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Nd Doped Silica Fiber

Product Description

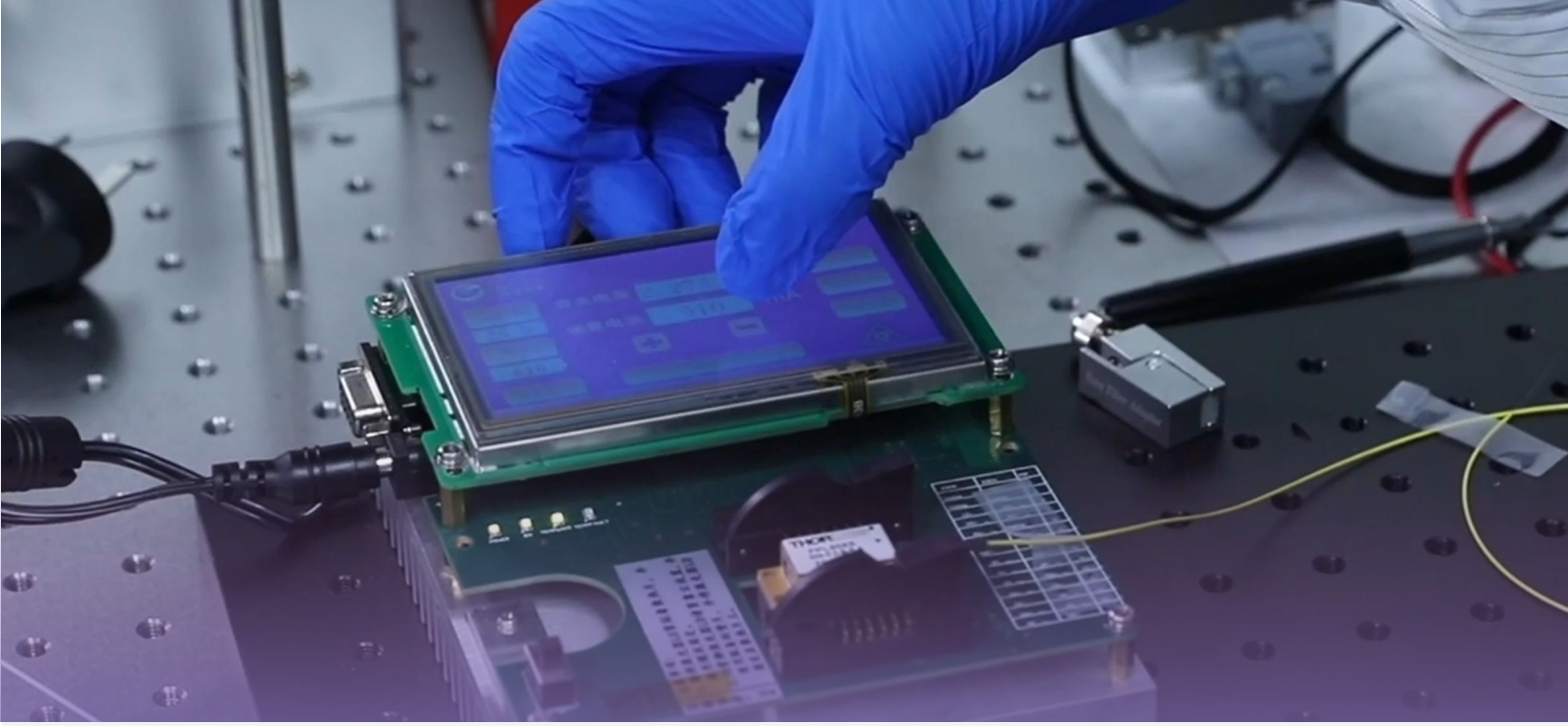
Based on the self-proposed modified sol-gel technology, the Nd^{3+} coordination environment is regulated, and the fluorescence intensity ratio of Nd^{3+} ~900 nm is greatly improved. The Nd^{3+} silica fiber with large mode field and high gain single mode can be used for high power, narrow linewidth single frequency and ultrafast fiber laser of ~900 nm.

Features

- High 900 nm fluorescence intensity ratio
- High 808 nm pump absorption
- High 900 nm power laser output
- Single frequency laser output
- High repetition frequency ultra-fast laser output
- Both PM and non PM are customized
- Optical fiber dimensions can be customized

Applications

- Biomedicine, industry and scientific research
- Pulsed fiber laser and amplifiers
- Frequency doubling for deep blue laser generation



Specifications

Optical Specifications

Part Number	NDF-4/125-PM	NDF-20/125-PM	NDF-30/125-DC
Operating wavelength (nm)	890-935	890-935	890-935
Core NA	0.14±0.01	0.05-0.1 (Support customization)	0.05-0.1 (Support customization)
Core absorption (dB/m@808 nm)	410-450 (Support customization)	--	--
Cladding absorption (dB/m@808 nm)	--	1.0-3.5 (Support customization)	1.0-3.5 (Support customization)
Core attenuation (dB/km@1200 nm)	≤100	≤100	≤100
Output power	≥10 mW (single frequency and ultrafast)	1-150 W (M^2 < 1.5)	≥100 W (M^2 < 3)

Geometric and Mechanical Specifications

Core diameter (μm)	4.0±1.0	20.0±1.5	30.0±2.0
Cladding diameter (μm)	125.0±2.0	125.0±2.0	125.0±5.0
Coating diameter (μm)	245.0±10.0	245.0±10.0	245.0±10.0
Coating materials	Low index acrylate	Low index acrylate	Low index acrylate
Prooftest level (kpsi)	≥100	≥100	≥100