### COLLOQUIUM



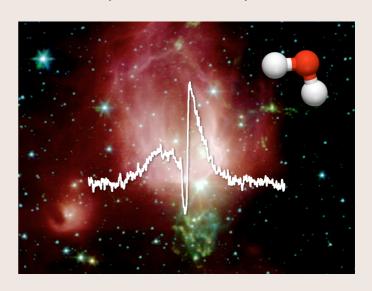
## PIERRE ET MARIE CURIE UFR DE PHYSIQUE

# Building stars, planets and the ingredients for life in space

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One of the most exciting developments in astronomy is the discovery of thousands of planets around stars other than our Sun. But how do these exo-planets form, and why are they so different from those in our own solar system? Which ingredients are available to build them? Thanks to powerful new telescopes, especially the Herschel Space Observatory and the Atacama Large Millimeter Array (ALMA), astronomers are starting to address these age-old questions scientifically. Stars and planets are born in the cold and tenuous clouds between the stars in the Milky Way, and ALMA allows us to zoom in on planetary construction zones for the first time. Water and a surprisingly rich variety of materials are found, including simple sugars. Can these pre-biotic molecules end up on new planets and form the basis for life elsewhere in the universe?



#### Mardi 26 Septembre 2017 à16h30

Amphithéâtre G. Charpak (Rez de chaussée, Patio 22-33, Salle SB02)

Ce séminaire d'intérêt général est consacré à la physique contemporaine et aux disciplines connexes. Il est destiné à un large auditoire d'étudiants, en particulier de master ou en thèse, d'enseignants et de chercheurs.

L'exposé sera précédé d'un moment de convivialité autour d'un jus de fruit, thé, ou café.

