

Making sense of narrow spectral artifacts

Thursday, 13 July 2023 09:00 (1h 30m)

Narrow spectral noise artifacts can degrade the sensitivity of continuous wave searches, creating spurious outliers or casting doubt on nearby signal candidates. This tutorial will review some basics of CW detector characterization and walk participants through investigating example artifacts from O3. The tutorial is intended to give participants a better understanding of how LIGO line lists are compiled, what challenges arise in characterizing these artifacts, and what kinds of detector characterization investigations can help to strengthen or dismiss a continuous wave candidate signal.

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