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## **Search for very high energy gamma-ray emission with H.E.S.S. from the young and massive stellar cluster Westerlund 1**

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### **Abstract content**

Westerlund 1 is a unique case of a massive young cluster with at least 11 Wolf-Rayet stars driving strong stellar winds. It is possible that various configurations of these stellar winds (wind-wind interaction, superposition of stellar winds etc.) can convert a fraction of the kinetic energy of the wind into accelerated particles. Observations of spatially extended non-thermal X-ray emission from the highly reddened and nearby stellar cluster Westerlund 1 suggest that indeed stars are able to accelerate at least electrons to TeV energies which then produce X-ray synchrotron emission. We report on the results of H.E.S.S. observations of the Westerlund 1 cluster.

**If this papers is presented for a collaboration, please specify the collaboration**

### **Summary**

### **Reference**

Proceedings of the 30th International Cosmic Ray Conference; Rogelio Caballero, Juan Carlos D'Olive, Gustavo Medina-Tanco, Lukas Nellen, Federico A. Sánchez, José F. Valdés-Galicia (eds.); Universidad Nacional Autónoma de México, Mexico City, Mexico, 2008; Vol. 2 (OG part 1), pages 723-726

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