Key questions

- How can waste management be acknowledged in the future UNFCCC agreement?
- What can we learn from existing national and local climate strategies including waste management?
- What is resource efficient waste management in a fossil free future?
- What are the messages from the sector to COP18?
Waste management is part of the solution to climate change
- that was the conclusion of the 1st Waste & Climate Beacon Conference in 2009

It is now time to follow up on the conclusions from the first DAKOFA/ISWA Conference on Waste & Climate 2009 held in connection with the COP15 in Copenhagen. As an integrated part of the overall resource flow, waste management has a tremendous potential for contributing to resource efficiency and mitigating climate change, as emphasised in the communication on “A resource efficient Europe – Flagship initiative of the Europe 2020 Strategy” from the European Commission. Intelligent waste management can avoid up to 1.3 tonnes of CO₂ eq. per capita.

The conference is dedicated to these issues with the goal of delivering a clear message from leading scientists and industries in the field of waste management. There is an urgent need to form a common understanding of and solution to these complicated issues and to prove the high efficiency when mitigating climate change by proper waste management.

Durban outcome – waste management to be acknowledged?

At the COP17 in Durban last year, a second commitment period under the Kyoto Protocol was decided that is to lead to a legal binding climate change agreement in 2015 with the commitment of China, USA and India. The commitment of countries outside Europe is even more important since Europe only counts for 11% of the total CO₂ impact on a global level.

Effective mitigation strategies that can quickly and cost-effectively achieve climate-related goals must be adopted. Intelligent waste management should be part of these strategies. ISWA assessed the Durban outcomes as strongly positive for the waste management in terms of gaining greater recognition as part of a mitigation strategy.

The conference aims at building on these signals from Durban and at establishing a mutual platform within the international waste sector, in order to discuss the future possibilities and bring forward the messages of the international sector to the UN COP18 in Qatar in 2012.
The Objective

The conference is focussed on the outcome of Durban, the examination of existing technologies and strategies at both a national and local level, as well as the future issues of material and carbon management in a climate change perspective.

Key questions

- How can waste management be acknowledged in the future UNFCCC agreement?
- What can we learn from existing national and local climate strategies including waste management?
- What is resource efficient waste management in a fossil free future?
- What are the messages from the sector to COP18?

The Programme Committee

The Programme has been developed by:
Thomas Højlund Christensen, Professor at the Technical University of Denmark
Gary Crawford, Vice President, Sustainable Development, Veolia Environmental Services
Bettina Kamuk, Project/Market Director of WtE at Ramboll
Henrik Wenzel, Professor at the University of Southern Denmark
Suzanne Arup Veltzé, Managing Director of DAKOFA

You are invited!

Delegates include government officials, industries, policy makers, universities and selected experts in the field of waste management and climate change. All delegates attending are invited to discuss and contribute to the key sector messages to be delivered as conclusions from the conference at the COP18.
<table>
<thead>
<tr>
<th>Time</th>
<th>Session</th>
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<tbody>
<tr>
<td>09.00-09.30</td>
<td>Registration and coffee</td>
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</table>
| 09.30-09.40 | Opening and welcome:  
Suzanne Arup Veltzé, Managing Director, DAKOFA (Danish Waste Management) |
| 09.40-09.55 | Welcome to Copenhagen – a City with focus on climate and sustainability  
Ayfer Baykal, Mayor of Copenhagen, Technical and Environmental Administration |

**Opening session:**

*Chair: Professor Thomas Højlund Christensen, Technical University of Denmark*

<table>
<thead>
<tr>
<th>Time</th>
<th>Session</th>
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</table>
| 09.55-10.05 | Waste and climate change: ISWA’s call for international action  
Jeff Cooper, President of ISWA |
| 10.05-10.30 | Why is waste management important in a climate change perspective?  
Professor Christos Zerefos, Research Center for Atmospheric Physics and Climatology of the Academy of Athens, Greece |
| 10.30-10.55 | EU-Commission Policy: Waste management and resource efficiency – reflections on GHG emissions  
Michel Sponar, European Commission |
| 10.55-11.20 | Waste in a fossil fuel free economy  
Jørgen Henningsen, Former Member of the Danish Commission on Climate Change Policy, Former Principal Advisor of DG Energy and Transport |
| 11.20-11.40 | Coffee                                                                  |

**Session 1: Messages from COP17 in Durban – status and opportunities**

*Chair: Professor Thomas Højlund Christensen, Technical University of Denmark*

<table>
<thead>
<tr>
<th>Time</th>
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| 11.40-12.05 | United Nations Framework Convention on Climate Change: Messages from Durban to the international waste management sector.  
Scott J. Stone, Sierra Nevada Corporation |
| 12.05-12.30 | Scaling up the climate benefits from waste management and recycling  
Gary Crawford, Veolia Environmental Services |
12.30-12.55  Outcome of Durban seen from a national waste management perspective – achievements and future challenges  
*Fernando Tudela, Ministry of Environment and Natural Resources, Mexico*

12.55-13.55  Lunch

**Session 2: National and local strategies – the role of waste management**

*Chair: Professor Jens Aage Hansen, Aalborg University, Denmark*

13.55-14.20  Comparing Solid Waste Management in the World’s Cities  
*Professor David Wilson, Imperial College, London, UK*

14.20-14.45  Zero Waste – Delivering GHG emissions reductions  
*Stuart Greig, Resource Management, Scottish Government*

14.45-15.05  Challenges in Waste Management Policies in Urban Cities: The Singapore experience  
*Vaneeta Bhojwani, National Environment Agency, Singapore*

15.05-15.25  Coffee

15.25-15.50  Reducing waste plastics in the waste stream enabling a carbon neutral energy production  
*Mette Skovgaard, City of Copenhagen, Denmark*

15.50-16.15  Waste and Carbon Reduction in the City of Westminster  
*Phil Robson, Westminster City Hall of London*

16.15-16.40  Intelligent waste management as a contributor to mitigating climate change  
*Håkan Rylander and Gunilla Carlsson, Sysav Environmental Company, Malma, Sweden, and Christian Baarlid and Karin Linderoth, Renova Environmental Company, Sweden*

16.40-17.00  Discussion and Closing, Day One

**Gala Dinner**

18.30 – ?  Gala Dinner (IDA)
### Session 3: Future opportunities for material and carbon management

_Chair: Professor Henrik Wenzel, University of Southern Denmark_

<table>
<thead>
<tr>
<th>Time</th>
<th>Topic</th>
<th>Speaker/Institution</th>
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<tbody>
<tr>
<td>09.30-10.00</td>
<td>Waste opportunities – past and future climate benefits from better waste management in Europe</td>
<td>Almut Reichel, Sustainable Consumption and Production, European Environment Agency</td>
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<tr>
<td>10.00-10.30</td>
<td>Research highlights related to materials flows: From technological materials cycles to criticality of metal supply</td>
<td>Dr. Ermelinda Harper, Yale University, USA</td>
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<tr>
<td>10.30-11.00</td>
<td>Coffee</td>
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<tr>
<td>11.00-11.30</td>
<td>Carbon constraints and waste sector implications</td>
<td>Professor Henrik Wenzel, University of Southern Denmark</td>
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<tr>
<td>11.30-12.00</td>
<td>Advanced automated sorting and perspectives for resource and carbon efficiency in future waste management</td>
<td>Adele Clausen, Aachen Technical University, Germany</td>
</tr>
<tr>
<td>12.00-13.00</td>
<td>Lunch</td>
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### Session 4: Waste activities facing the climate challenge

_Chair: Bettina Kamuk, Ramboll_

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<tr>
<th>Time</th>
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<th>Speaker/Institution</th>
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<tbody>
<tr>
<td>13.00-13.25</td>
<td>Evaluating energy savings as the mechanism for GHG mitigation</td>
<td>Brian Bahor, Covanta</td>
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<tr>
<td>13.25-13.50</td>
<td>Fossil content in combustible waste and associated CO₂ emissions</td>
<td>Thomas Astrup, Technical University of Denmark</td>
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<tr>
<td>13.50-14.15</td>
<td>Carbon flow in landfills: Waste decomposition, gas collection and oxidation, and carbon storage</td>
<td>Professor Morton Barlaz, North Carolina State University</td>
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<tr>
<td>14.15-14.45</td>
<td>Coffee</td>
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<tr>
<td>14.45-15.10</td>
<td>Climate and resources from Amagerforbrænding’s point of view</td>
<td>Bente Tange Kallesen, Amagerforbrænding I/S, Copenhagen</td>
</tr>
</tbody>
</table>
Closing session

Chair: Professor Thomas Højlund Christensen, Technical University of Denmark

15.10-15.35 Future pathways for the international climate change negotiations; how to build consensus
Hernán Carlino, Centro de Estudios en Cambio Climático Global, ITDT, Argentina

15.35-16.00 Panel discussion of findings and outcomes from all sessions

16.00-16.25 Closing - conclusions to be brought forward to COP 18
Professor Thomas Højlund Christensen, Technical University of Denmark

Photos and CVs of speakers and presentations will be made available on the conference website.

For registration and all practical information regarding the conference, venue and hotels please visit the conference website: www.wasteandclimate.org

Conference fee DAKOFA/ISWA members
DKK 4,900.– excl. VAT (DKK 6,125.– incl. VAT) / app. Euro 660.– + VAT 25% (Euro 825.–)

Conference fee non-members
DKK 5,425.– excl. VAT (DKK 6,781.25 incl. VAT) / app. Euro 730.– + VAT 25% (Euro 912.50)

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