

Wide field CCD photometry of the globular cluster NGC4147

Young-Hoon Joe¹, Young-Wook Lee¹, Soo-Chang Rey¹,
Young-Jong Sohn¹, Jang-Hyun Park², Seung Jun Oh³,
Myung Gyoon Lee³, Sang-Gak Lee³ and Ho-Il Kim²

¹*Center for Space Astrophysics, Department of Astronomy, Yonsei University*

²*Korea Astronomy Observatory*

³*Astronomy Program, SEES, Seoul National University*

We present the preliminary results of the BV photometry of the Galactic globular cluster NGC4147. It was suggested that the cluster might be a former member of the Sagittarius dwarf spheroidal galaxy (Sgr dSph). If this is the case, we may find the tidal stream of the member stars along the Sagittarius stream. Observations were made on 2003 February 15, using the 3.6m Canada-France-Hawaii telescope with the 12K CCD camera. Our program field, centered on NGC 4147, covers approximately 42' X 28' wide field, which is about 4~6 times larger than the tidal radius of NGC 4147. We present Color-Magnitude diagrams, and discuss the spatial distribution of the stars surrounding the globular cluster.