

Abstract Submitted  
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**The RIDGE pipeline as a method to search for gravitational waves associated with magnetar bursts** JASON LEE, Andrews University, SHANTANU DESAI, Penn State University, KAZUHIRO HAYAMA, SOUMYA MOHANTY, University of Texas, Brownsville, MALIK RAKHMANOV, Southeastern Louisiana University, TIFFANY SUMMERSCALES, Andrews University — RIDGE is a data analysis pipeline which implements a regularized, coherent approach to search for short-duration gravitational wave signals in the data from a network of gravitational wave detectors. We discuss the RIDGE pipeline and describe its potential in the search for gravitational waves associated with soft gamma repeaters (SGRs) and anomalous X-ray pulsars (AXPs). SGRs and AXPs are thought to be the result of seismic events in the crust of a magnetar (a neutron star with a strong magnetic field) which should produce short bursts of gravitational waves.

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