Lectures will be held in the Meeting Rooms (MR) of the Centre for Mathematical Sciences, Clarkson Road, unless otherwise stated.

All Part III and PhD students in the Faculty are able to self-enrol on Part III Moodle courses; they will be sent instructions on how to do so. All other members of the University wishing to access these courses are requested to complete the relevant form in the Part III Guide to Courses.

There will be a meeting on the morning of Wednesday 4 October for those intending to offer courses in Part III. Students should refer to the Notes for New Part III Students for further details.

There is a series of meetings for Part III students on Wednesdays at 4.15pm. Students are invited to refer to the Part III Handbook for more details.

For a personalised version of the timetable, which you can import into your own electronic calendar, please see http://www.timetable.cam.ac.uk.

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<th>Michaelmas 2023</th>
<th>Lent 2024</th>
<th>Easter 2024</th>
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<tr>
<td><strong>General Relativity</strong></td>
<td><strong>Field Theory in Cosmology</strong></td>
<td><strong>Applications of Quantum Field Theory</strong></td>
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<tr>
<td>Prof. C. M. Warnick</td>
<td>Prof. E. Pajer</td>
<td>Prof. S. A. Hartnoll</td>
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<td>M. W. F. 9, MR2</td>
<td>M. W. F. 9, MR4</td>
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<tr>
<td><strong>Advanced Probability</strong></td>
<td><strong>Stochastic Calculus and Applications</strong></td>
<td><strong>Gravitational Waves and Numerical Relativity</strong></td>
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<tr>
<td>Prof. P. Sousi</td>
<td>Prof. J. Miller</td>
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<td>M. W. F. 9, MR3</td>
<td>M. W. F. 9, MR5</td>
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<tr>
<td><strong>Lie Algebras and Their Representations</strong></td>
<td><strong>Algebraic Number Theory</strong></td>
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<tr>
<td>Prof. S. Martin</td>
<td>Dr H. Wiersema</td>
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<td>M. W. F. 9, MR9</td>
<td>M. W. F. 9, MR9</td>
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<tr>
<td><strong>Biological Physics and Fluid Dynamics</strong></td>
<td><strong>Spectral Computations in Infinite Dimensions</strong></td>
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<tr>
<td>Prof. R. Goldstein</td>
<td>Dr M. Colbrook</td>
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<td>M. W. F. 9, MR12</td>
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<td>Course</td>
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<td>Combinatorics §</td>
<td>Prof. B. Bollobas</td>
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<tr>
<td>Algebraic Geometry</td>
<td>Dr D. Ranganathan</td>
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<td>Quantum Information, Foundations and Gravity</td>
<td>Prof. A. P. A. Kent</td>
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<td>Slow Viscous Flow §</td>
<td>Prof. J. R. Lister</td>
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<td>Structure and Evolution of Stars</td>
<td>Prof. C. A. Tout</td>
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<tr>
<td>Quantum Field Theory</td>
<td>Dr A. Castro</td>
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<tr>
<td>Algebraic Topology</td>
<td>Prof. I. Smith</td>
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<tr>
<td>Approximation Theory</td>
<td>Dr A. Shadrin</td>
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<td>Fluid Dynamics of the Solid Earth</td>
<td>Prof. M. G. Worster</td>
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<td>Cubulating Spaces and Groups</td>
<td>Dr M. Arenas</td>
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<td>Quantum Computation</td>
<td>Dr S. Subramanian</td>
<td>W. F. 9, MR14</td>
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<tr>
<td>No lecture on 19 January. Additional lecture on 15 March.</td>
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<td>Black Holes</td>
<td>Prof. H. S. Reall</td>
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<tr>
<td>Distribution Theory and Applications</td>
<td>Dr A. C. L. Ashton</td>
<td>M. W. 10, MR5</td>
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<tr>
<td>Abelian Varieties</td>
<td>Prof. A. J. Scholl</td>
<td>M. W. F. 10, MR9</td>
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<tr>
<td>Fluid Dynamics of the Environment</td>
<td>Prof. S. Dalziel, Dr R. Bhagat</td>
<td>M. W. F. 10, MR12</td>
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<tr>
<td>Introduction to Additive Combinatorics</td>
<td>Prof. J. Wolf</td>
<td>M. W. F. 10, MR13</td>
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Model Theory and Non-Classical Logic  
Dr J. Siqueira  
M. W. F. 11, MR13

Astrophysical Fluid Dynamics  
Prof. R. Rafikov  
M. W. F. 11, MR14  
Extra lecture on 26 Oct at 2pm, MR9  
No lecture on 1 Nov

Category Theory  
Prof. P. T. Johnstone  
M. W. F. 12, MR4

Functional Data Analysis  
Prof. J. Aston  
M. W. 10, MR14

Elliptic Curves  
Prof. T. Fisher  
M. W. F. 11, MR3

Modular Forms  
Prof. J. A. Thorne  
M. W. F. 12, MR5

Functional Data Analysis  
Prof. J. Aston  
M. W. 10, MR14

Elliptic Partial Differential Equations  
Prof. N. Wickramasekera, Dr G. Taujanskas  
M. W. F. 11, MR4

Quantum Entanglement in Many-body Physics  
Prof. F. Verstraete  
M. W. 11, MR9

Modern Statistical Methods ‡  
Dr S. Bacallado  
M. W. F. 12, MR9

The Life and Death of Galaxies  
Prof. V. Belokurov  
M. W. F. 11, MR11

Fluid Dynamics of Climate  
Prof. J. R. Taylor, Dr A. Ming  
M. W. F. 12, MR12

Solitons, Instantons and Geometry  
Prof. D. M. A. Stuart  
M. W. 11, MR12

Numerical Solution of Differential Equations  
Prof. A. Iserles  
M. W. F. 12, MR13

Large Cardinals  
Prof. B. Loewe  
M. F. 11, MR13

Planetary System Dynamics  
Prof. M. Wyatt  
M. W. F. 12, MR14

Advanced Financial Models  
Prof. M. R. Tehranchi  
M. W. F. 11, MR14
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<td>Dr O. Becker</td>
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<td>Topics in Statistical Theory</td>
<td>Prof. R. Samworth</td>
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<td>Starting 10 Oct. Additional lecture on 13 Oct, 4pm in MR5</td>
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<td>Functional Analysis §</td>
<td>Dr A. Zsák</td>
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<td>Causal Inference</td>
<td>Dr Q. Zhao</td>
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<td>Differential Geometry</td>
<td>Dr A. Kovalev</td>
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<td>Cosmology</td>
<td>Prof. B. D. Sherwin</td>
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<td>Lattice Models</td>
<td>Prof. W. Werner</td>
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<td>Advanced Quantum Field Theory</td>
<td>Dr R. A. Reid-Edwards</td>
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<td>Geometric Group Theory</td>
<td>Prof. H. Wilton</td>
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<td>Statistical Learning in Practice</td>
<td>Dr R. Altmeyer</td>
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<td>Forcing and the Continuum Hypothesis</td>
<td>Dr R. Matthews</td>
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<tr>
<td>Direct and Inverse Scattering of Waves</td>
<td>Dr O. Rath Spivack</td>
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<tr>
<td>The Standard Model</td>
<td>Prof. D. Tong</td>
<td>Tu. Th. S. 9, MR3</td>
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<td>Topics in Convex Optimisation</td>
<td>Prof. H. Fawzi</td>
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<td>Hydrodynamic Stability</td>
<td>Prof. R. R. Kerswell</td>
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Information Theory
Prof. I. Kontoyiannis
Tu. Th. 11, **MR9**

Schramm-Loewner Evolutions
Dr Y. Yuan
Tu. Th. 9, **MR13**

Analysis of Partial Differential Equations
Dr Z. Wyatt
Tu. Th. S. 11, **MR13**

Toric Varieties
Dr R. Picciotto
Tu. Th. 9, **MR14**

Symmetries, Fields and Particles
Prof. M. Wingate
Tu. Th. S. 12, **MR2**

Symplectic Topology
Dr A. Ward
Tu. Th. 10, **MR4**

Ramsey Theory on Graphs
Dr J. Sahasrabudhe
Tu. Th. 12, **MR4**

Robust Statistics
Prof. P-L. Loh
Tu. Th. 10, **MR5**

Local Fields
Dr R. Zhou
Tu. Th. S. 12, **MR5**
Starting 7 Oct

Supersymmetry
Prof. B. Allanach
Tu. Th. 10, **MR9**

Statistics in Medical Practice +
Dr C. Jackson and colleagues
Tu. Th. 12, **MR11** (twelve lectures)
First lecture on 17 Oct, no lectures on 9 Nov or 28 Nov

Astrophysical Black Holes
Dr D. Sijacki
Tu. Th. 10, **MR12**

Perturbation Methods
Prof. D. Abrahams
Tu. Th. 12, **MR12**
Extra lecture on Sat 21 October, 12pm, MR12
No lecture on Th 26 October

Theoretical Physics of Soft Condensed Matter
Prof. M. E. Cates
Tu. Th. 10, **MR13**

Introduction to Computational Complexity
Prof. W. T. Gowers
Tu. Th. 11, **MR5**
Topological Quantum Matter  
Prof. B. Béri  
Tu. Th. 11,  MR9

Dynamics of Astrophysical Discs  
Prof. H. Latter  
Tu. Th. 11,  MR12

Analysis of Survival Data +  
Dr P. Treasure  
Tu. Th. 11,  MR13

Group Cohomology  
Dr C. J. B. Brookes  
Tu. Th. 11,  MR14

String Theory  
Prof D. B. Skinner  
Tu. Th. S. 12,  MR2

Concentration Inequalities  
Dr V. Jog  
Tu. Th. 12,  MR3

Stochastic Processes in Biology  
Dr M. Bruna, Dr T. Plesa  
Tu. Th. 12,  MR12

Laboratory Demonstrations in Fluid Dynamics  
Prof. S. Dalziel  
W. 2-3:30, Fluids Laboratory

+ These two courses constitute the 24-lecture course in Statistics in Medicine. For examination purposes, Statistics in Medicine is considered a Lent term course.
‡ Recordings for this course will only be made available as a reasonable adjustment for students with a recommendation for access to recordings.

§ There will be no recordings available for this course; the lecturer will make alternative accommodations for students with recommendations for reasonable adjustments that include access to recordings.