

Commission for the Environment, Climate Change and Energy

climate and

The impact of EU climate and energy initiatives on cities' climate transition

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List of abbreviations

CoM European Covenant of Mayors for Climate & Energy

CoR The Committee of the Regions

EGD European Green Deal

LRA Local and/or Regional authority

NZC NetZeroCities

SP3 Smart Specialisation Platform on Energy, Agri-Food and

Industrial Modernisation

Summary

In response to key EU strategies concerning environment and climate protection, including in particular the European Green Deal (EGD), and driven by growing citizens' awareness of climate and biodiversity issues, local and regional authorities (LRAs) across the EU are striving to achieve climate and energy transition, at the same time matching the particular needs of each region. Various EU-funded initiatives including cooperation platforms, supporting services and organisations strengthening political representation and green awareness, assist LRAs in their efforts.

The main objective of this study is to map climate and energy-related initiatives and assess their usefulness for the LRAs, as well as to provide recommendations for the LRAs on how to improve the functioning of the initiatives in order to make them more transparent, user-friendly and helpful for the LRAs. The assessment is made based mainly on interviews with the LRAs participating in various EU-funded initiatives and supplementary desk research. The interviews were conducted in the period January-March 2023 with two groups of stakeholders: 1) EU-level organisations; 2) representatives of cities' and regions' administrations (16 in total) which participate in multiple initiatives.

Several recommendations are drawn on the basis of our study, most of them directed to the initiatives' coordinating bodies. These include:

- Considering synergies and coordination among various existing and planned initiatives in the design phase of each initiative set-up.
- Restricting the number of similar initiatives and ensure that these align and bring added value beyond the existing initiatives.
- Simplifying the monitoring and reporting schemes and tailor them to the LRAs' needs and contexts such as size, administrative competencies, and level of progress in the climate, energy, and green transitions.
- Providing clear information regarding the scope of each initiative, target audience and what they can offer.
- Aligning the initiatives' commitments with EU law, adjusting them, if necessary, to the changing requirements and new strategies.
- Providing active and tailored support for LRAs, including personal targeted support offered by initiative secretariats.
- Providing opportunities for direct funding and for practical implementation of targeted climate and energy actions.
- Ensuring flexibilities for the implementation phase of the commitments to proactively meet the emerging challenges of LRAs.

1. Introduction

In recent years, the awareness of climate and environment-related challenges worldwide has grown considerably, which has been reflected in EU policy. The European Green Deal is the flagship EU strategy promoting among others climate neutrality, circular economy and biodiversity protection. In addition to issuing strategic guidance and legislation, the European Commission and other EU institutions provide considerable funding to support the priorities related to climate and energy transition. LRAs across the EU are striving to achieve climate and energy transition, matching the particular needs of each region. Various EU-funded initiatives including cooperation platforms, supporting services and organisations which strengthen political representation assist the LRAs in their greening efforts.

The main objective of this study is to map the EU-funded initiatives supporting climate and energy transition and to assess their usefulness for the LRAs, as well as to provide recommendations for both the initiatives and the LRAs on how to improve the functioning of the initiatives in order to make them more transparent, user-friendly and helpful for the LRAs. The assessment is made mainly on the basis of interviews with the selected stakeholders at local and regional level. Findings from these interviews are supported with desk research and interviews with a set of stakeholder organisations on EU level.

The study is organised as follows: Chapter 1 provides an overview of the study objectives and methodology. Chapters 2 and 3 provide, respectively, an overview of the identified initiatives and their mapping, including conclusions regarding the synergies, links and overlaps that can be drawn by analysing their profiles and participants. Chapter 4 summarises the feedback received during the interviews with the stakeholders. Chapter 5 provides an assessment of the impact of cities' and regions' participation in the initiatives on their environmental and climate policies. In this assessment, the feedback received from the stakeholders is combined with the results of an additional desk research including relevant reports. Finally, Chapter 6 provides policy recommendations emerging from our analysis. The study includes a set of annexes:

- Annex 1 provides the full list of the initiatives covered by the study together with additional information on each initiative;
- Annex 2 provides supplementary data for the mapping of the initiatives.

1.1 Objectives and guiding questions

The main objectives of the study are:

- To provide policy recommendations on the future development of the initiatives, and for LRAs willing to join them;
- To analyse the added value and the main burdens of the initiatives for the participating LRAs, both in terms of political and technical support;
- To assess the complementary aspects and overlaps between the different initiatives and identify potential support gaps.

The main research questions guiding this work are:

- What is the current landscape of EU climate and energy initiatives targeting LRAs? What are the main unique selling points of each initiative?
- How are these initiatives connected, how do they complement each other and where do they overlap? Is there space to streamline multiple initiatives together?
- What are the main achievements of these initiatives? What are the main impacts for the cities-related part of the initiatives? What is the impact of these initiatives on citizen involvement?

In addition to this report, which provides, to the extent possible, answers to the guiding questions indicated above, the study team has developed a set of visual materials including maps (see Chapter 3) and accompanying information/guidance – these are available on the Committee of the Regions website.

1.2 Methodology

The study relies on two main sources of evidence: 1) desk research and 2) interviews with the identified stakeholders. Regarding desk research, the overview (Chapter 2) and mapping (Chapter 3) of initiatives was mostly based on the information available on the different initiatives' websites¹. In-depth information on the cities being in focus of our study was also reviewed using desk research (Chapter 4). Additional literature sources used include progress reports for the selected initiatives as well as a few other reports devoted to the assessment of the (selected) initiatives. Consultation with key stakeholders in the selected case studies mainly feeds Chapters 4 and 5.

¹ More details on the methodology used for the mapping in Chapter 3 can be found in Annex 2.

Participants of the interviews representing the specific cities or regions were asked during the interviews to assess their participation in three selected initiatives. However, not all the interviewees felt competent to elaborate on three initiatives – some of them assessed only one or two initiatives. In our summaries of the results (Chapter 4 and 5), 'one response' means a single assessment of a given initiative.

1.2.1 Approach and selection of case study examples

Following the CoR's recommendations, the study team carried out interviews with 16 representatives of cities and regions being parts of various initiatives. These are presented in the map below.



Figure 1. Overview of case studies

Source: Authors' elaboration

Among the selected 16 cities/regions, 10 were selected for in-depth case studies – these are indicated on the map in larger green markers. National experts working at Milieu were mobilised for this work. For the case studies, in addition to carrying out interviews aimed at the assessment of the EU-supported initiatives in which the stakeholders participate, the study team conducted additional desk research, and included the following information:

- Background information about the city/region, including size and location;
- A full list of relevant initiatives that the city/region participates in;
- Strategic goals of the city/region related to the climate and energy transitions and a short description about its main climate and energy policies and challenges;
- Main decisions and projects that the city/region has taken up or implemented, which correspond with the ambitions of the initiatives it participates in for example, if it has adopted a climate neutrality goal.

Table 1 below provides a summary of the background information and participation in the EU initiatives concerning the nine cities/regions being subject to the case studies.

Table 1. Background information about the ten cities/regions selected for the case studies and their participation in initiatives

Name	Size	Associated initiatives
Leuven	56 km ²	European Covenant of Mayors for Climate & Energy
(BE)	102 000	European Green Leaf Award
	inhabitants	EU Mission for Climate-Neutral and Smart Cities by 2030
Prague	496 km^2	European Covenant of Mayors for Climate & Energy
(CZ)	1.3 million	URBACT
	inhabitants	EU Mission for Climate-Neutral and Smart Cities by 2030
Mannheim	145 km^2	EU Mission for Climate-Neutral and Smart Cities by 2030 Intelligent
(DE)	326 000	Cities Challenge
	inhabitants	The Cities' Energy Saving Sprint, a joint initiative of the European
		Commission, the European Covenant of Mayors for Climate & Energy,
		and the European Committee of the Regions
		European Covenant of Mayors for Climate & Energy
~ .		Global Covenant of Mayors
Barcelona	7 730 km ²	European Covenant of Mayors for Climate & Energy
(ES)	5 740 000	EU City Facility
	inhabitants	Energy Poverty Advisory Hub (EPAH)
Espoo (FI)	528 00	EU Mission for Adaptation to Climate Change
	km ²	EU Mission for Climate-Neutral and Smart Cities by 2030
	297 000 inhabitants	URBACT Smart Cities Marketplace
	iiiiabitaiits	European Covenant of Mayors for Climate & Energy
		Intelligent Cities Challenge
		European Capital of Innovation
		Living.eu movement
		Circular Cities Declaration
Budapest	525 km²	European Covenant of Mayors for Climate & Energy
(HU)	1.76	EU Mission for Climate-Neutral and Smart Cities by 2030
` '	million	Cities Energy Savings Sprint, a joint initiative of the European
	inhabitants	Commission, the European Covenant of Mayors for Climate & Energy,
		and the European Committee of the Regions
Cork (IE)	187 km^2	Intelligent Cities Challenge
	222 000	European Covenant of Mayors for Climate & Energy
	inhabitants	EU Mission for Climate-Neutral and Smart Cities by 2030
		European Climate Pact

Name	Size	Associated initiatives
		European Urban Initiative
		URBACT
		European Capital of Innovation
		EU Mission for Adaptation to Climate Change
	2	Sustainable Urban Mobility
Parma	260 km^2	CIVITAS
(IT)	195 000	European Covenant of Mayors for Climate & Energy
	inhabitants	EU Mission for Climate-Neutral and Smart Cities by 2030
		European Green Capital Award
		Smart Cities Marketplace Energy Poverty Advisory Hub
		URBACT
		JPI Urban Europe
Łódź (PL)	293 km²	EU City Facility
` ,	697 000	EU Mission for Climate-Neutral and Smart Cities by 2030
	inhabitants	European Covenant of Mayors for Climate & Energy
		EU Mission for Adaptation to Climate Change
		European Climate Pact
Cascais	97.4 km^2	European Covenant of Mayors for Climate & Energy
(PT)	214 000	Green City Accord
	inhabitants	EU Mission for Adaptation to Climate Change
		EU Mission for Climate-Neutral and Smart Cities by 2030
		CIVITAS
		EU City Facility

For the remaining six cities/regions (dark blue markers on the map), the study team carried out interviews. Some of these interviews have been conducted in national languages while others (for which national experts were not available) – in English. The interviews were conducted in the period January-March 2023.

Findings from these activities are presented in sections 4 and 5.

1.2.2 Consultation of EU-level stakeholders

In addition to the case studies and interviews concerning the cities/regions being in focus in the study, the written contribution has been collected from some of the main European city or region networks that work on climate and energy policies. Table 2 below presents the stakeholders contacted. The feedback from these stakeholders provided insights into the scope and usefulness of the identified initiatives as well as about the overlaps and synergies among them. They also provided general information regarding challenges and lessons learned on the ground with respect to the participation of LRAs involved.

Table 2. List of consulted EU-level organisations

Organisation	Short description and associated initiatives
Energy Cities	Major EU city network, co-coordinator of the CoM Office and EU City Facility
	and is a partner in the NetZeroCities project under the EU Mission for Climate-

Organisation	Short description and associated initiatives
	Neutral and Smart Cities by 2030. The network is also involved in other EU initiatives such as the EU Green Capital, Smart Cities Marketplace, and the EU Climate Pact.
Climate Alliance	Major EU city network, co-coordinator of the CoM Office, coordinator of the Energy Poverty Advisory Hub, and involved in the EU City Facility and Clean Energy for EU Islands.
EUROCITIES	Major EU city network, coordinator of the Green City Accord, involved in the CoM Office, involved in the Cities Mission, involved in the Green Capital/Green Leaf, among other initiatives.
FEDARENE	Regions and energy agencies network, involved in the CoM Office, EU City Facility, ManagEnergy, and the Energy Communities Repository.
ICLEI Europe	Major EU city network, involved in EU CoM Office, involved in the Cities Mission, involved in the Intelligent Cities Challenge, involved in the Circular Cities and Regions
CEMR	Represents the interests of Europe's local and regional governments and their associations. Involved in EU climate and energy initiatives, including the Green City Accord, the CoM, European Urban Initiative, URBACT, and Circular Cities and Regions Initiative.

2. EU cities and regions initiatives: an overview for local policy-makers

This chapter provides an overview of the identified initiatives related to the climate and energy transition in cities and regions. It presents first a categorisation of the initiatives according to two criteria: 1) their functionalities including types of services and 2) their main focus area. Subsequently, the chapter provides a summary mapping of the initiatives. More detailed information about each initiative is provided in Annex 1. It can also be noted that a dedicated on-line tool developed within the framework of this project provides additional guidance.

2.1 Categorisation of the initiatives

The initiatives are categorised according to the following *functionalities*, including types of services provided:

- **Platform**: initiatives may provide platforms to facilitate exchange of information, knowledge, experiences, or good practices between participants of the initiative such as through online forums, conferences/webinars, or newsletters.
- **Support mechanisms**: initiatives may offer support tools such as guidelines, templates, other material, or personal support from the secretariat.
- Access to financing and related guidance: Some initiatives offer financing, and some initiatives might not offer any financing themselves but might provide guidance with respect to the access to financing from, e.g., different EU funds, such as through insights into how to apply or matching LRAs to apply to financing common projects.
- Political incentives: some initiatives might set goals/targets, provide certifications, or organise competitions that can serve as political incentives for participants to strive towards or to encourage more stringent political decisions and can increase their visibility.
- **Interest representation**: some initiatives might seek to influence political decisions that have impact on local/regional climate and energy transitions on behalf of their participants.

These functionalities were initially identified via review of EU initiatives' websites, and by taking inspiration from academic literature and research of

transnational networks and cooperation between local authorities².

A second categorisation criterion is according to the *main focus* and themes that are covered by the initiatives. Some of the themes are grouped, which is useful for better visibility of the maps (see Chapter 3). These themes have been elaborated based on information provided on each initiative's website, and clustered according to the description below. The extensive list of themes is as follows:

- **Climate action**: These initiatives have climate action as an explicit focus. However, these may cover other themes under the main "climate action" theme such as energy and sustainable transport activities.
- **Clean energy**: These initiatives have clean energy as an explicit focus, e.g., to drive the sustainable energy transition or related to other benefits such as fighting energy poverty. While this theme is also contributing to climate actions, the tools to do so are focused on energy-related activities.
- **Green transition**: These initiatives may also focus on climate action and clean energy but have a broader and explicit focus on environmental concerns.
- **Green and digital transition**: These initiatives have an explicit focus on digital solutions to support the green transition.
- **Sustainable transport**: These initiatives focus on urban transport solutions to support the climate, environment, and/or the energy transition.
- **Circular economy**: These initiatives have circular economy as a focus, which often have climate, energy, and environmental benefits.
- Multiple-focused initiatives: These initiatives have a broader focus that goes beyond climate action, clean energy, or the green transition. Although these have sub-themes or working groups that focus on these issues, their full spectra of activities also include other actions such as health, construction, employment, or clean air.

2.2 List of the initiatives

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Table 3 provides the full list of initiatives that are covered by this study. Annex 1 offers an in-depth look at each identified initiative and its selling points or goals, and provides background information on types of participants.

² (1) Andonova, L. B., Betsill, M. M., & Bulkeley, H. (2009). Transnational climate governance. Global environmental politics, 9(2), 52-73.; (2) Bulkeley, H., Davies, A., Evans, B., Gibbs, D., Kern, K., & Theobald, K. (2003). Environmental governance and transnational municipal networks in Europe. Journal of Environmental Policy & Planning, 5(3), 235-254.; (3) Busch, H. (2015). Linked for action? An analysis of transnational municipal climate networks in Germany. International Journal of Urban Sustainable Development, 7(2), 213-231.; (4) Kern, K., & Bulkeley, H. (2009). Cities, Europeanization and multi-level governance: governing climate change through transnational municipal networks. JCMS: Journal of Common Market Studies, 47(2), 309-332.

Table 3. List of EU initiatives covered by the study

Initiative	Number of EU city/region participants	Functionalities	Main focus
CIVITAS	329	Platform; Political incentives; Interest representation; Support mechanisms	Sustainable Transport
Green City Accord	102	Access to financing; Political incentives	Green transition
Intelligent Cities Challenge	136	Support mechanisms; Access to financing; Platform	Green and digital transition
Living-in.eu movement	135	Platform; support mechanisms; Interest representation	Green and digital transition
European Covenant of Mayors for Climate & Energy	10 819	Platform; Support mechanisms; political incentives; Access to financing	Climate action; Clean energy
EU Mission for Climate-Neutral and Smart Cities by 2030	100	Platform; Support mechanisms; Access to financing; Political incentives	Climate Action
European Green Capital Award	14	Political incentives; Platform; support mechanisms;	Green transition
European Green Leaf Award	15	Political incentives; Platform	Green transition
Smart Cities Marketplace	292	Platform; Support mechanisms; Access to financing	Multiple-focused initiatives

Initiative	Number of EU city/region participants	Functionalities	Main focus
Energy Poverty Advisory Hub	34	Support mechanisms; Platform	Clean Energy
Circular Cities and Regions Initiative	37	Support mechanisms; Access to financing; Platform;	Circular economy
European Urban Initiative	No yet declared ³	Platform; Support mechanisms; Access to financing	Multiple-focused initiatives
<u>URBACT</u>	206 (in URBACT III) ⁴	Platform; Support mechanisms	Multiple-focused initiatives
NetworkNature Nature Based Solutions Platform	N/A^5	Platform; Support mechanisms	Climate Action
European Circular Economy Stakeholder Platform	N/A ⁶	Platform; Support mechanisms	Circular economy
JPI Urban Europe	37 (partner cities in the EU)	Platform, Support mechanisms	Multiple-focused initiatives
Clean Energy for EU Islands	77	Support mechanisms; Political incentives; Platform	Clean Energy
Smart Specialisation Platform on Energy, Agri-Food and Industrial Modernisation (S3P)	74	Support mechanisms; Access to financing	Multiple-focused initiatives
European Energy Efficiency Platform (E3P)	N/A^7	Platform	Clean energy
Green cities Europe	8	Support mechanisms; Political incentives; Interest representation	Green transition

The beneficiaries of this initiatives have not yet been published.
 4 206 partner cities involved in climate, energy and environmental related projects of the initiative's previous programming period, URBACT III.
 5 Information regarding specific LRA participation in this initiative was not found.
 6 Information regarding specific LRA participation in this initiative was not found.
 7 Information regarding specific LRA participation in this initiative was not found.

Initiative	Number of EU city/region participants	Functionalities	Main focus
Sustainable Urban Mobility Plan (SUMP) Award ⁸	9	Political incentives; Support mechanisms	Sustainable mobility
European Capital of Innovation (iCapital)	213	Political incentives; Access to financing	Multiple-focused initiatives
EU City Facility (EUCF)	213	Access to financing; Support mechanisms	Clean Energy
Coal regions in transition	38	Platform; Support mechanisms	Clean Energy
Affordable housing initiative	215	Support mechanisms; Access to financing	Multiple-focused initiatives
EU Mission for Adaptation to Climate Change	284	Support mechanisms; Platform; Access to financing; Political incentives	Climate Action
Big buyers for climate and environment	36	Support mechanisms; Platform	Multiple-focused initiatives
ManagEnergy	311	Support mechanisms; Platform	Clean Energy

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⁸ Award for Sustainable Urban Mobility Planning by the European Mobility Week campaign. The Award is not in use since 2021.

Citizen involvement is a key aspect in many of the initiatives listed. Many of the initiatives aim to improve the quality of life of citizens in cities, and involve citizens in decision-making processes related to urban planning, sustainability, and other issues. The European Green Capital Award and the European Green Leaf Award recognise and reward cities that have made efforts to improve their environmental performance and involve citizens in those efforts. The European Covenant of Mayors for Climate & Energy (CoM) encourages cities to engage with their citizens and stakeholders to develop and implement sustainable energy and climate action plans. The European Commission's Urban Agenda for the EU and the URBACT programme promote cooperation between Member States, cities, and other stakeholders to find solutions to major urban challenges, and involve citizens and communities in the process. The Clean Energy for EU Islands initiative aims to connect island communities and provide support for project development in the field of energy transition. The EU Mission for Adaptation to Climate Change focuses on supporting EU regions, cities, and local authorities in their efforts to build resilience against the impacts of climate change, which can directly affect citizens' lives and well-being.

2.3 Interactive overview tool

An overview of all the initiatives included in our study, together with helpful filters that facilitate navigation among those, can be found in the interactive overview available here. The tool helps LRAs and other stakeholders gain an overview of what opportunities are offered at EU level to support climate and energy transition of European cities and regions.

As shown in the figure below, the tool allows filtering function(s), topic(s) and targeted actors to enable users to find initiatives according to their interests. A brief description and some key information and links are then presented for each initiative. The tool also includes an overview table of all the initiatives together.



Figure 2. Examples from the interactive tool



3. Mapping participation by LRAs in EU cities' climate and energy initiatives

Although the EU initiatives outlined in the previous section may differ in certain aspects (such as scope, target population, themes and functionalities), they may also exhibit various synergies and complementarities. One way to gauge the extent of overlaps between these initiatives is to look at their uptake across different LRAs. By doing so, we can gain insights into how these programmes can potentially work together to achieve common objectives.

To do so, this section starts with a mapping of the participation of LRAs in EU initiatives and then delves deeper into an assessment of the overlaps. More details on the methodological approach followed can be found in Annex 2. Findings from this section will be further complemented by the more qualitative insights gathered via interviews and case studies, which will be presented in the subsequent chapter.

3.1 Mapping the initiatives

To have a sense of how widespread EU initiatives are across EU Member States, the map below shows their geographical distribution. Each dot represents a unique initiative, with LRAs participating in multiple programmes indicated by an increased density of dots resulting in darker colours.

The figure shows a high concentration of participation in several regions of Italy, and Spain, also due to the high participation to the CoM in these areas, and Portugal and in main cities in Easter European countries, such as Ljubljana in Slovenia and Budapest in Hungary. Concentration is high also in Belgium and in the Netherlands. The smaller size of those countries may contribute to this effect, but it is also the case that both Member States are particularly active towards climate and energy issues.



Figure 3. Geographical mapping of the initiatives

Source: Authors' elaboration.

Note: See Annex 2 for details on methodology and further details on the data.

To provide a more detailed analysis of the distribution of EU initiatives across Member States, one can categorise them based on their themes and functionalities As mentioned above, initiatives may differ in terms of topics they address or functionalities they fulfil. For instance, 'Clean Energy for EU Islands' and 'ManagEnergy' have a stronger focus on energy-related themes, while Horizons Missions are more concerned with climate action. Similarly, the 'CoM' shows stronger political commitment, whereas 'Energy Poverty and Advisory Hub' provide more support mechanisms.

The figures below thus provide a more nuanced view of the distribution of EU initiatives across EU Member States, by considering their themes (Figure 4) and functionalities (Figure 5). A detailed breakdown of the initiatives in the different

categories is provided in Annex 2. CoM has been kept as a separate category and coloured in grey given its strong prevalence, especially in Italian and Spanish regions.

Figure 4 shows a strong presence across all countries of initiatives with a multiple focus, while those related to clean energy appear to be particular popular in Germany, and, to a lesser extent, in the Netherlands, France and Portugal. Programmes with other focuses than the ones listed or that are more sector-specific are particularly concentrated in Eastern European countries.

Clean energy
Green transition
Climate action
Other and sector-specific
CoM
Multiple focus

Figure 4. Geographical mapping of the initiatives by theme

Source: Authors' elaboration

Note. To categorise the initiatives, we considered their main theme; however, several could fit in more than one category. See Chapter 2 for more details and Annex 2 for the detailed breakdown of the initiatives in the different categories.

Turning to the functionalities, Figure 5 shows a strong prevalence of initiatives with functionalities related to platforms, political commitment and interest

representation. Initiatives within the advisory and support cluster seem also rather widespread across Member States, while those related to awards and competition have a high concentration in Eastern and Northern European countries, such as Hungary, Poland, the Netherlands, and Denmark.

Advisory and support Awards and competition Platforms, political commitments, interest representation CoM

Figure 5. Geographical mapping of the initiative by functionality

Source: Authors' elaboration.

Note: To categorise the initiatives, we considered their main function; however, several could fit in more than one category. See Chapter 2 for more details and Annex 2 for the detailed breakdown of the initiatives in the different categories.

Lastly, to have a sense of the geographical distribution of the *main* LRAs participating in EU initiatives, the figure below shows the authorities participating in *more than five* initiatives by country. As hinted by the previous maps, there is a concentration of participation especially in Western and Southern European countries, such as Spain, Portugal, France, and Italy. Germany stands out for a surprisingly limited number of authorities with more than five initiatives. In

general, capitals are highly participative in almost all of the countries, with the exception of Ireland, Hungary and Greece.

Figure 6. Geographical distribution of LRAs participating in more than 5 initiatives



Source: Authors' elaboration

Note. Labels shown only for CoR Members. Full list of cities / regions is in Annex 2 (Table 15). Green tags stand for CoR Members – these are indicated in the Annex 2 in bold.

3.2 Overlaps between the initiatives

After looking at the geographical distribution, this section digs deeper into a preliminary assessment of the overlaps across the initiatives. To do so, we look at the extent to which LRAs have implemented initiatives simultaneously or in conjunction with one another. If two initiatives have been implemented in tandem in several authorities, this may indicate a high extent of synergies between them.

To begin with, the table below shows a general overview of how many LRAs participate in how many initiatives. It seems that the vast majority of authorities participate in only one initiative (10 004). This is mainly due to the inclusion of the CoM initiative, which is widespread across countries and encompasses a great host of municipalities or agglomeration of those. Indeed, around 94 % of those 10 004 LRAs participate only in the 'CoM' initiative. Around 550 LRAs are in two initiatives at the same time and only a limited number is participating in more than five initiatives (as hinted in the previous section).

Table 4. Distribution of LRAs participation in the identified initiatives

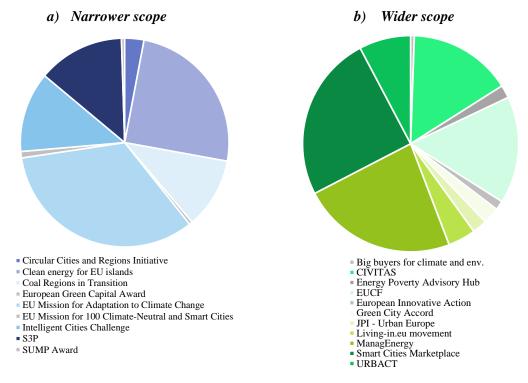
Number of LRAs	Participation in initiatives
10 004	1
554	2
154	3
66	4
55	5
29	6
17	7
15	8
11	9
10	10 and more

Source: Authors' elaboration.

As mentioned above, the vast majority of those 10 004 LRAs that are involved in only one initiative have implemented the CoM. The figures below present an overview of which other initiatives are popular among this cluster of authorities. The figure differentiates initiatives between those having a wide scope, in that they are open to several members at the same time, and those with a narrower scope in terms of target population and approach (e.g. awards, call-based initiatives, initiatives targeting a specific population as islands).

It appears that for several of those authorities participating in only one initiative, those initiatives are 'EU Mission for Adaptation to Climate Change' and 'Clean Energy for EU Islands', within the cluster with narrower scope, and 'Smart Cities Marketplace' and 'ManagEnergy', within the wider scope cluster.





Source: Authors' elaboration.

Note. European Covenant of Mayors for Climate & Energy is not included as it would have trumped the other initiatives. Around 94 % of cities / regions participating only in one initiative, participate in that initiative.

Next, we turn the outlook to those authorities participating in multiple initiatives at the same time. The figure below presents the share of LRAs that are involved in that initiative only, or together with one, two, three, or four and more initiatives. From the figure, it is evident that there are a number of initiatives that are mostly undertaken alone, with the most prominent one being 'CoM' and in particular those LRAs that joined the various commitments (2020, 2030 and 2050). As seen above, this initiative covers substantially more municipalities than the rest of the initiatives. Other initiatives often undertaken alone by authorities are 'Clean Energy for EU Islands', 'Coal Regions in Transition', and 'Smart Specilisation Platform on Energy, Agri-Food and Industrial Modernisation (SP3)'.

On the other end of the spectrum, there are several initiatives that are mostly undertaken in tandem with others, those include 'Big Buyers for Climate and Environment', 'EU Mission for Climate-Neutral and Smart Cities by 2030', and awards-based initiatives such as 'European Green Leaf Award', 'iCapital', 'SUMP Award⁹', 'European Green Capital Award' and 'Green City Accord'. LRAs that participate in those initiatives are generally also active in others. This

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⁹ Award for Sustainable Urban Mobility Planning by the European Mobility Week campaign. The Award is since 2021 not in use.

makes sense considering that most of those are one-time awards or call-based initiatives and thus do not fully cover all the needs that authorities may have in terms of climate and energy transition.

There is a last cluster that includes initiatives that are more equally distributed across the different categories. This includes initiatives such as 'URBACT', 'CIVITAS', 'Circular Cities and Regions Initiative' and 'ManagEnergy'. Those generally have a larger target population and a wider scope.

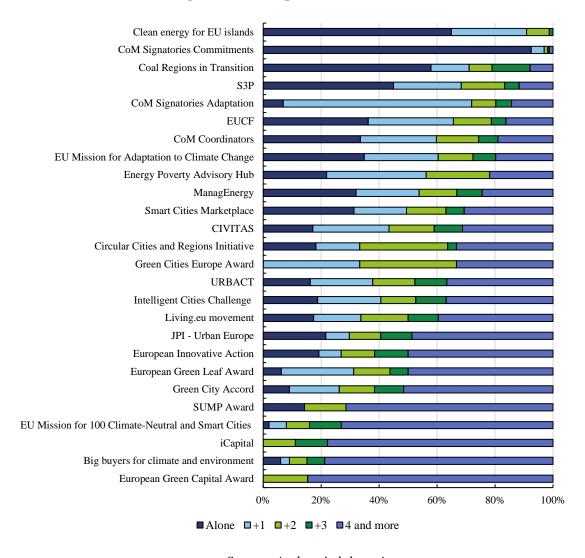


Figure 8. Overlaps between the initiatives

Source: Authors' elaboration.

Note. The initiative European Covenant of Mayors for Climate & Energy has been broken down into the signatories of commitments (2020, 2030 and 2050), the signatories of commitments to Adaptation to Climate Change strategy and the authorities acting as coordinators.

The figure above gives insights on what type of initiatives are mostly undertaken in tandem with others, but it gives no indication on what the most popular combinations are. For instance, we know that 'CIVITAS' is often implemented alongside at least one other initiative, but we do not know which initiative is most

commonly paired with it or whether it is consistently the same initiative in most cases.

To fill the gap, the figure below provides a heated matrix of overlaps. Cells coloured in darker green indicate a higher number of LRAs participating in those two initiatives at the same time. The matrix does not include the CoM commitments, to enable more overlaps to show up; a full matrix can be found in Annex 2.

The matrix shows that 'CIVITAS' is often being undertaken with a number of other initiatives, especially "URBACT', 'Smart Cities Marketplace' and 'ManagEnergy'. The latter two are also often undertaken together. Additionally, there are several overlaps between the two Horizon Missions and the latter and 'Green City Accord' and 'Intelligent Cities Challenge (ICC)'.

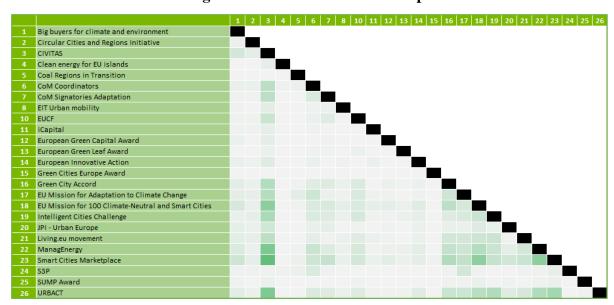


Figure 9. Heated matrix of overlaps

Source: Authors' elaboration.

Overall, the analysis presented in this Chapter shows that 'CoM' is the most prominent initiative and has a significant take up rate especially across municipalities in Italy and Spain. In addition, participation in different initiatives is particularly high among capitals, including of Eastern European countries. In the latter, initiatives that have a focus on sector-specific themes are widespread.

Lastly, while most authorities participate in only one initiative, there is also evidence of potential synergies. Those preliminary hints have to be complemented and looked at together with the more in-depth analysis provided in the subsequent chapters.

4. Case studies: EU cities and regions' experiences

This chapter first provides an introduction to the case studies that were conducted within the framework of this study. Subsequently, it presents an overview of climate and energy policies and related challenges encountered within the case studies as well as the LRA's needs and expectations regarding participation in EU energy and climate initiatives and how LRA's utilise these in practice. The chapter concludes with an evaluation of the advantages and disadvantages of the chosen EU initiatives, as expressed by the interviewed stakeholders.

4.1 Introduction to the case studies

4.1.1 City of Leuven

Country: Belgium Inhabitants: 102 122

Characteristics: KU Leuven, the largest university in Belgium, has most of is campuses in

Leuven. It is also the capital of the province of Flemish Brabant.

Main strategies related to climate and energy: Climate Action Plan 2020 – 2025. It includes plans and actions for climate mitigation and adaptation, energy, and circular economy, and includes actions regarding buildings and construction, food consumption, agriculture, and mobility¹⁰.

Climate neutrality target: Yes, 2050

Participation in EU climate- and energy-related initiatives: Seven initiatives including European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; Circular Cities and Regions Initiative; Intelligent Cities Challenge; European Green Leaf Award; European Capital of Innovation; and CIVITAS.

Initiatives assessed: European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; and European Green Leaf Award.

Assessment of the initiatives:

The European Covenant of Mayors for Climate & Energy was assessed as useful for initiating climate policy and planning. However, the initiative is less supportive regarding practical implementation. Improvements to make include more direct support from the secretariat.

The European Green Leaf Award was assessed as having a good platform for communication and exchange of knowledge between participants, and to fill the gap between strategic objectives and needs and practical implementation in smaller cities. In addition, receiving the award has been useful for visibility and setting up partnerships with stakeholders. However, there are also examples of lack of collaboration due to limited capacity of the secretariat. Thus, there are improvements to make regarding direct support from the secretariat.

The EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as good for facilitating collaboration between participants and for providing useful support services. Also, for facilitating the mobilisation of politicians and stakeholders to work towards the initiative's ambitions.

¹⁰ City of Leuven, 2020, Klimaatactieplan 2020 – 2025, Available: https://leuven.be/sites/leuven.be/files/ documents/2020-08/Klimaatactieplan GR augustus 2020.pdf

4.1.2 City of Prague

Country: Czechia **Inhabitants:** 1.3 million

Characteristics: It is the capital of Czechia, situated in the north-western region of the

country along the Vltava River.

Main strategies related to climate and energy: Prague Climate Plan 2030, which includes a carbon budget and plans and actions for sustainable energy, buildings, sustainable mobility, circular economy, adaptation to climate change, and a detailed plan on how to finance these.

The plan is to reduce CO₂ by 45 % before 2030 compared to the reference year 2010¹¹.

Climate neutrality target: Yes, 2050

Participation in EU climate- and energy-related initiatives: Five initiatives including the European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; URBACT, CIVITAS, and Smart Cities Marketplace.

Initiatives assessed: European Covenant of Mayors for Climate & Energy

Assessment of the initiative: The initiative has been essential for providing political incentives and for creating the city's climate plan to 2030, partly, with good support from the initiative's network and guidance materials and tools. Moreover, thanks to the initiative, the city has been able to access financing from third parties. However, more funding should be available to implement the climate transition. An improvement suggested was stricter monitoring of achieving the initiative's commitments.

Source: If not indicated, the information is based on interviews and desk research

4.1.3 City of Mannheim

Country: Germany Inhabitants: 325 691

Characteristics: Mannheim is the second most populous city in the state of Baden-Württemberg. As one of the urban nodes of the Trans-European Transport Network (TEN-T), Manheim benefits from its position as an important freight station and the second largest inland port in the European Union¹².

Main strategies related to climate and energy: Mannheim has a 2030 Climate Action Plan which includes a total of 81 measures in eight fields of action: energy production, industry, trade, commerce, services, land use, green and blue infrastructure, mobility, private households, and municipal administration. The 2030 Climate Action Plan was developed from June 2021 in a broad participation process together with the city administration, citizens, interest groups, local companies, politicians and academia¹³. Moreover, the Mannheim City Council passed a resolution in July 2021 designating Mannheim a Pilot City of the Local Green Deal, an incentive for Mannheim to lead the way in this area¹⁴.

¹¹ City of Prague, 2021, Prague Climate Plan 2030: Prague on the road towards carbon neutrality, Available: https://klima.praha.eu/en/the-climate-plan-at-a-glance.html

¹² Eurocities, 2023, *Mannheim*, Available: https://eurocities.eu/cities/mannheim/

¹³ Stadt Mannheim, 2022, Klimaschutz-Aktionsplan 2030 vom Gemeinderat beschlossen, Available: https://www.mannheim.de/de/presse/klimaschutz-aktionsplan-2030-vom-gemeinderatbeschlossen#:~:text=Der%20Klimaschutz%2DAktionsplan%202030%20wird,Stadtgesellschaft%20einschlie%C 3%9Flich%20Unternehmen%20und%20B%C3%BCrgerschaft

¹⁴ Stadt Mannheim, 2021, Mannheim als Pilotstadt für einen Local Green Deal, Available: https://buergerinfo.mannheim.de/buergerinfo/vo0050.asp?__kvonr=227007

Climate neutrality target: Yes, 2030

Participation in EU climate- and energy-related initiatives: Four initiatives including the European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; Intelligent Cities Challenge; and Cities Energy Saving Sprint.

Initiatives assessed: EU Mission for Climate-Neutral and Smart Cities by 2030; and Intelligent Cities Challenge.

Assessment of the initiative:

The EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as useful for facilitating tools, templates, and guidelines, as well as communication materials and a platform for exchange of knowledge. The initiative also encourages the city in its climate planning and actions and in involving citizens in the process. A concrete result is the city's 2030 climate neutrality goal, which would not have been in place without participation in this initiative. Moreover, the city has successfully used the mission label as leverage to be heard in national politics.

The *Intelligent Cities Challenge* has been useful for Mannheim in its international outreach and to accelerate the climate transition, including by involving citizens. However, it would, according to the interviewee from Mannheim, be better if the initiative was integrated with the EU mission framework.

Source: If not indicated, the information is based on interviews and desk research

4.1.4 Region of Barcelona

Country: Spain

Inhabitants: 5 704 697

Characteristics: Barcelona is a region of Spain located in the northeast of the country. It is part of the autonomous region of Catalonia and administratively divided into 311 municipalities.

Main strategies related to climate and energy: The Climate Plan of the Region of Barcelona aims to reduce energy consumption and greenhouse gas emissions as well as to increase resilience towards climate change. The plan is an action-oriented project and aims to achieve energy self-sufficiency and climate neutrality by 2030 without any direct greenhouse gas emissions¹⁵. Besides, the region has several projects in place, including a network of cities and towns towards sustainability.

Climate neutrality target: Yes, 2030

Participation in EU climate- and energy-related initiatives: Four initiatives including the European Covenant of Mayors for Climate & Energy; Energy Poverty Advisory Hub; Living.eu movement; and EU City Facility.

Initiatives assessed: European Covenant of Mayors for Climate & Energy

Assessment of the initiative:

The European Covenant of Mayors for Climate & Energy was assessed as a good tool for the region as a channel to influence the European Commission. Also, for facilitating cooperation between participants. Regarding the initiative's methodologies and support instruments, the initiative was assessed as potentially useful for facilitating guidelines and tools for the local climate and energy transition. As the methodologies are the same for all LRAs in Europe, they may be useful for some but not for others. The interviewee from the region said that the methodologies are outdated, and too rigid as the competencies of municipalities and their access to certain data are not the same across the EU. To facilitate practical implementation, the methodologies should be more adaptable to the context and type of action as well as less

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¹⁵ Diputació de Barcelona, 2023, *Què és el Pla Clima?* Available: https://www.diba.cat/es/web/pla-clima/que-es

strict on reporting requirements. Moreover, the lack of direct funding is a missed opportunity, i.e., according to the interviewee, there should be funding available to implement the plans produced under the framework of the initiative.

Source: If not indicated, the information is based on interviews and desk research

4.1.5 City of Espoo

Country: Finland Inhabitants: 297 132

Characteristics: hosting several multinational companies, including Nokia, and the second largest university in Finland, the Aalto University

Main strategies related to climate and energy: Sustainable Energy and Climate Action Plan (SECAP)¹⁶, which includes 80 measures for climate change mitigation and adaptation, including climate neutrality target and targets to reduce emissions by 80 % to 2030 compared to 1991 and bind the remaining 20 % emissions to the city's own carbon sinks¹⁷. 111 measures to achieve its climate and energy-related targets are divided into actions in the fields of energy, transport, construction, city planning, circular economy, public procurement, and climate change adaptation¹⁸.

Climate neutrality target: Yes, 2030

Participation in EU climate- and energy-related initiatives: Nine initiatives including EU Mission for Adaptation to Climate Change; EU Mission for Climate-Neutral and Smart Cities by 2030; URBACT III; Smart Cities Marketplace; European Covenant of Mayors for Climate & Energy; Intelligent Cities Challenge; European Capital of Innovation; Living.eu movement; and Circular Cities Declaration.

Initiatives assessed: EU Mission for Climate-Neutral and Smart Cities by 2030, the European Capital of Innovation (iCapital)

Assessment of the initiatives: Main benefits mentioned during the interview include access to funding, concrete tools, knowledge, peer-to-peer learning, and international visibility. Main challenges are time and resources, and capacity to process materials and prepare the necessary tools and documents. Proposed improvements include simplification and concretisation of initiative activities, personal support, direct funding, and harmonised reporting methodologies.

Source: If not indicated, the information is based on interviews and desk research

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¹⁶ City of Espoo, 2019, Sustainable Energy and Climate Action Plan (SECAP) of Espoo under the Covenant of Mayors (CoM), Available: https://static.espoo.fi/cdn/ff/IVFPqlaf1L8WqBKsXWoCg4lR1cnZJfdfrRVY87BI89c/1629719566/public/2021-08/SECAP-raportti_Espoon%20kaupunki%20%28ei%20saavutettava%29.pdf.

¹⁷ Esbo klimatvakt, 2023, *Esbos klimatmål*, Available: https://ilmastovahti.espoo.fi/sv/hiilineutraali-espoo/espoon-ilmastotavoite.

¹⁸ Esbo klimatvakt, 2023, Åtgärder, Available: https://ilmastovahti.espoo.fi/sv/actions?view=list.

4.1.6 City of Budapest

Country: Hungary **Inhabitants:** 1.7 million

Characteristics: Budapest is the capital city of Hungary with the largest population and the highest population density in the country.

Main strategies related to climate and energy: Budapest's Sustainable Energy and Climate Action Plan 2030¹⁹. The city has several climate and energy projects in place, including for buildings and facilities, public lighting, district heating, renewable energy production, industrial production, public transport, and urban mobility.

Climate neutrality target: Yes, 2050 according to national law.

Participation in EU climate- and energy-related initiatives: European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; and Cities Energy Savings Sprint.

Initiatives assessed: European Covenant of Mayors for Climate & Energy, EU Mission for Climate-Neutral and Smart Cities by 2030 (in particular, NetZeroCities²⁰); and Cities Energy Savings Sprint.

Assessment of the initiative:

The European Covenant of Mayors for Climate & Energy was assessed as useful networking, training, access to supportive services and guidance documents, as well as for finding partners necessary to access funding, also, for stimulating strategic planning and for putting the climate and energy transition at the agenda, both nationally and locally.

The *NetZeroCities* project under the EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as useful mainly for its supportive services. However, the city has not understood the general relevance or purpose of the initiative.

The Cities Energy Savings Sprint initiative was assessed as useful for gaining advice on energy efficiency projects but had a relative low impact for the city.

One overall assessment of these initiatives was that they lack funding instruments.

Source: If not indicated, the information is based on interviews and desk research

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¹⁹ City of Budapest, 2021, *Budapest fenntartható energia- és klíma akcióterve*, Available: https://budapest.hu/Documents/klimastrategia/BP klimastrategia SECAP egyeztetesi anyag.pdf

²⁰ A project that supports cities' participation in the EU Mission for Climate-Neutral and Smart Cities.

4.1.7 City of Cork

Country: Ireland Inhabitants: 222 333

Characteristics: Cork is a seaport and county-level city located in Southwestern Ireland.

Main strategies related to climate and energy:

- Cork City Council SECAP (Sustainable Energy and Climate Action Plan), adopted in 2018 to reduce greenhouse gas emissions by 43.7 % until 2030 compared to a 2011 baseline²¹.
- Cork City Council Climate Action Charter, to have the public sector leading by example towards the city's commitments to 2030²².
- Cork City Council Community Climate Action Programme 2021/2022, for capacity building and encouragement of actions among local communities²³.
- Cork City Council Climate Change Adaptation Strategy 2019-2024, to build resilience towards the effect of climate change²⁴

Climate neutrality target: Yes, 2030.

Participation in EU climate- and energy-related initiatives: Ten EU initiatives, including Intelligent Cities Challenge; European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; EU Mission for Adaptation to Climate Change; European Climate Pact; European Urban Initiative; URBACT; European Capital of Innovation; Sustainable Urban Mobility Plan (SUMP) Award; and European Green Capital Award.

Initiatives assessed: European Green Capital Award; EU Mission for Climate-Neutral and Smart Cities by 2030; and Sustainable Urban Mobility Plan (SUMP) Award.

Assessment of the initiative:

The European Green Capital Award was assessed as very important for providing criteria and guidelines for identifying gaps and preparing for a successful climate transition in the city. It was also successful in changing the mindset within the city necessary for climate actions.

The EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as important for its supportive services, access to funding, and for mobilisation of local decision-makers and stakeholders, including citizens. Suggested improvements to make include development of collaboration for a and communication instruments.

The Sustainable Urban Mobility Plan (SUMP) Award was assessed as very good as a platform for exchange of knowledge between participants. Also, for its supportive services and direct funding opportunities. In addition, the initiative has been useful for its events and workshop models, which are useful also for involving different actors in the process. Suggested improvements were the same as for the initiative above, i.e., development of existing collaboration fora and communication instruments.

Source: If not indicated, the information is based on interviews and desk research

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²¹ Cork City Council, 2018, *Cork City Council SECAP (Sustainable Energy and Climate Action Plan)*, Available: Cork City Council SECAP (Sustainable Energy and Climate Action Plan) - Cork City Council

²² Cork City Council, 2021, *Cork City Council Climate Action Charter*, Available: https://www.corkcity.ie/en/council-services/services/environment/climate-change/cork-city-council-climate-action-charter.html

²³ Cork City Council, 2021, *Cork City Council Community Climate Action Programme 2021/2022*, Available: https://www.corkcity.ie/en/council-services/services/services/environment/climate-change/cork-city-council-community-climate-action-programme-2021-2022.html

²⁴ Cork City Council, 2019, Cork City Council Climate Change Adaptation Strategy 2019-2024, Available: https://www.corkcity.ie/en/council-services/services/services/environment/climate-change/climate-change.html

4.1.8 City of Parma

Country: Italy

Inhabitants: 195 400

Characteristics: The city of Parma is located in the northern area of Emilia Romagna region, between the Po valley, the Tuscan-Emilian Apennines and the Ligurian coast. In 2021, the city won the European prize CIVITAS for its efforts towards carbon neutrality. It was also selected by the European Commission as one of the 100 cities in Europe (and 9 in Italy) to reach Climate Neutrality by 2030.

Main strategies related to climate and energy: In December 2022, the mayor declared the signature of the Climate City Contract in which actions and resources will be established to reach the objective of carbon neutrality. In June 2023, the contract will present the results of the participatory process (including public and private stakeholders in the city) that has been carried out with the aim of developing the suitable actions and measures²⁵.

Other relevant policies are:

- PUMS Piano Urbano della Mobilita' Sostenibile (action plan for sustainable mobility) approved in 2017 with the aim of improving infrastructure and demand management in order to make transportation in the city greener and more sustainable²⁶.
- PAES Piano Azione per l'Energia Sostenibile (action plan for sustainable energy), which aims to improve the energy efficiency and the use of removable energies in order to reduce emissions²⁷.
- PAIR Piano Aria Integrato Regionale (action plan to improve the quality of the air), which was adopted by the region but the actions of which trickle down to several cities, including Parma. The plan sets limits to the values of main urban pollutants and supports actions to reduce air pollution²⁸.

Climate neutrality target: Yes, 2030.

Participation in EU climate- and energy-related initiatives: Eight initiatives, including European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; CIVITAS; European Green Capital Award; Smart Cities Marketplace; Energy Poverty Advisory Hub; URBACT; and JPI Urban Europe.

Initiatives assessed: CIVITAS; EU Mission for Climate-Neutral and Smart Cities by 2030; and European Green Capital Award.

Assessment of the initiative:

CIVITAS was assessed as beneficial as a platform for exchange of knowledge and good practices, its guidelines, and for creating the city's sustainable mobility measures or improve existing ones. Improvements to make include funding opportunities, and development of its collaboration platforms and instruments for political representation towards the European Commission.

The EU Mission for Climate-Neutral and Smart Cities by 2030 was so far assessed as good for its interactive activities, guidelines, funding opportunities, and structured path to achieve climate neutrality. However, it is still a bit unclear regarding the services of the initiatives and sufficient funding to finance participation in the initiative.

²⁵ POTEnT Interreg Europe, 2022, *Parma Carbon Neutral* 2030, Available: https://projects2014-2020.interregeurope.eu/POTEnT/news/news-article/15500/parma-carbon-neutral-2030/

²⁶ Comune di Parma, 2017, *Pums - Piano Urbano della Mobilità Sostenibile*, Available: https://www.comune.parma.it/mobilita/Pums---Piano-Urbano-della-Mobilita-Sostenibile.aspx

²⁷ Comune di Parma: Parmafuturosmart, 2023, *PAES (Piano Azione per l'Energia Sostenibile)*, Available: https://parmafuturosmart.comune.parma.it/projects-archive/paes-piano-azione-lenergia-sostenibile/

²⁸ Comune di Parma, 2017, *Pums - Piano Urbano della Mobilità Sostenibile*, Available: https://www.comune.parma.it/mobilita/Pums---Piano-Urbano-della-Mobilita-Sostenibile.aspx

The European Green Capital Award was assessed as beneficial as an internal political incentive, for exchange of knowledge, and initiating collaboration with stakeholders. Also, for its support to evaluating the city's environmental performance.

Source: If not indicated, the information is based on interviews and desk research

4.1.9 City of Łódź

Country: Poland Inhabitants: 661 000

Characteristics: Łódź is situated in central Poland, it is the fourth agglomeration in terms of the number of inhabitants in Poland. It is a capital of the Łódź Voivodeship (one of 16 administrative regions in Poland). Łódź is an important transport hub in Poland, with a dense network of highways and express roads going through and around the city. It is also one of the major Polish cultural and educational centres.

Main strategies related to climate and energy:

- Environmental protection programme for the city of Łódź 2018-2021, with perspective to 2025, which will soon be updated.
- Air protection programme and plan of short-term activities for the area of Łódź, which is valid until 2026.
- Climate adaptation programme for the city of Łódź until 2030.

There are also several other important initiatives, including projects for greening public spaces, tree-planting and afforestation, implementation of blue-green concepts, smog prevention, and energy measures for renewable energy and energy efficiency.

Climate neutrality target: Yes, 2035.

Participation in EU climate- and energy-related initiatives: Five initiatives, including European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; EU Mission for Adaptation to Climate Change; EU City Facility; and European Climate Pact.

Initiatives assessed: EU City Facility; EU Mission for Climate-Neutral and Smart Cities by 2030; and European Covenant of Mayors for Climate & Energy.

Assessment of the initiative:

The *EU City Facility* was assessed as relevant for its advice and expertise as well as direct funding opportunities for energy efficiency projects and other climate- and energy actions.

The EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as underdeveloped concerning timelines, clear information, and funding. Despite many interactions, there are still no clear benefits for participating in this initiative.

The European Covenant of Mayors for Climate & Energy was assessed as beneficial as a platform to connect with other participants and attract partners for international projects. However, the initiative's support services and tools are not useful for the city.

Source: If not indicated, the information is based on interviews and desk research

4.1.10 City of Cascais

Country: Portugal Inhabitants: 212 474

Characteristics: Cascais is a coastal city and Portuguese region in the sub-region of the Lisbon Metropolitan Area, belonging to the district of Lisbon. It is subdivided into 4 parishes. Main strategies related to climate and energy: Cascais' strategic plan against climate change analyses climate scenarios, impacts and action strategies for the municipality. It was subsequently integrated into the Municipal Plan for developing the Municipality's land management and strategic planning instruments. Currently, the strategy has been reinforced with the Action Plan for Climate Change Adaptation (2017), with an update of the scenarios and a framework of the UN SDGs for the implementation of 13 measures integrated in 80 actions until 2030.

Climate neutrality target: Yes, 2050.

Participation in EU climate- and energy-related initiatives: Five initiatives, including European Covenant of Mayors for Climate & Energy; EU Mission for Climate-Neutral and Smart Cities by 2030; EU Mission for Adaptation to Climate Change; EU City Facility; Green City Accord, and CIVITAS.

Initiatives assessed: Green City Accord; European Covenant of Mayors for Climate & Energy; and EU Mission for Climate-Neutral and Smart Cities by 2030.

Assessment of the initiative:

The *Green City Accord* was assessed as good for accessing knowledge for sustainable development solutions, meet project partners and identify funding opportunities. Also, for technical support, capacity buildings, and identifying key performance indicators for the city's sustainable development. There are improvements to make regarding the initiative's online platform and the frequency of interactions.

The European Covenant of Mayors for Climate & Energy was assessed as beneficial for the exchange of low-carbon solutions and climate resilience instruments, and to meet project partners and identify funding opportunities. Also, for the initiative's technical support and commitments. Improvements to make include improved technical support and capacity building.

The EU Mission for Climate-Neutral and Smart Cities by 2030 was assessed as beneficial for the exchange climate resilience solutions, and to meet project partners and identify funding opportunities, also, for the initiative's technical support, guidance, and resilience commitments. Improvements to make relate to funding, technical support, and capacity building.

Source: If not indicated, the information is based on interviews and desk research

4.2 Overview of the case studies' climate and energy policies and related challenges

The following table presents an overview of the main climate and energy policies, challenges, as well as main decisions and projects undertaken by the cities that were selected as case studies. Despite facing several challenges, they all have energy and climate policies in place, albeit at a different advancement level.

Some main conclusions can be drawn regarding the differences between the cities:

- Climate and energy policies: All the cities have climate and energy policies in place, with commitments to reduce greenhouse gas emissions and increase sustainability. However, the specific targets, initiatives, and challenges vary between the cities.
- Carbon neutrality goals: Leuven and Barcelona aim to achieve climate neutrality by 2050, Łódź by 2035, while Mannheim, Budapest, and Espoo have set a more ambitious goal of achieving climate neutrality by 2030. Cork has set a target of reducing greenhouse gas emissions by 50 % by 2030.
- Main challenges: Mannheim and Budapest face challenges related to their heavy industry and power plant emissions, while Prague struggles with limited resources for implementing its climate policies. Cork is focused on adapting to climate change, particularly in terms of infrastructure and natural resources.
- Key initiatives: Leuven has a roadmap for achieving climate neutrality by 2050 through a variety of initiatives, while Mannheim has identified 34 high-priority measures in its 2030 Climate Action Plan. Barcelona has several projects related to renewable energy and circular economy management, while Espoo has set 111 measures to achieve its climate and energy targets.

Table 5. Overview of climate and energy policies in the cities selected for the case studies

Main climate and energy policies and	Main decisions and projects				
challenges					
Leuve	en (BE)				
Leuven has a climate action plan for 2020-2025, following the one it had from 2013-2019. The city is committed to the 20-20-20 greenhouse gas reduction targets and submitted its Sustainable Energy Action Plan to the European Commission in 2014. Leuven has taken several actions related to sustainable mobility, energy, food, circular economy, and climate adaptation.	Leuven signed the CoM in 2011 and is committed to becoming climate neutral with a variety of actions. Leuven2030, a non-profit organisation with many members including the city, the University of Leuven and other stakeholders, has set up a roadmap to achieve climate neutrality by 2050 and aims to reduce emissions significantly by				
Mannheim (DE)					
Mannheim faces a challenge in reducing greenhouse gas emissions due to its coal-fired	5				

Main climate and energy policies and challenges

power plant and heavy industrial sector. However, a study by the Wuppertal Institute suggests that Mannheim can achieve a 99 % reduction in energy-related CO₂ emissions by 2050, mainly by decommissioning the power plant and generating green electricity from solar energy, river heat pumps, waste and biomass fired heat and power plants, and wind generators. Mannheim has committed to a carbon-neutral future by launching a 2030 Climate Action Plan, which includes 81 measures developed through a broad participation process involving around 1 000 people. 34 of these measures were identified as high priority.

Main decisions and projects

transformation, as stated in the Mannheim Message (2020). Mannheim is a designated Local Green Deal Pilot City (2021) and has adopted a 2030 Climate Action Plan (2022) aiming for climate neutrality by 2030. Mannheim is also part of the ALLIANCE project (2022-2024) with Espoo and Umeå to accelerate sustainability transformation through Local Green Deals.

Prague (CZ)

Prague's Climate Plan 2030 is the main document addressing the city's policies and challenges related to climate change. The city has a dedicated website where all the policies and targets can be reviewed, including initiatives such as organic farming, waste management, sustainable transportation, and green space revitalisation. However, the main challenges facing the implementation of these policies are a lack of financial and workforce resources.

Prague's Climate Plan 2030 policies are linked to the city's participation in the CoM initiative, with the main goal being a commitment to reducing CO_2 emissions by 45 % before 2030. This is currently the city's primary focus, and an ambitious target to achieve.

Barcelona (ES)

The main policies and challenges for the Regio of Barcelona include adaptation to climate change, air pollution management, education, water environmental resources management, waste and circular economy management, and energy transition. government of the region offers various resources, services, and initiatives, including the CoM, help municipalities achieve sustainability goals. The Technical Office of Environmental Education and Promotion (OTEPA) provides programmes and services for environmental education, while the government offers services for water quality evaluation, waste management, and energy transition.

The Region of Barcelona has several projects related to climate and energy policies, such as the Climate Plan, which aims to achieve energy self-sufficiency and climate neutrality by 2030, and the Network of Cities and Towns towards Sustainability, an association of municipalities committed to sustainable development. They also have projects such as Renovables 2030, which implements renewable energies and energy communities, and Biomass pel Clima, which installs biomass boilers to promote renewable energy and reduce greenhouse gas emissions.

Espoo (FI)

The city has set 111 measures to achieve its climate and energy-related targets in the areas of Energy, Transport, Construction and City Planning, Circular Economy and Sustainable Choices, and Climate Change Adaptation.

Espoo's SECAP has 80 measures for climate change mitigation and adaptation and aims for carbon neutrality by 2030, reducing emissions by 80 % from 1991 levels and binding the remaining 20 % emissions in the city's carbon sinks.

Budapest (HU)

The main challenges to climate and energy initiatives in Hungary are the political opposition of the national government and the limited understanding of EU policymakers about the

Budapest's sustainability efforts include: energy modernisation of buildings and facilities, promoting solar development, improving the district heating system, conducting research on

Main climate and energy policies and challenges

Central-Eastern European context. The city faces challenges such as high air pollution and CO₂ emissions due to heating systems with solid fuel, limited integration of locally generated energies, and the need to build district heating systems and make public transport more energy-efficient. The city requires direct support, especially for upgrading these systems, but is unable to take out loans without the government's countersignature.

Main decisions and projects

sustainable energy management, decarbonising industrial production, developing public transport, cycling and pedestrian infrastructure, promoting low-emission vehicles and car-sharing, reducing emissions through traffic control.

Cork (IE)

The Cork City Council has a Climate Change Adaptation Strategy 2019-2024 with seven highlevel themes, including Local Adaptation Business Governance and Operations, Infrastructure and Built Environment, and Nature, Natural Resources and Cultural Infrastructure. The plan includes commitments such as increasing energy efficiency by 50 % by 2030, requiring suppliers to report their carbon footprint, and collaborating with non-profits, businesses, schools, and higher education institutions. The council will also observe, assess, and report yearly on the execution of the plan.

The Cork City Council Climate Adaptation Strategy 2019-2024 is the primary document for climate and environmental policies in Cork. The city aims to achieve net-zero emissions by 2050. Although there is no specific strategy for green public procurement yet, the plan states that it will be developed soon. The Protection Environmental Agency published a guide on this topic in September 2021, but it is unclear if Cork has adopted it. A detailed green procurement strategy for Cork is currently being developed.

Parma (IT)

Parma is one of the 100 cities in Europe recognised by the European Commission to achieve climate neutrality by 2030. The city has signed a Climate City Contract to establish actions and resources towards carbon neutrality, with results from a participatory process to be presented in June 2023. Relevant policies include a sustainable mobility plan, an action plan for sustainable energy, and an integrated regional plan to improve air quality.

Parma has implemented various projects towards climate and energy transition, such as Parma Cambia Luce and Parma Progetto Energia. It is also part of a Territorial Alliance on Carbon Neutrality and has a political strategy tool called Parma Futuro Smart. The city is evolving into a smart city under the RUGGEDISED project financed by the European Union with measures such as crafting a city vision, establishing local organisations, and collaborating with other European cities.

Łódź (PL)

Łódź is implementing various initiatives such as Green Łódź, greening of public spaces, tree planting, afforestation of outskirt areas, development of forest parks, water management, fighting smog, building renovation, energy efficiency improvement, and street lighting replacement with LED lamps.

The City of Łódź has several strategies and documents in place for climate and environmental policy, including an environmental protection programme, air protection programme, and climate adaptation programme. The city has declared a goal of climate neutrality by 2035 but acknowledges that significant financial support, including from EU funding, will be necessary to achieve this goal.

Cascais (PT)

Cascais is responding to climate change through coordinated action between services communication initiatives for the general population. Challenges include the need for climate change measures into policies, improve

Cascais Sustainable commits the 17 to Development Goals by pledging to strengthen resilience to climate-related hazards, integrate

Main climate and energy policies and challenges

coordinated cross-cutting work, non-structural actions, and inclusion of climate action in planning instruments and regulations. Nature-based solutions are identified as effective in reducing vulnerabilities, while information and capacity building are important for fostering creativity and action from the community.

Main decisions and projects

education, and promote capacity-building. Its objectives for 2030 include qualifying technicians, introducing climate solutions, and making Cascais a model of territorial sustainability. The municipality aims to implement measures such as Green Corridors, heatwave contingency plans, and legislation for bioclimatic architecture.

4.3 Needs and expectations for participating in EU initiatives

The expectations for joining an EU initiative recorded during interviews and from written feedback from LRAs are diverse and depend on the cities and regions' needs and the initiatives that the expectations relate to. However, these can serve as an indication for the qualities that LRAs are looking for when joining a new initiative and the needs that are most apparent. As presented in Table 6, the expectation that was expressed by most LRAs included in our study relates to funding, either as an expectation that the initiative will provide opportunities for direct funding, advice regarding funding, or leverage when applying for funding. The next most often expressed types of expectations concern access to supportive services and tools from the initiative to implement related strategies and planning activities, and the means to mobilise political processes both at a more general level and within the city or region.

Although general expectations were clear for the LRAs prior to joining an initiative (as reported in 13 examples mentioned by interviewees), in seven examples the expectations were unclear²⁹. This lack of clarity may be due to a lack of information or clear communication from the initiative secretariats regarding the activities of the initiatives. However, when asked about whether the initiatives have met the expectations, the interviewees reported "yes" 20 times, and "no" five times. These answers may suggest that even if the initiatives do not invoke entirely clear expectations, still they are met in the implementation phase, and that the expected services are most likely implemented by the initiatives.

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 $^{^{29}}$ Each interviewee provided assessment with respect to one, two or three specific examples of initiatives in which their city/region participates.

Table 6. Expectations for joining an EU initiative

Expected benefit	Number of related responses
Direct funding or support to gain funding	10
Support or tools for strategic planning	5
Internal mobilisation of politicians and actors	5
Gaining ideas for good practices	3
Adoption of targets to strive towards	3
Visibility and city branding opportunities	3
Exchange of information and knowledge	2
Access to concrete tools	2
Access to advice from the initiative	2

Source: Interviews and written feedback from LRAs.

4.4 How cities and regions utilise EU initiatives

While the previous section described LRAs' expectations for joining EU initiatives, and whether these were clear and if the initiatives met these expectations, the following chapter describes and discusses the actual benefits as perceived by the interviewees.

In the methodology of this report, and in the interview questions that were asked to LRAs, the study initially identified five types of functionalities or services that EU initiatives may provide to their participants:

- **Platforms** to facilitate exchange of information, knowledge, experiences, or good practices between participants of the initiative such as through online forums, conferences/webinars, or newsletters.
- **Supportive tools** such as guidelines, templates, other material, or personal support from the secretariat.
- **Financing**, either directly via the initiative or in a form of guidance to access financing.
- **Political incentives** for the local transition, for example, via goals, targets, competitions, or certifications.
- **Interest representation,** by providing channels or leverage to influencing political decisions at a higher administrative level.

These types of functionalities were confirmed by the consulted EU-level networks for cities and regions. The overall benefits related to these functionalities as recorded in the responses to the questionnaire sent to EU-level organisations differ across the different initiatives and provide additional insights. The most important *additional* benefits mentioned in relation to the predefined categories of functionalities and their descriptions as listed above are as follows:

- **Platforms:** to build relations, and for cooperation on common projects. Such platforms can also provide an opportunity for local leaders to achieve better visibility regarding green transition.
- **Supportive tools:** personal support was valued the most (as opposed to more passive forms of guidance).
- **Financing:** financing is mentioned as a key element, especially for smaller cities. Participation in some of the initiatives can serve as a precondition for receiving funding.
- **Political incentives:** In most of the initiatives, the participation is formalised by a declaration of intent or commitment, which is a public pledge to the EU institutions as well as the citizens, to work on a specific topic against a defined objective.
- **Interest representation**: The opportunity to be involved in shaping EU policies can be an incentivising element for participating in initiatives.

The interviewees representing cities and regions were also asked to elaborate and provide examples of these types of benefits and report if the initiatives play any other role, or if the cities or regions benefit from any other function of the initiatives. The following section describes how LRAs utilise the functionalities of the initiatives as included in our categorisation.

Table 7 below shows that the EU initiatives covered in this study are most often used as **platforms** for horizontal exchange of information, knowledge, and good practices, and for communicating any issues relevant for the initiative. These platforms are also used for networking, and to a lower extent for participating in trainings that are organised at the platform. The second common function used is the provisioning of **supportive tools and services**. This relates mainly to passive guiding materials concerning the initiative's ambitions and activities, but also to taking part in compilations of good practices that the initiatives have created. Less common is utilisation of active support from the initiatives such as technical support and capacity building with personal engagement from the initiative secretariats.

The third most common initiative function that is used by the LRAs that were interviewed refers to benefits regarding **funding**. In most cases, this does not relate to direct funding provided by the initiative itself. However, the interviewees reported that they find the initiatives' guidance services useful for finding or guiding among funding opportunities and in the application process. Moreover, the interviewees also found that the initiatives were useful for finding project partners for funded projects, and for using them as leverage when applying for other sources of funding, mainly as a proof that the city or region has the ambition and capacity to deliver on proposed projects.

The fourth most mentioned function used by the LRAs being part of this study is provision of **political incentives**, which are mainly used as leverage for improving and implementing new climate or energy actions, strategic documents or for introducing new monitoring indicators that are necessary for understanding the status and progress related to the energy and climate transitions.

The least most common way to use the initiatives as reported among the predefined initiative function is **interest representation**. However, many of the LRAs interviewed still use the initiatives as a means to influence decision-making at either national or EU level. Other reported ways to use the initiatives are to improve the visibility and external image of one's city or to use an initiative's commitments or models to mobilise and cooperate with local stakeholders.

Table 7. Use of the initiatives' functionalities across the approached stakeholders

Main functionality utilised	How it is utilised	Number of related responses
DI «C	Horizontal exchange of information and communication	15
Platforms	Networking	7
	Participate in trainings	1
	Guidelines, methodologies, and other materials	14
Supportive tools and services	Active support (technical, capacity building, project implementation)	7
	Presentation of good practices	2
	Guidance for finding or applying for funding	5
Funding	Direct funding	3
Tunding	Leverage for other funding sources	3
	Finding project partner for funded projects	3
Political in a select	For general impacts on local/regional decision-making and planning	6
Political incentives	For implementation of climate/energy targets	4
	For implementing new monitoring indicators	1
Interest representation	For EU/national politics	5
Interest representation	For national politics specifically	3
Visibility and city branding	To use participation in the initiative as an asset in external communication	4
Mobilising stakeholders	Initiative explicitly used as a tool to find new local collaboration methods	3

 $Source: Interviews\ and\ written\ feedback\ from\ LRAs.$

4.5 Assessment of benefits and challenges of the selected EU initiatives according to the interviewed stakeholders

The table below presents a summary of the feedback received with respect to the initiatives which were included in the assessment provided by the interviewed stakeholders. It should be noted that this table only showcases the initiatives that

the interviewees elaborated on – it is not a complete overview of all initiatives the LRAs are involved with.

The CoM and EU Mission for Climate-Neutral and Smart Cities by 2030 were covered by 10 interviewees each. The Green City Accord was discussed in two interviews, and the other initiatives mentioned by the interviewees were all discussed once.

Overall, the feedback obtained during the interviews reflects a growing interest in sustainability and environmental consciousness across various stakeholders and communities. Governments, organisations, and individuals are increasingly recognising the importance of protecting the environment and taking action to mitigate the impact of climate change. One emerging conclusion is that addressing environmental challenges requires a multi-faceted approach that involves collaboration among different stakeholders, including businesses, governments, and civil society organisations. These efforts show that many different approaches are needed to address the complex challenges of environmental protection and sustainability.

From the interviews it can be concluded that the CoM is not only one of the most popular but also one of the most positively assessed and highly regarded initiatives. The CoM has proven beneficial for cities and regions by spurring the involvement of local authorities and motivating the development and implementation of plans and steps aimed at addressing environmental, energy, and climate change issues. The CoM was one of the first initiatives in the climate and energy policy area and as time progressed, other initiatives that were more specialised and practical in terms of providing concrete tools and services got a more prominent role. The positive evaluation of the CoM as compared to some other initiatives may also be related to the fact that with the CoM, there are no consequences for non-compliance with requirements or targets that are set by some of the initiatives.

The EU Mission for Climate-Neutral and Smart Cities by 2030 is also one of the most popular initiatives, but its assessment is in general less positive than for the CoM. However, since it has been launched quite recently, its full benefits cannot be well evaluated at this stage. Regarding the remaining initiatives, no clear assessment can be provided on the basis of the opinions of the interviewed stakeholders because of an insufficient number of responses which does not allow conclusions to be drawn. More detailed comments from the specific interviews are summarised in the table below.

Table 8. Summary of the feedback received from the interviewed stakeholders with respect to the assessed initiatives

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
CIVITAS ³⁰	Platform, support services, interest representation	The initiative enables the opportunity to activate new sustainable mobility measures or improve existing ones.	It could be appropriate to provide some forms of financing, for example to participate in events.	Renew funding possibility for CIVITAS	It is an effective initiative, there is the change of joining a network of cities committed to mobility to have opportunities for comparison and exchange	
Green City Accord ³¹	Platform, support services, facilitating access to financing, goals/targets	The initiative contributes to push local politics in the right direction. It gives technical support and capacitation.	Indicators that may not be possible to collect information about in the city because of different indicator systems and/or lack of information.	Improved indicators (as some of them are unmeasurable of the city)	This initiative contributes to the green transition in Europe and uses the initiative's goals and indicators.	
Intelligent Cities Challenge ³²	Platform, support services	Giving the opportunity for the authorities to contribute their ideas to the local green deal and to presents its method and approach through an entire work package dedicated to LGDs.	The challenge is for the participants to translate the Blueprint into their city's strategy and to make sure all strategies are aligned.	Concrete tools for implementation, European alignments, and citizens more to the forefront.	This initiative offers a podium for authorities to present their work, and a catalyst to spread the word.	

Cities/regions providing feedback: Parma.
 Cities/regions providing feedback: Gothenburg, Cascais.
 Cities/regions providing feedback: Mannheim.

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
European Covenant of Mayors for Climate & Energy ³³	Platform, Support services, political incentives	Strategic support, e.g. to establish a structure for initiating climate policy and Sustainable Energy and Climate Action Plan. This was given especially in the beginning of the use of the initiative. It brought to the table (and public attention) topics that otherwise would not have been discussed and systematically analysed.	The support remained strategic rather than practical, and other initiatives became more relevant in later stages. Since information has moved to the Commission website, authorities had a more difficult user experience. Also, assistance is not sufficient. By some authorities, the fact that access to funding is not facilitated is seen as a missed opportunity.	Improved assistance and facilitation to receive funding. The level of ambition at CoM is lower than at the Horizon mission. There is a mismatch of end goals for 2030 for Horizon mission and the CoM. The mission by design is further reaching.	This is a very useful initiative and plays a critical role at the beginning of the process of developing climate policies. Later, this initiative became less relevant. It can be difficult to keep the decision makers involved and committed.	
EU Mission for Climate- Neutral and Smart Cities by 2030 ³⁴	Platform, support services, facilitating access to financing, goals/targets, representation, political	The initiative helps with networking, organises exchange events such as webinars; provides information, guidelines and templates; can be used to boost the importance of climate action; incentivises achieving climate	The possibilities to apply for funding are limited; Need to coordinate participation in calls with other cities takes a lot of time. Citizen involvement can be difficult.	Some of the stakeholders mention that the objectives of the initiative and the procedures, such as technical issues and communication was not clear at the beginning.	The assessment varies depending on the stakeholder, most find it very good or fairly good while one stakeholder assessed it negatively but hopes to see more results in the future	Start-up phase so for a few of the interviewed stakeholders it is difficult to assess the usefulness of this initiative. The NetZeroCities project, according to the interviewed

³³ Cities/regions providing feedback: Leuven, Barcelona, Zagreb, Budapest, Brasov, Lodz, Tartu, Cyprus, Prague, Cascais
Cities/regions providing feedback: Leuven, Mannheim, Espoo, Zagreb, Cork, Warsaw, Lodz, Tartu, Parma, Gothenburg, Budapest. Including the NetZeroCities project.

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
	incentives, promotion of commitment	neutrality. Also, the initiative helped to increase involvement of citizens in climate change and sustainable development, which in turn influences policy at the local level. Another benefit is the climate contract model, which is useful for mobilising stakeholders and decision-makers.	Administration functions in silos.			stakeholder is quite dormant in the past year.
European Green Capital Award ³⁵	Platform Support services, goals / targets, interest representation	Provides clear guidelines in how the city could be successful. Can change the mindset of a local authority. Other benefits are to get feedback from experts on the policies activated by the Administration as well as a positioning compared to other European cities.		Wider range of activities, not only related to the annual EGCA award	It is a good initiative, even if application to the award is not successful.	The interviewed cities had no successful application but work was important for future involvement with other initiatives
European Green Leaf Award ³⁶	Platform, support services, goals/targets,	The initiative can be used to boost the importance of climate action as promotion material to the	See comments	See comments	See comments	Start-up phase so it is difficult to assess the usefulness of this initiative

 ³⁵ Cities/regions providing feedback: Cork, Parma.
 36 Cities/regions providing feedback: Leuven.

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
	promotion of commitment	general public and stakeholders, and as a way of showing commitment to long term goals.				
Energy Poverty Advisory Hub ³⁷	Platform, support services, interest representation	Aid in setting up Energy Poverty Mitigation Programme	More conformity between different instruments	More conformity between different instruments, such as EPAH.	It is a very targeted initiative. It gives visibility to a topic that was not adequately represented.	
European Capital of Innovation ³⁸	Facilitating access to financing, goals/targets	The most important benefits are the city branding and visibility of the city's innovative solutions.	Time spent on applying for the awards. It is a gamble each time as the city cannot know if it will win or not.	The jury should visit the city during the process of choosing finalists. Involvement of stakeholders are essential for the innovation projects. However, it is currently not a requirement.	The initiative is related to the city's cooperation with universities and companies to find innovative solutions.	Authorities have competed and received prizes which can be used for further support of climate and energy policies.
EU City Facility ³⁹	Support services, facilitating access to financing,	Concrete advice and assistance. Authority received support for funding of initiatives				

 ³⁷ Cities/regions providing feedback: Zagreb
 ³⁸ Cities/regions providing feedback: Espoo.
 ³⁹ Cities/regions providing feedback: Łódź.

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
		related to climate and environment				
EU Mission for Adaptation to Climate Change ⁴⁰	Platform, support services, facilitating access to financing, goals/targets	Capacity-building and visibility	Unclear financing opportunities	More technical support or financing opportunities More capacity-building opportunities	Clear focus on sharing climate change resilience solutions, reaching out to partners and financing opportunities, and obtaining technical support.	
Sustainable Urban Mobility ⁴¹	Platform, support services, facilitating access to financing, political influence, interest representation, collaboration across sectors	Collaborative forum – cross sectoral forum focused on sustainable travel that exists until today. The initiative has led to practical and clear changes.	Citizens were not engaged enough.	Engaging more collaborative forums at an early stage of the initiative so that people are informed and involved already at the start Using media a bit more (local radio, Instagram etc).	It is a successful initiative and performs well in all categories.	
Cities Energy Savings Sprint ⁴²		Support service (e.g. on how to make functioning more energy efficient) is clear		General improvements: often the promising practices are simply		The initiative was joined by a stakeholder not long ago but

 ⁴⁰ Cities/regions providing feedback: Cascais.
 41 Cities/regions providing feedback: Cork
 42 Cities/regions providing feedback: Budapest

Initiative assessed	Main perceived functions	Main perceived benefits	Main perceived challenges	Key suggestions for improvement	Overall assessment	Comments
				inapplicable in the local context, whereas exchange with similarly situated cities would be more useful. It would be good to introduce initiatives/funds that are to be absorbed quickly in order to "shake up" the national administration.		communication so far is clear and seems promising.

5. Assessing the impact of cities' participation in EU climate and energy initiatives

One important function of EU climate and energy initiatives are the commitments that participating LRAs sign up to or declare to follow. Support to reach these commitments is often provided to the participants, for example via guidance documents, technical support, and platforms for peer-to-peer learning. The initiative with the largest number of committed LRAs is the CoM. In Europe, The CoM has over 10 000 signatories that have adopted one of its climate and energy commitments, either to the targets to 2020, 2030, or the climate neutrality target to 2050. The initiative has over 7 000 action plans registered on its website, which concern mainly climate mitigation actions, but also adaptation to climate change and energy poverty. The website also lists registered actions by the signatories. According to the 2021 assessment by the JRC, the most common climate mitigation actions reported include measures related to energy facilities and local energy production, transport, and waste⁴³.

According to the JRC, the CoM provides most of the functionalities that were described in Chapter 4 as used by the LRAs. Importantly, the CoM provides many examples of good practices and provides commitments and tools relevant to implement and monitor climate and energy strategies and actions. The 2021 assessment indicated that most of the signatories have not yet integrated their commitments beyond 2020. However, many signatories have higher targets than the initiative's minimum requirements. Moreover, the EU signatories with climate mitigation commitments have been on track with the 2020 target but have a forecasted gap towards the 2030 target. About 36 % of the signatories have committed to a 2030 climate mitigation target. In the assessment of 326 of the signatories that also have a monitoring report in place, the JRC forecasted an emission reduction of about 38 % by 2030⁴⁴.

The CoM also consists of decentralised regional coordinators. The CoM Territorial Coordinators Survey report 2022 showed that 50 % of the responding CoM coordinators have regional Climate and Energy Strategies that set targets for 2030 and beyond. Another 25 % of the survey respondents had these under development. In the survey, 72 % indicated that they are in need of financial support to develop or implement these strategies, 59 % - that they need additional

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Melica, G., Treville, A., Franco De Los Rios, C., Baldi, M., Monforti-Ferrario, F., Palermo, V., Ulpiani, G.,
 Ortega Hortelano, A., Lo Vullo, E., Marinho Ferreira Barbosa, P., & Bertoldi, P. (2022). Covenant of Mayors:
 2021 assessment (EUR 31052 EN). Luxembourg: Publications Office of the European Union.
 https://doi.org/10.2760/58412. JRC128104.
 Idem.

staff to implement the actions, and 50 % that they need support for involving and mobilising stakeholders and communities⁴⁵.

A new emerging type of commitment that is currently being implemented in the EU is Climate City Contracts. The NetZeroCities (NZC) project under the EU Mission for Climate-Neutral and Smart Cities by 2030 defines Climate City Contracts as commitments, supported by action plans, and investment plans. The contracts have a mission-oriented focus instead of project-based efforts and financing and include stakeholders and citizens in the process. The NZC project identified several EU-level initiatives that fit within the concept: the CoM, European Climate Pact, Green City Accord, Living-in.eu, and the Civitas Declaration. The study also identified examples of national Climate City Contracts, including "Klimatkontrakt 2030", a Swedish effort to achieve climate neutral cities to 2030 in agreement between cities and national public authorities. Moreover, each city has under Klimatkontrakt 2030 local partnerships together with local stakeholders⁴⁶.

One study by the NZC project identified several necessary elements and barriers to implement Climate City Contracts, including⁴⁷:

- Time, resources, and long-term planning together with other levels of government.
- Problems regarding translating strategies into actions fit for the local context.
- Coordination and support across levels of government.
- Lack of funding, including initial capital costs, and a lack of understanding among cities regarding what financial opportunities there are and how it is possible to combine different funding sources and rules involved.
- Fragmentation of responsibilities.

These challenges are confirmed by reports of similar challenges that LRAs experience in relation to EU climate and energy initiative involvement.

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⁴⁵ Covenant of Mayors. (2022). Covenant Territorial Coordinators. Survey report 2022. Flanagan, B., Altman, N. (Eurocities), Bordelot, F. (Eurocities), Bruen, A. (Eurocities), Edman,

⁴⁶ (1) Flanagan, B., Altman, N. (Eurocities), Bordelot, F. (Eurocities), Bruen, A. (Eurocities), Edman, A. (Viable Cities), Grizans, J. (ICLEI), Littek, A. (ICLEI), Lumbreras J. (UPM), Moreno Serna, J. (UPM), and Wildman A. (ICLEI). (2022). European Climate Initiative Review and 2030 Climate Neutrality Gap Report.; (2) Littek, M., Wildman, A. (ICLEI). (2022). Climate-neutral City Contract Concept.

⁴⁷ Liakou, L. (RCN), Flanagan, B., Altman, N., & Rendle, N. (Eurocities), Kiernicka-Allavena, J. (Climate-KIC), Wildman, A., Heyder, M., & Gresset, S. (ICLEI), Diaz, A., & Castañeda, M. (EIT-Urban Mobility), Ancelle, A. (Energy Cities), Johansson, H., & Titley, R. (ERRIN), and Minoz, A., & Holmberg, L. (Viable Cities). (2022). Report on City Needs, Drivers and Barriers Towards Climate Neutrality

5.1 Main benefits on the ground for participating in EU initiatives

Chapter 4 described how LRAs use EU initiatives and how they have assessed the performance of 15 different initiatives that were covered in this study. This section summarises conclusions from the interviews conducted within this study regarding the main benefits on the ground from participating in EU initiatives.

Table 9 describes how LRAs have assessed the initiatives performance of providing the functionalities that were described in Chapter 4: platforms, support services, funding opportunities, political incentives, and means for interest representation. These answers may give an indication as to which means provide the most benefits to the LRAs.

The vast majority of respondents assessed the initiatives' provisioning of **platforms** as a good asset for informing actions at the local or regional levels. These platforms are generally perceived by the interviewees as a good tool, for which the initiatives perform well in providing for a for exchange, peer-to-peer learning, and places to find partners for common projects. Apart from informing decision-making and implementation, platforms are according to consulted European networks, an important element especially for smaller cities that do not have many other fora to be visible internationally – this can incentivise local actions.

The lack of active support may be a reason why the interviewees have indicated a greater proportion of less good or bad performance among the initiatives in providing support services. The lack of active support is also something that several interviewees have expressed as a challenge or thing to improve. One important dimension of support mechanisms mentioned was the availability of tailored support and guidance that can improve concrete actions on the ground. In general, the interviewees identify benefits from support for concrete actions and dedicated guidelines rather than for strategic planning on a high level.

Most of the interviewees have assessed initiatives' usefulness when it comes to **funding** as a good asset, but several interviewees have mentioned that the initiatives often do not live up to expectations regarding funding. It may be due to failed attempts to receive funding, but also the lack of guidance to familiarise oneself among different funding opportunities, how they complement each other, and the different application models. Moreover, one respondent among the European networks consulted mentioned that simple financial support that comes with a low risk can be important mainly for small- and medium sized municipalities.

Political incentives, for which initiatives' goals and commitments are used as leverage in mobilising local decision-makers, were assessed as a good tool provided by initiatives seven times, and not good two times. Several city interviewees mentioned concrete benefits that political commitments provide to concrete actions on the ground. Feedback from the consulted European networks also suggests that the commitment element, which can be a strong political stand, can help to strengthen and further support the ambition of a city and serve as a starting point to pin down concrete objectives and define a work plan that will help the city or region to achieve them.

The initiatives' performance regarding **interest representation** to influence decision-makers at higher administrative levels was assessed as valuable by all relevant responses, except for one. Moreover, the initiatives' usefulness regarding visibility and stakeholder mobilisation was only assessed as good, but there were also fewer answers regarding the assessment of these functionalities. Interviewees have described that visibility can also serve as a mobilising factor for the stakeholders working on the local energy and climate transitions.

In addition, interviewees were also asked about **citizens' involvement**. About half of the interviewees mentioned, when asked, that some initiatives can be useful for adopting models for citizens' involvement, and to stimulate engagement among citizens if the city or region actively deploys tools such as workshops to develop the activities that the initiatives have stimulated.

Table 9. Evaluation of initiatives' performance per function provided

Main function utilised	Initiative performance of the function
Platforms	• Good/very good: 20 responses
	 Less good/bad: 1 response
Supportive tools and services	 Good/very good: 13 responses
	 Less good/bad: 6 responses
Funding	 Good/very good: 8 responses
	 Less good/bad: 2 responses
Political incentives	 Good/very good: 7 responses
	 Less good/bad: 2 responses
Interest representation	 Good/very good: 4 responses
	 Less good/bad: 1 response
Visibility and city branding	 Good/very good: 2 responses
Mobilising stakeholders	 Good/very good: 2 responses

Source: Interviews and written feedback from LRAs.

5.2 Getting the most out of EU initiatives: Overcoming overlaps and creating synergies

Many of the functionalities and benefits are provided by more than one initiative, and as displayed in Chapter 3, some cities or regions participate in many EU initiatives simultaneously. Some of these initiatives may complement each other due to the different topics that they cover or functionalities that they provide, and others may create mutual synergies because they have similar reporting systems, fill a certain gap existing in another initiative, or fulfill a certain need that another initiative does not successfully cover. However, some initiatives may overlap to an extent that from a local perspective is unnecessary or may even create excessive administrative burden.

In general, the interviewees appreciate the complementary functionalities and services of initiatives if they are participating in several initiatives. They also mention that in some cases, the initiatives create synergies by targeting different parts of the policy cycle of the same topic. For example, the CoM targets strategic planning while other initiatives focus on the implementation phase. For example, according to the interviewee from Zagreb, the Energy Poverty Advisory Hub supports implementation of energy poverty actions which fall within the strategic aims of the CoM.

Although reporting requirements can be a challenge for LRAs, especially if these requirements are not aligned, there are examples mentioned where streamlining exists, for example, the reporting requirements of the CoM and the EU Mission for Climate-Neutral and Smart Cities by 2030. However, there are also examples from the interviews where these two initiatives' reporting requirements are perceived as a burden due to the lack of similar methodologies. One explanation to these conflicting views is that to create positive synergies, coordination is required also within LRAs to identify and utilise synergies and possible complements.

Despite several identified synergies and complements, there are several examples of interviews that mention that there are too many EU initiatives focusing on climate and energy, without providing added values. Interviewees from the cities Mannheim, Zagreb, and Prague, suggested that it would be better if several initiatives merged, potentially to become pillars under other initiatives such as the CoM, or as sub-themes under the EU missions.

Alternative solutions to merging initiatives are improved coordination, according to interviewees. Creating positive synergy effects or constructive complements may require coordination from both EU decision-makers that are formulating the initiative designs, and from the local authorities to find the right way to use

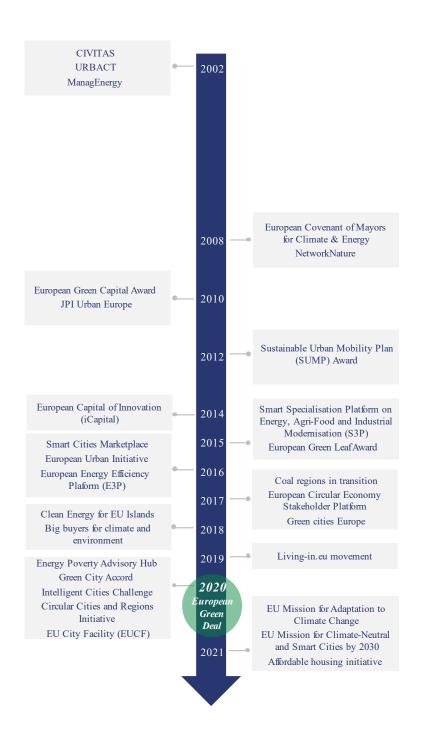
multiple initiatives in an effective way. Coordination is also an important aspect for the European-level facilitators: both the interviewees from Zagreb and Mannheim mentioned the benefit of having support via EU-level city networks.

EU-level networks for LRAs were also consulted regarding how synergies can be created among EU initiatives. According to these respondents, synergies can generally be created through complementary services that the initiatives provide, such as the provisioning of platforms, capacity building, and political commitments. However, whether these services are complementary or not depends on the combination of the initiatives in which a single city or region participates. According to one network, such complementarity can be facilitated by the initiatives thanks to having a clear purpose and activities. According to another network, to help the city/region leaders find and use the complementary elements of the initiatives, decentralized support frameworks based on local experts that fill the function of facilitators are useful.

Moreover, there are several factors preventing creation or synergies. One challenge relates to the different objectives of the initiatives, that may not align, as the initiatives are created by different Directorates of the European Commission at different times when other political agendas have been in force. According to several respondents, the European Commission has not put sufficient efforts into coordinating the objectives and governance of the different initiatives. If there are conflicting timelines and requirements, it can be hard for cities or regions with a lack of resources to navigate among the initiatives. According to one network, cities or regions may not have the capacity to get a clear picture of how two or more initiatives interrelate.

A related aspect is how the different initiatives converge with the principal strategies and legislation guiding the EU environmental and climate policy. The figure below provides a mapping of the initiatives covered in our study according to a timeline of their creation, with the adoption of the European Green Deal being an important milestone to which many of the initiatives refer.

Figure 10. Timeline of initiatives



5.3 Challenges and barriers

As displayed in Table 10, the most common challenge reported by interviewees from LRAs is the perception that the **methodologies such as overall intervention logic or reporting requirements**, including non-feasibly defined monitoring indicators, are hard to adopt and translate to the local context. The second most often mentioned challenge refers to the lack of time, resources, and capacity to participate and live up to the ambitions of an initiative. LRAs may need to put many resources into award applications, reporting templates (which may differ between initiatives), and for understanding methodologies that do not always fit in the local context. For some initiatives such as the EU missions, the European Capital of Innovation, and the CoM, an equivalent of one full time employee or more is required for a city or region to participate. Challenges related to capacity are also the main reasons according to interviewees why cities or regions may not join a certain initiative.

Other challenges include difficulties to understand objectives and information, and lack of support from the initiative's secretariat. Lack or insufficient support mainly refers to the need for active support opposed to passive support such as the availability of guiding materials and technical tools. Moreover, while many LRAs have reported that accessing funding opportunities and information about it are important for decisions to join initiatives, only two interviewees mentioned lack of access to funding as a direct challenge to participate in initiatives. Lack of funding is also related to the last reported challenge, to maintain political support, as the political willingness to participate in initiatives and implement their ambition are normally connected to financial resources available.

Table 10. Challenges as reported by interviewees from LRAs

Challenge	Number of related responses
Non-feasible methodologies, reporting requirements, and/or indicator definitions for the local context	7
Lack of time, resources, and capacity, e.g., to absorb all materials, reporting requirements, and activities	4
Vague objectives and/or unclear communication and information from the initiative	3
Lack of support from the initiative secretariat	3
Lack of access to funding	2
Maintain internal political support for participate- and/or implement the requirements of the initiative	2

Source: Interviews and written feedback from LRAs.

As coordinators, initiators, facilitators, and contractors hosting the secretariats of many EU initiatives, as well as organisations that represent local and regional governments in other contexts, European networks for LRAs are aware of the challenges that LRAs face regarding EU initiatives. Their feedback confirms what

interviewees from cities and regions across Europe have mentioned such as the lack of resources, support, and clear information, as well as difficulties to live up to commitments and reporting requirements. The responses from the European networks for LRAs are summarised below according to the most commonly encountered challenges:

- Lack of capacity and resources: The most common response among the respondents referred to limited capacities and resources of LRAs. Joining and participation in EU initiatives usually requires technical expertise, human resources, and initial monetary investments. Cities or regions often experience a lack of time and resources to inform themselves about opportunities of initiatives and to join them, including to apply for competitive calls. They may not even have the capacity to apply to capacity building initiatives. Once in the initiatives, cities may lack the capacity to bear the administrative burden, including monitoring and reporting requirements.
- Low level of relevant support from the initiatives: Since cities or regions may need capacity building to follow an initiative, support from the initiative can be crucial. One respondent described that smaller cities especially face challenges related to support required to participate, and another respondent described that cities are experiencing limited benefits related to funding and political influence, in addition to the initiatives as platforms, and providers of capacity building.
- Changing contexts: One main challenge observed relates to the changing contexts that the cities or regions may experience. If an initiative does not provide flexibilities or does not develop its activities during the course of the programme to respond to emerging events such as the COVID-19 pandemic or energy crisis, the initiative may become irrelevant to some of the participants. Such emerging events may change political priorities among the LRAs, and initiatives should be given the capacity to adapt to these according to several respondents.
- Lack of (clear) information and objectives: According to several respondents, the motivation to join or participate in an EU initiative may be challenged by the lack of clarity of expectations. This may relate, for example, to the goals, targets, deadlines, and level of ambition that should be fulfilled. According to the response from one network, the lack of clarity regarding the purpose that an initiative represents may hinder an effective and efficient participation of the city or region in the initiative. Moreover, it may be hard for cities or regions to know which initiatives fit their needs and interests, especially if initiatives are similar to one another. To gather

the information necessary to make an informed choice can be resource intensive, especially if there is a lack of prior knowledge capacity withing the city or region administration. The lack of knowledge may also make it hard for the administration to convince the decision-makers to join a specific initiative.

• Challenges regarding reporting requirements: Several respondents mentioned reporting requirements as a heavy burden for some initiative participants. For example, if reporting requirements are not in line with the local monitoring and reporting practices (different indicator and differences in access to certain data). Such challenges are further burdensome if two similar initiatives have different reporting requirements.

5.4 Suggested solutions and improvements

As with reported challenges, mentioned gaps among EU initiatives relate mainly to insufficient support and funding opportunities. However, gaps identified also relate to the topics that EU initiative cover. A common response was the lack of initiatives that focus on biodiversity, but also other topics such as energy poverty and circularity. Moreover, when asked about important aspects for potential initiatives to join, LRAs most often mentioned that these should focus on support to concrete actions and technical support rather than on passive guides to develop strategy documents.

Table 11 displays the main improvements that EU initiatives should adopt according to city and region interviewees. The most common response refers to improved support from EU initiative secretariats. A repeated wish is that this support should be active and tailored to the local context, as certain guideline documents may not fit local circumstances. Secondly, commitment and reporting should be simplified and also harmonised among initiatives so as not to create an unnecessary administrative burden that takes away focus for actual implementation. Several interviewees even suggested that some initiatives should be merged, partly for these reasons, as it would facilitate harmonisation and for LRAs to navigate among the initiatives. Other improvements that could be made according to interviewees relate to funding opportunities (mainly direct funding to simplify the process), improved communication actions (for example, a matchmaking function to find partners for projects that could be implemented by groups of cities/regions), and stricter monitoring to ensure that participants live up to the ambitions.

Table 11. Suggested improvements and solutions of LRAs

Suggested improvements	Number of related responses
Capacity building, concrete and/or tailored active support, including technical support	7
Harmonise and simplify intervention logics, commitments, and reporting requirements, including monitoring indicators	5
More funding opportunities to implement and/or plan climate and energy actions	4
Merge certain initiatives to reduce the number and challenges to navigate among initiatives and their commitments and actions	4
Improving information and communication activities of initiatives, and better stimulate the initiatives' platform functionalities	3
Stricter monitoring to ensure that participants fulfill the requirements and live up to the commitments	2

Source: Interviews and written feedback from LRAs.

Evidence from responses submitted by European networks of cities and regions confirms some of the suggestions made by LRAs themselves, mainly regarding stronger synergies, support, and capacity building. However, they also add several additional dimensions that relate to the broader governance of EU initiatives. The improvements suggested by the European networks are summarised into five main suggestions:

- **Flexibility:** Several of the EU-level networks called for more flexibility, including in the implementation phase and in the services provided to adapt to the local situation. Such flexibilities can take into account the size of the city, or the level of progress of the city in the green transition.
- Stronger focus on the initiative's beneficiaries: As representatives of cities and/or regions, several respondents mentioned that in order to work effectively, the design and management of initiatives should be developed by the cities or regions themselves, either via a bottom-up approach or via their European representatives. Moreover, one respondent suggested to reinforce the link and role of national associations of local and regional governments which have the capacity to be national interlocutors of the initiatives and provide tailored support.
- **Stronger synergies:** The European Commission's different directorates should cooperate and coordinate better to create synergies among the EU initiatives, including by streamlining application procedures and reporting tools and processes. New initiatives that have a similar scope and target audience as the existing ones may not be necessary as it creates more

complexity rather than synergies. One respondent suggested that the Terms of Reference for the management of new initiatives should clearly identify the synergies between existing and new initiatives. Also, that initiatives should better align with EU and national laws, policies, and funding instruments.

- Capacity building: Several answers indicate that in the EU-networks' perspective, the initiatives' support mechanisms should have a stronger focus on actions on the ground. Instead of passive instruments such as platforms and online guides, the initiatives should provide concrete tools and dedicated advisory services to reach specific objectives. Moreover, as described by one respondent, the initiatives should acknowledge capacity building as a resource-intensive activity, rather than something that can be reached via passive instruments such as conferences.
- Information and communication: A better overview of differences between EU initiatives, for example, regarding commitments, targets, monitoring and reporting requirements, funding opportunities and overall benefits would be needed. One respondent suggested that such responsibility should be in the hands of the European Commission, and two other respondents specifically suggested a one-stop shop that maps initiatives' overall differences and benefits according to LRAs' needs.

6. Policy recommendations

Based on the findings of our study regarding the challenges and barriers encountered by LRAs in making use of the available EU initiatives supporting climate and energy transition, several recommendations can be formulated concerning possible improvements in the functioning of the initiatives and in their effectiveness in strengthening green transition at the local and regional level. Below, we provide our recommendations matching the specific challenges and barriers as summarised in Chapter 5 – these are formulated with respect to two main groups of stakeholders: 1) the initiatives' coordinating bodies⁴⁸ and 2) the LRAs.

Challenge 1: Limited capacity to join and participate in multiple EU initiatives

A recurrent challenge mentioned by consulted stakeholders in this study is the **lack of capacity** to either join or participate in EU initiatives. The reasons differ from authority to authority and depend on the initiative concerned. Challenges related to lack of capacity include the lack of technical expertise, time, financial and human resources necessary to absorb all information, documents, activities, monitoring and reporting schemes that may be required for participating in an initiative.

The lack of capacity is also related to the necessity to deal with often complicated and lengthy monitoring and reporting procedures, especially if these significantly differ between various initiatives. On the one hand, since participating in initiatives is voluntary, it could be stated that an LRA should avoid participating in many initiatives if it lacks the capacity to do so. However, it is often the case that an LRA joins another initiative because it seeks to enhance its capacity to take the necessary steps in the energy and climate transitions and because various initiatives offer additional types of services or opportunities.

To overcome this challenge, we recommend that:

The initiatives' coordinating bodies:

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• Consider synergies and coordination among various existing and planned initiatives from the conceptualisation and design phase to the launch and operational phase of each initiative. Examples of good practices from

⁴⁸ By the 'initiatives' coordinating bodies' we mean the EU institutions which set up and coordinate the activities of each the initiative, including its steering committees, secretariats or other relevant structures, depending on the initiative.

stakeholder consultations in this study are how several initiatives such as the EU City Facility and Energy Poverty advisory Hub have supported LRAs in achieving their CoM commitments.

- Restrict the number of similar initiatives and ensure that these align and bring added value beyond the existing initiatives and do not create competition of the offered services. For example, the EU City Facility may bring added value to energy efficiency policies and related initiatives; the Energy Poverty Advisory Hub may bring added value to energy poverty aspects of the energy and climate transition and related initiatives. It was also suggested that certain initiatives may better serve cities and regions' transitions by being integrated as pillars under the CoM or sub-themes under the EU mission framework to facilitate participation.
- Incorporate new ideas and services based on LRAs' needs in the existing initiatives rather than create new initiatives. For example, by implementing awards, competitions, and/or project-based funding and support to meet emerging needs of LRAs. The Cities Energy Savings Sprint, which was coinitiated by the CoM, is a good example of an initiative that could flexibly be set-up to meet emerging needs of LRAs.
- Simplify as much as possible the monitoring and reporting schemes and align them to national reporting schemes or other mandatory reporting schemes. For example, the CoM's reporting methodologies were described as outdated and incompatible with local indicators, competencies, and other contexts. Similar observations were made regarding the Green City Accord's indicators. However, important harmonisation efforts have also been made, e.g., the CoM's reporting schemes were aligned with the EU Mission for Climate-Neutral and Smart Cities by 2030.
- Enable flexibilities of monitoring and reporting requirements depending on the LRAs' needs and contexts such as size, administrative competencies, and level of progress in the climate, energy, and green transitions.

LRAs:

- Consider well in advance the added value of joining a new initiative according to their needs and ensure that they have the capacity to implement the commitments and activities of the initiative.
- Coordinate their activities concerning climate and energy transition within the city/region and also, if relevant, with other cities/regions in order to make optimal use of the existing synergies.

Creation of a single entry point for EU energy, climate, and environmental initiatives would facilitate coordination of the initiatives and strengthen synergies among them. One of the EU institutions, for example the CoR, might take a coordinating role for such an entry point. Furthermore, decentralised support frameworks based on local experts that fill the function of facilitators can be useful for the LRAs to find their optimal combination of initiatives to participate in.

Challenge 2: Vague objectives and information about services

The motivation to join or participate in an EU initiative or a set of initiatives may be challenged by the lack of clarity regarding the goals, targets, deadlines, and level of ambition that should be fulfilled by the participants. This lack of clarity may hinder an effective and efficient participation of the city or region in the initiative.

To overcome this challenge, we recommend that:

The initiatives' coordinating bodies:

- Provide clear information regarding the scope of each initiative, target audience and what they can offer in terms of the specific resources (including financial resources), services and tools. Many interviewees that assessed relatively new initiatives still did not have a clear idea of how those initiatives will operate or provide benefits.
- Clearly align EU policy objectives with the initiative's commitments, adjusting them, if necessary, to the changing requirements and new strategies. Recent good examples are the EU Missions, e.g., for 100 Climate-Neutral and Smart Cities by 2030, that respond to the latest political commitments under the European Green Deal.
- Make sure that the same EU policy objective is not addressed by multiple initiatives, but rather develop modular sections under bigger and more comprehensive initiatives. For example, LRAs may not need several initiatives that target the climate- and energy transition in general, but one comprehensive initiative that provides clear commitments, supplemented by individual initiatives or sub-initiatives that support sector-specific trajectories.

Challenge 3: Support in implementation of ambitious climate and energy

actions insufficiently tailored to LRAs needs

Many consulted stakeholders mentioned the need for more concrete support from the initiatives' coordinating bodies in implementing their energy and climate actions - in terms of active technical support and direct funding in the implementation stage rather than passive guidelines for the development of strategic documents. Moreover, the needs of LRAs differ depending on their size, competencies, and level of progress in the climate and energy transitions as well as on the specific circumstances that may change over time. Therefore, support may need to be tailored to specific needs and contexts.

To overcome this challenge, we recommend that:

The initiatives' coordinating bodies:

- Provide active and tailored support for LRAs, including personal targeted support offered by initiative secretariats if possible. The initiatives that have been highlighted by interviewees regarding active support services include the EU Mission for Climate-Neutral and Smart Cities, EU City Facility, and Green City Accord.
- Reduce the efforts dedicated to the development of one-size-fits-all guidance materials and EU wide technical assistance to better optimise the resources of the initiatives' secretariats.
- Provide opportunities for direct funding with low risks involved, for practical implementation of targeted climate and energy actions tailored to the intervention logic of the initiative (instead of only referring to the relevant funding programmes). The initiatives that have been highlighted by interviewees as impactful regarding direct funding include competitive initiatives such as the European Capital of Innovation, Sustainable Urban Mobility Plan (SUMP) Award, and EU City Facility.
- Provide concrete opportunities or guidance regarding stimulation of private investments to support implementation of the initiatives' objectives.
- Provide flexibilities for the implementation phase of the commitments to proactively meet the emerging challenges and take account of the circumstances that may change the needs and priorities of LRAs.

LRAs:

 Take an active role in making use of all the relevant services and support provided by the initiatives and make use of good practices and networks of initiatives.

Challenge 4: Insufficiently covered topics

One of the questions posed to the stakeholders taking part in our study concerned possible thematic gaps among the existing EU initiatives. A common answer was the lack of initiatives that focus on biodiversity, but also other topics such as energy poverty and circular economy. New initiatives, or pillars under the existing initiatives can therefore be added to address the needs of LRAs in these focus areas.

Many of the abovementioned recommendations are based on solutions to challenges that are reflected in this study. However, an additional recommendation is to build upon the success factors of initiatives and the functionalities and services that have been appreciated by- and regarded as impactful for LRAs. For example, to develop platform fora that are offered by some of the initiatives, by stimulating enhanced peer-to-peer learning and exchange of good practices in a user-friendly fashion. Also, to draw inspiration from successful models of political incentives, such as Climate City Contracts and mission-oriented commitment models in addition to project-based processes. The examples when initiatives have been able to provide direct support and funding for concrete implementation of commitments and strategies have been especially important for the interviewees consulted in this study.

Moreover, although there is evidence in this study about synergy challenges, there are also examples of solutions to such challenges, such as efforts to harmonise monitoring and reporting schemes between the CoM and the EU Mission for Climate-Neutral and Smart Cities by 2030. Such examples could be more widely applied in the future.

7. List of references

Academic and grey literature

- Andonova, L. B., Betsill, M. M., & Bulkeley, H. (2009). Transnational climate governance. Global environmental politics, 9(2), 52-73.
- Bulkeley, H., Davies, A., Evans, B., Gibbs, D., Kern, K., & Theobald, K. (2003). Environmental governance and transnational municipal networks in Europe. Journal of Environmental Policy & Planning, 5(3), 235-254.
- Busch, H. (2015). Linked for action? An analysis of transnational municipal climate networks in Germany. International Journal of Urban Sustainable Development, 7(2), 213-231.
- European Covenant of Mayors for Climate & Energy. (2022). Covenant Territorial Coordinators. Survey report 2022.
- Flanagan, B., Altman, N. (Eurocities), Bordelot, F. (Eurocities), Bruen, A. (Eurocities), Edman, A. (Viable Cities), Grizans, J. (ICLEI), Littek, A. (ICLEI), Lumbreras J. (UPM), Moreno Serna, J. (UPM), and Wildman A. (ICLEI). (2022). European Climate Initiative Review and 2030 Climate Neutrality Gap Report.
- Kern, K., & Bulkeley, H. (2009). Cities, Europeanization and multi-level governance: governing climate change through transnational municipal networks. JCMS: Journal of Common Market Studies, 47(2), 309-332.
- Liakou, L. (RCN), Flanagan, B., Altman, N., & Rendle, N. (Eurocities), Kiernicka-Allavena, J. (Climate-KIC), Wildman, A., Heyder, M., & Gresset, S. (ICLEI), Diaz, A., & Castañeda, M. (EIT-Urban Mobility), Ancelle, A. (Energy Cities), Johansson, H., & Titley, R. (ERRIN), and Minoz, A., & Holmberg, L. (Viable Cities). (2022). Report on City Needs, Drivers and Barriers Towards Climate Neutrality
- Littek, M., Wildman, A. (ICLEI). (2022). Climate-neutral City Contract Concept.
- Melica, G., Treville, A., Franco De Los Rios, C., Baldi, M., Monforti-Ferrario, F., Palermo, V., Ulpiani, G., Ortega Hortelano, A., Lo Vullo, E., Marinho Ferreira Barbosa, P., & Bertoldi, P. (2022). Covenant of Mayors: 2021 assessment (EUR 31052 EN). Luxembourg: Publications Office of the European Union. https://doi.org/10.2760/58412. JRC128104.

Online sources, strategic plans and document

City of Budapest, 2021, *Budapest fenntartható energia- és klíma akcióterve*, Available: https://budapest.hu/Documents/klimastrategia/BP_klimastrategia
_SECAP_egyeztetesi_anyag.pdf

City of Prague, 2021, *Prague Climate Plan 2030: Prague on the road towards carbon neutrality*, Available: https://klima.praha.eu/en/the-climate-plan-at-a-glance.html

City of Espoo, 2019, Sustainable Energy and Climate Action Plan (SECAP) of Espoo under the Covenant of Mayors (CoM), Available: https://www.espoo.fi/en/city-espoo-sustainable-energy-and-climate-action-plan

Esbo klimatvakt, 2023, *Esbos klimatmål*, Available: https://ilmastovahti.espoo.fi/sv/hiilineutraali-espoo/espoon-ilmastotavoite

Esbo klimatvakt, 2023, Åtgärder, Available: https://ilmastovahti.espoo.fi/sv/actions?view=list

City of Leuven, 2020, *Klimaatactieplan* 2020 – 2025, Available: https://leuven.be/sites/leuven.be/files/documents/2020-08/Klimaatactieplan
https://leuven.be/sites/leuven.be/files/documents/2020-08/Klimaatactieplan
https://leuven.be/sites/leuven.be/files/documents/2020-08/Klimaatactieplan
<a href="https://leuven.be/sites/

Cork City Council, 2018, *Cork City Council SECAP (Sustainable Energy and Climate Action Plan)*, Available: https://www.corkcity.ie/en/council-services/services/environment/climate-change/cork-city-council-secap-sustainable-energy-and-climate-action-plan-.html

Cork City Council, 2021, *Cork City Council Climate Action Charter*, Available: https://www.corkcity.ie/en/council-services/services/environment/climate-change/cork-city-council-climate-action-charter.html

Cork City Council, 2021, *Cork City Council Community Climate Action Programme* 2021/2022, Available: https://www.corkcity.ie/en/council-services/services/environment/climate-change/cork-city-council-community-climate-action-programme-2021-2022.html

Cork City Council, 2019, *Cork City Council Climate Change Adaptation Strategy 2019-2024*, Available: https://www.corkcity.ie/en/council-services/services/environment/climate-change/climate-change.html

Diputació de Barcelona, 2023, *Què és el Pla Clima?* Available: https://www.diba.cat/es/web/pla-clima/que-es

Eurocities, 2023, Mannheim, Available: https://eurocities.eu/cities/mannheim/

Stadt Mannheim, 2022, *Klimaschutz-Aktionsplan 2030 vom Gemeinderat beschlossen*, Available: https://www.mannheim.de/de/presse/klimaschutz-aktionsplan-2030-vom-gemeinderat-beschlossen#:~:text=Der%20Klimaschutz
https://www.mannheim.de/de/presse/klimaschutz-aktionsplan-2030-vom-gemeinderat-beschlossen#:~:text=Der%20Klimaschutz
https://www.mannheim.de/de/presse/klimaschutz-aktionsplan-2030-vom-gemeinderat-beschlossen#:~:text=Der%20Klimaschutz
https://www.mannheim.de/de/presse/klimaschutz
https://www.mannheim.de/de/presse/klimaschutz
<a href="mailto:%20Aktionsplan%202030%20wird,Stadtgesellschaft%20einschlie%C3%9Flich%20Unternehmen%20und%20B%C3%BCrgerschaft
<a href="mailto:%20Aktionsplan%202030%20wird,Stadtgesellschaft%20einschlie%C3%9Flich%20Unternehmen%20und%20B%C3%BCrgerschaft
<a href="mailto:%20Aktionsplan%202030%20wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030%20wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030%20wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschaft%20einschlie%C3%9Flich%202030wird,Stadtgesellschaft%20einschli

Stadt Mannheim, 2021, *Mannheim als Pilotstadt für einen Local Green Deal*, Available: https://buergerinfo.mannheim.de/buergerinfo/vo0050.asp? kvonr=227007

POTEnT Interreg Europe, 2022, *Parma Carbon Neutral 2030*, Available: https://projects2014-2020.interregeurope.eu/POTEnT/news/news-article/15500/parma-carbon-neutral-2030/

Comune di Parma, 2017, *Pums - Piano Urbano della Mobilità Sostenibile*, Available: https://www.comune.parma.it/mobilita/Pums---Piano-Urbano-della-Mobilita-Sostenibile.aspx

Comune di Parma: *Parmafuturosmart, 2023, PAES (Piano Azione per l'Energia Sostenibile)*, Available: https://parmafuturosmart.comune.parma.it/projects-archive/paes-piano-azione-lenergia-sostenibile/

Comune di Parma, 2017, *Pums - Piano Urbano della Mobilità Sostenibile*, Available: https://www.comune.parma.it/mobilita/Pums---Piano-Urbano-della-Mobilita-Sostenibile.aspx

Annex 1: List of initiatives

The services column identifies the most prominent services of the initiatives. These correspond with the functionalities listed in the report and in the interview questions:

- *Platform*: initiatives may provide platforms to facilitate exchange of information, knowledge, experiences, or good practices between participants of the initiative such as through online forums, conferences/webinars, or newsletters.
- Support mechanisms: initiatives may offer supportive tools such as guidelines, templates, other material, or personal support from the secretariat.
- Access to financing and related guidance: the initiatives might not offer any financing themselves. However, they might facilitate access to financing from, e.g., different EU funds, such as through insights into how to apply or matching local/regional authorities to apply to financing common projects.
- *Political incentives*: some initiatives might set goals/targets, provide certifications, or organise competitions that can serve as political incentives for participants to strive towards or to encourage more stringent political decisions.
- *Interest representation*: some initiatives might seek to influence political decisions that influence local/regional climate and energy transitions on behalf of their participants.

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
CIVITAS	329	Member Cities, which have signed the CIVITAS City Declaration to intorducing ambitious sustainable urban mobility policies.	Platform; Political incentives; Interest representation; Support mechanisms	To make sustainable and smart urban mobility a reality for all in Europe and beyond. Work, e.g., on behavioural change & mobility management; clean & energy-efficient vehicles; demand & urban space management; public participation & cocreation; smart, sustainable, connected and shared mobility	Sustainable Transport	2002
Green City Accord	102	Table provided via email by initiative	Access to financing; Political incentives	A movement of European mayors committed to making cities cleaner and healthier. It aims to improve the quality of life for all Europeans and accelerate the	Green transition	2020

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
				implementation of relevant EU environmental laws. By signing the Accord, cities commit to addressing five areas of environmental management: air, water, nature and biodiversity, circular economy and waste, and noise.		
Intelligent Cities Challenge	136	Core cities	Support mechanisms; Access to financing Platform	To improve the quality of life for all Europeans and accelerate the implementation of relevant EU environmental laws. It is a European Commission initiative that brings together 136 cities to achieve intelligent, socially responsible and sustainable growth through advanced technologies. Fields include citizen participation and digitalisation of public administration; Green economy and local green deals; upskilling and reskilling; green and digital transition in tourism; supply chains, logistics and economics of mobility	Green and digital transition	2020
Living-in.eu movement	135	Cities and region signatories	Platform; support mechanisms; Interest representation	To bring the economic and social benefits of this transformation to all local communities and implement an inclusive digital Europe, with powerful digital services, technologies, infrastructures and skills. Fields include technical; Education & Capacity Building, Financial, Monitoring & Measuring	Green and digital transition	2019
European Covenant of Mayors for Climate & Energy	10 819		Platform; Support mechanisms; political incentives;	To reduce GHG emissions by 55 % by 2030; Strengthening resilience; Alleviating energy poverty	Climate Action; Clean Energy	2008

Initiative	Number of	Limitation	Services	Selling point/description	Theme	Start year
	participants	Participants			covered	
			Access to financing			
EU Mission for			Platform;	Deliver 100 climate-neutral and smart cities		2021
Climate-Neutral			Support	by 2030.		2021
and Smart Cities by			mechanisms;	Ensure that these cities act as		
2030	100		Access to	experimentation and innovation hubs to		
			financing;	enable all European cities to follow suit by		
		377 applicants	Political	2050	Climate	
		from the EU	incentives		Action	
European Green			Political	Recognises and rewards local efforts to		2010
Capital Award			incentives;	improve the environment, and thereby the		
			Platform;	economy and the quality of life in cities.		
			support mechanisms;	The Award is given each year to a city, which is leading the way in environmentally		
			mechanisms,	friendly urban living. The European Green		
				Capital Network (2014) consists of winners		
				and finalists of the European Green Capital		
	14			Award. This network is an opportunity for		
				social learning from the best cities in		
				Europe, and activities include workshops,		
				site visits, advocating local needs on the		
				world stage, and the development of good		
				practices and guidelines. Outputs such as		
		Winning Ell cities		toolkits and guidelines are available to the public.	Green transition	
European Green		Winning EU cities	Political	Established with the aim of recognising the	uansmon	2015
Leaf Award			incentives;	sustainable efforts of small cities (from 20		2013
Loui / Iwaiu			Platform	000 to 99 999 inhabitants). The recognised		
	1.5			city should demonstrate a good		
	15			environmental record and commitment to		
				generating green growth.		
				To encourage cities to actively develop	Green	
		Winning cities		citizens' environmental awareness and	transition	

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
	paracipants	1 urvicipunes		involvement. The city should then act as an ambassador.	covereu	
Smart Cities Marketplace	292	"Smart Cities" listed on the initiative's website	Platform; Support mechanisms; Access to financing	The involved cities' common aims are to improve citizens' quality of life, increase the competitiveness of European cities and industry as well as reach European energy and climate targets.	Multiple- focused initiatives	2016
Energy Poverty Advisory Hub	34	Awarded applicants of the first call	Support mechanisms; Platform	Mitigating energy poverty. It is the leading EU initiative aiming to eradicate energy poverty and accelerate the just energy transition of European local governments. Provides supporting mechanisms	Clean Energy	2020
Circular Cities and Regions Initiative	37	Both "pilots" and "fellows" are included	Support mechanisms; Access to financing; Platform;	Focuses on implementing the circular economy across Europe's cities and regions. Provides supporting mechanisms	Circular economy	2020
European Urban Initiative	No results yet of the first call	99 applicants to the first call	Platform; Support mechanisms; Access to financing	Represents a new multi-level working method, for urban policy and practice, promoting cooperation between Member States, cities, the European Commission, and other stakeholders. Focuses on sustainable urban development.	Multiple- focused initiatives	2016
URBACT	206	206 partner cities involved in climate, energy and environmental related projects of the initiative's previous programming period, URBACT III.	Platform; Support mechanisms	Networks of cities, capacity-building activities, sharing urban knowledge. Exchange and learning programme promoting sustainable urban development. Enable cities to work together to develop solutions to major urban challenges. It provides capacity building support.	Multiple- focused initiatives	2002

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
<u>NetworkNature</u>	N/A		Platform; Support mechanisms	Investments into nature-based solutions, focus on climate change more broadly. A one stop linking to NbS Project sites and Platforms	Climate Action	2008
European Circular Economy Stakeholder Platform	Not necessarily for cities/regions directly		Platform; Support mechanisms	A virtual platform for submitting content, discussion forum, activities and events in the field of circular economy	Circular economy	2017
JPI Urban Europe	37 (partner cities in the EU)		Platform, Support mechanisms	To address the global urban challenges of today with the ambition to develop a European research and innovation hub on urban matters and create European solutions by means of coordinated research.	Multiple- focused initiatives	2010
Clean Energy for EU Islands	77	Participating islands on EU Member States' territories	Support mechanisms; Political incentives; Platform	Connection with other island communities, provide support on project development in the field of energy transition	Clean Energy	2018
Smart Specialisation Platform on Energy, Agri-Food and Industrial Modernisation (S3P)	74	Only "leading" and "participating" regions/cities in "Energy" theme are included	Support mechanisms; Access to financing	Enabling tool to coordinate, rationalise and plan energy strategies, develop a shared knowledge-based vision and set up a strategic agenda of collaborative work.	Multiple- focused initiatives	2015
European Energy Efficiency Plaform (E3P)	N/A	Winning cities	Platform	Platform and collaborative tool for a strong and connected energy efficiency community	Clean Energy	2016
Green cities Europe	8	Winning cities	Support mechanisms; Political incentives;	Providing tools and technical background for decision/makers and politicians to communicate about sustainability and climate change	Green transition	2017

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
			Interest representation			
Sustainable Urban Mobility Plan (SUMP) Award ⁴⁹	9	Winning cities	Political incentives; Support mechanisms	For excellence in sustainable urban mobility planning	Sustainable mobility	2012
European Capital of Innovation (iCapital)	213	30 beneficiaries (out of 257 applicants) in the 1st call; 68 beneficiaries (out of 236 applicants) in the 2nd call; 67 beneficiaries (out of 166 applicants) in the 3rd call; 48 (in the 4th call)	Political incentives; Access to financing	Demonstrate the ability to harness innovation to improve the lives of citizens	Multiple- focused initiatives	2014
EU City Facility (EUCF)	213		Access to financing; Support mechanisms	A European initiative to support municipalities/local authorities, their groupings, as well as local public entities aggregating municipalities/local authorities across Europe to develop investment concepts to accelerate investments in sustainable energy.	Clean Energy	2020
Coal regions in transition	38	All regions are included (i.e., coal and lignite, peat and oil shale regions).	Platform; Support mechanisms	Facilitation of the transition towards low carbon economy in coal regions. It aims to support public administrations and other relevant stakeholders by (i) connecting stakeholders, (ii) delivering tailored technical assistance, (iii)providing supportive resources	Clean Energy	2017

⁴⁹ Award for Sustainable Urban Mobility Planning by the European Mobility Week campaign. The Award is since 2021 not in use.

Initiative	Number of participants	Limitation Participants	Services	Selling point/description	Theme covered	Start year
Affordable housing initiative	215		Support mechanisms; Access to financing	Focuses on green buildings, and resource-efficient innovation. Is part of the Commission's renovation wave strategy for Europe, which aims to green buildings, create jobs and improve lives.	Multiple- focused initiatives	2021
EU Mission for Adaptation to Climate Change	284	Signatories of the mission charter	Support mechanisms; Platform; Access to financing; Political incentives	The Mission on Adaptation to Climate Change focuses on supporting EU regions, cities and local authorities in their efforts to build resilience against the impacts of climate change.	Climate action	2021
Big buyers for climate and environment	36		Support mechanisms; Platform		Clean Energy	2018
ManagEnergy	311	Cities listed per energy agency	Support mechanisms; Platform		Clean	2002

Annex 2: Methodology and Supplementary Data

Methodology to gather geographical data

To look at the geographical coverage of the identified initiatives, we pulled together a database of LRAs that participate in each initiative. Our main source of information were the websites of the different initiatives. The database serves as the basis for the mapping and overlap analysis and an overview of the different initiatives included is below.

Table 12: Number of LRAs included in the database per each initiative

Initiative	EU Cities / Regions	Notes	Source
Big buyers for climate and environment	33	Participants of EU local and regional authorities.	<u>link</u>
Intelligent Cities Challenge	128	"Core", "Mentor" and "Consortium" cities.	<u>link</u>
Circular Cities and Regions Initiative	33	Both "pilots" and "fellows" cities and regions are included. Only regional and local authorities included.	<u>link</u>
CIVITAS	329	Member Cities that have signed the CIVITAS City Declaration to introduce ambitious sustainable urban mobility policies.	<u>link</u>
Clean Energy for EU Islands	77	Participating islands on EU Member States' territories.	<u>link</u>
Coal regions in transition	38	All regions are included (i.e. coal and lignite, peat and oil shale regions).	<u>link</u>
Energy Poverty Advisory Hub	32	Regional public partners to the initiative are included.	<u>link</u>
EU City Facility (EUCF)	161	EUCF beneficiaries included.	<u>link</u>
European Covenant of Mayors for Climate & Energy	10 850	Signatories for all commitments (2020, 2030, 2050 and Adaptation) and coordinators.	<u>link</u>
European Capital of Innovation (iCapital)	9	Winning cities.	<u>link</u>
European Green Capital Award	14	Winning cities.	<u>link</u>
European Green Leaf Award	15	Winning cities.	<u>link</u>
European Urban Initiative	28 ⁵⁰	As this initiative is recent, we considered the predecessor "European Innovative Action". Selected projects included for air quality, circular economy, climate adaptation, energy	<u>link</u>

⁵⁰ Number of selected projects only (within EU Member States) related to the following topics: air quality (8 projects approved out of 80 received), circular economy (9/150), climate adaptation (5/42), energy transition (2/113) and sustainable use of land and nature-based solutions (5/56). Projects selected from UK are not included in the mapping.

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Initiative	EU Cities / Regions	Notes	Source
	Ü	transition and sustainable use of land and nature based solutions.	
Green Cities Europe Award	3	Winning cities	<u>link</u>
Green City Accord	102	All signatories of the Accord.	<u>link</u>
EU Mission for Adaptation to Climate Change	194	All signatories of the mission charter.	<u>link</u>
EU Mission for Climate- Neutral and Smart Cities by 2030	100 ⁵¹	All selected cities.	link
Living-in.eu movement	86	Signatories of the movement.	<u>link</u>
Smart Cities Marketplace	292	"Smart Cities" listed on the initiative's website	<u>link</u>
Smart Specialisation Platform on Energy, Agri-Food and Industrial Modernisation (S3P)	74 ⁵²	Only "leading" and "participating" regions/cities in "Energy" theme are included	<u>link</u>
Sustainable Urban Mobility Plan (SUMP) Award	8	Winning cities only are included	<u>link</u>
URBACT III	206	URBACT III partner cities involved in climate, energy and environmental related projects of the initiative.	<u>link</u>
JPI Urban Europe	37	City partners	<u>link</u>

Note: Those numbers may slightly differ from those published by the relevant authorities due to data cleaning processes and adjustments, e.g. national authorities were excluded from the database, agglomeration of municipalities in some cases were disaggregated.

Caveats in the methodology

Some caveats related to the methodology used are:

- Differences in scope among initiatives. Some initiatives target all the LRAs in Europe, while others a limited subset (e.g. islands, coal regions), some can be undertaken by several authorities at the same time, while others are call-based or awards. This should be kept in mind when looking at the geographical distribution of initiatives.
- Local and regional authorities are not distinguished. One consequence is that local authorities may be undertaking a wider range of initiatives than the database would display depending on the regional participation (e.g. Venice may be taking actions covered by the EU Mission for Adaptation to Climate Change even if not participating in it directly, but rather indirectly via the regional participation of Veneto). For this reason, the quantitative overview needs to be looked at together with the interviews and case studies

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⁵¹ EU selected cities are included out of around 377 cities from all EU Member States as well as nine associated countries and countries negotiating association that submitted an expression of interest.

⁵² There are around 40 other regions/cities that are « interested », those were however not included in the mapping.

analysed in Chapter 4 to complement the picture.

• Differences in timeframe. Some initiatives are rather recent while others may be more established. This also influences uptake and should be kept in mind when looking at the analysis.

Supplementary tables and data details

Table 13. Clusters of initiatives according to the functionalities

1. Awards and Competitions, and or with direct funding:	2. Platforms for networking, direct exchange of good practices, political commitments, and leverage for interest representation:	3. Support services, including provisioning of case studies, trainings, technical support, and funding advice and leverage:
European Capital of Innovation (iCapital) European Green Capital Award European Green Leaf Award Sustainable Urban Mobility Plan (SUMP) Award EU City Facility (EUCF)	European Circular Economy Stakeholder Platform Nature Based Solutions Platform Smart Cities Marketplace One Stop Shop for Cities CIVITAS Coal regions in transition European Covenant of Mayors for Climate & Energy European Climate Pact Green City Accord Living-in.eu movement Green cities Europe Big Buyers for Climate and Environment Smart Specialisation Platform on Energy, Agri-Food and Industrial Modernisation (S3P)	Clean Energy for EU Islands Energy Poverty Advisory Hub EU Mission for Adaptation to Climate ChangeEU Mission for Climate-Neutral and Smart Cities by 2030 European Urban Initiative URBACT Circular Cities and Regions Initiative Affordable housing initiative Intelligent Cities Challenge ManagEnergyJPI Urban Europe

Table 14. Clusters of initiatives according to the themes

Clean Energy	Climate Action	Green Transition	Multiple focus	Other and sector- specific
Clean Energy for EU islands Coal Regions in transition Energy Poverty Advisory Hub EUCF ManagEnergy	EU Mission for Adaptation to Climate ChangeEU Mission for Climate-Neutral and Smart Cities by 2030JPI – Urban Europe	European Green Capital Award European Green Leaf Award Green Cities Europe Award Green City Accord	European Covenant of Mayors for Climate & Energy iCapital Europe Innovative Action Smart Cities Marketplace S3P URBACT	Big buyers for climate and environment Circular Cities and Regions Initiative CIVITASIntelligent Cities Challenge Living.eu movement SUMP Award ⁵³

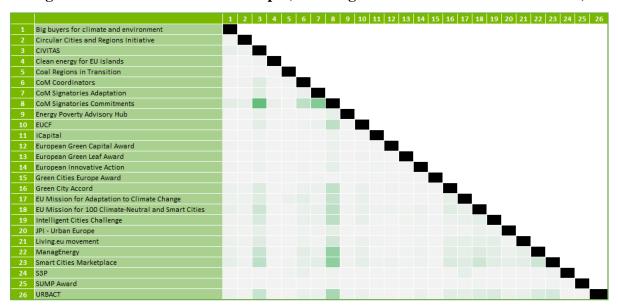
⁵³ Award for Sustainable Urban Mobility Planning by the European Mobility Week campaign. The Award is since 2021 not in use.

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Table 15. LRAs with more than 5 initiatives (CoR members in bold)

Country	Cities / regions
Austria	Vienna
Belgium	Antwerp, Leuven, Brussels
Bulgaria	Bourgas, Sofia
Croatia	Rijeka, Zagreb
Denmark	Aarhus, Copenhagen
Estonia	Tartu
Finland	Espoo, Jyväskylä, Lappeenranta, Tampere , Turku , Helsinki
France	Bordeaux, Grenoble, Lille, Lyon, Nantes, Nice, Paris
Germany	Dresden, Frankfurt am Main, Hamburg, Munich, Eindhoven
Greece	Ioannina, Trikala
Hungary	Budapest, Košice, Kecskemét
Ireland	Cork
Italy	Bologna, Bolzano , Florence , Genoa, Milan , Naples, Parma, Reggio Emilia, Rome , Turin
Latvia	Riga
Lithuania	Tallin
Netherlands	Amsterdam, Eindhoven, Rotterdam, Utrecht
Poland	Gdańsk, Warsaw, Wrocław
Portugal	Alba Iulia, Braga , Cascais, Lisbon, Porto, Torres Vedras, Guimarães
Romania	Bucarest, Suceava
Slovakia	Bratislava
Slovenia	Ljubljana, Maribor, Nova Gorica, Kranj, Rijeka
Spain	Barcelona, Madrid, Guimarães, Malaga, Seville, Valencia, Valladolid, Zaragoza,
G 1	Logroño, Granada, Murcia, Vitoria-Gasteiz
Sweden	Gothenburg, Lund, Malmö, Stockholm

Figure 11. Heated matrix of overlaps (including the CoM commitments initiative)





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European Committee of the Regions



Created in 1994, the European Committee of the Regions is the EU's political assembly of 329 regional and local representatives such as regional presidents or city-mayors from all 27 Member States, representing over 446 million Europeans.