



MASTER ADAPT

MAInSTreaming Experiences
at Regional and local level
for ADAPTation to climate change

**GUIDELINES FOR THE IMPLEMENTATION OF
MAINSTREAMING IN METROPOLITAN CITIES
/ BRIEF VERSION**



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LIFE MASTER ADAPT – MAInSTreaming Experiences at Regional and local level
for ADAPTation to climate change - LIFE15 CCA/IT/000061

GUIDELINES FOR THE IMPLEMENTATION OF MAINSTREAMING IN METROPOLITAN CITIES / BRIEF VERSION

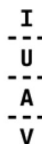
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ABSTRACT

The full version of the document is available in Italian language on Master Adapt website <http://masteradapt.eu/strumenti/>.

GUIDELINES FOR THE IMPLEMENTATION OF MAINSTREAMING IN METROPOLITAN CITIES / BRIEF VERSION

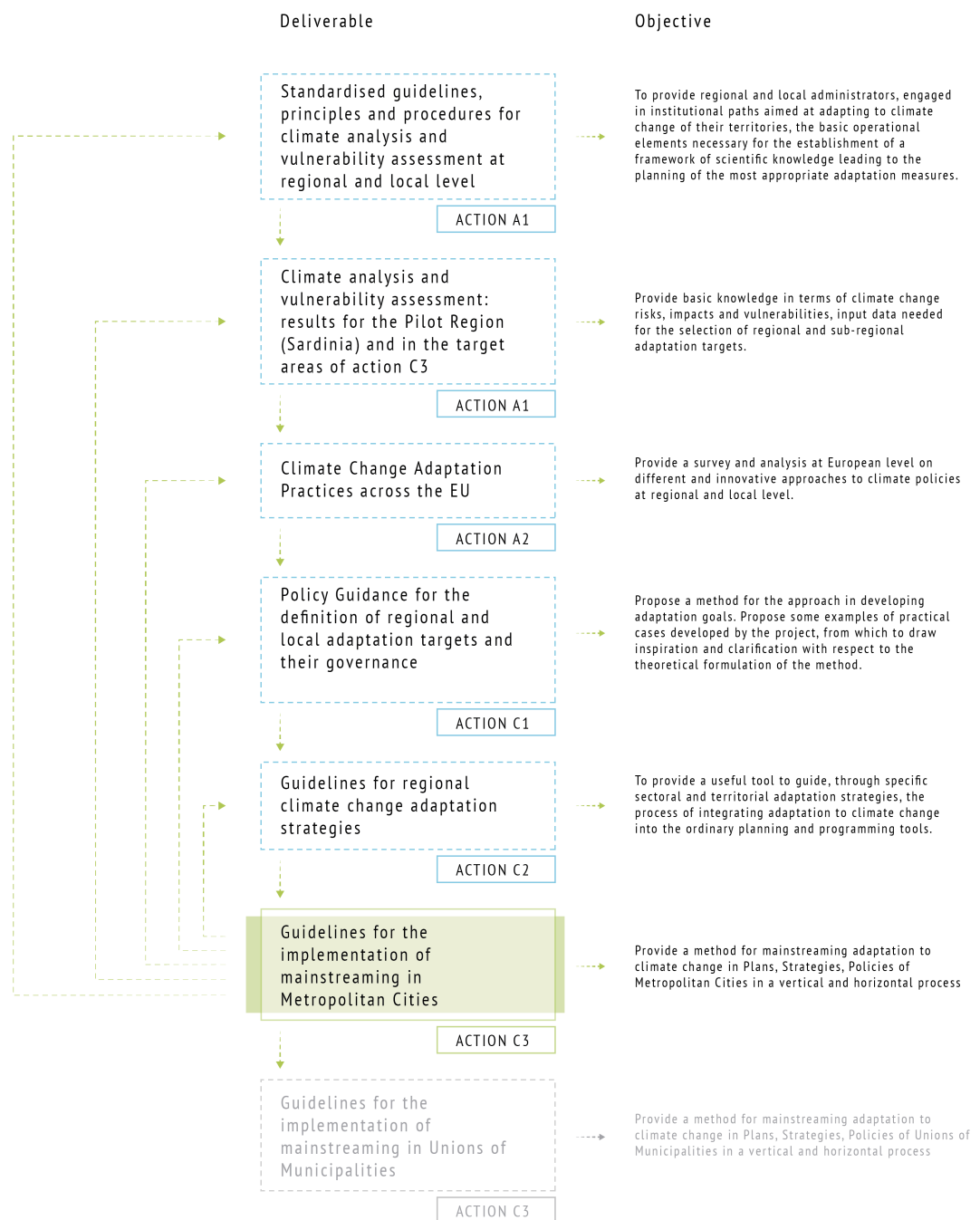


Figure 1 The "Guidelines for the implementation of mainstreaming in Metropolitan Cities" included in the LIFE Master ADAPT process

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INTRODUCTORY NOTE

This document is **mainly addressed to local administrators, technicians and officials of the Public Administrations and to the local Government Bodies** of the Metropolitan Cities.

The main purpose of the document is to **recommend**, to those who – both in technical and political roles – within these bodies, deal with spatial planning, **a method for mainstreaming the adaptation to climate change in the Plans, Strategies, and Policies of the Metropolitan Cities**, following a vertical and horizontal process.

MAINSTREAMING PROCESS

For climate change mitigation and adaptation to become sustainable and applicable on a broad scale, they must be incorporated and integrated into the policy framework of government organisations, i.e. become mainstream.

In the context of climate change, "mainstreaming" refers to including climate aspects in development programmes, management policies or strategies, in place or being implemented, rather than developing adaptation and mitigation initiatives that are activated separately.¹

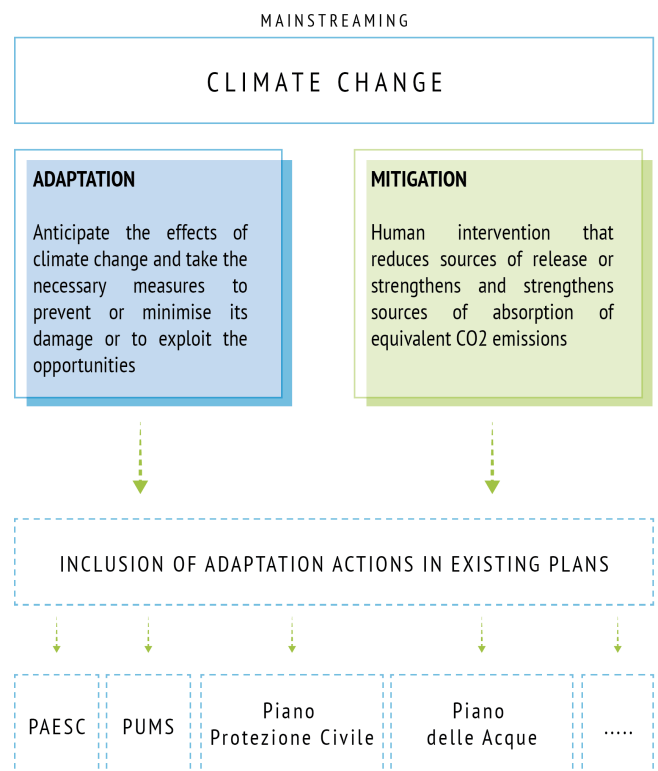


Figure 1: The mainstreaming process: how adaptation and mitigation are implemented within current plans

INTRODUZIONE

It is now proven **that climate change will have increasingly negative effects and worsen living conditions**, the ability of Cities to cope with shocks and stress due to climate change, the resilience of territories and the conservation of natural areas.

However, the actions that all the institutions and the private world have taken to counter them and prepare for them are still not enough:

¹ How to Mainstream Climate Change Adaptation and Mitigation into Agriculture Policies, 2009, by Bockel, L., FAO

in recent decades there have been many agreements and efforts to raise awareness of the risks resulting from the disruptions in the climate, but these, unfortunately, have not had enough impact on policies.

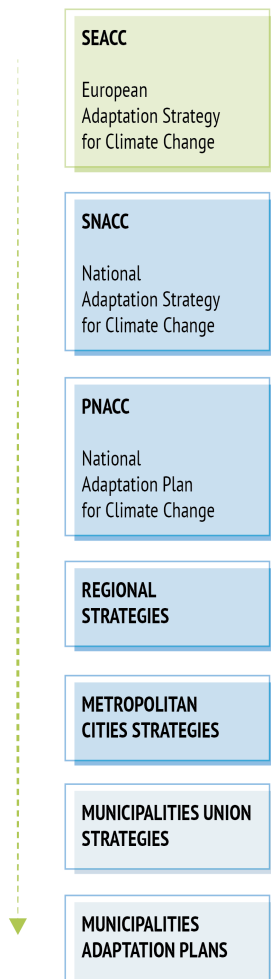


Figure 3: Scalar process of planning for adaptation

Therefore, for climate change mitigation and adaptation to become more sustainable and applicable on a broad scale, it is essential, and now a priority, that these concepts are incorporated and integrated into the Policies (Plans, Strategies and Programmes) that Administrations, at different levels, adopt or have adopted.

This implies that climate change adaptation and mitigation actions must be mainstreamed into government policymaking by including these measures in development programmes, and in management policies or strategies that have already been adopted and possibly revised, as well as in those being implemented, changing them on the fly or even developing new and more holistic adaptation and mitigation initiatives to be implemented separately.²

To respond to these needs, LIFE MASTER ADAPT involves developing methods and tools for activating a coherent and effective mainstreaming process at the level of Regions, Metropolitan Cities, and Groups of Municipalities.³

Metropolitan Cities have fulfilments that can be largely influenced, such as the annual update of **Three-year Strategic Plans for their metropolitan territory, general spatial planning** (communication structures, service and infrastructure networks that belong to the metropolitan community's competence), coordinated systems for **managing public services, transportation and road network**, promotion and coordination of **economic and social development**, and promotion and coordination of **computerization and digitalization systems**.

²How to Mainstream Climate Change Adaptation and Mitigation into Agriculture Policies, 2009, by Bockel, L., FAO

³For further details see "Policy Guidance for setting adaptation objectives and planning for adaptation at regional and sub-regional level and related governance" on masteradapt.eu/tools/

Clearly, therefore, the mainstreaming of actions to adapt to climate change can find many areas for application and policy contamination within these fulfilments.

Based on the responsibilities and peculiarities of the Metropolitan City body, these guidelines aim to provide a guide for implementing mainstreaming as an orientation process and not as yet another sectoral or higher-level instrument.

To link this document to the "*Guidelines for the regional adaptation strategy*" (C2) and the "*Guidelines for the implementation of mainstreaming in groups of municipalities*" (C3.2), we will recommend how to deal with both higher-level (regional level) and existing local government instruments.

METHODOLOGICAL NOTE: ADAPT

The key focus of this document is adaptation, "the process of adapting to the current or expected climate and its effects to limit damages or take advantage of favorable opportunities."⁴

The adaptation processes and the mainstreaming processes, by their very nature, **can be adapted, enriched, modified** at any time **according to the needs, attitudes, capacities and sensitivities of the territory and the community involved and the peculiarities of the organization that is carrying them out**, since it will subsequently have to translate the process into concrete actions capable of making the adaptation processes mainstream. The big difference between the two routes is that the mainstreaming processes will have to update/adapt the specific content of the individual steps, without structurally changing the process as a whole. This is more frequent within adaptation processes, which can completely change implementation strategies if the monitoring phases determine that there is an urgent/actual need for revising them.

GOVERNANCE OF THE MAINSTREAMING PROCESS: THE ROLE OF METROPOLITAN CITY

Metropolitan Cities (MC) were established in Italy on 8 April 2014 as a result of the National Law of 7 April 2014, replacing Provinces as large area bodies.

⁴ IPCC, 2014, <https://www.ipcc.ch/report/ar5/syr/>

Metropolitan Cities are structured as follows:

- A **Metropolitan Mayor**: usually the Mayor of the capital city;
- A **Metropolitan Council**: a second-degree elective body, with active and passive electorate among mayors and municipal councillors of the Municipalities of the Metropolitan City;
- A **Metropolitan Conference**: composed of the Metropolitan Mayor and all the Mayors of the Municipalities of the Metropolitan City.

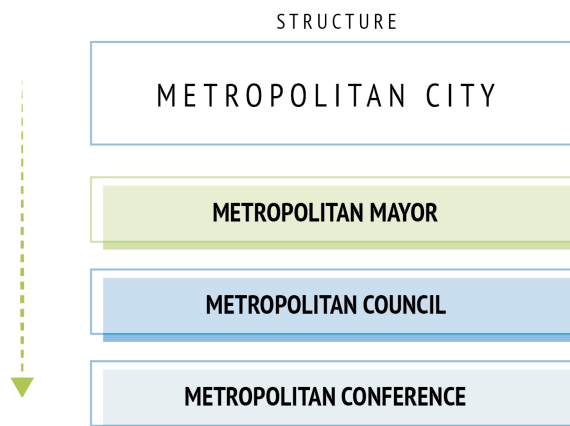


Figure 4: The structure of a Metropolitan City

Pursuant to art. 1, paragraph 85, of Law no. 56 of 7 April 2014, in force since 8 April 2014 **"the Provinces identified in paragraphs 51 to 53, as bodies with broad area functions, perform the following fundamental functions:**

- spatial planning for coordination, protection and enhancement of the environment;
- planning of transport services, authorisation and inspection in the field of private transport, consistent with the regional planning, construction and management of provincial roads and the management of related road traffic;
- provincial programming of the school network, respecting the regional programming;
- data collection and processing, technical and administrative support to local authorities;
- school building management;
- control of discriminatory phenomena in the field of employment, and promotion of equal opportunities in the territory of the province".

Metropolitan Cities must perform the basic functions of Provinces, plus the following additional functions (paragraph 44):

- adoption and annual updating of a three-year strategic plan for the metropolitan area, which constitutes a guideline for the body and for exercising the functions of the Municipalities and Groups of Municipalities included in that territory;
- general spatial planning, including communication structures, the service networks and the infrastructure that are under the responsibility of the metropolitan community, including by setting constraints and objectives for the activity and functions of the Municipalities within the metropolitan territory;
- structuring of coordinated systems to manage public services, organisation of public services of general interest in the metropolitan area;
- preparation of tender documents, contracting body documents, monitoring of service contracts and organisation of calls for bids and selection procedures (agreed with the Municipalities involved);
- transportation and road network, also ensuring the compatibility and consistency of municipal urban planning in the metropolitan area;
- promotion and coordination of economic and social development, also providing assistance and support for innovative economic and research activities consistent with the Metropolitan City's vocation as outlined in the strategic plan of the territory;
- promotion and coordination of computerisation and digitalization systems in the metropolitan area.

However, the functions assigned to the State and to the Regional Governments in the matters covered by Article 117 of the Constitution⁵ and the application of the provisions of Article 118 of the Constitution remain unaffected.

The State and the Regional Governments, each in accordance with its own responsibilities, may assign further functions to metropolitan cities to implement the principles of subsidiarity, distinctiveness and appropriateness set out in the first paragraph of Article 118 of the Constitution.⁶

As we can see, there are many competences of MC that are directly linked to the effects of climate change, both in terms of adaptation and mitigation, which is why the choice of mainstreaming in Metropolitan Cities is strategic.

Since these Guidelines are mainly designed as an orientational framework, once the context and responsibilities of the Metropolitan Authority have been defined, the governance of the process can be structured in the following ways:

- **around a coordination and guidance body;**
- **with bodies that are part of current sectors** of public administration;

⁵ www.senato.it/1025?sezione=136&articolo_numero_articolo=117

⁶ www.verso.cittametropolitana.venezia.it/competenze-e-funzioni

GUIDELINES FOR THE CONSTRUCTION OF A MAINSTREAMING ADAPTATION PROCESS IN METROPOLITAN CITIES

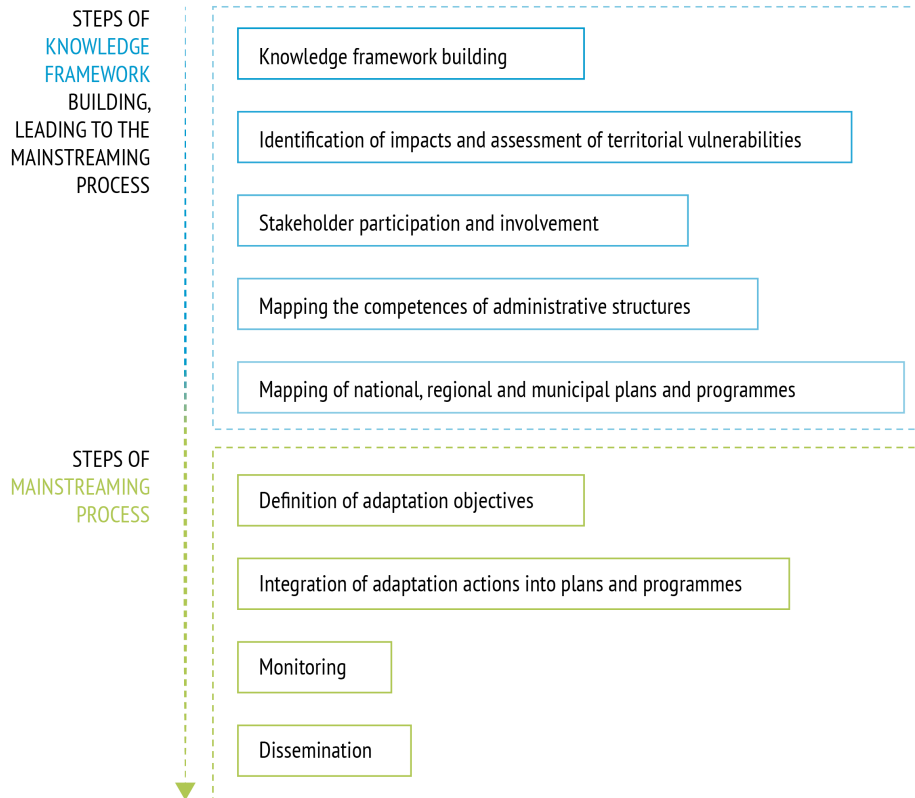


Figure5: General outline of the steps set out in the guidelines

For climate change mitigation and adaptation to become structural and structuring processes of territorial development, they must be incorporated or added to each plan or strategy that administrations, at different levels, adopt or have adopted, making the issue of climate change mainstream within the process of territorial governance.

For this purpose, the actual Support Guidelines for Metropolitan Cities for a possible mainstreaming process are presented below.

DEVELOPMENT OF THE KNOWLEDGE FRAMEWORK

Primarily, to cope with specific impacts resulting from climate change⁷, **adaptation must have profound knowledge of the territories in which it is to act, and what impacts they are facing.**

The first step of the mainstreaming process is to acquire knowledge of the territory, of the society, of the dynamics of the area in question, both by systematizing information from previous analyses and plans, and by obtaining new and updated information. Some of the most important information to obtain are, for example:

- **climate:** history of particularly relevant weather events, climate trends (weather, temperatures, winds, rainfall, etc.);
- **demographics:** population, age groups, birth rates, immigration and emigration rates, employment situation, etc.;
- **environmental context:** high value areas (SCIs, SPAs, etc.), ecological corridors, agricultural practices, etc.;
- **social and economic context:** production fabric, employment, etc.;
- **urban planning context:** the main outlook of the plans for the territory (Provincial Territorial Coordination Plans, PSs, etc.);

To do so, it is helpful to collaborate with scientific bodies, and to consult specific documentation/tools from authorized sources (e.g. IPCC reports, the Climate-Adapt platform of the European Environment Agency), together with Plans, Strategies and superordinate institutional sources, also **to initiate the participatory process of knowledge involvement** that will be described later.

IDENTIFICATION OF IMPACTS AND ASSESSMENT OF TERRITORIAL VULNERABILITIES

The framework implementation should include the **definition of impacts of climate change**⁸, i.e., the threat(s) experienced in a specific territory, the outcome of the relationship between climate, urban fabric, and urban functions⁹.

This phase is also supported by the "**Guidelines, principles, and standardised procedures for climate analysis and vulnerability assessment at regional and local Level**" document that aims to provide regional and local administrators – dealing with institutional processes aimed at adaptation to climate change in their territories –

⁷ For further information, see the Report on Action A1 "*Guidelines, principles, and standardised procedures for climate analysis and vulnerability assessment at regional and local level*" that can be freely accessed on the MASTER ADAPT project website masteradapt.eu/tools/

⁸ IPCC, 2014

⁹ Romero-Lankao et al, 2011

with the basic operational elements that are essential to define a scientific knowledge framework that can aid in planning the most advisable adaptation measures.¹⁰

These impacts can be defined as **shocks** - meaning single events, differing by territory, sporadic, even if they tend to be more intense, which impact the territory in a more severe and critical way - or as **stresses** - meaning conditions that are stable in that specific territory.

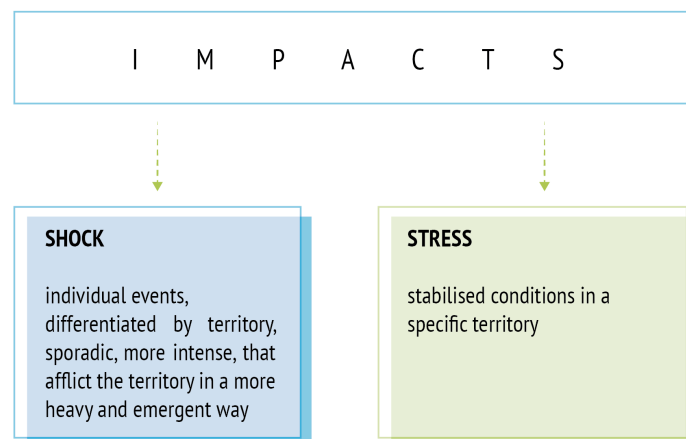


Figure 6: Difference between shock and stress

Climate impact is the result of **hazards**¹¹ and **properties of the territory**. The analysis of all these aspects defines the areas that are less resilient to impact, enabling the development and targeting of measures suitable to reduce the specific vulnerability of each territory. The main impacts of climate change in the urban environment include, for example:

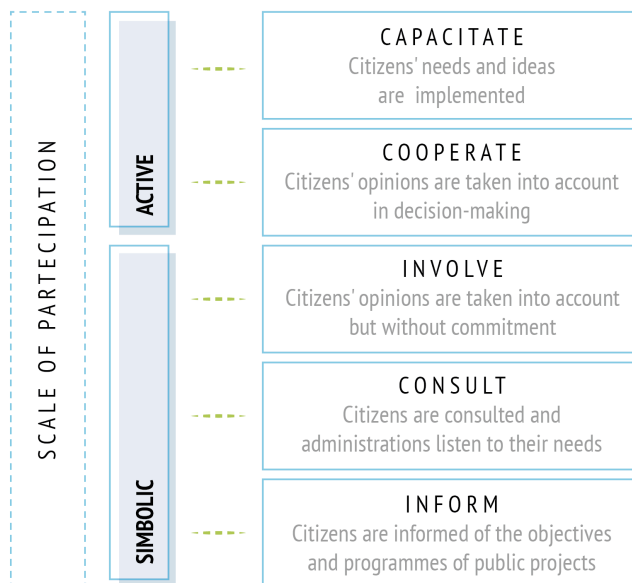
- **Impacts of urban flooding**
- **Impacts of Urban Heat Island**
- **Impacts of wind gusts**
- **Drought**
- **Fires**

Identifying the impacts to which a territory and its socio-economic fabric are most vulnerable is a fundamental step towards understanding which actions should be taken and mainly focused on. Scientific analysis of climate impacts can be carried out by gathering the **perceptions** of the local territory stakeholders affected and of the categories involved, which may or may not confirm their extent and impact.

¹⁰ masteradapt.eu/wordpress/wp-content/uploads/2018/03/MA-linee-guida-A1-1.pdf

¹¹ The potential occurrence of a natural or man-made physical event or trend or physical impact that may result in loss of life, injury or other effects on health, as well as damage and loss of property, infrastructure, livelihoods, service provision, ecosystems and environmental resources.

STAKEHOLDERS PARTICIPATION AND INVOLVEMENT



Stakeholders participation can be an **invaluable tool for improving projects and processes, making them more transparent, more educational, profoundly transformative, and leading to a more profitable collective awareness¹²** and sharing of common purpose: a successful ingredient in the planning process.

There are different levels of feasible participation, as illustrated in the figure.

Figure 7: Type and structure of the levels of stakeholder participation and involvement in a process

However, participation must be a **key principle of the mainstreaming process at all stages.**

Reaching and gaining the active participation of the greatest possible number of citizens, associations, bodies, but also sectors and offices of the proposing administration itself can help to make the mainstreaming process as multidisciplinary and cross-cutting as possible, by being able to integrate the needs of diverse populations and their different points of view.

The first step in this process and for its improvement, is **creating a list of potential stakeholders** to engage:

- **offices and sectors of its own administration;**
- **the national, regional, and metropolitan government sector;**
- **the private sector:** companies, consulting firms, foundations, etc.;
- **civil society and associations;**

¹² Mariotto A., 2018

We recommend creating a register that contains the following information:

Table 1: Pre-completed table for creating a register of stakeholders who could potentially participate in the process

	Stakeholder name	Type (public body, private body, association, etc.)	Contact person(s)	Email	Contact details	Scope of action
1						
...						
n						

Another helpful tool for the participation of the various stakeholders is a **questionnaire**, which should be prepared when defining the objectives¹³ and identifying current adaptation actions.

The questionnaire **will collect all the information needed to understand which bodies are interested in participating in the process, what knowledge and technical resources they can provide and whether the governance, planning and land management tools incorporate and include actions to enable adaptation to climate change.**

The objective is to reveal the knowledge that is stratified in the territory, starting with the players involved and their direct experience, to identify provisions and actions included in Plans, Regulations, Strategies, etc. that have a direct or indirect value for adaptation to climate change.

A recommendation for a questionnaire, to be completed for each action within the various Plans and Programmes, and sent to the various Sectors/Bodies/Associations/Stakeholders, could be the following:

Table 2: Example of a questionnaire to survey knowledge on the topic and current Plans and Programmes in each body

First name and Last name (optional)	
Name of Organization	
Email address (optional)	
In your opinion, how long has climate change (mitigation/adaptation) entered into the administration's political agenda?	<ul style="list-style-type: none"> • For over 10 years • In the last 5 years • We are now putting this issue on the political agenda • We're interested in figuring out how to put it on the

¹³For a preliminary definition of the objectives, it is possible to consult the report of Action C1 – "Policy Guidance for setting adaptation objectives and planning for adaptation at regional and sub-regional level and related governance" freely available on MASTER ADAPT's project website masteradapt.eu/tools/

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	<p>political agenda</p> <ul style="list-style-type: none"> I don't know the matter and I don't have enough information to answer the question
According to your information, has the municipal administration undertaken a process of adaptation to climate change by joining the "Covenant of Mayors for Climate & Energy" and/or "Mayor's Adapt"?	<ul style="list-style-type: none"> It joined both movements It only joined Mayor's Adapt (Only Adaptation) It began the process to join the Covenant of Mayors for Climate & Energy (Mitigation + Adaptation) It only joined the Covenant of Mayors (only mitigation) I'm not familiar with the issue
Name of the tool	
Description of the tool	Briefly describe the tool
Area of influence	<ul style="list-style-type: none"> Municipal Provincial – Metropolitan Basin – Vast Area Regional Other:
Type of measure	<ul style="list-style-type: none"> Voluntary Binding
Title of the measure	
Description of the measure	
Management Body of the Measure	
Department managing the initiative	
Expected effect	<ul style="list-style-type: none"> Reduction of impact Dispersion of the phenomenon Self-protection of citizens Speed of action and information Monitoring and mapping
State of realization	<ul style="list-style-type: none"> Planned In progress Completed
Intervention Scale	<ul style="list-style-type: none"> Project Neighbourhood Municipal Inter-municipal
Effectiveness	<ul style="list-style-type: none"> Ordinary events Extraordinary events, return time 5-10 years Extraordinary events, return time 30-50 years Extraordinary events, return time 100-300 years

In general, the mainstreaming process should make use of the involvement of different forms of knowledge in all its phases, both by using the tools described above and through coordination meetings, focus groups, workshops, conferences, seminars, etc.

MAPPING THE FULFILMENTS OF ADMINISTRATIVE STRUCTURES

The operational contribution of a public administration within a mainstreaming process is among the most relevant to substantiate the coordination and steering role.

The review of the structures/offices/sectors of the Body that can be involved into the mainstreaming process and of the related fulfilments and reference tools, is a fundamental step.

This review may allow:

- to obtain the required information more easily if needed;
- to establish easier coordination and dialogue among the various sectors, possibly also trying to schedule **regular updating and coordination meetings for a more fruitful, effective and efficient achievement of the objectives.**

Below is an example of a table to complete that could facilitate the review of those responsible for each sector. This table should be helpful to survey the representatives that in various ways and capacities could deal with adaptation for the Metropolitan City, but it could also help to obtain the same information from the Municipalities that belong to the Metropolitan Cities, for a more complete overview.

Table 3: Table to survey those responsible for each sector that could be affected by mainstreaming

	Contact person	Sector Head	Email	Contact details	Scope of action	Relevant Plans/Strategies
1						
...						
n						

MAPPING OF THE NATIONAL, REGIONAL, SUPRA-MUNICIPAL (AND MUNICIPAL) PLANS AND PROGRAMMES

The "Regulatory Framework for Adaptation to Climate Change" chapter describes the importance of the knowledge of several types of instruments related to the body to assess the state of the art concerning current actions for adaptation to climate change: **this is the main step to subsequently implement mainstreaming in the most effective and efficient way possible.** The Metropolitan Cities planning is already very structured by voluntary or mandatory, strategic or implementation instruments which, if analysed in depth, often already contain adaptation and mitigation actions.

Above all, this inventory allows **not to miss important parts of energy already introduced** in the territories by public bodies, but also by other types of bodies (subsidiary or not subsidiary companies participating in the management of the waste cycle, water and waste water, mobility, Reclamation Consortia, Water and Waste Regulatory Authorities, etc.) and which have an important potential for achieving the

general objective. The above process, which is initially simply information-gathering, will help:

- initially to **verify the extent of the resilient perspective that the territory has already settled**;
- then to **check whether there are administration sectors that are lacking in an already adaptation-oriented planning**, so as to act on these in advance, and then imagine how mainstreaming can potentially contribute with some subsequent changes across all sectors.

"Looking carefully at the variety of current sectoral plans [...] as well as at other strategic policy documents [...] will therefore provide insight into what is being done and how the climate issue can be incorporated or integrated into them" ¹⁴

This review will also help to create an initial involvement of each sector in spreading awareness of the consequences of climate change and the **actions that each sector can take to reduce risk and vulnerability, but also to make all sectors act in a coordinated manner**.

DEFINING THE ADAPTATION OBJECTIVES

The time comes to define the vision around which the mainstreaming process should be build. This analysis is recommended within a process that is divided into several steps, from preliminary analyses on climate and socio-economic conditions of the territory, up to assessments of its elements of vulnerability and resilience or adaptive capacity. This knowledge is the foundation for outlining the preliminary elements of the strategic approach, and the objectives to be achieved to provide effective responses and solutions for the territory.

One of the tools identified in literature to address the uncertainty of conditions is the use of iterative decision-making processes, such as the one described by the UK Department for Environment, Food and Rural Affairs, which recommends a cycle of steps to define flexible and shorter term actions, updated periodically by gradually adding new knowledges about the local impacts of climate change.

The **Policy Guidance produced for action C1 proposes a method for developing adaptation objectives which is divided into four logical steps**:

- understanding the goals or general purposes of adaptation;
- the definition of an overall vision for developing the territory in conditions of climate change;
- the identification of general and specific objectives;
- the recommendation of possible options to achieve the objectives.

¹⁴ Municipality of Padua, Padova Resiliente: Linee Guida per la costruzione del Piano di Adattamento al cambiamento climatico [Resilient Padua: Guidelines for Developing the Adaptation to Climate Change Plan], Padua, 2016

Also thanks to the prior mapping of the higher-level Plans, it is advisable to **check the existence and consistency of local action with the objectives of higher-level authorities**, to implement the **vertical mainstreaming** that facilitates positive effects among authorities at different scales and supports the smaller local authorities if there is a regional focus.

Whereas the objectives at a higher level – European, national, regional – can be very general, those at the Metropolitan scale **should be operational**, due to the specificity of the responsibilities they have, as seen above.

As defined in the "Policy Guidance for setting adaptation objectives and planning for adaptation at regional and sub-regional level and related governance"¹⁵ – hopefully giving rise to the participatory and listening processes mentioned earlier – the definition of the vision could go through the following steps:

- **Identification of Impacts** to counteract by defining actions;
- **Identification of Sectors** affected. The LIFE MASTER ADAPT project has identified, based on the sectors defined in the National Strategy and the National Adaptation to Climate Change Plan, those significant for the specific impacts of each pilot area;
- **Identification of the Focus Areas**: the most relevant focus areas should be identified for each sector identified.
- **Identification of Objectives**: for each focus area the most significant strategic objectives must be identified, among those identified in the PNACC, and subsequently integrated with what was found during the participative meetings planned in the related territory. They could be:
 - o **Cross-cutting objectives**: i.e. those that involve more than one, or all of the body's Plans or sectors;
 - o **Sectoral objectives**: specific to certain Plans or sectors;
- **Identification of the Options**: for each strategic objective, an initial recommendation of adaptation options should be identified, initially among those identified by the PNACC and subsequently integrated through meetings within the territory;
- **Indication of the Sector Responsible for Implementation**: the Sector that is in charge of the mainstreaming;
- **Collaboration with other possible stakeholders** among those surveyed in the registry described in the "Stakeholder participation and involvement" chapter;

¹⁵https://masteradapt.eu/wordpress/wp-content/uploads/2019/07/MA_C1_Policy_Guidance_FLA_finale_20190522.pdf

Table 4: Table for defining strategic guidelines

Impacts	Sectors	Focus Area	Objectives	Options	Sector Responsible for Implementation	Collaboration with other stakeholders

INTEGRATION OF ADAPTATION ACTIONS INTO PLANS AND PROGRAMMES

After mapping the current actions and also defining the objectives, there are, at this point, two possible situations.

1. **The body does not present actions that deal with adaptation;** in this case it may be that:
 - **The body wants to modify the actions in the Plans** with an adaptive perspective;
 - **The body wants to include new adaptation actions;**
2. **The body has several actions that deal with adaptation in its current Plans:** these can be, therefore, seen from a broad perspective, possibly made more relevant; in this case it may be that:
 - **The body wants to modify the actions in the Plans** with an adaptive perspective;
 - **The body wants to add new adaptation actions,** both because the survey showed that the current ones are not sufficient due to their quality and quantity, and because the body wants to commit itself even more on the topic, recognizing its importance;

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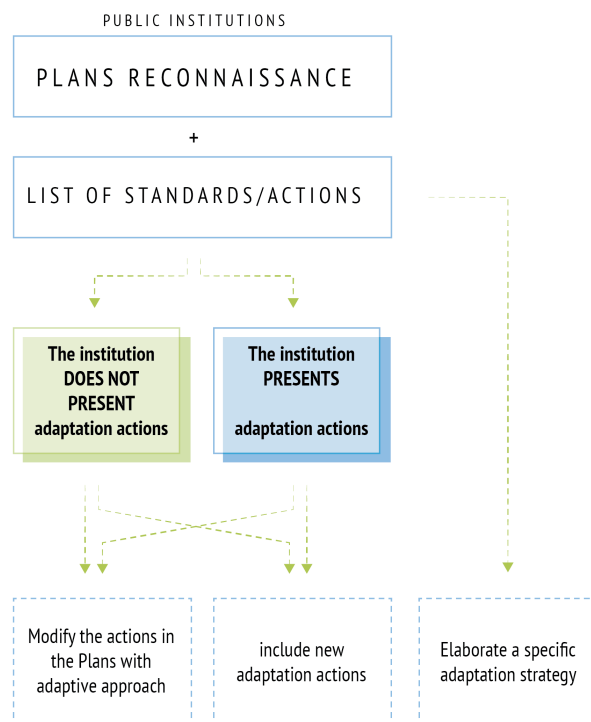


Figure 8: Operation diagram of mainstreaming for defining new actions or integrating current actions

Metropolitan Cities are higher-level bodies. Therefore, an assessment of the Plans of the Municipalities and for the Plans for which the Metropolitan Authority is responsible and the contact (UPSM, Strategic Plans, Urban Planning Tools, etc.) could be a valid addition to the current configuration.

The metropolitan approach to adaptation is fundamental for its function as a link between the regional level and the lower scale, by transposing climate scenarios, objectives, methodologies, tools and experimental innovations into spatial and sectoral planning actions.

MONITORING

This document could provide an innovative tool that overcomes the rigidity of traditional plans by defining an open, adaptive and collaborative process to create a climate-proof territory.

This process, we have seen, seeks to **set precise objectives and actions**, but **at the same time** it intends to **be flexible and adaptable** based on the body's changing needs, to the sensitivities of the administrations of the higher-level levels as well as the lower-level levels.

After performing this assessment and possibly making one of these choices, and also **based on the knowledge framework it has obtained, the vision and the objectives that have been defined**, the body may:

- **Work on existing plans**, as mentioned: **modifying current actions** with an adaptive perspective and **adding new adaptation actions**;
- **Adopt a specific Adaptation Strategy**, as we will see in the next chapter.

The impacts of climate change are constantly evolving both because of their extent, location and intensity, but also because of the nature and definition of the impacts, which can change over time. This is why **the adaptation and mainstreaming process will have to be cyclical**, going through continual audit and monitoring of results, stakeholder involvement, analysis of the effectiveness of the actions implemented, assessment of the progress towards the objectives and, if necessary, modification of current objectives and actions to make them more effective under the new conditions, and defining new strategies and new measures. The very stakeholders involved in the initial phase could therefore help to verify the state of implementation of the process.

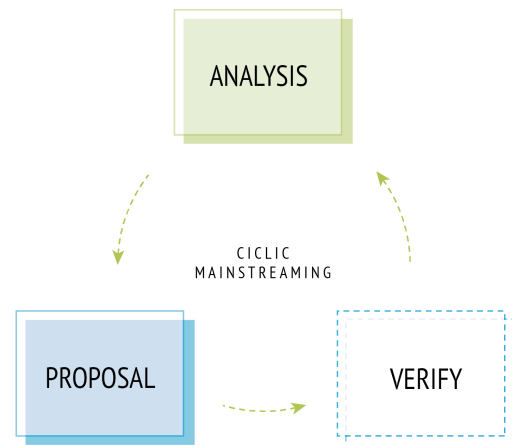


Figure 9: An example of the cyclical nature of the mainstreaming process

This is why **a periodic and circular assessment** of objectives and actions must be **defined in advance** and, if they are outdated, achieved, or no longer current, the various sectors, stakeholders, etc. must suggest new ones. This process must certainly be undertaken also thanks to a process to be initiated between the technical and political branches, thus ensuring constant dialogue and integration of actions between sectors and levels. The process must therefore:

- ensure **constant openness** so it is possible to add and review actions;
- **add sectors and impacts that had not been previously considered** and that, due to changed conditions, must be addressed;

All this is made possible by periodically and constantly monitoring to check the implementation, modification or removal of any adaptation actions that may have been implemented, the progress of mainstreaming in Plans and Programmes, adopting suitable indicators or criteria to be used to carry out this monitoring, such as those present in the PNACC,¹⁶ adapted if needed. Monitoring may be feasible:

- **at least twice a year**, through a coordination of the technical/political working group;
- **at least every two years** by means of an Intervention Report that provides an update of the state of the implementation, an update of current or planned instruments, a confirmatory or non-confirmatory analysis of the conditions and impacts and, if necessary, the definition of corrective measures.

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www.minambiente.it/sites/default/files/archivio_immagini/adattamenti_climatici/documento_pnacc_luglio_2017.pdf

DISSEMINATION

The **dissemination and communication of the intentions of the process is an important factor to raise awareness among citizens** of the metropolitan administration's effort to make the territory, networks, buildings, and communities more climate-proof.

The success of the mainstreaming process also depends to a large extent on the level of awareness of the effects of climate change in technical departments, political bodies, among stakeholders and in the population. This is why we must constantly activate and keep alive the growth and learning process in a variety of ways. This should be done both through **information tools** and through **relational and interactive methods**.

CONCLUSIONS FOR A GREATER PROCESS EFFECTIVENESS



One of the main problems of adaptation policies is that, at present, they only address the voluntary aspect (such as, for example, SEAP, SECAP, Adaptation Plan, membership in global networks such as C40¹⁷ or 100RC¹⁸, sharing cities¹⁹, etc.), left to the fate of the political will that may or may not choose to invest time, resources and personnel in making its territory more resilient to climate change.

Moreover, there is no doubt that " **an important role is played by the political body²⁰ charged with promoting and developing the process to mainstream the adaptation actions, through a technical committee and specific working groups**" and "involve stakeholders to engage civil society concerning the Plan"^{21,22}.

A key condition for launching adaptation and mitigation policies "is to have strong political support within the local authority, so that the recommendation is perceived as strategic for the authority and to have the necessary support for implementing the project. [...] Political commitment is fundamental to any subsequent step, without it the process cannot be developed. It is important to check this immediately. Once the political mandate has been obtained, the internal working group can be set up.

¹⁷ <https://www.c40.org/>

¹⁸ <https://www.100resilientcities.org/>

¹⁹ <http://www.sharingcities.eu/>

²⁰ Swart et al., 2009

²¹ Snover et al., 2007

²² Municipality of Padua, Padova Resiliente: Linee Guida per la costruzione del Piano di Adattamento al cambiamento climatico [Resilient Padua: Guidelines for Developing the Adaptation to Climate Change Plan], Padua, 2016

Each body will have its own instruments to formalize the so-called **political commitment**; it can be obtained with an official mandate from the junta or the Metropolitan Council. **And it is also essential that this moment be made official**"²³.

To implement mainstreaming more effectively and efficiently, also based on the various experiences described above, two innovations are recommended within the metropolitan administrative structure:

- The **creation of an office/coordination team dedicated to the topic**; this could be set up in various ways, depending on the resources and capabilities of the body, but also on the degree of willingness to invest in the topic. These are the possible elements:
 - o **creation of a coordination body** that meets periodically to update and organize the work;
 - o **launch of a team that deals with the issue structurally**, within public administrations;
 - o definition of a **single person** who, assisted by representatives of other sectors, coordinates the work on the topic;
- The possible definition of a real **Adaptation Strategy** capable of making the objectives set by the public administration comprehensible and organised within a single document. This is the solution, although more complex, and certainly preferable: we have seen how adaptation has a very broad and long-range potential that can be expressed in a Document and in a formal process in which it is routed to have greater authority and continuity.

Adaptation actions cannot be defined and sealed in a cumbersome instrument that has been created by a lengthy and unsupported process, nor can it be made without concrete and tangible changes to the urban fabric or verifiable results; it cannot be the heritage of a single sector of public administration, but rather it needs an instrument that guides it as cross-cutting, collective, and flexible and it must be as easy to modify as possible.

This is why **we recommend a Strategy that is not a further Plan** that risks not actually being applied because it is yet another instrument of an administration that is already overburdened with work, but rather a Strategy capable of **making the most of all the current components, precisely by mainstreaming and setting up processes, visions, objectives and actions, set out in a specific document.**

²³ Steering Committee of the GAIA project, GAIA for Cities, Guidelines for the repeatability of the GAIA urban forestation partnership, Bologna, Italy

GUIDELINES FOR THE IMPLEMENTATION OF MAINSTREAMING IN METROPOLITAN CITIES / BRIEF VERSION

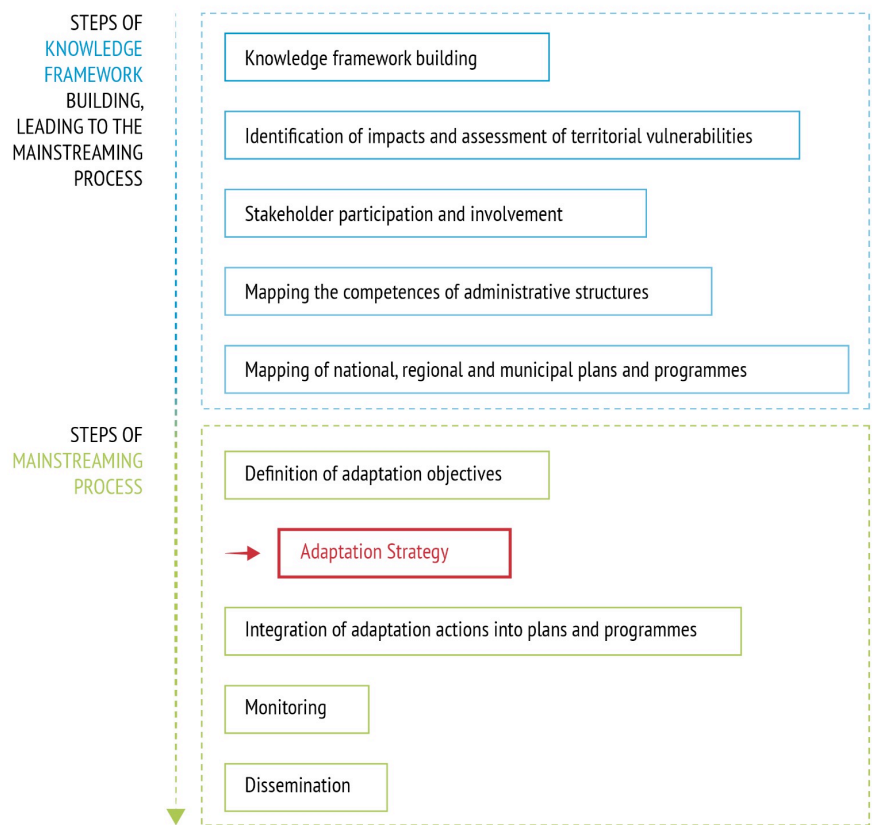


Figure 10: The process for mainstreaming focused on the possible Adaptation Strategy

NOTES



MASTER ADAPT

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at Regional and local level
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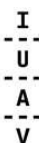
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