Jehanne Dousse (Genève) : Proving partition identities

A partition of a positive integer n is a non-increasing sequence of positive integers whose sum is n. A partition identity is a theorem stating that for all n, the number of partitions of n satisfying some conditions equals the number of partitions of n satisfying some other conditions. In this talk, we will discuss recent developments on the techniques which can be used to prove such identities. They include q-difference equations and recurrences, bijections, and representation theory.