**ERRATA:** *Equation Page:* "U-Factor Calculation (U-Factor)" should read "U-Value Calculation (U-Factor)"

# **Acronyms To Know:**

IECC – International energy Conservation Code

EECC - Energy Efficiency Codes Coalition
ICC - International Codes Coalition
Fenestration - collection of the houses windows

Btu - British thermal Unit R-Value - Thermal Resistance

U-Value/Factor – Overall heat transfer between .20 - 1.20

### The 'Zones'

Created to separate areas of the country into similar weather patterns.

Numbered from 1-8 with a-c subcategories.

IP Units traditional display, F based | SI units scientific display, C based.

HDD - Heating Degree Days

CDD - Cooling Degree Days

^^^ How are they Calculated?

Relationship to numbered zones.

What is Meadville classified as?

### The Past

Created not only to save people money but to cut down on overall energy use.

Improvements in technology cause need for amendments.

Updated every 3 years.

Every amendment makes code more strict.

#### Now

Last update 2009 included

**Tighter U-Factor Limits** 

Windows, doors, skylights must be approved by National Fenestration Rating Council

Windows must be labeled with ratings.

R-Value minimum increased.

Basement, insulated from ceiling to floor or 10 feet down, whichever is less

Ductwork must be airtight and insulated to R8 if exposed

Recessed lighting must be sealed

Programmable thermostat requirement

Hot water lines insulated to R3

50% of bulbs in built in lights must be fluorescent at minimum.

Next update 2012

## The future

Shooting for 30% decrease in energy use over 2007 codes

Currently have 14.1% reduction for recommended codes

Capable of getting 14.7 and higher reductions going above and beyond

Windows less than 15% of wallspace in eash room.

Average savings across all zones: \$235/year

Average savongs for our zone: \$221/year