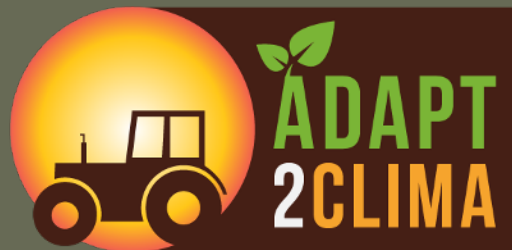


2nd International Conference



24-25 June 2019, Heraklion, Crete, Greece

THE ROLE OF MUNICIPALITIES IN SUCCESSFUL IMPLEMENTATION OF ADAPTATION PLANS - SUPPORTING TOOLS & FUNDING OPPORTUNITIES

G. Konstantzos, D. Malamis, K. Moustakas, M.
Loizidou

Konstantzos George, NTUA



Tuesday, 25.06.2019

Introduction

Climate change is likely to influence almost all components of cities and towns – their environment, economy and society.

Besides mitigation, on which efforts have been largely focused in the past, cities today play a larger role in **adaptation**.



Cities have to **assess vulnerability** to climate change impacts and to identify **corresponding plans**.

However, this **raises new, complex**

Introduction

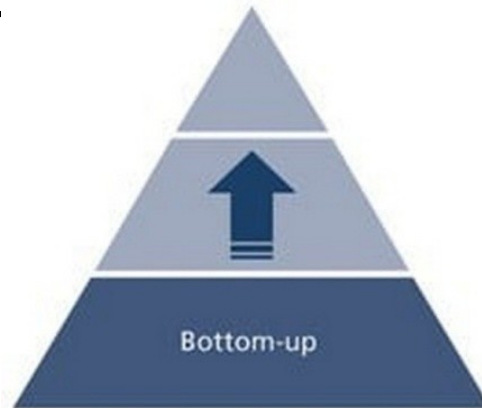
National and Regional Adaptation plans are necessary to establish a framework, targets, to promote cohesion or set priorities.

However, the impacts of climate change experienced by cities and towns, **differ based on their geographical location** and their **specific vulnerabilities** – Thus a **‘place-based’** approach to climate change analysis and adaption is needed.

Municipalities should play today **a major role** in adaptation and focus on the development and implementation of **Local Adaptation Plans**.

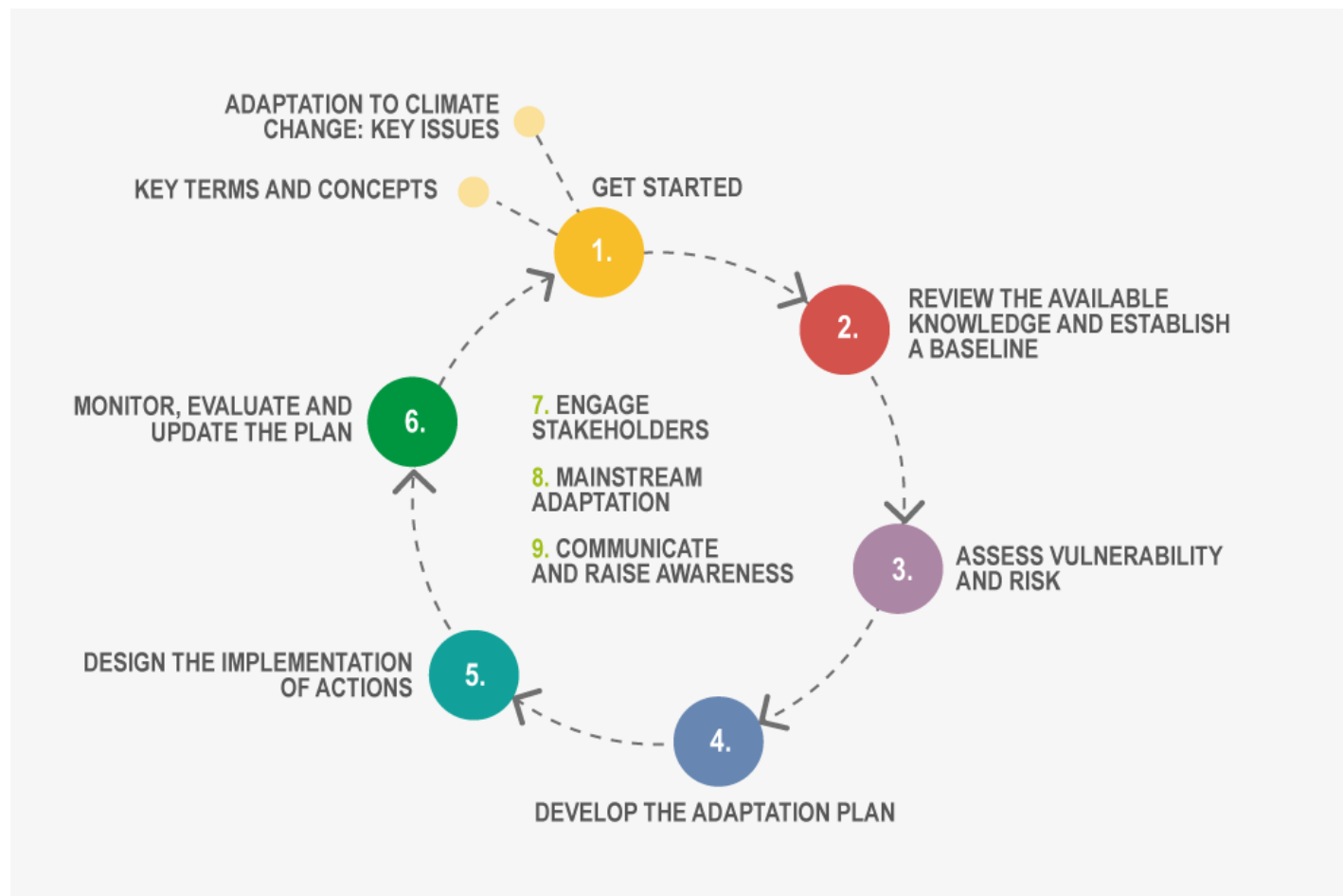
Bottom-up approach

The idea of the executing municipality, that only executes orders from the national or regional level, is **ineffective**.



Vulnerability assessments and adaptation measures should be based on **local expertise & needs**

Local Adaptation Plans



Adopted from: Life ACT – Adapting to Climate change in Time

Advantages

- ✓ Municipalities **know their local need problematic areas**, thus plans are more likely to succeed.
- ✓ A bottom-up approach will **help local government access funds** from instruments and development banks, which are increasingly available to municipalities that demonstrate
- ✓ **success** Municipalities can manage a **consistent monitoring & evaluation plan**, maximizing
- ✓ **the overall success** Municipalities can better understand and widely communicate the **socio-economic impacts** of climate responses.



Constraints

Municipal planning represents a key avenue for local adaptation, but it is also subject to recognised **constraints**.

1. Lack of information (*Access to information regarding vulnerability, climate impacts & adaptation measures - planning process*)

Constraints

Municipal planning represents a key avenue for local adaptation, but it is also subject to recognised **constraints**.

1. Lack of information (*Access to information regarding vulnerability, climate impacts & adaptation measures - planning process*)

2. Limited resources (*Municipalities are frequently highly constrained in terms of their financial capacity*)

Constraints

Municipal planning represents a key avenue for local adaptation, but it is also subject to recognised **constraints**.

1. Lack of information (*Access to information regarding vulnerability, climate impacts & adaptation measures - planning process*)

2. Limited resources (*Municipalities are frequently highly constrained in terms of their financial capacity*)

3. Institutional constraints (*In many cases,*



Improving the knowledge base



The Copernicus Climate Change Service (C3S), which aims to provide key indicators on climate change drivers to support European adaptation and mitigation policies in urban areas.



Improving the knowledge base



The Copernicus Climate Change Service (C3S), which aims to provide key indicators on climate change drivers to support European adaptation and mitigation policies in urban areas.

The European Environment Agency's report **Urban adaptation to climate change in Europe** focuses on the state of actions in the field of urban adaptation and progress achieved.

The Copernicus Climate Change Service (C3S), which aims to provide key indicators on climate change drivers to support European adaptation and mitigation policies in urban areas.

The European Environment Agency's report **Urban adaptation to climate change in Europe** focuses on the state of actions in the field of urban adaptation and progress achieved.

The interactive **Urban Adaptation Map Viewer** on European Climate Adaptation Platform *Climate-ADAPT*, presents data on current and projected climate change affecting European cities, and data on vulnerability and adaptive capacity.



**Climate
ADAPT**

SHARING ADAPTATION
INFORMATION
ACROSS EUROPE



Improving the knowledge base



The Covenant of Mayors for climate and energy aims to increase support for local activities, provide a platform for greater engagement and networking by cities, and raise public awareness about adaptation (**Mayors Adapt**) and mitigat

The initiative introduce a first-of-its-kind bottom-up approach to energy and climate action



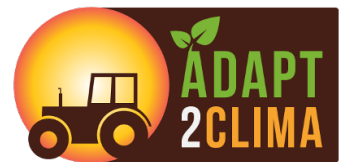
The Covenant of Mayors for climate and energy aims to increase support for local activities, provide a platform for greater engagement and networking by cities, and raise public awareness about adaptation (**Mayors Adapt**) and mitigation.

The initiative introduces a first-of-its-kind bottom-up approach to energy and climate action.



The web-based **Urban Adaptation Support Tool** developed within the framework of the Covenant of Mayors initiative, helps local adaptation practitioners to plan and implement the adaptation actions and provides access to various information resources.





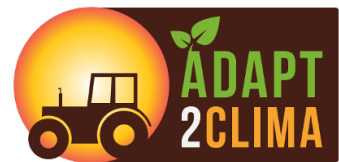
Mayors Adapt



Mayors Adapt – the Covenant of Mayors Initiative on Climate Change Adaptation, engages cities in taking action to adapt to climate change



THE COVENANT OF MAYORS INITIATIVE
ON ADAPTATION TO CLIMATE CHANGE



Mayors Adapt



- ✓ Practical support through **helpdesk**.



Mayors Adapt



- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.



Mayors Adapt



- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.
- ✓ **Guidance** material and tools, including the Urban Adaptation Support Tool, & guidance on financing local climate action.

- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.
- ✓ **Guidance** material and tools, including the Urban Adaptation Support Tool, & guidance on financing local climate action.
- ✓ A flexible **reference framework** for action, adaptable to local needs.

Mayors Adapt

- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.
- ✓ **Guidance** material and tools, including the Urban Adaptation Support Tool, & guidance on financing local climate action.
- ✓ A flexible **reference framework** for action, adaptable to local needs.
- ✓ Quick access to excellence know-how & inspiring **case studies**.

Mayors Adapt

- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.
- ✓ **Guidance** material and tools, including the Urban Adaptation Support Tool, & guidance on financing local climate action.
- ✓ A flexible **reference framework** for action, adaptable to local needs.
- ✓ Quick access to excellence know-how & inspiring **case studies**.
- ✓ Credible commitments through **progress review and monitoring**.

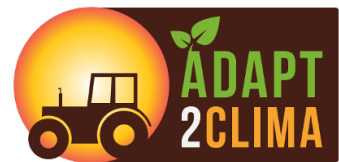
Mayors Adapt

- ✓ Practical support through **helpdesk**.
- ✓ Innovative ways to **network**, exchange experiences and build capacity through regular events, webinars or online discussions.
- ✓ **Guidance** material and tools, including the Urban Adaptation Support Tool, & guidance on financing local climate action.
- ✓ A flexible **reference framework** for action, adaptable to local needs.
- ✓ Quick access to excellence know-how & inspiring **case studies**.
- ✓ Credible commitments through **progress review and monitoring**.
- ✓ Enhanced cooperation and support from **national**

Funding opportunities

Funding opportunities for implementation of adaptation plans, vary in terms of sources (the organizations that provide the funding) and context (political, financial, institutional, etc.)

European Structural and Investment Funds	European Funding Programmes	Project Development Assistance	Financial Institutions Instruments	Alternative Financing Schemes
Cohesion Fund	CEF	EEEF	EFSI	Citizen Cooperatives
EAFRD	Horizon 2020 ▾	ELENA	Municipal loans	Crowd-funding
EMFF	JPI Urban Europe	Horizon 2020 PDA	NCFF	EPC
ERDF	LIFE	JASPERS		Green municipal bonds
ESF	Territorial Cooperation ▾			On-bill-financing
	UIA			Revolving loan funds
	URBACT			Soft loans, guarantees



EU funds



LIFE programme 2014-2020 Action Grants support adaptation-related local-level activities, such as developing policy and management approaches, improving knowledge base, mainstreaming adaptation and developing adaptation strategies, as well as the demonstration and implementation of adaptation measures.



EU funds



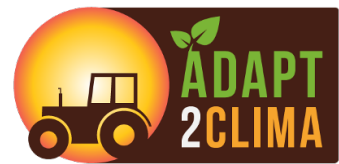
LIFE programme 2014-2020 Action Grants support adaptation-related local-level activities, such as developing policy and management approaches, improving knowledge base, mainstreaming adaptation and developing adaptation strategies, as well as the demonstration and implementation of adaptation measures.

Climate change adaptation is one of the priorities of the **Interreg Regional Development Fund** (ERDF), and foresees a minimum of 5% resource allocation to sustainable urban development. It also finances **INTERREG cooperation programmes** (cross-border, transnational and interregional) that address urban adaptation in their calls.

LIFE programme 2014-2020 Action Grants support adaptation-related local-level activities, such as developing policy and management approaches, improving knowledge base, mainstreaming adaptation and developing adaptation strategies, as well as the demonstration and implementation of adaptation measures.

Climate change adaptation is one of the priorities of the **Interreg Regional Development Fund** (ERDF), and foresees a minimum of 5% resource allocation to sustainable urban development. It also finances

INTERREG cooperation programme (cross-border, transnational and interregional) to support urban adaptation in their calls.



EU funds



Horizon 2020 is the biggest EU Research and Innovation programme ever with nearly €80 billion of funding available over 7 years (2014 to 2020).



EU funds



Horizon 2020 is the biggest EU Research and Innovation programme ever with nearly €80 billion of funding available over 7 years (2014 to 2020).

The European Investment Bank (**EIB**) considers financing integrated, sustainable urban adaptation projects via **JESSICA** programme.

JESSICA

Joint European Support for Sustainable Investment in City Areas



EU funds



Horizon 2020 is the biggest EU Research and Innovation programme ever with nearly €80 billion of funding available over 7 years (2014 to 2020).

The European Investment Bank (**EIB**) considers financing integrated, sustainable urban adaptation projects via **JESSICA** programme.

JESSICA

Joint European Support for Sustainable Investment in City Areas

Furthermore, EIB's **Natural Capital Financing Facility** (NCFF) indirectly support adaptation, since it can be applied to finance nature-based adaptation projects inside the EU. The NCFF combines EIB financing and the Commission's funding under the LIFE Programme.



National Funding Opportunities



REGIONAL PROGRAMMES have Priority Axes targeting climate change (funded by Structural Funds)

SECTORAL PROGRAMMES

- *Competitiveness, Entrepreneurship & Innovation*
e.g. Priority Axis 4.10 of Research - Create - Innovate
Action (Focus on R&D activities)

- *Transport Infrastructure, Environment and Sustainable Development*

Priority Axis 11 - Application of adaptation strategies to climate change, prevention and risk management (funded by cohesion fund).

Conclusions

- ✓ Since the impacts of climate change are experienced locally, a **'place-based'** approach is in need. **Municipalities should play a major role** in developing and implementing Local Adaptation Plans.
- ✓ **Common barriers** are:
 - Limited resources
 - Lack of information
 - Institutional constraints
- ✓ Nevertheless, there are **various initiatives and instruments** to help municipalities overcome constraints.
- ✓ There are **plenty of funding opportunities** for

Thank you for your attention.

Contact Information:

gkonsta@chemeng.ntua.gr

www.uest.gr