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| <b>Monday</b> |  |   |   |
| 08.00 - 08.50 | Registration   |   |   |
|               | <b>Charter One</b>   |   |   |
| 08.50-09.00   | Welcome & Introduction - Richard Greenwood   |   |   |
| 09.00 - 09.50 | <b>Plenary 1 - Debora Berti   University of Florence</b><br>Multifunctional Architectures based on Lipid Assemblies and Magnetic Nanoparticles   |   |   |
| 09.50 -10.10  | Exhibitor short presentation Anton Paar, Malvern   |   |   |
|               | <b>Charter One</b>   | <b>Charter Two</b>  | <b>Charter Three</b>  |
| 10.10 - 10.30 | Tea/Coffee break   |   |   |
| 10.30 - 11.00 | <b>Nanoparticles (2)</b><br><b>K3 - Marianne Ashford   AstraZeneca</b><br>Nanoparticles as Nanomedicines   | <b>Characterisation of Formulated Products (7)</b><br><b>K1 - Malcolm Faers   Bayer CropScience</b><br>Understanding the fascinating complexity governing the performance of crop protection flowable formulations – from coffee rings to collapse of arrested gels | <b>Foams/Bubbles/Emulsions &amp; Microemulsions (3)</b><br><b>K5 - Karen Edler   University of Bath</b><br>Surfactant Self-Assembly in Deep Eutectic Solvents                 |
|               | <b>Nguyen T.K. Thanh (6)   UCL</b> Plasmonic and magnetic Nanoparticles for biomedical applications  | <b>Laura Elliott (18)   University of Leeds</b><br>Monovalent salt effects on enhanced solvent relaxation and particle surface area determination via. spin-lattice NMR relaxometry   | <b>Katherine Rumble (154)   Uni of Edinburgh</b> Bijels Formed by Direct Mixing   |
| 11.00 -11.20  |  |   |   |
| 11.20- 11.40  | <b>Davide Giust   Uni of Southampton</b> Smart Nanoparticles for mRNAs detection   | <b>David Growney (57)   Lubrizol</b><br>Developing a fundamental understanding of how wax control agents inhibit wax crystal growth via neutron and x-ray scattering  | <b>Zengyi Wei (92)   Uni of New South Wales</b> A model oil/water interface to study the structure of adsorbed molecules  |
| 11.40 -12.00  | <b>Invited* Bien Tan (161)   Huazhong Uni</b><br>Synthesis of water-soluble and highly fluorescent gold nanoclusters for Fe3+ sensing in living cells using fluorescence imaging   | <b>Joanna Starkie (40)   Uni of Cambridge</b> Mechanism of wax anti-settling additives and their role within wax crystallisation  | <b>Marion Rouillet (98)   Unilever</b><br>Droplets in emulsion gels: from fillers to networks   |
| 12.00-12.30   | <b>James J Hobson (155)   Uni of Liverpool</b> A Proof-of-Concept for Long Acting Release of Water-Soluble Compounds Formulated as Solid Drug Nanoparticles Dispersed in Injectable Oils                                   | <b>Thomas Machin (185)   Uni of Birmingham</b> The In-line Rheology of Colloids   | <b>Alex Hargreaves (121)   Uni of Durham</b> 3D imaging of microemulsion microdroplets deformed by multiple optical traps   |
| 12.30 -13.30  | Lunch  |   |   |
| 13.30 -13.50  | <b>Invited* Olivier Sandre (84)   Uni of Bordeaux</b><br>Tuning sizes, morphologies, and magnetic properties of mono- vs. multi-core iron oxide nanoparticles through controlled addition of water in the polyol synthesis | <b>Mark Isbell (60)   ICL</b> The importance of the amorphous material interface in the measurement of thermodynamic parameters, using Inverse Gas Chromatography   | <b>Papoole Valadbaigi (25)   Uni of Leeds</b> Generation of ultra-stable microbubbles for industrial applications   |
| 13.50 -14.10  | <b>Jun Chen (5)   Fudan Uni</b><br>Recycle Synthesis of Near Infrared Type II whey protein-capped Lead Sulfide Quantum Dots For Bioimaging Application   | <b>Tianyi Bai (69)   Uni of Melbourne</b> Using AFM to characterize of the structure of polymer-surfactant complexes adsorbed on surfaces relevant to product formulation   | <b>Simon Cox (97)   Aberystwyth Uni</b> Mind the gap: the behaviour of small bubbles between closely-spaced plates  |
| 14.10 -14.30  | <b>Invited* Sylvie Begin   CNRS</b><br>Design of magnetic nano-objects suitable for in vivo injection combining MRI, magnetic hyperthermia and/or drug delivery  | <b>Mariam Hussain (127)   Uni of Leeds</b> The Phase behaviour of Linear alkylbenzene sulphonate/Polycarboxylate polymer systems  | <b>Qian Sun (19)   Uni of Cambridge</b><br>Aqueous core colloidosomes with a metal shell  |
| 14.30-14.50   | <b>Ahmed Al-Kattan (163)   Aix Marseille Université</b><br>Elaboration and characterization of silicon nanoparticles by ultra-pulsed laser process for biomedical applications   | <b>Andrew Gray (145)   Uni of Birmingham</b><br>The influence of structural and physico-chemical characteristics of perfume capsules on their burst properties  | <b>Ana Maria Bago Rodriguez (74)   Uni of Hull</b><br>Emulsions stabilised by polyelectrolyte complexes (PEC)   |
| 14.50 -15.10  | Tea/Coffee break   |   |   |
| 15.10- 15.40  | <b>K4 - Shinya Maenosono (89)   JAIST</b> Imaging and isolation of autophagosomes using magnetic-plasmonic hybrid nanobeads  | <b>K2 - Zhenyu Zhang (38)   Uni of Birmingham</b><br>Nanotribology for Formulation Development  | <b>K6 - Rico Tabor   Monash Uni</b> Emulsions stabilised by graphenes: Pickering, the next generation?  |
| 15.40 - 16.00 | <b>Stefanos Mourdikoudis (129)   UCL</b> Fe-based nanoparticles synthesized by 'batch' chemical routes – Modified synthetic approaches, novel routes and perspectives  | <b>Timothy Hunter (177)   Uni of Leeds</b> Use of acoustic backscatter systems to characterise concentrated dispersions   | <b>Shirin Alexander (14)   Swansea Uni</b><br>Branched Hydrocarbon Low Surface Energy Materials (LSEMs) for Superhydrophobic Nanoparticle Derived Surfaces                    |
| 16.00-16.20   | <b>Thomas Fallows (68)   Uni of Manchester</b><br>High-Throughput Synthesis of Saccharide-Terminated Catechols for the Biofunctionalization of Nanoparticles   | <b>Leesa Patel (59)   Uni of Greenwich</b> Molecular interactions studied by electrophoretic NMR  | <b>Mandar Badve (83)   Uni of Birmingham</b> Flow Dynamics and rheology of foam in narrow complex channels  |
| 16.20 -16.40  | <b>Alec LaGrow (103)   UCL</b><br>Continuous Flow Synthesis of Iron Oxide Nanoparticles  | <b>Amin Sadeghpour (141)   Empa</b><br>Curved Lipid Mesophases and Their Interactions with Flavonoids: A Small Angle X-ray Scattering (SAXS) Study  | <b>Denny Vitasari (99)   Aberystwyth Uni</b><br>Flow of wet foams in constricted narrow channels  |
| 16.40 -17.00  | <b>Invited* L Lanry Yung (136)   National Uni of Singapore</b><br>Gold nanoplate-based three-dimensional hierarchical microparticles: A single particle with high surface-enhanced Raman scattering enhancement            | <b>Amy Voong (131)   Uni of Birmingham</b><br>Characterisation of batter coatings for food systems  | <b>Khaled Althubaiti (67)   Uni of Hull</b><br>Macroporous polymers prepared at room temperature via redox-initiated polymerisation of high internal phase emulsion templates |
| 17.00 - 17.20 | <b>Joshua Gisin (62)   Albert-Ludwigs-Uni</b><br>Polystyrene microgel colloids – a versatile model system for (soft) condensed matter physics  | <b>Maxwell Dawes (101)   Uni of Birmingham</b> A zeta potential and rheology study using electroacoustic spectroscopy on aqueous boron carbide suspensions for use in slip casting and spray drying   | <b>Hang Jin (75)   China Uni of Petroleum</b> Effect of Self-Assembly of Triblock Copolymers-F68 on Interaction Forces between Oil Drops in Electrolyte Solution              |
| 17.20 -18.00  | Flash posters ( 12 per session x 3 mins ) C. Gehardt Uk, Lauda Scientific, Kruss, Derry (12), Dipaolo (115), Terescenco (174), Russell (50), Muntz (167)   |   |   |
| 18.00 -19.30  | Poster session with wine and nibbles   |   |   |

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| Tuesday       |   |   |  |   |
| 08.00 - 08.50 | Registration  |   |  |   |
| Charter One   |   |   |  |   |
| 08:50-09:00   | Welcome & Introduction  |   |  |   |
| 09.00 -09.50  | Plenary 2 - Vinothan N. Manoharan   Harvard University<br>Understanding and harnessing entropy in colloids  |   |  |   |
| 9.50 -10.10   | Exhibitor talk - nanoScale Biomagnetics, TBC  |   |  |   |
|               |   |   |  |   |
| 10.10- 10.40  | Tea/coffee break  |   |  |   |
|               | Charter One   | Charter Two   | Charter Three  | Charter Four  |
|               | Nanoparticles (2)   | Programmable Self-Assembly (5)  | Foams/Bubbles/Emulsions & Microemulsions (3)   | Colloidal Physics (8)   |
| 10.40 -11.10  | K13 - Mathias Brust   Uni of Liverpool Gold Nanoparticles enable Charge Transfer across Phospholipid Bilayer Membranes  | K7 - Gi-Ra Yi   Sungkyunkwan Uni Colloidal Superstructure of DNA-Coated Polymer Particles and Clusters  | K11 - Robert Pugh   Nottingham Trent Uni Bubbles, Foaming and Beer   | K9 - Wilson Poon   Uni of Edinburgh Friction and shear thickening: A new paradigm for suspension rheology   |
| 11.10 - 11.30 | Invited* Yuanzhe Piao   South Korea Title TBC   | Etienne Duguet (49)   Uni of Bordeaux Synthesis and assembly of patchy particles: towards new 'colloidal molecules'   | Dmytro Dedovets (11)   CNRS Confocal microscopy of the interactions of objects with a solidification interface                               | Stuart Prescottt (93)   Uni of New South Wales Switching the interpenetration and controlling the structures of polymer brushes                   |
| 11.30 -11.50  | Tapas Sen (132)   Uni of Central Lancashire Recent development of surface engineering of magnetic nanoparticles in suspension for applications in biosensors for Food and Water Technology          | Mark Miller (110)   Uni of Durham Optimising interactions and controlling competition in programmable self-assembly   | Francois Sicard (143)   UCL Shrinking Armored Droplets to Advance New Materials for Applications   | Paul Bartlett (138)   Uni of Bristol Direct Measurement of Sub-Debye-Length Forces between Charged Colloids                                       |
| 11.50 -12.10  | Invited* Cuong Coa (142)   Queen's Uni Belfast The Controlled Aggregation and Switchable Peroxidase-like Activity of Plasmonic Gold Nanoparticles for Clinical Diagnostics and Food Safety Analysis | Vera Meester (108)   Leiden Uni Colloidal recycling: reconfiguration of random aggregates into patchy particles   | Alberto Striolo (8)   UCL Multi-Scale Simulations Relevant for Emulsions   | David French (153)   Uni of Edinburgh Creating Bridges between Droplets using Colloidal Rods  |
| 12.10-12.30   | TBC   | Stefano Sacanna   New York Uni Patchy Particles via Cluster Fusion  | TBC  | Álvaro Gonzalez Garcia (147)   Eindhoven Uni of Technology Phase behaviour of Hard-Core Yukawa spheres mixed with polymers                        |
|               |   |   |  |   |
| 12.30 -13.30  | Lunch   |   |  |   |
|               |   |   |  |   |
| 13.30 -14.00  | K14 - Richard Tilley (42)   Uni of New South Wales Solution Synthesis and electron microscopy characterization of metal nanoparticles for catalysts and biomedicine                                 | K8 - Qian Chen   University of Illinois at Urbana-Champaign Surprises in Self-assembly Dynamics at the Nanoscale  | K12 - Kristian Waters   McGill Uni The value of bubbles - floating metals and minerals   | Colloidal Suspensions (4)<br>K10 - Walter Richtering   Aachen University Title TBC  |
| 14.00-14.20   | Lilin Wang (117)   UCL Synergetic effect of multi-drug loaded magnetic liposome in Chemo-Therotherapy   | Daniel Morpew (55)   Uni of Birmingham Hierarchical Self-assembly of Colloidal Magnetic Particles into Reconfigurable Shells  | Invited* Valérie Ravaine (120)   Uni of Bordeaux Mapping the 2D organization of microgels at liquid interfaces: model surfaces and emulsions | Samuel Hare (109)   Uni of Bristol Gels, Can They Handle the Heat? - The Temperature Dependence of Colloid-Polymer Gel Collapse                   |
| 14.20 -14.40  | Alison Savage (150)  Uni of Liverpool Long acting Injectable Formulations of Atovaquone for Malaria Prophylaxis   | John McBride   Uni of Manchester (13) Phase behaviour and gravity-directed self-assembly of spherical caps  | Invited* Valérie Ravaine (120)   Uni of Bordeaux - continued   | Joshua Willott (102)   Uni of Twente Specific Ion Response of Polyelectrolyte Brushes Depends on Polymer and Anion Hydrophilicity                 |
| 14.40 -15.00  | TBC   | Szilard Fejer (46)   Provitam Foundation Computational design of hierarchically self-assembling anisotropic colloidal building blocks                               | Katy Dickinson (41)  Uni of Edinburgh Soft meets hard - a microscopic view of the freeze-thaw stability of Pickering emulsions               | Lee Fielding (36)   Uni of Manchester Determining the Effective Density and Stabilizer Layer Thickness of Sterically Stabilized Nanoparticles     |
| 15.00-15:20   | TBC   | Roberta Lanfranco (178)   Uni libre de Bruxelles Optical methods to study the selective targeting of Large Uni-lamellar Vesicles with gold nano-particles using DNA | TBC  | Remco Tuinier (139)   Eindhoven Uni of Technology Depletion interaction in colloidal dispersions: controlled attractions?                         |
|               |   |   |  |   |
| 15.20-15.40   | Tea/Coffee break  |   |  |   |
| 15.40 -16.00  | Invited* Swadeshmukul Santra (135)   Uni of Central Florida Copper and Zinc based Bactericides/Fungicides for Crop Protection   | Samia Ouhajji (21)   Utrecht Uni Chiral Colloids from Isotropic Spheres   | Andrea Celani (24)   Johnson Matthey Hydrophobic Amino Acids as Amphiphiles in the Formulation of Ceramic Foams                              | Nicholas Penfold (26)   Uni of Sheffield Cross-Linked Cationic Diblock Copolymer Worms are Superflocculants for Micrometer-sized Silica Particles |
| 16.00 -16.20  | Pingun Li   UCL Polymerized complex method for preparation of metallic and semiconductor Nanoparticles  | Ross Jagers (107)   Uni of Warwick Independent responsive behaviour and communication in hydrogel objects   | Zhaoliang Zheng (71)   Uni of Liverpool Nanocarbon Materials Improve the Performance of Application of Phase Change Materials                | Franceska Waggett (72)   Uni of Bristol Electrolyte-induced Attraction of Sterically Stabilised PMMA Particles in a Low Dielectric Solvent        |
| 16.20 -16.40  | Sharif Najafishirtari (43)   Istituto Italiano di Tecnologia Application of colloidal dumbbell-like nanocrystals for fundamental studies in heterogeneous catalysis                                 | Zorana Zeravcic (28)   ESPCI Spontaneous emergence of catalytic cycles with colloidal spheres   | Andrea Lotierzo (106)   Uni of Warwick Pickering Emulsion Polymerization: a versatile tool for hybrid particle synthesis                     | Peicheng Xu (152)   Uni of Cambridge Liquid Crystalline Behaviour of Bio-Inspired Polymer-Clay Nano-Composites                                    |
| 16.40 - 17.00 | Jack Saunders (51)   Uni of Manchester Preparation of Functional Nanocomposites for Corrosion Protection  | Giorgio Volpe (87)   UCL Controlling the collective dynamics of active colloidal crowds   | Ryo Murakami (111)   Konan Uni Liquid beads: one-pot preparation of an abundant amount of armoured liquid drops                              | Ben Ern   (61)   Utrecht Uni A Charge Sensor for Colloids, Proteins, and Polyelectrolytes   |
| 17.00 - 17.20 | Manuel Pedro Simplicio Grasin (169)   Uni of Cardiff Synthesis of Shape and Size Controlled Nanoparticles using Non-Conventional Approaches   | Martin Buzza (140)   Uni of Hull Using magnetic cylindrical particles at liquid interfaces to create switchable colloidal monolayers                                | Ravinder Multani   McGill University Amyl Xanthate Adsorption Studies onto Pyrrhotite (Fe(1-x)S) Polymorphs in Neutral to Alkaline pH        | Amin Pourmohammadbagher (125)   Uni of Alberta Displacement of Water from Clays by Hydrocarbons   |
|               |   |   |  |   |
| 17.20-18.45   | Change for dinner   |   |  |   |
| 18.45 -19.15  | Transport departs   |   |  |   |
|               |   |   |  |   |
| 19.30- 22.00  | Dinner at 20:00 Drinks 19.30  |   |  |   |

Wednesday

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|---------------|---|--|--|
| 08.00 - 08.50 | Registration  |  |  |
| Charter One   |   |  |  |
| 08:50-09:00   | Welcome & Introduction  |  |  |
|               |   |  |  |
| 9.00 - 9.50   | Plenary 3 - Paul Mulvaney   University of Melbourne<br>Large Scale Nanocrystal Arrays   |  |  |
|               |   |  |  |
| 10.00 - 10.30 | Charter One   | Charter Two  | Charter Three  |
|               | Wetting (1)   | Formulation Science & Engineering 9  | Biocolloids & Biointerfaces (6)  |
| 10.00 - 10.30 | K15 - Robert Style   ETH Zürich      The mechanics of soft composites   | K16 - Martin Murray   AkzoNobel<br>Commercially important aspects of drying dynamics in decorative coatings                                  | K17 - Gleb Sukhorukov   Queen Mary University of London<br>Multifunctional Micro- and Nanoencapsulation technology with Remote Controlled Delivery and Release of various cargos                 |
|               |   |  |  |
| 10.30 - 10.50 | Eftychios Hadjittofis (53)   ICL      The importance of spreading pressure on adsorption based surface energy measurements; the case of IGC | Emily Summerton (4)   Uni of Birmingham      Low temperature stability of surfactant systems   | David Fairhurst (34)   Colloids Consultants<br>Physico-chemical Investigation of Cellulose Nanocrystal (CNC) materials using NMR relaxation  |
|               |   |  |  |
| 10.50 - 11.10 | Tea/Coffee break  |  |  |
| 11.10 - 11.30 | Manish Tiwari (134)   UCL      Simple spray coated nanocomposite superhydrophobic coatings using environmentally benign chemicals           | Alberto Bui (17)   UCL      Structure-Function Relation in Anti-Agglomerants   | Olivia Pabois (66)   Kings College London<br>Understanding the interfacial behaviour of bile salts to better engineer lipid emulsions  |
| 11.30 - 11.50 | Tommy Horozov (77)   Uni of Hull      Wetting and bio-fouling of porous coatings impregnated with oil                                       | Olivier Cayre (170)   Uni of Leeds      Developing impermeable microcapsules and remote delivery of small actives                            | Christopher Blanford (95)   Uni of Manchester<br>Optimizing mass-specific enzyme activity by combining electrochemical quartz crystal microbalance and dual polarization interferometry analyses |
| 11.50 - 12.10 | Shad Siddiqui (90)   InnoTech Alberta      Highly non-Wetting, Low Energy Surfaces for High-Temperature Oil-Water Applications              | Niall Thomson (52)   Syngenta      Improving agrochemical activity through surfactant science  | Toshiyuki Nomura (158)   Osaka Prefecture Uni<br>Preparation of PLGA microcapsules for biological applications   |
| 12.10 - 12.30 | Maryam Derkani (118)   Uni of Strathclyde<br>Understanding the colloidal interactions at oil/rock interfaces                                | Yogeshe Harshe (130)   Nestle      Impact of microstructure on the oil migration in two-layered confectionery products                       | Alessandro Gulotta (126)   Uni of Leeds<br>Solvency Effects on Biopolymer Interactions in Pectin Gels  |
| 12.30 - 12.50 | Suparit Tangparitkul (172)   Uni of Leeds<br>Insights into Thermal EOR: the dewetting dynamics of heavy oil                                 | Thomas Luxbacher (48)   Anton Paar      Assessing the adsorption rate of conditioner and softener formulations by the surface zeta potential | Myriam Grundy (37)   Institute of Food Research<br>Impact of oat constituents on the lipolysis process   |
|               |   |  |  |
| 12.50 - 14.00 | Lunch   |  |  |
| Charter One   |   |  |  |
| 14.00 - 14.50 | Graham Medal Lecture - Joseph Keddie   Uni of Surrey<br>Stratification in Films of Binary Colloidal Mixtures                                |  |  |
|               |   |  |  |
| 14.50 - 15.10 | Charter One   | Charter Two  |  |
|               | Colloidal Suspensions (4)   | Colloidal Physics (8)  |  |
| 14.50 - 15.10 | Mostafa Barigou (81)   Uni of Birmingham<br>Microfluidic generation of bulk nanobubbles and their colloidal stability                       | Alessandro Patti (88)   Uni of Manchester<br>Phase behaviour of hard colloidal board-like particles  |  |
|               |   |  |  |
| 15.10 - 15.30 | Dmitry Shchukin (54)   Uni of Liverpool<br>Nanoencapsulation of crystallohydrates for energy storage  | Jun Dong (156)   Uni of Bristol      Local Structural Characterisation in Emulsion Gels  |  |
| 15.30-15.50   | Daniele Vigolo (175)   Uni of Birmingham<br>Continuous Isotropic-Nematic Transition in Amyloid Fibril Suspensions Driven by Thermophoresis  | Alican Gençer (157)   KU Leuven      Control of the deposition and the optical properties of cellulose nanocrystal films                     |  |
| 15.50 - 16.00 | Closing and poster prizes   |  |  |
| 16.00 -       | Tea and Finish  |  |  |