United States Environmental Protection Agency
Region 10, Office of Air, Waste and Toxics
AWT-107
1200 Sixth Avenue
Seattle, Washington 98101

Permit Number: R10T5030000
Issued: June 22, 2007
Effective: June 22, 2007
Expiration: June 22, 2012
AFS Plant I.D. Number: 53-077-00076

Statement of Basis
Title V Air Quality Operating Permit

Permit Writer: Pat Nair

Amtech Corporation

Yakama Reservation
Wapato, Washington

Purpose of Permit and Statement of Basis

Title 40 Code of Federal Regulations Part 71 establishes a comprehensive air quality operating permit program under the authority of Title V of the 1990 amendments to the federal Clean Air Act. The air quality operating permit is an enforceable compilation of all of the applicable air pollution requirements that apply to an existing affected air emissions source. The permit is developed via a public process, may contain additional new requirements to improve monitoring of existing requirements, and contains procedural and prohibitory requirements related to the permit program itself. The permit is valid for 5 years and may be renewed.

This document, the statement of basis, summarizes the legal and factual basis for the permit conditions in the air quality operating permit to be issued to Plummer Forest Products, Inc. (referred to herein as PFP, facility, source, or permittee). Unlike the air quality operating permit, this document is not legally enforceable. This statement of basis summarizes the emitting processes at the facility, air emissions, permitting and compliance history, the statutory or regulatory provisions that relate to the subject facility, and the steps taken to provide opportunities for public review of the permit. The permittee is obligated to follow the terms of the permit. Any errors or omissions in the summaries provided here do not excuse the permittee from the requirements of the permit.

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Abbreviations and Acronyms

Btu	British thermal units
^{o}C	Celsius degrees
CAA	Clean Air Act [42 U.S.C. section 7401 et seq.]
CAM	Compliance assurance monitoring
CFR	Code of Federal Regulations
CO	Carbon monoxide
EPA	United States Environmental Protection Agency (also U.S. EPA)
FARR	Federal Air Rules for Reservations
FR	Federal Register
gal	Gallon
gr/dscf	Grains per dry standard cubic foot (7,000 grains = 1 pound)
HAP	Hazardous air pollutant
hr	Hour
^{o}K	Kelvin degrees
lb	Pound
M	One thousand
MACT	Maximum Achievable Control Technology
Mg	Megagram
MM	One million
mo	Month
MSDS	Material safety data sheet
NESHAP	National Emission Standards for Hazardous Air Pollutants (Title 40 CFR Parts 61 and 63)
NOx	Nitrogen oxides
NOMA	Notice of MACT Approval
PM	Particulate matter
PM2.5	Particulate matter less than or equal to 2.5 microns in aerodynamic diameter
PM10	Particulate matter less than or equal to 10 microns in aerodynamic diameter
ppm	Parts per million
PSD	Prevention of significant deterioration
psia	Pounds per square inch absolute
PTE	Potential to emit
SO_2	Sulfur dioxide
tpy	Tons per year
VMT	Vehicle miles traveled
VOC	Volatile organic compound

1. EPA Authority to Issue Title V Permits

On July 1, 1996, EPA adopted regulations (see 61 Federal Register (FR) 34202) codified at 40 Code of Federal Regulations (CFR) Part 71 setting forth the procedures and terms under which the Agency would administer a federal operating permit program. These regulations were updated on February 19, 1999 (64 FR 8247) to incorporate EPA's approach for issuing federal operating permits to affected stationary sources in Indian Country.

As described in 40 CFR 71.4(a), EPA will implement a Part 71 program in areas where a state, local, or Tribal agency has not developed an approved Part 70 program. Unlike states, Indian Tribes are not required to develop operating permit programs, though EPA encourages Tribes to do so. See, for example, Indian Tribes: Air Quality Planning and Management (63 FR 7253, February 12, 1998) (also known as the "Tribal Authority Rule"). Therefore, within Indian Country, EPA will administer and enforce a Part 71 federal operating permit program for stationary sources until the governing Indian Tribe receives EPA's approval to administer its own operating permit program.

2. The Yakama Reservation

The Amtech Corporation facility is located on the Yakama Reservation in central Washington. The Yakama Reservation was established by the Treaty of 1855, which ultimately brought the 14 confederated tribes together onto the reservation. The Yakama Reservation comprises approximately 1.4 million acres located just east of the Cascades in central Washington. Members of the Confederated Tribes and Bands of the Yakama Nation and the Yakama Reservation are governed by the Yakama Nation Tribal Council.

Reservation:	Yakama Reservation P.O. Box 151 Toppenish, Washington 98948 Phone: 509-865-5121
Tribal Leader:	Lavina Washines, Chairwoman Yakama Nation Tribal Council
Tribal Contact:	Moses Squeochs, Program Manager Yakama Nation Environmental Management Program P.O. Box 151 Toppenish, WA 98948 Phone: 509-865-5121 ext 4659 Email: mose@yakama.com

3. Facility Information

The facility is privately-owned and is not owned by the Tribe. The Tribe owns the land and the buildings, which are leased to Amtech.

3.1 Location

The Amtech Corporation facility is located just north of Wapato, Washington, and immediately east of Highway 97. The facility is within the outer boundaries of the Yakama Reservation.

3.2 Local Air Quality and Attainment Status

The Yakama Reservation is in attainment with the national ambient air quality standards or is unclassifiable. The subject facility is not located in a designated nonattainment area. With respect to

prevention of significant deterioration (PSD) impact evaluation, the majority of the reservation is classified as Class II lands, except for a small portion in the western part of the reservation, located within the boundary of the Mt. Adams National Wilderness Area, which is designated as Class I.

3.3 General Description of Operations and Products

The AMTECH Wapato plant produces a number of custom components for military, industrial and commercial products such as recreational vehicle motor home parts, spas, military vehicle hard tops, bus parts, lavatory bath modules, food storage components for mobile food service vehicles and industrial lift parts. The types of products made at AMTECH vary with market demands. The process involves fabrication of products from liquid polyester resin reinforced with glass fibers and extended with various inorganic filler materials. The composite materials are often referred to as fiberglass-reinforced plastic (FRP) or fiberglass. Custom FRP products manufacturing requires the use of more types of resins and gel coats than what is used in an assembly line FRP products manufacturing plant such as those plants that only manufacture one or two products like tubs and showers.

The Wapato facility currently conducts the following operations that have the potential to emit regulated air pollutants:

1. Open molding and resin mixing operations;
2. Cleaning of equipment used in open molding and resin mixing operations;
3. Resin storage tank;
4. Material storage (storage of resin and other materials in open or partially-open containers);
5. Repair operations on manufactured parts and on molds;
6. Painting of fiberglass, plastic and metal parts inside a spray booth;
7. Closed mold operations (resin transfer molding);
8. Vacuum infusion (a closed mold operation);
9. Vacuum forming;
10. Application of spa foam;
11. Support activities (grinding and sanding of manufactured parts, woodshop, painting of fiberglass, plastic and metal parts outside a spray booth, and maintenance activities);
12. Plant traffic; and
13. Combustion devices – natural gas-fired heaters and make-up air units:
    a) Heater, for paint booth, 1.5 MMBtu/hr.
    b) Make-up air unit, lamination area, 2.527 MMBtu/hr;
    c) Make-up air unit, future lamination, 1.775 MMBtu/hr;
    d) Make-up air unit, lamination area, 1.5552 MMBtu/hr;
    e) Make-up air unit, gelcoat area, 1.5552 MMBtu/hr;
    f) 5 space heaters, general plant, 230,000 Btu/hr each;
    g) 3 space heaters, general plant, 300,000 Btu/hr each;
    h) 2 space heaters, lunch room, 140,000 Btu/hr each; and
    i) 2 space heaters, offices, 100,000 Btu/hr each.

The facility standard industrial classification (SIC) code is: 3089 Plastic Products, Not Elsewhere Classified.

3.4 Emission Units and Emission Generating Activities

The activities described in Section 3.3 have been grouped logically into emission units. Table 3-1 lists and describes the emission units and control devices at the facility. Those control devices that are required by rule or this permit are so noted.

Table 3-1
Emission Units (EU) & Control Devices

EU ID #	Emission Unit Description	Control Device
WWWW	Fiberglass Operations: activities subject to 40 CFR Part 63, Subpart WWWW. This includes open molding operations, resin mixing, cleaning of equipment used in open molding and resin mixing operations, resin storage tank, material storage (storage of resin and other materials in open or partially-open containers), and repair operations on manufactured parts, and on molds and closed mold operations (resin transfer molding).	None.
PPPP	Fiberglass Coating Operations: activities subject to 40 CFR Part 63, Subpart PPPP. This consists of coating of fiberglass or plastic parts and products, surface preparation, cleaning, mixing and storage.	None.
MMMM	Fiberglass Coating Operations: activities subject to 40 CFR Part 63, Subpart MMMM. This consists of coating of miscellaneous metal parts and products, surface preparation, cleaning, mixing and storage.	None.
BLDG	Building: this emission unit comprises all air pollutant-emitting activities that are located inside the building. This includes, but is not limited to open molding operations, resin mixing, cleaning of equipment used in open molding and resin mixing operations, material storage (storage of resin and other materials in open or partially-open containers), repair operations on manufactured parts and on molds, closed mold operations (resin transfer molding, vacuum infusion molding), vacuum forming, application of spa foam, and support activities (grinding and sanding of manufactured parts, woodshop, painting of fiberglass, plastic and metal parts outside a spray booth, and maintenance activities). Combustion devices and activities conducted in the spray booth are not included in this emission unit.	Inside building
BOOTH	Spray Booth: this emission unit comprises all air pollutant-emitting activities conducted inside the spray booth. Combustion devices are not included in this emission unit.	Particulate filter[1]
COMB	Combustion Devices: combusting only natural gas, as listed below: 1. Heater, for paint booth, natural gas-fired, 1.5 MMBtu/hr; 2. Make-up air unit, lamination area, 2.527 MMBtu/hr; 3. Make-up air unit, lamination area, 1.775 MMBtu/hr. 4. Make-up air unit, lamination area, 1.5552 MMBtu/hr; 5. Make-up air unit, gelcoat area, 1.5552 MMBtu/hr; 6. 5 space heaters, general plant, 230,000 Btu/hr each; 7. 3 space heaters, general plant, 300,000 Btu/hr each; 8. 2 space heaters, lunch room, 140,000 Btu/hr each; and 9. 2 space heaters, offices, 100,000 Btu/hr each.	None
TNK	Resin Storage Tank	None
PT	Plant Traffic	None

[1] Required by Title V permit

40 CFR 71.5 (c)(11)(ii)(A) and (B) allow sources to separately list in the permit application such units or activities that qualify as "insignificant" (referred to as insignificant emission units (IEUs)). An emission unit or activity qualifies as an IEU if it is in an identified source category or if its potential emissions are below two tons/year for all regulated pollutants that are not listed as hazardous air pollutants ("HAP") under Section 112(b) and below 1000 lbs/year or the de minimis level established under Section 112(g), whichever is lower, for HAPs. However, a Title V permit application may not omit information needed to determine the applicability of, or to impose, any applicable requirement, or to calculate the permit fee. In

addition, activities or emission units that qualify as IEUs for the purpose of the Title V permit application are in no way exempt from applicable requirements or any requirements of the Title V permit. Amtech did not specifically request that any activity be treated as IEUs.

3.5 Permitting, Construction and Compliance History

Amtech Wapato commenced operations on May 13, 2002, in an industrial park just north of Wapato, WA. Facility operations are conducted in a building that purportedly housed a juice factory prior to Amtech's operations. Amtech Wapato does not hold any permits to construct for their facility.

In late 2001, Amtech applied for preconstruction authorization to comply with the preconstruction requirements of the Part 63 NESHAPs. On April 23, 2002, EPA issued a Notice of MACT Approval (NOMA) for the Amtech facility in Wapato. The NOMA contained compliance requirements for the fiberglass operations, in lieu of complying with Subpart WWWW which had not yet been promulgated. The NOMA continued to be effective, even after promulgation of 40 CFR Part 64 Subpart WWWW. However, on March 23, 2004, Amtech submitted a request that in part sought to withdraw the NOMA and incorporate the final Subpart WWWW requirements into their Title V permit (which had not yet been issued). On July 8, 2005 EPA issued a letter rescinding the NOMA and directing Amtech to comply with the requirements of Subpart WWWW.

EPA inspected Amtech Wapato in August 2003 and the subsequent inspection report indicated the source was operating in compliance. The facility was also inspected on June 8, 2005. Although there were a couple of minor follow-up items (Title V fees not paid, and deficient annual report), the source was operating in compliance. The facility has since addressed these items.

On October 3, 2005, EPA received an application from Amtech Corporation requesting emission limits on hazardous air pollutant (HAP) emissions and on volatile organic compound (VOC) emissions. Amtech later withdrew their request for a HAP limit. AMTECH requested the VOC limit in order to establish itself as a minor source of VOC emissions for the Prevention of Significant Deterioration (PSD) program. EPA reviewed the request for a VOC limit and on April 12, 2006, issued a Non-Title V Operating Permit establishing a VOC emission limit and providing for monitoring, recordkeeping and reporting.

The list below provides a summary of the chronology of Amtech's permit history:

November 1, 2001	Amtech applied for NESHAP preconstruction authorization.
April 23, 2002	EPA issued a NOMA.
May 13, 2002	Amtech commenced operations.
December 31, 2002	EPA received Amtech's initial Title V application
March 23, 2004	Amtech submitted a request to withdraw the NOMA.
June 3, 2005	EPA sent a letter requiring Title V application update for Federal Air regulations for Reservations (FARR).
July 8, 2005	EPA rescinded the NOMA and required compliance with Subpart WWWW.
August 22, 2005	EPA received Amtech's updated Title V application
October 3, 2005	EPA received application for a Non-Title V Operating Permit.
April 12, 2006	EPA issued a Non-Title V Operating Permit establishing a VOC emission limit.

4. Emission Inventories and Fee Payment

4.1 Emission Inventory for Amtech

Amtech submitted emission summaries of actual and PTE emissions with its original Title V permit application. Amtech has since supplemented and revised the emission inventory in a subsequent submittal to reflect facility changes and to respond to EPA's initial questions. EPA reviewed Amtech's source lists

and emission summaries in connection with drafting the permit. In many instances, EPA revised the emission estimates provided by Amtech in their application and subsequent submittal to more accurately reflect the emissions from the facility. Details of the emission estimations are provided in Appendix A to this statement of basis.

It is EPA's expectation that Amtech will use the emission estimating techniques set forth in Appendix A unless Amtech has other information showing why another technique more accurately represents its emissions. It is important to emphasize that to the extent Amtech relies on any type of emission control technique (e.g. road watering or sweeping, etc.) to estimate emissions used to determine annual fees or the applicability of a regulatory program, use of the technique must be fully documented and verifiable.

Equation 4-1 represents the basic technique for estimating emissions (in tons per year) of VOC from the use of coatings:

$$E = \sum_{i=1}^{i=n} Q_i \times D_i \times F_i / 2000 \qquad \text{(Equation 4-1)}$$

Where:

E = pollutant emissions in tons/year.
Q_i = total volume of coating i used during the year (coating includes thinners, cleaners and additives), in gallons.
D_i = density of coating i, in lbs/gallon.
F_i = mass fraction of VOC in coating i.
n = number of coatings.

Equation 4-2 represents the basic technique for estimating emissions (in tons per year) of particulate emissions from the use of coatings:

$$E = \sum_{i=1}^{i=n} Q_i \times D_i \times F_i \times (1\text{-}TE) \times (1\text{-}CE) / 2000 \qquad \text{(Equation 4-2)}$$

Where:

E = pollutant emissions in tons/year.
Q_i = total volume of coating i used during the year (coating includes thinners, cleaners and additives), in gallons.
D_i = density of coating i, in lbs/gallon.
F_i = mass fraction of solids in coating i.
TE = transfer efficiency, mass fraction.
CE = control efficiency, mass fraction.
n = number of coatings.

Equation 4-3 represents the basic technique for estimating emissions (in tons per year) from all other pollutant-emitting activities at the facility:

$$E = EF \times OP / 2000 \qquad \text{(Equation 4-3)}$$

Where:

E = pollutant emissions in tons/year
EF = emission factor (see Appendix B)
OP = recorded actual annual operational parameter

Equation 4-3 relies on an emission factor and an operational parameter that is multiplied by the emission factor. For example, emission factors for the combustion devices are based on heat input (fuel) to the devices. Amtech will need to track the relevant operational parameters for each activity in order to

derive its actual and potential emissions. Note that these emission factors may be improved over time. Note also that the techniques presented are generally appropriate for estimating actual as well as potential emissions; however, actual emissions reflect actual operational data whereas potential emissions reflect the maximum operations or capacity of the emission unit. Actual emissions are reported annually for both Title V and the FARR, and form the basis for calculating fees, while potential emissions are generally used to determine the applicability of air pollution control requirements and programs.

The emission factors for paved and unpaved roads must be calculated using site-specific information. See the reference documents for those estimation techniques (cited in Appendix A) for a more complete description. All of the techniques and site-specific parameters and assumptions should be reviewed each year before estimating emissions to be sure they remain appropriate.

4.2 Potential to Emit (PTE) for Amtech

The potential to emit (PTE) air pollutants for a facility is used to determine applicability to several EPA programs, including Title V, PSD and Section 112. Amtech's PTE is based on information in their original application (and in a supplementary submittal) and on EPA's review of Amtech's sources and emission summaries. A summary of Amtech's PTE is presented below in Table 4-1 and reflects the emission estimates presented in the emission inventory (see Appendix A).

Table 4-1
Facility Potential to Emit for PSD, Title V, and Section 112 in Tons per Year

	Air Pollutants[1] CO - carbon monoxide; NOx – oxides of nitrogen; PM - particulate matter; PM10 - particulate matter with diameter 10 microns or less; SO2 - sulfur dioxide; VOC - volatile organic compounds; HAP - hazardous air pollutants [see Clean Air Act, Section 112(b)]								
EU ID #	**CO**	**Lead**	**NOx**	**PM**	**PM10**	**SO2**	**VOC**	**HAP**	**Styrene**
WWWW[2]	-	-	-	-	-	-	-	> 25[3]	> 10[3]
PPPP[4]	-	-	-	-	-	-	-	See below[5]	See below[5]
MMMM[4]	-	-	-	-	-	-	-	See below[5]	See below[5]
BLDG	0	0	0	133[7]	133[7]	0	See below[6]	See below[5]	See below[5]
BOOTH	0	0	0	26[7]	26[7]	0	See below[6]	See below[5]	See below[5]
COMB	4	0	5	<1	<1	<1	See below[6]	See below[5]	See below[5]
TNK	0	0	0	0	0	0	See below[6]	See below[5]	See below[5]
PT	0	0	0	9	2	0	0	0	0
TOTAL:	4	0	5	142	135	<1	249	> 25	> 10

[1] Emissions for each emission unit and for totals have been rounded to the nearest ton per year
[2] Emissions of criteria pollutants from this emission unit are reported under EU BLDG
[3] Emissions of HAPs can vary based on types of gelcoat or resin used. However, it is certain that the facility's PTE exceeds the major source thresholds for both a single HAP and in aggregate.
[4] Emissions of criteria pollutants from this emission unit are reported under EU BOOTH
[5] Emissions of HAPs can vary based on types of coatings and other materials that might be used. The ratio of usage of these materials can change dramatically as materials usage is managed to remain below the VOC emission cap.
[6] Emissions of VOC can vary considerably based on material usage. Facility has an emission cap.
[7] Emissions of PM/PM10 from these two emission units are based on maximum usage of one emission unit with the other not operating. Consequently, PTE should be the maximum of these two values, not the sum.

PTE means the maximum capacity of Amtech to emit any air pollutant (criteria or HAPs) under its physical and operational design. Any physical or operational limitation on the maximum capacity of Amtech to emit an air pollutant, including air pollution control equipment and restrictions on hours of

operation or on the type or amount of material combusted, stored, or processed, may be treated as part of its design if the limitation or the effect it would have on emissions is enforceable by EPA. PTE is meant to be a worst case emission calculation and is used in many, though not all, cases to determine the applicability of federal requirements.

For this facility, several operational practices or circumstances contribute to lower the PTE for certain emission units. To the extent that these practices or circumstances are practically enforceable, they are accounted for in the PTE calculations. For the spray booth, the filters are necessary to remain in compliance with both the visible emission and particulate matter emission standards of the FARR. The permit contains enforceable provisions to require the use of this control technology whenever the spray booth is in operation. As a result, the emission inventory reflects the operation of the controls in determining the spray booth's PTE.

Actual emissions may be much lower than PTE. For example, many of the emission estimates in Appendix A are calculated based on 24-hours per day operation of the facility whereas the Amtech facility does not normally operate 24 hours per day.

PTE estimates for this facility are difficult to estimate because of the VOC emission cap that allows for tremendous facility flexibility in materials usage. Consequently, the ratio of materials can vary significantly as well as the formulations of each material used. As a result, it is only possible to estimate an outer bound for emissions of PM and PM10. Primarily because of the wide selection of coatings, gelcoats and resins that can be used, it is effectively impossible to estimate a PTE for HAPs. However, based on historical material usage, it is clear that this facility exceeds the 10 tons per year (tpy) and 25 tpy thresholds to be considered a major source of HAPs.

4.3 Fee Payments Based on Actual Annual Emissions

Amtech Wapato is required to pay fees annually based on an emissions inventory of its actual emissions for the preceding calendar year (see Permit Conditions 3.13 through 3.23, and Permit Condition 4.1). As discussed above, EPA has documented methods, techniques, and assumptions that EPA believes provide the most accurate basis for estimating emissions from the facility, including actual emissions for fee purposes and for emission reporting under the FARR. The techniques in Appendix A should be used to calculate annual emissions for fee purposes and for emission reporting under the FARR, unless Amtech has other information showing why another technique more accurately represents its emissions. Note that the actual emission estimates differ from the plant PTE because actual emission estimates reflect actual operations and emissions for a particular year and are determined in accordance with 40 CFR 71.9(c).

EPA notes that Amtech has an ongoing obligation to assure that all data in its application is correct and to notify EPA of any errors or omissions. Moreover, Amtech is required to certify to the accuracy and completeness of all data submitted to EPA, including the accuracy of its annual emission inventory for fee purposes.

5. Regulatory Analysis and Permit Content

EPA is required by 40 CFR Part 71 to include in this Title V permit all emission limitations and standards that apply to the facility, including operational, monitoring, testing, recordkeeping and reporting requirements necessary to assure compliance. This section explains which air quality regulations apply to this facility and how those requirements are addressed in the permit.

A facility, or source, located in Indian Country may be subject to federal or tribal air quality regulations, but, as discussed above, is not subject to state air quality regulations. For air quality programs, the Yakama Tribe has not gone through the process of obtaining authorization to be treated in the same manner as States under 40 CFR §§ 49.6 and 49.7 (the Tribal Authority Rule) and obtaining approval of

air quality regulations as a "Tribal Implementation Plan." Therefore, any Tribal regulations are not federally enforceable, do not meet the definition of "applicable requirement" under 40 CFR Part 71, and are not included in Amtech Wapato's Title V permit.

EPA relied on information provided in Amtech's Title V permit application, and on supplementary information provided by Amtech to determine the requirements that are applicable to the Amtech facility. Each section of the permit is discussed below, providing the legal and factual basis for the requirements included in the permit. The permit is organized into 10 sections as follow:

Permit Section 1:	Source Information
Permit Section 2:	Standard Terms and Conditions
Permit Section 3:	Generally Applicable Requirements
Permit Section 4:	Facility-Specific Requirements
Permit Section 5:	Emission Unit WWWW – Fiberglass Operations
Permit Section 6:	Emission Unit PPPP – Fiberglass Coating Operations
Permit Section 7:	Emission Unit MMMM – Metal Coating Operations
Permit Section 8:	Emission Unit BLDG – Building
Permit Section 9:	Emission Unit BOOTH – Spray Booth
Permit Section 10:	Emission Unit COMB – Combustion Devices

5.1 Permit Section 1 – Source Information

This permit section contains a summary description of emission units at the facility.

5.2 Permit Section 2 – Standard Terms and Conditions

This permit section includes generic compliance terms that are required in all Title V permits. The permittee does not need to annually certify compliance (see Permit Conditions 3.4 and 3.5) with the provisions in this permit section. However, consistent with Permit Condition 3.5.2, if a permittee is aware of any information that indicates noncompliance, that information must be included in the annual compliance certification.

Of particular note, Permit Conditions 2.4 and 2.5 address a general permit shield which states that compliance with the permit is deemed compliance with the applicable requirements listed in the permit. Amtech did not request a specific permit shield for any specific requirement excluded from this permit and none is being granted. Amtech is responsible for complying with any applicable requirements that exist but have not been included in the permit.

Permit Conditions 2.16 through 2.20 address the expiration of the permit and the actions by Amtech that are necessary to renew the permit. It is important to note that, if Amtech does not submit a complete and timely renewal application, Amtech's right to operate is terminated.

5.3 Permit Section 3 – Generally Applicable Requirements

This permit section also includes compliance terms that are required in all Title V permits. For the permit conditions contained in this permit section, the permittee must annually certify compliance (see Permit Conditions 3.4 and 3.5) with the provisions in this permit section.

Forms for the annual compliance certifications may be obtained on the internet at: http://www.epa.gov/air/oaqps/permits/p71forms.html.

This permit section includes requirements for payment of fees and for submittal of an annual emission inventory. Permit Condition 3.13 specifies the specific date by which PFP must pay their fees each year. Note that the per-ton fee rate varies each year so the permittee should contact EPA to obtain the current

PPPP Requirement	Permit Condition	Comments
63.4530	6.15, 6.16, 6.17	Recordkeeping. Does not include recordkeeping for compliance option with add-on controls.
63.4531	6,18, 6.19	Additional recordkeeping requirements.
63.4540	6.5, 6.6, 6.12, 6.13	For compliant material option, requirement to use procedures from 63.4541. Specification for initial compliance period.
63.4541	6.3, 6.5, 6.6, 6.16, 6.18, 6.19, 6.23	For compliant material option, initial demonstration of compliance with emission limits.
63.4542	6.6, 6.14, 6.16, 6.18, 6.19, 6.26	For compliant material option, continuous demonstration of compliance with emission limits.
63.4550	6.5, 6.7, 6.12, 6.13	For emission rate without add-on controls option, requirement to use procedures from 63.4541. Specification for initial compliance period.
63.4551	6.3, 6.5, 6.7, 6.16, 6.18, 6.19, 6.23	For emission rate without add-on controls option, initial demonstration of compliance with emission limits.
63.4552	6.7, 6.14, 6.16, 6.18, 6.19, 6.26	For emission rate without add-on controls option, continuous demonstration of compliance with emission limits.
63.4560		Performance tests and compliance demonstrations for emission rate with add-on controls option - Amtech will not be using controls
63.4561		Demonstrating initial compliance for emission rate with add-on controls option - Amtech will not be using controls
63.4562		Reserved - no content.
63.4563		Demonstrating continuous compliance for emission rate with add-on controls option - Amtech will not be using controls
63.4564		General requirements for performance tests - emission rate with add-on controls option - Amtech will not be using controls
63.4565		Determining emission capture system efficiency - emission rate with add-on controls option - Amtech will not be using controls
63.4566		Determining the add-on control device emission destruction or removal efficiency - emission rate with add-on controls option - Amtech will not be using controls
63.4567		Establishing the emission capture and add-on control device operating limits during the performance test - emission rate with add-on controls option - Amtech will not be using controls
63.4568		Requirements for continuous parameter monitoring systems - emission rate with add-on controls option - Amtech will not be using controls
63.4580		Information on who implements and enforces this subpart - no conditions necessary.
63.4581		Definitions - no conditions necessary
Table 1		Emission rate with add-on controls option - Amtech will not be using controls
Table 2	Multiple conditions	Applicability of Subpart A to Subpart PPPP sources – see Table 5-4 in this document.
Table 3		Default organic HAP mass fraction for solvents and solvent - no specific action required - Table will be referenced as needed from other conditions.
Table 4		Default organic HAP mass fraction for petroleum solvent - no specific action required - Table will be referenced as needed from other conditions.

PPPP Requirement	Permit Condition	Comments
Appendix A		Determination of weight volatile matter content and weight solids content of reactive adhesives

Sources that are subject to a NESHAPs (or MACT) such as 40 CFR Part 63, Subpart PPPP are also subject to some of the requirements of the general provisions of 40 CFR Part 63, i.e. Subpart A. The applicability of the various sections of Subpart A is specified in Subpart PPPP. Table 5-4 details how the various requirements of Subpart A were addressed in the permit.

Table 5-4
Applicability of 40 CFR Part 63, Subpart A
to Amtech Corporation, Wapato (for Subpart PPPP)

Subpart A Requirement	Permit Condition	Comments
63.1(a)(1)-(14)		General applicability requirements - no conditions necessary.
63.1(b)(1)-(3)		General applicability requirements - no conditions necessary.
63.1(c)(1)		Requires owner of a Part 63 source to comply with the provisions of Subpart A as identified in each Subpart - no conditions necessary.
63.1(c)(2)-(3)		This source is already getting a Title V permit - no conditions necessary.
63.1(c)(4)-(5)		This source is not an area source - no conditions necessary.
63.1(e)		The source has not made such a request.
63.2		Definitions - no conditions necessary.
63.3(a)-(c)		Units and abbreviations - no conditions necessary.
63.4(a)(1)-(5)	6.9	(2) - requiring MR&R is duplicative of requirements that exist in the Subpart.
63.4(b)-(c)		Conditions to address circumvention are not necessary as pollutant of concern is organic HAP rather than visible emissions. It is unlikely that this facility could be effectively fragmented, and so, no condition necessary.
63.5(a)		Informative language - no conditions necessary.
63.5(b)(1)-(6)	6.10, 6.11	(b)(3)(i) applicable to original install, i.e. new source, and (b)(3)(ii) applies to future reconstructions. 63.5(b)(6) is reflected in Condition 6.12. No conditions necessary for others.
63.5(d)		Application for approval of construction. Amtech did this in 2004. No conditions necessary.
63.5(e)		This piece addresses EPA actions in reviewing the approval. No conditions necessary.
63.5(f)		Addresses using State preconstruction review processes to satisfy these preconstruction reviews - does not apply as there is no State air quality jurisdiction over Amtech.
63.6(a)		General applicability requirements - no conditions necessary.
63.6(b)(1)-(7)		Since source is being installed after the PPPP effective date (4-19-04) (1) does not apply. The permit requires immediate compliance with PPPP and A, so (2) is satisfied. (3) does not apply since source is being constructed after the effective date. (4) does not apply as there is no 112(f) standard. Since (3) and (4) do not apply, neither does (5). (6) does not exist. (7) addresses area sources.
63.6(c)(1)-(5)		This applies to existing sources.
63.6(e)(1)-(2)	6.8	Requirements to operate and maintain equipment. Provisions for startup, shutdown and malfunction do not apply to a coating operation where no add-on controls are being used and where emissions are calculated based on a mass balance.

Subpart A Requirement	Permit Condition	Comments
63.6(e)(3)		Provisions for startup, shutdown and malfunction. Do not apply to a coating operation where no add-on controls are being used.
63.6(f)(1)	6.3	Compliance with nonopacity emission standards - essentially all the time since any startup, shutdown or malfunction does not affect Amtech's ability to comply with the emission limitation.
63.6(f)(2)-(3)		Addresses how EPA will determine compliance - no action items for Amtech.
63.6(g)(1)-(3)		Use of an alternative nonopacity emission standard - does not apply to Amtech.
63.6(h)		Compliance with opacity and visible emission standards. PPPP contains no opacity or VE standards, and so no conditions are necessary.
63.6(i)(1)-(16)		Extension of compliance with emission standards. This scenario does not apply to Amtech.
63.6(j)		Exemption from compliance with emission standards by the President. This scenario does not apply to Amtech.
63.7(a)(1)		General applicability requirements - no conditions necessary.
63.7(a)(2)		63.7 addresses performance tests, which apply to the emission rate with add-on controls option - Amtech will not be using this option.
63.7(a)(3)		Addresses EPA authority to require performance testing under Section 114. No conditions necessary.
63.7(b)-(e)		63.7 addresses performance tests, which apply to the emission rate with add-on controls option - Amtech will not be using this option.
63.7(f)		63.7 addresses performance tests, which apply to the emission rate with add-on controls option - Amtech will not be using this option.
63.7(g)-(h)		63.7 addresses performance tests, which apply to the emission rate with add-on controls option - Amtech will not be using this option.
63.8(a)(1)-(3)		63.8 contains requirements for CMS required under PPPP- Amtech is not required to have a CMS, so no conditions are necessary.
63.8(a)(4)		See above
63.8(b)		See above
63.8(c)(1)-(3)		See above
63.8(c)(4)		See above
63.8(c)(5)		See above
63.8(c)(6)		See above
63.8(c)(7)		See above
63.8(c)(8)		See above
63.8(d)-(e)		See above
63.8(f)(1)-(5)	6.21	See above
63.8(f)(6)		See above
63.8(g)(1)-(5)		See above
63.9(a)-(d)	6.22	No conditions necessary for (a); condition for initial notification (b); (c) extension of compliance and (d) special compliance requirements are not applicable to Amtech.
63.9(e)		Notification of performance test not applicable to Amtech
63.9(f)		Notification of opacity and VE observations not applicable to Amtech under MACT.
63.9(g)(1)-(3)		Additional notification for sources with continuous monitoring systems - not applicable to Amtech.
63.9(h)	6.23, 6.24	Notification of compliance status
63.9(i)		Adjustments to time periods or postmark deadlines - no conditions necessary.
63.9(j)	6.25	Change in information provided

Subpart A Requirement	Permit Condition	Comments
63.10(a)		(1) is general applicability langiuage; (2) applies to an extension of compliance; (3) -(5) apply to State implementations; (6) and (7) apply to coordinated reporting requested by the applicant - no conditions necessary.
63.10(b)(1)	6.18, 6.19	Additional recordkeeping requirements - records retention.
63.10(b)(2) (i)-(v)		Additional recordkeeping requirements for maintenance of monitoring equipment (Amtech has none to comply with PPPP), and for startup, shutdown and malfunction. No conditions necessary.
63.10(b)(2) (vi)-(xi)		No conditions necessary for requirements pertaining to CMS, performance testing, CEMS.
63.10(b)(2) (xii)		Requirement to maintain any information demonstrating whether Amtech is meeting the requirements of a waiver under (f) - does not apply.
63.10(b)(2) (xiii)		No conditions necessary for requirements pertaining to CMS.
63.10(b)(2) (xiv)	6.20	Requirement to maintain all documentation supporting initial notifications and notifications of compliance status under 63.9.
63.10(b)(3)		Applies if Amtech determines that PPPP does not apply - not the case.
63.10(c) (1)-(6)		Additional recordkeeping requirements for sources with CMS - PPPP does not require a CMS of Amtech.
63.10(c) (7)-(8)		Additional recordkeeping requirements for sources with CMS - PPPP does not require a CMS of Amtech.
63.10(c) (9)-(15)		Additional recordkeeping requirements for sources with CMS - PPPP does not require a CMS of Amtech.
63.10(d)(1)	6.22, 6.23, 6.24, 6.26	Redundant requirement to report as required under PPPP
63.10(d)(2)		Requirements regarding reporting of performance tests. Amtech is not required to conduct performance tests - no conditions necessary.
63.10(d)(3)		Requirements regarding reporting of opacity or visible emission observations. Amtech is not required to conduct these - no conditions necessary.
63.10(d)(4)		Requirements regarding submittal of progress reports as a condition of receiving an extension of compliance - does not apply to Amtech. No conditions necessary.
63.10(d)(5)		Reporting requirements for startup, shutdown and malfunction do not apply to a coating operation where no add-on controls are being used and where emissions are calculated based on a mass balance.
63.10(e) (1)-(2)		Additional reporting requirements for sources with CMS - PPPP does not require a CMS of Amtech.
63.10(e) (3)		Additional reporting requirements for sources with CMS - PPPP does not require a CMS of Amtech.
63.10(e) (4)		Additional reporting requirements for sources with COMS - PPPP does not require a COMS of Amtech.
63.10(f)		Requirements pertaining to waiver of recordkeeping or reporting - no conditions necessary.
63.11		Control device requirements - Amtech does not have control devices for compliance with PPPP. No conditions necessary.
63.12		State authority and delegations - no conditions necessary.
63.13		Addresses of State air pollution control agencies and EPA Regional Offices - no conditions necessary.
63.14		Incorporations by reference - no conditions necessary.
63.15		Requirements relating to availability of information and confidentiality. No conditions necessary.

5.7 Permit Section 7 – Emission Unit MMMM – Metal Coating Operations

40 CFR Part 63, Subpart MMMM establishes national emission standards for hazardous air pollutants for miscellaneous parts and products surface coating facilities. With the recent installation of a paint spray booth, Amtech has the capability to coat metal parts and products. At present, Amtech has no plans to coat enough metal parts and products to become subject to 40 CFR Part 63, Subpart MMMM. Consequently, the permit does not contain the requirements of this subpart.

However, as a custom manufacturer, it is conceivable that operations at the facility could change. This section of the permit contains a condition requiring recordkeeping on the use of coatings on metal parts and products. In the event that such coating use indicates applicability of 40 CFR Part 63, Subpart MMMM, the permittee is required to comply with the requirements of the subpart, as well as submit an application to amend this permit.

5.8 Permit Section 8 – Emission Unit BLDG – Building

This emission unit is a large building that houses all of the operations at the facility with the exception of coating and related operations (i.e. surface preparation, mixing and cleaning) that are conducted in the spray booth, and the resin storage tank. The building is considered an emission unit because emissions from the activities within the building are allowed to commingle and issue from the stacks, vents and openings on the building. The building is subject to certain requirements of the FARR. The permittee is required to submit a scale drawing of the building, identifying all stacks as defined in the FARR.

FARR - Limiting Visible Emissions: The building is subject to the requirements of 40 CFR 49.124 – Rule for Limiting Visible Emissions. The emission limit is specified in Permit Section 3 – Generally Applicable Requirements. The monitoring, recordkeeping and reporting for this requirement is the Plant Walkthrough monitoring regimen as specified in Permit Conditions 4.7 through 4.13.

FARR - Limiting the Emissions of Particulate Matter: Although the building is subject to the requirements of 40 CFR 49.125 – Limiting the Emissions of Particulate Matter, the nature of the operations and the existence of a building to cover the operations mean that emissions of PM are not expected, or are expected to be minimal. For these reasons, the permit contains no additional monitoring requirements.

5.9 Permit Section 9 – Emission Unit BOOTH – Spray Booth

This emission unit is a Spray Systems, Inc. T-1000 spray booth (with a Sharpe 975 HVLP gun) used to coat either manufactured fiberglass parts or metal parts. The spray booth abuts the facility building that houses all of the other operations at the facility. The spray booth is considered an emission unit because the activities within the booth result in the emission of air pollutants which are exhausted through a stack on the booth. Prior to release, air from within the booth is drawn through a bank of filters that serve to collect particulate matter. The booth is subject to certain requirements of the FARR. Gap filling monitoring requirements have been added to ensure compliance with the FARR requirements.

FARR - Limiting Visible Emissions: The booth is subject to the requirements of 40 CFR 49.124 – Rule for Limiting Visible Emissions. The emission limit is stated in Permit Section 3 – Generally Applicable Requirements. The monitoring, recordkeeping and reporting for this requirement is the Plant Walkthrough monitoring regimen as specified in Permit Conditions 4.6 through 4.13.

Since Amtech will be complying with this requirement by using the booth filters, the requirement to route all booth exhaust through the filters is included in this permit (Permit Condition 9.2) pursuant to 40 CFR 71.6(a)(1). To assure compliance with the visible emission limit, Permit Conditions 9.3 and 9.4 require that, pursuant to 40 CFR 71.6(a)(1), the pressure drop across the filters remains below 1.0 inches of water,

the filters be maintained in good operating condition and be in operation at any time that the booth is operated.

FARR - Limiting the Emissions of Particulate Matter: The spray booth is subject to the requirements of 40 CFR 49.125 – Limiting the Emissions of Particulate Matter. Estimated maximum PM emissions from the spray booth stack are calculated as follow:

- Sharpe 975 HVLP spray gun runs at 30-45 fluid ounces/minute with a 1.8 tip at 40 psi
  Spray gun data source: 6-16-2006 e-mail from Scott Barber, Amtech
- Maximum Coating Density: 13.29 lbs/gal (MSDS for DuPont Nason Tints, Toners and Binders)

- Weight of Coating Sprayed Calculation:
  45 fl oz/min /128 fl oz/gal * 13.29 lbs/gal = 4.67 lbs/min

- Maximum Solids Content (% by wt): 74.88 (MSDS for DuPont Nason Tints, Toners and Binders)
- Transfer Efficiency (%): 50 (Air Pollution Engineering Manual, 1992)
- Minimum Filter Control Efficiency (%): 93 (6-16-2006 e-mail from Scott Barber, Amtech)

- Emission Calculation:
  4.67 lb/min * .7488 * (1-0.5) * (1-0.93) = 0.122 lb/min

- Flowrate: 12,600 scfm (Spray Systems specifications for T-1000)

- PM Concentration Calculation:
  0.122 lb/min * 7,000 grains/lb = 854 gr/min
  854 gr/min / 12,600 dscfm = 0.067 gr/dscf

As shown in the calculations above, the maximum potential PM emissions from the spray booth, using conservative values for spray rate, density, solids content, transfer efficiency and control efficiency are expected to be approximately 0.067 gr/dscf, which is lower than the applicable FARR regulatory limit of 0.1 gr/dscf. EPA has determined that because of this margin of compliance, and the conservative calculations for particulate concentration, additional monitoring is not required.

Since, as for compliance with visible emission limits, Amtech will be relying on using the booth filters, the requirements to route the booth exhaust to the filters and maintain them are included in this permit (Permit Conditions 9.2, 9.3 and 5.4).

Compliance Assurance Monitoring (CAM) – 40 CFR Part 64: CAM applies to emission units subject to an emission limit with a pre-control potential to emit greater than the major source threshold defined in Title V (generally, 100 tons per year) and that use a control device to comply with the limit. All units that meet the CAM applicability criteria must be in compliance at permit renewal and may also be required to submit a CAM plan if a significant change is made to the unit prior to renewal. Because of the VOC limit on the facility, the spray booth throughput is effectively limited so that pre-control PM PTE is less than 100 tons per year. Consequently, although the emission unit is subject to PM limits and uses control equipment, the spray booth is not subject to CAM at this time. If, in the future, emission limits are changed to allow emission of more particulate matter, it is possible that the spray booth could be subject to CAM either at permit renewal or upon permit modification. No other pollutants emitted by the spray booth are both subject to a standard and controlled by a control device, so CAM does not apply to this emission unit for any other pollutants.

5.10 Permit Section 10 – Emission Unit COMB – Combustion Devices

This emission unit comprises all the combustion devices at the facility. All devices combust only natural gas:

1. Heater, for paint booth, 1.5 MMBtu/hr.
2. Make-up air units:
   a. Make-up air unit, lamination area, 2.527 MMBtu/hr;
   b. Make-up air unit, lamination area, 1.775 MMBtu/hr.
   c. Make-up air unit, lamination area, 1.5552 MMBtu/hr;
   d. Make-up air unit, gelcoat area, 1.5552 MMBtu/hr; and
3. Space heaters:
   a. 5 space heaters, general plant, 230,000 Btu/hr each;
   b. 3 space heaters, general plant, 300,000 Btu/hr each;
   c. 2 space heaters, lunch room, 140,000 Btu/hr each; and
   d. 2 space heaters, offices, 100,000 Btu/hr each.

These combustion devices are subject to the requirements of the FARR.

FARR - Limiting Visible Emissions: The combustion devices are subject to the requirements of 40 CFR 49.124 – Rule for Limiting Visible Emissions. The emission limit is specified in Permit Section 3 – Generally Applicable Requirements. The monitoring, recordkeeping and reporting for this requirement is the Plant Walkthrough monitoring regimen as specified in Permit Conditions 4.6 through 4.13.

FARR - Limiting the Emissions of Particulate Matter: The combustion devices are subject to the requirements of 40 CFR 49.125 – Limiting the Emissions of Particulate Matter. Combustion of natural gas in external combustion sources typically results in low particulate emissions. As these devices are all fired on natural gas, particulate matter emissions are expected to be well below the FARR standard. As an example, particulate emissions from a 1.552 MMBtu make-up air unit are calculated as follow:

- Emission factor: 1.9 pounds per million standard cubic feet (1.9 lb/MMscf)
  Emission factor source: AP-42, Section 1.4, July 1998, Table 1.4-6
- Natural gas heat content: 1020 Btu/scf
  Heat content source: AP-42, Section 1.4, July 1998, footnote to Table 1.4-6
- Maximum Fuel Usage
  1,552,000 Btu/hour * 1/1020 scf/Btu = 1522 standard cubic feet per hour (scf/hr)
- Emission Calculation:
  1.9 lb/MMscf * 1522 scf/hr * 1/1,000,000 = 0.0029 lb/hr

- F-factor: 8,710 dry standard cubic foot per million Btu (dscf/MMBtu)
  F-factor Source: 40CFR60, Appendix A, Method 19, Table 19-2

- Flowrate Calculation:
  1.552 MMBtu/hr * 8,710 dscf/MMBtu = 13,517 dscf/hr
  13, 517 dscf/hr (20.9/(20.9-7)) = 20,324 dscf/hr @ 7% O_2

- PM Concentration Calculation:
  0.0029 lb/hr * 7,000 grains/lb = 20.3 gr/hr
  20.3 gr/hr / 20,324 dscf/hr = 0.001 gr/dscf @ 7% O_2

As shown in the calculations above, the maximum potential PM emissions from the make-up air unit are expected to be approximately 0.001 gr/dscf @ 7% O_2, which is much lower than the applicable FARR regulatory limit of 0.1 gr/dscf @ 7% O_2. EPA has determined that because of this margin of compliance additional monitoring is not required.

FARR - Limiting Sulfur in Fuels: Pursuant to the requirements of 40 CFR 49.130, PFP is prohibited from using any fuel with a sulfur content in excess of 1.1 grams of sulfur per dry standard cubic meter of gaseous fuel (400 parts per million at standard conditions). The compliance assurance measures for this provision are contained in Permit Condition 4.4.

FARR - Limiting Emissions of Sulfur Dioxide: The combustion devices at this facility are subject to the requirements of 40 CFR 49.129 – Rule for Limiting Emissions of Sulfur Dioxide. As an example, SO_2 emissions from a 1.552 MMBtu make-up air unit are calculated as follow:

- Maximum Fuel Sulfur Content: 1.1 grams of sulfur per dry standard cubic meter
  Or 0.000069 lb/dscf
  Maximum Fuel Usage: 1522 standard cubic feet per hour (scf/hr)
- Emission Calculation thru Mass Balance:
  0.000069 lb S/dscf fuel * 1522 lb fuel/hour * 2 lb SO_2/S = 0.21 lb/hr

- F-factor: 8,710 dry standard cubic foot per million Btu (dscf/MMBtu)
  F-factor Source: 40 CFR Part 60, Appendix A, Method 19, Table 19-2
- Flowrate = 20,324 dscf/hr @ 7% O_2

- SO_2 Concentration Calculation:
  20,324 dscf/hr / 385 dscf/lbmol = 53 lbmol gas/hr
  0.21 lb/hr / 64 lb/lbmol = 0.003 lbmol SO_2/hr
  0.003 lbmol SO_2/hr / 53 lbmol gas/hr = 57 ppm

As shown in the calculations above, the maximum potential SO_2 emissions from the make-up air unit, based on the regulatory limit (40 CFR 49.130) of 1.1 grams of sulfur per dry standard cubic meter, are 57 ppm, which is less than the FARR regulatory limit of 500 ppm. Therefore, compliance is reasonably assured through compliance with the fuel sulfur limit in 40 CFR 49.130.

5.11 Emission Units Without Specific Requirements

The resin storage tank and plant traffic activities do not have emission unit-specific requirements. However, the permittee must comply with all standard terms and conditions, generally applicable requirements and facility-wide requirements as they apply to these activities. Emissions from these emission units should be included when calculating annual fees due.

5.12 PSD

Under the PSD program, 40 CFR 52.21, no "major stationary source" or "major modification" to a major stationary source can begin actual construction without first obtaining a PSD permit that meets the requirements of 40 CFR 52.21. In general, a major stationary source for purposes of the PSD program is a source with a PTE of more than 250 tons per year. During review and development of this permit, EPA has not drawn any conclusions regarding compliance with past permitting requirements for this facility. Therefore, no permit shield is implied or explicit for past new source review, PSD, or for any applicable requirement not specifically identified in the permit.

5.13 Other Federal Regulations

Under the Endangered Species Act (ESA), EPA is obligated to consider the impact that a federal project may have on listed species or critical habitats. It is EPA's conclusion that the issuance of this Title V permit for Amtech Corporation will not affect a listed specie or critical habitat because it does not authorize new emissions units, increase existing emission limits or impose any new work practice requirements. Therefore, no additional analysis and no additional requirements will be added to this permit for ESA reasons. EPA's no-effect determination concludes EPA's obligations under Section 7 of the ESA. (See Endangered Species Consultation Handbook: Procedures for Conducting Consultation and Conference Activities Under Section 7 of the Endangered Species Act, FWS and NMFS, March 1998, at Figure 1).

National Environmental Policy Act (NEPA) Review - Under Section 793(c) of the Energy Supply and Environmental Coordination Act of 1974, no action taken under the Clean Air Act shall be deemed a major Federal action significantly affecting the quality of the human environment within the meaning of the National Environmental Policy Act of 1969. This permit is an action taken under regulations implementing the Clean Air Act and is therefore exempt from NEPA.

National Historic Preservation Act (NHPA) – As noted earlier, the issuance of this Title V permit for Amtech Corporation does not authorize new emissions units, increase existing emission limits or impose any new work practice requirements. No changes to the facility are expected as a result of this permit action. Consequently, no adverse effects are expected, and further review under NHPA is not indicated.

6 Public Participation

6.1 Public Notice and Comment

As described in 40 CFR 71.11(a)(5), all draft operating permits must be publicly noticed and made available for public comment. The public notice of permit actions and public comment period is described in 40 CFR 71.11(d). There is a 30 day public comment period for actions pertaining to a draft permit.

For this permit action, the requirements of 40 CFR 71.11(a)(5) are satisfied as follow:

1. Publish public notice for this draft permit in a daily or weekly newspaper of general circulation in the area affected by this source;
2. Provide notice by mailing a copy of the public notice to the permit applicant, the affected state, the Tribal, city and county executives, and the local emergency planning authorities which have jurisdiction over the area where the source is located;
3. Provide a copy of the notice to all persons who submitted a written request to be included on EPA Region 10's mailing list for Title V permitting actions;
4. Making available, on the Region 10 website **[www.epa.gov/r10earth/ (once there, click on "Air")]**, a copy of the draft permit prepared by EPA, and the statement of basis for the draft permit;
5. Making available, at the Region 10 office and at the locations listed below, a copy of the draft permit prepared by EPA, the statement of basis for the draft permit, the application, and all supporting materials submitted by the source.

Yakima Valley Regional Library Wapato Branch 119 East 3rd Street Wapato, WA 98901 (509) 877-2882	Yakama Nation Library Yakama Nation Cultural Center Hwy 97 at Fort Road Toppenish, WA 98948 (509) 865-2800 ext. 6

The above process was followed in development of this draft permit.

6.2 Response to Public Comments Received

40 CFR 71.11(a)(5) contains requirements that apply after the draft permit is made available for public comment. These additional requirements must be satisfied prior to issuance of the final permit:

1. Accepting comments (submitted both electronically and via hard copy) on the draft permit, during the 30 day public comment period;
2. Considering all comments received during the public comment period and all comments made during a public hearing (if one is held) in arriving at a final decision on the permit.
3. Providing a statement of reasons for changes made to the draft permit and responses to comments received to persons who commented on the draft permit.

The public comment period for this permit action started on May 20, 2007 and concluded on June 20, 2007. No comments were received.

AMTECH CORPORATION, WAPATO
YAKAMA RESERVATION
TITLE V CRITERIA POLLUTANT EMISSION INVENTORY (PTE BASIS)
Summary of Facility Emissions

Sub-Total Emissions: Point Sources

Emission Unit	Emission Unit Description	Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC
WWWW[1]	Fiberglass Operations	0	0	0	0	0	0	0
PPPP[2]	Fiberglass Coating Operations	0	0	0	0	0	0	0
MMMM[2]	Metal Coating Operations	0	0	0	0	0	0	0
BLDG[3]	Building	0	0	0	133.18	133.18	0	< 249[4]
BOOTH[3]	Spray Booth	0	0	0	25.98	25.98	0	< 249[4]
COMB	Combustion Devices	3.71	0	4.74	0.06	0.36	0.01	< 249[4]
TNK	Resin storage tank	0	0	0	0	0	0	< 249[4]
	SUB-TOTAL:	3.71	0	4.74	133.24	133.54	0.01	249

Sub-Total Emissions: Fugitive Sources

Emission Unit	Emission Unit Description	Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC
PT	Plant Traffic	0	0	0	9.24	1.80	0	0
	SUB-TOTAL:	0	0	0	9.24	1.80	0	0

Total Emissions

Emission Unit	Emission Unit Description	Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC
WWWW[1]	Fiberglass Operations	0	0	0	0	0	0	0
PPPP[2]	Fiberglass Coating Operations	0	0	0	0	0	0	0
MMMM[2]	Metal Coating Operations	0	0	0	0	0	0	0
BLDG[3]	Building	0	0	0	133.18	133.18	0	< 249[4]
BOOTH[3]	Spray Booth	0	0	0	25.98	25.98	0	< 249[4]
COMB	Combustion Devices	3.71	0	4.74	0.06	0.36	0.01	< 249[4]
TNK	Resin storage tank	0	0	0	0	0	0	< 249[4]
PT	Plant Traffic	0	0	0	9.24	1.80	0	0
	TOTAL:	3.71	0	4.74	142.48	135.34	0.01	249

Footnotes

[1] Fiberglass Operations are conducted inside the facility building. Emissions related to these operations are included under the emissions attributed to the emission unit BLDG

[2] Fiberglass Coating Operations and Metal Coating Operations are conducted inside the spray booth. Emissions related to these operations are included under the emissions attributed to the emission unit BOOTH.

[3] PM/PM10 emissions from BLDG and BOOTH are presented as if each emission unit was operated at maximum capacity and the other unit was not operated. The facility PTE is based on the maximum of these values rather than the sum.

[4] Maximum emissions from each emission unit can vary, but are capped by a facility-wide emissions limit established in the 2006 Non-Title V Operating Permit.

YAKAMA RESERVATION
TITLE V CRITERIA POLLUTANT EMISSION INVENTORY (PTE BASIS)

Emission Unit: **BLDG**

Activity: **Gelcoat application**

Maximum Rating	Annual Operating Hours	Emission Factors, lb/ton							Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC	CO	Lead	NOx	PM	PM10	SO2	VOC
1,153 tons/year	NA				231	231						133.18	133.18		< 249[1]

Basis for rating:	VOC emission limit (established in Non-Title V Operating Permit):	EL =	249	tons/year
	Ratio of resin usage to gelcoat usage (Title V application supplemental, 8/18/2005):	R =	3.36	by weight
	Minimum styrene content of typical gelcoat (Ashland WGLE2652 WH MAXG ASCC GC):		22.00%	by weight
	Gelcoat styrene emission factor (40 CFR Part 63, Subpart WWWW, Table 1 atomized gelcoat):	EFg =	195.8	lb/ton
	Minimum styrene content of typical resin (Ashland AROPOL S 5606 T 38 B):		32.80%	by weight
	Resin styrene emission factor (40 CFR Part 63, Subpart WWWW, Table 1 non-atomized mech.)	EFr =	70.192	lb/ton

Maximum rating is calculated based on the maximum amount of gelcoat that can be sprayed while remaining below the 249-ton VOC emission limit:

Maximum rating = (EL x 2000) /(EFg +(R x EFr))

Basis for emission factors:	Minimum resin content of typical gelcoat (Ashland WGLE2652 WH MAXG ASCC GC):	1.00%	by weight
	Maximum solids content of typical gelcoat (based on resin and styrene content):	77.00%	by weight
	Transfer efficiency (Air Pollution Engineering Manual, Surface Coating, Table 2)	50%	
	Minimum control efficiency (i.e. building - estimated):	70%	
	All PM emissions are PM10		

This emission estimate assumes that resin and gelcoat application in the building comprise all VOC-emitting operations at the facility. If additional activities (e.g. coating operations in the spray booth) are also conducted, resin and gelcoat use will be lower in order to remain below the facility-wide VOC emissions limit.
PM/PM10 emissions from resin application assumed to be negligible.

[1] VOC emissions for this emission unit are variable based on project needs. The facility is subject to a facility-wide VOC emission limit.

AMTECH CORPORATION
YAKAMA RESERVATION
TITLE V CRITERIA POLLUTANT EMISSION INVENTORY (PTE BASIS)

Emission Unit: **BOOTH**
Activity: **Coating application**

Maximum Rating	Annual Operating Hours	Emission Factors, lb/gal							Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC	CO	Lead	NOx	PM	PM10	SO2	VOC
149,171 gal/year	NA				0.3483	0.3483						25.98	25.98		< 249[1]

Basis for rating:	Minimum VOC content of typical coating (DuPont Nason tints, toners and binders):	25.12%	by weight
	Maximum coating density of typical coating (DuPont Nason tints, toners and binders):	13.29	lbs/gal
	VOC emission limit (established in Non-Title V Operating Permit):	249	tons/year
Basis for emission factors:	Maximum coating density of typical coating (DuPont Nason tints, toners and binders):	13.29	lbs/gal
	Maximum solids content of typical coating (DuPont Nason tints, toners and binders):	74.88%	by weight
	Transfer efficiency (Air Pollution Engineering Manual, Surface Coating, Table 2)	50%	
	Minimum control efficiency (6/16/2006 e-mail from Scott Barber, Amtech):	93%	
	All PM emissions are PM10		

This emission estimate assumes that coating operations in the booth comprise all VOC-emitting operations at the facility. If additional activities (e.g. fiberglass operations) are also conducted, coating use in the spray booth will be lower in order to remain below the facility-wide VOC emissions limit.
This emission estimate assumes that proper use of the spray booth filters are federally enforceable requirements.

[1] VOC emissions for this emission unit are variable based on project needs. The facility is subject to a facility-wide VOC emission limit.

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Emission Unit: **COMB External Combustion Sources**

Activity: **Heater and make-up air units: in spray booth, lamination and gelcoat areas**
Manufacturer: **Various**

Maximum Rating	Annual Operating Hours	Emission Factors, lb/MMscf							Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC	CO	Lead	NOx	PM	PM10	SO2	VOC
1.50 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.54	0.00	0.64	0.01	0.05	0.00	0.04
2.53 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.91	0.00	1.09	0.02	0.08	0.01	0.06
1.56 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.56	0.00	0.67	0.01	0.05	0.00	0.04
1.56 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.56	0.00	0.67	0.01	0.05	0.00	0.04
1.78 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.64	0.00	0.76	0.01	0.06	0.00	0.04
Sub-Total:									3.21	0.00	3.83	0.06	0.29	0.01	0.22

Activity: **Space heaters: general plant, lunch room and offices**
Manufacturer: **Various**

Maximum Rating	Annual Operating Hours	Emission Factors, lb/MMscf							Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC	CO	Lead	NOx	PM	PM10	SO2	VOC
0.23 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.04	0.00	0.09	0.00	0.01	0.00	0.01
0.23 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.04	0.00	0.09	0.00	0.01	0.00	0.01
0.23 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.04	0.00	0.09	0.00	0.01	0.00	0.01
0.23 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.04	0.00	0.09	0.00	0.01	0.00	0.01
0.23 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.04	0.00	0.09	0.00	0.01	0.00	0.01
0.30 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.11	0.00	0.13	0.00	0.01	0.00	0.01
0.30 MMBtu/hr	8760	84	5.0E-04	100	1.9	7.6	0.6	5.5	0.11	0.00	0.13	0.00	0.01	0.00	0.01
0.14 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.02	0.00	0.06	0.00	0.00	0.00	0.00
0.14 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.02	0.00	0.06	0.00	0.00	0.00	0.00
0.10 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.02	0.00	0.04	0.00	0.00	0.00	0.00
0.10 MMBtu/hr	8760	40	5.0E-04	94	1.9	7.6	0.6	5.5	0.02	0.00	0.04	0.00	0.00	0.00	0.00
Sub-Total:									0.5	0.00	0.91	0	0.07	0.00	0.07

Basis for all ratings:Information provided by applicant in application supplementary materials for non-Title V operating permit
Average natural gas higher heating value: 1020 Btu/scf - AP-42 July 1998, footnote to Table 1.4-1
Sulfur content of natural gas: 2000 grains/MMscf - AP-42 July 1998, footnote to Table 1.4-2
CO factors: AP-42 July 1998, Table 1.4-1, residential furnaces, and small boilers, based on size
Lead factor: AP-42 July 1998, Table 1.4-2
NOx factors: AP-42 July 1998, Table 1.4-1, residential furnaces, and small boilers, based on size
PM factor: AP-42 July 1998, Table 1.4-2, filterable only
PM10 factor AP-42 July 1998, Table 1.4-2, PM total as all PM is assumed to be less than micron in diameter
SO2 factor: AP-42 July 1998, Table 1.4-2, based on sulfur content shown above
VOC factor: AP-42 July 1998, Table 1.4-2

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Emission Unit: **PT** **Plant Traffic**

Maximum Rating	Annual Operating Hours	Emission Factors, lb/VMT							Annual Emissions (tons per year)						
		CO	Lead	NOx	PM	PM10	SO2	VOC	CO	Lead	NOx	PM	PM10	SO2	VOC
912.5 VMT[1]	NA				5.2	1.0						2.36	0.46		
1460 VMT[2]	NA				9.3	1.8						6.82	1.33		
365 VMT[3]	NA				0.3	0.1						0.06	0.01		
								Sub-Total:				9.24	1.80		

Basis for rating: Applicant estimate - see 2/27/07 e-mail from applicant's consultant

1 Inbound trucks	GVWR:	27	tons		
	no. of annual trips:	1825		distance travelled:	0.5 miles
2 Outbound trucks	GVWR:	40	tons		
	no. of annual trips:	2920		distance travelled:	0.5 miles
3 Fork lifts	mean weight:	4.19	tons		
	no. of annual trips:	365		distance travelled:	1 miles

PM factor: AP-42 November 2006, Section 13.2.1, Paved Roads, Equation 1

E=k*(sL/2)^0.65*(W/3)^1.5 - C

W = mean vehicle weight (tons)

k = 0.082 lb/VMT

sL = 7.4 surface material silt content (g/m^2), value for municipal solid waste landfill from Table 13.2.1-4

C = 0.00047 lb/VMT

PM10 factor Same as for PM emission factor, except that

k = 0.016 lb/VMT