ECFP

Informulation:

Design Principles for Future Formulations

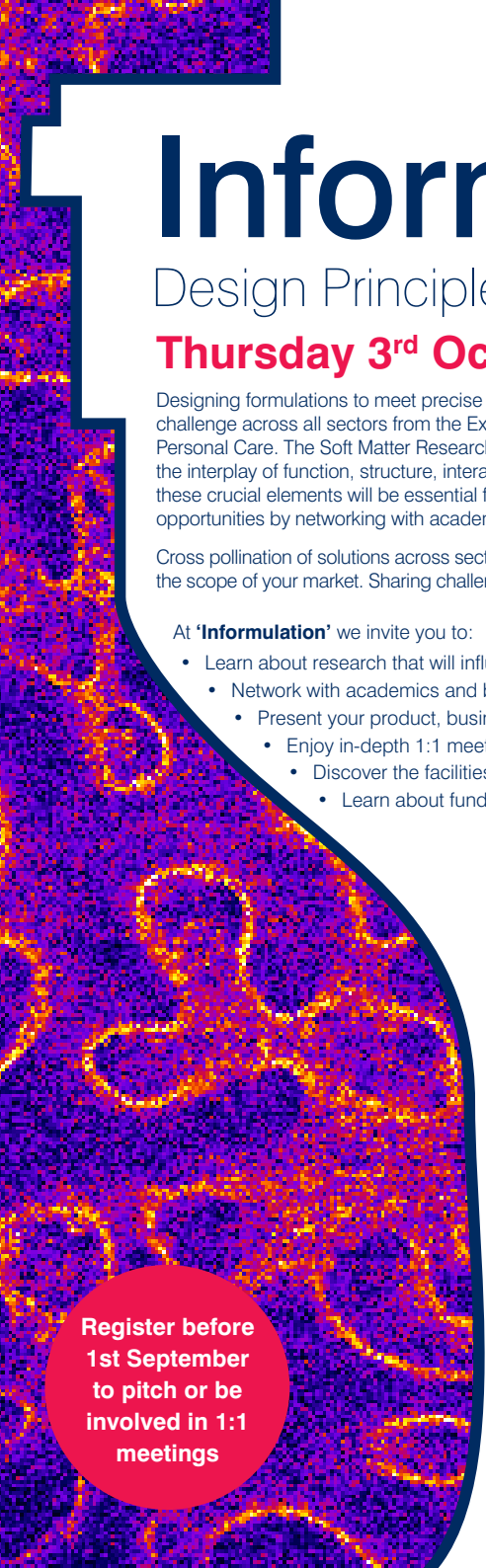
Thursday 3rd October 2013

Designing formulations to meet precise and demanding targets for performance or stability can be a challenge across all sectors from the Extractive Industries and Agrochemicals to Food and Drink and Personal Care. The Soft Matter Research Group at the University of Edinburgh specialises in understanding the interplay of function, structure, interactions and dynamics in multicomponent mixtures. Knowledge of these crucial elements will be essential for **informed design of future formulations**. You will discover new opportunities by networking with academics and other industrial participants.

Cross pollination of solutions across sectors will enable your business to flourish. Collaboration will increase the scope of your market. Sharing challenges will influence future directions for academic research.

At **'Informulation'** we invite you to:

- Learn about research that will influence the design of future formulations
- Network with academics and businesses across all sectors
- Present your product, business idea, technical challenges or research interests
- Enjoy in-depth 1:1 meetings with academics or potential business partners.
- Discover the facilities and expertise available at the University of Edinburgh
- Learn about funding opportunities for collaborative work



Register before 1st September to pitch or be involved in 1:1 meetings

Preliminary schedule:

09.30 Registration and coffee.
10.10 Welcome
10.15 Dr. Paul Clegg (ECFP): 'Design Principles for Future Formulations'
10.30 Prof. Wilson Poon (UoE): 'Dynamic Formulations – Seeing is Believing'
11.00 Prof. Alex Lips (previously Unilever): 'Industrial design challenges for complex fluids with compromise of functional and sensory performance and product robustness'
11.30 Refreshments
12.00 Short pitches (5 minutes) on products, ideas, challenges or research interests
13.00 Lunch
13.05 – 13.50 AGM of the Society of Chemical Industries (SCI) Scotland Group (new members welcome)
14.00 1:1 meetings run by appointment from 14.00 to 15.30
15.30 Tea/coffee and cake
16.00 Facility tour
17.00 Close

Hosted by:

The Edinburgh Complex Fluids Partnership
CSEC, James Clerk Maxwell Building, King's Building Campus, University of Edinburgh, EH9 3JZ.

To register for this FREE event go to www.ph.ed.ac.uk/informulation

Alternatively, contact:
Dr Tiffany Wood, Edinburgh Complex Fluids Partnership.
Email: tiffany.wood@ed.ac.uk, Tel: 0131 651 7687

ECFP

Informulation:

Design Principles for Future Formulations

The **Edinburgh Complex Fluids Partnership** provides companies with access to the world-leading expertise of researchers within the **Soft Matter Research Group** to help solve formulation challenges in partnership with industry. Funded by a £5M Programme Grant from the EPSRC to support **'Design Principles for New Soft Materials'** our areas of current academic research include

- The behaviour of multicomponent materials under shear
- incorporating live biological components into gels and emulsions
- creating new materials by active self-assembly
- multiphase soft composites for energy applications
- designing particle-stabilized emulsions and 3D structures
- controlling aging and stability through microstructure
- protein aggregation at interfaces and with colloids

Companies of all sizes work with ECFP (and their collaborators from engineering, chemistry and biology) through consultancy projects and research contracts through various public and private funding mechanisms. The range of projects are diverse; to name just a few examples, ECFP has investigated how to prevent biscuits from crumbling, has studied the influence of formulation on sperm motility in a personal lubricant, and has studied the mechanisms for gel collapse in a pesticide.

To find our more about our work with industry please visit

www.edinburghcomplexfluids.com

Facilities:

By working with ECFP you can take advantage of the cutting-edge facilities held at the University of Edinburgh. Within the UK, two facilities are unique to ECFP. 'Rheoimaging' allows multicomponent fluids to be imaged whilst their rheological properties are measured simultaneously with a rheometer. Differential Dynamic Microscopy (DDM) can be used to measure the motility of swimming species and to measure the diffusive motion of dispersions that are challenging to measure through other techniques (e.g. opaque samples or anisotropic colloids).

ECFP also has extensive facilities for characterising particle or droplet size, charge, product stability, micro-structure, rheology, molecular structure and organisation, interfacial properties and optical properties such as absorption, fluorescence and refractive index. We have an in-house chemist making standard and novel colloids, a microbiologist curating a growing collection of microorganisms and optomechanical expertise for developing and prototyping new instruments. The neighbouring Edinburgh Parallel Computing Centre (EPCC) provides services in high performance computing and data handling.