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## **WITHDRAWN - Bose-Einstein Condensates as Gravitational Wave Detectors**

We investigate a Bose-Einstein condensate (BEC) as a gravitational wave detector, and study its sensitivity by optimizing the properties of the condensate and the measurement duration. We show that detecting kilohertz gravitational waves is limited by current experimental techniques in squeezing BEC phonons. Future improvements in technology to squeeze BEC states can make them competitive detectors for gravitational waves of astrophysical and/or cosmological origin.

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