



DEVAL L. PATRICK  
GOVERNOR

TIMOTHY P. MURRAY  
LIEUTENANT GOVERNOR

Commonwealth of Massachusetts  
Division of Professional Licensure  
**Board of Examiners of Sheet Metal Workers**  
1000 Washington Street • Suite 710  
Boston • Massachusetts • 02118

GREGORY BIALECKI  
SECRETARY OF HOUSING  
AND ECONOMIC DEVELOPMENT

BARBARA ANTHONY  
UNDERSECRETARY OF OFFICE  
OF CONSUMER AFFAIRS

**To: All Massachusetts Building Inspectors**

**From: Board of Sheet Metal Examiners**

**Re: 271 CMR**

- As of February 19, 2011 all individuals including apprentices performing sheet metal work as defined in 271 CMR must hold a sheet metal license.
- As of February 19, 2011 sheet metal permits shall be issued and inspections shall be performed.
- If any city or town needs to postpone issuing permits beyond February 19, 2011 a request should be issued in writing to the Board by February 14, 2011. This request should state the hardship requiring the extension and the method for which the city or town will ensure that unlicensed sheet metal workers are not performing work within that city or town.
- Sheet metal work includes the fabrication and installation of ventilation systems and associated air handling equipment as well as commercial/industrial metal roofing systems – see attached Board definition.
- The testing and balancing of ventilation systems must also be performed by a licensed sheet metal worker – HERS raters will be allowed to pressure test dwellings and duct systems without a license for validation of compliance with energy rebate programs only.
- The Board has adopted a “minor alterations” policy for residential furnace change-outs that would eliminate the need for a sheet metal permit – see attached “minor alterations policy”
- The Board has also adopted a “minor alterations” policy and clarifications for residential kitchen and exhaust fan requirements – see attached.
- All licenses issued during the grandfathering period are “unrestricted” which allows licensees to perform all levels of sheet metal work – although the 271 CMR states that “no sheet metal worker shall perform tasks or enter into a contract for work that is beyond the individual’s or organization’s competence”.
- As of February 19, 2011 we will offer two levels of licensure – “Restricted” and “Unrestricted”



- Restricted licensees can perform work in residential dwellings up to 3-stories in height and non-residential projects 10,000 square feet or less located within non-residential buildings 2-stories or less – these projects allow apprentice-to-journeyman ratios no greater than 1:1.
- As of February 19, 2011 “unrestricted” licenses are required for residential projects greater than 3-stories and non-residential projects greater than 10,000 square feet – these projects allow 1:1 apprentice-to-journeyman ratios for the first (4) employees on the project after which the higher ratio of 3-journeymen for each additional apprentice is required – see 271 CMR 5.02(2)(f) for additional information.
- Licensees that disagree with an interpretation of a local inspector may seek an advisory opinion from the Sheet Metal Board or designated Board staff - Appeals before the Board must be issued in writing within 10-days.
- Complaints regarding licensees shall be filed with our Division of Investigations, please contact the Board for additional information – 617-727-3022.
- 271CMR specifically recognizes the 2009 International Mechanical Code and the following sections of the 7<sup>th</sup> edition building code:
  1. 780 CMR 12.00: Interior Environments
  2. 780 CMR 13.00: Energy Conservation
  3. 780 CMR 15.00: Roof Assemblies and Roof Top Structures
  4. 780 CMR 58.00: Roof-Ceiling Construction
  5. 780 CMR 59.00: Roof Assemblies
  6. 780 CMR 60.00: Chimneys, fireplaces and Solid Fuel Burning
  7. 780 CMR 61.00: Energy Efficiency
  8. 780 CMR 62.00: Mechanical Administration
  9. 780 CMR 63.00: General Mechanical System Requirements
  10. 780 CMR 64.00: Heating and Cooling Equipment
  11. 780 CMR 65.00: Exhaust Systems
  12. 780 CMR 66.00: Duct Systems
  13. 780 CMR 67.00: Combustion Air
  14. 780 CMR 68.00: Chimneys and Vents
- Based on the complexity of the project, sketches, load and duct sizing calculations or engineered construction documents shall be submitted with the permit application at the discretion of the Building Inspector.

### Sheet Metal Residential Guidelines / Inspection Checklist

<u>Yes</u>	<u>No</u>	<u>N/A</u>	
_____	_____	_____	Detailed description and sketch of sheet metal system to be installed has been provided
_____	_____	_____	All workers performing sheet metal work onsite has valid Massachusetts sheet metal license
_____	_____	_____	All sheet metal work being performed with proper journeyperson-to-apprentice ratios
_____	_____	_____	Equipment sized per heating / cooling load calculations
_____	_____	_____	Duct work sized per manual "D" calculations
_____	_____	_____	Bath / shower rooms contain mechanical exhaust fan vented outdoors
_____	_____	_____	Electric dryer exhaust properly installed maximum total run 35'-0", maximum flexible run 8'-0"
_____	_____	_____	Flexible duct runs installed 14'-0" maximum length
_____	_____	_____	Volume dampers installed for each supply air branch duct
_____	_____	_____	Ductwork installed using proper gauges and hangers
_____	_____	_____	Ductwork / plenum connections sealed substantially airtight
_____	_____	_____	Ductwork insulated by means of external covering or internal lining
_____	_____	_____	New/clean - properly sized filter installed (final inspection)
_____	_____	_____	Testing and Balancing report complete (final sign-off)

**Sheet Metal Commercial Guidelines / Life Safety / Critical Systems**  
**Inspection Checklist**

<u>Yes</u>	<u>No</u>	<u>N/A</u>	
_____	_____	_____	Set of stamped engineering documents and detailed description of mechanical system to be installed has been provided
_____	_____	_____	All workers performing sheet metal work onsite has valid Massachusetts sheet metal license
_____	_____	_____	All sheet metal work being performed with proper journey person-to-apprentice ratios
_____	_____	_____	Fire dampers with access door properly installed and checked for operation
_____	_____	_____	Smoke and combination fire / smoke dampers with access doors properly installed - actuator checked for proper operation (May also be verified by fire department during fire alarm testing)
_____	_____	_____	Duct smoke detectors with access doors properly located (May also be verified by fire department during fire alarm testing)
_____	_____	_____	Smoke / atrium exhaust systems installed and operation verified (May also be verified by fire department during fire alarm testing)
_____	_____	_____	Stair pressurization systems installed (where required) and operation verified (May also be verified by fire department during fire alarm testing)
_____	_____	_____	Grease / kitchen hood exhaust system installed with all seams and connections welded airtight with properly located cleanouts. Proper clearances, fire rated enclosures and pressure testing required.
_____	_____	_____	Seismic restraints installed where required on equipment and ductwork
_____	_____	_____	Duct penetrations in fire rated walls and floors sealed
_____	_____	_____	Metal roofing systems installed watertight using proper materials and fasteners
_____	_____	_____	Flexible duct runs installed 6'-0" maximum length
_____	_____	_____	Ductwork installed using proper hanger spacing, hanger stock, threaded rod and angle iron
_____	_____	_____	Ductwork / plenum connections sealed substantially airtight
_____	_____	_____	Ductwork insulated by means of external covering or internal lining
_____	_____	_____	Volume dampers installed for each supply air branch duct
_____	_____	_____	New/clean - properly sized filters installed (final inspection)
_____	_____	_____	Testing and Balancing report complete (final sign-off)

**The Massachusetts Board of Examiners of Sheet Metal Workers Policy # 2010-01 Regarding Work Not Requiring a Permit – *Minor Alterations*.**

**The following policy has been adopted to reduce the cost and time associated with sheet metal permitting and inspections on residential furnace and air handler replacements.**

Effective April 12, 2010 the following work associated with the change-out of residential furnaces and air handlers will not require a sheet metal permit:

- New supply air transition from new furnace / air handler to existing supply air plenum
- New return air filter rack and transition from new furnace / air handler to existing return air plenum

The Board reserves the right to revise, alter, amend or eliminate this policy at anytime without notice.

**\* Please note the above policy does NOT eliminate the need for a sheet metal license**

**Commercial / Industrial Metal Watershed Roofing System- *Definition:***

Any flat seam, flat locked and/or soldered seam, standing seam, batten seam, horizontal seam, custom designed or prefabricated metal roofing and related components (flashing, trim, gutters, downspouts, conductor heads and thru-wall scuppers) that are interconnected to the metal roofing system with mechanical fasteners or locks and seams and are installed on projects that are deemed non-residential per 271 CMR.

**Excludes:**

Residential buildings as defined in 271 CMR

Though wall flashing

Gravel stops

Coping

Soffits and fascia

Gutters and downspouts that are not interconnected and fastened to the metal roofing system

**Residential bathroom exhaust fans / kitchen exhaust fan -*Interpretation:***

All residential fans and associated ductwork shall be installed by a licensed sheet metal worker.

New installations shall require a sheet metal permit and inspection.

The replacement of an existing residential fan shall be considered a minor alteration and will not require a sheet metal permit.

**Exception:**

The installation of combination fan/light units may be installed by a licensed electrician.