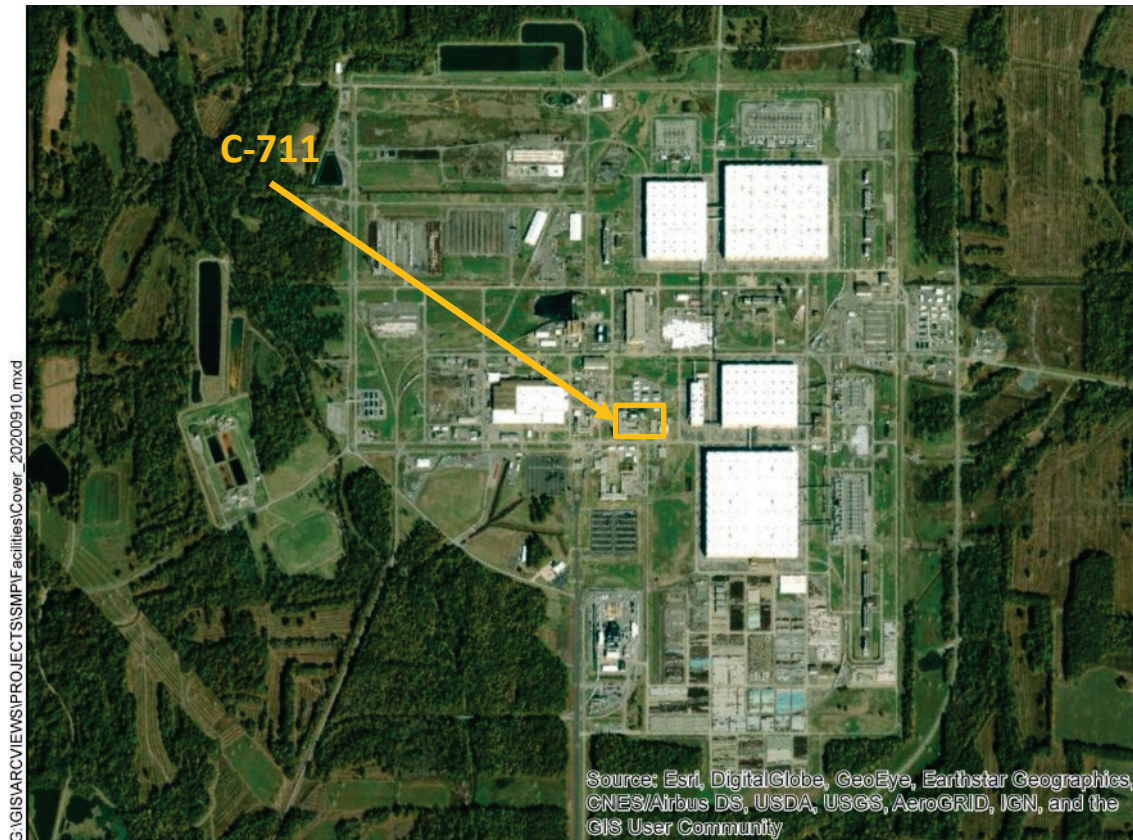


C-711 Storage/Former Gas Manifold



Facility Overview Briefing
March 4, 2021

Reflects consultation with EPA and Kentucky in accordance with the Site Management Plan that occurred on February 1, 2021, and includes incorporation of comments from those discussions.

Purpose

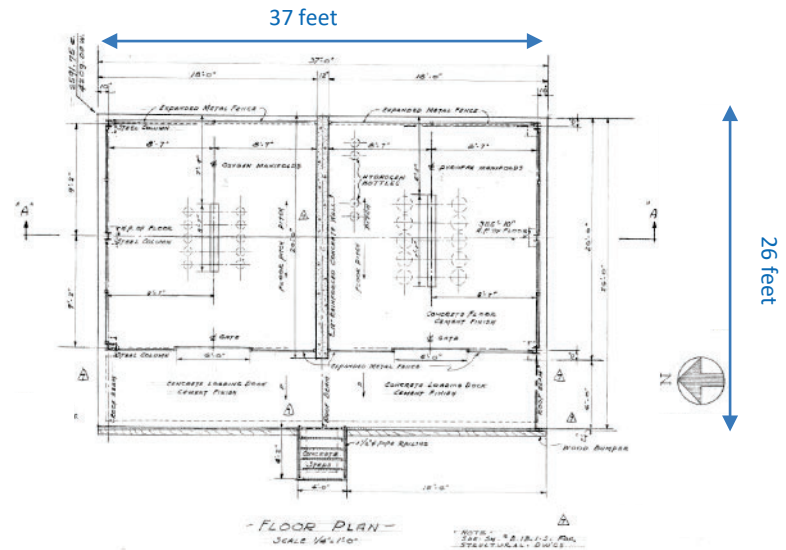
- The C-711 Storage/Former Gas Manifold facility is a candidate for future demolition and disposal, contingent on funding priorities.
- Listed in Appendix 6 of the Site Management Plan (SMP) and requires consultation with EPA and Kentucky for CERCLA screening prior to demolition.
- This presentation is intended to serve as consultation, providing the basis for demolition and disposal of the aboveground structure outside of the FFA/CERCLA process.
- The slab/soils would remain for future CERCLA evaluation under Geographical Area (GA) 15.



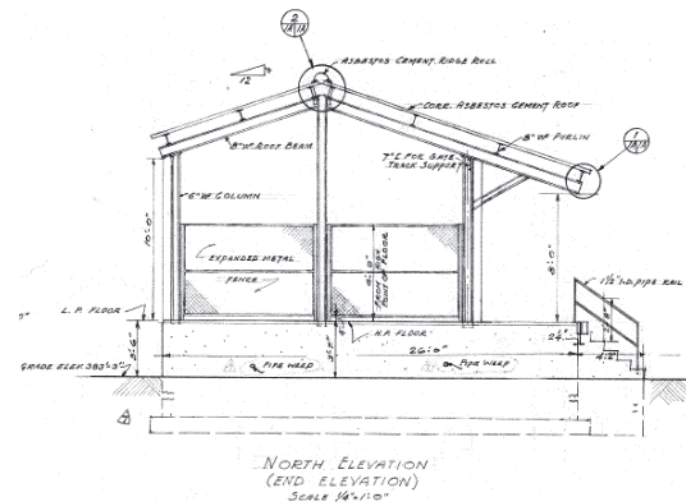
C-711 Facility Photo: 10/2020

Construction History

- C-711 is located within the Paducah Site security fence and within the L-shaped confines of the C-710 Laboratory and west of C-310.
- Construction began in 1953 and was completed in 1954.
- Consists of an open, structural steel frame on an elevated concrete pad.
- The facility is approximately 962 ft².
 - Measuring ~26 ft x ~37 ft



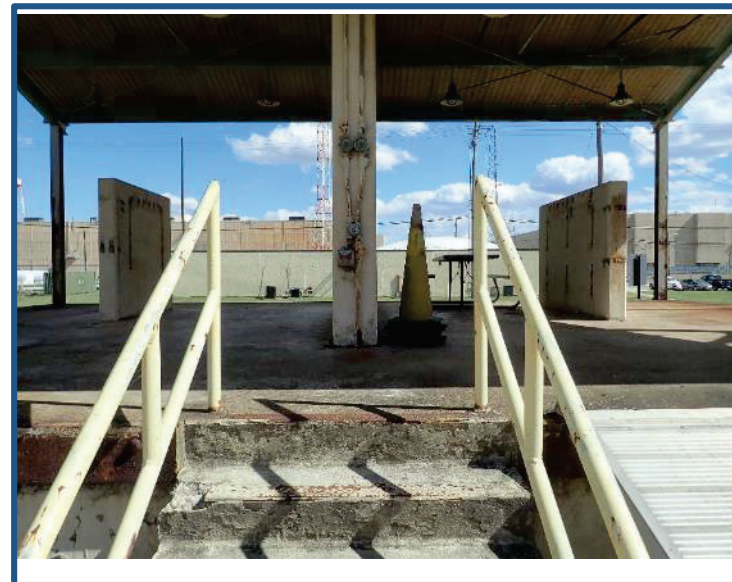
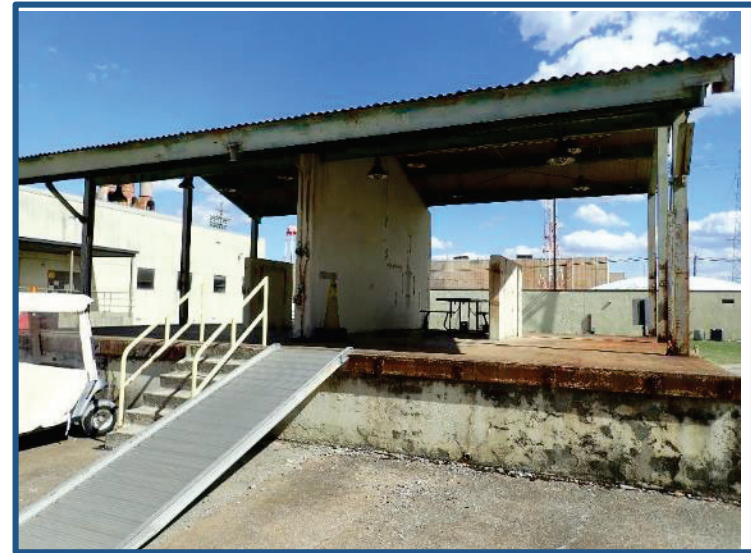
Floor Plan View: Excerpt from Engineering Drawing E13-1-A, Rev 10 dated 1954



North Elevation View: Excerpt from Engineering Drawing E13-1-A, Rev 10 dated 1954

Operational History

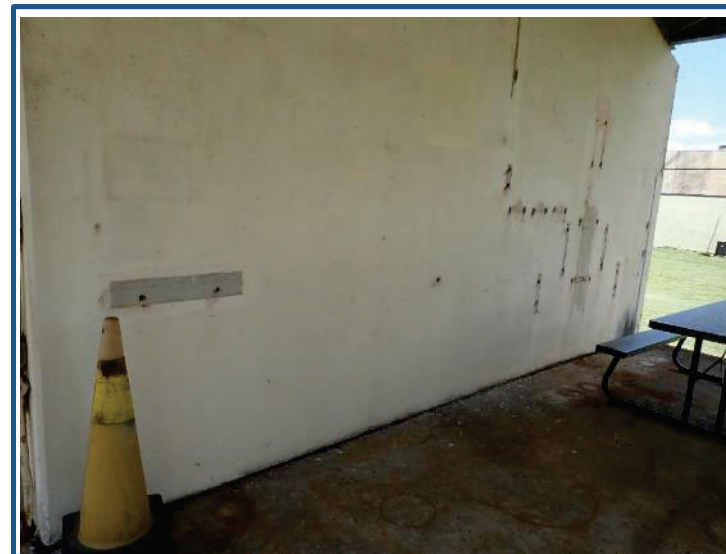
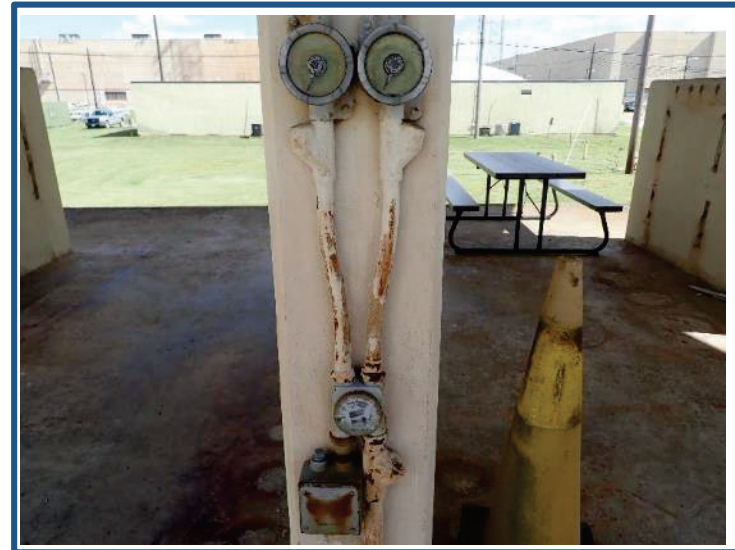
- C-711 operated as a gas manifold facility that housed gas cylinders for laboratory operations from 1954 to approximately 2000.
- During USEC lease of the facility in the early 1990s, USEC continued to use the gas manifold facility for laboratory operations until 2000, when the manifold system and gas cylinders were removed.
- USEC converted the north end of C-711 into a temporary staging area for boundary control station (BCS) waste (posted as a radioactive material area) and converted the south end for staging of excess miscellaneous office equipment.
- BCS waste and miscellaneous office equipment were removed from C-711, and the area was down posted prior to facility transition from USEC back to DOE in 2014.



C-711 Facility Photos: 10/2020

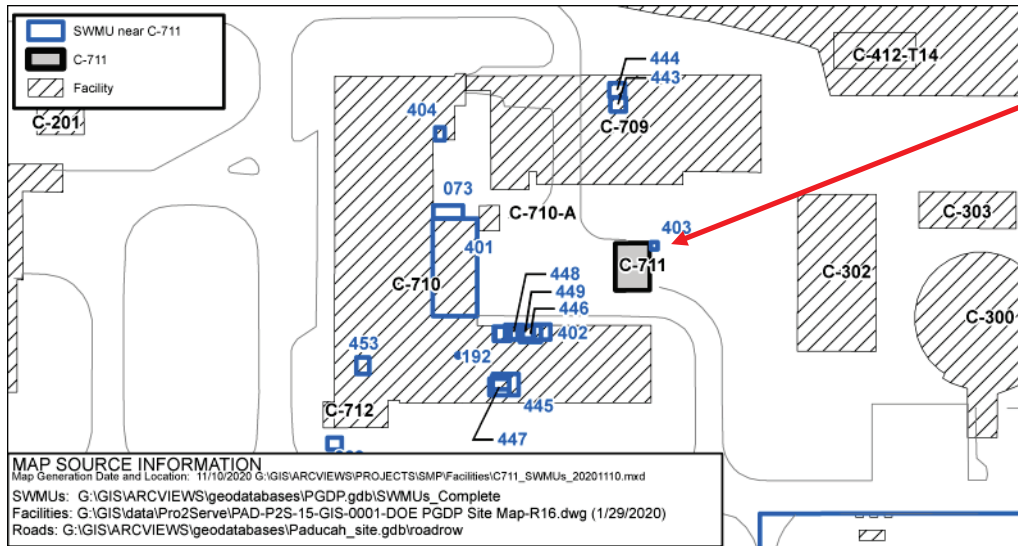
Current Status

- C-711 is no longer operational; the manifold system and all gas cylinders have been removed; and the area has been cleared of BCS waste and excess office equipment.
- C-711 is currently used as an assembly point area during drills and emergencies.
- Walkdown inspection conducted in October 2020 confirmed no unusual conditions.
 - No floor sumps, floor drains, or visible staining.
 - Gas cylinders and manifold systems have been removed.
 - Roofing is known to contain asbestos.
 - Pole switch, lighting, and electrical outlet were designed to be explosion proof.
 - Walls are reinforced concrete.



C-711 Facility Photos: 10/2020

Environmental Impacts (Solid Waste Management Units)



- The C-711 Storage/Former Gas Manifold facility is not designated as a SWMU/AOC.
- SWMU 403 (G-710-20) was a GSA that contained asbestos residue, scrap metal, and USEC lab waste. The GSA was removed in December 2001 and granted an NFA in January 2006.

| SWMU No. | Facility Name | Current Status | NFA Approval By |
|----------|--|--------------------|---|
| 028 | C-712 Laboratory Equalization Tank slab and underlying soils | Soils and Slabs OU | |
| 073 | C-710 Underground Gasoline Tanks | NFA | EPA HSWA Class 1 Permit Mod 3/17/1993; KDWM (UST C-200A; UST C-710; UST Branch) 2/19/2002 |
| 192 | C-710 Acid Interceptor Pit slab and underlying soils | Soils and Slabs OU | |
| 401 | G-710 | NFA | KDWM 1/4/2006 |
| 402 | G-710-04 | NFA | KDWM 9/11/2003 |
| 403 | G-710-20 | NFA | KDWM 1/4/2006 |
| 404 | G-710-24 | NFA | KDWM 9/11/2003 |
| 443 | S-709-01 | NFA | KDWM 6/29/2004 |
| 444 | S-709-02 | NFA | KDWM 6/29/2004 |
| 445 | S-710-05 | NFA | KDWM 2/14/2006 |
| 446 | S-710-06 | NFA | KDWM 9/11/2003 |
| 447 | S-710-09 | NFA | KDWM 1/4/2006 |
| 448 | S-710-16 | NFA | KDWM 9/11/2003 |
| 449 | S-710-18 | NFA | KDWM 9/11/2003 |
| 453 | S-710-46 | NFA | KDWM 9/11/2003 |

Environmental Impacts

- No information to indicate a release or threatened release of a hazardous substance that would require an evaluation for a potential response action to protect future public health or welfare or the environment.
 - C-711 was used as a gas manifold and gas cylinder storage facility from initial construction in 1954 through 2000; converted to a temporary staging area for BCS waste and excess office equipment from 2000–2010.
 - Building materials used for construction could contain lead-based paints and asbestos materials, both of which can be effectively verified during a pre-demolition inspection and properly managed using standard demolition and waste management practices.
 - No history or records of chemical use or spills that would pose environmental release threat.

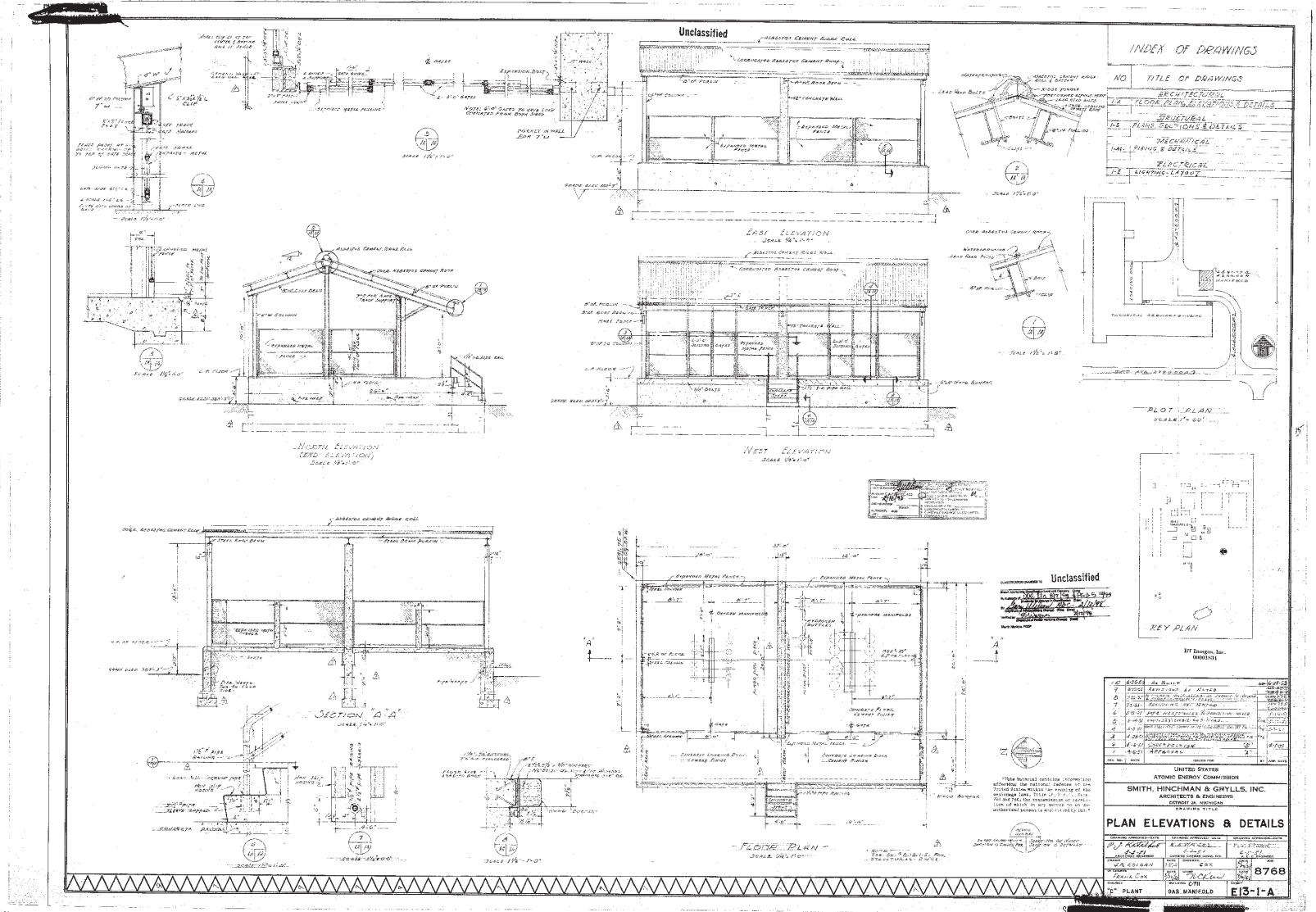
Conclusion and Recommendations

- Walkdown inspection of the facility, employee interviews, and other reviewed historical information did not identify any unusual conditions that would pose a potential threat of environmental release during future demolition of the aboveground structure.
- Subject to completion of deactivation and availability of funding, it is recommended proceeding with demolition and disposal of the C-711 (aboveground structure) outside of the FFA/CERCLA process contingent upon the fact that no additional changes have occurred that would affect the CERCLA determination of the facility prior to demolition.
- All applicable laws, regulations, and DOE procedures/protocols will be followed to ensure the demolition and disposal occurs in a safe, compliant manner, including conducting additional radiological characterization through confirmation radiological surveys (as needed) to support demolition and waste disposition.
- Document the removal of the C-711 facility in the appropriate annual SMP revision.
- The future evaluation conducted for GA 15 will further evaluate the potential threat of release associated with the concrete pad/soils from the C-711 facility.

C-711 Storage/Former Gas Manifold

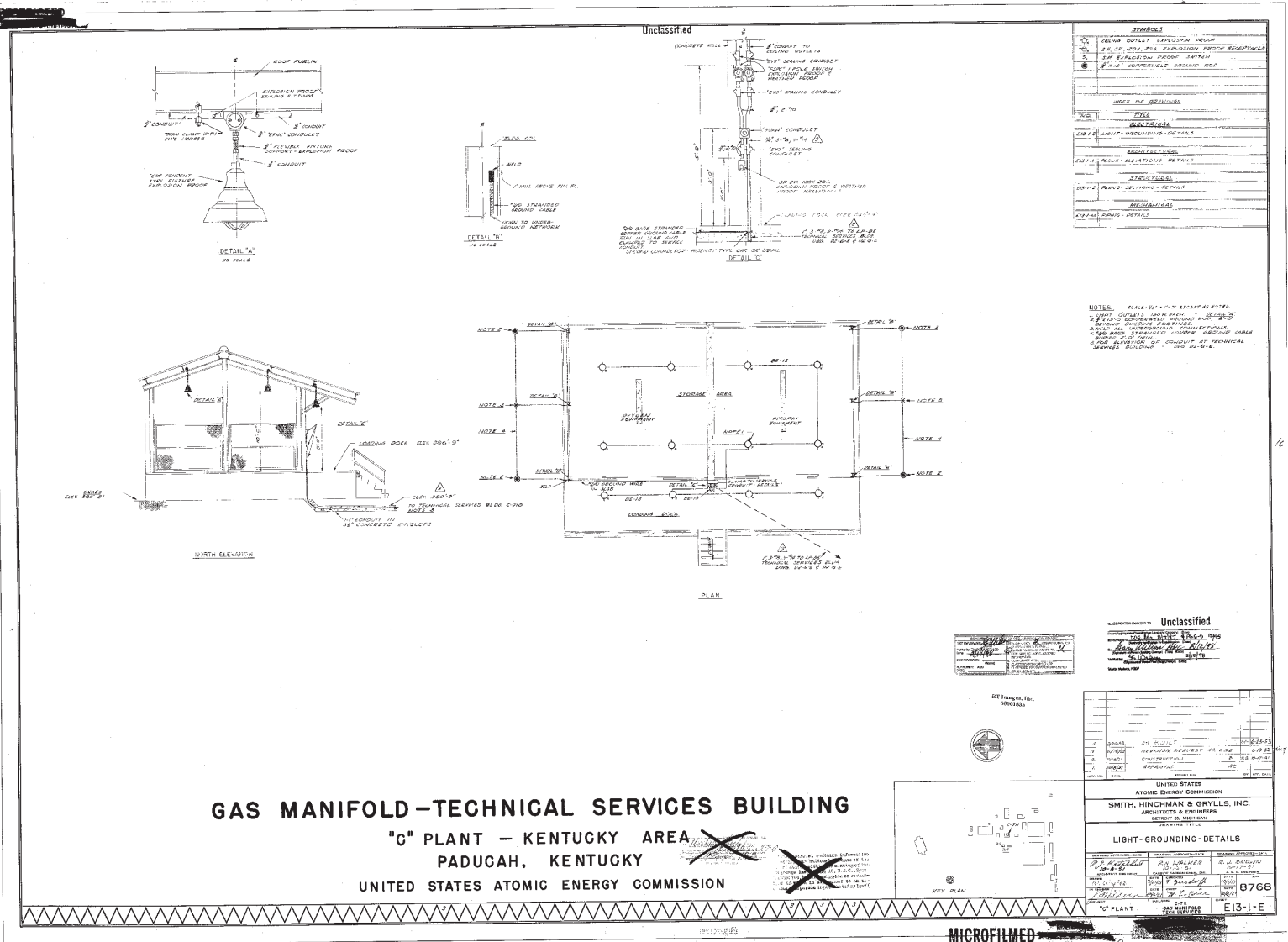
BACKUP INFORMATION

C-711- Plan Elevations & Details



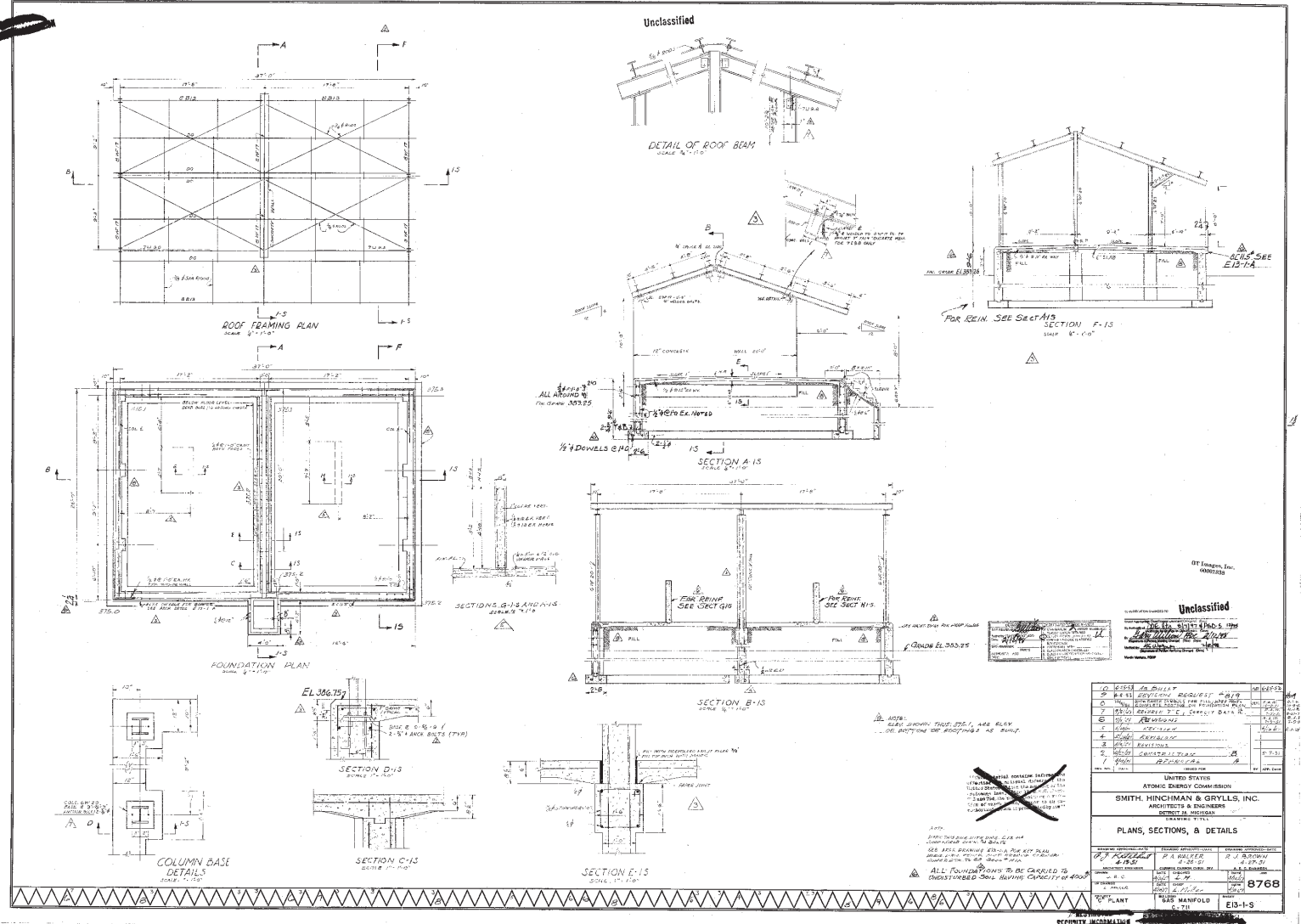
E13-1-A, Rev 10 dated 1954

C-711- Light Grounding Details



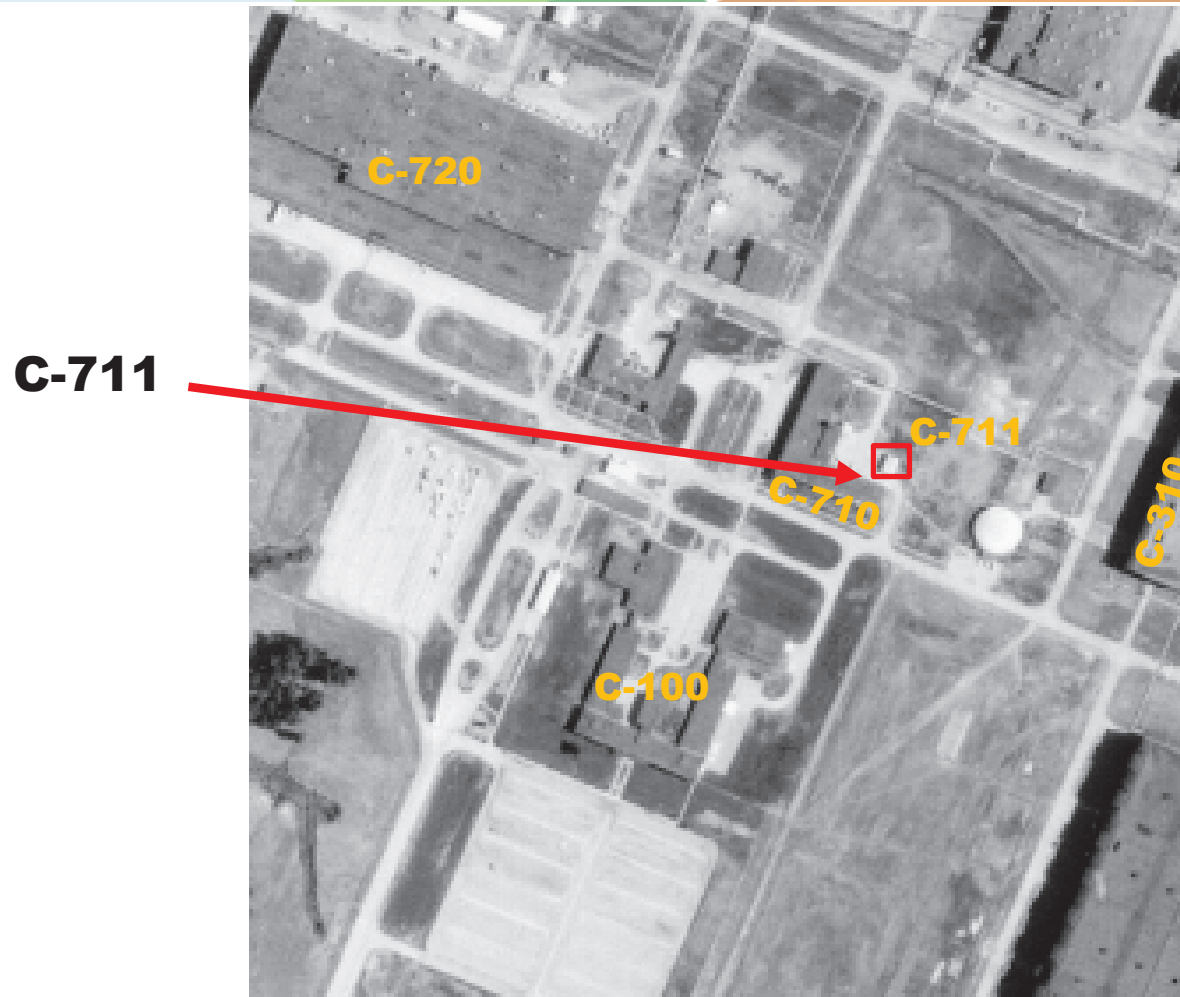
E13-1-E, Rev 4 dated 1954

C-711- Plans, Sections, & Details



E13-1-S, Rev 10 dated 1954

C-711 Storage/Former Gas Manifold (Aerial Photograph)



Modified from Aerial Photo: July 3, 1971 (ADZ-4LL-53)