

**PALO ALTO FIRE DEPARTMENT
PLAN SUBMITTAL GUIDELINES
FOR
HAZARDOUS MATERIALS RELATED PROJECTS**

This guideline is to help you provide complete plan check documents when applying for a permit(s) for:

- New construction or tenant improvements where hazardous materials will be used, stored or handled, or
- To install or repair any equipment, piping, tanks, etc. that use, contain, store or dispense hazardous materials of any type.

This is intended as a guide and does not list all requirements for all projects. Additional hazardous materials related information may be found on the internet web sites at <http://www.pafd.org> and <http://www.unidocs.org> or you can contact the Fire Department at 650-329-2194 or 650-329-2184.

I Permit Types and Submittal Information

A Certificate of Occupancy

New occupants or tenants to a building will be required to apply for a “Certificate of Occupancy” permit. This application may be made at the counter. If building alterations are anticipated, occupancy will be granted under the building permit at the end of the construction phase.

B Hazardous Material Disclosure Form

This required form is completed by new occupants or tenants to indicate if their project will have any hazardous materials related issues. It is available at the Development Center Counter or on the internet at www.pafd.org/business/hazmatdisclosure.pdf.

If hazardous materials will be stored, used or handled then a “Building Occupancy Classification Information form” will also be required. (See below)

C Building Department Permits and Plan Review

Typically, for new construction and tenant improvement projects, the Building Department will require a permit which will be the “master building permit” and all other city departmental permits will be under this master permit. If other city permits are required as part of a building project they will be internally routed to appropriate department (i.e., plumbing, mechanical, electrical, structural, fire dept., water quality control plant, etc.).

C Building Department Permits and Plan Review (Continued)

Standard Building Department plan check turn around time is 4 to 8 weeks. An optional expedited service is available through the Building Department for outside (third party) plan checking services for building related plan review. The third party plan check firm's fees are paid by the applicant.

D Fire or Hazmat-Only Projects

Some Fire Department and Hazardous Materials projects are limited in scope and do not require submission to or review by the Building Department. However, they do require submission of a Fire Department Application and Permit (www.pafd.org/business/applicationpermit.pdf). These projects include but are not limited to; fire sprinkler and fire alarm installations or modifications and special extinguishing systems, tank and facility closures, underground tank installations, modifications or closures, and some hazardous materials equipment installations, removals or repairs. Plan review turnaround time for these projects is six weeks (40 days) or less.

Note that Building may need to make a determination regarding electrical, plumbing or other department review, depending on the type of project. Check with the Hazardous Materials Specialist or a Hazardous Materials Inspector for help in determining who will need to review your project.

E Submittal Process

Submittals for Building Department Permitted projects for new construction and tenant improvement projects should be made to the Palo Alto Development Center, 285 Hamilton Ave., Palo Alto, (650) 329-2496.

Submittals for 'Fire or Hazmat only' projects as described above may be submitted to the Fire Department at 250 Hamilton Ave., 6th floor, Palo Alto (650) 329-2184.

Submittals can be made on a walk-in basis or can be scheduled. Submittals may be delivered by the contractor, design firm or the owner/builder.

II Plan Submittals

The following sections can be used as a checklist to verify submittal completeness:

A General

_____ **Plans / Design Drawings:** Provide a minimum of 3 sets of plans.
(one each for Building Dept., Fire Dept, job site)

If the project involves industrial water discharges one additional set of drawings is required. (Water Quality Control Dept)

Plans shall be a minimum of 18' x 24" and a maximum size of 24" x 36".

Additional copies may be required on certain projects.

_____ **Structural Calculations:** Provide 2 copies of calculations (8 ½" x 11") if required. Structural calculations shall be done by a professional engineer and both copies must be wet stamped.

_____ **Title 24 Accessibility Requirements:** When work is done that requires a building permit, the building or facility shall be upgraded to provide disabled access in accordance with the standards in the California Building Code (CBC). Generally disabled access improvements are required only in the specific areas of the alterations or repair, to the path of travel and sanitary facilities serving those areas.

_____ **Other Submittals:** Provide 2 copies of any other submittals with the design package (i.e., installation specifications, equipment cut sheets, energy compliance forms, listings, etc.). Note: a third copy will be required if there is a discharge to the sanitary sewer.

B Required Information and Documents

Plans should include the following information or drawings depending on the nature of the project. If any items or systems are combined on a single sheet, it should be clear that these systems have been included.

- i) **Title / legend**
Include as a minimum the following information: Site Location map, drawing index, building information: occupancy classification(s), type of construction, size, height location on property, fire sprinklers, etc..

B Required Information and Documents (Continued)

- ii) **Project scope:**
The project scope is a general description of the project and should include a description of associated areas where equipment, tanks, piping, hazardous materials storage will be located. Also include a description of operations, hazardous materials handling procedures and safety systems.
- iii) **Code compliance drawing:**
This may include equipment and hazardous materials locations, exiting plan, safety equipment and alarm device locations, walls, control area boundaries, occupancy separations, etc.
- iv) **Architectural drawing(s):**
This may include location of equipment, chemical storage and containment systems, clearances, exits, control areas, occupancy separations, etc..
- v) **Mechanical drawing(s):**
This includes mechanical and ducting systems.
- vi) **Plumbing drawing(s):**
May include piping and drain systems. Provide primary and secondary containment information where applicable. Where secondary piping is required, a separate monitoring plan will need to be reviewed and approved.
- vii) **Electrical drawing (s):**
Electrical equipment and appliances, layout and material, circuit and panel schedule, single line drawing and utility load sheet.
- viii) **Control drawing(s):**
May include alarm and control drawings as required. Additionally a “functional control matrix” (i.e., input/output matrix) is required for most hazardous materials alarm systems. This matrix is also used for the hazardous materials alarm testing.
- ix) **Structural drawings and calculations:** Provide structural support, anchoring details and calculations as required for equipment, tanks, piping, ducting, cylinders, etc..

C Other Submittals

The following may be required depending on the type of project.

_____ **Building Occupancy Classification Inventory form** This form is required if hazardous materials will be used, stored or dispensed and the building is not constructed as a high hazard ('H') occupancy. A plan check cannot proceed unless a Building Occupancy Classification Inventory form or equivalent information has been provided or unless the structure meets the criteria for an H occupancy.

You can find the "Building Occupancy Classification Inventory" form on the internet at www.unidocs.org under "documents and services", "hazardous materials and hazwaste", "New Construction / Tenant improvements".

If you choose to provide an equivalent form, the information must address all criteria specified in Tables 8001.15 A, B, C and D, pages 220-222 in the 2001 California Fire Code:

- i) Provide a complete listing of hazardous materials in the building or the control area in which the project is involved.
- ii) Provide control area boundaries. Include construction details if the separation is being created as part of the permit.

Note: Hazardous material use must be within the limits established for the design of the existing or proposed occupancy.

_____ **Equipment and component information**

- i) Provide a schedule of equipment.
- ii) Provide cut sheets or other pertinent information as needed for equipment major components, alarm systems, safety devices, hazardous materials compatibilities with containments, coatings, etc..
- iii) Provide any listings or certifications on the equipment (i.e., UL, SEMI-S2, Third Party Evaluations, Process Hazard Analysis, etc.)
- iv) Provide an electrical listing or third party evaluation for all equipment shall have. The electrical listing shall be of the entire tool or equipment not just individual components.

Please contact us early in the process as the city may require a third party evaluation for the equipment and or the installation (2001 California Fire Code 103.1.1 , Palo Alto City Municipal Ordinance 17.04.050).

C Other Submittals (Continued)

_____ **Specifications and Listings**

- i) Provide material specifications for tanks, piping, seals, gaskets, etc. At a minimum include materials specifications for any system that will or may come into contact with hazardous materials.
- ii) Provide data on utilities and hazardous materials: (i.e., temperature, pressure, flow, volts, amps, concentration, etc.)
- iii) Installation methods (i.e., installation specifications, joining methods, etc.)
- iv) Component Listings as required. For example, submittal of alarm system listings is required.

_____ **Secondary containment volume calculations**

_____ **Hazardous Material compatibility information**

_____ **Toxic Gas Use, storage and handling**

For toxic gases, see also:

- The Palo Alto Municipal Code Title 15, (PAMC 15.04.343). This document is available for purchase or can be viewed at www.city.palo.alto.ca.us,
- The Santa Clara County Hazardous Materials Agencies uniform documents web site at www.unidocs.org
- The 2001 California Codes.

III Before Final Project Completion and Signoff

_____ **Updated Hazardous Materials Business Plan (HMBP) or Hazardous Materials Registration.**

Submittal of a new or updated HMBP or Hazardous Materials Registration is required prior to final Fire Department approval and sign-off of project. The Unidocs Online Hazardous Materials Inventory Project is an easy way to meet this requirement. Go to www.unidocs.org for more information.

The Hazardous Materials Business Plan approval is required prior to hazardous materials or new hazardous materials being brought on site.