We analyzed a subsample of WING SPE that includes 22 clusters with absolute spectrophotometry for a total of 1305 emission line sources. Diagnostic diagrams were used to discriminate LINERs/composites from other sources (see panel aside). The prevalence of star forming and low-ionization nuclear emitting regions (LINERs) among 800 cluster member galaxies seems insufficient to explain the lower frequency of emission line galaxies in the innermost cluster region. The approach: population synthesis and diagnostic diagrams

The WING and WING SPE Surveys

We analyzed the spectra collected under the wide-field nearby galaxy clusters survey (WINGS) to reveal emission lines on cluster galaxies. After removing stellar emission with dedicated population synthesis models we found evidence of faint emission line activity in a sizable number of cluster galaxies. Diagnostic diagrams were used to define or at least constrain the origin of the emission line activity. Cross-correlation with radio surveys is also being used for the identification of "true" active nuclei. We report preliminary results on prevalence and basic properties of the active and star forming galaxies we identified. The WING and WING SPE Surveys

Active and star-forming galactic nuclei in WINGS

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ABSTRACT

We analyzed the spectra collected under the wide-field nearby galaxy clusters survey (WINGS) to reveal emission lines in cluster galaxies. After removing stellar emission with dedicated population synthesis models we found evidence of faint emission line activity in a sizable number of cluster galaxies. Diagnostic diagrams were used to define or at least constrain the origin of the emission line activity. Cross-correlation with radio surveys is also being used for the identification of “true” active nuclei. We report preliminary results on prevalence and basic properties of the active and star forming galaxies we identified.