

## OUR ROOFING STORY











AHI Roofing Limited is proud of its heritage as a supplier of premium roofing products for more than 50 years.

Whatever your roofing needs - domestic or commercial, new or reroof, modern or traditional - a Gerard ® roof can provide the solution. With 5 distinctive profiles in a wide choice of colours, our aesthetically appealing and long lasting Gerard ® range of roofing products can fulfill all your design requirements and protect your property from the extremes of nature for many years.

AHI Roofing Limited is the innovator in the area of coated, pressed metal roof tiles. We developed the first of these in 1957, in New Zealand, and we are still the largest manufacturer of coated pressed metal roof tiles in the world. We continue to lead the industry in pressed metal roof tile technology, with four manufacturing plants around the world: New Zealand, the United States (California), Malaysia and, since 2009, Hungary. In addition, a manufacturing plant in Belgium operates under licence to AHI Roofing, utilising our original technology and selling the tiles under our Decra® trademark.

Our new state-of-the art plant in Europe was designed by our engineers in New Zealand and is the culmination of over 50 years' experience of manufacturing coated pressed metal roof tiles. It will produce the popular GERARD® roofs range of tile profiles and complete roofing systems.

AHI Roofing has built an extremely strong presence in Europe over the past forty years. Now, with our new Hungarian based operation and autonomous local management, we are strongly committed to meeting the diverse requirements for the highest quality roofing products in our extensive European markets. In addition, we remain committed to increasing our reputation for customer service to an even higher level.

Where AHI Roofing leads, others follow. AHI Roofing has dominated the world market for coated pressed metal roof tiles for more than five decades. It was not until the 1990's that other companies recognised our success and endeavoured to emulate us. To remain at the vanguard of the industry, AHI Roofing continues to focus on research, development and design

innovations to meet individual market needs for premium, long lasting roofing products.

AHI Roofing is the only steel roof tile manufacturer with evidence that its roofs outlast the performance warranty. We maintain a stringent programme of monitoring sample roofs in a variety of extreme climatic environments. This rigorous testing programme enables us to continually improve materials and manufacturing processes to further enhance the performance of our roofing products.

AHI Roofing's commitment to the quality of its products goes beyond the factory door. We provide specially designed installation tools and training for installers so that each installation of a GERARD® roof is carried out to our high international standards. Regional Managers regularly inspect the workmanship of appointed contractors.

AHI Roofing's roofing products comply with stringent international building regulations. Our products are certified in many countries globally: in the United Kingdom, in France,

in the Netherlands, in Poland, in Turkey, in the United States of America, in Russia, in Japan, in Australia and in New Zealand.

Our products are manufactured to ISO 9001 International Quality Management standards in accordance with the European Community Construction Products Directive, and in conformance with the EN 14782 and EN 508-1 European Standards, as stated in our CE Declaration of Conformity. Our manufacturing plant is registered to ISO 14001 Environmental Management Systems standards.

AHI Roofing's parent company, Fletcher Building, established 100 years ago, provides the resources to continue this momentum. It is the second largest company in New Zealand in terms of capitalisation, with annual revenue of over US\$5bn. The company's core activities include a wide range of building materials and construction projects, such as residential properties, schools, universities, hospitals, commercial and industrial buildings, as well as major international infrastructure projects.



Behind the sophisticated range of metal roofing tiles currently produced by AHI Roofing lies a fascinating story. It began in the early years of World War II, when linseed oil-based paints became impossible to obtain. The British Government asked the leading bituminous emulsion manufacturers to produce an alternative protective coating material for steel and corrugated iron structures that would also provide a camouflage effect. Industrial Chemists formulated an emulsion with the highest possible bitumen content, which provided a tough, waterproof membrane for steelwork. Throughout the war, this bituminous emulsion went into service protecting many strategic buildings in Britain, not only from air strikes, but also from the elements (1).

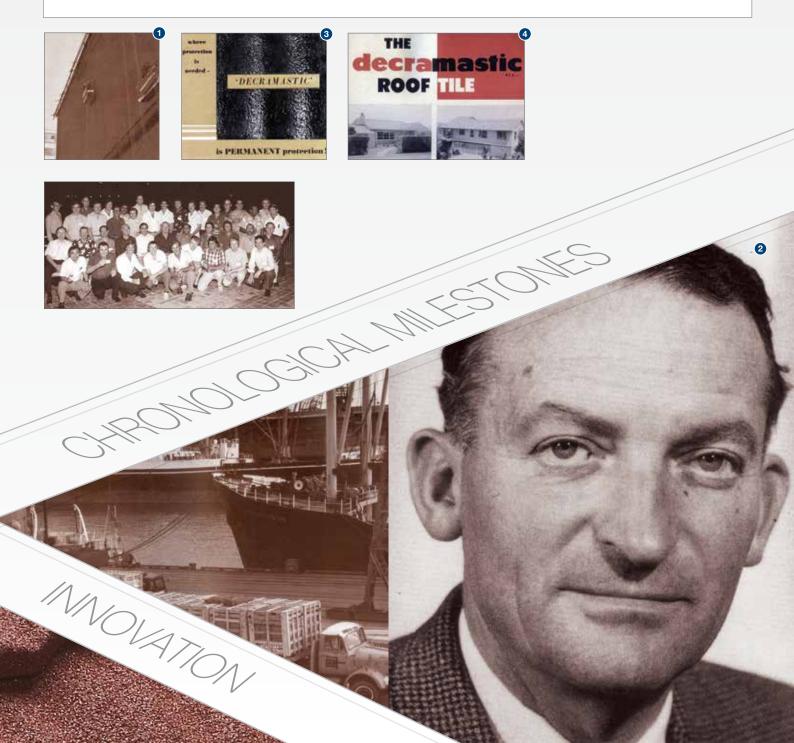
In the years following the war, various attempts were made to remove this functional paintwork, which, having served its original purpose, was considered drab and unfashionable. Removing this bituminous mastic coating proved virtually impossible and the commercial potential for its protective qualities was soon recognised.

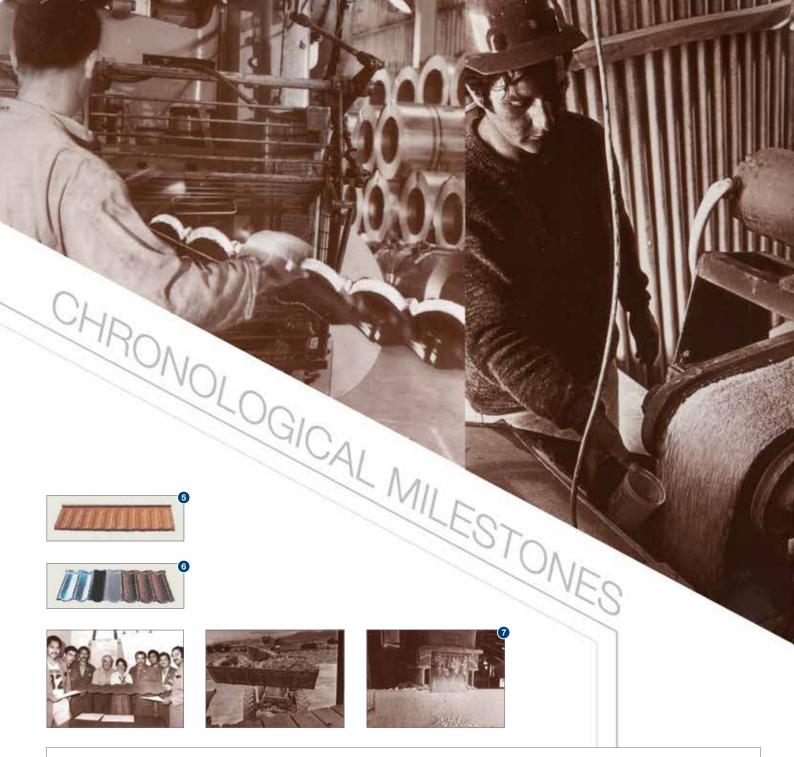
However, it took a genuine New Zealand innovator, Mr. Lou Fisher (2) to see how this potential could be exploited for domestic and commercial roofing purposes in New Zealand and ultimately worldwide.

**1954** Lou Fisher visits the United Kingdom and acquires the rights to manufacture this bituminous mastic product for supply in all areas outside the United Kingdom. On his return to Auckland he establishes the first overseas manufacturing plant.

**1955** Decramastic is registered as a trade mark by L.J. Fisher & Co. Ltd (3).

**1957** L.J. Fisher & Co. Ltd. acquires the exclusive rights to use the New Zealand developed pressed Martile profile and produces the first, four-pan Decramastic tile from galvanised steel. Initially used to prevent the sheets sticking together, the natural stone chip coating becomes a design feature demanded by the market. The introduction of Decramastic roof tiles constitutes one of the first major innovations in residential roofing for more than 30 years (4).





1964 The ten-pan Harveytile is produced (5).

**1967** The Decramastic profile undergoes a dramatic change, as a result of the development of a seven-pan tile that interlocks (6), giving complete tile-to-tile contact the entire length of the tile. This provides further strength and absolute weather security. The inclusion of a fungicide in the coating increases its resistance to moss and fungal growth.

**1971** PVA, the first overglaze, is introduced to improve chip adhesion. This provides a much tougher finish, resulting in far less chip loss during installation and also enhances the appearance of the roof.

**1974** Chip coverage is improved by the "double-drop" technique, which involves applying larger chip granules in the first drop, followed by smaller granules in the second, thereby ensuring a compact surface coverage.

1978 An increasing demand for pressed metal roof tiles, which had

been marketed in Europe since 1974, leads to the establishment of the Polytuil S.A. plant in Liege, Belgium, as a licensed joint venture, to produce roof tiles under our trademark Decra®.

PVA overglaze is replaced by the more durable pure acrylic (100%) overglaze.

1980 Bituminous emulsion is replaced by an acrylic barrier coating system (6). This represents a significant technological change, following a major research programme, which involved merging the experience gained since 1957 with the modern technology of acrylics. As a result the new, lightweight, optimum performance Decrabond tile is launched after exhaustive testing. Areas specifically addressed in the testing regimes are high levels of ultraviolet solar radiation, the salt-laden coastal atmosphere and increasing atmospheric pollution in the urban environment.

**1981** Decra A/S in Denmark becomes the second European licensee and commences manufacture. In New Zealand, natural stone chip (7) is coloured to provide the first red chip.

**1983** The release of Decrabond II, a new stone chip coated roofing tile with three layers of protective coating on the underside and five protective layers on the outer side.

**1985** MRI in Malaysia commences the manufacture of Decrabond under licence.

**1986** A seal coat over primer is introduced to improve coating adhesion and enhance anti-corrosion properties.

**1989** The GERARD® operations worldwide (excluding the USA) are purchased, adding the GERARD® Tuffcoat (GERARD® Classic) profile to the product range.

Manufacturing in the USA commences in a high-technology plant designed and built in New Zealand.

**1994** Zincalume® (an aluminium/zinc alloy) coated steel replaces galvanised steel. Using established scientific techniques, Zincalume is predicted to last 4 to 8 times longer than galvanised

steel in extreme environments. AHI Roofing's laboratory and real life testing regimes have proved that Zincalume coated tiles are superior to galvanised and Galfan tiles in all areas, especially in unwashed areas such as side laps or turn ups under flashings.

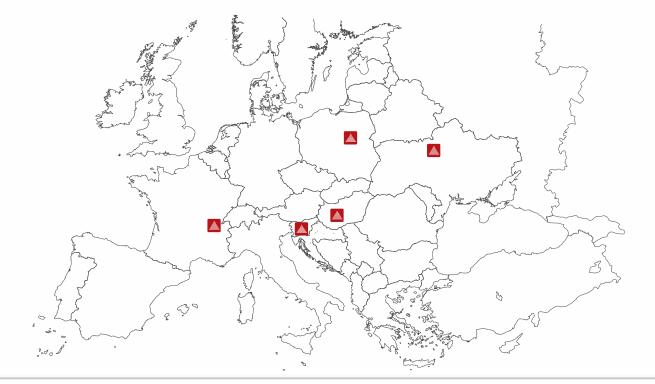
**2005** AHI Roofing purchases the old MRI manufacturing facility at Nilai in Malaysia. This plant undergoes extensive refurbishment and updating before commencing the production of AHI Roofing products.

**2009** AHI Roofing commissions its newest manufacturing facility at Varpalota, an industrial town in Western Hungary, which will source its key raw materials from New Zealand.

AHI Roofing's roofs are now sold in over 120 countries and protect over a million homes and commercial buildings from the extremes of nature in all climates and regions.

2013 GERARD® Diamant tile is launched. The profile is featuring 10% more coverage when compared to the GERARD® Classic tile.

## EUROPEAN LOCATIONS



www.gerardroofs.eu



Authorised partner of GERARD®