



Séminaire du Laboratoire de l'Accélérateur Linéaire

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Long duration bursts of GWs : new opportunities for LIGO-Virgo

There is increasing observational evidence for stellar mass black holes as common inner engines to cosmological GRBs, and those with rapid spin to long bursts with and without supernovae such as GRB060614. Here, we highlight the wave forms of anticipated emissions in GWs by Kerr BHs interacting with high-density matter. This model applies to binary mergers as well as core-collapse supernovae, such as SN1987A. A discussion on event rates and optimal detection algorithms is included. The results are relevant to the high-frequency, shot-noise dominated region of the LIGO and Virgo detectors, and suggest triggered searches in collaboration with upcoming optical-radio transient surveys of the local universe (e.g. Pan-STARRS, LOFAR).

Salle 101 du LAL - Bât. 200, Orsay

Thé et café seront servis 1/4 h avant le séminaire

