



MAFES Dawg

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Gasoline: Always a Risk

Would you store 21 sticks of dynamite, complete with a blasting device, in your basement? I'm sure you wouldn't even consider it, but storing gasoline inside your home creates the same risk as dynamite.

A gallon of gasoline has the same explosive power as the dynamite. And all it takes to set it off is a small spark from a pilot light, a spark from a light switch or static coming from a sock out of the clothes dryer.

Gasoline is dangerous because it gives off vapors that can catch fire and explode. The fire then follows the vapor trail back to the source, thus creating an explosion.

Gasoline termed as flammable for two reasons:

- It has a low flashpoint. It will burn at -45 degrees F. (-43 degrees Celsius).
- It has a high vapor density, meaning that it is heavier than air and will travel great distances along the ground, pooling in low and enclosed spaces.
- Gasoline is a mixture of hydrocarbons. It is a petroleum distillate fraction containing mostly saturated hydrocarbons, as well as other components such as benzene, toluene, and xylene. When it burns completely, the only byproducts are carbon dioxide and water. When it burns incompletely, the hydrocarbons and additives yield products such as carbon monoxide and formaldehyde.

Following are some guidelines for safer use and storage of gasoline:

- Gasoline has one function, to burn as a fuel. Refrain from using it as a solvent or cleaning fluid.
- Gasoline should never be stored or used close to heat or flame. Also, it should never be used where the vapors can seep into a basement or under buildings.

- Do not use gasoline around sources of ignition, such as matches, lighters, cigarettes and many other sources.
- Do not use gasoline to start or accelerate a fire.
- Fill the equipment tanks prior to use. Refuel with the engine turned off and cool.
- If you're transporting gasoline in a car, keep the container in the trunk and keep the trunk lid partially open for ventilation.
- If fire does start while handling the gasoline, do not attempt to extinguish the fire or stop the flow of fuel. Leave the area and call for help immediately.
- Use extreme caution when fueling automobiles. **Do not get in and out of the automobile when fueling.** Although such incidents are rare, an electrical charge on your body could spark a fire, especially during the dry winter months.
- Fill portable gasoline containers outdoors only. Place the container on the ground before filling and never fill containers inside a vehicle or in the bed of a pick-up truck.
- Follow all manufacturer instructions when using cell phones or other electronic devices (those with batteries or connected to electrical outlet) near the gasoline.

Most of us use gasoline every day and fill our vehicles and home containers for home use. Keeping these tips in mind as a heads up, will help to keep us safe and out of harm's way when fueling.