Electronic Supplementary Information

Poling Effects on the Structural, Electrical and Photoluminescence Properties in Sm Doped BCST Piezoelectric Ceramics

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Results and discussion section

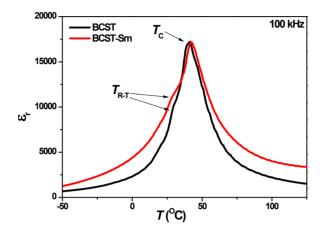


Fig. S1 The temperature dependence of dielectric constant ε_r and dielectric loss tan δ of the BCST and

BCST-Sm ceramics measured at 100 kHz.

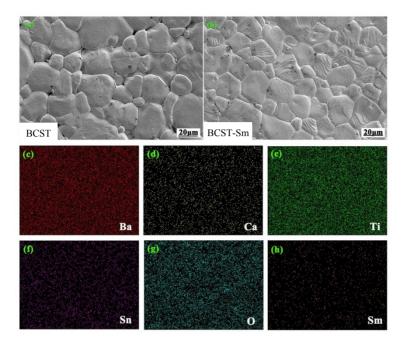


Fig. S2 The FE-SEM images of the (a) BCST, (b) BCST-Sm ceramics and (c - h) the element

mappings of the BCST-Sm ceramics.

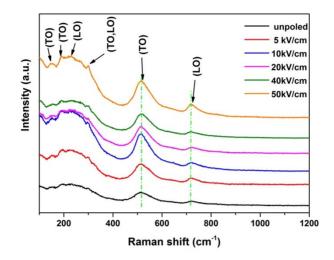


Fig. S3 Raman spectroscopy of the unpoled and poled BCST-Sm ceramics under different electric

fields (5, 10, 20, 40 and 50 kV/cm).