Star Formation in Galaxies: Connecting Stars to Cosmology

Star formation remains one of the great-unsolved problems in astrophysics, and it lies on the critical path for our understanding of galaxy formation and evolution as well. Thanks to a series of infrared and ultraviolet space observatories and a new generation of groundbased radio interferometers a revolution is taking place in our understanding of star formation, on scales ranging from individual protostars to the Universe itself, and of the physical processes in the interstellar medium that trigger and regulate star formation. This talk will review recent progress in our understanding of star formation on the scales of galaxies and beyond, and the challenges that remain.