



## Product Application:

### **IRON-BARR RM - Under-Slab Gas and Vapor Barrier Membrane**

#### **Description:**

**IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** is a 20 mil patented multi-ply lamination combining a highly puncture resistant virgin polyolefin film (PP/PE blend), with 3 Ply's of metallized polyester film with high tech 2-sided barrier coating (no VOC) on each ply of METPET. This oriented high-barrier METPET offers superior tensile strength and unsurpassed, effectively ZERO permeance, water vapor barrier and noxious Radon/methane gas characteristics. The skin layers, comprised of tough blended virgin polyolefin films, give the top and bottom layers a virtual puncture-proof shield to protect against the roughest under slab construction site conditions.

#### **Features:**

- Superior Under-Slab or Between-Slab Moisture / Vapor Protection for the life of the building.
- Unparalleled Test Performance under ASTM E 1745 – Standard Specification for Water Vapor Retarders Used in Contact with Soil or Granular Fill under Concrete Slabs, when compared to other Class “A” products.
- **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** is designed for use in systems to control soil gas migration, i.e. radon, methane, etc. Additionally, it provides excellent protection against soil contamination including oil by-products and sulfates.
- Superior resistance to UV exposure.
- Chemical and rot resistant.

#### **Benefits:**

- Can be used in contact with, and directly below the slab, without a Sand Bed or Protection Course.
- High yielding rolls, greatly increase daily coverage rates.
- Superior puncture resistance allows for installations over the roughest site conditions
- **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** will not tear, crack, split or puncture under normal working conditions.
- **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** can be exposed for up to 24 months.
- **DEVCOM Premium Seam Tape** provides superior “Primerless” seam sealing even in cold and wet conditions.
- Specified Primers, Mastic and Detail Tapes are used to seal the Under-Slab Gas and Vapor barrier Membrane at penetrations and concrete surfaces to provide a COMPLETELY SEAMLESS VAPOR BARRIER PACKAGE.

#### **IRON-BARR RM Physical Properties:**

<b>Properties</b>	<b>Test Standard</b>	<b>Results</b>
Total Thickness (in)		20 mils
Yield		2,655 sq in/lb
Under-Slab Vapor Barrier	ASTM E1745 (Class A, B & C)	Exceeds All Standards
Tensile Strength	ASTM D882	105 lbs
Puncture Resistance	ASTM D1709 (Method B)	4,350 grams
Water Vapor Permeance	ASTM E96 (Method A)	.00042
Chemical Resistance	ASTM E154	Unaffected
Life Expectancy	ASTM E154	Indefinite
Seam Tape Adhesion (cohesion)	ASTM D1876	7 lb per lineal in



### **Storage & Handling:**

Store all materials above ground. Do not store products in direct sunlight. Do not remove Seam Tape from box until ready to use. For cold weather applications, store Seam Tape in a heated airspace at a temperature of 50 degrees F (10 degrees C) or higher for at least 2 days prior to application. Remove only the material that can be applied within 2 hours. Store all materials away from open flames or sparks.

### **Application:**

ASTM E 1643-98 is an installation guide titled, "Standard Practice for Installation of Water Vapor Retarders Used in Contact with Earth or Granular Fill Under Concrete Slabs." Flatiron Films LLC subscribes to all of the installation procedures outlined in this standard. Installation of **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** shall be in accordance with this standard.

### **Under-Slab Installation Instructions:**

1. **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** can be installed over aggregate, sand or tamped earth base, a sand base is not necessary, the **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** is strong enough to withstand the toughest construction environments without a protection course.
2. Unroll **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** over the entire area parallel with the direction that the concrete slab is to be poured. Side and end laps should be overlapped six inches and lap sealed with a 2" butyl tape and sealed using 4" wide DEVCOM Premium Seam Tape for an edge seam.
3. The **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** must be sealed near the top of the vertical surface of the footing and the entire perimeter of the slab area using either DEVCOM Premium Seam Tape or a combination of DEVCOM and one of the alternate products listed later.
4. All penetrations must be sealed including all structural, plumbing, electrical and miscellaneous penetrations must be sealed using DEVCOM Premium Seam Tape, or one of the alternate products listed later.
5. If the **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** is damaged during or after installation, cut a piece of **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** large enough to cover the damage by six inches in all directions, clean the membrane of all dust, dirt and moisture and seal with DEVCOM Premium Seam Tape.
6. Once installed and completely sealed, the **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** is ready for pouring concrete; the strength of the Under-Slab Vapor barrier Membrane System is such that a sand or gravel protection course over the membrane is not required.

### **Vertical Wall Installation Instructions** (for use as a protection course)

1. Install an approved waterproofing membrane according to the manufacturer's installation instructions.
2. While the membrane is still tacky, install **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** as a protective course over the applied waterproofing membrane, Side and end laps should be overlapped six inches and lap sealed with a 2" butyl tape and sealed using 4" wide DEVCOM Premium Seam Tape for an edge seam. DEVCOM Premium Seam Tape.
3. A properly installed termination bar mechanically fastened to the wall at the top termination of the waterproofing membrane is required.
4. Care must be taken when back filling against the material so that it is not damaged or punctured; if damage occurs to the **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane**, cut a piece of **IRON-BARR RM Under-Slab Gas and Vapor Barrier Membrane** large enough to cover the damage by six inches in all directions, clean the membrane of all dust, dirt and moisture and seal with DEVCOM Premium Seam Tape.



### **Limitations:**

The preceding installation instructions are very general installation instructions. Instructions on architectural or structural drawings should be reviewed & followed. ASTM Standard E1643 "Standard Practice for Installation of Water Vapor Retarders Used in Contact with Earth or Granular Fill Under Concrete Slabs" also provides valuable installation and design information.

### **Warranty:**

Flatiron Films LLC warrants materials to be free of defects in manufacturing for a period of 1-Year from date of purchase and will replace or, at our option, refund the purchase price any materials proven to be defective. THIS LIMITED WARRANTY IS IN LIEU OF ANY OTHER WARRANTY GUARANTEE EXPRESSED OR IMPLIED, INCLUDING: WARRANTIES OF MERCHANTABILITY OR FITNESS FOR PARTICULAR PURPOSE. IN NO EVENT WILL FLATIRON FILMS LLC BE LIABLE FOR INCIDENTAL CONSEQUENTIAL DAMAGES NOR SHALL LIABILITY, IF ANY, EXTEND BEYOND THE PURCHASE PRICE OF MATERIAL. FLATIRON FILMS LLC DOES NOT WARRANT THE WORKMANSHIP OF THE APPLICATOR.

### **Alternate Specified Products:**

Protecto Wrap Super Stick Seam Tape  
Protecto Wrap #500 Detail Tape  
Protecto Wrap #160H Mastic  
Protecto Wrap Jiffy Seal 140/60  
Protecto Wrap CMU 100 applied by roller, brush or spray.  
Protecto-Tak Primer  
Protecto Wrap #100 Primer



***Proudly Made in the USA!***

***Start you building clean and green. Guard it using Iron-BARR RM!***

***We Build It Smarter, Stronger...BETTER!***

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