Aqua Enviro

EUROPEAN BIOSOLIDS AND ORGANIC RESOURCES CONFERENCE, EXHIBITION & SITE VISITS

13-14th November 2018, The Royal Armouries, Leeds

Invitation to Register

**Tuesday 13th November**
- Advances in Anaerobic Digestion
- Circular Economy
- Modelling & Software Developments
- Biogas & Energy Management

**Wednesday 14th November**
- Pre/Post Treatment & Thickening/Dewatering
- Landbank Security
- Workshop: Making the Bioeconomy Work (in collaboration with the NNFCC)

**Thursday 15th November**
- Site Visits:
  - Anglian Water’s Pyewipe Water Recycling Centre (Grimsby)
  - AB Agri’s food waste AD facility (South Milford)

Media Partners:

Supporting Organisations:

www.european-biosolids.com
EUROPE’S LEADING CONFERENCE
FOR THE BIOSOLIDS AND ORGANIC RESOURCES INDUSTRIES

WHY ATTEND?
• Get insights from industry experts with 50+ technical presentations delivered over 2 days
• Network with over 250 attendees from around the world
• Take part in two site visits to see Anglian Water’s HPH process and AB Agri’s AD gas-to-grid plant

EXHIBITION
Exhibition spaces are 3m by 2m and cost just £995 +VAT for 2 days (this includes 1 person to man the stand). Exhibitors receive a 20% reduction for any delegates wishing to attend the conference.
• 250-300 delegates attending over 2 days
• Meet representatives from the UK water companies, consultancies, technical associations, universities, research establishments, process suppliers, Government departments and agencies
• All delegate refreshments served in the exhibition area allowing plenty of time to network informally

TESTIMONIALS

The possibility to meet the key technical people involved in the different aspects of the sludge treatment, outside the conventional business environment, is invaluable. I believe the Biosolids conference is the best technical event in Europe related to Sludge.
Technical Director, Veolia Water Technologies

Having been in this industry for over 30 years and attended many global events, the Aqua Enviro Biosolids conference remains the most relevant in its field. Using this platform to validate our technology enabled a step change in our business.
Technical and Sales Director Orege UK Ltd

One of the best conferences I have attended, very inspiring and well balanced
Environmental Regulation Manager, Welsh Water

SPONSORSHIP
The European Biosolids and Organic Resources Conference offers a unique opportunity to raise the profile of your organisation across a number of sectors.
Sponsors of the conference feature prominently before, during and after the conference – wherever we can make this happen!
The packages we have put together are just a guide to what is on offer and we welcome your input to tailor the sponsorship to meet your specific aims, be it brand awareness or launching a new product.
For more details on sponsorship and exhibiting, please visit www.european-biosolids.com. If you would like to discuss a tailored package or just require further information, please don’t hesitate to get in touch with Frances:
e. frances.woodhead@aquaenviro.co.uk
t. +44 (0)1924 257891

CURRENT EXHIBITORS

The European Biosolids and Organic Resources Conference returns to The Royal Armouries in Leeds on 13-14th November, with a jam-packed programme showcasing the latest innovations, best practice, cutting-edge technology and research in the waste water and resource management sectors.
PLENARY

Understanding and manipulating microbial communities in AD
Chong, J., Royal Society Industry Fellow & Senior Lecturer in Microbiology, University of York, UK

ADVANCES IN ANAEROBIC DIGESTION

- SAS only thermal hydrolysis with series digestion
  - project results confirm lab predictions
  Shana, A.1, Fountain, P., Christie, I.1, Panter, K.,1
  1Thames Water, UK, 2ibcor Ltd, UK

- Biodegradability of filtrate from thermally hydrolysed waste activated sludge
  Touliat, V.1,2, Barjenbruch, M.1, Unger, T.1, Lodere, C.3, Remy, C.2,1
  1Technical University of Berlin, Germany, 2Berlin Centre of Competence for Water, Germany

- **FOG and Food Waste Receiving and Processing**
  - Considerations Before Digestion
  Williams, T.O., Jacobs, USA

- **hpH advanced anaerobic digestion** – a review of five years operation and lessons learnt
  Riches, S. and Brookes, A., Anglian Water Services Ltd, UK

- **Comparing the performance of thermophilic and mesophilic anaerobic digestion of pasteurised sewage sludge**
  Hill, S., Shana, A., Perez, E.R., Fountain, P., Thames Water, UK

PANEL DISCUSSION

How close are we to tailoring microbial communities in AD?

CIRCULAR ECONOMY

- **Bioresources digestion**
  Williams, T.O. and Jeyanayagam, S., Jacobs, USA

- **The organic waste gold rush: optimising resource recovery in the UK bioeconomy**
  Marshall, R. University of Lancaster, UK

- **RE-DIRECT - Regional development and integration of unused biomass wastes as resources for circular products and economic transformation**
  Wilcox Brooke, A., Severn Wye Energy Agency, UK

- **Economic optimization of integrated nutrient and energy recovery treatment trains using a new model library**
  Vaneecockhaete, C.1, Bela, E.2, Vanrolleghem, P.A.3, 1Bioengineering, Université Laval, Canada, 2Primodal Inc., Canada, 3modelEAU, Université Laval, Canada

MOELLING & SOFTWARE DEVELOPMENTS

- **A whole-community biosolids management based on advanced digestion**
  Liu, Z., Wu, X., Kleiven, M.1 and Deng, D.1, Cambi Group AS, Norway, 2China National Environmental Protection Group, China

- **Critical assessment and optimisation of sewage sludge mesophilic anaerobic digestion processes at operational wastewater treatment plant**
  Liu, J. and Smith, S.R., Imperial College London, UK

- **Aquasuite® MINE – the advanced and optimal control of sludge treatment**
  Koornneef, E., van Eijden, R. and Visser, A., Royal HaskoningDHV, The Netherlands

- **Hustle and Flow: Product lifecycle management of biosolids**
  Smith, S.R. and Liu, Z., Imperial College London, UK

- **Full scale validation of a model to predict anaerobic digester performance**
  Oxtoby, S.1,2, Winter, P.1, Smith, S.R.1,2, 1Thames Water, UK, 2Imperial College London, UK

- **Maximising energy generation from Anglian Water’s Sludge Treatment Centres: Improving the total energy content and available energy of the feedstock**
  Smyth, M and Kabir, M., Aqua Enviro, UK

- **Additional speakers have been invited to share their work on the application of models to planning for AMP 7**

BIOGAS AND ENERGY MANAGEMENT

- **Demand-driven biogas production from anaerobic digestion of sewage sludge: preliminary experimental results**
  Lathero, M.1,2, Thorpe, R.B.1, Ouli, S.K.1, Lee, J.1 and Rus Perez, E.2
  1University of Surrey, UK, 2Thames Water Utilities Ltd, UK

- **Flexibility potential of waste water treatment plants with anaerobic sludge stabilisation**
  Hobus, I., Wupperverbandsgesellschaft für integrale Wasserwirtschaft mbH, Germany

- **Energy recovery from biogas**
  Blanchard, R., Loughborough University, UK

- **Boosting biogas generation by 20-30% using biocatalytic augmentation of anaerobic digesters**
  Fabiyi, M., Conley, S., Drylett, LLC, USA

- **The ATC Plant at Lower Brighouse – A merchant plant model for life after Water 2020**
  Pitt, D., Entertecgreen Limited, UK

- **Additional speakers have been invited to share their work on in-situ biogas upgrading**
PLENARY

Come in, number two – your time is up. Are microplastics the beginning of the end for ‘sludge to land’?

Tompkins, D.1 and Bungay, S.2, 1Aqua Enviro, UK, 2Helix Environmental Consultancy Ltd, UK

PRE / POST-TREATMENT AND THICKENING / DEWATERING

How sludge characteristics and THP affect dewaterability
Kjørlaug, O.1, Rus, E.2, Molokwu, O.2, Nilsen, P.J.1, 1Cambi Group AS, Norway, 2Thames Water Innovation, UK

Sludge Pre-Treatment with OREGE SGL
Benamaor, H. and Whittle, I., Wessex Water, UK

Energy and Process Efficiency - savings at Thames Water
McGarian, P.1 and Fountain, P.1, 1SEEPex UK Ltd, UK, 2Thames Water, UK

Polymer split-dosing trial for optimising the dewatering of thermally hydrolysed digested sludge at Long Reach Sewage Treatment Works
Tilahun, D., Rus, E., Fountain, P., Christie, I., Thames Water Utilities Limited, UK

Concerned about Biosolid cooling after THP? Not with Biosolid Flash Cooler
Hilstrøm, T., Haarslev Industries A/S, Denmark

Reducing greenhouse gas emissions and improving sludge dewaterability with vacuum degassing of digested sludge
Ccadav, G., Dittmann, M., O’Brien, L., Eligo Water Group, UK

LANDBANK SECURITY

A survey of UK sewage sludge quality: a contemporary and historical analysis
Liu, S.1, Liu, J.1, Macedo, F.2 and Smith, S.R.1, 1Imperial College London, UK, 2Thames Water Utilities Ltd, UK

Emerging contaminants: a perspective from outside Europe
Boll, A., RMIT University, Australia

Findings of the Irish EPA study on emerging contaminants in sewage sludge
Heady, M., National University of Ireland, Galway, Ireland

Gaining efficiency & facilitating compliance in biosolids operations and reuse
O’Riain, G., Compass Informatics, Ireland

Biosolids Assurance Scheme – maintaining confidence in biosolids recycling to agricultural land in the UK
Grieve, D., Grieve Strategic, UK

Twelve months on – Flottweg’s Xelletor decanter centrifuge proves its worth
Steiger, W., Flottweg SE, Germany

Bio-cage™, A Novel Innovative low-cost solution for sludge thickening – Results from 40 Southern Water Sites
Veesam, M., Southern Water, UK

The significance of direct dewatering of thin sludge to cake by VOLUTE dewatering press
Mannion, R., Evergreen Water Solutions, UK

DIMA sludge thickening solutions – 5-DISC takes a spin on Nereda sludge
Smith, J., Huber Technology, UK

Evaluation of Anammox Batch Reactors
Pepper, I. and Foster, A., Water & Energy Sustainable Technology (WEST) Center, The University of Arizona, USA

Nitrogen Removal on anaerobic digestion rejects from a THP-AD pretreatment by deammonification. Experiences with DEMON Lagesar WWTP
Oller Balcells, M., GS INIMA Environment, Spain

PANEL DISCUSSION How can we best ensure a sustainable land bank?

WORKSHOP: MAKING THE BIOECONOMY WORK

In collaboration with the NNFCC, this full day session will explore how businesses have moved from theory to commercial reality – to bring the bioeconomy to life. Visit www.european-biosolids.com for updates.

POSTER COMPETITION

We are still accepting poster submissions so if you would like to showcase your work to over 250 industry professionals and be in with a chance of winning a monetary prize, email frances.woodhead@auquaenviro.co.uk with a 150-word abstract. The award will be judged and presented during the conference and is open to students and early career professionals working in the wastewater and resource management sectors.

STEERING COMMITTEE
Day 3 Thursday 15th November

SITE VISITS

This year, delegates have the opportunity to join a double visit on Thursday 15th November. The coach will depart The Royal Armouries early on the morning of Thursday 15th and make a round trip to both sites before returning to Leeds late afternoon. Lunch will be provided.

The cost is £100 +VAT per person. Please note places are limited so please book early to avoid disappointment.

ANGLIAN WATER’S PYEWIPE WATER RECYCLING CENTRE

Pyewipe Water Recycling Centre (Grimsby, North Lincolnshire), was commissioned in 2014 and hosts one of four examples of Anglian Water’s patented HPH-AD process (Heating, Pasteurisation, Hydrolysis). The HPH-AD process is industry-leading, with energy production exceeding 1MW/tds – and provides a final product (NutriBio) – that is valued by farmers for its soil-conditioning properties and nutrient content.

With a throughput exceeding 16,000 tonnes of dry solids per year, 2 x 1.2 MW combined heat & power engines, and Anglian Water’s novel dual cake & liquid reception system – Pyewipe is key part of Anglian Water’s Bioresources Strategy for Lincolnshire.

AMUR FOOD-WASTE AND AD SITE – SOUTH MILFORD

The first of Amur’s food waste AD sites (near Selby, North Yorkshire) has been operational since 2016. Designed by BTS Biogas, the plant has a capacity of 60,000t (fresh weight) of blended feedstock per year, with the resulting biogas upgraded to biomethane for injection directly into the gas network.

LOCATION & VENUE

The Royal Armouries is in Leeds city centre in the waterfront development, Clarence Dock.

The museum houses a large part of the national collection of arms and armour. The venue has on-site hotel accommodation at the Express by Holiday Inn and a multi-storey car park.

Leeds is only 2 hours from London by train and there are flights from across the UK and Europe into Leeds Bradford International Airport or there is a direct train from Manchester Airport.

Full travel and accommodation details will be sent when you register. www.aquaenviro.co.uk

CONFERENCE DINNER

Tuesday 13th November

On the evening of Tuesday 13th November, we will be taking over Kendall’s Bistro, an award-winning restaurant in Leeds City Centre, famous for its quality of food and wonderful atmosphere.

The conference dinner provides the perfect opportunity to socialise with fellow delegates and enjoy a relaxed evening of fine food and wine. Why not take a corporate table to entertain your guests and impress your most important clients?

Dinner tickets are £60 (+VAT) per person, and include: drinks on arrival, a 3-course meal and half a bottle of wine.

The event is always a sell out, so we encourage you to book early to prevent missing out.

Contact frances.woodhead@aquaenviro.co.uk for further details or books via the Aqua Enviro website www.aquaenviro.co.uk

BOOKING

You can register online or download a printable booking form at www.aquaenviro.co.uk

Note that we offer REDUCED prices for water company staff, academics, early career professionals and students

Please direct any registration queries to Clare Hunter: clarehunter@aquaenviro.co.uk | +44 (0)1924 257891

<table>
<thead>
<tr>
<th></th>
<th>BOTH DAYS + VAT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standard Delegate</td>
<td>£595</td>
</tr>
<tr>
<td>Standard Speaker</td>
<td>£495</td>
</tr>
<tr>
<td>Water Company / Early Career Professional</td>
<td>£495</td>
</tr>
<tr>
<td>Students, Academics &amp; Charities</td>
<td>£200</td>
</tr>
<tr>
<td>Site Visit</td>
<td>£100</td>
</tr>
<tr>
<td>Conference Dinner</td>
<td>£60</td>
</tr>
</tbody>
</table>

Please direct any registration queries to Clare Hunter: clarehunter@aquaenviro.co.uk | +44 (0)1924 257891
Aqua Enviro
Events Calendar 2019

Anaerobic Digestion: Is There Viability Beyond Incentives?
December 2018, London

Cross-Sector Communication to Address Consumer Flush and Throw Behaviours
January 2019, Manchester

Perception and Risk: Securing Landbank
February 2019, Leeds

Modelling, Managing and Regulating Phosphorus and Emerging Contaminants at Catchment Level
March 2019, Nottingham

Water and Wastewater Networks: Delivering Cost-Effective Resilience
April 2019, Manchester

Microplastics in Soils: Nothing to See Here?
June 2019, Leeds

13th European Wastewater Management Conference & Exhibition
July 2019, Birmingham

For further details visit: www.aquaenviro.co.uk/events/conferences/

If you are interested in speaking, sponsoring or exhibiting at any of these events, please email Sarah – sarah.brown@aquaenviro.co.uk or tel. 01924 257891

www.aquaenviro.co.uk