

# Tewksbury BOARD OF HEALTH Regulations For Outdoor Wood - Burning Boilers and Furnaces

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## **1.0. Title and Authority**

1.1. These Regulations are enacted under authority granted by, but not limited to, Massachusetts General Laws, Chapter 111, sections 31, 31C and 122 and shall be known as the Town of Tewksbury Board of Health Regulations For Outdoor Wood-Burning Boilers and Furnaces (the "Regulations").

## **2.0. Purpose**

2.1. The Regulations are enacted by the Tewksbury Board of Health (the "Board") for the purpose of minimizing the human health hazards resulting from smoke, particulate matter, and noxious fumes emitted by outdoor wood-burning boilers and furnaces, to encourage proper techniques in the use and location of these boilers, and to promote the public comfort, convenience, health and safety.

## **3.0. Findings**

3.1. An Outdoor Wood Fired Boiler and Furnace ("**OWB**") is a wood-fired boiler in an insulated, stand alone building with a smoke stack. OWB's heat water or air that is carried through pipes (boiler) or duct work to heat a home or building and/or water/air.

3.2. Certain types of OWBs have been shown, because of their design, to emit significantly high quantities of smoke that contains toxic carbon monoxide, smog causing nitrogen oxides, soot, fine particles, and a range of other chemicals and gases that can cause or worsen serious health problems. Exposure to particulate matter in smoke from an OWB can increase adverse respiratory and cardiovascular symptoms and exacerbate other harmful health conditions; such as asthmatic sensitivity, lung illnesses and cancer.

3.3. Poor installation, placement and management of these OWB's, or the use of inappropriate fuel can increase the harmful effects of the smoke created by the firing of OWB's.

## **4.0. Definitions**

4.1. Outdoor Wood Burning Boiler and Furnace ("**OWB**"): a wood-fired boiler surrounded by a water jacket or a furnace with a smoke vent in an insulated free-standing building with a smokestack and used to heat water or air that is carried by pipes (boiler) or duct work (furnace) to provide heat to a building, structure, or other destination.

OWB's do not include fire pits, chimneys, wood-fired barbeques or equipment that is intended exclusively for producing maple syrup or melting, reclaiming and/or refining metals.

4.2. Wood Fuel: all wood intended to be used as fuel, including but not limited to trees, cordwood, logs, lumber, sawdust, and clean wood from manufacturing processes, wood pellets,

slabs, bark and chips. This definition does not include materials chemically treated with any preservative, adhesive, paint, oil or the like.

**4.3. Seasoned Wood:** wood that has been prepared for use as fuel for the OWB, including but not limited, to trees that have been cut a for at least a year, then stacked split and dried for at least six (6) months before use.

**4.4. Emission Point:** any place (including but not limited to a stack or vent) at or from which any air contaminant is emitted to the ambient air space.

**4.5. Odor:** property of gaseous, liquid, or solid materials that elicits a physiologic response by human sense of smell.

**4.6. Parties-in-interest as used in these regulations means:** abutters, owners of land directly opposite on any public or private street or way, and abutters to the abutters, within four hundred (400) feet of the property line of the applicant as they appear on the most recent applicable tax list, notwithstanding that the land of such owner is located in another city or town.

## **5.0. Requirements**

### **5.1. Permits and Written Plans**

- a. A permit is required from the Board to install an OWB. The permit process shall include submission of a written application form and payment of a permit fee established by the Board.
- b. Permit applicant must demonstrate to the satisfaction of a representative of the Board that he or she understands the requirements for proper installation and operation of an OWB.
- c. The application must be accompanied by a plot plan, which shows the location of the proposed OWB in relation to all existing structures and distances from the proposed OWB to all building and outbuildings on the site and all structures within 900 feet of the location of the proposed OWB. The plan shall be scaled at no less than  $\frac{1}{4}''=1'$  and must include lot lines and indicate distances to all roads adjacent to the site and distances from the OWB to brush, trees, forest land and flammable structures.
- d. The manufacturer's owner manual and recommendation must accompany the OWB permit application.

**5.2.** No boiler or furnace shall be installed within 50 feet of the house it is serving or within 400 feet of the property line, any other building or flammable structure. A clear radius of 20 feet must be maintained between any OWB and any trees or vegetation of height greater than the height of the top of the fuel feed door.

**5.3.** Boilers and furnace must have a smokestack height of at least 2 feet higher than the height of the highest abutting residence (actual roof peak) within a radius of 400 feet. The OWB shall follow in strict accordance the manufacturer's requirements and shall be installed, by permit, by licensed contractors, and shall be inspected by the building, plumbing, electrical inspectors, or other appropriate authority. (This includes appropriate permits and written approval for work

done by licensed contractors and inspections required by building, plumbing, electrical and other appropriate authorities or inspectors.)

**5.4.** OWB's may only be operated during the heating season, which for the purpose of these regulations is October 15<sup>th</sup> to April 15<sup>th</sup>. OWB's shall be considered an alternate means of heat and shall not be the only source of heat.

**5.5.** Only dry, seasoned, split, untreated wood fuel may be burned in the OWB. The cut and split wood pieces are not to exceed three (3) feet in length.

**5.6.** The manufacturer's specifications for the installation and use of the unit shall be complied with except where they are in conflict with these regulations; and in such event, the more restrictive specification or requirement shall apply.

**5.7.** An owner of an OWB's that was legally installed before the effective date of the Regulations may request a variance from the section(s) of the Regulation that his or her OWB does not meet. In such cases, a *Construction Permit Application* must be filed with the Board. Installation must be in compliance with all Town of Tewksbury Zoning By-Laws (the "ZBL"), state building, plumbing and electrical codes and manufacturer use and installation recommendations must be adhered to. The Board shall determine whether to grant the variance based on the public health, safety and welfare.

**5.8.** The Board or its agent shall have the right to take appropriate enforcement or other action, in accordance with Chapter 111 of the Massachusetts General Laws, with respect to any such OWB that has been determined to constitute a nuisance or a public health, safety or welfare risk.

## **6.0. Variance**

**6.1.** Variance to any of these regulations shall be requested in writing to the Board of Health. When a request is received a hearing shall be scheduled and held in accordance with the requirements of Regulation 7.0.

**6.2.** Variance may be granted provided the decision of the Board shall not conflict with the spirit and intent of these Regulations and only under the following conditions:

- a. Strict enforcement of the Regulations for OWBs will constitute manifest injustice,
- b. The granting of the variance shall not in any way impair the public and/or interfere with the right of parties-in-interest to peaceful enjoyment of his or her home or property, and
- c. The same degree of protection can be achieved without strict application of the particular regulation.

**6.3.** The Board may impose any conditions or restrictions it deems appropriate to protect the public and the environment.

## **7.0. Hearing**

7.1. When requesting a variance to these Regulations for OWB, a public hearing shall be required. An application fee, which is set by the Board, will be charged for each application.

7.2. The applicant shall publish a legal advertisement provided by the Board's office in a newspaper that is published and distributed locally, at least ten (10) days prior to the hearing date and at the applicant expense.

7.3. The applicant shall notify the owners of all parties-in-interest within four hundred (400) feet of the applicant's property line, by Certified Mail, Return Receipt Requested, of the hearing at least ten (10) days prior to the scheduled hearing. Said notifications shall be at the applicant's expense. This notice shall be provided by the Board.

## **8.0. Enforcement and Remedies**

8.1. If an OWB is installed or operated in violation of the above Regulations, the Board or its agent is authorized to issue notices of violation, cease and desist orders, other administrative enforcement orders, and take any other legal action to compel compliance with the Regulations.

8.2. If an OWB is operated in a manner that constitutes a potential threat to public health, safety and welfare, or is a nuisance, causes an odor, filth or sickness, the Board or its agent shall issue an order to cease operation of the OWB.

8.3. The Board or its agent may take enforcement action deemed appropriate and lawful, including but not limited to, non-criminal disposition, civil action for injunctive relief, and/or monetary damages.

8.4. A party aggrieved by an order shall have the right to request a hearing before the Board. A request must be made in writing and be received by the Board within seven (7) days of receipt of the order. At said hearing, the aggrieved party shall have the right to be represented by legal counsel and present witnesses and evidence as to why the order should be withdrawn or amended.

## **9.0. Violations and Penalties**

9.1. Whoever violates any provision of these regulations shall pay a fine, not exceeding three hundred dollars (\$300.00) for the first offense and one hundred dollars (\$100) for each subsequent offense. Each day or part thereof that such violation occurs or continues shall be a separate violation.

9.2. Violation of the Regulations may be enforced by non-criminal disposition, as provided by M.G.L. c. 40, section 21D, or by criminal complaint, or by civil complaint for injunctive relief and/or for damages.

## **10.0. Severability**

10.1. Each part of the Regulations shall be construed as separate; if any paragraph, sentence, clause or phrase thereof shall be held invalid for any reason, the remainder of the Regulation and all other applicable regulations shall continue in full force.

## **11.0. Effective Date**

11.1. The Public Hearing was held on March 1, 2007.

**11.2.** Regulations adopted on September 20, 2007 and shall take effect on September 20, 2007.

**11.3.** Regulation amended on February 7, 2008 and shall take effect upon publication in local newspaper.

**11.4** Regulations amended and adopted on November 20, 2008 and shall take effect upon publication in local newspaper.