

Abstract Submitted
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Data Release 9 of the DESI Legacy Imaging Surveys¹ ADAM MYERS, Wyoming, DUSTIN LANG, Perimeter, ARJUN DEY, DAVID HERRERA, STEPHANIE JUNEAU, AARON MEISNER, FRANK VALDES, BENJAMIN WEAVER, NOAO, DAVID SCHLEGEL, MARTIN LANDRIAU, ZIYAO ZHANG, RONGPU ZHOU, LBNL, JOHN MOUSTAKAS, Siena, EDDIE SCHLAFLY, LLNL, CHRISTOPHE YECHE, CEA Saclay, DESI IMAGING LEGACY SURVEYS TEAM — The Dark Energy Spectroscopic Instrument (DESI) will soon begin a redshift survey of more than 30 million galaxies and quasars to constrain the Universe’s expansion history over most of cosmic time. The DESI collaboration is using a combination of optical and infrared imaging to select targets for spectroscopic follow-up. In the optical, DESI targeting relies on g , r and z -band images from the Dark Energy Camera Legacy Survey, the Mayall z -band Legacy Survey and the Beijing-Arizona Sky Survey, which are collectively known as the DESI Legacy Surveys (www.legacysurvey.org). These imaging data sets are combined with infrared imaging from the Wide-field Infrared Survey Explorer (WISE) satellite to produce an extremely rich inference-based catalog of sources in the sky. I will present an overview of Data Release 9 (DR9) of the Legacy Surveys, the final Data Release that will be considered for use in DESI target selection. Beyond DESI targeting, the Legacy Surveys have been, and will continue to be, a rich resource for scientific discovery in their own right.

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