

European Biomass To Power

8 - 9 November 2017

Aarhus, Denmark



4 EXCLUSIVE SITE VISITS

Conference delegates are invited to join exclusive site visit to Dong Energy's Skaerbaek & Studstrup Power Stations on the 7th of November. Please confirm your interest when registering to attend the event. Places are strictly limited.



In the afternoon of the first day of the main conference, 8th of November 2017, Conference delegation will also be invited to visit Biomass fired CHP plant in Lisbjerg and Verdo's combined heat and power plant (KVR) in Randers.



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Sponsorship & Commercial Opportunities

Kristina Gyulavari +44 754 923 2644 or kvari@acieu.net

More Information & Delegate Registration

Dimitri Pavlyk +44 (0)203 141 0627 or dpavlyk@acieu.net

European Biomass to Power

Aarhus, Denmark

8-9
November
2017

ACI's 7th Annual **European Biomass to Power Conference** will be taking place in Aarhus, Denmark, on the 8th–9th November 2017. Building up on the success of its six previous editions, the conference will give updates on the European biomass market and its new developments, as well as focusing on sustainability and commodity challenges. Over the two days, the event will give you in-depth look into case studies giving practical examples of planning, finance and technology strategies utilised for biomass co-generation projects.

Once again, the conference will bring together senior executives from the entire value chain, such as power producers, regulatory bodies, raw materials providers and researchers, as well as other influential stakeholders.

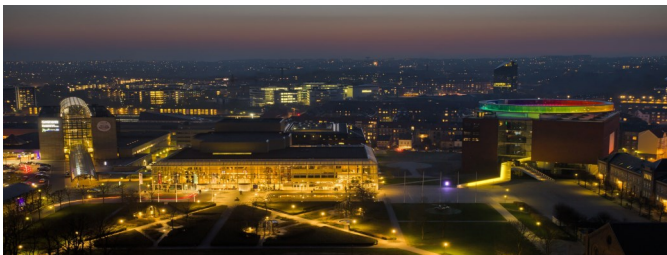
Join us in to exchange your point of view with your peers and engage in excellent networking opportunities.

Key Topics Will Include:

- Global Biomass Market Developments
- Policy & Regulation
- Finance & Investment
- Sourcing & Sustainability of Supply
- Biomass Handling & Storage
- Biomass to Power Projects in Europe—Case Studies
- Breakthrough Technologies for Biomass to Power

Who Will You Meet at This Event?

Senior executives from leading power companies, business development managers, commodity managers, sales managers, policy directors, heads of environmental strategy, heads of markets, economists and consultants.



Opportunities to Meet Your Target Audience

For information on available sponsorship, exhibition and commercial opportunities, please contact **Kristina Gyulavari**

Tel: +44 (0) 754 923 2644 E: Kvari@acieu.net

EXCLUSIVE SITE VISITS

Dong Energy's Skaerbaek & Studstrup Power Stations

During Pre Conference day, on the 7th of November 2017 a limited number of conference delegates will receive a unique opportunity to visit Dong Energy's Skaerbaek & Studstrup Power Stations.



Lisbjerg Power Plant & VERDO's CHP Plant in Randers

In the afternoon of the first day of the main conference, 8th of November 2017, Conference delegation will be invited to two exclusive tours. One tour to Biomass fired combined heat and power plant in Lisbjerg. And another to VERDO's CHP plant in Randers. Site visit tours will be followed by a drink reception back at the conference venue, hosted by COWI and BWSC.



Please confirm your interest in joining exclusive site visit tours when booking your place at the event. There is no extra charge to join site visits and transport will be provided by ACI. Places are limited and allocated on a first come first served basis

AARHUS—2017
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Delegate Registration & More Information

For more information please contact **Dimitri Pavlyk**

Tel: +44 (0) 20 3141 0627 E: Dpavlyk@acieu.net

Exclusive Site Visits Tours During Pre Conference Day

On Tuesday, the 7th of November, Conference delegates are invited to join site visit tours to DONG Energy's Studstrup & Skærbæk Power Stations.

Studstrup Power Station

Since 1968, the Studstrup Power Station has a total capacity of 714MW electricity and 986MJ/s district heating. The power station has two units - units 3 and 4 - which were put into operation in 1984 and 1985. These have since then been modernized regularly. Today, unit 4 is taken out of day-to-day operation and is held in reserve.



From 2014 to 2016, Studstrup Power Station's unit 3 was converted making it able to use wood pellets instead of coal. The conversion makes Studstrup Power Station one of the biggest biomass-fuelled power stations in the world. In future, it is expected to produce district heating based on biomass for around 106,000 Danish homes as well as green electricity equivalent to the annual consumption of around 230,000 Danish homes.



Skærbæk Power Station

Skærbæk Power Station have since 1951 been situated at Skærbæk on the northern side of Kolding Fiord. Today, the Skærbæk Power Station consists of block 3 from 1997 with a capacity of 392MW electricity and 447MJ/s heating. At the commissioning in 1997 the Skærbæk Power Station's unit 3 set the world record of natural gas fired plants with a total efficiency of 49 % at 100 % power production. At combined heat and power production the plant can achieve a total efficiency of 92 % which makes it one of the world's most efficient power stations.



From 2015-2017 Skærbæk Power Station is converting from natural gas into wood chips. The conversion means not only a whole new fuel storage and logistic setup, but also two new boilers. The open wood chip storage facility has a maximum height of 30m and can store up to 80,000m³ of wood chips. This equates to approximately nine days of maximum heat production at Skærbæk Power Station. The green Skærbæk Power Station is expected to be ready for the next heating season. From then on, the power station will use only wood chips produced from wood waste for the production of district heating to the Triangle Region Denmark

Tour Day Agenda

- 09:00 – Depart Radisson Blu Scandinavia Hotel Aarhus
- 09:45 – Arrive Studstrup Power Plant
- 09:45 – Welcome Presentation & Coffee
- 10:15 – PPE & Preparation for the tour
- 10:30 – Guided Tour of the facilities
- 11:30 – PPE Clearance after tour and walk back to the bus
- 11:45 – 12:00 – Depart Studstrup Power Plant
- 13:30 – 14:30 - 1 hour Lunch at Restaurant Remouladen
- 15:15 – Arrive Skærbæk Power Plant
- 15:15 – PPE & Preparation for tour
- 15:30 – Guided tour and Q&A
- 17:00 – PPE Clearance after tour and walk back to the bus
- 17:15 – Depart Skærbæk Power Plant
- 18:30 – Return to Radisson Blu Scandinavia Hotel Aarhus
- Tour will stop for 1 hour lunch break on the way to Skærbæk Power Plant. Lunch will be served at the restaurant Remouladen – Traditional and high quality Nordic food place near the water front.

Lunch is kindly sponsored by Hans Buch A/S

HANS BUCH

DAY 1

Wednesday 8th November 2017

07:30

REGISTRATION & COFFEE

Sponsored by



REDECAMGROUP

08:25

ORGANISERS' WELCOME ADDRESS

08:30

CHAIRMAN'S OPENING REMARKS

08:45

MORNING WELCOME PRESENTATION

Optimization Of New And Existing Filtration Systems

- Assessing strategies to improve bag filter performance in terms of emissions and operating costs
- Presenting Redecam advanced Test Rig to identify and apply the best available solution



Gino Carucci
Head Of Sales
Redecam Group

09:00

KEYNOTE ADDRESS

European Biomass Industry Outlook

- Value chain overview: from biomass procurement to power production
- Energy efficiency and power from biomass
- What is the total current & potential biomass capacity in Europe?
- Changing biomass markets landscape
- Engagement, communication & public perception

09:20

CONFERENCE PRESENTATION

Mapping Of The Danish Bioenergy Cluster

- Bioenergy in Denmark, the country of windmills
- Bioenergy is the biggest contributor to the green transition of the Danish energy system
- Mapping of the Danish Bioenergy cluster reveals its contribution to jobs and exports
- Danish competencies are found within combustion, biofuels and biogas



Michael Persson
Head Of Secretariat
Danish Bioenergy Association

09:40

CONFERENCE PRESENTATION

Biomass & Sustainability Regulatory Framework

- Managing emission levels
- Power from biomass and carbon intensity
- Sustainable waste biomass treatment
- Placing value on fields and forest through waste biomass usage
- Sustainability schemes and its' implementation
- How to verify and address sustainable origin and land criteria of biomass?
- Overcoming biomass sustainability issues during and post 2020-2030

10:00

CONFERENCE PRESENTATION

Latest Development in Woodchip Energy Production

Michael Schytz
Head of Fuel and LogisticS
HOFOR A/S

10:35

CONFERENCE PRESENTATION

Title to be confirmed

Jan Hagenau
Head of Department
Boiler, Combustion and Fuel Logistics
Ramboll Energy Power

10:45

MORNING REFRESHMENTS

Sponsored by

RAMBOLL

11:20

CONFERENCE PRESENTATION

The Role of Biomass for Lithuanian Economy and Independence

- Outstanding features of Lithuanian biomass energetics. Key facts and main trends
- Biomass Exchange BALTPPOOL – unique meeting point of suppliers and purchasers
- Ecology with economic benefits. Presenting Enerstena Group solutions for biomass power plants



Ralfas Lukoševičius
Director of Innovation
ENERSTENA Group

Speaking Opportunities

If you would like to be considered as a speaker please get in touch with **Samanta Fawcett** on +44 (0) 2031410624 or submit your abstract to sfawcett@acieu.net

11:40

CONFERENCE PRESENTATION

Bankability of Biomass to Power Projects

- European Investment Bank financing of energy infrastructure
- Eligibility criteria for biomass to power projects
- Lessons learnt



Jacek Podkanski
Senior Engineer Energy Security
Division
European Investment Bank

CONFERENCE PRESENTATION

Design of Regulatory Framework: Policy Makers Opinions

- European bioenergy policy analysis
- The renewable heating and cooling strategies
- Small scale renewable district heating

12:00

CONFERENCE SESSION

New Built Plants & Flexibility of existing biomass plants: from strategy to implementation

Case Study of New Biomass Plant

- Renewable energy
- Huge flexibility requested
- High efficient design



Robert Heeb
Sales Manager
Babcock & Wilcox Volund

12:20

Converting the CHP Plant in Randers from Fossil to Biomass

- From strategy to implementation
- Challenges
- Verdo's position



Benny Corneliusen
Bioenergy Manager
VERDO

State-Of-The-Art Biomass Power Plant In Lisbjerg

- Biomass power plant designed to utilize domestic and locally grown biomass fuels
- High focus on availability of the facility though e.g. fuel flexibility
- Flexibility between power and district heat production
- Advanced flue gas treatment system with DeNOx SCR system
- Focus on efficiency with advanced heat recovery system

12:40

Lars Grove Lundin
Sales Manager
BWSC



Niels Jacobsen
Project Director
COWI

12:50

Panel Q&A

13:00

LUNCH

14:00

AFTERNOON TRIPS: Conference participants are invited to join one of the 3 following streams for the afternoon activities. Please see the following page for detailed information.

Commercial Opportunities

For information on available sponsorship, exhibition and commercial opportunities, please contact Kristina Gyulavari +44 (0) 754 923 2644 or Kvari@acieu.net

STREAM I

Exclusive Site Visit Tour to Verdo's CHP Plant (KVR) in Randers



Conference delegation will be invited to visit Verdo's combined heat and power plant in Randers. Verdo's combined heat and power plant (KVR) in Randers was commissioned in 1982 as a coal fired unit. The unit is a back pressure plant, equipped with two boilers each at 56 MW and one turbine at 50 MW. The unit was in 2009 refurbished, and are now 100 % fueled with biomass.



By going from coal to biomass, the CO₂ emission is reduced with 300.000 ton/y. The fuel is handled by Verdo Energy, and are traded from both local European market as well from Africa. Verdo Energy is an international biomass trader who possesses unique competencies in procurement, freight, contract management and product development of fuels. Verdo Energy is serving a wide range of customers.

GROUP I Tour Agenda:

14:00 Depart Radisson Blu Scandinavia Hotel Aarhus
15:00 Arrive Verdo's Power Plant
15:30 Welcome Presentation & Coffee
16:00 Guided tour and technical explanations
17:00 Leaving Verdo's Plant
18:00 Returning to Radisson Blu Scandinavia Hotel Aarhus

STREAM II

Exclusive Site Visit Tour to Lisbjerg Straw Fired Biomass Plant



Exclusive site visit to the newly commissioned Lisbjerg biomass power plant. The plant, located in the suburb of Aarhus, Lisbjerg, is designed basically to burn locally produced wheat straw with a maximum of 240,000 tons per year. For flexibility and availability reasons, the plant is also designed to burn up to a maximum of approx. 50% of wood chips based on the heat input. The plant has a thermal input of 110 MWth and is capable of producing over 30 MW of electricity and 80 MW of district heat corresponding to one fifth of the district heating capacity of Aarhus City.



The plant is equipped with an advanced flue gas cleaning and heat recovery system with DeNO_x SCR, flue gas condensation and moisturizing of the combustion air. Focus points has been flexibility between heat and power production, as well as high fuel flexibility and high availability of the facility. The detailed planning started late 2013 and commissioning took place during the spring and summer of 2017. Owners engineer was COWI A/S and the boiler was constructed by BWSC.

GROUP II Tour Agenda:

14:00 Leaving Radisson Blu Scandinavia Hotel in Aarhus
14:30 Arrive at CHP plant in Lisbjerg
14:30-15:00 Welcome Presentation & Coffee
15:00 Guided tour and technical explanations
16:00 Leaving CHP plant in Lisbjerg (Second Group Arrives)
16:30 Returning to Radisson Hotel

STREAM III

Roundtable Panel Discussions

14:00 Roundtable I Flue gas condensation – challenges and opportunities

- What is flue gas condensation?
- Some reference cases?
- How does FGC influence the efficiency?
- How does it influence the business case?

Speaker: Frederik Axby, Gruppchef Energisystem, **Sweco Energuide AB**

15:00 Roundtable II Policy & Regulatory Environment

- Biomass and Energy Sustainability within the EU
- Addressing challenges of EU's energy system
- Policy framework and Climate Change

GROUP III Tour Agenda:

15:30 Leaving Radisson Blu Scandinavia Hotel in Aarhus
16:00 Arrive CHP plant in Lisbjerg
16:00 – 16:30 Welcome Presentation & Coffee
16:30 Guided tour and technical explanations
17:30 Leaving CHP plant in Lisbjerg
18:00 Returning to Radisson Blu Scandinavia Hotel Aarhus

16:00 Roundtable III Innovation in Biomass Power

- Latest project developments
- Cost comparison & best available technology
- Modification of existing power plants to be fit for biomass feedstock

**For speaking opportunities Please contact Samanta Fawcett sfawcett@acieu.net*

18:00-18:30 All the groups return to the Radisson Blu Scandinavia Hotel in Aarhus. Networking & Drink Reception
Sponsored by



DAY 2

Thursday 9th November 2017

08:30 **REGISTRATION & COFFEE**

09:00 **CHAIRMAN'S OPENING REMARKS**

09:05 **CONFERENCE SESSION**

Global Bioenergy Outlook With Focus On Biomass Industry

Bioenergy perspectives from the IEA's Renewable Energy Market Report 2017

- The presentation will share key bioenergy findings the IEA's recently published Renewable Energy Market Report 2017 (REMR 2017), including global (2016-22) forecasts for bioenergy capacity and generation
- REMR 2017 findings as regards bioenergy policy and economic analysis
- Insights into no-regrets opportunities to scale up bioenergy deployment within the power sector over the next ten years
- A look at the future role of bioenergy within the power sector according to the IEA's long term 2 degree scenario (2DS)



Pharoah Le Feuvre
Analyst - Bioenergy Markets
International Energy Agency

The potential and development of biomass power in Australia

- Estimates of economically available sustainable biomass and biowastes
- Existing and planned biomass power installations
- Political support, energy policies, and barriers to development
- Scope and opportunity for European plant and equipment manufacturers



Andrew Lang
Vice President
World Bioenergy Association

09:50 **CONFERENCE SESSION**
Optimizing biomass power supply chain. What are the solutions?

- Transportation & storage challenges
- Overcoming biomass supply risks and other challenges
- Supply chain development & innovation



Peter Wanek-Pusset
CEO
Innofreight GmbH



Michael Corten
CEO
Belgium Eco Energy
(BEE) N.V.

11:00

Lars Johansen
CEO
Lachenmeier Monsun A/S

MORNING REFRESHMENTS

Sponsored by **lachenmeier
monsun**

11:35

CONFERENCE PRESENTATION

The Latest Biomass Conversion Technologies

- Progress in enhancing industrial performance
- Overcoming current productivity limitations
- Improving operational stability
- Latest state of the art technologies in biomass processing



Christian Radhuber
Process & Technology
Andritz

Thomas Bøgner
Sales Director
FlowVision A/S

High Efficiency Solutions for Biofuels

- Valmet's experience with different kind of biofuels – wood and agro based fuels – in fluidized bed combustion.
- The status of on-going biomass fired projects, such as Dong and Hofor in Denmark

Satu Lamminen
Pulp and Energy Business Line
Valmet

CONFERENCE SESSION

Industrial Markets for Wood Pellets

- Diversifying biomass for large scale generation
- Detailed overview of wood pellet markets

CONFERENCE PRESENTATION

Coal to Biomass (wood pellets) mill/pulveriser conversion, a different

- Traditional static and dynamic classifiers do not work well with Biomass
- CFD calibration was done to adapt for biomass flakes
- The final design is simple, yet effective

Kotie Steyn
Engineering Specialist
Coal Milling Projects (PTY) Ltd

13:25

NETWORKING LUNCH

14:30

CONFERENCE SESSION

Biomass Resources & Feedstock Availability

- Application of biomass to power and heat and its' impacts on the environment
- Sustainable forest management practises and its' role in climate change mitigation
- Support of natural forest regeneration and improving quality of woodland
- Challenges of biomass sourcing and carbon intensity
- Certifying wood from sustainable forestry origins
- Certification requirements for operators' daily procedures

The potential for increased productivity in forests enhanced by rising temperature and applied wood ash as fertilizer

- "Ash-back" project: The recycling of wood ash to the forest as fertilizer
- Discussion on fertilizing potential and examples of biological responses on ash to the forest floor



Mads Frederik Hovmand
Senior Scientist
University of Copenhagen

15:15

CONFERENCE SESSION

Sustainability, Technology and Innovation: Addressing the Future of Biomass Sector

- Future & competitiveness of wood energy based production
- Ground breaking R&D projects
- Bridging gaps between research and the markets

From Combined Heat & Power production (CHP) to Combined Fuel, Heat & Power production (CFHP)

- And what it means in terms of tasks, customers, prices and earnings for the power sector of the future
- A 100% de-carbonised transport sector - How to obtain it as fast, cheap and efficient as possible?



Per Sune Koustrup
Co-founder, Broker & Trader
Nordic Green ApS

Bioenergy and Carbon Capture -- Importance, Opportunities, and Challenges

- What is bioenergy + CCS and why is it important for meeting climate targets?
- For bioenergy + CCS to work, need robust and sustainable bioenergy supplies
- Bioenergy + CCS provides new motivation for good bioenergy and CCS action
- Key barriers to deployment (technology + markets + finance)
- Priorities for advancing projects



Noah Deich
Executive Director
Center for Carbon Removal

16:00

CHAIRMAN'S CLOSING REMARKS

16:10

END OF CONFERENCE & AFTERNOON REFRESHMENTS

Sponsorship & Exhibition Opportunities

For commercial and sponsorship opportunities please contact **Kristina Gyulavari** on +44 754 923 2644 or kvvari@acieu.net

European Biomass to Power

Aarhus, Denmark

8-9
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2017

More Information & Registration:

If you would like to register for this event or wish to find out more, please contact **Dimitri Pavlyk** using any of the following methods:

☎ +44 (0)20 3141 0627

@ dpavlyk@acieu.net

www <http://www.acius.net>

🏠 Postal Address:
ACI Europe, 10 Gough Square, London, EC4A 3DE, UK

Registration is Simple

Conference Pass (Includes Documentation Packet) 8th – 9th November 2017	£1,595.00 (ex.Vat)
Documentation Packet Only	£420.00

Please Note.

Members of our partners / supporting organisations are entitled to a discount off their conference package.

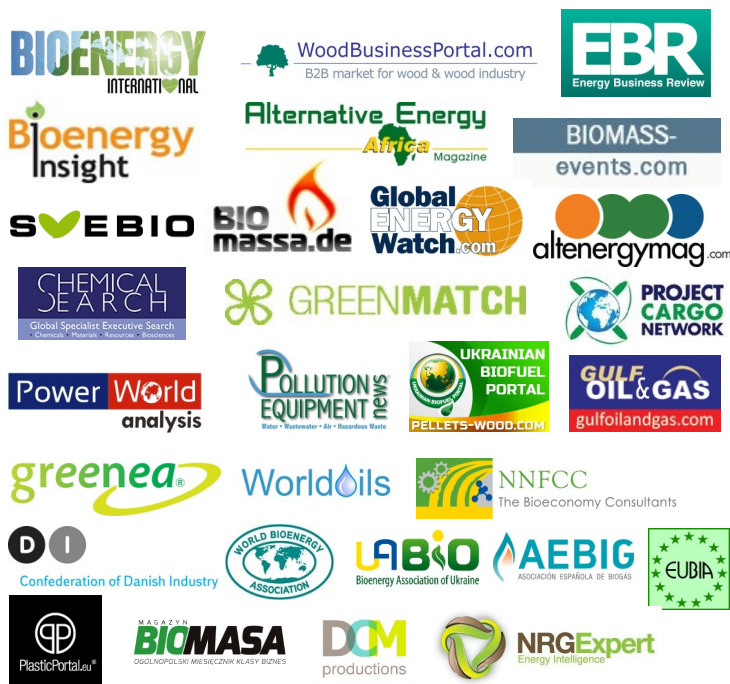
For more information please call Dimitri Pavlyk on +44 (0) 20 3141 0627

Documentation Packet Available

You can purchase European Biomass to Power papers at just £395 (+£25 P&P). Simply tick the box on the booking form, send it with payment and your copy will be on its way to you after the meeting. This important manual will be a source of invaluable reference for the future.

About ACI: ACI, a UK owned company, has been running successful conferences in the USA since 1999. Headquartered in Chicago with offices all around the States, ACI opened its European head office at the end of 2005 and has expanded rapidly, launching a series of events in key industries including maritime, energy, oil & gas, cosmetics, chemicals & media.

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Payment

Payment must be received within five business days of returning the signed contract. After receiving payment a VAT receipt will be issued. If you do not receive a letter outlining details two weeks prior to the event, please contact the Conference Coordinator at ACI Europe Ltd.

Discounts are available for multiple/group bookings. Please call **+44 (0)20 3141 0627** for more information.

Cancellations

Substitutions are welcome up to 24 hours prior to the event. Cancellations must be received in writing no less than 3 weeks prior to the start of the conference; a full credit voucher towards a future ACI conference will be issued. Any cancellation received less than 3 weeks prior to the start of the event shall be deemed to be a breach of this contract by client, and accordingly, no credits will be given. Cancellations must be received in writing by mail or fax three weeks before the conference. Thereafter the full conference fee is payable. If for any reason ACI Europe Ltd decides to amend, cancel or postpone this conference, the conference fee will not be refunded. Furthermore, ACI Europe Ltd will not be responsible for covering airfare, hotel or other costs incurred by registrants. In the event that ACI Europe Ltd cancel or postpone the event, ACI Europe Ltd reserves the right to transfer this booking to another conference to be held in the following twelve months, or to provide a credit of an equivalent amount to another conference within the following twelve months. The construction, validity and performance of this agreement shall be governed in all respects by the laws of England to the exclusive jurisdiction of whose courts the Parties hereby agree to submit.

Accommodation

The cost of accommodation is not included in the event fee. Preferential rates will be arranged with or near the event venue, and all confirmed delegates will be given details of how to book accommodation at this

Conference Venue:

Radisson Blu Scandinavia Hotel Aarhus



Margrethepladsen 1

Aarhus, DK-8000 Denmark