

Supporting Information

A flexible, planar energy harvesting device for scavenging road side waste mechanical energy *via* synergistic piezoelectric response of $\text{K}_{0.5}\text{Na}_{0.5}\text{NbO}_3\text{-BaTiO}_3/\text{PVDF}$ composite films

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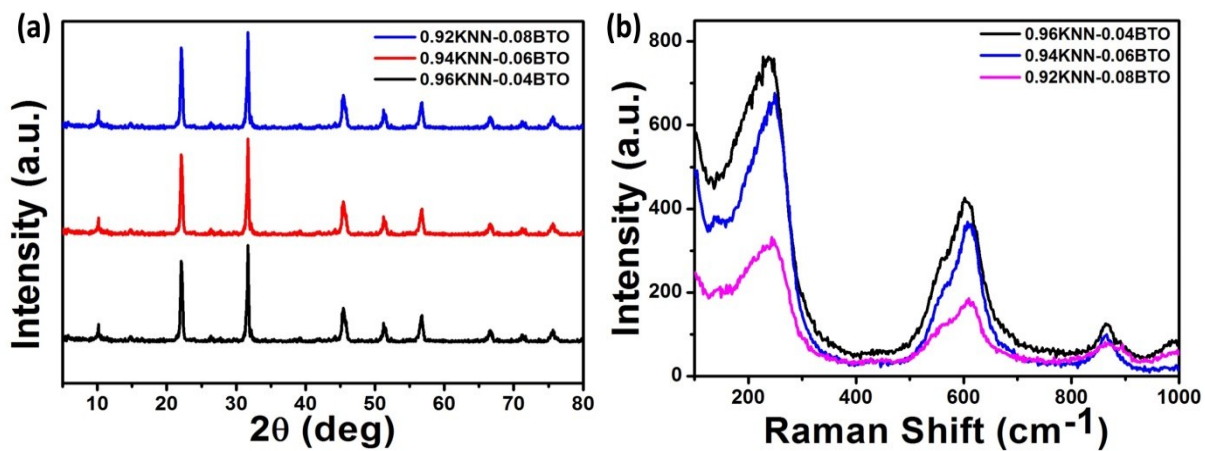


Figure S1 XRD and Raman spectroscopy analysis of KNN- x BTO nanoparticles ($x=0.04$, 0.06 and 0.08)

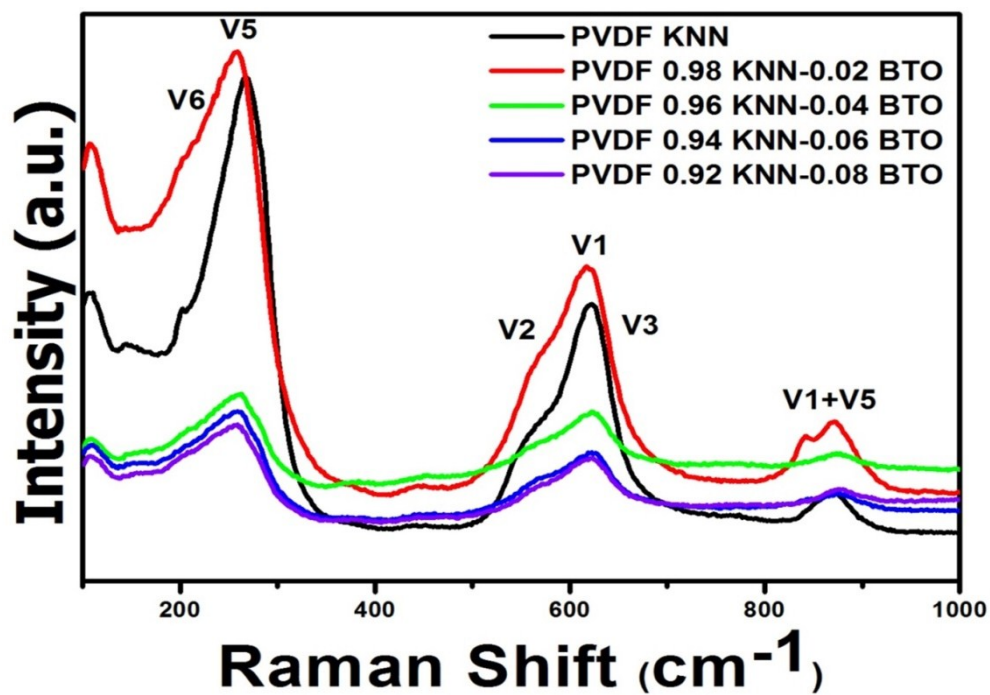


Figure S2 Raman spectroscopy analysis of PVDF/KNN and PVDF/KNN- x BTO CFs

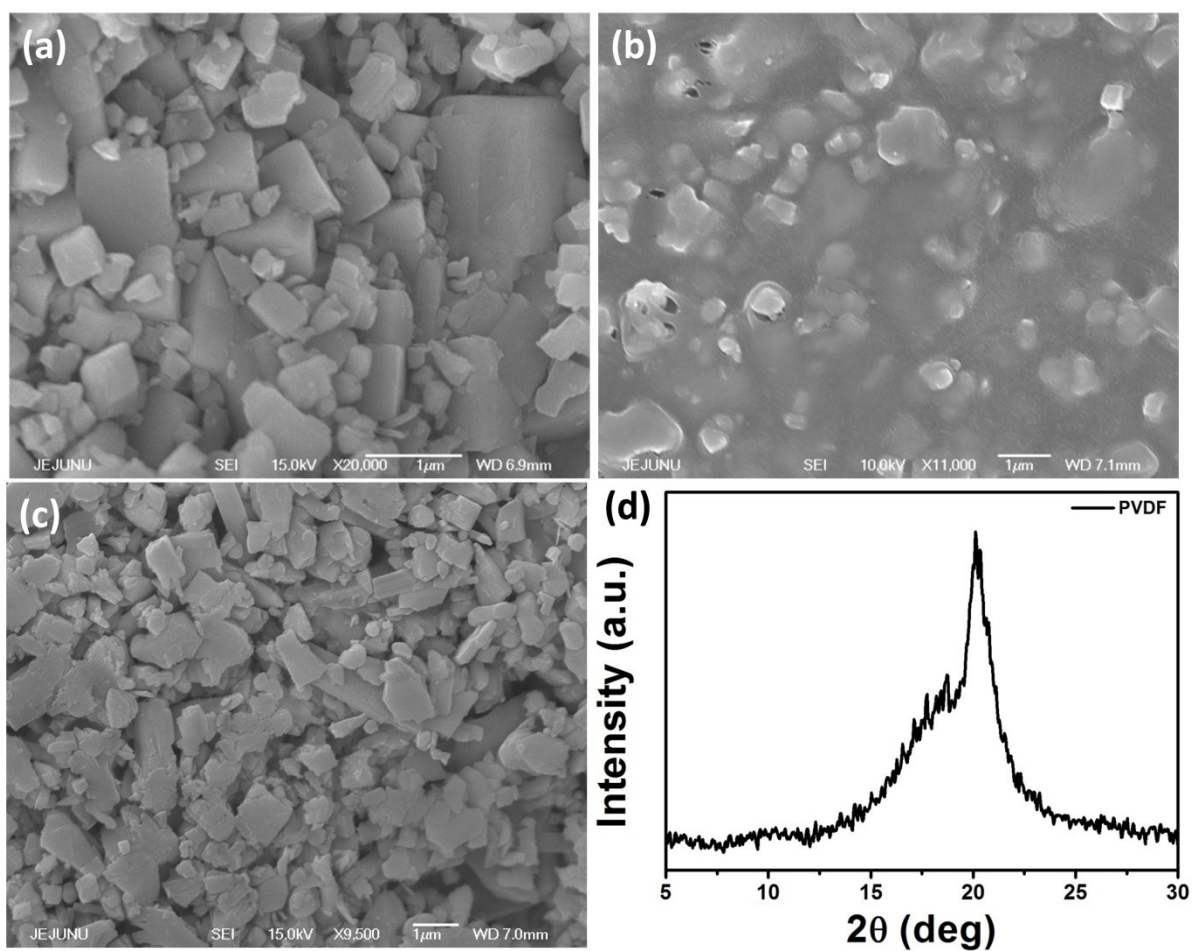


Figure S3 FE-SEM analysis of (a) Pure KNN (b) PVDF/KNN CF and (c) KNN- x BTO ($x=0.04$) (d) XRD analysis of PVDF film

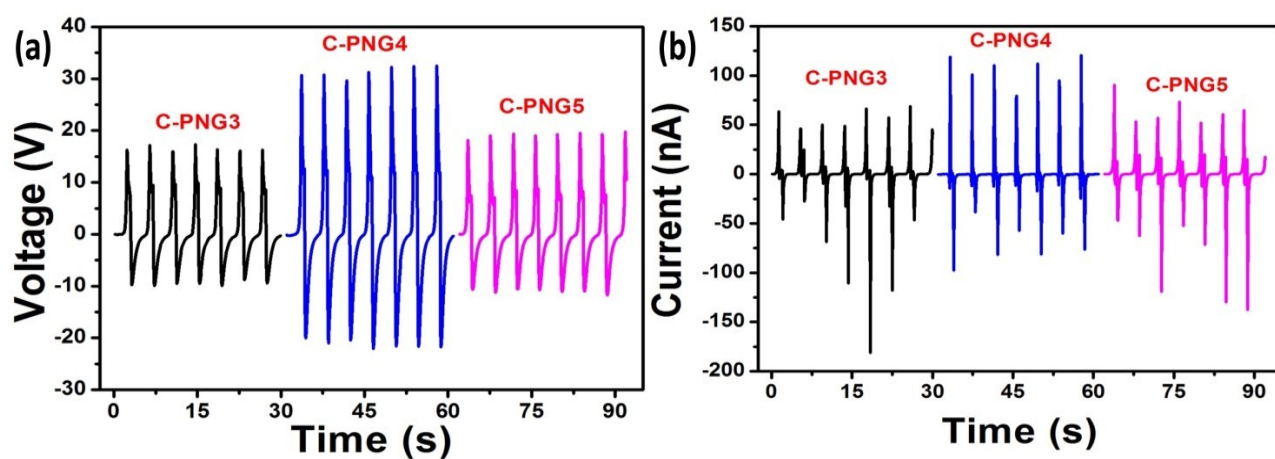


Figure S4 Voltage and current response of C-PNG3, C-PNG4 and C-PNG5

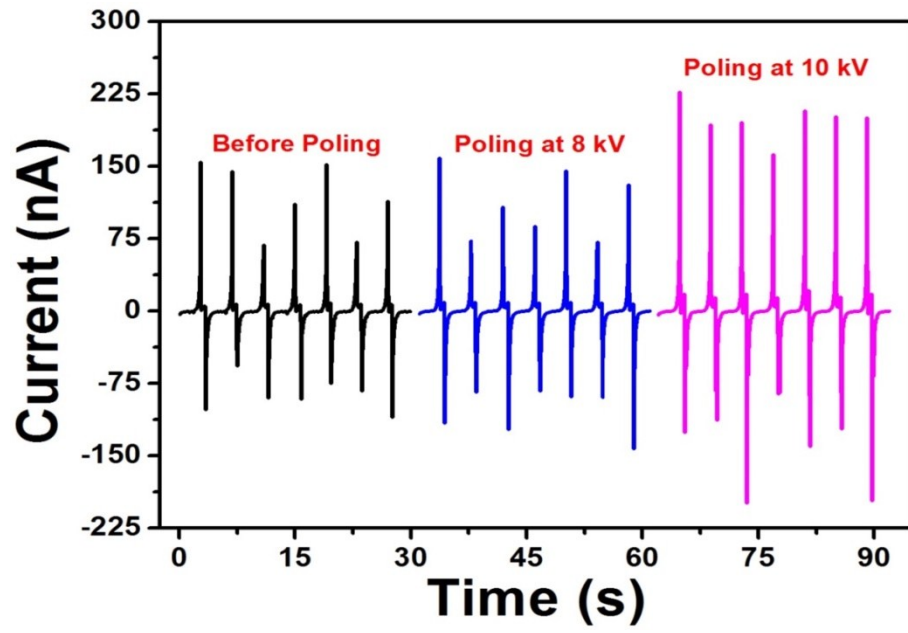


Figure S5 Poling analysis of C-PNG2 at 8 kV and 10 kV for 24 h

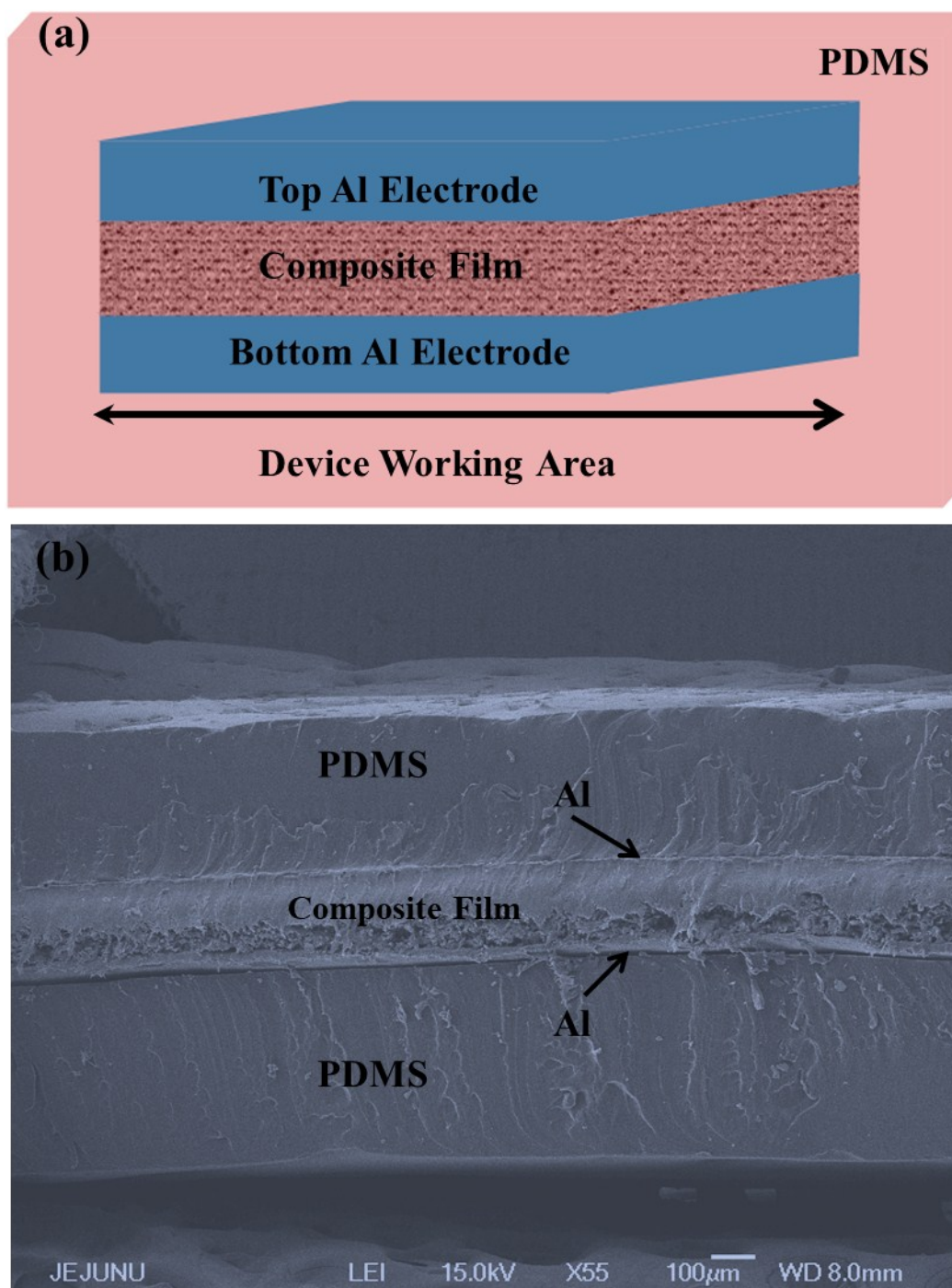


Figure S6 (a) Layer-by-layer schematic of C-PNG device packed with PDMS matrix (b) Cross-section FE-SEM analysis of C-PNG device