EverGuard® vs EPDM Brochure (Quick Facts)

(COMEG176)

Updated: 7/16
There Is A Winner. Read The Facts...
Proof ONE: EXCELLENT RELIABILITY

Excellent seam strength. EverGuard® TPO’s seams are 4 times stronger than taped EPDM, which is critical for a long-lasting, watertight roofing system.

Up To 4 Times Greater Seam Strength Compared To EPDM...

<table>
<thead>
<tr>
<th></th>
<th>0</th>
<th>10</th>
<th>20</th>
<th>30</th>
<th>40</th>
<th>50 lbs</th>
</tr>
</thead>
<tbody>
<tr>
<td>EPDM</td>
<td>4.54</td>
<td>9.07</td>
<td>13.61</td>
<td>18.14</td>
<td>22.68 kg</td>
<td></td>
</tr>
<tr>
<td>TPO</td>
<td>0</td>
<td>10</td>
<td>20</td>
<td>30</td>
<td>40</td>
<td>50 lbs</td>
</tr>
</tbody>
</table>

Exceptional puncture resistance. EverGuard® TPO offers excellent puncture resistance when compared to both non-reinforced and reinforced EPDM of the same thickness.

Up To 3 Times More Puncture Resistant Compared To EPDM...

<table>
<thead>
<tr>
<th>50 Mil Non-Reinforced EPDM</th>
<th>0</th>
<th>50</th>
<th>100</th>
<th>150</th>
<th>200</th>
<th>250 lbs</th>
</tr>
</thead>
<tbody>
<tr>
<td>TPO</td>
<td>22.68</td>
<td>45</td>
<td>68</td>
<td>91</td>
<td>113</td>
<td>kg</td>
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</tbody>
</table>

EverGuard® TPO is dimensionally stable. EPDM can shrink up to 2 percent after installation—imagine your installed roof membrane shrinking 2 feet (610 mm) in a 100-foot (30.5 m) run!

Up To 80% Less Shrinkage Compared To EPDM...

<table>
<thead>
<tr>
<th></th>
<th>0</th>
<th>1.0</th>
<th>1.5</th>
<th>2.0</th>
<th>2.5</th>
</tr>
</thead>
<tbody>
<tr>
<td>EPDM</td>
<td>0</td>
<td>0.5</td>
<td>1.0</td>
<td>1.5</td>
<td>2.0</td>
</tr>
<tr>
<td>TPO</td>
<td>1.0</td>
<td>1.0</td>
<td>1.5</td>
<td>2.0</td>
<td>2.5</td>
</tr>
</tbody>
</table>

Proof TWO: EASIER TO INSTALL

What could be easier than 1-2-3! EverGuard® TPO installs in just 3 easy steps. EPDM takes 12 steps to install—which means more likelihood for error! Not only that, making repairs to an EverGuard® TPO roof is just as simple: just cut a patch and weld in place.

EverGuard® TPO: Just 3 Easy Steps—Fast And Reliable

1. Roll Out Membrane
2. Fasten Membrane
3. Weld Seam

EPDM: 12 Steps—And More Chance Of Error

1. Roll Out Membrane
2. Fasten Membrane
3. Mark Membrane
4. Tack Back Membrane
5. Prime Seams
6. Apply Tape
7. Secure Tape With Pad
8. Fold Over Membrane
9. Broom-Off Seam
10. Remove Release Paper
11. Broom-Off Seam Again
12. Roll Seam

Proof THREE: LOWER-COST SOLUTION

Savvy property owners and designers know that choosing the right system is key to minimizing installed cost. EverGuard® membranes come in three styles (including smooth, fleece-back, and self-adhered), with multiple installation options including mechanically attached, Rhinolock®, fully adhered, and self-adhering. With the most prefabricated accessories available in the industry, EverGuard® TPO gives you maximum design flexibility and allows you to apply the lowest-cost solution to your specific roofing need. The result? EverGuard® TPO systems are less expensive than EPDM on an installed cost basis!

Proof FOUR: ENERGY-EFFICIENT CHOICE

TPO is the clear winner when it comes to energy efficiency!

- On a sunny summer day, a black roof can reach temperatures in excess of 170°F (76.7°C).
- A highly reflective white EverGuard® roof can be as low as 110°F (43.3°C).
- EverGuard® roofs transmit much less solar radiation (versus black EPDM) into your facility, thereby resulting in energy savings.
- TPO’s highly reflective material helps to reduce overall demand charge on commercial buildings, which accounts for 30–70% of a total electricity bill.

Beware of energy “savings” calculations for dark roofs in cold winter climates that often ignore:

- Cloud cover or days with no sun
- Hours of daylight
- Snow cover
- The low angle of the sun

These factors can significantly impact the energy savings calculation for a dark roof!

*Relative installed cost based on national average. 60 Mil EverGuard® TPO = 100%
TPO Is The Fastest Growing Single-Ply Roofing Membrane—Don’t Be Saddled With Outdated Technology!

TPO systems have grown from just a tiny share of the single-ply roofing market to become, by some accounts, the #1-preferred single-ply roofing product. Their flexibility for use in virtually any application has also made them the fastest growing single-ply roofing systems.

**Growth Of TPO Roofing**
(Source: The Freedonia Group, Inc.)

<table>
<thead>
<tr>
<th>Year</th>
<th>Million Squares</th>
</tr>
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<tbody>
<tr>
<td>2002</td>
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<tr>
<td>2007</td>
<td>3.5</td>
</tr>
<tr>
<td>2012</td>
<td>5.5</td>
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<tr>
<td>2017*</td>
<td>8.5</td>
</tr>
<tr>
<td>2022*</td>
<td>10.5</td>
</tr>
</tbody>
</table>

* Projections

TPO Demand

[gaf.com](http://gaf.com)