

**IEES / ZHAW Symposium 2012**

**Final program Jan. 24, 2012**

**Eco-Cities and Ecological Engineering**  
new solutions through transforming traditional ways of thinking

*Jan. 26-28, 2012, Zurich University of Applied Sciences, Waedenswil, Switzerland*

Our world is approaching a phase where several resources will become scarce at the same time: energy, nutrients, water availability, space... The wealth and well-being of coming generations will depend on us being able to adapt our economies to the finite world that our planet actually is.



Waterblad: Art and engineering combined for floodwater retention in The Netherlands:  
Designer: Jeroen van Westen, <http://www.jeroenvanwesten.nl/>

Transforming today's cities into sustainable eco-cities is one of the main adaptations that will be necessary. Ecological engineering offers a holistic approach, a wide spectrum of possible solutions and a wealth of business opportunities. It might well become one of the key factors in this transformation process.

There is a major obstacle against this transition: conventions and paradigms in the minds of planners, engineers, architects and politicians. In the past 200 years, they have been the drivers of an unprecedented success story in our societies. However, today these inherited ways of thinking increasingly represent barriers to new and

more sustainable approaches!

This symposium actively addresses these barriers and searches for ways—based on existing positive examples—to proceed beyond them. It will deal with relevant issues from water management to urban development, industrial ecology, and source-separation.

Six keynote speakers, each at the cutting edge in their specific fields are offering insights and inspiration into how ecological engineering approaches can become reality. During the world-café rounds and the workshops you will get into intensive exchanges with professionals from a variety of fields who share a deep interest in promoting ecologically engineered solutions.

We live in a world where cities, regulations and minds seem to be built in concrete. We are looking for ways to seed and nurture ecological engineering.

## Target audience

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- engineers, entrepreneurs, architects and researchers who are developing ecological engineering concepts and are willing to share their insights and experiences about the obstacles they encounter
- people from businesses or from local, regional or national administrations interested in solutions that are outside the trodden paths they are familiar with
- professionals from all kinds of fields or politicians searching for innovative and holistic solutions to problems in an open-minded way

## Sponsors

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**Program (Final version Jan. 24, 2012)**

<b>Thursday January 26, 2012</b>	<b>Eco-Cities and Ecological Engineering</b> Aim: inspiration, broad view, warm-up
11:30-13:00	Registration and coffee
13:00 – 13:15, Room: Aula GA 203	Welcome addresses
13:15 – 14:25, Room: Aula GA 203	<b>K1: Paradigm change - when does it happen? Experiences from historical research</b>  Dr. Daniele Ganser, University of Basel, Switzerland <a href="http://www.danieleganser.ch">http://www.danieleganser.ch</a>
14:25 – 15:05, Room: Aula GA 203	<b>K2: Biomimicry – from organisms to the built environment. New ideas for the future.</b>  Anna Maria Orru, Eco-Architect, Sweden <a href="http://www.annamariaorru.com/">http://www.annamariaorru.com/</a> , <a href="http://www.fo.am">http://www.fo.am</a>
15:05 – 15:20, Room: Aula GA 203	Introduction to the Appreciative Inquiry / World Café Workshop Facilitator: Gunther Geller <sup>1</sup> , IÖV, <a href="http://www.ioev.de">http://www.ioev.de</a>
15:20 – 15:40	Break
15:40 – 16:40, Rooms: GA 203, 213, 215, 217, 219	<b>Appreciative Inquiry / World Café Step 1: Discovery</b> Discovering positive examples and frameworks
16:40 – 17:20, Room: Aula GA 203	<b>K3: Shaping the future of urban water management</b>  Dr. Tove Larsen, Engineer, EAWAG, Switzerland <a href="http://www.eawag.ch/about/personen/homepages/larsen/index_EN">http://www.eawag.ch/about/personen/homepages/larsen/index_EN</a>
17:20 – 18:00, Room: Aula GA 203	<b>K4: The shift from Eco-Efficiency to Eco-Effectiveness</b>  Andreas Schläpfer, Dipl. Ing. FH, Representative EPEA Switzerland, <a href="http://www.epeaswitzerland.com/">http://www.epeaswitzerland.com/</a>
18:00 – 18:15, Room: Aula GA 203	“Cases” Workshop introduction short teaser for the workshops of Friday morning
Starting at 18:30	Apéro (a Swiss cocktail reception)
Starting at 19:30	Dinner at ZHAW Grüental

<sup>1</sup> Gunther Geller is president of the „Ingenieurökologische Vereinigung Deutschland“ (IÖV), a sister organization of IEES

<b>Friday Jan. 27, 2012</b>	<b>Eco-Cities and Ecological Engineering</b> Aim: Going practical
7:30 – 8:00	Warm-up and coffee
8:00 – 8:45, Room: Aula GA 203	<b>K5: Art as an icebreaker for sustainable technology</b> <a href="#">Herbert Dreiseitl</a> (landscape architect, Germany) <a href="http://www.dreiseitl.de">http://www.dreiseitl.de</a>
8:45 – 9:00	Break
9:00 – 11:30, Rooms: GA 213, 215, 217, 219	<b>“Cases” Workshop</b> (details see below)
11:30 – 13:00	Lunch break
13:00 – 15:15, Rooms: GA 203, 213, 215, 217, 219	<b>Appreciative Inquiry / World Café steps 2 and 3: The dream / vision and the design</b> Facilitator: <a href="#">Gunther Geller</a> , IÖV, <a href="http://www.ioev.de">http://www.ioev.de</a>
15:15 – 15:30	Break
15:30 – 16:15, Room: Aula GA 203	Plenary, reports from “Cases” Workshop tracks and Appreciative Inquiry / World Café workshop
16:30 – 17:15, Room: Aula GA 203	<b>K6: Sustainable Urbanism – an integrated planning approach</b> <a href="#">Joachim Eble</a> (architect & city planner, Germany) <a href="http://www.eble-architektur.de/">http://www.eble-architektur.de/</a>
17:15 – 17:30	Good-bye address, end of symposium
Starting at 18:30	<b>IEES general assembly 2011/2012</b> , <a href="http://www.iees.ch">http://www.iees.ch</a> (IEES members and interested participants)

<b>Saturday Jan. 28, 2012</b>	<b>Field trip (optional, max. 25 participants)</b> Aim: Demonstration and discussion of concrete examples
Starting time around 8:00	The field trip will lead to: <ul style="list-style-type: none"> <li>• <b>Earth House settlement</b> of P. Vetsch at Dietikon</li> <li>• <b>Forum Chriesbach</b> - a high-tech zero energy office building at Dübendorf</li> <li>• <b>Masoala Hall</b> - a constructed tropical environment at the Zurich zoological garden</li> </ul> <p>All destinations are close to Zurich. The airport can be reached from all of them within 45 minutes.</p>

## “Cases” Workshop program (*final version Jan. 24, 2012*)

The workshop is envisioned as an exchange of experiences made with concrete projects, of the circumstances which allowed them to be implemented, or made them fail.

The main questions are:

- What were the success factors for their implementation?
- Which barriers stood (or still stand) against them?
- What are the best ways to overcome them?

Of course, discussing technical considerations should be possible as well. Roughly 50% of the workshop time is planned for discussion and exchange. The contributions are limited to about 15 minutes, and there will around 4-5 of them per workshop track.

There will be no proceedings of the symposium in the classical sense. The aim is to write a common publication about barriers and obstacles that arise in the process of implementing innovative, "green" technologies, and ways to get over them. The publication will be written based on the results of the five workshop tracks as they are reported by the chairs.

<b>Friday Jan. 27, 2012</b>	<b>Parallel workshop tracks</b> Aim: Exchange of experiences
Workshop 1: Sustainable & productive cities	Chair: <a href="#">Ranka Junge &amp; Petra Hagen Hodgson</a> , ZHAW, Switzerland <a href="#">Paul de Graaf</a> , Netherlands: <b>Urban farming in Rotterdam - an expert's idea meets reality</b> <a href="#">Johannes Heeb</a> , Switzerland: <b>The “Tropenhaus-Concept”</b> <a href="#">Andreas Graber</a> , Switzerland: <b>UrbanFarmers – starting an ecotechnological business with Aquaponic</b> <a href="#">Jasper Fiselier</a> , Netherlands: <b>Embedding Eco-Cities into the wider environment - Shifting gears between the local and regional level</b> <a href="#">Stefanie Huber</a> , Switzerland: <b>Anchoring sustainable energy management in the communities - experiences of the European Energy Award</b> <a href="#">Andrea Hagn</a> , Switzerland: <b>Urban poverty, a challenge for sustainable eco-cities</b>
Workshop 2: Sustainable sanitation & Ecosan	Chair: <a href="#">Christoph Lüthi</a> , EAWAG, Switzerland <a href="#">Nanchoz Zimmermann</a> , Switzerland: <b>Decentralized ww treatment and reuse systems with anaerobic reactor technology – practical project experiences in urban settlements</b> <a href="#">Dani Todt</a> , Switzerland & <a href="#">Tjasa Bulc</a> , Slovenia: <b>SANBOX - experiences and challenges of source separating sanitation systems in Europe - a case study presentation</b> <a href="#">Petter Jenssen</a> , <a href="#">Ola S. Hanserud</a> , Norway: <b>Ecosan systems in urban settings – why is the progress so slow?</b> <a href="#">Martin Regelsberger</a> , Austria: <b>Water and sanitation management in a cradle to cradle media services company</b>

<p>Workshop 3: Sustainable Water &amp; Watershed Management</p>	<p>Chair: <a href="#">Margarete Kalin</a>, Boojum Research, Switzerland / Canada <a href="http://www.boojumresearch.com/">http://www.boojumresearch.com/</a></p> <p><a href="#">Lei Yang</a>, Taiwan: <b>Improvement of the urban water environment of Kaohsiung City, Taiwan</b></p> <p><a href="#">Bettina Wanschura</a>, Austria: <b>Experiences with participative processes in river catchment areas</b></p> <p><a href="#">Stacy Hutchinson</a>, USA: <b>Restoring Prairie Ecosystem Functions for Storm Water Management</b></p> <p><a href="#">Maurizio Borin</a>, Italy: <b>Floating systems for multifunctional basins and water bodies in an urban environment</b></p> <p><a href="#">Erich Trevisiol &amp; Chiara Odolini</a>, Italy: <b>Urban River Planning and Restoration (River Contract) in Italian Cities</b></p>
<p>Workshop 4: Renewable Energy in Eco-Cities: examples and future potential  Case: Town of Zurich</p>	<p>Chair: <a href="#">Markus Hubbuch</a>, ZHAW, Switzerland</p> <p><a href="#">Markus Hubbuch</a> Introduction: <b>Renewable Energy in the City of Zurich: Todays situation and future potential</b></p> <p><a href="#">Helmut Vetter</a>, Switzerland: <b>Sustainable Production of Recoverable Materials and Renewable Energy from Biowaste and Sewage Gas in Zurich</b></p> <p><a href="#">Urs Baier</a>, Switzerland: <b>Energy from sewage water in Zurich</b></p> <p><a href="#">Markus Hubbuch</a>, Switzerland: <b>Geothermal Energy in Cities, possibilities in Zurich</b></p> <p><a href="#">Jürg Rohrer</a>, Switzerland: <b>Photovoltaic in Cities, potential in Zurich</b></p> <p><a href="#">Marina Escala</a>, Switzerland: <b>Small Wind turbines in Cities</b></p> <p>Podium: How can the use of renewable energy be boosted in cities? What are the restrictions and obstacles to overcome?</p>
<p>Workshop 5: Role and options for the private sector</p>	<p>Chair: <a href="#">Roland Schertenleib</a>, cewas, Switzerland <a href="http://www.cewas.ch">www.cewas.ch</a></p> <p><a href="#">Johannes Heeb</a>, Switzerland: <b>Role of the private sector for sustainable sanitation and water management</b></p> <p><a href="#">Michael Kropac</a>, Switzerland: <b>Introduction of cewas</b></p> <p><a href="#">Jose Luis Carrasco</a>: <b>Aquasis: Innovative approaches to water footprint management</b></p> <p><a href="#">Valérie Issumo</a>: <b>Prana Sustainable Water: Sustainable Water Titles</b></p> <p>Discussion: Can the private sector take a leading role in transforming today's cities into sustainable eco cities? How can new private companies with fresh and innovative ideas contribute to the transformation process? What are the main obstacles and how can they be overcome?</p>

## World Café

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In small groups gathered around tables we will get to know each other, exchange experiences and work on ideas and approaches for future Eco-Cities. Using the combined methods of "world cafe" and «Appreciative Enquiry» we will first look at the cities of today and existing positive examples within them. In the second and third step we will develop visions and designs and agree upon first steps towards future Eco-Cities.

Gunther Geller (president of IÖV, the German sister of IEES) as an experienced facilitator in this method will guide us through this process.

## Symposium fees

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Symposium fee (January 26 and 27, 2012)	CHF 250.–
Symposium fee (IEES and IÖV members)	CHF 180.–
Students (with valid student ID)	CHF 120.–
Dinner, Thursday January 26, 2012	CHF 60.–
Field trip, Saturday January 28, 2012	CHF 55.- to 70.– *

\*: Max. 25 participants possible. Price depends on number of participants, incl. transportation and entrance fee, excluding lunch

The symposium fee includes documentation, coffee and snacks during breaks, and lunch on Friday January 27, 2012. Booking of separate days is not possible.

You will receive a bill according to your registration.

## Accommodation

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Accommodation is not included in the symposium fee. A list of hotels and hostels in and around Waedenswil is available at <http://www.iunr.zhaw.ch/iees2012>

## Registration

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Please register online at <http://www.iunr.zhaw.ch/iees2012>.

Your registration is only valid after confirmation by the conference secretariat.

## Venue

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The Symposium is to be held at the Institute of Natural Resources Science in Waedenswil, which belongs to the Zurich University of Applied Sciences ZHAW.

Waedenswil is a picturesque town of about 20.000 inhabitants on the south shore of the Lake of Zurich. The Grüental Campus, where the symposium takes place, can be easily reached by public transport.

Please check <http://www.lsfm.zhaw.ch/en/lsfm/about-us/locations.html> for information on how to find the campus Grüental at Waedenswil.



Campus Grüental of ZHAW Waedenswil, overlooking the Lake of Zurich

## Contact

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### Conference secretariat:

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