



REQUIREMENTS FOR PYROTECHNIC / SPECIAL EFFECTS
Concerts, Movies, School Plays, Theatrical Productions, etc.

SPECIAL EFFECTS – The use of articles containing a pyrotechnic composition which are designed manufactured, assembled, or discharged in connection with television, motion picture productions, stage shows or other entertainment events.

The *minimum* age requirement to use pyrotechnics is 18 years.

1. PORTLAND FIRE & RESCUE (PF&R) PERMIT:

- A permit from the Portland Fire Marshal's Office is required.
- Permit applications are available on the PF&R website <https://www.portlandoregon.gov/fire/58368> or from the Permit Office at 1300 SE Gideon St., Portland, OR 97202-2419.
- A permit fee of **\$300** is required.
- A standby charge for one or more Fire Inspector(s), may be required. See [fee schedule](#) for hourly rate.
- Make check payable to "Portland City Treasurer".

2. STATE APPLICATION:

- A State of Oregon "Application for Special Effects Display Permit" is also required. This form must be submitted with the PF&R permit application to be signed by the Portland Fire Marshal's Office and the Portland Police Bureau.
- The applicant must submit all documentation (approved PF&R permit application, floor plans and State application) to: Office of State Fire Marshal
License & Permit Services Unit
PO Box 4395, Unit 09
Portland, OR 97208-4395
- **The State must receive this application at least 15 days prior to the date of the event.**

3. FLOOR PLANS:

A detailed floor plan, drawn to scale, must include:

- Size of the stage or area where the special effects are to be used.
- Distance the closest effect will be from the audience.
- Location where the special effects will be used, noting the types, amounts, duration, etc., and where they will be detonated.
- Location where the special effects will be stored and in what type of magazine.
- An elevation diagram showing the location of effects if such effects will be fired above the stage.
- Location of any props, scenery, people, etc. that will be around the special effects during the detonation period.

4. SAFETY MEASURES:

- All special effects shall be stored in a locked room in a locked magazine where only the pyrotechnician has access.
- Each pyrotechnic device fired during a performance shall be separated from the audience by at least 15 feet, but not less than twice the fallout radius of the device.
- Concussion mortars shall be separated from the audience by a minimum of 25 feet.
- There shall be no glowing or flaming particles within 15 feet of the audience.
- No detonation of special effects is allowed over the audience.

5. PYROTECHNICIAN:

- The person(s) in charge of performing the special effects shall submit a list of at least three of the most recent events where they performed special effects.
 - The list shall include: Fire jurisdiction, facility name, address, facility contact and phone number for the listed events.
- The technician must submit copies of pyro-related licenses they may have, including:
 - State license(s) i.e. California, Nevada, New York, etc.
 - Bureau of Alcohol, Tobacco & Firearms licenses for storage or transport of various classes of explosives.
 - Copies of photo ID for operator and assistant.

6. OPERATION:

- All special effects shall be in direct view of the pyrotechnician.
- If effects are not viewable by the operator a spotter must be in a position to see the effects.
 - The spotter must be provided with a radio that has a channel designated specifically for special effects.
- Concussion effects placed on the ground or on the stage require at least two warning lights, activated one to two minutes before concussion effects are fired.
- The warning lights will be positioned as required by this office during pre-shoot.

7. FIRE EXTINGUISHERS:

- A minimum of one 2A-10BC or 2A rated fire extinguisher, as determined by the Public/Special Events inspector, shall be within 50 feet of the point where the special effects are performed, with an attendant by the fire extinguisher during the detonation period.
- For other events, the Public/Special Events Inspector shall determine the degree of fire/life safety that will be required.

USE OF PYROTECHNICS FOR MOVIE COMPANIES Including Car or Other Explosions

Must comply with the above requirements AND the following:

1. The floor plans must show:
 - What will be around the special effects during the detonation period including: props, scenery, people, etc.
 - All buildings or structures around the site and how far they are from the site.
 - Distance people will be from the explosion or use of pyrotechnics.
2. A minimum of 150 feet distance is required for car or similar explosions.
3. For car or similar explosions:
 - One fire apparatus with a crew of four firefighters will be required.
4. A contract with the City of Portland, obtained from the Fire Marshal's Office, is required.
 - This contract includes all fees for the fire apparatus and standby crew, insurance requirements and the time the effects can be used.
5. At least five days notice as to the date, time and location of the special effect(s) is required, so a standby crew can be hired and the fire apparatus can be scheduled.

INSPECTION / DEMONSTRATION REQUIREMENTS (Decided on a case by case basis)

An on-site inspection will be performed by the Public/Special Events Inspector and will include, but not be limited to, the following:

- Inspection of the area where the special effects will be used.
- Inspection of all special effects materials to be used.
- Inspection of the firing board(s), wiring, etc.
- Inspection of the storage of the special effects.
- Inspection of the fire extinguishers.
- Demonstration of the special effects to be used.