

Abstract Submitted
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Detectability of the nonlinear gravitational wave memory with second and third-generation ground-based detectors¹ MARC FAVATA, Montclair State University, EMANUELE BERTI, University of Mississippi — Gravitational wave memory refers to a non-oscillating component of a gravitational wave signal. In principle, all gravitational-wave sources have a memory component. The largest sources of memory waves are the merger of two black holes. These produce the so-called nonlinear or Blanchet-Damour-Christodoulou memory. We will discuss the prospects for detecting the nonlinear memory with current and third-generation ground-based interferometers.

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Marc Favata
Montclair State University

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