NPDES PERMIT

issued to

Ansonia Copper & Brass, Inc.
75 Liberty Street
Ansonia, CT 06401

Location Address:

75 Liberty Street
Ansonia, CT 06401

Facility ID: 002-002

Permit ID: CT0002968

Receiving Stream: Naugatuck River

Permit Expires: March 21, 2011

SECTION 1: GENERAL PROVISIONS

(A) This permit is reissued in accordance with section 22a-430 of Chapter 446k, Connecticut General Statutes ("CGS"), and Regulations of Connecticut State Agencies ("RCSA") adopted thereunder, as amended, and section 402(b) of the Clean Water Act, as amended, 33 USC 1251, et. seq., and pursuant to an approval dated September 26, 1973, by the Administrator of the United States Environmental Protection Agency for the State of Connecticut to administer an N.P.D.E.S. permit program.

(B) Ansonia Copper and Brass, Inc., ("Permittee") shall comply with all conditions of this permit including the following sections of the RCSA which have been adopted pursuant to section 22a-430 of the CGS and are hereby incorporated into this permit. Your attention is especially drawn to the notification requirements of subsection (i)(2), (i)(3), (j)(1), (j)(6), (j)(8), (j)(9)(C), (j)(10)(C), (j)(11)(C), (D), (E), and (F), (k)(3) and (4) and (l)(2) of section 22a-430-3.

Section 22a-430-3 General Conditions

(a)Definitions
(b)General
(c)Inspection and Entry
(d)Effect of a Permit
(e)Duty
(f)Proper Operation and Maintenance
(g)Sludge Disposal
(h)Duty to Mitigate
(i)Facility Modifications; Notification
(j)Monitoring, Records and Reporting Requirements
(k)Bypass
(l)Conditions Applicable to POTWs
(m)Effluent Limitation Violations (Upsets)
(n)Enforcement
(o)Resource Conservation
(p)Spill Prevention and Control
(q)Instrumentation, Alarms, Flow Recorders

(r)Equalization

Section 22a-430-4 Procedures and Criteria

(a)Duty to Apply
(b)Duty to Reapply
(c)Application Requirements
(d)Preliminary Review
(e)Tentative Determination
(f)Draft Permits, Fact Sheets
(g)Public Notice, Notice of Hearing
(h)Public Comments
(i)Final Determination
(j)Public Hearings
(k)Submission of Plans and Specifications. Approval.
(l)Establishing Effluent Limitations and Conditions
(m)Case by Case Determinations
(n)Permit issuance or renewal
(o)Permit Transfer
(p)Permit revocation, denial or modification
(q)Variances
(r)Secondary Treatment Requirements
(s)Treatment Requirements for Metals and Cyanide
(t)Discharges to POTWs - Prohibitions

(C) Violations of any of the terms, conditions, or limitations contained in this permit may subject the Permittee to enforcement action including, but not limited to, seeking penalties, injunctions and/or forfeitures pursuant to applicable sections of the CGS and RCSA.

(D) Any false statement in any information submitted pursuant to this permit may be punishable as a criminal offense under section 22a-438 or 22a-131a of the CGS or in accordance with section 22a-6, under section 53a-157b of the CGS.

(E) The authorization to discharge under this permit may not be transferred without prior written approval of the Commissioner. To request such approval, the Permittee and proposed transferee shall register such proposed transfer with the Commissioner, at least 30 days prior to the transferee becoming legally responsible for creating or maintaining any discharge which is the subject of the permit transfer. Failure, by the transferee, to obtain the Commissioner's approval prior to commencing such discharge(s) may subject the transferee to enforcement action for discharging without a permit pursuant to applicable sections of the CGS and RCSA.

(F) No provision of this permit and no action or inaction by the Commissioner shall be construed to constitute an assurance by the Commissioner that the actions taken by the Permittee pursuant to this permit will result in compliance or prevent or abate pollution.

(G) Nothing in this permit shall relieve the Permittee of other obligations under applicable federal, state and local law.

(H) **An annual fee shall be paid for each year this permit is in effect as set forth in section 22a-430-7 of the Regulations of Connecticut State Agencies.**

SECTION 2: DEFINITIONS

(A) The definitions of the terms used in this permit shall be the same as the definitions contained in section 22a-423 of the CGS and section 22a-430-3(a) and 22a-430-6 of the RCSA, except for "No observable acute effect level (NOAEL)" which is redefined below.

(B) In addition to the above, the following definitions shall apply to this permit:

"-----" in the limits column on the monitoring table means a limit is not specified but a value must be reported on the DMR

"Annual" in the context of any sampling frequency found in Section 5, shall mean the sample must be collected in the month of January.

"Average Monthly Limit"; means the maximum allowable "Average Monthly Concentration" as defined in section 22a-430-3(a) of the RCSA when expressed as a concentration (e.g. mg/l); otherwise, it means "Average Monthly Discharge Limitation" as defined in section 22a-430-3(a) of the RCSA.

"Daily Concentration" means the concentration of a substance as measured in a daily composite sample, or, the arithmetic average of all grab sample results defining a grab sample average.

"Daily Quantity" means the quantity of waste discharged during an operating day.

"Instantaneous Limit" means the highest allowable concentration of a substance as measured by a grab sample, or the highest allowable measurement of a parameter as obtained through instantaneous monitoring.

"In stream Waste Concentration (IWC)" means the concentration of a discharge in the receiving water after mixing has occurred in the allocated zone of influence.

"Maximum Daily Limit", means the maximum allowable "Daily Concentration" (defined above) when expressed as a concentration (e.g. mg/l); otherwise, it means the maximum allowable "Daily Quantity" as defined above, unless it is expressed as a flow quantity. If expressed as a flow quantity it means "Maximum Daily Flow" as defined in section 22a-430-3(a) of the RCSA.

"NA" as a Monitoring Table abbreviation means "not applicable".

"NR" as a Monitoring Table abbreviation means "not required".

"Quarterly", in the context of a sampling frequency, means sampling is required in the months of January, April, July, and October.

"Range During Sampling" ("RDS"), as a sample type, means the maximum and minimum of all values recorded as a result of analyzing each grab sample of; 1) a Composite Sample, or, 2) a Grab Sample Average. For those Permittees with continuous monitoring and recording pH meters, Range During Sampling means the maximum and minimum readings recorded with the continuous monitoring device during the Composite or Grab Sample Average sample collection.

"Range During Month" ("RDM"), as a sample type, means the lowest and the highest values of all of

the monitoring data for the reporting month.

"Semi-Annual" in the context of a sampling frequency, means the sample must be collected in the months of January and July.

"ug/l" means micrograms per liter.

SECTION 3: COMMISSIONER'S DECISION

(A) The Commissioner of Environmental Protection ("Commissioner"), has issued a final determination and found that continuance of the existing system to treat the discharge will protect the waters of the state from pollution. The Commissioner's decision is based on **application #200401054** for permit reissuance, received on March 30, 2004 and the administrative record established in the processing of that application.

(B) The Commissioner hereby authorizes the Permittee to discharge in accordance with the provisions of this permit, the above referenced application, and all approvals issued by the Commissioner or her authorized agent for the discharges and/or activities authorized by, or associated with, this permit.

(C) The Commissioner reserves the right to make appropriate revisions to the permit in order to establish any appropriate effluent limitations, schedules of compliance, or other provisions which may be authorized under the Federal Clean Water Act or the CGS or regulations adopted thereunder, as amended. The permit as modified or renewed under this paragraph may also contain any other requirements of the Federal Clean Water Act or CGS or regulations adopted thereunder which are then applicable.

SECTION 4: GENERAL EFFLUENT LIMITATIONS

(A) No discharge shall contain, or cause in the receiving stream, a visible oil sheen or floating solids; or, cause visible discoloration or foaming in the receiving stream.

(B) No discharge shall cause acute or chronic toxicity in the receiving water body beyond any zone of influence specifically allocated to that discharge in this permit.

(C) The temperature of any discharge shall not increase the temperature of the receiving stream above 85°F, or, in any case, raise the normal temperature of the receiving stream more than 4°F.

SECTION 5: SPECIFIC EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

(A) The discharge(s) shall not exceed and shall otherwise conform to the specific terms and conditions listed below. The discharge(s) are restricted by, and shall be monitored in accordance with, the table(s) below:

Table A

Discharge Serial Number: 002-1 | **Monitoring Location: 1**

Wastewater Description: Copper Forming and Casting Wastewater and Treated Stormwater

Monitoring Location Description: Discharge pipe for the final effluent tank (Discharge Tank #2)

PARAMETER	UNITS	FLOW/TIME BASED MONITORING				INSTANTANEOUS MONITORING			Minimum Level Test[3]
		Average Monthly Limit	Maximum Daily Limit	Sample/Reporting Frequency [2]	Sample Type or Measurement to be reported	Instantaneous limit or required range	Sample// Reporting Frequency[2]	Sample Type or measurement to be reported	
Arsenic, total	ug/l	0.02	0.04	Annually	Daily Composite	0.06	NR	NA	*
Cadmium, total	mg/l	0.1	0.5	Monthly	Daily Composite	0.75	NR	NA	*
Cadmium, total	kg/d	0.014	0.027	Monthly	Daily Composite	NA	NR	NA	*
Chromium, total	mg/l	1.0	1.2	Monthly	Daily Composite	1.8	NR	NA	*
Copper, total	mg/l	1.0	2.0	Weekly	Daily Composite	3.0	NR	NA	*
Copper total	kg/d	0.172	0.344	Weekly	Daily Composite	NA	NR	NA	*
Flow, Instantaneous	gpm	NA	NA	NR	NA	-----	Weekly	Instantaneous	
Flow, Average and Maximum[1]	gpd	70,000	150,000	Continuous	See Remarks	NA	NR	NA	
Flow, Total day of sampling	gpd	NA	150,000	Weekly	Daily Flow	NA	NR	NA	
Iron, total	mg/l	3.0	5.0	Monthly	Daily Composite	7.5	NR	NA	
Lead, total	mg/l	0.1	0.5	Monthly	Daily Composite	0.75	NR	NA	*
Lead, total	kg/d	0.026	0.052	Monthly	Daily Composite	NA	NR	NA	*
Nickel, total	mg/l	0.5	1.0	Monthly	Daily Composite	1.5	NR	NA	*
pH, Day of Sampling	S.U.	NA	NA	NR	NA	7.5 – 9.9	Weekly	RDS	
pH, Continuous	S.U.	NA	NA	NR	NA	7.5 – 9.9	Continuous	RDM	
Zinc, total	mg/l	1.0	2.0	Monthly	Daily Composite	3.0	NR	NA	*
Zinc, total	kg/d	0.34	0.68	Monthly	Daily Composite	NA	NR	NA	*
Total Suspended Solids	mg/l	20.0	30.0	Monthly	Daily Composite	45.0	NR	NA	
Total Oil & Grease	mg/l	NA	NA	NR	NA	10.0	Monthly	Grab	
Total Toxic Organics	mg/l	NA	NA	NR	NA	2.13	Monthly	Grab	

Table Footnotes:

Footnotes:

[1] For this parameter the permittee shall maintain at the facility a record of the total flow for each day of discharge and shall report the Average Daily Flow and the Maximum Daily Flow for each month.

[2] The first entry in this column is the 'Sample Frequency'. If this entry is not followed by a 'Reporting Frequency' and the 'Sample Frequency' is more frequent than monthly then the 'Reporting Frequency' is monthly. If the 'Sample frequency' is specified as monthly, or less frequent, then the 'Reporting Frequency' is the same as the 'Sample Frequency'

[3] Minimum Level Test refers to Section 6 Paragraph (A)(3) of this permit.

TABLE B						
Discharge Serial Number (DSN):002-1			Monitoring Location: T			
Wastewater Description: Copper Forming and Casting Wastewater and Treated Stormwater						
Monitoring Location Description: Discharge pipe for the final effluent tank (Discharge Tank #2)						
Allocated Zone of Influence (ZOI): **288,700** gph				In stream Waste Concentration (IWC): **1%**		
PARAMETER	**Units**	**Maximum Daily Limit**	**Maximum Instantaneous Limit**	**Sampling Frequency**	**Sample Type**	**Minimum Level Analysis See Section 6**
Aquatic Toxicity, Daphnia, Pulex [1]	%	LC50>20	NA	Quarterly	Daily Composite	
Aquatic Toxicity, Pimephales promelas [1]	%	LC50>20	NA	Annually	Daily Composite	
Aquatic Toxicity, Daphnia, Pulex[1]	%	NA	LC 50>6.7	NR	Grab	
Aquatic Toxicity, Pimephales promelas [1]	%	NA	LC 50>6.7	NR	Grab	
Arsenic, Total	ug/l	0.04	NA	Annually	Daily Composite	*
Cadmium, Total	mg/l	0.5	NA	Quarterly	Daily Composite	*
Chromium, Total	mg/l	1.2	NA	Quarterly	Daily Composite	*
Copper, Total	mg/l	2.0	NA	Quarterly	Daily Composite	*
Iron, Total	mg/l	5.0	NA	Quarterly	Daily Composite	
Lead, Total	mg/l	0.5	NA	Quarterly	Daily Composite	*
Nickel, Total	mg/l	1.0	NA	Quarterly	Daily Composite	*
Nitrogen, Ammonia (total as N)	mg/l	----	NA	Quarterly	Daily Composite	
Nitrogen, Nitrate, (total as N)	mg/l	----	NA	Quarterly	Daily Composite	
Nitrogen, Nitrite, (total as N)	mg/l	----	NA	Quarterly	Daily Composite	
Oil & Grease, Total	mg/l	NA	10.0	Quarterly	Grab	
Total Suspended Solids	mg/l	30.0	NA	Quarterly	Daily Composite	
Zinc, Total	mg/l	2.0	NA	Quarterly	Daily Composite	*

Remarks:
Note: All analysis shall be on the same sample.
[1] The results of the Toxicity Tests are recorded in % survival, however, the Permittee shall report pass/fail on the DMR based on criteria in Section 6(B) of this permit..

(1) All samples shall be comprised of only the wastewater described in this table. Samples shall be collected prior to combination with receiving waters or wastewater of any other type, and after all approved treatment units, if applicable. All samples collected shall be representative of the discharge during standard operating conditions.

(2) In cases where limits and sample type are specified but sampling is not required by this permit, the limits specified shall apply to all samples which may be collected and analyzed by the Department of Environmental Protection personnel, the Permittee, or other parties.

(3) The limits imposed on the discharges listed in this permit take effect on the issuance date of this permit, hence any sample taken after this date which, upon analysis, shows an exceedance of permit limits will be considered non-compliance.

The monitoring requirements begin on the date of issuance of this permit if the issuance date is on or before the 12th day of a month. For permits issued on or after the 13th day of a month, monitoring requirements begin the 1st day of the following month.

SECTION 6: SAMPLE COLLECTION, HANDLING and ANALYTICAL TECHNIQUES

(A) Chemical Analysis

(1) Chemical analyses to determine compliance with effluent limits and conditions established in this permit shall be performed using the methods approved pursuant to the Code of Federal Regulations, Part 136 of title 40 (40 CFR 136) unless an alternative method has been approved in writing pursuant to 40 CFR 136.4 or as provided in section 22a-430-3(j)(7) of the RCSA. Chemicals which do not have methods of analysis defined in 40 CFR 136 shall be analyzed in accordance with methods specified in this permit.

(2) All metals analyses identified in this permit shall refer to analyses for Total Recoverable Metal as defined in 40 CFR 136 unless otherwise specified.

(3) The Minimum Levels specified below represent the concentrations at which quantification must be achieved and verified during the chemical analyses for the parameters identified in Section 5 Table(s) A and B. Analyses for these parameters must include check standards within ten percent of the specified Minimum Level or calibration points equal to or less than the specified Minimum Level.

Parameter	Minimum Level
Arsenic	5.0 ug/L
Cadmium	0.5 ug/L
Chlorine, total residual	20.0 ug/L
Chromium	5.0 ug/L
Copper	5.0 ug/L
Lead	5.0 ug/L
Nickel	5.0 ug/L
Zinc	10.0 ug/L

(4) The value of each parameter for which monitoring is required under this permit shall be reported to the maximum level of accuracy and precision possible consistent with the requirements of this section of the permit.

(5) Effluent analyses for which quantification was verified during the analysis at or below the minimum levels specified in this section and which indicate that a parameter was not detected shall be reported as "less than x" where 'x' is the numerical value equivalent to the analytical method detection limit for that analysis.

(6) Results of effluent analyses which indicate that a parameter was not present at a concentration greater than or equal to the Minimum Level specified for that analysis shall be considered equivalent to zero (0.0) for purposes of determining compliance with effluent limitations or conditions specified in this permit.

(B) Acute Aquatic Toxicity Test

(1) Samples for monitoring of Aquatic Toxicity shall be collected and handled as prescribed in "Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms" (EPA/821-R-02-012).

(a) Composite samples shall be chilled as they are collected. Grab samples shall be chilled immediately following collection. Samples shall be held at 4 degrees Centigrade until Aquatic Toxicity testing is initiated.

(b) Effluent samples shall not be dechlorinated, filtered, or, modified in any way, prior to testing for Aquatic Toxicity unless specifically approved in writing by the Commissioner for monitoring at this facility.

(c) Chemical analyses of the parameters identified in Section 5 Table B shall be conducted on an aliquot of the same sample tested for Aquatic Toxicity.

(i) At a minimum, pH, specific conductance, total alkalinity, total hardness, and total residual chlorine shall be measured in the effluent sample and, during Aquatic Toxicity tests, in the highest concentration of test solution and in the dilution (control) water at the beginning of the test and at test termination. If Total Residual Chlorine is not detected at test initiation, it does not need to be measured at test termination. Dissolved oxygen, pH, and temperature shall be measured in the control and all test concentrations at the beginning of the test, daily thereafter, and at test termination.

(d) Tests for Aquatic Toxicity shall be initiated within 36 hours of sample collection.

(2) Monitoring for Aquatic Toxicity to determine compliance with the permit limit on Aquatic Toxicity (invertebrate) above shall be conducted for 48-hours utilizing neonatal Daphnia pulex (less than 24-hours old).

(3) Monitoring for Aquatic Toxicity to determine compliance with the permit limit on Aquatic Toxicity (vertebrate) above shall be conducted for 48-hours utilizing larval Pimephales promelas (1-14 days old with no more than 24-hours range in age).

(4) Tests for Aquatic Toxicity shall be conducted as prescribed for static non-renewal acute tests in "Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms" (EPA/821-R-02-012), except as specified below.

(a) Definitive (multi-concentration) testing, with LC50 as the endpoint, shall be conducted to

determine compliance with limits on Aquatic Toxicity and monitoring conditions and shall incorporate, at a minimum, the following effluent concentrations:

(i) For Aquatic Toxicity Limits expressed as LC50 values between 15% and 33% and for monitoring only conditions: 100%, 50%, 25%, 12.5%, and 6.25%

(b) Organisms shall not be fed during the tests.

(c) Copper nitrate shall be used as the reference toxicant in tests with freshwater organisms.

(d) Synthetic freshwater prepared with deionized water adjusted to a hardness of 50 mg/L (plus or minus 5 mg/L) as CaCO3 shall be used as dilution water in tests with freshwater organisms.

(5) Compliance with limits on Aquatic Toxicity shall be determined as follows:

(a) For limits expressed as a minimum LC50 value, compliance shall be demonstrated when the results of a valid definitive Aquatic Toxicity test indicates that the LC50 value for the test is greater than the Aquatic Toxicity Limit.

(C) The Permittee shall each alternate year monitor the chronic toxicity of the DSN002-1 in accordance with the following specifications.

(1) Chronic toxicity testing of the discharge shall be conducted during July, August, or September during a period when the stream flow in the Naugatuck River is at or below 400 cfs as measured at the U.S.G.S. gauging station 01208500 located in Beacon Falls, CT.

(2) Chronic toxicity testing shall be performed on the discharge in accordance with the test methodology established in "Short term Methods For Estimating The Chronic Toxicity of Effluents and Receiving Water to Freshwater Organisms" (EPA-821-R-02-013) as referenced in 40CFR 136 for Cerio daphnia survival and reproduction and Fathead Minnow larval survival and growth.

(3) Chronic toxicity tests shall utilize a minimum of five effluent dilutions prepared using a dilution factor of 0.5 (100% effluent, 50% effluent, 25 % effluent, 12.5 % effluent, 6.25 % effluent, 3% effluent and 1% effluent).

(4) Naugatuck River water collected immediately upstream of the area influenced by the discharge shall be used as site water control (0% effluent) and dilution water in the toxicity tests.

(5) A laboratory water control consisting of synthetic freshwater prepared in accordance with EPA-821-R-02-013 at a hardness of 50±5 mg/l shall be included in the test protocol in addition to the site-water control.

(6) Daily composite samples of the discharge and grab samples of the Naugatuck River for use as site water control and dilution water shall be collected on: day 0, for test solution renewal on day 1 and day 2 of the test; day 2, for test solution renewal on day 3 and day 4 of the test; and day 4, for test solution renewal on day 5, 6, and 7 of the test. Samples shall not be dechlorinated, pH or hardness adjusted, or chemically altered in any way.

(7) All samples of the discharge and the Naugatuck River water used in the chronic toxicity test shall, at a minimum, be analyzed and results reported in accordance with the provisions listed in section 6(A) of this permit for the following parameters:

pH	Copper (Total recoverable and dissolved)
Hardness	Nickel (Total recoverable and dissolved)
Alkalinity	Nitrogen, Ammonia (total as N)
Conductivity	Nitrogen, Nitrate (Total as N)
Chlorine, (Total residual)	Nitrogen, Nitrite (Total as N)
Lead (Total recoverable and dissolved)	
Zinc, (Total recoverable and dissolved)	
Solids, Total Suspended	

SECTION 7: REPORTING REQUIREMENTS

(A) The results of chemical analyses and any aquatic toxicity test required above shall be entered on the Discharge Monitoring Report (DMR), provided by this office, and reported to the Bureau of Water Management (Attn: DMR Processing) at the following address. The report shall also include a detailed explanation of any violations of the limitations specified. The DMR shall be received at this address by the last day of the month following the month in which samples are collected.

Bureau of Water Management (Attn: DMR Processing)
Connecticut Department of Environmental Protection
79 Elm Street
Hartford, CT 06106-5127

(B) Complete and accurate aquatic toxicity test data, including percent survival of test organisms in each replicate test chamber, LC50 values and 95% confidence intervals for definitive test protocols, and all supporting chemical/physical measurements performed in association with any aquatic toxicity test, including measured daily flow and hours of operation for the day of sample collection, shall be entered on the Aquatic Toxicity Monitoring Report form (ATMR) and sent to the Bureau of Water Management at the following address: The ATMR shall be received at this address by the last day of the month following the month in which the samples are collected.

Bureau of Water Management (Attn: Aquatic Toxicity)
Connecticut Department of Environmental Protection
79 Elm St.
Hartford, CT 06106-5127

(C) If this permit requires monitoring of a discharge on a calendar basis (e.g. Monthly, quarterly, etc.), but a discharge has not occurred within the frequency of sampling specified in the permit, the Permittee must submit the DMR and ATMR, as scheduled, indicating "NO DISCHARGE". For those Permittees whose required monitoring is discharge dependent (e.g. per batch), the minimum reporting frequency is monthly. Therefore, if there is no discharge during a calendar month for a batch discharge, a DMR must be submitted indicating such by the end of the following month.

(D) For any table above that requires Total Toxic Organics (TTO) monitoring, the Permittee may, in lieu of analyzing for Total Toxic Organics, include a statement on the DMR, at the frequency required, certifying compliance with your Solvent Management Plan if such plan has been approved by the Commissioner in accordance with 22a-430-4(l) of the RCSA and by 40CFR433 (Metal Finishing). If such approval has been granted and the reports include the compliance statement, the minimum frequency of sampling shall be reduced

to annually in the month of January.

(E) The Permittee, at a minimum, shall regenerate the ion exchange system on a quarterly basis in the months of March, June, September and December and shall certify compliance with this permit condition in a statement attached to the DMR on a quarterly basis.

SECTION 8: RECORDING AND REPORTING OF VIOLATIONS, ADDITIONAL TESTING REQUIREMENTS

(A) If any sample analysis indicates that an Aquatic Toxicity effluent limitation in Section 5 of this permit has been exceeded, or that the test was invalid, another sample of the effluent shall be collected and tested for Aquatic Toxicity and associated chemical parameters, as described above in Section 5 and Section 6, and the results reported to the Bureau of Water Management (Attn: DMR Processing), at the address listed above, within 30 days of the exceedance or invalid test. Results of all tests, whether valid or invalid, shall be reported.

(B) If any two consecutive test results or any three test results in a twelve month period indicates that an Aquatic Toxicity Limit has been exceeded, the Permittee shall immediately take all reasonable steps to eliminate toxicity wherever possible and shall submit a report to Bureau of Water Management (Attn: Aquatic Toxicity) for the review and approval of the Commissioner in accordance with section 22a-430-3(j)(10)(c) of the RCSA describing proposed steps to eliminate the toxic impact of the discharge on the receiving water body. Such a report shall include a proposed time schedule to accomplish toxicity reduction and the Permittee shall comply with any schedule approved by the Commissioner.

(C) The Permittee shall notify the Bureau of Water Management, Permitting and Enforcement Division, within 72 hours and in writing within thirty days of the discharge of any substance listed in the application but not listed in the permit if the concentration or quantity of that substance exceeds two times the level listed in the application.

SECTION 9: COMPLIANCE SCHEDULE

(A) A complete and thorough report of the results of the chronic toxicity monitoring specified in Section 6 (C) shall be prepared as outlined in section 10 of EPA-821-R-02-013 and submitted to the Department for review on or before December 31 of each calendar year to the address specified in Section 7(B) of this permit.

(B) The Permittee shall achieve compliance with the effluent limitations in Section 5, Table B on the date of issuance of this permit in accordance with the following:

(1) On or before 180 days after the date of issuance of this permit, the Permittee shall submit for the Commissioner's review and written approval a comprehensive and thorough report which describes and evaluates the effectiveness of the operation and maintenance of the ion exchange system as documented in the Operation and Maintenance Plan revised on July 9, 2005. Based on the findings the permittee shall recommend, if necessary, an alternate schedule for operation and maintenance of the ion exchange system and propose a schedule for implementation of the changes.

(C) The Permittee shall use best efforts to submit to the Commissioner all documents required by this section of the permit in a complete and approvable form. If the Commissioner notified the Permittee that any document or other action is deficient, and does not approve it with conditions or modifications, it is deemed disapproved, and the Permittee shall correct the deficiencies and resubmit it within the time specified by the Commissioner or, if no time is specified by the Commissioner, within thirty days of the Commissioner's notice of deficiencies. In

approving any document or other action under this Compliance Schedule, the Commissioner may approve the document or other action as submitted or performed or with such conditions or modifications as the Commissioner deems necessary to carry out the purposes of this section of the permit. Nothing in this paragraph shall excuse noncompliance or delay.

(D) Dates. The date of submission to the Commissioner of any document required by this section of the permit shall be the date such document is received by the Commissioner. The date of any notice by the Commissioner under this section of the permit, including but not limited to notice of approval or disapproval of any document or other action, shall be the date such notice is personally delivered or the date three days after it is mailed by the Commissioner, whichever is earlier. Except as otherwise specified in this permit, the word "day" as used in this section of the permit means calendar day. Any document or action which is required by this section only of the permit, to be submitted, or performed, by a date which falls on, Saturday, Sunday, or, a Connecticut or federal holiday, shall be submitted or performed on or before the next day which is not a Saturday, Sunday, or Connecticut or federal holiday.

(E) Notification of noncompliance. In the event that the Permittee becomes aware that it did not or may not comply, or did not or may not comply on time, with any requirement of this section of the permit or of any document required hereunder, the Permittee shall immediately notify the Commissioner and shall take all reasonable steps to ensure that any noncompliance or delay is avoided or, if unavoidable, is minimized to the greatest extent possible. In so notifying the Commissioner, the Permittee shall state in writing the reasons for the noncompliance or delay and propose, for the review and written approval of the Commissioner, dates by which compliance will be achieved, and the Permittee shall comply with any dates that may be approved in writing by the Commissioner. Notification by the Permittee shall not excuse noncompliance or delay, and the Commissioner's approval of any compliance dates proposed shall not excuse noncompliance or delay unless specifically so stated by the Commissioner in writing.

(F) Notice to Commissioner of changes. Within fifteen days of the date the Permittee becomes aware of a change in any information submitted to the Commissioner under this section of the permit, or that any such information was inaccurate or misleading or that any relevant information was omitted, the Permittee shall submit the correct or omitted information to the Commissioner.

(G) Submission of documents. Any document, other than a discharge monitoring report, required to be submitted to the Commissioner under this section of the permit shall, unless otherwise specified in writing by the Commissioner, be directed to:

Laurene McEntire, Engineer
Department of Environmental Protection
Bureau of Water Management
79 Elm Street
Hartford, CT 06106-5127

This permit is hereby issued on the 22ND OF MARCH, 2006.

GINA MCCARTHY
Gina McCarthy
Commissioner

GM/LM/vld

DATA TRACKING AND TECHNICAL FACT SHEET

Permittee: Ansonia Copper & Brass, Inc. PAMS Company ID: 40819

PERMIT, ADDRESS, AND FACILITY DATA

PERMIT #:CT0002968 APPLICATION #: 200401054 FACILITY ID. 002-002

Mailing Address:						**Location Address:** same					
Street:	75 Liberty Street					**Street:**					
City:	Ansonia	**ST:**	CT	**Zip:**	06401	**City:**		**ST:**	**CT**	**Zip:**	
Contact Name:	Mr. Robert McGann					**DMR Contact**					
Phone No.:	(203) 732-6642					**Phone No.:**					

PERMIT INFORMATION

DURATION 5 YEAR _X_ 10 YEAR ___ 30 YEAR ____

TYPE New _ Reissuance _X_ Modification ___

CATEGORIZATION POINT (X) NON-POINT ( ) GIS # 6208

NPDES (X) PRETREAT () GROUND WATER(UIC) ( ) GROUND WATER (OTHER) ( )

NPDES MAJOR (MA) _X___
NPDES SIGNIFICANT MINOR or PRETREAT SIU (SI) _____
NPDES or PRETREATMENT MINOR (MI) _____

PRETREAT SIGNIFICANT INDUS USER (SIU) _____
PRETREAT CATEGORICAL (CIU) _____
Note: If it's a CIU then check off SIU

POLLUTION PREVENTION MANDATE _ ENVIRONMENTAL EQUITY ISSUE ____

COMPLIANCE ISSUES

COMPLIANCE SCHEDULE X YES NO (If yes check off what it is in relation to.)

POLLUTION PREVENTION ___ TREATMENT REQUIREMENT__X__WATER CONSERVATION

WATER QUALITY REQUIREMENT __ REMEDIATION __ OTHER _____

IS THE PERMITTEE SUBJECT TO A PENDING ENFORCEMENT ACTION? NO_X__ YES __

OWNERSHIP CODE

Private X Federal __ State __ Municipal (town only) __ Other public ____

DEP STAFF ENGINEER: Laurene McEntire

PERMIT FEES

Discharge Code	DSN	Annual Fee
101036Z	002-1	$8175.00
1080000	002-1	$2662.50

FOR NPDES DISCHARGES

Drainage basin Code: 6900 Present/Future Water Quality Standard: C/B

FOR SEWER DISCHARGES

Discharge to The Regional Authority/Town/City of __N/A__ POTW via Truck/Town of ___/its collection system. Facility ID of the POTW is _____.

FOR UIC PERMITS

Drainage basin Code: n/a Water Quality Standard: n/a Total Wells __ Well Type _____

NATURE OF BUSINESS GENERATING DISCHARGE

Copper forming and casting

PROCESS AND TREATMENT DESCRIPTION (by DSN)

DSN001-1: Non-contact cooling water – this discharge has been eliminated.
DSN002-1: Equalization, neutralization, flocculation, clarification, sand filtration, ion exchange, dewatering and

sludge drying.

RESOURCES USED TO DRAFT PERMIT

_X_ Federal Effluent Limitation Guideline 40CFR 464 & 468
Metal Molding and Casting Point Source Category and Copper Forming Point Source Category

__ Performance Standards

__ Federal Development Document
name of category

__ Treatability Manual

_X_ Department File Information

_X_ Connecticut Water Quality Standards

__ Anti-degradation Policy

__ Coastal Management Consistency Review Form

__ Other - Explain

BASIS FOR LIMITATIONS, STANDARDS OR CONDITIONS

_X_ Best Available Technology (BAT)
DSN002-1: Maximum daily limit for Chromium under 40 CFR 468.12

_X_ Best Professional Judgment (See Other Comments)
DSN002-1: Nickel and Total Toxic Organics. (ref.40 CFR433 Metal Finishing)

_X_ Section 22a-430-4(s) of the Regulations of Connecticut StateAgencies
DSN002-1: Iron, TSS, O & G, concentration limits for Cadmium, Copper, Lead, Zinc, Chromium (average monthly)

_X_ In order to meet in-stream water quality (See General Comments)
DSN002-1: arsenic; mass based limits for Cadmium, Copper, Lead, and Zinc

GENERAL COMMENTS

In developing the permit's concentration limits, EPA Metal Molding and Casting Point Source Categorical Limits (40 CFR Part 464) and Copper Forming Point Source Categorical Limits (40 CFR Part 468) and Section 22a-430-4(s)(2) of the Regulations of Connecticut State Agencies limits were compared. The Connecticut limits were found to be more stringent and thus incorporated in the permit except for the maximum daily limit for chromium under 40 CFR 468.12.

Water quality based discharge limitations were included in this permit for consistency with Connecticut Water Quality Standards and criteria, pursuant to 40 CFR 122.44(d). Each parameter was evaluated for consistency with the available

aquatic life criteria (acute and chronic) and human health (fish consumption only) criteria, considering the zone of influence allocated to the facility where appropriate. The statistical procedures outlined in the EPA Technical Support Document for Water Quality-based Toxics Control (EPA/505/2-90-001) were employed to calculate the limits. The most restrictive of the water quality limitations, aquatic life acute, aquatic life chronic, and human health, was compared with limitations developed according to State and Federal Best Available Technology (BAT). Where the water quality based limitations were more restrictive than BAT, the water quality based limitation was included in the permit as a mass limit in addition to the BAT concentration limit.

OTHER COMMENTS

The majority of the process water originates from a man-made basin holding Naugatuck River water. A small amount of stormwater is treated in the wastewater treatment system, specifically, from two extrusion pickle line roof drains and a portion of the driveway's run-off from around the casting department's bag house.

The Zone of Influence (ZOI) for DSN002-1 was changed from 371, 250 gph to 288,700 gph. This is due to the decrease in the average daily flow from 90,000 gpd to 70,000 gpd. The ZOI is based on an Instream Waste Concentration (IWC) of 1% at the permitted flow of 70,000 gpd.

The arsenic limits are lower in the renewal permit because they are based on human health criteria. No zone of influence was applied when calculating limits for this parameter because it is a known human carcinogen. The monitoring frequency was reduced from monthly to annually based on continuous results of non-detect (< 5 ug/l) reported in DMRs for 2003, 2004, and 2005.

Chromium is listed as a pollutant under 40CFR 468.12 effluent limitations representing the degree of effluent reduction attainable by the application of the best available technology economically achievable. (Copper Forming Subcategory) This pollutant and it's limits is required to be incorporated into ACB's NPDES Permit. Therefore, chromium was added to this renewal permit.

A Compliance Schedule was placed in this permit to research the effectiveness of the operation of the ion exchange system as proposed in the facility's Operation and Maintenance Plan revised on July 9, 2005. This requirement is necessary to clarify what the most appropriate schedule for regeneration of the ion exchange system in order to maintain compliance with the permit limits and conditions.

Ansonia Copper & Brass Permit Limits for DSN002-1

Parameter	Limits	Frequency	Type	Comments
As, conc	water quality	annually	DC	limits reduced freq reduced
Cd, conc	22a-430-4(s) RCSA	monthly	DC	same
Cd, mass	water quality	monthly	DC	reduced
Cu, conc	22a-430-4(s) RCSA	monthly	DC	same
Cu, mass	water quality	monthly	DC	reduced
Fe, conc	22a-430-4(s) RCSA	monthly	DC	same
Pb, conc	22a-430-4(s) RCSA	monthly	DC	same
Pb, mass	water quality	monthly	DC	reduced
Ni, conc	limits from previous permit	monthly	DC	same
Zn, conc	22a-430-4(s) RCSA	monthly	DC	same
Zn, mass	limits from previous permit	monthly	DC	same
Cr, conc	40 CFR 468.12 BAT - max daily limit 22a-430-4(s) RCSA - ave monthly limit	monthly	DC	new
TSS	limits from previous permit	monthly	DC	same
O&G-T	limits from previous permit	monthly	grab	same
TTO	limits from previous permit	monthly	grab	same