

硼酸铋 (BiB306) 是一种新开发的非线性光学晶体，具有较大的有效非线性光学系数，高损伤阈值及不易潮解等特性。

其非线性系数比LBO高3.5 - 4倍，比BBO高1.5 -2倍。它可以有效地倍频946nm，在473nm处产生蓝色激光。

BIBO(BiB306) is a newly developed Nonlinear Optical Crystal. It possesses large effective nonlinear coefficient, high damage threshold and is non-hygroscopic.

Its nonlinear coefficient is 3.5- 4 times higher than that of LBO, 1.5-2 times higher than that of BBO. It can efficiently frequency doubling the 946nm to produce blue laser at 473nm.

主要特点 Features

- 透光范围 286-2500nm

Light transmission range 286-2500nm

- 有效非线性光学系数大

Large effective nonlinear optical coefficient

- 高损伤阈值

High damage threshold

- 不易潮解，物化性能稳定

Not easy to deliquesce, stable physical and chemical properties



性能参数:

Flatness	$\lambda/8$ at 633nm
Parallelism	≤ 20 arcsec
Wavefront Distortion	$\lambda/8$ at 633nm
Surface Quality	10-5
Perpendicularity	≤ 5 arcmin
Angle tolerance	$\Delta\theta, \Delta\varphi \leq \pm 0.25^\circ$
Dimension tolerance	± 0.1 mm
ClearAperture	90% of central area
Chamfer	≤ 0.2 mmx45°
Chip	≤ 0.1 mm
Damage Threshold	0.3GW/cm ² 1064nm TEM00 10ns 10HzAR-coated
Aperture	2x2-25x25mm
Length	1-20mm
Cutting angle q and f	Determined by different kinds harmonic generation
Phase matching type	Type I or type II