SUSY & SUGRA HT 2025 Lecturer: Dr Michèle Levi

Course Information

AreaQuantum Field Theory, Particle Physics and String TheoryDepartmentMathematical Institute University of OxfordCredit1 Unit

Prerequisites

Groups and Representations, Quantum Field Theory (QFT); Advanced QFT, General Relativity

Course material

- Weinberg, *The Quantum Theory of Fields Vol 3*, 2000 [chapters 24-27]
- Wess & Bagger, *Supersymmetry and Supergravity*, 1992 [chapters 1-10,22 apps A-C]

Further useful textbooks

- Freedman & Van Proeyen, *Supergravity*, 2012 [chapters 6,14 for SUSY]
- Peskin & Schroeder, An Introduction to Quantum Field Theory, 1995
- Weinberg, The Quantum Theory of Fields Vols 1-2, 2000

Location

Lectures take place in lecture room L5

Schedule

Hillary term Weeks 1-8: Tuesday 16:00 Wednesday 15:00

Course grading

Mini-project: released HT wk 8 Fri March 14th -- submission deadline Fri April 4th

Tutor + *Teaching Assistant*

Mr Lucas Leung Tutorials take place in class room **C2** on even **Fridays** (weeks 2,4,6,8) **12:00**-13:30 **13:30**-15:00