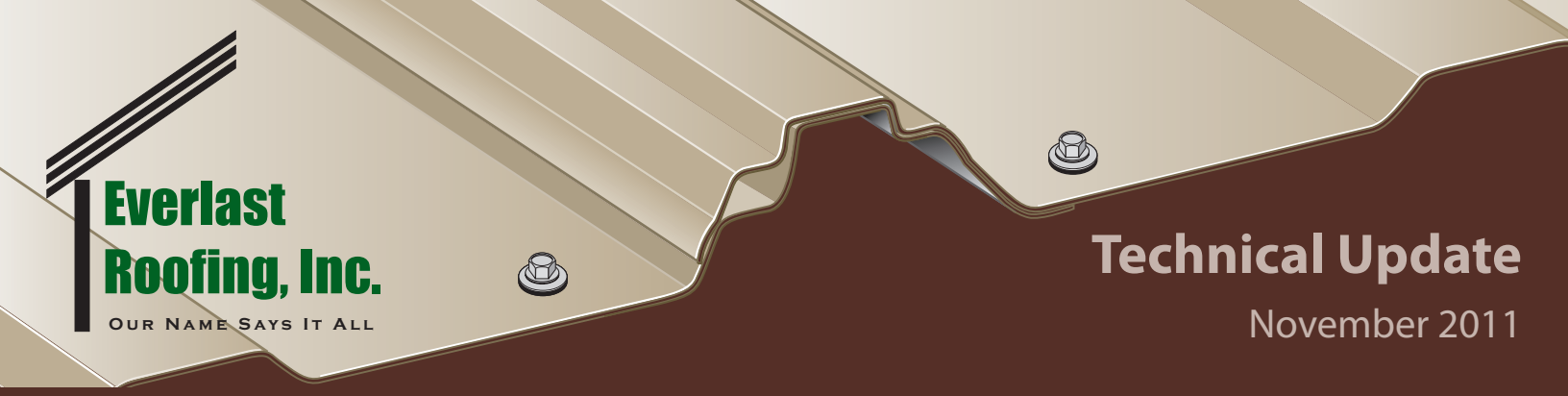


Everlast Roofing, Inc.

Our Name Says It All

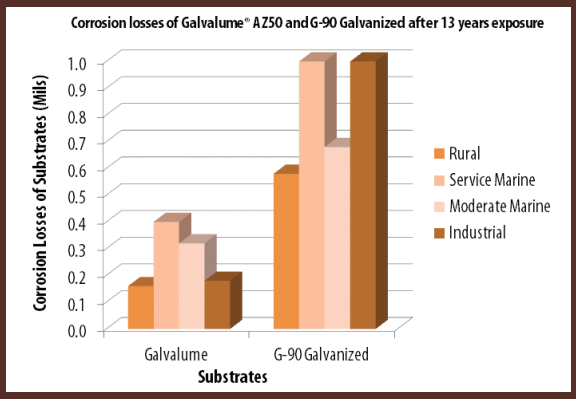
Technical Update

November 2011

10 ENTERPRISE COURT LEBANON, PA 17042 888-339-0059

Atmospheric Corrosion Performance

Galvalume® provides excellent corrosion protection of steel by providing the combined long-term barrier protection of aluminum and the galvanic protection of zinc. It has been demonstrated that Galvalume® has at least twice the corrosion resistance of conventional G-90 galvanized in rural environments. This performance level has been well documented and supported through sample exposure and building inspection programs in North America. In a recent roof inspection survey throughout the northeastern United States the Galvalume® coating was still in excellent condition after 30 years of service.



Prepainted Galvalume® Corrosion Performance

While the metallic coating provides corrosion protection of the steel substrate, paint systems offered in North America, provide the aesthetics and additional barrier protection for steel buildings. Prepainted Galvalume® provides advantages and benefits under all environmental conditions (rural, industrial, marine, acid rain) and across all climatic regions in North America.

Building inspections and evaluations of exposed samples in North America clearly show that Galvalume® will provide longer corrosion protection for prepainted roof and wall panels. Results of a prepaint building inspection program in an acid rain environment showed that after 15 years, the average amount of coating loss along the drip edge was only 1/16" with Galvalume® compared with a G-90 galvanize coating loss of 13/16". Galvalume® also showed improved corrosion protection benefits at tension bends and at damage sites through the paint system.

Animal Confinement Buildings

Animal confinement buildings have been identified as very corrosive, due to the types of corrosive gases that are produced during the decomposition of animal waste and the high humidity condition. To prolong the life of a building, it is essential that efficient waste management practices be followed. Proper ventilation and insulation must be provided for in the design of the building, in order to protect the metal cladding.

The environment in animal confinement buildings for pigs has been identified as severely corrosive for metals and is especially detrimental to Galvalume®. For this reason, Galvalume® (plain or prepaint) should not be used for pig barns. In confinement buildings that house cattle, poultry, or horses, Galvalume® can be used and will provide equal or better service life than G-90 galvanized with proper waste management, ventilation, and building design.

Heat Reflectivity

Acrylic coated Galvalume® meets the U.S. Energy Star Label requirements for solar reflectance of new and weathered roofs. Measurements conducted with Galvalume® were significantly higher than the minimum Energy Star requirements of 0.65 for new and 0.50 for weathered roofs. This product feature can result in reduced energy costs to cool a building and improve interior comfort. Galvanized steel does not meet these minimum solar reflectance requirements.

Technical Update

Both Galvalume® and galvanized coated steels have been used for many years as materials for roofing and siding building products in the construction industry. However, since the introduction of Galvalume® to North America in the 1970s, Galvalume® has had the highest annual growth rate among coated steel products, becoming the material of choice for a wide range of agricultural buildings. Specifically, both plain and prepainted Galvalume® are used in North America for applications such as :

- Quonset buildings
- Equipment storage facilities
- Barns for storing harvested crops and feed
- Greenhouse, plant nursery, and food processing facilities
- Animal confinement buildings, excluding pig barns

The growing use of Galvalume® for these applications is driven by the superior long-term corrosion protection performance and improved heat reflectivity properties provided by the 55% aluminum- 45% zinc alloy coating of Galvalume® as compared to galvanized. In certain applications Galvalume® should not be used. These include :

- Contact with copper or lead
- Bulk chemical fertilizer (Potash) storage
- Animal confinement buildings for pigs

The following documentation supports the performance attributes of Galvalume® and describes the limitations and best practices for using Galvalume® in agricultural applications.