

**COVERED SOURCE PERMIT REVIEW
COVERED SOURCE PERMIT No. 0654-01-C
Permit Application for Renewal No. 0654-02**

by Chenyan Song
August 6, 2015

Applicant: Halo Halo Hawaii, LLC
dba Al Phillips Dry Cleaners

Facility: Petroleum Dry Cleaning

Location: 340 Kuulei Road, Kailua, Oahu

SIC Code: 7216 (Dry Cleaning Plants, Except for Rugs)
Equivalent NAICS Code 812320 (Dry Cleaning and Laundry Services)

Mailing Address: 340-A Kuulei Road
Kailua, Hawaii 96734

Responsible Official: Avedis Yeterian, CEO

Phone: 262-0885

Other Contact: Margaret Barnett, Manager

Phone: 262-0885

1. BACKGROUND

Halo Halo, Hawaii, LLC (HHH) has submitted an application to renew its covered source permit No. 0654-01-C to operate a petroleum solvent washer/dryer at their Al Phillips Dry Cleaning facility. No modifications are proposed by the applicant.

The facility uses a ninety-five-pound (95-pound) Multimatic petroleum washer/dryer machine. The dry-to-dry machine is computer controlled to ensure proper operation and quality control. The machine uses Exxon's DF 2000 as the cleaning fluid.

HHH offers its customers same day service. As such, the facility operates seven (7) days a week, nine (9) hours per day. Depending on the customer traffic, the washer/dryer does not always operate at full load.

2. EQUIPMENT DESCRIPTION

One Multimatic Multistar petroleum solvent washer/dryer with maximum capacity of ninety-five (95) lbs, model no. MS 90/95

3. AIR POLLUTION CONTROLS

The Multimatic washer/dryer uses refrigerated coils to condense the VOC vapors.

4. APPLICABLE REQUIREMENTS

4.1. Hawaii Administrative Rules (HAR)

Chapter 11-59, Ambient Air Quality Standards
Chapter 11-60.1 Air Pollution Control
Subchapter 1, General Requirements

Subchapter 5, Covered Sources
Subchapter 6, Fees for Covered Sources, Noncovered Sources, and Agricultural Burning
11-60.1-111 Definitions
11-60.1-112 General Fee Provisions for Covered Sources
11-60.1-113 Application Fees for Covered Sources
11-60.1-114 Annual Fees for Covered Sources
11-60.1-115 Basis of Annual Fees for Covered Sources
Subchapter 8, Standards of Performance for Stationary Sources
11-60.1-161 New Source Performance Standards

4.2. Department of Health (DOH) In-house Annual Emissions Reporting

DOH requests annual emissions reporting from those facilities that have facility- wide emissions exceeding in-house reporting levels and for all covered sources. This facility is subject to annual emissions reporting requirements since it is a covered source.

4.3. New Source Performance Standards (NSPS), 40 Code of Federal Regulations (CFR) Part 60

40 CFR Part 60 Subpart A — General Provisions
40 CFR Part 60 Subpart JJJ — Standards of Performance for Petroleum Dry Cleaners

40 CFR Part 60 Subpart JJJ applies to petroleum dry cleaning plants with a total manufacturer's rated dryer capacity equal to or greater than eighty-four (84) lbs. The facility is subject to this standard because the total drying capacity at the facility is ninety-five (95) lbs and the washer/dryer was installed after December 14, 1982.

5. NON-APPLICABLE REQUIREMENTS

5.1. Prevention of Significant Deterioration (PSD), 40 CFR 52.21

This source is not subject to PSD requirements because it is not a major stationary source as defined in 40 CFR 52.21 and HAR Title 11, Chapter 60.1, Subchapter 7.

5.2. National Emission Standards for Hazardous Air Pollutants (NESHAPS), 40 CFR Part 61

The facility is not a major stationary source of hazardous air pollutants (HAPs) and is not subject to any NESHAPS requirements under 40 CFR Part 61.

5.3. National Emission Standards for Hazardous Air Pollutants for Source Categories (Maximum Achievable Control Technology (MACT)), 40 CFR Part 63

The facility is not a major stationary source of HAPs and the petroleum dry cleaning equipment is not subject to any MACT requirements under 40 CFR Part 63.

5.4. Compliance Assurance Monitoring (CAM), 40 CFR Part 64

The purpose of Compliance Assurance Monitoring (CAM) is to provide a reasonable assurance that compliance is being achieved with large emissions units that rely on air pollution control device equipment to meet an emissions limit or standard. Pursuant to 40 CFR Part 64, for CAM to be applicable, the emissions unit must: (1) be located at a major source; (2) be subject to an emissions limit or standard; (3) use a control device to achieve compliance; (4) have potential pre-control emissions that are 100% of the major source level; and (5) not otherwise be exempt from CAM. Since the facility is not a major source, this source is not subject to CAM.

5.5. Air Emissions Reporting Requirements (AERR), 40 CFR Part 51, Subpart A

40 CFR part 51, Subpart A — Air Emission Reporting Requirements, determines the annual emissions reporting frequency based on the potential emissions (with the exception of lead, which is based on actual emissions) of each pollutant from the facility that emits at or above the triggering levels. Since no HAPs are indicated on the Material Safety Data Sheet (MSDS) of Exxon's DF 2000, volatile organic compound (VOC) is the only pollutant applied to this regulation. The trigger levels for VOC are 100 tons per year total. According to Section 8 of this review, emissions from the washer/dryer is less than the trigger levels and thus, the facility is not subject to annual emission reporting under AERR.

5.6. Best Available Control Technology (BACT)

A BACT analysis is required for new sources or modifications to sources that have the potential to emit or increase emissions above significant levels considering any limitations as defined in HAR, Section 11-60.1-1. The potential VOC emission from this facility is less than the significant level of forty (40) tons per year. This facility is not subject to a BACT analysis because it is an existing source with no proposed modifications.

5.7. Synthetic Minor Source

A synthetic minor source is a facility that is potentially major as defined in HAR 11-60.1-1, but is made non-major through federally enforceable permit conditions. This facility is not a synthetic minor source because potential emissions do not exceed major source thresholds when the equipment is operated at the maximum capacity for 8,760 hours per year.

6. INSIGNIFICANT ACTIVITIES/EXEMPTIONS

No insignificant activities were identified in the application.

7. ALTERNATE OPERATING SCENARIOS

No alternate operating scenarios were proposed by the applicant.

8. PROJECT EMISSIONS

Emissions from the facility were estimated by using the solvent consumption of the washer/dryer, the chemical make-up of the solvent, and the recent past history of the amount of clothing laundered at the facility. HHH consumes 1 gallon of solvent for every 1,000 pounds of clothes laundered. The MSDS and product bulletin from the manufacturer of the solvent did not contain any information on the composition of the cleaning fluid. As such, it is assumed that the cleaning fluid (density of 6.8 lbs/gal) is 100 percent VOCs. The facility launders approximately 120,000 pounds of clothes per annum. VOCs will be the only pollutant emitted from this facility. The estimated VOC emission is:

$$120,000 \text{ lbs of clothes} * [1 \text{ gal}/1,000 \text{ lbs of clothes}] * [6.8 \text{ lbs VOC}/\text{gal}] = 816 \text{ lbs VOC}/\text{yr}$$

Note: The estimated emissions are conservative as the analysis assumes that the cleaning fluid is 100 percent VOCs. Actual emissions from the facility should be less than the estimated 816 pounds per year.

9. AIR QUALITY ASSESSMENT

No ambient air quality analysis is required for the following reasons:

1. Emission sources from this facility are considered area sources.
2. The petroleum dry cleaning operations generate only fugitive emissions of VOC.
3. There is no ambient air quality standard for VOC.

10. SIGNIFICANT PERMIT CONDITIONS

Solvent purchase receipts, showing the supplier, solvent name, VOC content, date of delivery, and amount (gallons) of solvent delivered to the site shall be maintained. Solvent VOC content may be demonstrated by providing the MSDS for the solvent purchased and received.

Reason: For purposes of monitoring/annual emissions reporting.

This new significant permit condition is incorporated into the renewed permit. All other significant conditions remain the same as in the permit issued on October 2, 2007.

11. CONCLUSION AND RECOMMENDATION

Recommend issuance of the renewal for the covered source permit subject to the incorporation of the significant permit conditions, thirty (30) day public comment period and forty-five (45) day EPA review.