



REGIONÁLNE ENVIRONMENTÁLNE CENTRUM  
Slovensko

**Summer School:  
ADAPTIVE GOVERNANCE: SPATIAL, TEMPORAL AND CULTURAL CONSTRAINTS  
AND OPPORTUNITIES**

*June 22<sup>nd</sup> – July 5<sup>th</sup>, 2013 Budapest (Hungary), Bratislava (Slovakia)*

**1<sup>ST</sup> MODULE IN BRATISLAVA (JUNE 22<sup>ND</sup> - 25<sup>TH</sup>, 2013):**

**ADAPTIVE GOVERNANCE IN URBAN AREAS: GREEN AND BLUE INFRASTRUCTURE**

**Venue: Comenius University in Bratislava, Faculty of Natural Sciences, Bratislava, MI. dol.**

**Sunday program incl. registration (June 23, 2013): Pavilion B2 - 333 (Dept. of Landscape Ecology)**

**Program on Monday and Tuesday: Presentation Centre of J. A. Komenský – AMOS (Pavilion B1)**

**Organisers:**

*Faculty of Natural Sciences Comenius University in Bratislava, Centre for Transdisciplinary Study of Institutions, Evolutions and Policies (CETIP) in Bratislava and Centre of Excellence SPECTRA Bratislava*

**Resource faculty:**

*Prof. Jiřina Jílková (University of J. E. Purkyně, Ústí nad Labem, Czech Republic, CETIP)*

*Prof. Ruben Mnatsakanian (Central European University, Budapest, Hungary)*

*Prof. Maroš Finka (Centre of Excellence SPECTRA, Bratislava, Slovakia, CETIP)*

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**Organising team:** *MSc. Erika Igondová, MSc. Barbora Slabeciusová, Mgr. Jana Škvarková, Faculty of Natural Sciences, Comenius University in Bratislava, Slovakia*

The Summer School – the 1<sup>st</sup> Module – is hosted by EC Tempus Project No. 511390: Environmental Governance for Environmental Curricula at the Faculty of Natural Sciences, Comenius University in Bratislava, Slovakia and is organized in co-operation with the Centre for Transdisciplinary Study of Institutions, Evolutions and Policies (CETIP) in Bratislava, Slovakia, Centre for Excellence Spectra+ in Bratislava, Slovakia and other partners' organisations (University J. E. Purkyně, Ústí n. L., Czech Republic Central European University in Budapest, Hungary, Regional Environmental Centre, Slovakia and Bratislava City Hall, Slovakia).

**Applicants:** The Autumn School is open to the PhD students, post-docs, young teachers and scientists from all Tempus partners' institutions (Tempus Project No. 511390: Environmental Governance for Environmental Curricula) and from other invited institutions. Maximum number of participants: 20-25 (requirements: knowledge of English language, basic knowledge of governance principles).

## Final program of the Summer School – 1<sup>st</sup> Module in Bratislava (June 22<sup>nd</sup> – 25<sup>th</sup>, 2013)

### **Adaptive Governance in Urban Areas: Green and Blue Infrastructure**

**June 22-23, 2013 (Saturday – Sunday)** Arrival of participants

**June 23, 2013 (Sunday) Afternoon program: 14.00-17.00 - Pavilion B2 – 333 (Dept. of Landscape Ecology)**

- 14.00-14.45 Registration
- 14.45-15.30 Introductory lecture to the content of the 1<sup>st</sup> module “Environmental Governance in Urban Areas: Green and Blue Infrastructure”, explanation to recommended readings and discussion on the whole program (*M. Kozová*)
- 15.30-16.15 Overall approach in integration of climate change adaptation issues into regional planning and development – introduction and examples (*Z. Hudeková*)
- 16.15-17.00 Discussion of participants in small groups and final round table discussion (*moderated by M. Kozová and Z. Hudeková*)

**June 24, 2013 (Monday)**

**Morning program: 09.00-12.30 Presentation Centre of J. A. Komenský – AMOS (Pavilion B1)**

- 09.00-09.45 Examples of case studies dealing with Green and Blue Infrastructure in cities (elaborated in 2008-2011 under the GRaBS project – Green and Blue Space Adaptation for Urban Areas and Eco Towns), including Bratislava city (*Z. Hudeková and M. Kozová*)
- 09.45-10.30 Ecological potential and vulnerability of ecosystems in Bratislava city: examples of constraints and opportunities (*I. Belčáková and E. Pauditšová*)
- 10.30-10.45 Coffee break
- 10.45-11.45 Interactive exercise Stakeholders Analysis and Creation of the Power/Interest Grid (*M. Kozová and Z. Hudeková*)
- 11.45-12.30 Adaptive governance: principles and practice. Introduction to multi-level governance in cities (*J. Jílková, T. Kluvánková-Oravská, and M. Finka*)
- 12.30-13.30 Lunch at the Faculty of Natural Sciences of CU

**June 24, 2013 (Monday) Afternoon program: 14.00-17.00**

Excursion in the old part of Bratislava city; explanation of findings from the GRaBS project and proposals for “green” and “blue” infrastructure in Bratislava city (*Z. Hudeková and E. Pauditšová*)

**June 25, 2013 (Tuesday) Morning program: 09.00-12.30**

**Presentation Centre of J. A. Komenský – AMOS (Pavilion B1)**

- 09.00-09.30 Examples of tools for Adaptation Strategies for European cities (project of the European Commission’s Directorate General for Climate Action initiated in 2012) recommended for Bratislava city (*Z. Hudeková, M. Kozová + expert from Bratislava City Hall*)
- 09.30-10.30 Adaptation of urban areas to climate change in Europe: Challenges and opportunities for cities: discussion of participants in small groups and final round table discussion (*moderated by M. Kozová, Z. Hudeková, J. Jílková, R. Mnatsakanian T. Kluvánková-Oravská, and E. Pauditšová*)
- 10.30-11.00 Coffee break
- 11.00-12.00 Adaptation to changing governance priorities – an overview of nature reserves in USSR and Russia (*R. Mnatsakanian*)
- 12.00-12.30 **Closing of the 1<sup>st</sup> Module, Afternoon: Departure to Budapest**

## Adaptation Strategies for European Cities

Climate change is a fast-moving research area and adaptation to climate change started to be an essential component of truly „sustainable development“. Consequences of climate change are apparent significantly in urban areas in Europe e.g. in the form of rising summer temperatures and heat waves changing precipitation patterns, increasing number of extreme weather events as storms, periods of drought and floods. Cities and agglomerations with high population density, where the problem of urban heat might become most relevant, are also affected (together with coastal regions, mountain regions and regions exposed to river flooding) among the most vulnerability types of regions.

The results from the newest project “Adaptation Strategies for European Cities” initiated in 2012 by the European Commission’s Directorate General for Climate Action (DG CLIMA) will be presented in the 1<sup>st</sup> Module. The project evaluates best practice across Europe, provides guidance and tools for adaptation strategies, organises training, supports the development of urban adaptation strategies and enables cities to actively participate in developing and implementing an adaptation strategy.

We will explain results from the GRaBS (European Interreg IVC project: *Green and blue space adaptation for urban areas and eco towns*) project. A key element of the GRaBS is vulnerability, which relates to the susceptibility of elements at risk (e.g. people, buildings, green space) to climate hazards such as heat stress or flooding. The GRaBS Vulnerability and Risk Assessment Tool focuses on identification of locations characterised by high vulnerability, which when exposed may be at high risk from climate change impacts, in order to develop and implement adaptation actions for them.

## Recommended readings:

### Adaptive Urban Governance:

Birkmann, J. Garschagen, M., Kraas, F., Quang, N. (2010), *Adaptive Urban Governance: New Challenge for the Second of Urban adaptation Strategies to Climate Change*. *Sustain. Sci*, 5, pp. 185–206. Available from <http://ihdp.unu.edu/file/get/10637.pdf>

### Environmental Governance in Urban Areas: Green and Blue Infrastructure:

Kingston, R. and Cavan, G. (2011) GRaBS (*Green and blue space adaptation for urban areas and eco towns*) Assessment Tool User Guidance, University of Manchester. Available from [http://www.grabseu.org/membersArea/files/GRaBS\\_AssessmentTool\\_UserGuidance.pdf](http://www.grabseu.org/membersArea/files/GRaBS_AssessmentTool_UserGuidance.pdf)

### Examples of case studies dealing with Green and Blue Infrastructure in cities (elaborated in 2008-2011 under the GRaBS project – Green and Blue Space Adaptation for Urban Areas and Eco Towns), including Bratislava city:

Kazmierczak, A., Carter, J. (2010), *Adaptation to climate change using green and blue infrastructure. A database of case studies*. Database was prepared for the Interreg IVC GRaBS project. Available from: [http://www.grabseu.org/membersArea/files/Database\\_Final\\_no\\_hyperlinks.pdf](http://www.grabseu.org/membersArea/files/Database_Final_no_hyperlinks.pdf)

### Examples of tools for Adaptation Strategies for European cities (project of the European Commission’s Directorate General for Climate Action initiated in 2012):

EEA/EC (2012), *Climate-adapt*, European Environmental Agency and European Commission, Available from <http://climate-adapt.eea.europa.eu> (on-line)

European Environmental Agency (2012), *Urban adaptation to climate change in Europe. Challenges and opportunities for cities together with supportive national and European policies*. Copenhagen. Available from <http://www.eea.europa.eu/publications/urban-adaptation-to-climate-change>

An EU Strategy on adaptation to climate change, Brussels (2013), 16.4.2013 COM(2013) 216 final. Available from [http://ec.europa.eu/clima/policies/adaptation/what/documentation\\_en.htm](http://ec.europa.eu/clima/policies/adaptation/what/documentation_en.htm)