



# IRAN REFRACTORIES COMPANY

## TECHNICAL DATA SHEET



### ALMA 90K

<b>Classification:</b>	High Alumina Brick
<b>Main Raw Material Component:</b>	Tabular Alumina
<b>Type Of Bond:</b>	Ceramic
<b>P.C.E. (Equivalent temperature)</b>	> 39 (1865°C)
<b>Main Applications:</b>	Special usages. Petrochemical Industries, Excellent resistance to high temperature, abrasion, corrosion and chemical attacks.

<b>Chemical Composition</b> (Calcined base)			
Al <sub>2</sub> O <sub>3</sub> %	SiO <sub>2</sub> %	Fe <sub>2</sub> O <sub>3</sub> %	TiO <sub>2</sub> %
88 – 91	9 – 11	0.1	0.1

<b>Physical Properties</b>		
<b>Bulk Density</b>	gr/cm <sup>3</sup>	2.80-3.00
<b>Cold Crushing Strength</b>	kg/cm <sup>2</sup>	> 750
<b>Apparent Porosity</b>	%	< 19
<b>Modulus of Rupture</b>	kg/cm <sup>2</sup>	80-150

<b>Thermomechanical Properties</b>		
<b>Refractoriness under Load T05</b>	°C	Min 1600
<b>Reversible Linear thermal expansion (1400 °C)</b>	%	≈ 1.0

The above data are typical of the properties of commercial Standard brick .

The data are subject to reasonable variation and therefore should not be used for Specification purposes. They may not be regarded as committed specifications and therefore not as guaranteed properties .

ASTM Test Methods, where applicable, used for determination of data.

Revision:1

Date of issue: 1397/08/15

Code: IRF-ST-Q-860-19

Revision:00