



Contribution ID: 281

Type: Poster

Prospects of detection of strongly lensed gravitational waves using LGWA

The lensing of gravitational waves occurs when it passes near massive objects like galaxies and clusters that bends its path. The detection of the first lensed gravitational wave is expected within the next few years. Decihertz detectors such as Lunar Gravitational Wave Antenna (LGWA) are expected to detect gravitational waves from intermediate mass blackhole mergers and white dwarf binaries. A small fraction of these signals would be lensed, potentially enabling interesting probes of astrophysics and cosmology. We calculate the expected detection rates of strongly lensed gravitational waves by LGWA and discuss its implications.

Email

neha.sharma@icts.res.in

Affiliation

International Centre for Theoretical Sciences (ICTS)

Author: Ms SHARMA, Neha (International Centre for Theoretical Sciences (ICTS))

Co-authors: Mr JANA, Souvik (International Centre for Theoretical Sciences (ICTS)); Mr AJITH, Parameswaran (International Centre for Theoretical Sciences (ICTS))

Presenter: Ms SHARMA, Neha (International Centre for Theoretical Sciences (ICTS))

Session Classification: Gravitational Waves

Track Classification: Gravitational Waves