



GRANITI **F** IANDRE®

Granitifiandre USA

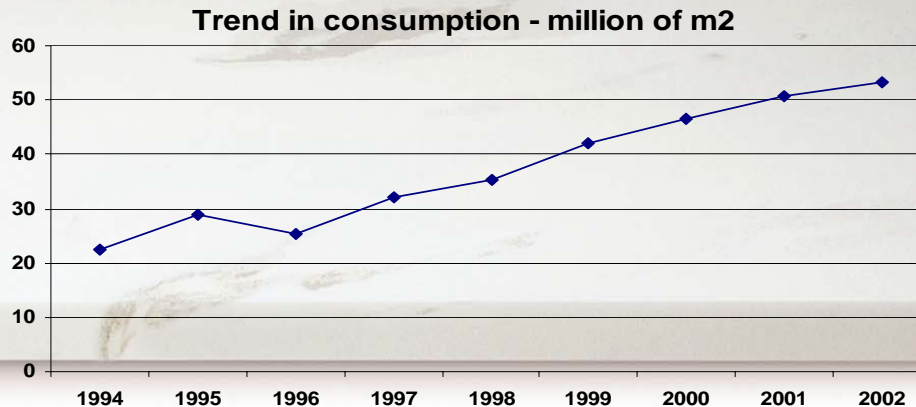
May 2004

Granitifiandre USA



The American market – quarried materials

- Consumption 2002 equal to 53.4 million m² – over double the consumption of 1994
 - +5.2% on 2001 vs overall average of 3.8%,
 - cagr of 11% in the periods 1994/2002 and 1998/2002,
 - USA has a 7% quota of total consumption,
 - import quota equal to 57%
- Average sales price increased by 7.3% on 2001 at 53 USD m²
- Pro capita consumption (100 inhab.) equal to 20 m² – Italy 104 m²



The ceramics sector – Italy

The analysis of the trend of Italian production is shown in the table below

Type	1998	2002	Cagr
Single fired	299	186	-11%
Double fired and similar	83	61	-7%
Other ceramics	35	30	-4%
Vitrified porcelain	116	140	+5%
Glazed porcelain	56	189	+35%
Total	589	606	+1%

The radical and important change in the production mix emerges with a significant increase in glazed porcelain

The ceramics sector –USA market

- Estimate of consumption 2003 equal to 266 million m² – five times the consumption of 1980 and double consumption of 1996
- in the period 1998 – 2003 cagr of 9.3%, forecast of 6% in 2005
- Ceramics represents 11.6% of the total consumption of flooring materials and continues to gain market share compared to vinyl and carpet materials (replacement effect as for quarried materials)
- 80% of annual consumption related to imported materials; percentage expected to be maintained constant in the coming years due to limited development of local production

The ceramics sector –USA market

- The importation of materials (over 210 million m²) from the following countries
 - Italy – 65.3 ml m² (share 31%) with average price 10.1 \$ ex factory
 - Spain – 32.6 ml m² (share 16%) with average price 6.4 \$ ex factory
 - Mexico – 25.2 ml m² (share 12%) with average price 5.7 \$ ex factory
 - Brazil – 25.3 ml m² (share 12%) with average price 4.1 \$ ex factory
- The differential in terms of prices in favour of Italian materials is justified due to the undisputed leadership in the production of vitrified porcelain and in particular glazed porcelain
- the quota of sales of technical vitrified porcelain was 8% while the quota of glazed porcelain was 90%; percentages equal to 76% in 1985 on total consumption of 85 ml m²

Glazed vitrified porcelain

Characteristics compared to traditional glazed

- associated to technical advantages of vitrified porcelain comparable production costs; in particular:
 - absorption of water – 0.04% for the materials GF vs $\leq 0.5\%$ required by regulations and from 3 to 5% by a single-fired white body
 - consequent non-freeze of the material
 - breaking strength – 55 N/mm² for materials GF vs ≥ 35 N/mm² required by regulations
 - greater natural look of the material

Characteristics compared to technical vitrified porcelain

- priority use represented by residential market

Glazed vitrified porcelain – the opportunity

Development of innovative production technology

- in collaboration with researchers of the Iris Group technology was developed that consents the use of “dry” glaze
- the innovation relates to the production phase following the pressing

Advantages

- lower investments in machinery (specific mills and glaze storage tanks)
- reduced stoppage of machines and reduced water wastage for cleaning
- lower scrapes and necessary disposal
- greater chromatic consistency

In summary lower personnel and investment costs quantified as 8/10 percentage points vs moist glaze

Glazed vitrified porcelain – the opportunity

Therefore considering

- ✓ consumption in strong expansion world wide confirmed in relation to the USA market where the import percentage is very high
- ✓ production innovation with evident advantages in terms of cost
- ✓ possibility to complete the range of products
- ✓ possibility to have a range of decisive products on the residential market
- ✓ continual weakness of the US dollar

It was decided to delay the commencement of the American factory in order to allow the technological integration and reach maximum flexibility in order to exploit the various opportunities in an evolving market

Glazed vitrified porcelain – the opportunity

THE INVESTMENT AND THE EXPECTATIONS

- the technical integration will result in some changes to production flows due to the introduction of machines developed exclusively internally and the use of specially studied glaze
- costs of the integration approx. Euro 2 million and new estimate of the total investment Euro 53/55 million
- average sales price expected 0.75/1 Dollar (depending on product) higher compared to the geotecnica collection of Granitifiandre
- industrial margin expected better than geotecnica

Glazed vitrified porcelain – the opportunity

Range of products

three different product collections will be developed:

- ✓ “cotto” look materials– representing the part with the highest added value; the best handmade “cotto” are those close to quarried materials in terms of sales price
- ✓ “rustic” materials – with hot and pastel colours
- ✓ “slate” materials – with irregular surfaces

They relate to materials that are in full expansion on the American market



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