



Cambridge
Philosophical
Society



The Unknown Maxwell

Cambridge Philosophical Society One-day meeting 28 March 2025

Cambridge University Engineering Department, Trumpington St
Lectures and exhibition: Constance Tipper Lecture Theatre Refreshments: LR4

09.00	Welcome, introduction	Dr Claire Barlow
Session 1	Chair: Dr Claire Barlow	
09.15	<i>The Unknown Maxwell</i>	Professor Bruce Hunt (University of Texas)
10.00	<i>The Mechanical Origins of Maxwell's Equations</i>	Professor Malcolm Longair (Cavendish)
10.45-11.00	Introduction to Maxwell artefacts on display in Constance Tipper lecture Theatre	Professor Isobel Falconer (University of St Andrews)
11.00	<i>Tea/coffee in LR4</i>	
Session 2	Chair: Professor Isobel Falconer	
11.30	<i>Maxwell and the nature of primary colours</i>	Professor John Mollon (Psychology)
12.15	<i>From Maxwell's fields to quantised light</i>	Professor Peter Knight (Imperial College)
13.00-14.00	<i>Lunch (own arrangements) Canteen on 2nd floor is open for sandwiches, tea/coffee and cakes</i>	
Session 3	Chair: Professor Gordon Ogilvie	
14.00	<i>Maxwell and the Geometry of Structural Equilibrium</i>	Professor Bill Baker (Cambridge University Honorary Professor of Structural Engineering), Professor Allan McRobie (Engineering)
14.45	<i>150 years of cybernetics: from Maxwell's governor to neuromorphic machines</i>	Professor Rodolphe Sepulchre (Engineering)
15.30	<i>Tea/coffee in LR4</i>	
Session 4	Chair: Professor Rodolphe Sepulchre	
16.00	<i>Saturn's rings, gravitational instability and the formation of planets</i>	Professor Gordon Ogilvie (DAMTP)
16.45	<i>Thermodynamics and Maxwell's Demon Demystified</i>	Professor John Ellis (Cavendish)
17.30	Closing remarks	Dr Claire Barlow