



PRODUCT DATA SHEET

COMPANY WITH
QUALITY SYSTEM
CERTIFIED BY DNV GL
= ISO 9001 =

CODE
NAME
DESCRIPTION

9159

Bianco Lux

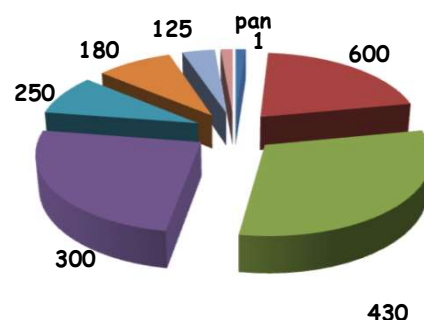
Atomized white base for porcelain tiles

CHEMICAL ANALYSIS

SiO ₂	68.5%
Al ₂ O ₃	18.5%
Fe ₂ O ₃	0.5%
TiO ₂	0.6%
CaO	1.0%
MgO	0.6%
Na ₂ O	4.4%
K ₂ O	1.6%
I.o.i.	4.2%

PARTICLE SIZE DISTRIBUTION

sieve opening	residual
1 mm	1.2%
600 µm	20.8%
430 µm	30.6%
300 µm	24.8%
250 µm	8.6%
180 µm	8.8%
125 µm	3.8%
pan	1.4%



430

PROPERTIES BEFORE FIRING

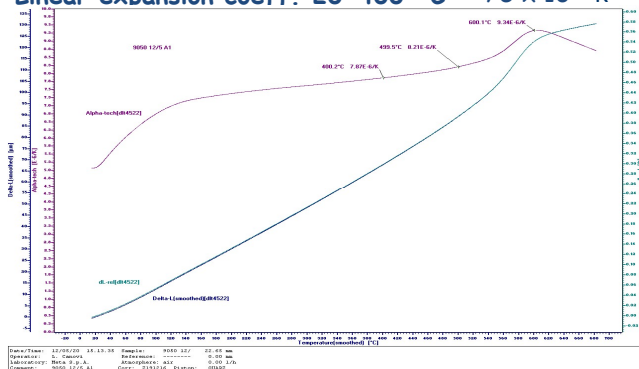
Forming pressure	400 Kg/cm ²	Modulus of rupture of green body	10 Kg/cm ²
Linear expansion after pressing	0.25%	Modulus of rupture of dried body	37 Kg/cm ²
Moisture of atomised	6.0%	Specific surface M.B.I.	48 m ² /g

PROPERTIES AFTER FIRING

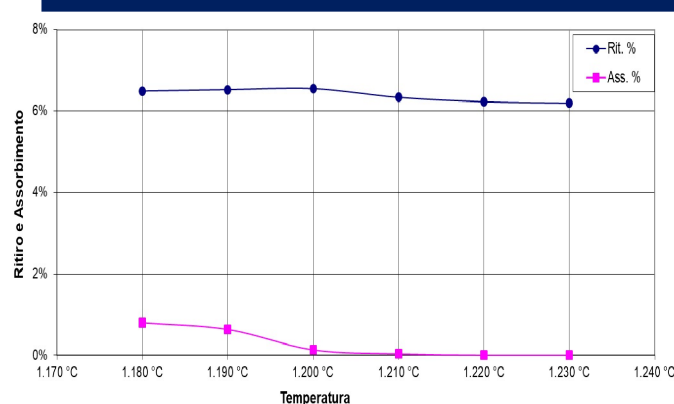
Firing cycle ¹	52 min.	Modulus of rupture of fired body	670 Kg/cm ²
Firing temperature	1220 °C	Valori colorimetrici ⁴	
Thermal work of kiln ²	1117 °C	L* (white)	79
Linear shrinkage	6.2%	a* (red-green)	1
Water absorption	0.01%	b* (yellow-blue)	12
Loss on ignition	4.2%	Fired colour approx.	white
Moisture expansion ³	n.d.		

DILATOMETRIC ANALYSIS ON FIRED BODY⁵

Linear expansion coeff. 20-400° C $75 \times 10^{-7} \text{K}^{-1}$



GREIFICATION DIAGRAM



Notes:

- Samples are fired in laboratory kiln of 3,6 m.
- Measured with BULLER ring fired on a refractory tile of 25x30 cm.
- Measured according to standard UNI EN ISO 10545-3:2018
- Illuminant/Observer = D65/10°. ColorQUEST Sphere: Stdz Mode: RSIN.
- 10°C/min gradient.

The data mentioned are average values obtained from production and laboratory controls

September 2020