

UNIVERSITÉ DE TECHNOLOGIE DE BELFORT-MONTBÉLIARD

The dark matter problem

CONFÉRENCE

30 mars 2017

à 14h00

UTBM Belfort - Amphi A200

Entrée libre et gratuite

Avec

Benoît FAMAIEY

Astrophysicien, Chargé de Recherche de 1^{ère} classe CNRS, HDR. Responsable de l'équipe galaxies de L'Observatoire astronomique de Strasbourg - Université de Strasbourg.

> La conférence (en anglais)

The Newton's law of universal gravitation governs exactly many objects' movements (falling stones, satellites, etc.) in the vicinity of stars such as our Earth. However, the movements of celestial objects on the scale of galaxies and beyond do not meet the expected effects based on the law of gravitation as it is conventionally conceived and on the basis of the universe's content in regular matter (essentially made of protons and neutrons). Similarly, light rays' trajectories in the universe does not conform to conventional predictions. This problem, which confronts contemporary and modern astrophysics, is known as "the dark matter problem". The solution assumes either the existence of an unidentified matter, the need to revisit the gravitational law, or some combination of these two possibilities.

Benoit FAMAIEY - astrophysicist, expert in kinematics and dynamics of galaxies - tackles this problem. During this conference, he will explain this problem and present solutions.