

## **An unbiased search for TeV emission from high-frequency peaked BL Lacs**

*Monday, 4 July 2022 17:00 (15 minutes)*

High-frequency-peaked BL Lacs (HBLs) dominate the extragalactic TeV sky, with more than 50 objects detected with the current generation of ground-based TeV gamma-ray observatories. In the last three years, the VERITAS telescope array has observed a flux-limited sample of 36 X-ray selected HBLs with the goal of producing the first unbiased census of TeV emission from HBL blazars. The VERITAS HBL sample contains known TeV sources as well as 15 objects for which TeV emission has not been reported before. The results of this VERITAS campaign include the detection of new TeV blazars as well as unbiased estimates of the TeV flux of HBLs that have previously been reported only during flaring states. The implications of our results in understanding the intrinsic properties of HBLs as a source population will be discussed.

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