## PROCEEDINGS OF SCIENCE

## Weak gravitational lensing

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Weak gravitational lensing by inhomogeneities along the line-of-sight alters the shapes, sizes and fluxes of distant sources such as galaxies, and distorts the pattern of continuous fields such as the microwave background radiation. In this talk I will review this relatively young scientific field, with particular emphasis on its power for studying dark energy and modified gravity. I will discuss the challenges it faces, summarize results from recent survey analyses, and finally consider the prospects for the future

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