## UCD School of Mathematics and Statistics Colloquium Seminar

**Title:** Names of finite groups

**Speaker:** Professor Tlm Dokchister (University of Bristol)

Date: Wed 13th April 2022 at 4:00PM

**Location:** Seminar Room SCN 1.25

Abstract: Classification and understanding of symmetries have fascinated mathematicians for a very long time. This is roughly the subject of modern group theory, and it goes back to at least the 18th century. I will explain what groups are and why some of them got much more attention than others. Giving names to finite groups turns out to be quite a non-trivial problem, and there is no currently accepted naming convention for them, despite their ubiquitous use in many areas of mathematics, physics, chemistry and crystallography. I will explain why this is difficult, what could be possible ways to solve this problem, and what we really mean by having a good classification of groups. This is closely related to the groupnames.org project, and I will describe it and mention some of the outstanding problems in computational group theory that it led to.