Generator Safety

BUYING A STANDBY GENERATOR:

Buying a standby generator is like buying fire insurance—you may never need it, but it is invaluable when trouble hits. Although your electrical system is highly dependable and reliable, it is subject to the whims of Mother Nature. How well are you prepared to handle a prolonged outage? How will you heat your home and keep foods from spoiling?

Now is the time to inventory your electrical needs. Assume you will experience long outages that could cause you inconvenience and financial loss. Standby generators are not normally stocked in any quantity, so don't plan on buying one after an outage occurs. Remember, too, the installation of standby equipment requires a doublepole, double-throw switch, which keeps electricity from the generator from going out onto the power suppliers' lines. Operating a standby generator without one is extremely dangerous and could result in financial liability.

If your generator is improperly installed, it will pose a threat to the lives of utility line repairmen. A double-pole, double-throw switch, placed between the meter and the main fuse or breaker panel, will prevent electricity produced by the generator from returning to the distribution system. Without this switch, the generator's volts could travel through the transformer and over a wire that a lineman believes is safe to handle. The manual switch ensures that the generator's power only reaches select circuits in the home.

FOR OVERALL SAFE USE OF GENERATORS:

Be certain that it has been installed following the Massachusetts and National Electric Safety Codes – have your local wire inspector check the installation to ensure compliance.

- Be certain that when you use your generator the main breaker is off and/or there is a manual disconnect from the NSTAR grid.
- Never connect generators to another power source such as power lines. Never connect it to your home's electrical system.
- Always follow the manufacturer's instructions and guidelines. Know your equipment. Thoroughly read all operating and maintenance instructions before use.
- Always use and maintain generators properly.
- Always refuel generators outdoors. Do not attempt to fill the gas tank while the generator is operating.

- Always use the appropriate size and type of power cord to carry the electric load.
- Never run cords under rugs or carpets where heat might build up or damage to a cord may go unnoticed.
- Connect appliances directly to the generator itself with properly sized power cords.
- Provide adequate ventilation
 for toxic exhaust.
- **Provide a cooling airflow** for the machine.
- Keep children as far away from the generator as possible.
 Teach them to stay away from the generator.

Sources:

American Red Cross Publication #1098; NSTAR Community Relations Department.



Even when hooked up properly generators can be dangerous, as evidenced by a recent generator fire at the Barnstable Town Offices (Winter 2003). (*Photo courtesy of Stacey Justus.*)