleaner MACT"

**QUESTION:** Section 63.468(d) requires o/o's to submit their initial statement of compliance w/in 150 days after the compliance date. Pursuant to 63.468(6), o/o's complying with the idling emission limit standards must append a test report to their initial statement of compliance. However (there is always a "however"), the General Provisions, 63.7(a)(iii) provides o/o's with 180 days after the compliance date to perform the a performance test. Note, Appendix B to Subpart T includes 63.7(a) as applicable to batch vapor and in-line machines

**ANSWER:** Sources must submit their initial statement of compliance within 150 days after the compliance date pursuant to §63.468(d).