



## CT-50

### Ceramic Core Material Properties Typical Analysis

#### Applications:

For equiaxed, air melt & vacuum cobalt and nickel-based superalloys, stainless steels, aluminum

Choosing the correct blend of material is a critical component to ensuring the successful performance of your ceramic cores in the investment casting process. The materials we use in our ceramic cores feature excellent alloy compatibility and consistent quality.

<b>Method:</b>	Poured Core	
<b>Trace Elements (PPM):</b>	Pb - Lead	10
	Bi - Bismuth	<1
	Ag - Silver	<10
	Sb - Antimony	5
	Zn - Zinc	5
	Sn - Tin	5
	Fe - Iron	250
<b>Physical Properties:</b>	Apparent Porosity	27%
	Water Absorption	15%
	Apparent Specific Gravity	2.58
	Bulk Density (g/cm <sup>3</sup> )	1.88
	Modulus of Rupture (MOR) (psi)	1000
	MOR with CT Impregnation	1800
	MOR with Resin Impregnation	2800
	Thermal Expansion RT to 2100° F	0.2%
	Cristobalite	8%

Note: These values are not guaranteed and should used only as indications of material properties. Core-Tech reserves the right to change, modify or eliminate analysis at any time.