REPORT OF RCRA COMPLIANCE EVALUATION INSPECTION

At

Collins Aerospace
2855 Heartland Drive
Coralville, Iowa 52241
319-295-1400 Installation Phone Number
319-295-9274 Site Contact Phone Number

EPA ID Number: IAD981702673

On

September 15, 2021

By

U.S. ENVIRONMENTAL PROTECTION AGENCY
Region VII
Enforcement and Compliance Assurance Division

1.0 INTRODUCTION

At the request of the Enforcement and Compliance Assurance Division (ECAD), I performed a Resource Conservation and Recovery Act (RCRA) compliance evaluation inspection (CEI) at the Collins Aerospace in Coralville Iowa. The inspection was conducted on September 15, 2021. The CEI was conducted under the authority of RCRA Section 3007(a), as amended. During the inspection, I collected the information and data necessary to determine compliance with the applicable regulatory and statutory requirements. This report and attachments present the results of the CEI. Based on the information obtained during the inspection, I inspected Collins Aerospace as a small quantity generator (SQG) of known hazardous waste (HW), used oil generator, and a small quantity handler of universal waste (SQHUW) lamps and batteries. According to the U.S. Environmental Protection Agency (EPA) RCRAInfo database, the facility had been previously inspected by the EPA on April 4, 2012, when the facility was called Rockwell Collins, Inc.

2.0 PARTICIPANTS

Collins Aerospace:

Jerry Brown, EHS Principal Specialist (2 years in position)
Donald Triggs, Senior Facility Manager (about 3 years in position)
Charles Hughes, Director of Manufacturing Operations (about 7 years in position)
Natalie McNutt, EHS Specialist (about 2 years in position)
Tom Rodgers, Chemical Handler Recycling
Ashley Rubino, Auditor Post Wave

EPA:

Mark Holcomb, Civil Investigator (NOWCC/SEE) (Lead Inspector)
Trevor Urban, Environmental Scientist/Inspector (Training Preceptor)
Doug Bryant, Civil Investigator (NOWCC/SEE)

3.0 INSPECTION PROCEDURES

On September 8, 2021, I attempted to contact Mr. Jerry Brown, our RCRAInfo contact for this facility. I left a voicemail message. On September 10, 2021, I had not heard back from Mr. Brown, so I called the main number and was put in contact with Ms. Natalie McNutt's as an alternant contact in their environmental health and safety department. I informed Ms. McNutt of our inspection visit for the following week and asked about their Covid-19 guidelines. Ms. McNutt mentioned that Mr. Brown had been out of the office that week, but she would be happy to notify the appropriate staff. She mentioned that they also had a conference room we could base out of. She told me that their Covid protocol called for masks and social distancing. The following week, on Monday September 13, Mr. Brown called me and said that he was back in the office. He asked if our inspection visit was going to include BAE or if it was only for Collins Aerospace. He told me that about a year prior, Collin Aerospace had been required to sell off a portion of their business (their satellite-based global positioning system [GPS] division), to another aerospace company call BAE Systems, a British technology, aerospace, defense contractor, based in London. BAE acquired approximately 25% of Collins Aerospace's assembly/manufacturing facilities. As part of the arrangement, BAE was permitted to continue their operations inside of the Collins facility, using their newly acquired equipment and staff that had transferred over from Collins, until they could move to a new facility. The staff simply changed to a different colored uniform jacket to indicate their new employer but continued to work in their same locations on the same equipment. I asked if they were sister companies or related. Mr. Brown told me they were not related in any way except for co-locating and sharing the same facility. He mentioned that BAE was currently building their new facility nearby and planned to relocate in the next year or so. He also stated that both companies had their own environmental health and safety teams and separate EPA numbers. Both companies shared many of the same satellite accumulation areas (SAA) and the same central accumulation area (CAA), though the drums and containers were different colors and labeled as either Collins or BAE. I discussed this with Mr. Trevor Urban, my EPA inspection colleague and preceptor. We contacted the Region 7 RCRA program, and the issue was discussed. We concluded that even though both companies are in the same location, there was sufficient differences to separate them for inspection purposes. I informed Mr. Brown that we would only be looking at Collins Aerospace's waste management processes for this visit.

On September 13, 2021, at about 1700 hours, Doug Bryant and I arrived at the Collins Aerospace facility and conducted a visual 360-degree reconnaissance of the building/facility searching for areas of concern observable from the adjacent roadways and parking lot. We identified no environmental issues or concerns during this preliminary examination. On September 15, 2021, Trevor Urban, Doug Bryant, and I arrived at the facility's main entrance at about 0830 hours. Mr. Brown met us at the main door and invited us into the facility lobby. We introduced ourselves and checked in and received visitor IDs at the front desk. Mr. Brown then escorted us to a conference room near the lobby. There we met Messrs. Donald Triggs (Senior Facility Manager), Charles Hughes (Director of Manufacturing Operations), and Ms. Natalie

McNutt (EHS Specialist). During the opening conference, Ms. Linden Terpstra, the BAE EHS Lead, stopped by to introduce herself and give us a quick review of the BAE involvement with Collins Aerospace at this facility. She mentioned that she would be available and happy to answer any questions regarding BAE hazardous waste management.

At the opening conference, I introduced myself and presented my EPA ID. I also introduced my colleagues Messrs. Trevor Urban and Doug Bryant. I explained that I was the lead but also in training and that Mr. Urban was my trainer and our credentialed inspector. Mr. Urban presented his credentials. I also explained that Mr. Bryant, though an experienced investigator, was also in refresher training and would be observing during the inspection. I explained the purpose and procedures of the inspection. I presented them with a copy of RCRA Section 3007(a), which provides inspection authority. I explained my need to collect accurate information and presented them with a copy of Title 18 U.S. Code, Sections 1001 and 1002. I made them aware of their confidentiality rights and informed them that a Confidentiality Notice would be provided at the end of the inspection to make a confidentiality claim if they so desired.

The RCRA inspection consisted of a discussion of facility operations, waste generation, waste management; a visual inspection of active waste generation and management areas; and a review of waste management records. During the visual inspection, Mr. Brown and Ms. McNutt were present throughout the inspection. Mr. Hughes was present for the opening and the exit conferences. During the visual inspection, I met other employees in their respective areas. These additional employees were introduced by Mr. Brown to answer my questions or escort us through their respective areas. Of note, the facility was a large, 200,000 square feet, two story, no exterior windows, rectangular shaped building that is not laid out on cardinal directions – the long axis of the building lines up about 40 degrees left of true north (on a heading of around 320 degrees). In addition to safety glasses, the facility also provided and required us to wear static reducing lab coats. See Attachment #1 for the facility aerial location and see Attachment #2 for facility diagrams.

I conducted a visual inspection of the following:

- Morning September 15, 2021
    - We started on the upper level near the East side of the building and progressed North – primarily viewing small satellite accumulation area (SAA) containers throughout the electronic assembly areas
    - Assembly area – marked CA/BA
    - F-18 Area
    - F-15/ F-18 area
    - Proceeded to the lower level
    - Clean Room/Gowning room area – note this was a controlled access secure area that we were not permitted to enter, but we were able to see the SAA container through the windows
    - MEPA Room
    - Maintenance Room
    - I visually inspected the upstairs of the Maintenance Room to view the boiler area, and then returned to the lower level
- Afternoon September 15, 2021

- Central Accumulation Area (CAA) called the "Chemical Storage Room" near the Northwest part of the building – for safety reasons, electrical equipment (cell phones, camera) was not permitted inside the CAA room
    - Met with employee named Mr. Tom Rodgers (Chemical Handler Recycling). Mr. Rodgers explained his procedures of collecting hazardous waste and expired chemicals from the SAA and transporting and logging them into the CAA. Mr. Rodgers completed initial and annual hazard waste handling training from Heritage and is also responsible for weekly inspections
- Dock area next to the CAA
- Battery universal waste collection area
- Inside the recycling dock area:
    - Universal Waste – Lamp's storage area
    - Broken Lamp's storage area
    - Expired Chemical Drop-off area
- Outside on the West side of the facility to view a few of the outside storage locations:
    - Roll-off container – scrap steel pending recycling
    - Semi-truck trailer used to store wooden pallets
- South end Processing Center
- Lower level – center assembly areas called Pre-Wave North
- Post-Wave – 2nd floor
- Revisited the three areas listed below that had already been inspected to take follow-up pictures after the staff had corrected the compliance issues we had discussed during the initial visual inspection and of the CAA
    - Pre-Wave area (added labels to red flammable liquid containers)
    - Battery collection area (added labels to used battery containers)
    - CAA – was cleared to take a couple of photos of the inside of the CAA room

Document Photocopies and Photographs were collected as inspection documentation (see Attachments 1 through 18 and Photos 1-25). The photo log is included (see Attachment 3). Information collected during the inspection is documented on the Entry/Exit checklist and hazardous waste compliance checklists (see Attachment 4). I reviewed documents including the following: Safety Data Sheets (SDS); emergency plans; waste profiles; facility layouts; and manifests; land disposal restriction (LDR) notices.

On September 15, 2021, at the conclusion of the inspection, I held a closing conference. Participants included Ms. McNutt, Messrs. Hughes, Brown, Triggs, Urban, and Bryant. I provided Mr. Brown with a Receipt for Documents (Attachment 5) and a Confidentiality Notice (see Attachment 6) which he signed as acknowledgement of receipt. No confidential business information (CBI) claims were made. I summarized my findings and recommendations and provided Mr. Brown with a Notice of Preliminary Findings (NOPF), which he signed to acknowledge receipt (see Attachment 7. I provided inspection and compliance assistance documents during the inspection that included the following:

- RCRA Section 3007(a)
- Title 18 U.S. Code, Sections 1001 and 1002

- Confidentiality Notice (Top page of the completed carbonless transfer set)
- Notice Regarding Proprietary/Confidential Business Information Submitted to or Collected by EPA In Connection with Inspections Receipt for Documents and Samples
- Notice of Preliminary Findings (NOPF) with Instructions for Responding on back of form (top page of the completed carbonless transfer set)
- Instructions for Responding to a Notice of Preliminary Finding (NOPF) (EPA Handout)
- U.S. EPA Small Business Resource Information Sheet (EPA Handout)
- Solvent-Contaminated Wipes Final Rule Chart (EPA Handout)
- Recycling Electronics (IDNR Handout)
- Lead-Based Paint Activities (IDNR Handout)
- Excluded Solvent-Contaminated Wipe Rule (IDNR Handout)
- Battery Recycling/Disposal (IDNR Handout)
- Management of Fluorescent Lamps for Businesses (IDNR Handout)
- Incompatible Chemicals (IDNR Handout)
- Universal Wastes Including Aerosol Cans (IDNR Handout)
- TCLP Waste Determination Testing (IDNR Handout)
- Industry Sector Notebooks (EPA Handout)
- Environmental Compliance Assistance Centers (EPA Handout)
- e-Manifest Fact Sheet (EPA Handout)
- RCRA Online A Quick Reference Guide (EPA Handout)
- Requirements for Used Oil Management Standards (EPA Handout)
- Emergency Response Program (EPA Handout)
- Commercial Motor Vehicle Transportation System Security & Safety
- Security Awareness (EPA Handout)
- Chemical Facility Anti-Terrorism Standards (Homeland Security Handout)
- Iowa Life/Changing Iowa Department of Economic Development – Iowa Environmental Guide for Business

I followed the inspection procedures detailed in the RCRA CEI Standard Operating Procedure (SOP) 2321.1, unless noted otherwise.

4.0 FINDINGS AND OBSERVATIONS

4.1 Facility Information and Operations

Collins Aerospace, a unit of Raytheon Technologies Corp., develops technologically advanced and intelligent solutions for the global aerospace and defense industry. Created in 2018 by the merger of UTC Aerospace Systems and Rockwell Collins.

In 2019, Collins Aerospace signed the Clean Sky 2 Joint Declaration of European Aviation Research Stakeholders to help lead the way toward the decarbonization of aviation by 2050. In 2015, Collins Aerospace joined the Continuous Lower Energy, Emissions, and Noise (CLEEN) Program, the FAA's principal environmental effort to accelerate the development of

new aircraft and engine technologies. Collins Aerospace also has completed the international ISO 9001 quality certification.

The Collins Aerospace facility in Coralville, Iowa, began operations in 1986 as Rockwell Collins. It is a 200,000 square foot facility, employing approximately 550 staff, operating 24 hours per day and seven days per week. Major processes include microelectronics, automation processes, manual operations assembly, and distribution center. They process thousands of electronic components and circuit boards per day. They estimate that their business is about 75% military and 25% commercial. As noted earlier, BAE Systems recently acquired their global positioning system (GPS) line and continues to operate that part of the business within the same building, under unrelated ownership. BAE is in the process of building a new facility and plans to move around April 2022. They estimate that the BAE part of the current operations within this facility is about 25% of their total operations. Most of the raw materials used includes circuit board substrate and electrical components. The assembly process involves placing electronic components on circuit boards and soldering them in place. Many of the components for assembly are made at other facilities (Collins Aerospace or other companies) and shipped to Coralville for assembly. The Coralville facility is also used for warehousing avionic components that can be shipped to customers upon request.

Soldering is done using different methods including solder paste, wave soldering and post wave soldering. Soldering paste involves a solder/flux mixture that is applied to the circuit board in a soldering machine. Wave soldering is a bulk soldering process used in the manufacture of printed circuit boards. The circuit board is passed over a pan of molten solder in which a pump produces an upwelling of solder that looks like a standing wave. As the circuit board contacts this wave, the components become soldered to the board. Post wave soldering involves manual soldering. The solder used is both tin/lead and lead free. Most of the hazardous waste generated is produced by assembly operations and includes solid flammable materials, waste paste flux, flammable liquids, and expired chemicals.

4.2 Facility RCRA Status

Collins Aerospace was last inspected for RCRA compliance on April 4, 2012, by the EPA. According to the RCRAInfo Waste Site Info Verification, Collins Aerospace notified as a Small Quantity Generator (SQG) of D001, D002, D005, D007, D008, D009, D018, D035, D039 characteristic and F003, F005, P015, U002, U019, U037, U057, U108, U112, U154, U159, U161, U196, U220, U239 listed hazardous wastes on January 14, 2021. I provided Mr. Brown with the Site Info Verification form, which he reviewed and returned with the following change: Current Operator of Site changed from “Rockwell Collins” to “Collins Aerospace” (see Attachment 8). At the time of the inspection (CEI), based on the facility's hazardous waste generation rate (between 220 pounds and 2,200 pounds of non-acute hazardous waste generated per month), I determined Collins Aerospace to be an SQG of hazardous waste. In addition, I determined Collins Aerospace to be a small quantity handler of universal waste-lamps, batteries, and a used oil generator.

4.3 Facility Waste Streams and Management

Collins Aerospace generates numerous different waste streams that are tracked in the Heritage Wastestream Shipping History Report (see Attachment 9). The following are the waste streams that were discussed in more detail.

Solid Flammable Material – Collins Aerospace generates approximately 400 lbs per month of solid flammable material from circuit board assembly operations. The waste profile (see Attachment #10) indicates this is mostly adhesives, flux, silicone, paint, solvent contaminated wipes (paper and shop rags). The hazardous waste codes are based on product and process knowledge as F003, F005, D001, D007, D008, D035. The attached Waste Stream Shipping History report (see Attachment #9) indicates between one to three 55-gallon drums of this waste stream being shipped each month. This material is stored in closed, properly labeled, SAA containers, typically red 5 or 10-gallon step cans, near the point of generation scattered throughout the facility (see Photos 1,3,5,7,18,19). When full the containers are collected by the Chemical Handler and transported to CAA and compacted into 55-gallon drums. This waste stream is picked up monthly by Heritage Environmental Services and transported to Heritage Environmental Services in Kansas City, Missouri. I observed one SAA red drum location inside of the Clean Room / Gowning Room area that did not meet the definition of a SAA container. I determined that the container was a CAA container as it was outside of and not "*at or near the point of generation where the waste initially accumulates; and under the control of the operator of the process that generates the waste*". It appears that the staff need to go through two or more doors to get from the point of generation to the SAA container. It should be noted though that both the point of generation and SAA container are in a secure clean room area that has ID/code access only and we were not permitted entry due to its secure status, but we were able to partially see the rooms through a window. **Failure to date the flammable solids step can (CAA container) in the gowning room with start dates as required by 40 CFR 262.16(b)(6)(i)9c) NOPF 5b**

Flammable Liquids - Collins Aerospace generates about 50 lbs per month of flammable aerosol cans from circuit board assembly operations. The flammable liquid waste consists of mostly solvents such as acetone, isopropanol, methyl ethyl ketone (MEK), mineral spirits, toluene, and xylene. The hazardous waste codes are based on product and process knowledge as F003, F005, D001, D035. See waste profile (see Attachment 11). Examples of flammable liquid SAA container (kept inside of flammable cabinets) can be seen in the following photos (see Photos 4, 20, 21, 22). Two of the flammable liquid SAA containers located in the flammable cabinets, did not have a label as to the nature of the contents (e.g., "flammable liquid") Note, this labeling issue was corrected during the inspection (see Photo 22 shows the flammable liquid container from Photo 20 with the added label). This waste stream is picked up by Heritage Environmental Services and transported to a Heritage Environmental facility in Kansas City, Missouri. See the attached Waste Stream Shipping History report (see Attachment 9). **Failure to label and identity SAA container with nature of hazard (black tote, red tote, flammable liquid container) as required in 40 CFR 262.15(a)(ii) NOPF 2**

Aerosols, Flammable – Collins Aerospace generates about 25 lbs per month of flammable aerosol cans with residual solvents from circuit board assembly operations. Contents are mostly

paints, lubricants, and solvent cleaners. The hazardous waste code is based on product and process knowledge as D001. See waste profile (see Attachment #12). This waste stream is picked up by Heritage Environmental Services and transported to a facility in Indianapolis, IN. See the attached Waste Stream Shipping History report (see Attachment #9).

Epoxy Applicators & Razors - Collins Aerospace generates about 35 lbs per month of epoxy applicator and razors from circuit board assembly operations. Contents are mostly epoxy adhesives, toluene, methyl ethyl ketone (MEK), xylene, and razor blades. The hazardous waste codes are based on generator and process knowledge as F003, F005, D035. See waste profile (see Attachment #13). This waste stream is packed in drums and picked up by Heritage Environmental Services and transported to a Heritage Thermal Services in East Liverpool, OH. See the attached Waste Stream Shipping History report (see Attachment #9).

Consol of Small Chemicals - Collins Aerospace generates about 150 lbs per month of miscellaneous expired chemicals from "consolidation and cleanup" after circuit board assembly operations. The waste profile describes the contents as: "lab packs" and they appeared to be a variety of mostly partially full small containers of expired chemicals. The Heritage waste profile indicates the hazardous waste codes are based on generator and process knowledge and are listed as "GNWS". See waste profile (see Attachment #14). This waste stream is packed in lab packs and transported by Heritage Environmental Services and to Heritage Thermal Services in East Liverpool, Ohio. See the attached Waste Stream Shipping History report (see Attachment #9). Mr. Brown stated that he felt that most of this waste stream was combined with the Solid Flammable Material waste stream (400 lbs per month) mentioned above. I could only find one shipment of this waste stream in 2019. During our visual inspection, upstairs in the assembly area marked as CA CB, we noted a full, open "black plastic tote" for SAA storage of miscellaneous expired chemicals inside of a flammable cabinet. Only labeled with "Expired Chemicals" and "chemicals with bar codes and large containers" (see Photos 2, 4). We met with employee Ashley Rubino (Auditor Post Wave). Ms. Rubino demonstrated how the expired chemicals were bar code scanned into a computer by a "post wave auditor". We also noted an open red bin/tote labeled "Expired Chemicals" in the universal waste room (see Photo #14). **Failure to label SAA containers (black totes in flammable cabinets) with the words Hazardous Waste as required in 40 CFR 262.15(a)(5)(i) NOPF 1**

Failure to keep SAA container closed (expired chemicals) in the black totes inside the flammable cabinets as required in 40 CFR 262.15(a) NOPF 3

Solder Paste – Collins Aerospace generates approximately 688 lbs /month of solder paste (both tin/lead and non-lead versions), which is determined to be non-hazardous and is recycled by Sims Life Cycle Services, Franklin Park, Illinois. For an example of how the solder paste is scraped off the applicators and stored in a solder paste container (see Photo 17).

Used Oil – Collins Aerospace generates approximately 380 lbs of used oil per year (only one drum of 380 lbs shipped in 2021 to date). The used oil is generated by their maintenance department from servicing of material handling equipment in the facility. The used oil is stored in 55-gallon used oil storage containers in the CAA Chemical Storage Area and is transported and recycled by Heritage (see Photo 25).

Spent Universal Waste Batteries – Collins Aerospace maintains a small number of spent AA and AAA Alkaline, Nickel Cadmium, and Lithium batteries in their universal waste battery collection area (lower level, northwest wall), in sealed containers, and sorted by type of battery. The accumulation start dates were not marked on the labels, no "universal waste battery", waste batteries, or "used batteries" labels were on the three containers (see Photos 10, 11) – this was corrected at the time of the inspection (see Photo 23). Mr. Tom Rodgers, the Chemical Handler, stated that he picks up and ships the spent batteries every 4 months. Universal waste is transported by Heritage to their Heritage Environmental Services facility in Kansas City, Missouri. **Failure to label waste batteries as "Universal Waste Batteries", "Waste Batteries," or "Used Batteries" 40 CFR 273.14(a) (NOPF 4)**

Universal Waste-Lamps (Spent Lamps) - Mr. Brown estimated that Collins Aerospace generates about 115 lbs per year of spent lamps from facility spent lamp replacement. The spent lamps are stored in the Lower 1st level – Recycling Dock area on the west side of the facility. I observed one closed, properly labeled, and dated universal waste box approximately six feet x 1 foot x six inches in good condition, dated 1/6/20 – less than one year (see Photo 12). Universal waste is transported by Heritage Environmental Services to Heritage Environmental Services in Kansas City, Missouri. In this same room I observed a white 5-gal plastic bucket type container, closed, labeled: "hazardous waste, broken lamps containing mercury", but with no start date (see Photos 13, 14). The sign on the wall above the white bucket indicates that it is being considered a satellite accumulation area (SAA). This closed room is in a distant part of the facility and is not "*at or near the point of generation where the waste initially accumulates; and under the control of the operator of the process that generates the waste*". I subsequently felt it was a CAA and the container would need to be dated.
Failure to date CAA container of broken lamps (in the 5-gallon plastic bucket) with start dates as required by 40 CFR 262.16(b)(6)(i)9c) (NOPF 5a)

Beryllium – During prep for the inspection, I had noted an eManifest record from 3/17/2019 that indicated that Collins Aerospace had shipped 0.0025 tons of "Beryllium Coupon". Beryllium (P015) is listed as a toxic, acute hazardous waste. Based on my calculations, 0.0025 tons = 5 lbs or 2.27 kg. Greater than 1 kg of "acute" hazardous waste generated in one month would push a facility into the large quantity generator (LQG) status. During the inspection Mr. Brown stated that they do not routinely use Beryllium and thought this may have been from a clean out after the BAE change over. Mr. Brown was able to locate the original Heritage Lab Pack Content form from 2/20/2019, which listed the Beryllium contents that were shipped as being two "4-inch x 1-inch coupons" (I was told by Mr. Brown that they were very thin, but I do not recall the actual thickness), weighing a total of 1 gram (see Attachments #16). Presumably the balance of the weight listed on the eManifest and manifest (see Attachment #15) was packaging material and/or container. I reviewed the management of the spent beryllium and no findings were noted.

Scrap Metal – Collins Aerospace generates scrap metal from facility's production process. Collins Aerospace determined the scrap metal to be non-hazardous, based on product and process knowledge. The scrap metal is recycled by Peterson Metal, Coralville, Iowa (see Photos 8 and 15). I reviewed the management of the scrap metal and no findings were noted.

Precious Metals for Recycling – Collins Aerospace generates approximately 12,000 lbs per month of scrap electronic circuits boards, both tin/lead solder paste and lead-free solder paste (see Photo 16, 17). Mr. Brown stated that they had determined this waste to be non-hazardous. This waste is collected and transport by Sims Life Cycle Precious Metals to Sims facility in Franklin Park, Illinois for the recovery and refinement of precious and semi-precious metals.

Paper Recycling - Collins Aerospace generates about 10,000 lbs of paper per month that is collected and recycled by Shredit in Coralville, Iowa.

Cardboard Recycling - Collins Aerospace generates about 14,500 lbs of cardboard and mixed paper that is collected and recycled by City Carton in Cedar Rapids, Iowa.

General Trash - Collins Aerospace generates approximately 11,890 lbs of general trash per month from general facility operations. General trash consists of non-recyclable wastepaper and cardboard, and foam packaging material. The general trash is picked up once per week by Republic Services and hauled to the Cedar Rapids Landfill. I reviewed the management of the general trash and no findings were noted.

4.4 Other Regulatory Requirements

Outside Facility Perimeter - I inspected the outside perimeter of the facility and observed no hazardous waste storage tanks, containers, or other stored waste. No findings of the outside facility perimeter were noted.

CAA - The primary centralized accumulation area (CAA) is in an area marked "Chemical Storage" (see Photos 9, 24, 25). This is a controlled, limited access room. Emergency information (emergency coordinator's name & phone number, fire extinguisher's locations) is posted on both sides of the door. Due to fire and blast room policies, we were not permitted to take any electronics inside. With EHS Manager's approval (safe with all drums sealed and no pouring operations going on) I was able to take two photos of the contents from just inside the door. Mr. Rodgers, the Chemical Handler, conducts and logs weekly inspections of the CAA drums and facility. All drums were grounded with grounding wires. The facility is equipped with an overhead fire sprinkler system. I noted a well-stocked spill kit located in the CAA room. Protective covers were observed over the ceiling lights for explosion prevention. I noted six black 55-gallon drums: all in good condition, labeled with "Hazardous Waste", contents, and date: UN3175 flammable liquid – full; UN1325 waste flammable solids, full; UN1950 aerosol unpunctured cans, ¼ full generated from the circuit board manufacturing process; UN1993 flammable liquid, ¾ full; one blue plastic 55-gallon used oil drum, ¾ full, properly labeled; and eight empty drums. In an adjacent room (Dock area) there was one 55-gallon drum in the RAM compactor, marked as UN3175 solid flammable hazardous waste, closed, labeled, and dated.

Preparedness and Prevention - Mr. Brown stated Collins Aerospace has a full-time professional inhouse Environmental, Health and Safety (EHS) department. Overhead PA system, land lines, and mobile phones used onsite to alert company personnel in the event of an emergency. The facility has a centralized fire alarm system, as well as sprinklers, numerous fire extinguishers, and eye-wash stations. I observed adequate spill response equipment near the

CAA and emergency response signage posted on the door of the CAA. The emergency response signage contained all necessary information (see Photo 9). Mr. Brown provided me with a copy of their written contingency plan called Coralville Operations Action Plan (see Attachment #17), which included coordination with local police, fire, hospital, and emergency planning group. Their local fire department visits and inspects annually. They have security onsite 24/7. The emergency coordinator is available onsite or via cell phone 24/7. They report no spills or emergency plan activations in the last 3 years.

Personnel Training - I asked Mr. Brown to describe the training for Collins Aerospace employees with hazardous waste or universal waste handling responsibility and he stated that all employees undergo an initial orientation training in safety, emergency response, and hazardous waste handling. He stated that all employees with hazardous waste or universal waste handling responsibility undergo refresher training at least annually. Mr. Brown provided us with a copy of Mr. Tom Rodger's (Chemical Handler) DOT Training Certificate for "shipment of hazardous materials" training by their primary vendor for hazardous material transport, Heritage (see Attachment #18). I reviewed the personnel training program and no findings were noted.

Other Issues – I observed one 5-gallon step can, closed, properly labeled, used for "excluded solvent contaminated wipes" (see Photo 6). Not reviewed.

5.0 SUMMARY OF FINDINGS

NOPF 1: Failure to label SAA containers (black totes in flammable cabinets and red tote in Universal Waste area) with the words Hazardous Waste as required in 40 CFR 262.15(a)(5)(i)

NOPF 2: Failure to label and identity SAA container with nature of hazard (black tote, red tote, flammable liquid container) as required in 40 CFR 262.15(a)(ii)

NOPF 3: Failure to keep SAA container closed (expired chemicals) in the black totes inside the flammable cabinets as required in 40 CFR 262.15(a)

NOPF 4: Failure to label waste batteries as "Universal Waste Batteries", Waste Batteries or "Used Batteries" as required in 40 CFR 273.14(a)

NOPF 5: Failure to date two CAA containers with start dates as required by 40 CFR 262.16(b)(6)(i)9c)

a) broken lamps (in the 5-gallon plastic bucket) and

b) flammable solids step can in the gowning room

Other than the items specifically noted in this narrative, I observed no additional issues or potential findings. However, further EPA review may change or add to my findings.

MARK HOLCOMB (Affiliate)
Digitally signed by MARK HOLCOMB (Affiliate)
Date: 2021.11.24 11:13:50 -06'00'

Mark Holcomb
Civil Investigator

AMBER WHISNANT
Digitally signed by AMBER WHISNANT
Date: 2021.11.24 11:08:48 -06'00'

Amber Whisnant
RCRA Section Chief, ECAD/CB

Attachments:

1. Facility Aerial Photo (1 page)
2. Facility Diagram (2 pages)
3. Photo log (13 pages / 25 photos)
4. EPA Inspection Checklist (23 pages)
5. Receipt for Documents (1 page)
6. Confidentiality Notice (l page)
7. Notice of Preliminary Findings NOPF (1 pages)
8. EPA RCRA Hazardous Waste Site Info Verification Report (2 pages)
9. Heritage Manifest Shipping History Report (10 pages)
10. Waste Profile- Solid Flammable Material (4 pages)
11. Waste Profile- Flammable Liquids (3 pages)
12. Waste Profile- Aerosols, Flammable (3 pages)
13. Waste Profile- Epoxy Applicators & Razor Blades (3 pages)
14. Waste Profile- Consol of Small Chemicals (3 pages)
15. Manifest – Beryllium (1 page)
16. Lab Pack Content Form – Beryllium (1 page)
17. Emergency Action Plan (24 pages)
18. Heritage DOT Hazardous Training Certification (1 page)

Notice of Preliminary Findings

(For Contractor Use Only)

Facility Name: Collins Aerospace

Facility Address: 2855 Heartland Drive
Coralville, IA 52241

EPA ID#: IAD 981702673 **Date:** 9/15/2021

Notice: I am not an employee of the Environmental Protection Agency ("EPA"). I am a contractor for the EPA retained to conduct compliance evaluation inspections. The following is a list of observations/recommendations found during this inspection which will be reported back to the EPA. This is not to be construed as a complete list of observations/recommendations. The EPA will be evaluating the report prepared as a result of this inspection and will make determinations as to what violations may have occurred at your facility.

Citation	Description of Finding
1) 40 CFR 262.15 (a)(5)(i)	Failure to label SAA containers (Black totes in flamm cab + red tote in Universal waste area) with words Hazardous Waste
2) 40 CFR 262.15(a)(ii)	Failure to label/identify SAA container with nature of hazard (Black tote, red tote, flammable liq containers) with nature of hazard
3) 40 CFR 262.15(a)(4)	Failure to keep SAA container closed (esp chemicals in black totes inside Flammable Cab/Exp
4) 40 CFR 273.14(a)	Failure to label waste batteries as "universal waste Batteries" or "used batteries"
5) 40 CFR 262.16 (b)(6)(i)(C)	Failure to date CAA containers of broken lamps in 5 gallon bucket) with start date and flammable solids step can in Gowning Room

If you have any questions about this Notice or wish to discuss your response, you may call me at (913) 551-7310, or Kevin Snowden (Compliance Officer) at (913) 551-7622

This Notice prepared by Mark Holcomb Date: 9/15/2021

The undersigned person hereby acknowledges receipt of this Notice and has read the same.

Printed Name: JERRY BROWN Date: 9/15/21

Signature:

Title: Principal Specialist, EHS

(Rev: 2/25/2020) White Original/ EPA • Yellow/ Facility