

Background

AccuVent is an industry leading product to provide a combination of a windwash barrier and a ventilation baffle. Being the first on the market to combine both into a singular product, AccuVent has led a charge in improved insulation performance and home energy efficiency.

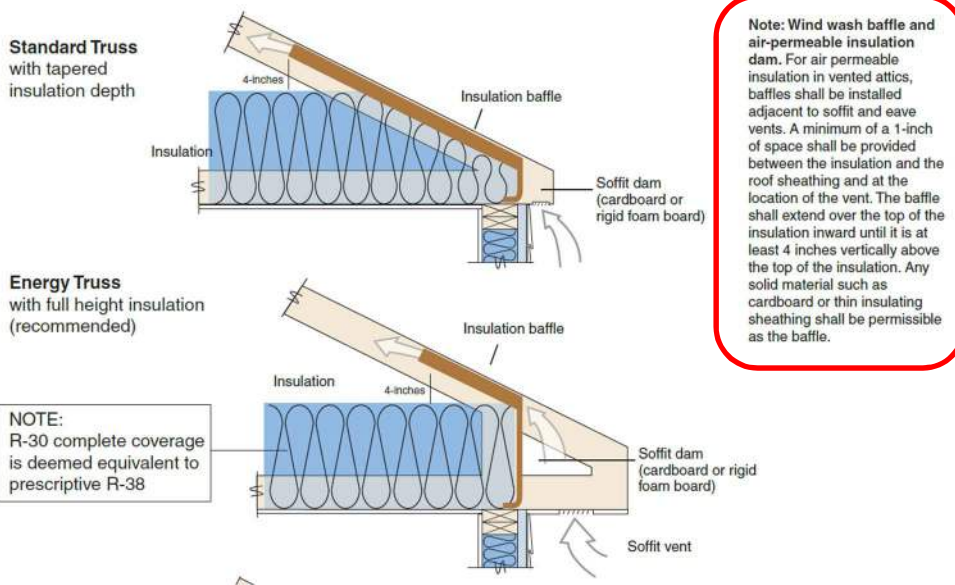
Regulations:

Regulations are typically monitored on a local government level through building inspections. These inspections are based on building codes, energy codes, etc. For home construction, these can include the International Residential Code (IRC), International Energy Conservation Code (IECC), and International Building Code (IBC).

In reference to those codes, they call for a solid material barrier for air-permeable insulation. It shall be adjacent to the soffit and eave vents, up to the roof decking, provide a minimum 1-inch airflow gap and extend a minimum 4-inches above the insulation.

Insulation Details for Ceilings with Attic spaces

Rafter and Truss



Product Comparison:

As it relates to available products on the market, there are typically three options:

1. Cardboard
2. Rigid Polystyrene (Raft-R-Mate, ProVent, DuroVent, etc.)
3. Thin Gauge PVC (AccuVent)

Common Characteristics:

Characteristic	Cardboard	Polystyrene	AccuVent
Moisture Resistant		X	X
Animal Resistant		X	X
Easily Conform to Roof Configuration		X*	X
Provide Windwash Barrier	X	X*	X
Spray Foam Compatible			X
E84 (Flame Spread Index)	Not Available	5	5
E84 (Smoke Developed Index)	Not Available	25**	80

* Depends on manufacturer, not all manufacturers include a flexible component to provide vertical block. Those that do, can be easily broken because of the materials brittleness

** This product will ignite if exposed to sufficient heat and intensity or exposed to fire

Airflow:

Proper airflow from soffit to ridge vent is key in a ventilated attic. Based on the IRC, a ventilated attic shall provide a ventilating area of 1/150 of the area of the vented space. The exception is if between 40% and 50% of the ventilating area is provide by ventilators in the upper portion of the attic or rafter space, then a 1/300 airflow is needed. It is important to ensure you have more inflow air than outflow (ridge vent), to ensure air is not drawn from the conditioned space or through the ridge vent.

Here are the values for airflow of different products:

Product	16" O.C. Truss Airflow (sq/in)	24" O.C. Truss Airflow (sq/in)
AccuBlock	13.1	20.3
AccuVent Cathedral	13.1	20.3
AccuVent Original	15.5	25.7
AccuVent High Energy	15.5	25.7
Raft-R-Mate	Not Available	22.3
ADO ProVent	15	26.0
ADO DuroVent	Not Available	18.0