



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

TO: Interested Parties / Applicant

DATE: April 18, 2013

RE: CTP Corp., Division of Tube Processing Corporation / 097 - 32980 - 00593

FROM: Matthew Stuckey, Branch Chief
Permits Branch
Office of Air Quality

Notice of Decision – Approval

Please be advised that on behalf of the Commissioner of the Department of Environmental Management, I have issued a decision regarding the enclosed matter. Pursuant to 326 IAC 2, this approval was effective immediately upon submittal of the application.

If you wish to challenge this decision, IC 4-21.5-3-7 requires that you file a petition for administrative review. This petition may include a request for stay of effectiveness and must be submitted to the Office of Environmental Adjudication, 100 North Senate Avenue, Government Center North, Suite N 501E, Indianapolis, IN 46204, **within eighteen (18) calendar days from the mailing of this notice**. The filing of a petition for administrative review is complete on the earliest of the following dates that apply to the filing:

- (1) the date the document is delivered to the Office of Environmental Adjudication (OEA);
- (2) the date of the postmark on the envelope containing the document, if the document is mailed to OEA by U.S. mail; or
- (3) The date on which the document is deposited with a private carrier, as shown by receipt issued by the carrier, if the document is sent to the OEA by private carrier.

The petition must include facts demonstrating that you are either the applicant, a person aggrieved or adversely affected by the decision or otherwise entitled to review by law. Please identify the permit, decision, or other order for which you seek review by permit number, name of the applicant, location, date of this notice and all of the following:

- (1) the name and address of the person making the request;
- (2) the interest of the person making the request;
- (3) identification of any persons represented by the person making the request;
- (4) the reasons, with particularity, for the request;
- (5) the issues, with particularity, proposed for considerations at any hearing; and
- (6) identification of the terms and conditions which, in the judgment of the person making the request, would be appropriate in the case in question to satisfy the requirements of the law governing documents of the type issued by the Commissioner.

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178. Callers from within Indiana may call toll-free at 1-800-451-6027, ext. 3-0178.

Enclosures
FNPER-AM.dot12/3/07



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April 18, 2013

Dan Seybert
CTP Corp., Division of Tube Processing Corporation
604 East LeGrande Avenue
Indianapolis, IN 46203

Re: 097-32980-00593
First Administrative Amendment to
R097-23537-00593

Dear Mr. Seybert:

CTP Corp., Division of Tube Processing Corporation was issued a Registration No. R097-23537-00593 on July 2, 2007 for a stationary fabricated metal product operation located at 3750 S. Shelby Street, Indianapolis, IN 46227. On March 21, 2013, the Office of Air Quality (OAQ) received an application from the source requesting to add another building and the following emission units that will be in the newly acquired building:

- (a) six (6) grinders,
- (b) two (2) TIG welders, one (1) MIG welder, two (2) portable MIG welders,
- (c) one (1) Nelson parts washer, and
- (d) three (3) space heaters.

CTP Corp., Division of Tube Processing Corporation, also requests that an additional eighteen (18) welders be added to Plant 2

Pursuant to 326 IAC 2-5.5-6(d)(10), this change to the registration is considered administrative amendment because the registration is amended to incorporate a modification that adds an emissions unit of the same type that is already permitted or replaces an existing unit and that will comply with the same applicable requirements and permit terms and conditions as the existing emission unit, and the modification does not result in a potential to emit greater than the thresholds in 326 IAC 2-2 (PSD) or 326 IAC 2-3 (Emission Offset), or does not result in a potential to emit of the source equal to or greater than the thresholds in 326 IAC 2-5.1-3(a) (Permits).

Please consult the TSD of this Administrative Amendment for the emission calculations, Federal and State Rule applicabilities.

Greenhouse Gases

Pursuant to 326 IAC 2-7-1(39), starting July 1, 2011, greenhouse gases (GHGs) emissions are subject to regulation at a source with a potential to emit (PTE) 100,000 tons per year or more of CO₂ equivalent emissions (CO₂e). Therefore, CO₂e emissions have been calculated for this source. Based on the calculations, the unlimited PTE GHGs from the entire source is less than 100,000 tons of CO₂e per year (see Appendix A for the calculations). This did not require any changes to the registration.

The source shall continue to operate according to 326 IAC 2-5.5 (Registrations). Please find enclosed the amended registration and Appendix A. A copy of the registration is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>. For additional information about air permits and how the public and interested parties can participate, refer to the IDEM's Guide for Citizen Participation and Permit Guide on the Internet at: www.idem.in.gov

This decision is subject to the Indiana Administrative Orders and Procedures Act - IC 4-21.5-3-5.
If you have any questions on this matter, please contact Deena Patton, at (800) 451-6027, press 0 and ask for Deena Patton or extension 4-5400, or dial (317) 234-5400.

Sincerely,

A handwritten signature in black ink, appearing to read "Nathan Bell", written in a cursive style.

Nathan Bell, Section Chief
Permits Branch
Office of Air Quality

NB /DP

Attachment: Revised Registration

cc: File - Marion County
Marion County Health Department
Compliance and Enforcement Branch
Billing, Licensing and Training Section



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REGISTRATION OFFICE OF AIR QUALITY

CTP Corp., Division of Tube Processing Corporation
Plant 1, 3555 Madison Ave. and
Plant 2, 3750 S. Shelby Street
Indianapolis, Indiana 46227

Pursuant to 326 IAC 2-5.1 (Construction of New Sources: Registrations) and 326 IAC 2-5.5 (Registrations), (herein known as the Registrant) is hereby authorized to construct and operate subject to the conditions contained herein, the source described in Section A (Source Summary) of this registration.

Registration No. 097-23537-00593	
Original signed by: Felicia A. Robinson Permits Branch Office of Air Quality	Issuance Date: July 2, 2007

First Registration Notice-Only Change No. 097-28913-00593, issued on February 4, 2010
First Registration Revision No. 097-30616-00593, issued on July 18, 2011

First Administrative Amendment No. 097-32980-00593	
Issued by:  Nathan Bell, Section Chief Permits Branch Office of Air Quality	Issuance Date: April 18, 2013

SECTION A**SOURCE SUMMARY**

This registration is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 and A.2 is descriptive information and does not constitute enforceable conditions. However, the Registrant should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Registrant to obtain additional permits pursuant to 326 IAC 2.

A.1 General Information

The Registrant owns and operates a stationary fabricated metal product operation.

Source Address:	Plant 1, 3555 Madison Ave., Indianapolis IN, 46227; and Plant 2, 3750 S. Shelby St., Indianapolis, IN 46227
General Source Phone Number:	(317) 782-9628
SIC Code:	3498 (Fabricated Pipe and Pipe Fittings)
County Location:	Marion County
Source Location Status:	Nonattainment for PM 2.5 standard Attainment for all other criteria pollutants
Source Status:	Registration

A.2 Source Definition

This stationary fabricated metal product company consists of two (2) plants:

- (a) Plant 1, CTP Sheet metal, is located at 3555 Madison Avenue, Indianapolis, Indiana 46227; and
- (b) Plant 2, CTP, Division of Tube Processing Corporation, is located at 3750 South Shelby Street, Indianapolis, Indiana 46227

The two (2) plants have been determined in the registration No. R097-23537-00593 to be one source since they are located on adjacent properties, belong to the same industrial grouping, have the same two SIC codes, and are owned by one (1) company.

A.3 Emission Units and Pollution Control Equipment Summary

This stationary source consists of the following emission units and pollution control devices:

Plant 1 – CTP Sheetmetal, 3555 Madison Avenue

- (a) Twenty-one (21) welding units, identified as Emission Units W01-W21, constructed in 2007 and approved for modification in 2011, all exhausting to the indoors, consisting of the following units:
 - (1) Fifteen (15) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr);
 - (2) Three (3) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr);
 - (3) Two (2) portable Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr); and
 - (4) One (1) seam welder, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr).

- (b) Two (2) deburring operations, identified as Emission Units D01-D02, installed in 2007, including one (1) hand held deburring with pneumatic tools, and one (1) vibratory deburring, with total maximum capacity of 2000 pounds of metal per hour (lb/hr), and exhausting to the indoors.
- (c) One (1) parts washer, identified as Emissions Unit PW02, installed in 2007, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.
- (d) Ten (10) natural gas fired combustion heaters, identified as Emissions Unit 03, installed in 2002, with a maximum combined heat input capacity of 5.98 million Btu per hour (mm Btu/hr), and exhausting to the indoors.
- (e) One (1) plasma cutter, identified as Emission Unit P01, approved in 2011 for construction, with a maximum metal cutting rate of 56.29 inches per minute, and exhausting to the indoors.
- (f) Paved and unpaved roads
- (g) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, using no controls, and exhausting indoors.

Plant 2 - CTP, Division of Tube Processing Corporation 3750 South Shelby Street

- (a) Two (2) acid wash lines for cleaning metal parts, identified as Emissions Unit 06, installed in 1976, approved in 2011 for modification, and exhausting to the indoors. Each wash line contains two (2) acid tanks, two (2) soap tanks, and two (2) rinse tanks containing water.
- (b) Two (2) abrasive blast cabinets, consisting of the following units:
 - (1) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07, installed in 1974, utilizing steel shot as blasting media, with a maximum blasting media usage rate of 2952 lbs per hour, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.
 - (2) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08, installed in 1974, utilizing glass shot as blasting media, with a maximum blasting media usage rate of 362 lbs per hour, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.
- (c) Thirty-six (36) welding units, identified as Emission Units W22-W58, installed in 1974, and approved for modification in 2011, with a maximum electrode usage estimated at 105,208 pounds per year, all exhausting to the indoors, consisting of the following units:
 - (1) Eighteen (18) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) each; and
 - (2) Eighteen (18) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) each.
- (d) One (1) thirty (30) gallon cold cleaning parts washer, installed in 1974, utilizing up to ninety (90) gallons of naphtha solvent per year, and exhausting to the indoors.

- (e) Ten (10) natural gas fired space heaters, installed in 1974, with a combined maximum heat input of 1.35 MMBtu/hr, and exhausting to the indoors.
- (f) One (1) natural gas fired Air Make-Up Unit, approved in 2011 for construction, with a combined maximum heat input of 0.05 MMBtu/hr, and exhausting to the indoors.
- (g) Fourteen (14) non-HAP emitting brazing stations, installed in 1974, and exhausting to the indoors.
- (h) Paved Roads

Tool Room - South Shelby Street

- (i) Six (6) grinders, identified as G1 through G6, approved for construction in 2013, with a maximum capacity of 691.1 lb/hr each, using cyclone dust collector as control for the two Baldor Grinders and no controls for the other four (4) grinders, and exhausting outdoors.
- (j) Two (2) TIG Welders, identified as W59 and W60, approved for construction in 2013, with a maximum electrode usage of 0.59 lb/hr each, using no controls and exhausting indoors.
- (k) One (1) MIG Welder, identified as W61, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr, using no controls and exhausting indoors.
- (l) Two (2) portable MIG Welders, identified as W62 and W63, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr each, using no controls, and exhausting indoors.
- (m) Two (2) space heaters, identified as SH1 and SH2, approved for construction in 2013, with a maximum heat input capacity of 0.00015 MMBtu/hr each, using no controls, and exhausting indoors.
- (n) One (1) space heater, identified as SH3, approved for construction in 2013, with a maximum heat input capacity of 0.0001 MMBtu/hr, using no controls, and exhausting indoors.
- (o) One (1) Nelson small parts washer, located in Tool Room, approved for construction in 2013, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.

SECTION B**GENERAL CONDITIONS****B.1 Definitions [326 IAC 2-1.1-1]**

Terms in this registration shall have the definition assigned to such terms in the referenced regulation. In the absence of definitions in the referenced regulation, the applicable definitions found in the statutes or regulations (IC 13-11, 326 IAC 1-2 and 326 IAC 2-1.1-1) shall prevail.

B.2 Effective Date of Registration [IC 13-15-5-3]

Pursuant to IC 13-15-5-3, this registration is effective immediately, unless a petition for stay of effectiveness is filed and granted according to IC 13-15-6-3, and may be revoked or modified in accordance with the provisions of IC 13-15-7-1.

B.3 Registration Revocation [326 IAC 2-1.1-9]

Pursuant to 326 IAC 2-1.1-9 (Revocation), this registration to operate may be revoked for any of the following causes:

- (a) Violation of any conditions of this registration.
- (b) Failure to disclose all the relevant facts, or misrepresentation in obtaining this registration.
- (c) Changes in regulatory requirements that mandate either a temporary or permanent reduction of discharge of contaminants. However, the amendment of appropriate sections of this registration shall not require revocation of this registration.
- (d) For any cause which establishes in the judgment of the fact that continuance of this registration is not consistent with purposes of this article.

B.4 Prior Permits Superseded [326 IAC 2-1.1-9.5]

- (a) All terms and conditions of permits established prior to Registration No. 097-23537-00593 and issued pursuant to permitting programs approved into the state implementation plan have been either:
 - (1) incorporated as originally stated,
 - (2) revised, or
 - (3) deleted.
- (b) All previous registrations and permits are superseded by this registration.

B.5 Annual Notification [326 IAC 2-5.1-2(f)(3)] [326 IAC 2-5.5-4(a)(3)]

Pursuant to 326 IAC 2-5.1-2(f)(3) and 326 IAC 2-5.5-4(a)(3):

- (a) An annual notification shall be submitted by an authorized individual to the Office of Air Quality stating whether or not the source is in operation and in compliance with the terms and conditions contained in this registration.
- (b) The annual notice shall be submitted in the format attached no later than March 1 of each year to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, IN 46204-2251

- (c) The notification shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.

B.6 Source Modification Requirement [326 IAC 2-5.5-6(a)]

Pursuant to 326 IAC 2-5.5-6(a), an application or notification shall be submitted in accordance with 326 IAC 2 to the Office of Air Quality (OAQ) if the source proposes to construct new emission units, modify existing emission units, or otherwise modify the source.

B.7 Registrations [326 IAC 2-5.1-2(i)]

Pursuant to 326 IAC 2-5.1-2(i), this registration does not limit the source's potential to emit.

B.8 Preventive Maintenance Plan [326 IAC 1-6-3]

- (a) If required by specific condition(s) in Section D of this registration, the Registrant shall prepare and maintain Preventive Maintenance Plans (PMPs) no later than ninety (90) days after issuance of this registration or ninety (90) days after initial start-up, whichever is later, including the following information on each facility:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If, due to circumstances beyond the Registrant's control, the PMPs cannot be prepared and maintained within the above time frame, the Registrant may extend the date an additional ninety (90) days provided the Registrant notifies:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The Registrant shall implement the PMPs.

- (b) A copy of the PMPs shall be submitted to IDEM, OAQ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ may require the Registrant to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions.
- (c) To the extent the Registrant is required by 40 CFR Part 60 or 40 CFR Part 63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such OMM Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

SECTION C**SOURCE OPERATION CONDITIONS**

Entire Source

Emission Limitations and Standards [326 IAC 2-5.1-2(g)] [326 IAC 2-5.5-4(b)]**C.1 Opacity [326 IAC 5-1]**

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this registration:

- (a) Opacity shall not exceed an average of thirty percent (30%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

C.2 Fugitive Dust Emissions [326 IAC 6-4]

The Registrant shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4 (Fugitive Dust Emissions).

SECTION D.1**OPERATION CONDITIONS**

Facility Description [326 IAC 2-5.1-2(f)(2)] [326 IAC 2-5.5-4(a)(2)]:

Plant 1 – CTP Sheetmetal, 3555 Madison Avenue

- (a) Twenty-one (21) welding units, identified as Emission Units W01-W21, constructed in 2007 and approved for modification in 2011, all exhausting to the indoors, consisting of the following units:
 - (1) Fifteen (15) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr);
 - (2) Three (3) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr);
 - (3) Two (2) portable Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr); and
 - (4) One (1) seam welder, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr).
- (b) Two (2) deburring operations, identified as Emission Units D01-D02, installed in 2007, including one (1) hand held deburring with pneumatic tools, and one (1) vibratory deburring, with total maximum capacity of 2000 pounds of metal per hour (lb/hr), and exhausting to the indoors.
- (c) One (1) parts washer, identified as Emissions Unit PW02, installed in 2007, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.
- (d) Ten (10) natural gas fired combustion heaters, identified as Emissions Unit 03, installed in 2002, with a maximum combined heat input capacity of 5.98 million Btu per hour (mm Btu/hr), and exhausting to the indoors.
- (e) One (1) plasma cutter, identified as Emission Unit P01, approved in 2011 for construction, with a maximum metal cutting rate of 56.29 inches per minute, and exhausting to the indoors.
- (g) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, using no controls, and exhausting indoors.

Plant 2 - CTP, Division of Tube Processing Corporation 3750 South Shelby Street

- (a) Two (2) acid wash lines for cleaning metal parts, identified as Emissions Unit 06, installed in 1976, approved in 2011 for modification, and exhausting to the indoors. Each wash line contains two (2) acid tanks, two (2) soap tanks, and two (2) rinse tanks containing water.
- (b) Two (2) abrasive blast cabinets, consisting of the following units:
 - (1) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07, installed in 1974, utilizing steel shot as blasting media, with a maximum blasting media usage rate of 2952 lbs per hour, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.

- (2) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08, installed in 1974, utilizing glass shot as blasting media, with a maximum blasting media usage rate of 362 lbs per hour, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.
- (c) Thirty-six (36) welding units, identified as Emission Units W22-W58, installed in 1974, and approved for modification in 2011, with a maximum electrode usage estimated at 105,208 pounds per year, all exhausting to the indoors, consisting of the following units:
 - (1) Eighteen (18) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) each; and
 - (2) Eighteen (18) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) each.
- (d) One (1) thirty (30) gallon cold cleaning parts washer, installed in 1974, utilizing up to ninety (90) gallons of naphtha solvent per year, and exhausting to the indoors.
- (e) Ten (10) natural gas fired space heaters, installed in 1974, with a combined maximum heat input of 1.35 MMBtu/hr, and exhausting to the indoors.
- (f) One (1) natural gas fired Air Make-Up Unit, approved in 2011 for construction, with a combined maximum heat input of 0.05 MMBtu/hr, and exhausting to the indoors.
- (g) Fourteen (14) non-HAP emitting brazing stations, installed in 1974, and exhausting to the indoors.

Tool Room - South Shelby Street

- (i) Six (6) grinders, identified as G1 through G6, approved for construction in 2013, with a maximum capacity of 691.1 lb/hr each, using cyclone dust collector as control for the two Baldor Grinders and no controls for the other four (4) grinders, and exhausting outdoors.
- (j) Two (2) TIG Welders, identified as W59 and W60, approved for construction in 2013, with a maximum electrode usage of 0.59 lb/hr each, using no controls and exhausting indoors.
- (k) One (1) MIG Welder, identified as W61, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr, using no controls and exhausting indoors.
- (l) Two (2) portable MIG Welders, identified as W62 and W63, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr each, using no controls, and exhausting indoors.
- (m) Two (2) space heaters, identified as SH1 and SH2, approved for construction in 2013, with a maximum heat input capacity of 0.00015 MMBtu/hr each, using no controls, and exhausting indoors.
- (n) One (1) space heater, identified as SH3, approved for construction in 2013, with a maximum heat input capacity of 0.0001 MMBtu/hr, using no controls, and exhausting indoors.
- (o) One (1) Nelson small parts washer, located in Tool Room, approved for construction in 2013, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.

(The information describing the process contained in this emissions unit description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-5.1-2(f)(1)] [326 IAC 2-5.5-4(a)(1)]**D.1.1 Particulate [326 IAC 6.5]**

Pursuant to 326 IAC 6.5-1-2(a), particulate matter emissions from the following facilities shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)):

- (1) Twenty-one (21) welding units, identified as Emission Units W01-W21;
- (2) Two (2) deburring operations, identified as Emission Units D01-D02;
- (3) One (1) plasma cutter, identified as Emission Unit P01;
- (4) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02;
- (5) Thirty-six (36) welding units, identified as Emission Units W22-W39; and
- (6) Fourteen (14) non-HAP emitting brazing stations.
- (7) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07; and
- (8) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08.
- (9) Six (6) Grinders, identified as G1 through G6, and
- (10) Five (5) Welders, identified as W59 through W63.
- (11) Three (3) space heaters, identified as SH1 through SH3
- (12) One (1) natural gas fired Air Make-Up Unit
- (13) Twenty (20) natural gas heaters

D.1.2 Preventive Maintenance Plan [326 IAC 1-6-3]

A Preventive Maintenance Plan is required for these facilities and their control devices. Section B - Preventive Maintenance Plan contains the Registrant's obligation with regard to the preventive maintenance plan required by this condition.

D.1.3 Cold Cleaner Degreaser Control Equipment and Operating Requirements [326 IAC 8-3-2]

- (a) Pursuant to 326 IAC 8-3-2, the owner or operator of cold cleaner degreaser shall ensure the following control equipment and operating requirements are met:
 - (1) Equip the degreaser with a cover.
 - (2) Equip the degreaser with a device for draining cleaned parts.
 - (3) Close the degreaser cover whenever parts are not being handled in the degreaser.
 - (4) Drain cleaned parts for at least fifteen (15) seconds or until dripping ceases.
 - (5) Provide a permanent, conspicuous label that lists the operating requirements in subdivisions (3), (4), (6), and (7).
 - (6) Store waste solvent only in closed containers.
 - (7) Prohibit the disposal or transfer of waste solvent in such a manner that could allow greater than twenty percent (20%) of the waste solvent (by weight) to evaporate into the atmosphere.
- (b) The owner or operator of a cold cleaner degreaser subject to this subsection shall ensure the following additional control equipment and operating requirements are met:

- (1) Equip the degreaser with one (1) of the following control devices if the solvent is heated to a temperature of greater than forty-eight and nine-tenths (48.9) degrees Celsius (one hundred twenty (120) degrees Fahrenheit):
 - (A) A freeboard that attains a freeboard ration of seventy-five hundredths (0,75) or greater.
 - (B) A water cover when solvent used is insoluble in, and heavier than, water.
 - (C) A refrigerated chiller.
 - (D) Carbon adsorption.
 - (E) An alternative system of demonstrated equivalent or better control as those outlined in clauses (A) through (D) that is approved by the department. An alternative system shall be submitted to the U.S. EPA as a SIP revision.
- (2) Ensure the degreaser cover is designed so that it can be easily operated with one (1) hand if the solvent is agitated or heated.
- (3) If used, solvent spray:
 - (A) must be a solid, fluid stream; and
 - (B) shall be applied at a pressure that does not cause excessive splashing.

Compliance Determination Requirements [326 IAC 2-5.1-2(g)] [326 IAC 2-5.5-4(b)]**D.1.5 Particulate Control**

In order to comply with Condition D.1.1, the cyclones for particulate control shall be in operation and control emissions from Emission Unit 07 and Emission Unit 08 at all times the Cyclo-Blast blast cabinet and the ICM Superhone 3600 blast cabinet are in operation.

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

**REGISTRATION
ANNUAL NOTIFICATION**

This form should be used to comply with the notification requirements under 326 IAC 2-5.1-2(f)(3) and 326 IAC 2-5.5-4(a)(3).

Company Name:	CTP Corp., Division of Tube Processing Corporation
Address:	Plant 1: 3555 Madison Avenue; and Plant 2: 3750 S. Shelby Street
City:	Indianapolis, Indiana 46227
Phone Number:	(317) 782-9628
Registration No.:	R097-23537-00593

I hereby certify that CTP Corp., Division of Tube Processing Corporation is :

☐ still in operation.

I hereby certify that CTP Corp., Division of Tube Processing Corporation is :

☐ no longer in operation.

☐ in compliance with the requirements of Registration No. R097-23537-00593.

☐ not in compliance with the requirements of Registration No. R097-23537-00593.

Authorized Individual (typed):
Title:
Signature:
Phone Number:
Date:

If there are any conditions or requirements for which the source is not in compliance, provide a narrative description of how the source did or will achieve compliance and the date compliance was, or will be achieved.

Noncompliance:

**Indiana Department of Environmental Management
Office of Air Quality**

Technical Support Document (TSD) for a Administrative Amendment

Source Description and Location
--

Source Name:	CTP Corp., Division of Tube Processing Corporation
Source Location:	3750 S. Shelby Street, Indianapolis, IN 46227
County:	Marion
SIC Code:	3498 (Fabricated Pipe and Pipe Fittings)
Registration No.:	097-23537-00593
Registration Issuance Date:	July 2, 2007
Administrative Amendment No.:	097-32980-00593
Permit Reviewer:	Deena Patton

On March 21, 2013, the Office of Air Quality (OAQ) received an application from CTP Corp., Division of Tube Processing Corporation, related to a modification to an existing stationary fabricated metal product operation.

Source Definition

This stationary fabricated metal product company consists of two (2) plants:

- (a) Plant 1, CTP Sheet metal, is located at 3555 Madison Avenue, Indianapolis, Indiana 46227; and
- (b) Plant 2, CTP, Division of Tube Processing Corporation, is located at 3750 South Shelby Street, Indianapolis, Indiana 46227

The two (2) plants have been determined in the Registration No. R097-23537-00593 to be one source since they are located on adjacent properties, belong to the same industrial grouping, have the same two SIC codes, and are owned by one (1) company.

Existing Approvals

The source was issued Registration No. 097-23537-00593 on July 2, 2007. The source has since received the following approvals:

- (a) Notice-Only Change No. 097-28913-00593, issued on February 4, 2010; and
- (b) Registration Revision No. 097-30616-00593, issued on July 18, 2011.

County Attainment Status

The source is located in Marion County.

Pollutant	Designation
SO ₂	Better than national standards.
CO	Attainment effective February 18, 2000, for the part of the city of Indianapolis bounded by 11 th Street on the north; Capitol Avenue on the west; Georgia Street on the south; and Delaware Street on the east. Unclassifiable or attainment effective November 15, 1990, for the remainder of Indianapolis and Marion County.
O ₃	Attainment effective November 8, 2007, for the 8-hour ozone standard. ¹
PM ₁₀	Unclassifiable effective November 15, 1990.
NO ₂	Cannot be classified or better than national standards.
Pb	Attainment effective July 10, 2000, for the part of Franklin Township bounded by Thompson Road on the south; Emerson Avenue on the west; Five Points Road on the east; and Troy Avenue on the north. Attainment effective July 10, 2000, for the part of Wayne Township bounded by Rockville Road on the north; Girls School Road on the east; Washington Street on the south; and Bridgeport Road on the west. The remainder of the county is not designated.
¹ Attainment effective October 18, 2000, for the 1-hour ozone standard for the Indianapolis area, including Marion County, and is a maintenance area for the 1-hour ozone National Ambient Air Quality Standards (NAAQS) for purposes of 40 CFR 51, Subpart X*. The 1-hour designation was revoked effective June 15, 2005. Basic nonattainment designation effective federally April 5, 2005, for PM _{2.5} .	

- (a) **Ozone Standards**
 Volatile organic compounds (VOC) and Nitrogen Oxides (NOx) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NOx emissions are considered when evaluating the rule applicability relating to ozone. Marion County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (b) **PM_{2.5}**
 Marion County has been classified as nonattainment for PM_{2.5} in 70 FR 943 dated January 5, 2005. On May 8, 2008, U.S. EPA promulgated specific New Source Review rules for PM_{2.5} emissions. These rules became effective on July 15, 2008. Therefore, direct PM_{2.5} and SO₂ emissions were reviewed pursuant to the requirements of Nonattainment New Source Review, 326 IAC 2-1.1-5. See the State Rule Applicability – Entire Source section.
- (c) **Other Criteria Pollutants**
 Marion County has been classified as attainment or unclassifiable in Indiana for for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

Fugitive Emissions

The fugitive emissions of criteria pollutants, hazardous air pollutants, and greenhouse gases are counted toward the determination of 326 IAC 2-5.1-2 (Registrations) applicability.

Status of the Existing Source

The table below summarizes the potential to emit of the entire source (after integral controls), prior to the proposed amendment, after consideration of all enforceable limits established in the effective permits:

Process/ Emission Unit	Potential To Emit of the Entire Source Prior to Amendment (tons/year)									
	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-
Welding Operations	1.31	1.31	1.31	-	-	-	-	-	1.69	0.83 (Cr)
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.01	0.06	0.06 (Hexane)
Blasting Operations***	6.76	6.03	6.03	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	1.30	-	-	-	-
Deburring, metal presses and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-
Paved and Unpaved Roads	4.56	1.16	0.12	-	-	-	-	-	-	-
Total PTE of Entire Source	15.61	11.66	10.62	0.02	3.17	14.22	2.66	3826.01	1.75	0.83 (Cr)
Exemptions Levels**	5	5	5	10	10	10	25	100,000	25	10
Registration Levels**	25	25	25	25	25	25	100	100,000	25	10
negl. = negligible These emissions are based upon Registration Revision No. 097-30616-00593, issued July 18, 2011. **The 100,000 CO ₂ e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD. ***The PTE after integral controls is used for determining the permitting level. However, for determining 326 IAC 2-2 (PSD) applicability, the PTE before integral controls is used.										

Description of Proposed Amendment

The Office of Air Quality (OAQ) has reviewed an application, submitted by CTP Corp., Division of Tube Processing Corporation, on March 21, 2013, relating to the acquisition of another building that includes the following: six (6) grinders, two (2) TIG welders, one (1) MIG welder, two (2) portable MIG welders, one (1) Nelson parts washer, and three (3) space heaters. CTP Corp., Division of Tube Processing Corporation, also requests that an additional eighteen (18) welders be added to Plant 2.

The following is a list of the new emission units and pollution control devices:

Tool Room - South Shelby Street

- (a) Six (6) grinders, identified as G1 through G6, approved for construction in 2013, with a maximum capacity of 691.1 lb/hr each, using cyclone dust collector as control for the two Baldor Grinders and no controls for the other four (4) grinders, and exhausting outdoors.
- (b) Two (2) TIG Welders, identified as W59 and W60, approved for construction in 2013, with a maximum electrode usage of 0.59 lb/hr each, using no controls and exhausting indoors.
- (c) One (1) MIG Welder, identified as W61, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr, using no controls and exhausting indoors.
- (d) Two (2) portable MIG Welders, identified as W62 and W63, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr each, using no controls, and exhausting indoors.
- (e) Two (2) space heaters, identified as SH1 and SH2, approved for construction in 2013, with a maximum heat input capacity of 0.00015 MMBtu/hr each, using no controls, and exhausting indoors.
- (f) One (1) space heater, identified as SH3, approved for construction in 2013, with a maximum heat input capacity of 0.0001 MMBtu/hr, using no controls, and exhausting indoors.
- (g) One (1) Nelson small parts washer, located in Tool Room, approved for construction in 2013, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.

The following is a list of the unpermitted emission units:

- (a) Nine (9) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) each.
- (b) Nine (9) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds per hour (lb/hr) each.
- (c) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, using no controls, and exhausting indoors.

"Integral Part of the Process" Determination

Pursuant to Registration No. R097-23537-00593, issued on July 2, 2007, the company submitted the following justification such that the cyclones for each of the two (2) abrasive blast cabinets identified as Emissions Unit 07 and Emissions Unit 08 be considered as an integral part of the abrasive blasting process.

- (a) The primary purpose of each cyclone is not to control air pollution. The primary purpose of each cyclone is to recover blasting media from the process so that it can be recirculated in each of the two (2) abrasive blast cabinets. Each abrasive blast cabinet is designed to recover and recirculate the blast media such that new blasting media does not need to be continually introduced into abrasive blast cabinet operation. The baghouse associated with each abrasive blast cabinet is then utilized to control particulate emissions from each cyclone's exhaust.

IDEM, OAQ, evaluated the justifications and agreed that the cyclones for each of the two (2) abrasive blast cabinets identified as Emissions Unit 07 and Emissions Unit 08 will be considered as an integral part of each abrasive blast cabinet. Therefore, the permitting level will be determined using the potential to emit after the cyclone in each abrasive blasting process. Operating conditions in the Registration will specify that the cyclones for each of the two (2) abrasive blast cabinets identified as Emissions Unit 07 and Emissions Unit 08 shall operate at all times when the abrasive blasting process is in operation. This determination was made as part of this R097-23537-00593, issued on July 2, 2007.

Enforcement Issues

IDEM is aware that unpermitted emission units, including the eighteen (18) welding stations were constructed at the source. However these units did not require prior approval to construct and operate, since the total potential to emit all regulated pollutants from these units is below the threshold levels specified in 326 IAC 2-1.1-3(e) (Exemptions). Therefore, there are no pending enforcement actions related to this source.

Emission Calculations

See Appendix A of this TSD for detailed emission calculations.

Permit Level Determination – Administrative Amendment

The following table is used to determine the appropriate permit level under 326 IAC 2-5.5-6. This table reflects the PTE before controls of the proposed amendment.

Process/ Emission Unit	PTE of Proposed Amendment (tons/year)									
	PM	PM10	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e	Total HAPs	Worst Single HAP
Grinding	0.08	0.08	0.08	-	-	-	-	-	-	-
Welding	0.98	0.98	0.98	-	-	-	-	-	1.67	0.83 (Cr)
Parts Washer	-	-	-	-	-	1.00	-	-	-	-
NG Combustion	negl.	negl.	negl.	negl.	negl.	negl.	negl.	0.21	negl.	negl.
Total PTE of Proposed Amendment	1.06	1.06	1.06	negl.	negl.	1.00	negl.	0.21	1.67	0.83 (Cr)
negl. = negligible										

Pursuant to 326 IAC 2-5.5-6(d)(10), this change to the registration is considered administrative amendment because the registration is amended to incorporate a modification that adds an emissions unit of the same type that is already permitted or replaces an existing unit and that will comply with the same applicable requirements and permit terms and conditions as the existing emission unit, and the modification does not result in a potential to emit greater than the thresholds in 326 IAC 2-2 (PSD) or 326 IAC 2-3 (Emission Offset), or does not result in a potential to emit of the source equal to or greater than the thresholds in 326 IAC 2-5.1-3(a) (Permits).

PTE of the Entire Source After Issuance of the Administrative Amendment

The table below summarizes the potential to emit of the entire source (after integral controls) after issuance of this amendment, reflecting all limits, of the emission units.

Process/ Emission Unit	Potential To Emit of the Entire Source with the Amendment (tons/year)									
	PM	PM10*	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-
Welding Operations	4.34 2.30	4.34 2.30	4.34 2.30	-	-	-	-	-	4.69 3.36	0.83 1.66 (Cr)
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.01	0.06	0.06 (Hexane)
Blasting Operations***	6.76	6.03	6.03	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	4.30 2.31	-	-	-	-
Grinding	0.08	0.08	0.08	-	-	-	-	-	-	-
Deburring, metal presses, and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-
Paved Roads	0.14	0.03	0.01	-	-	-	-	-	-	-
Unpaved Roads	4.43	1.13	0.11	-	-	-	-	-	-	-
Total PTE of Entire Source	45.64 16.67	44.66 12.72	40.62 11.69	0.02	3.17	44.22 15.23	2.66	3826.01	4.75 3.42	0.83 1.66 (Cr)
Exemptions Levels	5	5	5	10	10	10	25	100,000	25	10
Registration Levels	25	25	25	25	25	25	100	100,000	25	10
negl. = negligible *Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM10), not particulate matter (PM), is considered as a "regulated air pollutant". **The 100,000 CO ₂ e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD. ***The PTE after integral controls is used for determining the permitting level. However, for determining 326 IAC 2-2 (PSD) applicability, the PTE before integral controls is used.										

The table below summarizes the potential to emit of the entire source after issuance of this amendment, reflecting all limits, of the emission units. (Note: the table below was generated from the above table, with bold text un-bolded and strikethrough text deleted)

Process/ Emission Unit	Potential To Emit of the Entire Source with the Amendment (tons/year)									
	PM	PM10*	PM2.5	SO ₂	NO _x	VOC	CO	GHGs as CO ₂ e**	Total HAPs	Worst Single HAP
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-
Welding Operations	2.30	2.30	2.30	-	-	-	-	-	3.36	1.47(Cr)
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.01	0.06	0.06 (Hexane)
Blasting Operations***	6.76	6.03	6.03	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	2.31	-	-	-	-
Grinding	0.08	0.08	0.08	-	-	-	-	-	-	-
Deburring, metal presses, and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-
Paved Roads	0.14	0.03	0.01	-	-	-	-	-	-	-
Unpaved Roads	4.43	1.13	0.11	-	-	-	-	-	-	-
Total PTE of Entire Source	16.67	12.72	11.69	0.02	3.17	15.23	2.66	3826.01	3.42	1.47(Cr)
Exemptions Levels	5	5	5	10	10	10	25	100,000	25	10
Registration Levels	25	25	25	25	25	25	100	100,000	25	10

negl. = negligible
*Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM10), not particulate matter (PM), is considered as a "regulated air pollutant".
**The 100,000 CO₂e threshold represents the Title V and PSD subject to regulation thresholds for GHGs in order to determine whether a source's emissions are a regulated NSR pollutant under Title V and PSD.
***The PTE after integral controls is used for determining the permitting level. However, for determining 326 IAC 2-2 (PSD) applicability, the PTE before integral controls is used.

- (a) This amendment will not change the registration status of the source, because the uncontrolled/unlimited potential to emit of all criteria pollutants from the entire source will still be within the ranges listed in 326 IAC 2-5.5-1(b)(1) and the PTE of all other regulated criteria pollutants will still be less than the ranges listed in 326 IAC 2-5.5-1(b)(1). Therefore, the source will still be subject to the provisions of 326 IAC 2-5.5 (Registrations).
- (b) This amendment will not change the minor status of the source, because the uncontrolled/unlimited potential to emit of any single HAP will still be less than ten (10) tons per year and the PTE of a combination of HAPs will still be less than twenty-five (25) tons per year. Therefore, this source is an area source under Section 112 of the Clean Air Act (CAA) and not subject to the provisions of 326 IAC 2-7.
- (c) This amendment will not change the minor status of the source, because the uncontrolled/unlimited potential to emit greenhouse gases (GHGs) will still be less than the Title V subject to regulation threshold of one hundred thousand (100,000) tons of CO₂ equivalent emissions (CO₂e) per year. Therefore, the source is not subject to the provisions of 326 IAC 2-7.

Federal Rule Applicability Determination

The federal rules applicable to the existing emission units at this source will not change as a result of this amendment.

The federal rule applicability for this amendment is as follows:

New Source Performance Standards (NSPS)

- (a) There are no New Source Performance Standards (NSPS) (326 IAC 12 and 40 CFR Part 60) included for this proposed amendment.

National Emission Standards for Hazardous Air Pollutants (NESHAP)

- (b) The requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Industrial, Commercial, and Institutional Boilers Area Sources, 40 CFR 63.11193 Subpart JJJJJ (6J), are not included for this proposed amendment, since the three (3) space heaters are not industrial, commercial, or institutional boilers.
- (c) The requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) Area Source Standards for Nine Metal Fabrication and Finishing Source Categories, 40 CFR 63.11514 Subpart XXXXXX (6X), are not included for this proposed amendment, this source is not primarily engaged in the operations in one of the nine source categories listed in paragraphs (a)(1) through (9) of 40 CFR 63.11514. In addition, CTP Corp., Division of Tube Processing Corporation, actually operates under SIC code 3498 "Fabricated Pipe and Pipe Fittings", which is not identified in the list of Standard Industrial Classification (SIC) codes included in Table 1 of the Federal Register (FR) publication of the final rule; therefore, the requirements of NESHAP Subpart XXXXXX are not applicable to the source.
- (d) There are no National Emission Standards for Hazardous Air Pollutants (NESHAPs) (326 IAC 14, 326 IAC 20 and 40 CFR Part 63) included for this proposed amendment.

Compliance Assurance Monitoring (CAM)

- (e) Pursuant to 40 CFR 64.2, Compliance Assurance Monitoring (CAM) is not included in the permit, because the potential to emit of the source is limited to less than the Title V major source thresholds and the source is not required to obtain a Part 70 or Part 71 permit.

State Rule Applicability Determination

The state rules applicable to the existing emission units at this source will not change as a result of this amendment.

The following state rules are applicable to the proposed amendment:

- (a) 326 IAC 2-5.5 (Registrations)
Registration applicability is discussed under the Permit Level Determination – Registration section above.
- (b) 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants (HAP))
The proposed amendment is not subject to the requirements of 326 IAC 2-4.1, since the unlimited potential to emit of HAPs from the new units is less than ten (10) tons per year for any single HAP and less than twenty-five (25) tons per year of a combination of HAPs.

- (c) 326 IAC 2-6 (Emission Reporting)
Pursuant to 326 IAC 2-6-1, this source is not subject to this rule, because it is not required to have an operating permit under 326 IAC 2-7 (Part 70), it is not located in Lake, Porter, or LaPorte County, and it does not emit lead into the ambient air at levels equal to or greater than 5 tons per year. Therefore, 326 IAC 2-6 does not apply.
- (d) 326 IAC 5-1 (Opacity Limitations)
Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:
 - (1) Opacity shall not exceed an average of thirty percent (30%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
 - (2) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.
- (e) 326 IAC 6-4 (Fugitive Dust Emissions Limitations)
Pursuant to 326 IAC 6-4 (Fugitive Dust Emissions Limitations), the source shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4.
- (f) 326 IAC 6-5 (Fugitive Particulate Matter Emission Limitations)
Due to this amendment, the source is not subject to the requirements of 326 IAC 6-5, because the fugitive dust sources have potential fugitive particulate emissions less than 25 tons per year.
- (g) 326 IAC 12 (New Source Performance Standards)
See Federal Rule Applicability Section of this TSD.
- (h) 326 IAC 20 (Hazardous Air Pollutants)
See Federal Rule Applicability Section of this TSD.

Grinding Operation

- (i) 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes)
The requirements of 326 IAC 6-3-2 are not applicable to the six (6) grinders, since the grinders are applicable to a more stringent rule.
- (j) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
Pursuant to 326 IAC 6.5, the six (6) grinders are subject to the limitations under 326 IAC 6.5, since the source is located in Marion County and have potential emissions greater than ten (10) tons or more of particulate matter per year.

Pursuant to 326 IAC 6.5, the particulate emissions from each of the six (6) grinders shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Welding Operation

- (k) 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes)
The requirements of 326 IAC 6-3-2 are not applicable to the twenty-three (23) welding units, since the welding units are applicable to a more stringent rule.

- (l) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
Pursuant to 326 IAC 6.5, the twenty-three (23) grinders are subject to the limitations under 326 IAC 6.5, since the source is located in Marion County and have potential emissions greater than ten (10) tons or more of particulate matter per year.

Pursuant to 326 IAC 6.5, the particulate emissions from each of the twenty-three (23) welding units shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Parts Washer

- (m) 326 IAC 8-3-2 (Cold Cleaner Degreaser Control Equipment and Operating Requirements)
Pursuant to 326 IAC 8-3-1(c)(2)(A), the one (1) Nelson parts washer is subject to the requirements under 326 IAC 8-3-2 since, the parts washer is located in Marion County and was constructed after July 1, 1990.

Pursuant to 326 IAC 8-3-2, the owner or operator of cold cleaner degreaser shall ensure the following control equipment and operating requirements are met:

- (1) Equip the degreaser with a cover.
- (2) Equip the degreaser with a device for draining cleaned parts.
- (3) Close the degreaser cover whenever parts are not being handled in the degreaser.
- (4) Drain cleaned parts for at least fifteen (15) seconds or until dripping ceases.
- (5) Provide a permanent, conspicuous label that lists the operating requirements in subdivisions (3), (4), (6), and (7).
- (6) Store waste solvent only in closed containers.
- (7) Prohibit the disposal or transfer of waste solvent in such a manner that could allow greater than twenty percent (20%) of the waste solvent (by weight) to evaporate into the atmosphere.

The owner or operator of a cold cleaner degreaser subject to this subsection shall ensure the following additional control equipment and operating requirements are met:

- (1) Equip the degreaser with one (1) of the following control devices if the solvent is heated to a temperature of greater than forty-eight and nine-tenths (48.9) degrees Celsius (one hundred twenty (120) degrees Fahrenheit):
 - (A) A freeboard that attains a freeboard ration of seventy-five hundredths (0,75) or greater.
 - (B) A water cover when solvent used is insoluble in, and heavier than, water.
 - (C) A refrigerated chiller.
 - (D) Carbon adsorption.
 - (E) An alternative system of demonstrated equivalent or better control as those outlined in clauses (A) through (D) that is approved by the department. An alternative system shall be submitted to the U.S. EPA as a SIP revision.

- (2) Ensure the degreaser cover is designed so that it can be easily operated with one (1) hand if the solvent is agitated or heated.
- (3) If used, solvent spray:
 - (A) must be a solid, fluid stream; and
 - (B) shall be applied at a pressure that does not cause excessive splashing.

Natural Gas Combustion

- (n) 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating)
The requirements of 326 IAC 6-2-4 are not applicable to the three (3) space heaters, since the space heaters are sources of direct heating.
 - (o) 326 IAC 6-3-2 (Particulate Emission Limitations for Manufacturing Processes)
The requirements of 326 IAC 6-3-2 are not applicable to the three (3) space heaters, since the space heaters are not considered a manufacturing process.
 - (p) 326 IAC 6.5 (Particulate Matter Limitations Except Lake County)
Pursuant to 326 IAC 6.5-1-1(a)(2), the three (3) space heaters are subject to 326 IAC 6.5-1-2(a), since they emit particulate matter.
- Pursuant to 326 IAC 6.5, the three (3) space heaters (SH1 through SH3) shall not exceed seven-hundredths (0,07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)).

Proposed Changes

The following changes listed below are due to the proposed amendment. Deleted language appears as ~~striketrough~~ text and new language appears as **bold** text:

A.3 Emission Units and Pollution Control Equipment Summary

This stationary source consists of the following emission units and pollution control devices:

Plant 1 – CTP Sheetmetal, 3555 Madison Avenue

- (a) Twenty-one (21) welding units, identified as Emission Units W01-W21, constructed in 2007 and approved for modification in 2011, all exhausting to the indoors, consisting of the following units:
 - (1) Fifteen (15) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr);
 - (2) Three (3) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr);
 - (3) Two (2) portable Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr); and
 - (4) One (1) seam welder, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr).

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) W01-W21 are considered affected facilities.~~

- (b) Two (2) deburring operations, identified as Emission Units D01-D02, installed in 2007, including one (1) hand held deburring with pneumatic tools, and one (1) vibratory deburring, with total maximum capacity of 2000 pounds of metal per hour (lb/hr), and exhausting to the indoors.
- (c) One (1) parts washer, identified as Emissions Unit PW02, installed in 2007, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.925 gallons per hour, and exhausting to the indoors.
- (d) Ten (10) natural gas fired combustion heaters, identified as Emissions Unit 03, installed in 2002, with a maximum combined heat input capacity of 5.98 million Btu per hour (mm Btu/hr), and exhausting to the indoors.
- (e) One (1) plasma cutter, identified as Emission Unit P01, approved in 2011 for construction, with a maximum metal cutting rate of 56.29 inches per **minute**, and exhausting to the indoors.
- (f) **Paved and unpaved roads**
- (g) **Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, using no controls, and exhausting indoors.**

Plant 2 - CTP, Division of Tube Processing Corporation 3750 South Shelby Street

- (a) Two (2) acid wash lines for cleaning metal parts, identified as Emissions Unit 06, installed in 1976, approved in 2011 for modification, and exhausting to the indoors. Each wash line contains two (2) acid tanks, two (2) soap tanks, and two (2) rinse tanks containing water.
- (b) Two (2) abrasive blast cabinets, consisting of the following units:
 - (1) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07, installed in 1974, utilizing steel shot as blasting media, ~~which with~~ **a maximum capacity of blasting media usage rate of 2952 lbs per hour**, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) Emissions Unit 07 is considered an affected facility.~~

- (2) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08, installed in 1974, utilizing glass shot as blasting media, ~~which with~~ **a maximum capacity of blasting media usage rate of 362 lbs per hour**, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.
- (c) ~~Eighteen~~ **Thirty-six (36)** welding units, identified as Emission Units W22-W39**58**, installed in 1974, and approved for modification in 2011, with a maximum electrode usage estimated at 105,208 pounds per year, all exhausting to the indoors, consisting of the following units:
 - (1) ~~Nine~~ **Eighteen (18)** Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) **each**; and

- (2) ~~Nine~~ **Eighteen (918)** Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) **each**.

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) W22-W39 are considered affected facilities.~~

....

(h) Paved Roads

Tool Room - South Shelby Street

- (i) **Six (6) grinders, identified as G1 through G6, approved for construction in 2013, with a maximum capacity of 691.1 lb/hr each, using cyclone dust collector as control for the two Baldor Grinders and no controls for the other four (4) grinders, and exhausting outdoors.**
- (j) **Two (2) TIG Welders, identified as W59 and W60, approved for construction in 2013, with a maximum electrode usage of 0.59 lb/hr each, using no controls and exhausting indoors.**
- (k) **One (1) MIG Welder, identified as W61, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr, using no controls and exhausting indoors.**
- (l) **Two (2) portable MIG Welders, identified as W62 and W63, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr each, using no controls, and exhausting indoors.**
- (m) **Two (2) space heaters, identified as SH1 and SH2, approved for construction in 2013, with a maximum heat input capacity of 0.00015 MMBtu/hr each, using no controls, and exhausting indoors.**
- (n) **One (1) space heater, identified as SH3, approved for construction in 2013, with a maximum heat input capacity of 0.0001 MMBtu/hr, using no controls, and exhausting indoors.**
- (o) **One (1) Nelson small parts washer, located in Tool Room, approved for construction in 2013, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.**

...

SECTION D.1

OPERATION CONDITIONS

Facility Description [326 IAC 2-5.1-2(f)(2)] [326 IAC 2-5.5-4(a)(2)]:

Plant 1 – CTP Sheetmetal, 3555 Madison Avenue

- (a) Twenty-one (21) welding units, identified as Emission Units W01-W21, constructed in 2007 and approved for modification in 2011, all exhausting to the indoors, consisting of the following units:
- (1) Fifteen (15) Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr);
- (2) Three (3) Metal Inert Gas (MIG) welding stations, with a maximum electrode usage

capacity of 1.5 pounds of metal per hour (lb/hr);

- (3) Two (2) portable Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.5 pounds of metal per hour (lb/hr); and
- (4) One (1) seam welder, with a maximum electrode usage capacity of 0.59 pounds of metal per hour (lb/hr).

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) W01-W21 are considered affected facilities.~~

...

- (c) One (1) parts washer, identified as Emissions Unit PW02, installed in 2007, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.025 gallons per hour, and exhausting to the indoors.

...

- (e) One (1) plasma cutter, identified as Emission Unit P01, approved in 2011 for construction, with a maximum metal cutting rate of 56.29 inches per **minute**, and exhausting to the indoors.

...

- (g) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, using no controls, and exhausting indoors.**

Plant 2 - CTP, Division of Tube Processing Corporation 3750 South Shelby Street

...

- (b) Two (2) abrasive blast cabinets, consisting of the following units:

- (1) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07, installed in 1974, utilizing steel shot as blasting media, ~~which with~~ **a maximum capacity of blasting media usage rate of 2952 lbs per hour**, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) Emissions Unit 07 is considered an affected facility.~~

- (2) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08, installed in 1974, utilizing glass shot as blasting media, ~~which with~~ **a maximum capacity of blasting media usage rate of 362 lbs per hour**, using an integral cyclone to recirculate recovered blasting media and a baghouse as control, and exhausting to the indoors.

- (c) ~~Eighteen~~ **Thirty-six (36)** welding units, identified as Emission Units W22-W39**58**, installed in 1974, and approved for modification in 2011, with a maximum electrode usage estimated at 105,208 pounds per year, all exhausting to the indoors, consisting of the following units:

- (1) ~~Nine~~ **Eighteen (18)** Tungsten Inert Gas (TIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) **each**; and
- (2) ~~Nine~~ **Eighteen (18)** Metal Inert Gas (MIG) welding stations, with a maximum electrode usage capacity of 1.99 pounds of metal per hour (lb/hr) **each**.

~~Under the NESHAP for Nine Metal Fabrication and Finishing Source Categories (40 CFR 63, Subpart XXXXXX(6X)) W22-W39 are considered affected facilities.~~

...

Tool Room - South Shelby Street

- (i) **Six (6) grinders, identified as G1 through G6, approved for construction in 2013, with a maximum capacity of 691.1 lb/hr each, using cyclone dust collector as control for the two Baldor Grinders and no controls for the other four (4) grinders, and exhausting outdoors.**
- (j) **Two (2) TIG Welders, identified as W59 and W60, approved for construction in 2013, with a maximum electrode usage of 0.59 lb/hr each, using no controls and exhausting indoors.**
- (k) **One (1) MIG Welder, identified as W61, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr, using no controls and exhausting indoors.**
- (l) **Two (2) portable MIG Welders, identified as W62 and W63, approved for construction in 2013, with a maximum electrode usage of 1.5 lb/hr each, using no controls, and exhausting indoors.**
- (m) **Two (2) space heaters, identified as SH1 and SH2, approved for construction in 2013, with a maximum heat input capacity of 0.00015 MMBtu/hr each, using no controls, and exhausting indoors.**
- (n) **One (1) space heater, identified as SH3, approved for construction in 2013, with a maximum heat input capacity of 0.0001 MMBtu/hr, using no controls, and exhausting indoors.**
- (o) **One (1) Nelson small parts washer, located in Tool Room, approved for construction in 2013, using a maximum capacity of 300 gallons and a maximum cleaner usage rate of 0.25 gallons per hour, and exhausting to the indoors.**

...

...

Emission Limitations and Standards [326 IAC 2-5.1-2(f)(1)] [326 IAC 2-5.5-4(a)(1)]

D.1.1 Particulate [326 IAC 6.5]

Pursuant to 326 IAC 6.5-1-2(a), particulate matter emissions from the following facilities shall not exceed seven-hundredths (0.07) gram per dry standard cubic meter (g/dscm) (three-hundredths (0.03) grain per dry standard cubic foot (dscf)):

- (1) Twenty-one (21) welding units, identified as Emission Units W01-W21;
- (2) Two (2) deburring operations, identified as Emission Units D01-D02;
- (3) One (1) plasma cutter, identified as Emission Unit P01;
- (4) Metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02;
- (5) ~~Eighteen~~ **Thirty-six (36)** welding units, identified as Emission Units W22-W39**58**; and
- (6) Fourteen (14) non-HAP emitting brazing stations.
- (7) One (1) Cyclo-Blast blast cabinet, identified as Emissions Unit 07; and
- (8) One (1) ICM Superhone 3600 blast cabinet, identified as Emissions Unit 08.
- (9) **Six (6) Grinders, identified as G1 through G6, and**
- (10) **Five (5) Welders, identified as W59 through W63.**
- (11) **Three (3) space heaters, identified as SH1 through SH3**
- (12) **One (1) natural gas fired Air Make-Up Unit**

(13) Twenty (20) natural gas heaters

~~D.1.2 Cold Cleaner Operation (326 IAC 8-3-2)~~

~~Pursuant to 326 IAC 8-3-2 (Cold Cleaner Operation) the owner or operator of this cold cleaning facility shall:~~

- ~~(1) equip the cleaner with a cover;~~
- ~~(2) equip the cleaner with a facility for draining cleaned parts;~~
- ~~(3) close the degreaser cover whenever parts are not being handled in the cleaner;~~
- ~~(4) drain cleaned parts for at least fifteen (15) seconds or until dripping ceases;~~
- ~~(5) provide a permanent, conspicuous label summarizing the operating requirement;~~
- ~~(6) store waste solvent only in covered containers and not dispose of waste solvent or transfer it to another party, in such a manner that greater than twenty percent (20%) of the waste solvent (by weight) can evaporate into the atmosphere.~~

~~D.1.3 Cold Cleaner Operation (326 IAC 8-3-5)~~

~~Pursuant to 326 IAC 8-3-5 (Cold Cleaner Degreaser Operation and Control), the owner or operator of a cold cleaner degreaser facility shall ensure that the following control equipment requirements are met:~~

- ~~(1) Equip the degreaser with a cover. The cover must be designed so that it can be easily operated with one (1) hand if:~~
 - ~~(A) the solvent volatility is greater than two (2) kiloPascals (fifteen (15) millimeters of mercury or three-tenths (0.3) pounds per square inch) measured at thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F));~~
 - ~~(B) the solvent is agitated; or~~
 - ~~(C) the solvent is heated.~~
- ~~(2) Equip the degreaser with a facility for draining cleaned articles. If the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury or six-tenths (0.6) pounds per square inch) measured at thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F)), then the drainage facility must be internal such that articles are enclosed under the cover while draining. The drainage facility may be external for applications where an internal type cannot fit into the cleaning system.~~
- ~~(3) Provide a permanent, conspicuous label which lists the operating requirements outlined in subsection (b).~~
- ~~(4) The solvent spray, if used, must be a solid, fluid stream and shall be applied at a pressure which does not cause excessive splashing.~~
- ~~(5) Equip the degreaser with one (1) of the following control devices if the solvent volatility is greater than four and three-tenths (4.3) kiloPascals (thirty-two (32) millimeters of mercury or six-tenths (0.6) pounds per square inch) measured at thirty-eight degrees Celsius (38°C) (one hundred degrees Fahrenheit (100°F)), or if the solvent is heated to a~~

~~temperature greater than forty-eight and nine-tenths degrees Celsius (48.9°C) (one hundred twenty degrees Fahrenheit (120°F)):~~

~~(A) A freeboard that attains a freeboard ratio of seventy-five hundredths (0.75) or greater.~~

~~(B) A water cover when solvent used is insoluble in, and heavier than water.~~

~~(C) Other systems of demonstrated equivalent control such as a refrigerated chiller or carbon adsorption. Such systems shall be submitted to the U.S. EPA as a SIP revision.~~

~~(6) The owner or operator of a cold cleaning facility shall ensure that the following operating requirements are met:~~

~~(A) Close the cover whenever articles are not being handled in the degreaser.~~

~~(B) Drain cleaned articles for at least fifteen (15) seconds or until dripping ceases.~~

~~(C) Store waste solvent only in covered containers and prohibit the disposal or transfer of waste solvent in any manner in which greater than twenty percent (20%) of the waste solvent by weight could evaporate.~~

D.1.2 Preventive Maintenance Plan [326 IAC 1-6-3]

A Preventive Maintenance Plan is required for these facilities and their control devices. Section B - Preventive Maintenance Plan contains the Registrant's obligation with regard to the preventive maintenance plan required by this condition.

D.1.3 Cold Cleaner Degreaser Control Equipment and Operating Requirements [326 IAC 8-3-2]

(a) Pursuant to 326 IAC 8-3-2, the owner or operator of cold cleaner degreaser shall ensure the following control equipment and operating requirements are met:

(1) Equip the degreaser with a cover.

(2) Equip the degreaser with a device for draining cleaned parts.

(3) Close the degreaser cover whenever parts are not being handled in the degreaser.

(4) Drain cleaned parts for at least fifteen (15) seconds or until dripping ceases.

(5) Provide a permanent, conspicuous label that lists the operating requirements in subdivisions (3), (4), (6), and (7).

(6) Store waste solvent only in closed containers.

(7) Prohibit the disposal or transfer of waste solvent in such a manner that could allow greater than twenty percent (20%) of the waste solvent (by weight) to evaporate into the atmosphere.

(b) The owner or operator of a cold cleaner degreaser subject to this subsection shall ensure the following additional control equipment and operating requirements are met:

- (1) Equip the degreaser with one (1) of the following control devices if the solvent is heated to a temperature of greater than forty-eight and nine-tenths (48.9) degrees Celsius (one hundred twenty (120) degrees Fahrenheit):
 - (A) A freeboard that attains a freeboard ration of seventy-five hundredths (0,75) or greater.
 - (B) A water cover when solvent used is insoluble in, and heavier than, water.
 - (C) A refrigerated chiller.
 - (D) Carbon adsorption.
 - (E) An alternative system of demonstrated equivalent or better control as those outlined in clauses (A) through (D) that is approved by the department. An alternative system shall be submitted to the U.S. EPA as a SIP revision.
- (2) Ensure the degreaser cover is designed so that it can be easily operated with one (1) hand if the solvent is agitated or heated.
- (3) If used, solvent spray:
 - (A) must be a solid, fluid stream; and
 - (B) shall be applied at a pressure that does not cause excessive splashing.

Compliance Determination Requirements [326 IAC 2-5.1-2(g)] [326 IAC 2-5.5-4(b)]

D.1.45 Particulate Control

In order to comply with Condition D.1.1, the cyclones for particulate control shall be in operation and control emissions from Emission Unit 07 and Emission Unit 08 at all times the Cyclo-Blast blast cabinet and the ICM Superhone 3600 blast cabinet are in operation.

Conclusion and Recommendation

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant. An application for the purposes of this review was received on March 21, 2013.

The construction and operation of this proposed amendment shall be subject to the conditions of the attached proposed Administrative Amendment No. 097-32980-00593. The staff recommends to the Commissioner that this Administrative Amendment be approved.

IDEM Contact

- (a) Questions regarding this proposed permit can be directed to Deena Patton at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 234-5400 or toll free at 1-800-451-6027 extension 4-5400.
- (b) A copy of the findings is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>

- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM's Guide for Citizen Participation and Permit Guide on the Internet at: www.in.gov/idem

**Appendix A: Emissions Calculations
Source-Wide Summary**

Page 1 of 15 TSD App. A

Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Potential to Emit Before Integral Controls (tons/year)											
Emission Unit	PM	PM10	PM2.5	SO2	NOx	VOC	CO	CO2e	Total HAP	Highest Single HAP	
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-	-
Welding Operations	2.30	2.30	2.30	-	-	-	-	-	3.36	1.66	Cr
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.22	0.06	0.06	Hexane
Blasting Operations*	67.55	60.31	60.31	-	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	2.31	-	-	-	-	-
Grinding	0.08	0.08	0.08	-	-	-	-	-	-	-	-
Deburring, metal presses and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-	-
Paved Roads	0.14	0.03	0.01	-	-	-	-	-	-	-	-
Unpaved Roads	4.43	1.13	0.11	-	-	-	-	-	-	-	-
Total	77.47	67.00	65.97	0.02	3.17	15.23	2.66	3826.22	3.42	1.66	Cr

* The PTE after integral controls is used for determining the permitting level. However, for determining 326 IAC 2-2 (PSD) applicability, the PTE before integral controls is used.

Potential to Emit After Integral Controls (tons/year)											
Emission Unit	PM	PM10	PM2.5	SO2	NOx	VOC	CO	CO2e	Total HAP	Highest Single HAP	
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-	-
Welding Operations	2.30	2.30	2.30	-	-	-	-	-	3.36	1.66	Cr
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.22	0.06	0.06	Hexane
Blasting Operations*	6.76	6.03	6.03	-	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	2.31	-	-	-	-	-
Grinding	0.08	0.08	0.08	-	-	-	-	-	-	-	-
Deburring, metal presses and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-	-
Paved Roads	0.14	0.03	0.01	-	-	-	-	-	-	-	-
Unpaved Roads	4.43	1.13	0.11	-	-	-	-	-	-	-	-
Total	16.67	12.72	11.69	0.02	3.17	15.23	2.66	3826.22	3.42	1.66	Cr

* The PTE after integral controls is used for determining the permitting level. However, for determining 326 IAC 2-2 (PSD) applicability, the PTE before integral controls is used.

Controlled Potential to Emit (tons/year)											
Emission Unit	PM	PM10	PM2.5	SO2	NOx	VOC	CO	CO2e	Total HAP	Highest Single HAP	
Acid Wash Lines	-	-	-	-	-	12.74	-	-	-	-	-
Welding Operations	2.30	2.30	2.30	-	-	-	-	-	3.36	1.66	Cr
Natural Gas Combustion	0.06	0.24	0.24	0.02	3.17	0.17	2.66	3826.22	0.06	0.06	Hexane
Blasting Operations*	0.07	0.06	0.06	-	-	-	-	-	-	-	-
Parts Washers	-	-	-	-	-	2.31	-	-	-	-	-
Grinding	0.05	0.05	0.05	-	-	-	-	-	-	-	-
Deburring, metal presses and brazing	2.92	2.92	2.92	-	-	-	-	-	-	-	-
Paved Roads	0.14	0.03	0.01	-	-	-	-	-	-	-	-
Unpaved Roads	4.43	1.13	0.11	-	-	-	-	-	-	-	-
Total	9.96	6.73	5.69	0.02	3.17	15.23	2.66	3826.22	3.42	1.66	Cr

Appendix A: Emissions Calculations
Wash Lines in Plant 2 After Revision

Page 2 of 15 TSD App. A

Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Two (2) acid wash lines (Emissions Unit 06)
PTE Calculations

VOC PTE

Product	Manufacturer	Density (lbs/gal)	VOC Content (wt%)	Max. Usage (gal/hr)	VOC PTE (lbs/hr)	VOC PTE (tpy)
CT-5A	Chemtool, Inc.	6.94	33%	1.29	2.91	12.74
TOTAL						12.74

Note PTE = Potential to Emit

Methodology

Density (lbs/gal) = as taken from MSDS

[Pollutant] Content (wt%) = as taken from MSDS

Max. Usage (gal/hr) = 3,960 product usage (2010) / 4,590 actual hours of operation per year x 1.5 safety factor

Based on performance testing, CTP anticipates same usage of new product (CT-54) as with old product

VOC PTE (lbs/hr) = Max. Usage (gal/hr) x Density (lbs/gal) x VOC Content (wt%)

VOC PTE (tpy) = VOC PTE (lbs/hr) x 8,760 hours per year x 2,000 lbs per ton

Appendix A: Emissions Calculations
Welding Operations in Plant 1 After Revision

Page 3 of 15 TSD App. A

Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Welding Operations
 PTE Calculations

Plant 1 (Wedling Units W-01 through W21)

Welding Type	Station #	Max. Electrode Consumption (lbs/hr)	PM/PM10/PM2.5 Emission Factor	Manganese Emission Factor	PM/PM10/PM2.5 PTE (lbs/hr)	Manganese PTE (lbs/hr)	PM/PM10/PM2.5 PTE (tpy)	Manganese PTE (tpy)
MIG	5	1.5	0.0055	0.0005	0.04	0.004	0.18	0.02
TIG + Seam Welder	16	0.59	0.0055	0.0005	0.05	0.005	0.23	0.02
Total							0.408	0.037

Flame Cutting	Station #	Max. Metal Cutting Rate (in./minute)	PM/PM10/PM2.5 Emission Factor	PM/PM10/PM2.5 PTE (lbs/hr)	PM/PM10/PM2.5 PTE (tpy)
Plasma Cutter P01	1	56.29	0.0039	0.01	0.06

Note PTE = Potential to Emit

Methodology

*Emission Factors are default values for carbon steel unless a specific electrode type is noted in the Process column.

**Emission Factor for plasma cutting from American Welding Society (AWS). Trials reported for wet cutting of 8 mm thick mild steel with 3.5 m/min cutting speed (at 0.2 g/min emitted). Therefore, the emission factor for plasma cutting is for 8 mm thick rather than 1 inch, and the maximum metal thickness is not used in calculating the emissions.

Using AWS average values: (0.25 g/min)/(3.6 m/min) x (0.0022 lb/g)/(39.37 in./m) x (1,000 in.) = 0.0039 lb/1,000 in. cut, 8 mm thick
 Plasma cutting emissions, lb/hr: (# of stations)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 8 mm thick)
 Cutting emissions, lb/hr: (# of stations)(max. metal thickness, in.)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 1" thick)
 Welding emissions, lb/hr: (# of stations)(max. lbs of electrode used/hr/station)(emission factor, lb. pollutant/lb. of electrode used)
 Emissions, lbs/day = emissions, lbs/hr x 24 hrs/day
 Emissions, tons/yr = emissions, lb/hr x 8,760 hrs/year x 1 ton/2,000 lbs.

Appendix A: Emissions Calculations
Welding Operations in Plant 2 (W22 through W58) After Revision

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Particulate Matter (PM) and Hazardous Air Pollutants (HAPs)

PROCESS	Electrode Type	Max. electrode consumption per station (lbs/hr)	Max. electrode consumption per station (lbs/day)	Number of Stations	Max. electrode consumption (lbs/year)	EMISSION FACTORS* (lb pollutant/lb electrode)				EMISSIONS (lbs/hr)				HAPS (lbs/hr)
						PM/PM10/PM2.5	Cr	Mn	Ni	PM/PM10/PM2.5	Cr	Mn	Ni	
Gas Metal Arc Welding	ER70S-3	1.99	47.76	36	627,566	5.2E-03	1.0E-05	3.2E-03	1.0E-05	0.37	0.0007	0.23	0.0007	0.23
Gas Metal Arc Welding	ER308LSi	1.99	47.76	36	627,566	5.4E-03	5.2E-03	3.5E-03	1.8E-03	0.39	0.38	0.25	0.13	0.76
Gas Metal Arc Welding	ER309LSi	1.99	47.76	36	627,566	N/A	N/A	N/A	N/A					
Gas Metal Arc Welding	ER316LSi	1.99	47.76	36	627,566	3.2E-03	5.3E-03	2.5E-03	2.3E-03	0.23	0.38	0.18	0.16	0.72
Gas Metal Arc Welding	ER4043/	1.99	47.76	36	627,566	N/A	N/A	N/A	N/A					

Abbreviations

Cr = Chromium
 Ni = Nickel
 Mn = Manganese

Maximum PTE lbs/hr	0.39	0.38	0.25	0.16	0.76
Maximum PTE lbs/day	9.28	9.1E+00	5.95	3.89	18.12
Maximum PTE tons/year	1.69	1.66	1.09	0.71	3.31

Methodology:

*Emission Factors are default values for Gas Metal Arc Welding (GMAW) (SCC 3-09-052) Electrode Type E308, E70S, ER316, AP-42. There were no available Emission Factors for ER309LSi or ER4043/ER5356 in AP-42.

In order to determine the maximum PTE from the GMAW welding, the Max PTE was calculated using the available emission factors for E308, E70S, ER316 for 18 stations and 1.99 lbs/hr of electrode per station.

Welding emissions, lb/hr: (# of stations)(max. lbs of electrode used/hr/station)(emission factor, lb. pollutant/lb. of electrode used)

Emissions, lbs/day = emissions, lbs/hr x 24 hrs/day

Emissions, tons/yr = emissions, lb/hr x 8,760 hrs/year x 1 ton/2,000 lbs.

Appendix A: Emissions Calculations
Welding Operations in Tool Room

Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Welding Type	Max. Electrode Consumption (lbs/hr)	PM/PM10/PM2.5 Emission Factor (lb pollutant / lb electrode)	Manganese Emission Factor (lb pollutant / lb electrode)	PM/PM10/PM2.5 Emission (lb/hr)	Manganese Emissions (lb/hr)	PM/PM10/PM2.5 Potential (ton/yr)	Manganese Potential (ton/yr)
MIG	1.5	0.0055	0.0005	0.0083	0.0008	0.0361	0.0033
TIG + Seam Welder	0.59	0.0055	0.0005	0.0032	0.0003	0.0142	0.0013
TIG + Seam Welder	0.59	0.0055	0.0005	0.0032	0.0003	0.0142	0.0013
Portable maintenance welders	1.5	0.0055	0.0005	0.0083	0.0008	0.0361	0.0033
Portable maintenance welders	1.5	0.0055	0.0005	0.0083	0.0008	0.0361	0.0033
Total				0.0312	0.0028	0.1368	0.0124

Methodology

PM/PM10/PM2.5 Emission (lb/hr) = Max. Electrode Consumption (lb/hr) * PM/PM10/PM2.5 Emission Factor (lb pollutant/lb electrode)

Manganese Emission (lb/hr) = Max. Electrode Consumption (lbs/hr) * Manganese Emission Factor (lb pollutant / lb electrode)

PM/PM10/PM2.5 Potential (ton/yr) = PM/PM10/PM2.5 Emission (lb/hr) * 8760 hr / 2000 lb

Manganese Potential (ton/yr) = Manganese Emissions (lb/hr) * 8760 hr / 2000 lb

Total (ton/yr) from all Three Rooms			
PM/PM10/PM2.5	Total HAPs	Worst Single HAP	
2.30	3.36	1.66	Cr

Appendix A: Emissions Calculations
Natural Gas Combustion Only
MM BTU/HR <100

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Emission Unit Description	Total Heat Input Capacity (MMBtu/hr)
Plant 1 (Madison) - Heaters (10) (Emission Unit 03)	5.98
Plant 2 (Shelby) - Space Heaters (10)	1.35
Plant 2 (Shelby) - Air Make-Up Unit	0.05
Tool Room Space Heaters SH1 and SH2 (2 at 1.5 E-04)	0.0003
Tool Room Space Heater SH3	0.0001
Total	7.38

Heat Input Capacity
MMBtu/hr

7.38

Potential Throughput
MMCF/yr

63.4

Emission Factor in lb/MMCF	Pollutant						
	PM*	PM10*	PM2.5	SO ₂	NOx	VOC	CO
	1.9	7.6	7.6	0.6	100.0	5.5	84.0
PTE in tons/yr	0.06	0.24	0.24	0.02	**see below	0.17	2.66

*PM emission factor is filterable PM only. PM10 emission factor is filterable and condensable PM10 combined.

**Emission Factors for NOx: Uncontrolled = 100, Low NOx Burner = 50, Low NOx Burners/Flue gas recirculation = 32

Note PTE = Potential to Emit

Methodology

All emission factors are based on normal firing.

MMBtu = 1,000,000 Btu

MMCF = 1,020,000 Cubic Feet of Gas

NOx and CO Emission Factors are from AP 42, Chapter 1.4, Table 1.4-1

PM, SO₂, CO₂, N₂O and Methane Emission Factors are from AP 42, Chapter 1.4, Table 1.4-2

PTE (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

See next page for HAPs PTE calculations.

Appendix A: Emissions Calculations
Natural Gas Combustion Only
MM BTU/HR <100
HAPs PTE

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

HAPs - Organics					
Emission Factor in lb/MMcf	Benzene 2.1E-03	Dichlorobenzene 1.2E-03	Formaldehyde 7.5E-02	Hexane 1.8E+00	Toluene 3.4E-03
PTE in tons/yr	6.7E-05	3.8E-05	2.4E-03	5.7E-02	1.1E-04

HAPs - Metals						
Emission Factor in lb/MMcf	Lead 5.0E-04	Cadmium 1.1E-03	Chromium 1.4E-03	Manganese 3.8E-04	Nickel 2.1E-03	Total
PTE in tons/yr	1.6E-05	3.5E-05	4.4E-05	1.2E-05	6.7E-05	0.060

Note PTE = Potential to Emit

Methodology is the same as previous page.

Organic HAPs Emission Factors are from AP 42, Chapter 1.4, Table 1.4-3

Metal HAPs Emission Factors are from AP 42, Chapter 1.4, Table 1.4-4

The five highest organic and metal HAPs emission factors are provided above.

Additional HAPs emission factors are available in AP-42, Chapter 1.4, Tables 1.4-3 and 1.4-4

See Next Page for Greenhouse Gas calculations.

Appendix A: Emissions Calculations
Natural Gas Combustion Only
MM BTU/HR <100
Greenhouse Gas Emissions

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Emission Factor in lb/MMcf	Greenhouse Gas		
	CO2	CH4	N2O
	120,000	2.3	2.2
Potential Emission in tons/yr	3803.1	0.07	0.07
Summed Potential Emissions in tons/yr	3803.22		
CO2e Total in tons/yr	3826.22		

Methodology

The N2O Emission Factor for uncontrolled is 2.2. The N2O Emission Factor for low Nox burner is 0.64.

Emission Factors are from AP 42, Table 1.4-2 SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03.

Greenhouse Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

CO2e (tons/yr) = CO2 Potential Emission ton/yr x CO2 GWP (1) + CH4 Potential Emission ton/yr x CH4 GWP (21) + N2O Potential Emission ton/yr x N2O GWP (310).

**Appendix A: Emissions Calculations
Blasting Operations**

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Blasting Operations
PTE Calculations

Cyclo-Blast using Steel Shot

Sand Flow Rate (lb/hr)	Actual Nozzle Internal Diameter (in)	Nozzle Internal Diameter (in)	Density of Abrasive (lb/ft ³)	Density of Sand (lb/ft ³)	Abrasive Flow Rate (lb/hr)
600	0.375	0.375	487	99	2952

Abrasive Flow Rate (lb/hr)	PM Emission Factor (lb PM/lb Abrasive)	Integral Cyclone Control Efficiency	PM PTE after integral controls (lbs/hr)	PM PTE after integral controls (tpy)	*Uncontrolled PM PTE (tpy)	PM ₁₀ Emission Factor (lb PM ₁₀ /lb PM)	PM10 PTE after integral controls (lbs/hr)	PM10 PTE after integral controls (tpy)	*Uncontrolled PM10 PTE (tpy)
2952	0.004	90%	1.18	5.17	51.71	0.86	1.02	4.45	44.47
		Baghouse Efficiency	Controlled PM PTE (lbs/hr)	Controlled PM PTE (tpy)			Controlled PM10 PTE (lbs/hr)	Controlled PM10 PTE (tpy)	
		99%	0.01	0.05			0.01	0.04	

Note PTE = Potential to Emit

* Since the control device has been determined to be integral to the process, the controlled PTE is used for determining the Part 70 permitting level. However, the uncontrolled PTE is necessary to calculate because integral to the process is not used when determining the PTE to show minor source status under 326 IAC 2-2 (PSD).

Methodology

Emission Factors and Supplied Variables taken from "Stappa-Alapco, Section 3: Abrasive Blasting"

Actual Nozzle Internal Diameter (in) = taken from unit specifications

Abrasive Flow Rate (lb/hr) = Sand Flow Rate (lb/hr) x (Actual Nozzle Internal Diameter [in] / Nozzle Internal Diameter [in]) x (Density of Abrasive [lb/ft³] / Density of Sand [lb/ft³])

PM PTE (lbs/hr) = Abrasive Flow Rate (lb/hr) x Emission Factor (lb PM/lb Abrasive) x (1 - Integral Cyclone Control Efficiency)

PM PTE (tpy) = PM PTE x 8,760 hours per year / 2,000 lbs per ton

PM10 PTE (lbs/hr) = Abrasive Flow Rate (lb/hr) x Emission Factor (lb PM/lb Abrasive) x PM10 Emission Factor (lb PM10/lb PM) x (1 - Integral Cyclone Efficiency)

PM10 PTE (tpy) = PM10 PTE (lbs/hr) x 8,760 hours per year / 2,000 lbs per ton

**Appendix A: Emissions Calculations
Blasting Operations**

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Blasting Operations
PTE Calculations

ICM Superhone using Glass Shot

Sand Flow Rate (lb/hr)	Actual Nozzle Internal Diameter (in)	Nozzle Internal Diameter (in)	Density of Abrasive (lb/ft ³)	Density of Sand (lb/ft ³)	Abrasive Flow Rate (lb/hr)
221	0.25	0.25	162	99	362

Abrasive Flow Rate (lb/hr)	PM Emission Factor (lb PM/lb Abrasive)	Integral Cyclone Control Efficiency	PM PTE after integral controls (lbs/hr)	PM PTE after integral controls (tpy)	*Uncontrolled PM PTE (tpy)	PM ₁₀ Emission Factor (lb PM ₁₀ /lb PM)	PM10 PTE after integral controls (lbs/hr)	PM10 PTE after integral controls (tpy)	*Uncontrolled PM10 PTE (tpy)
362	0.01	90%	0.36	1.58	15.84	1	0.36	1.58	15.84
		Baghouse Efficiency	Controlled PM PTE (lbs/hr)	Controlled PM PTE (tpy)			Controlled PM10 PTE (lbs/hr)	Controlled PM10 PTE (tpy)	
		99%	0.004	0.02			0.004	0.02	

Note PTE = Potential to Emit

* Since the control device has been determined to be integral to the process, the controlled PTE is used for determining the Part 70 permitting level. However, the uncontrolled PTE is necessary to calculate because integral to the process is not used when determining the PTE to show minor source status under 326 IAC 2-2 (PSD).

Methodology

Emission Factors and Supplied Variables taken from "Stappa-Alapco, Section 3: Abrasive Blasting"

Actual Nozzle Internal Diameter (in) = taken from unit specifications

Abrasive Flow Rate (lb/hr) = Sand Flow Rate (lb/hr) x (Actual Nozzle Internal Diameter [in] / Nozzle Internal Diameter [in]) x (Density of Abrasive [lb/ft³]
/ Density of Sand [lb/ft³])

PM PTE (lbs/hr) = Abrasive Flow Rate (lb/hr) x Emission Factor (lb PM/lb Abrasive) x (1 - Integral Cyclone Control Efficiency)

PM PTE (tpy) = PM PTE x 8,760 hours per year / 2,000 lbs per ton

PM10 PTE (lbs/hr) = Abrasive Flow Rate (lb/hr) x Emission Factor (lb PM/lb Abrasive) x PM10 Emission Factor (lb PM10/lb PM) x (1 - Integral Cyclone Efficiency)

PM10 PTE (tpy) = PM10 PTE (lbs/hr) x 8,760 hours per year / 2,000 lbs per ton

Appendix A: Emissions Calculations
Parts Washers

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Parts Washer
PTE Calculations

Plant 1

Product	Density (lb/gal)	VOC Content (wt%)	Max. Usage (gal/hr)	VOC PTE (lbs/hr)	PTE (tpy)
Cleaner	9.16	10%	0.25	0.229	1.00

Plant 2

Product	Density (lb/gal)	VOC Content (wt%)	Max. Usage (gal/hr)	VOC PTE (lbs/hr)	PTE (tpy)
Naptha Solvent	6.75	100%	0.01	0.07	0.30

Tool Room

Product	Density (lb/gal)	VOC Content (wt%)	Max. Usage (gal/hr)	VOC PTE (lbs/hr)	PTE (tpy)
Cleaner	9.16	10%	0.25	0.23	1.00

Note PTE = Potential to Emit

Methodology

Density (lbs/gal) = as taken from MSDS

VOC Content (wt%) = as taken from MSDS

Max. Usage (gal/hr) = Annual Solvent Usage as supplied by client / 8,760 hours per year

VOC PTE (lbs/hr) = Density (lb/gal) x VOC Content (wt%) x Max. Usage (gal/hr)

PTE (tpy) = VOC PTE (lbs/hr) x 8,760 hours per year / 2,000 lbs per ton

**Appendix A: Emissions Calculations
Grinders G1 through G6**

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Tool Room

Grinders	Material	Maximum Metal Throughput (lbs/hr)*	Percentage of Surface Area Subject to Grinding (%)	Maximum Throughput of Metal Processed by Grinding (lbs/hr)	Maximum Throughput of Metal Processed by Grinding (tons/hr)	Emission Factor (lbs emitted/ton processed)	Maximum Uncontrolled PM/PM10/PM2.5 PTE (lb/hr)	Maximum Uncontrolled PM/PM10/PM2.5 PTE (tons/yr)	Control Efficiency (%)	Maximum Controlled PM/PM10/PM2.5 PTE (tons/yr)
Baldor Grinder 1	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	90%	0.0013
Baldor Grinder 2	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	90%	0.0013
Blanchard Grinder	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	0	0.0129
Willey Vogel Grinder	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	0	0.0129
Kent Grinder	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	0	0.0129
Okamoto Linear Grinder	steel	691.1	0.50%	3.46	0.0017	1.7	0.0029	0.0129	0	0.0129
Total							0.0176	0.0772		0.0540

Methodology

*Maximum Metal Throughput (lbs/hr) calculated based on the 2011 actual throughput of 3,450,041 lbs/year, a worst case scaling factor of 1.5, and 7488 hours of actual operation per year.
Emission factor obtained from Factor Information Retrieval Data System (FIRE) Emission Factor for Grey Iron Foundry Grinding
Emissions are controlled by 2 Torit cyclone dust collectors with bag filters that exhaust outside the facility
Maximum Uncontrolled PM/PM10/PM2.5 PTE (lb/hr) = [Maximum Throughput of Metal Processed by Grinding (tons/hr)] * [Emission Factor (lbs emitted / ton processed)]
Maximum Uncontrolled PM/PM10/PM2.5 PTE (tons/yr) = Maximum Uncontrolled PM PTE (lb/hr) * 8760 hrs / 2000 lb
Maximum Controlled PM/PM10/PM2.5 PTE (tons/yr) = Maximum Uncontrolled PM PTE (tons/yr) * (1 - Control Efficiency %)

Appendix A: Emissions Calculations
Deburring, metal presses and brazing

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Deburring - Trivial Activity pursuant to 326 IAC 2-7-1(41)(C)(ii)(FF) = Uncontrolled PM10 < 1 pound per day

Potential to Emit (PTE):		PM10	
1 pound per day x 365 days/year x ton/2000 pounds x 2 stations =		0.37	tons /year
1 pound per day x day/24 hours x 2 stations =		0.08	pounds/hr

Brazing stations - Trivial Activity pursuant to 326 IAC 2-7-1(41)(C)(ii)(FF) = Uncontrolled PM10 < 1 pound per day

Potential to Emit (PTE):		PM10	
1 pound per day x 365 days/year x ton/2000 pounds x 14 stations =		2.56	tons /year
1 pound per day x day/24 hours x 14 stations =		0.58	pounds/hr

Assume that PM10 =PM

Note: The metal presses, including hydraulic presses and mechanical presses, identified as Emissions Units MP02, have negligible particulate emissions. They are only used to bend the metal.

Appendix A: Emission Calculations
Fugitive Dust Emissions - Paved Roads

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Paved Roads at Industrial Site

The following calculations determine the amount of emissions created by paved roads, based on 8,760 hours of use and AP-42, Ch 13.2.1 (12/2003).

¹Vehicle Information (conservative assumptions by IDEM)

Type	Maximum number of vehicles per day	Number of one-way trips per day per vehicle	Maximum trips per day (trip/day)	Maximum Weight Loaded (tons/trip)	Total Weight driven per day (ton/day)	Maximum one-way distance (feet/trip)	Maximum one-way distance (mi/trip)	Maximum one-way miles (miles/day)	Maximum one-way miles (miles/yr)
Passenger Vehicles entering plants	50.0	1.0	50.0	2.5	125.0	1000	0.189	9.5	3456.4
Passenger/Vehicle leaving plants	50.0	1.0	50.0	2.5	125.0	1000	0.189	9.5	3456.4
Truck entering plants	10.0	1.0	10.0	13.0	130.0	1000	0.189	1.9	691.3
Truck leaving plants	10.0	1.0	10.0	22.0	220.0	1000	0.189	1.9	691.3
Total			120.0		600.0			22.7	8295.5

Note 1: The source did not provide vehicle information for the registration. Therefore, IDEM made conservative assumptions for passenger vehicles and trucks to estimate the PTE particulate from roads.

Average Vehicle Weight Per Trip =

5.0	tons/trip
-----	-----------

 Average Miles Per Trip =

0.19	miles/trip
------	------------

Unmitigated Emission Factor, $E_f = [k * (sL)^{0.91} * (W)^{1.02}]$ (Equation 1 from AP-42 13.2.1.3 (01/2011))

	PM	PM10	PM2.5	
where k =	0.011	0.0022	0.00054	lb/VMT = particle size multiplier (AP-42 Table 13.2.1-1)
W =	5.0	5.0	5.0	tons = average vehicle weight (provided by source)
sL =	0.6	0.6	0.6	g/m ² = Ubiquitous Baseline Silt Loading Values of paved roads (Table 13.2.1-2)

Taking natural mitigation due to precipitation into consideration, Mitigated Emission Factor, $E_{ext} = E * [1 - (p/4N)]$

Mitigated Emission Factor, $E_{ext} = E_f * [1 - (p/4N)]$
 where p =

125	days of rain greater than or equal to 0.01 inches (see Fig. 13.2.1-2)
-----	---

 N =

365	days per year
-----	---------------

	PM	PM10	PM2.5	
Unmitigated Emission Factor, E_f =	0.04	0.01	0.00	lb/mile
Mitigated Emission Factor, E_{ext} =	0.03	0.01	0.00	lb/mile

Process	Unmitigated PTE of PM (tons/yr)	Unmitigated PTE of PM10 (tons/yr)	Unmitigated PTE of PM2.5 (tons/yr)	Mitigated PTE of PM (tons/yr)	Mitigated PTE of PM10 (tons/yr)	Mitigated PTE of PM2.5 (tons/yr)
Passenger Vehicles entering plants	0.06	0.012	0.003	0.06	0.011	0.003
Passenger/Vehicle leaving plants	0.06	0.012	0.003	0.06	0.011	0.003
Truck entering plants	0.01	0.002	0.001	0.01	0.002	0.001
Truck leaving plants	0.01	0.002	0.001	0.01	0.002	0.001
	0.15	0.030	0.007	0.14	0.027	0.007

Methodology

Total Weight driven per day (ton/day) = [Maximum Weight Loaded (tons/trip)] * [Maximum trips per day (trip/day)]
 Maximum one-way distance (mi/trip) = [Maximum one-way distance (feet/trip)] / [5280 ft/mile]
 Maximum one-way miles (miles/day) = [Maximum trips per year (trip/day)] * [Maximum one-way distance (mi/trip)]
 Average Vehicle Weight Per Trip (ton/trip) = SUM[Total Weight driven per day (ton/day)] / SUM[Maximum trips per day (trip/day)]
 Average Miles Per Trip (miles/trip) = SUM[Maximum one-way miles (miles/day)] / SUM[Maximum trips per year (trip/day)]
 Unmitigated PTE (tons/yr) = [Maximum one-way miles (miles/yr)] * [Unmitigated Emission Factor (lb/mile)] * (ton/2000 lbs)
 Mitigated PTE (tons/yr) = [Maximum one-way miles (miles/yr)] * [Mitigated Emission Factor (lb/mile)] * (ton/2000 lbs)
 Controlled PTE (tons/yr) = [Mitigated PTE (tons/yr)] * [1 - Dust Control Efficiency]

Abbreviations

PM = Particulate Matter
 PM10 = Particulate Matter (<10 um)
 PM2.5 = Particle Matter (<2.5 um)
 PTE = Potential to Emit

Appendix A: Emission Calculations
Fugitive Dust Emissions - Unpaved Roads

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Company Name: CTP Corp., Division of Tube Processing Corporation
Address City IN Zip: Plant 1: 3555 Madison Avenue, Indianapolis, Indiana 46227
 Plant 2: 3750 South Shelby Street, Indianapolis, Indiana 46227
Administrative Amendment: R097-32980-00593
Reviewer: Deena Patton

Unpaved Roads at Industrial Site

The following calculations determine the amount of emissions created by unpaved roads, based on 8,760 hours of use and AP-42, Ch 13.2.2 (12/2003).

¹Vehicle Information (conservative assumptions by IDEM)

Type	Maximum number of vehicles	Number of one-way trips per day per vehicle	Maximum trips per day (trip/day)	Maximum Weight Loaded (tons/trip)	Total Weight driven per day (ton/day)	Maximum one-way distance (feet/trip)	Maximum one-way distance (mi/trip)	Maximum one-way miles (miles/day)	Maximum one-way miles (miles/yr)
Passenger Vehicles entering plants	25.00	1.0	25.0	2.5	62.5	1000	0.189	4.7	1728.2
Passenger/Vehicle leaving plants	25.00	1.0	25.0	2.5	62.5	1000	0.189	4.7	1728.2
Truck entering plants	5.00	1.0	5.0	13.0	65.0	1000	0.189	0.9	345.6
Truck leaving plants	5.00	1.0	5.0	22.0	110.0	1000	0.189	0.9	345.6
Total			60.0		300.0			11.4	4147.7

Note 1: The source did not provide vehicle information for the registration. Therefore, IDEM made conservative assumptions for passenger vehicles and trucks to estimate the PTE particulate from roads.

Average Vehicle Weight Per Trip = tons/trip
 Average Miles Per Trip = miles/trip

Unmitigated Emission Factor, $E_f = k \cdot [(s/12)^a] \cdot [(W/3)^b]$ (Equation 1a from AP-42 13.2.2)

	PM	PM10	PM2.5	
where k =	4.9	1.5	0.15	lb/mi = particle size multiplier (AP-42 Table 13.2.2-2 for Industrial Roads)
s =	4.8	4.8	4.8	% = mean % silt content of unpaved roads (AP-42 Table 13.2.2-3 Sand/Gravel Processing Plant Road)
a =	0.7	0.9	0.9	= constant (AP-42 Table 13.2.2-2)
W =	5.0	5.0	5.0	tons = average vehicle weight (provided by source)
b =	0.45	0.45	0.45	= constant (AP-42 Table 13.2.2-2)

Taking natural mitigation due to precipitation into consideration, Mitigated Emission Factor, $E_{ext} = E \cdot [(365 - P)/365]$

Mitigated Emission Factor, $E_{ext} = E \cdot [(365 - P)/365]$
 where P = days of rain greater than or equal to 0.01 inches (see Fig. 13.2.2-1)

	PM	PM10	PM2.5	
Unmitigated Emission Factor, E_f =	3.25	0.83	0.08	lb/mile
Mitigated Emission Factor, E_{ext} =	2.13	0.54	0.05	lb/mile

Process	Unmitigated PTE of PM (tons/yr)	Unmitigated PTE of PM10 (tons/yr)	Unmitigated PTE of PM2.5 (tons/yr)	Mitigated PTE of PM (tons/yr)	Mitigated PTE of PM10 (tons/yr)	Mitigated PTE of PM2.5 (tons/yr)
Passenger Vehicles entering plants	2.81	0.72	0.07	1.84	0.47	0.05
Passenger/Vehicle leaving plants	2.81	0.72	0.07	1.84	0.47	0.05
Truck entering plants	0.56	0.14	0.01	0.37	0.09	0.01
Truck leaving plants	0.56	0.14	0.01	0.37	0.09	0.01
6.73	1.72	0.17	4.43	1.13	0.11	

Methodology

Total Weight driven per day (ton/day) = [Maximum Weight Loaded (tons/trip)] * [Maximum trips per day (trip/day)]
 Maximum one-way distance (mi/trip) = [Maximum one-way distance (feet/trip)] / [5280 ft/mile]
 Maximum one-way miles (miles/day) = [Maximum trips per year (trip/day)] * [Maximum one-way distance (mi/trip)]
 Average Vehicle Weight Per Trip (ton/trip) = SUM[Total Weight driven per day (ton/day)] / SUM[Maximum trips per day (trip/day)]
 Average Miles Per Trip (miles/trip) = SUM[Maximum one-way miles (miles/day)] / SUM[Maximum trips per year (trip/day)]
 Unmitigated PTE (tons/yr) = (Maximum one-way miles (miles/yr)) * (Unmitigated Emission Factor (lb/mile)) * (ton/2000 lbs)
 Mitigated PTE (tons/yr) = (Maximum one-way miles (miles/yr)) * (Mitigated Emission Factor (lb/mile)) * (ton/2000 lbs)
 Controlled PTE (tons/yr) = (Mitigated PTE (tons/yr)) * (1 - Dust Control Efficiency)

Abbreviations

PM = Particulate Matter
 PM10 = Particulate Matter (<10 um)
 PM2.5 = Particulate Matter (<2.5 um)
 PTE = Potential to Emit



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

100 North Senate Avenue
Indianapolis, Indiana 46204
(317) 232-8603
Toll Free (800) 451-6027
www.idem.IN.gov

SENT VIA U.S. MAIL: CONFIRMED DELIVERY AND SIGNATURE REQUESTED

TO: Dan Seybert
CTP Corp., Division of Tube Processing Corporation
604 E LeGrande Ave
Indianapolis, IN 46203

DATE: April 18, 2013

FROM: Matt Stuckey, Branch Chief
Permits Branch
Office of Air Quality

SUBJECT: Final Decision
Registration - Administrative Amendment
097 - 32980 - 00593

Enclosed is the final decision and supporting materials for the air permit application referenced above. Please note that this packet contains the original, signed, permit documents.


The final decision is being sent to you because our records indicate that you are the contact person for this application. However, if you are not the appropriate person within your company to receive this document, please forward it to the correct person.

A copy of the final decision and supporting materials has also been sent via standard mail to:
Andrea Swanson Cornerstone Environmental
OAQ Permits Branch Interested Parties List

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178, or toll-free at 1-800-451-6027 (ext. 3-0178), and ask to speak to the permit reviewer who prepared the permit. If you think you have received this document in error, please contact Joanne Smiddie-Brush of my staff at 1-800-451-6027 (ext 3-0185), or via e-mail at jbrush@idem.IN.gov.

Final Applicant Cover letter.dot 11/30/07

Mail Code 61-53

IDEM Staff	LPOGOST 4/18/2013 CTP Corp., Division of Tube Processing Corporation 097 - 32980 - 00593 /final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender	 Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

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											Remarks
1		Dan Seybert CTP Corp., Division of Tube Processing Corporation 604 E LeGrande Ave Indianapolis IN 46203 (Source CAATS) Via confirmed delivery									
2		Marion County Health Department 3838 N. Rural St Indianapolis IN 46205-2930 (Health Department)									
3		Indianapolis City Council and Mayors Office 200 East Washington Street, Room E Indianapolis IN 46204 (Local Official)									
4		Marion County Commissioners 200 E. Washington St. City County Bldg., Suite 801 Indianapolis IN 46204 (Local Official)									
5		Matt Mosier Office of Sustainability 1200 S Madison Ave #200 Indianapolis IN 46225 (Local Official)									
6		Ms. Andrea Swanson Cornerstone Environmental 880 Lennox Ct Zionsville IN 46077 (Consultant)									
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