

Phase I – Preparation and assessment

Lead expert guide

Overview and supporting material for physical events

Issue 1



European
Commission

The Intelligent Cities Challenge is funded by COSME, the EU
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This lead expert addendum is a guide for understanding your role in the programme, helping you channel your expertise to best support the city



What this document will provide

A guide to understanding your **role** and **responsibilities**

Support in setting up and **running in-person and online events**

Illustration of **event** and **activity types** and **objectives**

Guidance that helps ICC cities receive a **tailored experience but consistent high quality** across all cities

A source of **templates** for key deliverables



What this document will not provide

A **general introduction to the ICC methodology**. For this, see the methodological handbook.

An exhaustive view of all events – this is focused on areas where Lead Experts are leading, and so, e.g., city labs or TAGs are not detailed herein

A comprehensive guide of **delivery content** – experts are expected to design own material tailored to needs of assigned city

Overview to lead expert role

Events per phase

RECAP: Lead experts are a city's permanent coach; thematic experts provide targeted specialist advice along the way, overseen by the coordinators

Expert type

Overview of role



Lead experts

- Acts a city's **dedicated point of contact** for the full duration of the programme, providing 1:1 support
- Provides guidance on **common features of the programme** such as the assessment, strategy and roadmap activities
- Typically **native speaker** who can help you **interact with your ecosystem**



Thematic experts

- Serves as **targeted specialist support** for areas where cities wish to specialise
- Provides support to a **range of cities**, in **both 1:1 and 1:many** arrangements
- Speaks the language where possible



Thematic network coordinator

- Oversees all activities related to the **operation of each thematic network** and creates and curates Thematic Action Groups
- **Monitors quality and fit of materials and guidance** but does not advise cities directly

How should lead experts and city reps work together?

A lead expert should expect to be...



Shepherd

Guiding cities through the activities and formal requirements of the programme; help use your relative neutrality to bring new ecosystem players on board



Council

Providing advice on how best to approach the design, planning and delivery of a city's transformation with actionable advice



Coach

Help build city rep and ecosystem capabilities; call it out when things aren't going to plan and help the city get back on track



Cheerleader

Promoting city successes to other cities, and giving city reps the confidence to take risks on the journey; encourage collaboration and partnerships between different types of cities



Point of call

Dedicated to city reps, responsive in 48 hours for on-the-fly small queries of larger problem solving

...but you should not expect to...

Produce the deliverables

– lead experts can advise cities on content, review what cities produce and find relevant resources, but they are not there to write things on a city's behalf

Be the only one putting in the effort

– there will be considerable preparation, communication and critical thinking needed on the part of the city to be successful

Own the transformation

– cities are the masters of their own fate. The expert will become deeply embedded in the city and invested in its successes, but all decisions are ultimately the city's to take

Do low value logistical work

– cities are responsible for logistical arrangements for in-city events (you may however be asked to provide guidance on approach)

General guidelines for workshop facilitation

Flex your skillset to the role needed

As facilitator

- Ensure norms for a collaborative and open discussion are followed
- Provide initial conversation starters
- Ensure conversation flows smoothly and provide follow-up questions if conversation is lagging
- Monitor conversation to ensure group stays on-topic

As time-keeper

- Keep track of time during activity and give group a half-way warning
- Provide a 5-minute warning before activity ends
- Ensure prompt and on-time end to discussion

As learning provider

- Oversee room to answer any questions that may arise throughout activity
- Be prepared with extra-materials

Assign roles and responsibilities during breakout group discussions

A note taker

- Take notes that can be used to synthesize discussion and report back to larger group

A representative

- Volunteer to present group's findings/synthesis to larger group

Define norms for each workshop or meeting, for example:



Stay solution focused

- Determine what must be true for an idea to work



Build up, don't break down

- Take a problem-solving approach
- Build off others' ideas, don't squash them



Focus on required actions

- Determine what the next steps are and who should be responsible



Think "outside the box"

- Challenge incoming assumptions; remove boundaries from traditional thinking



No sacred cows

- No stones unturned



Bring solutions along with the problems

- Turn stories into constructive ideas



Be respectful

- One person speaks at a time
- Listen to all opinions and ideas



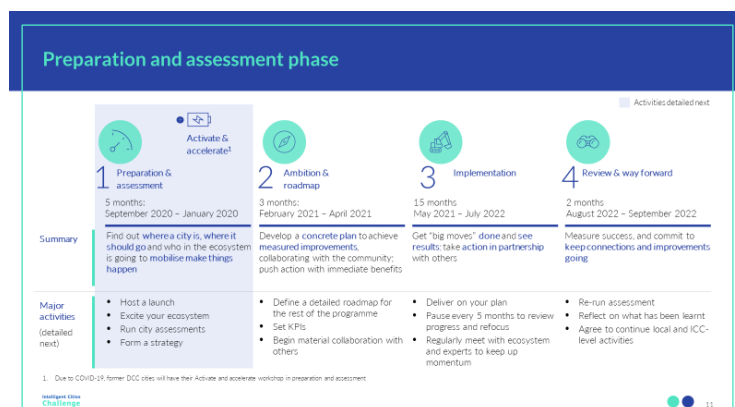
Remain realistic

- Proposed solutions must be feasible

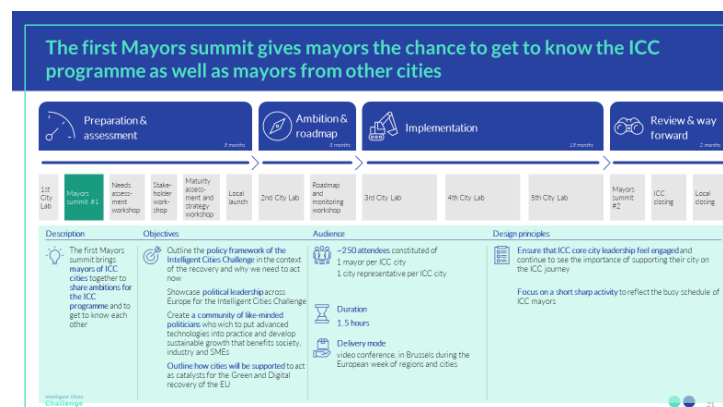
Overview to lead expert role

Events per phase

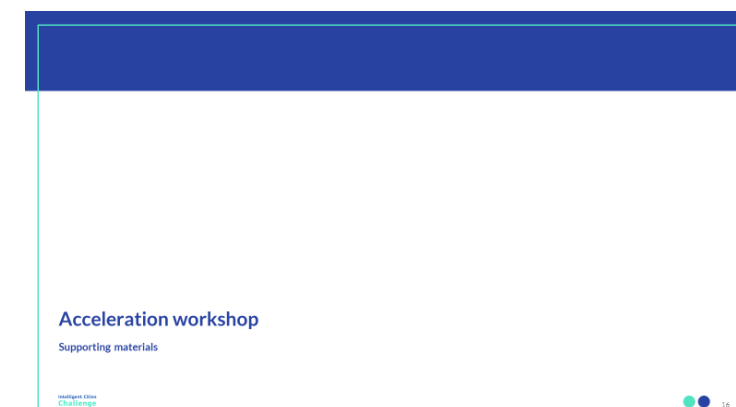
How to use this document



This section is first sorted by phase...



...exploring each activity in order, starting with a recap of purpose of the event, followed by additional content that may be helpful in running the activity...



...finishing (where relevant) with a set of templates for either activities or deliverables

This document is intended to steer and support Lead Experts in delivery, and provide clarity on expected outputs. Experts are expected to use their own expertise and local knowledge to build supporting presentations for events

Preparation and assessment phase







Activities detailed next



1. Due to COVID-19, former DCC cities will have their Activate and accelerate workshop in preparation and assessment







The ICC kick-off will launch cities on their ICC journey, inspired, and ready to collaborate



Description	Objectives	Audience	Design principles
 The ICC kick-off event celebrates the initiation of a joint intelligent city transformation journey and the beginning of a strong pan-European and international city community .	 Publicly launch ICC with participants and the press, sparking excitement Set the scene with major trends in the EU urban agenda and affirm the EU's commitment to sustainable urban development Introduce the ICC programme structure Inspire with successful mentor case studies Introduce and test the content of themes and transversal services Introduce cities to the idea of quick wins Encourage community building amongst ICC members	 ~200 attendees constituted of 2 attendees per participating city (170), EU and international mentors (~15), thematic experts and speakers (~15)  Duration 5 half days  Delivery mode Digital conference	 Spark excitement with high quality speakers front-loaded at the start of the week Engage participants through interactive communication tools like 'Mentimeter' during formats with large groups Focus on interactive activities and peer-to-peer discussions in breakout rooms , to set the tone that all multi-city meetings are collaborative and action-orientated Allow participants to voluntarily book 1 : 1 video calls with each other at the side of the programme Introduction of the day sessions to help cities understand the purpose of each day and orientate themselves on the agenda and closing sessions to help crystalise key learnings and gather feedback

The first Mayors summit gives mayors the chance to get to know the ICC programme as well as mayors from other cities



Description	Objectives	Audience	Design principles
 <p>The first Mayors summit brings mayors of ICC cities together to share ambitions for the ICC programme and to get to know each other</p>	 <p>Outline the policy framework of the Intelligent Cities Challenge in the context of the recovery and why we need to act now</p> <p>Showcase political leadership across Europe for the Intelligent Cities Challenge</p> <p>Create a community of like-minded politicians who wish to put advanced technologies into practice and develop sustainable growth that benefits society, industry and SMEs</p> <p>Outline how cities will be supported to act as catalysts for the Green and Digital recovery of the EU</p>	 <p>~150 attendees constituted of 1 mayor per ICC city 1 city representative per ICC city</p>  <p>Duration 1.5 hours</p>  <p>Delivery mode video conference, in Brussels during the European week of regions and cities</p>	 <p>Ensure that ICC core city leadership feel engaged and continue to see the importance of supporting their city on the ICC journey</p> <p>Focus on a short sharp activity to reflect the busy schedule of ICC mayors</p>

1:1 ecosystem interviews serve to understand, spot opportunities and generally warm up a city's powerful stakeholder networks



Objective



The objective is threefold:

Diagnose characteristics of the local ecosystem and its members, including sensitive topics that might not be shared plenary in the workshop

Get a **first perspective of the possible win-win opportunities** across multiple ecosystem members that will serve as content for the local ecosystem workshop

Warm up enthusiasm for the city's participation in the ICC

Focus



Targeted interview participants are:

Members of the local ecosystem representing **different interest groups** who can help the city better understand strengths, weaknesses, risks and opportunities

Important ecosystem stakeholders who the cities will not normally work with and may not feel comfortable speaking up during a workshop

Potential **ambassadors** who will actively support the city's vision and can play a strategic role in the ecosystem workshop to spark interest and help keep up the momentum

Tools



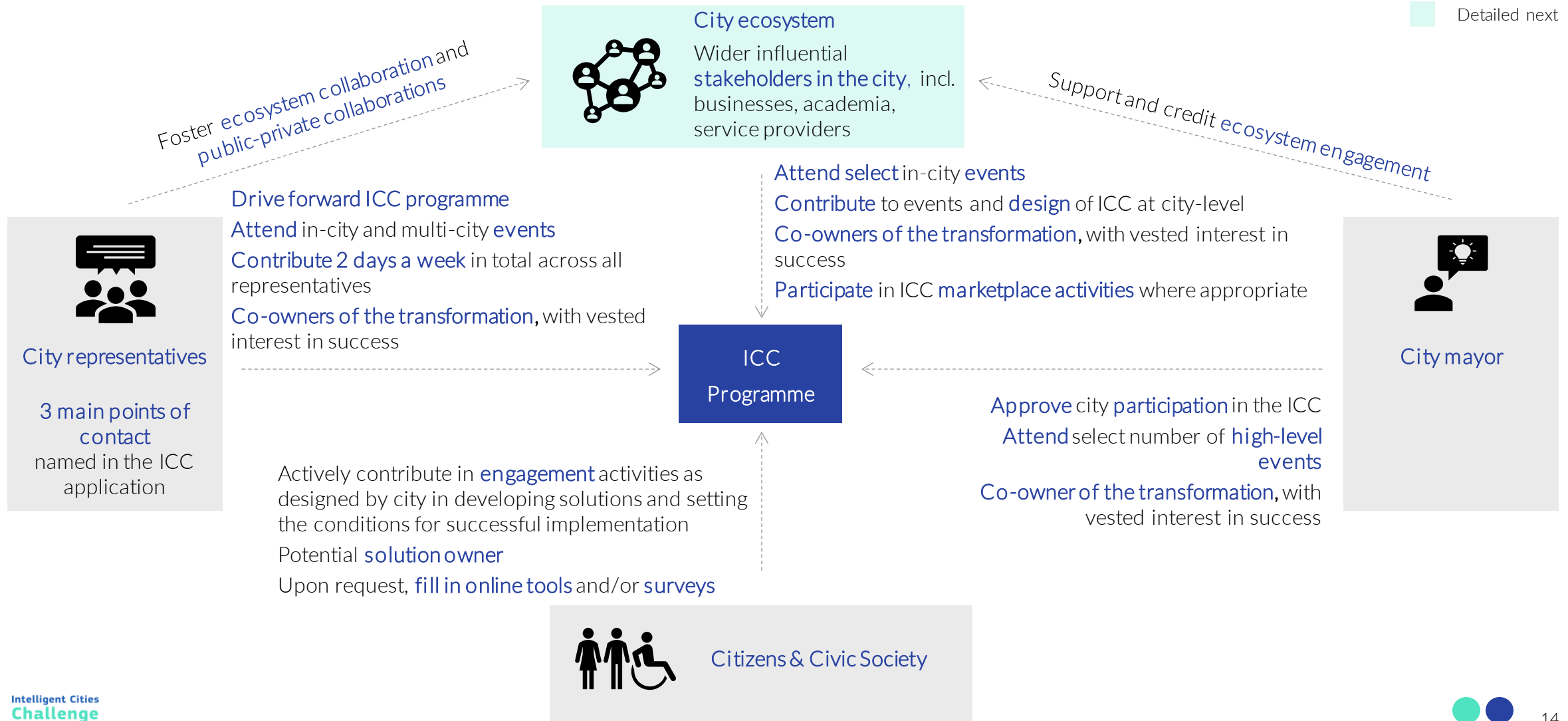
Stakeholder Mapping: a tool that assesses which people or groups of people are affected by the decisions or can influence the implementation of its decisions.

Stakeholder Mapping ensures that you know which stakeholders should be included and to which extend.

1-2-1 Interview checklist

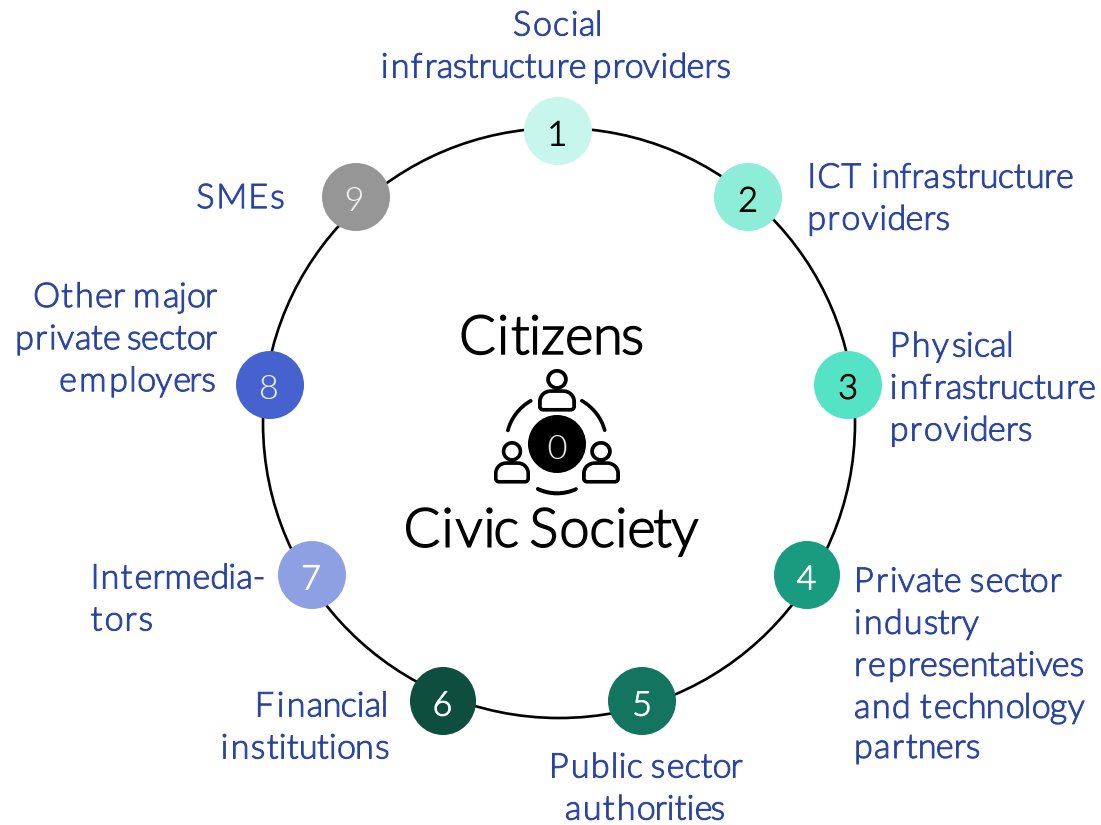
Interview Questionnaire: a set of questions to get you started

City representatives lead the engagement in ICC, but all parties work together to achieve success



While each city's ecosystem is unique, there is a wide range of ecosystem players that should be engaged

Example visualisation of ecosystem



- 0 **Citizens and Civic Society**, citizens are not passive consumers but also contributors as partners or local residents in problem solving or as producer. Civic society includes non governmental institutions that manifest interests also contribute to solutions
- 1 **Social infrastructure providers**, incl. academia and education, research institutions), healthcare providers (e.g., hospitals, care centres)
- 2 **ICT infrastructure providers**, incl. city connectivity and digital infrastructure, security providers and services
- 3 **Physical infrastructure service providers**, incl. energy utility, water utility, waste management, transport utility, postal services, real estate developers
- 4 **Private sector industry representatives and technology partners**, incl. startups, tech and media companies, incubators, accelerators
- 5 **Public sector authorities**, incl. representatives of national government, judiciary infrastructure and law enforcement, other local government entities not directly running the ICC
- 6 **Financial institutions**, incl. banks, trust companies, venture capital funds, insurance companies
- 7 **Intermediators**, incl. trusts, foundations, cross-ecosystem networks, trade unions and associations, citizen interest groups
- 8 **Other major private sector employers e.g., with HQ in city**, incl. retail, hospitality, food, leisure
- 9 **SMEs**, Innovation (start-up) hubs, incubators, accelerators,

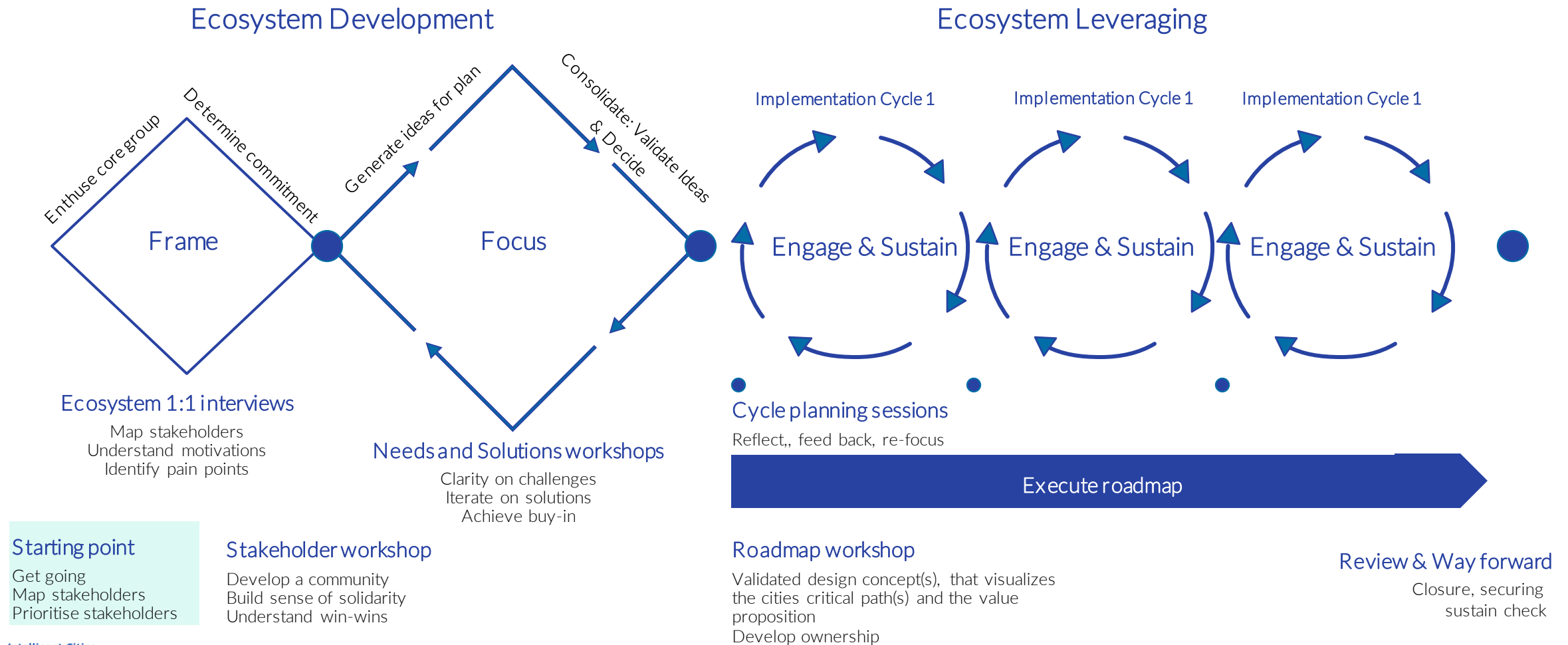
Ecosystem 1:1 interviews

Supporting materials

Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

■ Detailed next



Stakeholder mapping is a tool that assesses which people or groups of people are most important to the city

 Detailed next

Overview

Big programmes naturally have many stakeholders. Stakeholder mapping is a tool that assesses which people or groups of people are affected by the decisions or can influence the implementation of its decisions.

Objectives

Mapping stakeholders' influence and support stance is very important.

The first step is to explore who is a stakeholder in the program using brainstorming techniques.

Stakeholder Mapping ensures that you know which stakeholders should be included and at what level.

Actions could range from involvement in the very first conversations to just informing stakeholders on the progress of the program.

Stakeholder maps are never finalized and need to be updated every now and then.

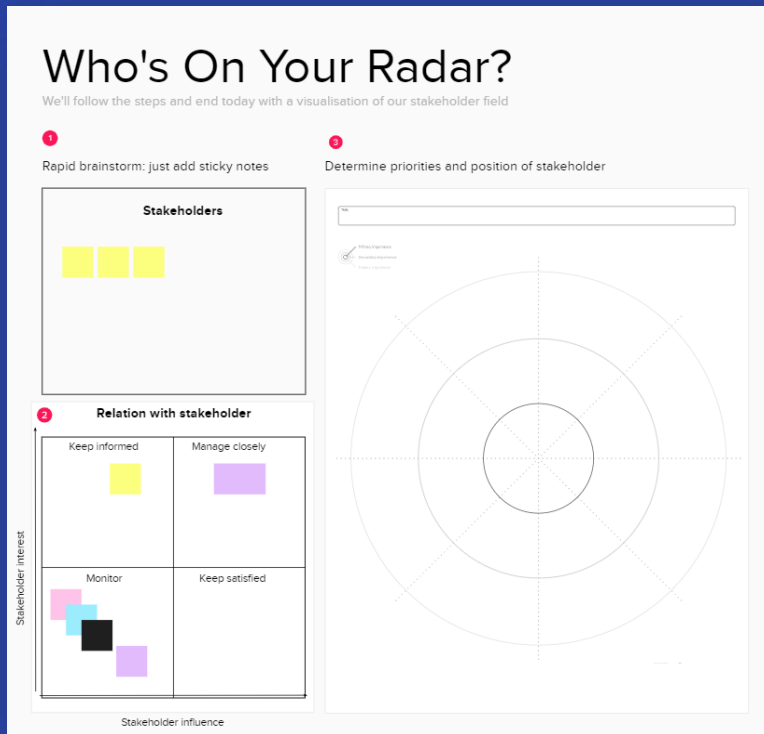
Suggested Process

1. **Brainstorm** to identify stakeholders
 - Produce list of functional groups e.g. programme delivery, suppliers / partners
 - Plot their significance on a matrix
 - Define the roles and responsibility of the stakeholders
2. **Identify** current and desired commitment levels
 - Define current and desire commitment level (building stakeholders map if applicable)
 - Validate with team
 - Check commitment levels with stakeholders
3. **Collect** stakeholder details
 - Create stakeholder management log to track stakeholders at programme / project level
4. **Plan** interaction and track relationship
 - Develop a communication plan for priority stakeholders
 - Implement communication plan
 - Track relationship
5. **Develop** and analyze Status reports
 - Produce and review individual communication plan

Stakeholder mapping: Brainstorming

Approach

Template to use: (zoom in)



Who's On Your Radar?

An interactive exercise to become familiar with your stakeholders.

Preparations: Provide enough space, walls, brown paper, sticky notes, pens to bring stakeholder mapping to a successful conclusion. There is also a digital version available

1. Rapid brainstorm

- Just at stick notes with every stakeholder you can think off to produce a list (potential) stakeholders
- Discuss the stakeholders listed on the sticky notes and critically examine whether you have overlooked any of them.
- In the case of overlap or interfaces, cluster them at the end of this step

2. Relation with stakeholder

- Create stakeholder matrix of stakeholder interest & stakeholder influence
- Divide the previously defined stakeholders in the matrix by scoring 1-5 on each dimension

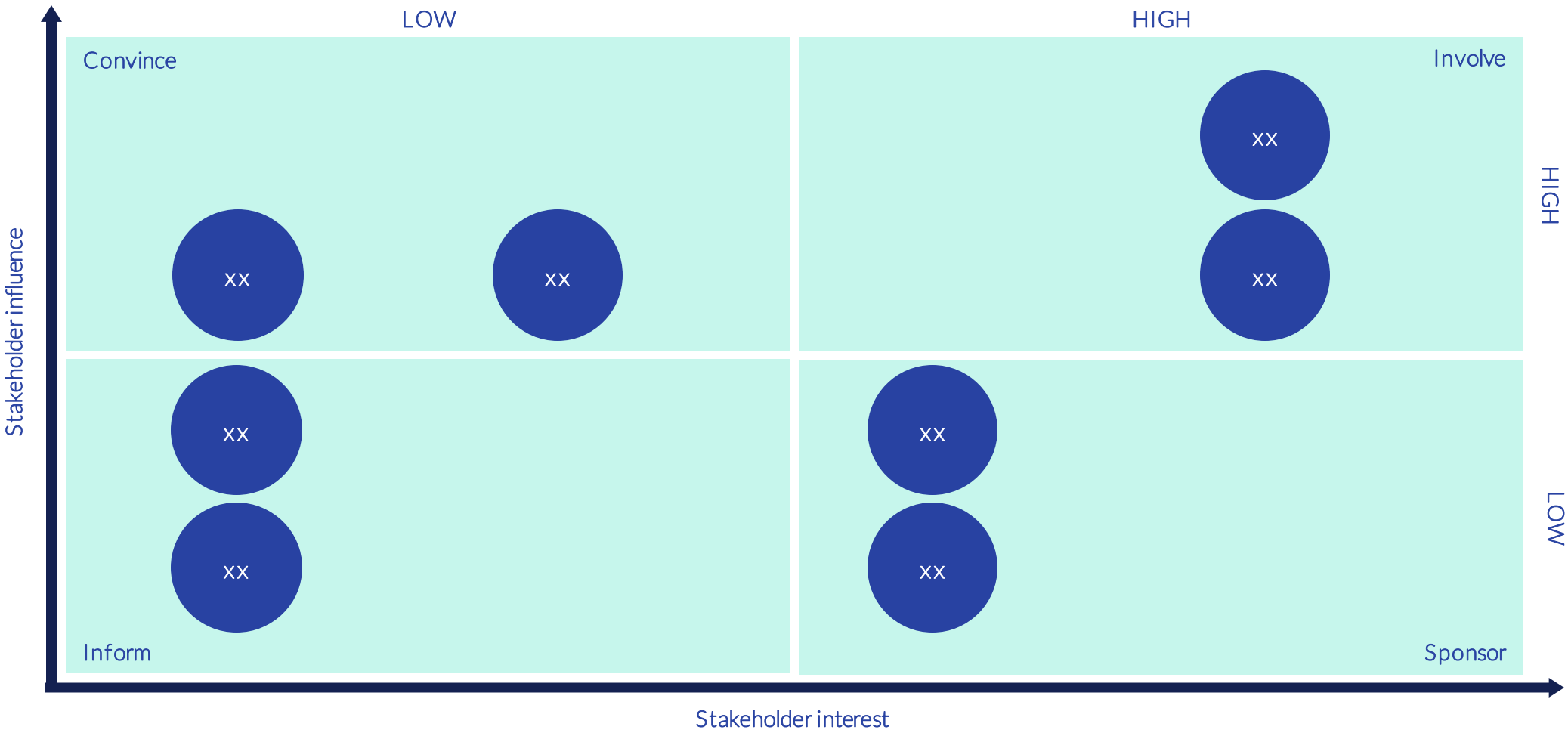
3. Determine priorities and position of stakeholders

- Prioritize stakeholder
- Track relationship

Tool to use: Klaxoon, Mural, or when held offline: post-its and whiteboards with markers.

Stakeholder mapping: Brainstorming

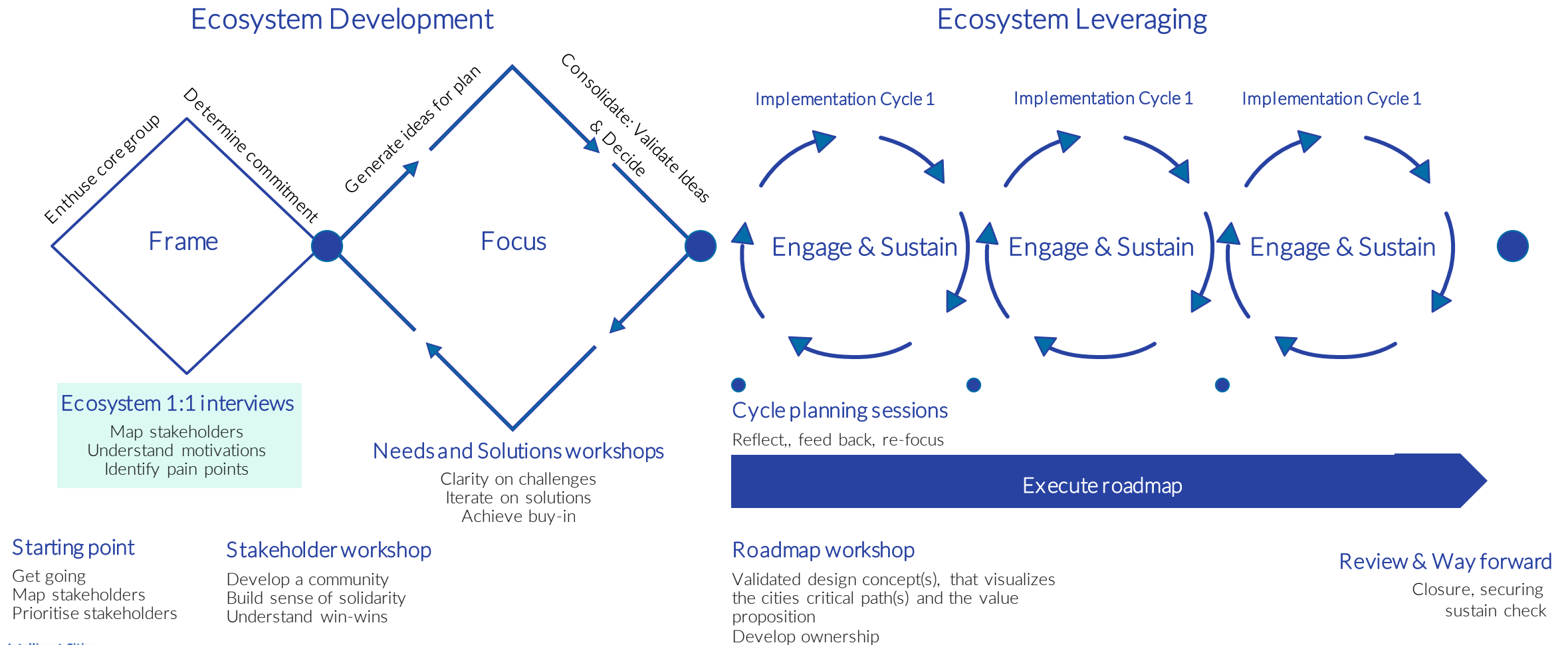
Template output



Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

■ Detailed next



Before the 1:1 ecosystem interviews it's important that cities work with lead experts to dissect the local stakeholder landscape

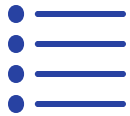


1:1 ecosystem
interviews

Key elements to consider in preparation to the interviews:



Use the [stakeholder mapping tool](#) in advance to identify who to interview. Do the exercise together with your local advisers to identify stakeholders you do not normally work with



Prioritise those stakeholders that could become your [ambassadors](#) and could unlock access to key stakeholders



Due to Covid-19 restrictions interviews can be done via [video conferencing](#) but make sure to use your camera for a more personal touch. Interviews are [ideally conducted by the lead expert](#) to stimulate a more open discussion



[Prepare questions in advance](#) - consult the ICC toolbox for a set of possible questions for a discussion between 30 to 45 minutes

Notes on using the supplied questions

General guidelines

The ecosystem interviews will be **organised by the city representatives in collaboration with the city lead expert**. The lead expert will propose a standard visit program based on his/her availability during in-city visits. The visit will consist of a mix of face-to-face and if deemed relevant collective interviews with city stakeholders. If Covid-19 prevents face-to-face interviews these should be held via video-conference. **Experts should aim to interview 5-10 stakeholders.**

The interviews can be build on the results of the ICC city scan (that was optional for cities to do). However the interviews should not be seen as an opportunity to fill out the ICC city scan. Instead, the **interviews should be used to deep dive, from a qualitative standpoint**, into the composition and the dynamics of the local eco-system.

Based on the stakeholder you are interviewing and the theme the city is leaning do, **you will need to tailor the questions.**

Notes from the interview should be written up, including interviewee name, type of stakeholder, date/time and other relevant details.

The following interview guidelines have been developed for a mock interview with a local eco-system representative. These should be adapted to the format of the interview (individual vs. collective, short or long), as well as the type of interviewee.

Key questions to consider when interviewing

What **motivates** this stakeholder? What do they aspire to? What are they afraid of?

What do they bring to the party? What capabilities do they lack but others might have?

What **history of collaborating** with the city does this stakeholder have?

Does this stakeholder have any **natural conflicts** with other stakeholders?

Does this stakeholder have any **particular thematic leanings**?

Does this stakeholder have any **existing initiatives** that can be leveraged?

Which stakeholders **warrant more time** in a longer interview? Which need less?

When does it make sense to do **these interviews without the city rep?** When is it better to have them present?

Detailed interview guidance

Introduction

Please take five minutes to position the ICC in your city's portfolio of related actions and the reason for which you are visiting them. Some pointers to keep in mind while explaining this are:

- ICC as one of the programmes the city is involved in that fits the city's vision, complements its current portfolio of actions
- This is an initiative sponsored by the EU, which selected cities with high potential to transform with the help of advanced technologies
- Make sure you highlight the link between technological transformation and growth / economic development / competitiveness
- Emphasize the collective dimension of the exercise and the fact that you would like their support and involvement throughout the process but also highlight this is an exciting opportunity for them
- Mention who the contact point at the city level is (i.e. local city project manager)
- You may already decide (if relevant) to invite them to join the local stakeholder workshop at this point
- Highlight you came to them because you think THEY are significant in the ecosystem because you would like THEM onboard – and that it is likely to bring them benefits
- The interview aims to:
 - Warm up enthusiasm for the city's participation in the ICC and gauge individual interest levels
 - Increase awareness on the city's participation in the programme
 - Diagnose characteristics of the local ecosystem and its members
 - Get a first perspective of the possible win-win opportunities across multiple ecosystem members that will serve as content for the local ecosystem workshop

Key learnings and outcome of the interview will be summarised in the stakeholder workshop

Background of the interviewee & expectations

What is your background and current position?

Could you explain the position of your organization within the broader context of the local eco-system and what function it carries out?

What are the main strategies of your organisation/company in relation to the city or theme?

Stakeholder expectations

Would you be interested in participating in the city's ICC journey?

If they are interested, what are your expectations regarding your engagement in a local ecosystem:

- Ways you could contribute? / What could the city learn from working with you?
- What has the city done right and what it still needs to achieve?
- What would you value from the other stakeholders in the local ecosystem?

What do you hope to get out of this collaboration? (What's in it for you?)

If they are not interested, what would make them?

Related initiatives to theme

Can you list the initiatives where you are currently playing a role?

How is the city currently facilitating/supporting your organization (funding, organizational support in the execution of your projects, etc.)?

What would you need to increase the success of current projects or to spur/launch new initiatives?

What is currently blocking you from implementing projects?

What are the unique features of the city that do help it to drive innovation and improvement?

Does the city do a good job of tracking impact?

Suggestions on how to move forward to the theme

To what extent are the policies/programmes/actions which are in place to support [theme] at the city level appropriate?

What are the specific fields you would like to see improvements in the short, mid and long term?







Where would you like the city to be in one, five and ten years when it comes to its [theme]?

What concrete actions would you like to see taken at the city level in order to engage the ecosystem?






What stakeholders are currently under or over represented in the steering and governance of the city's [theme] strategy?

The stakeholder workshop will bring together the ecosystem to discuss shared aspirations and focuses on 'local enablers' – unique characteristics of a city



Description	Objectives	Audience	Design principles
 A workshop bringing together all the relevant ecosystem stakeholders for the first time to identify win-win models of engagement throughout the ICC	 Understand what excites stakeholders , what motivates them to play a role in the transformation of the city and their ambitions Get to know who is who is who and how the community can benefit from engaging with one another Receive feedback on the local enablers and the needs assessment conducted in the earlier steps, whilst also acknowledging local weaknesses Gauge relative enthusiasm for further engagement – who are your champions? Jot down actions expected for the next workshop on maturity assessment	 ICC city representatives, Wider group of city ecosystem representatives (10-25 key partners in the ecosystem) 1 lead expert  Duration 1 day  Delivery mode In-person , led by lead expert	 Held after the 1:1 interviews and the needs assessment workshop to ensure city reps have a good understanding of the city's challenges, local enablers (strengths and weaknesses), currently employed solutions Uses the SAT tool to gather local enablers data so that stakeholders can express opinions anonymously before the meeting Comes after the ecosystem 1:1 interviews so that the lead expert can carefully shape the agenda towards win-win opportunities or away from sensitive topics

Stakeholder workshop I Suggested agenda

	 Schedule	 Agenda item	 Format	 Lead	 Suggested activities
	9.00-9.15	Introduction to the workshop and attendees	Presentation	Lead expert	Introduction to the workshop objectives and agenda of the day , round table of introduction (perhaps supported by faces page). Make it clear that we are early in the journey , much is still to be defined, but regardless of the direction, the city's ecosystem is critical and should be given space to share its perspectives
Part 1 - Where we want to go	9.15-9.30	The ICC story	Presentation	ICC city representatives	Share the city's draft vision for the ICC , explain the thought process that went in to this at the Needs workshop, and how this fits in the broader strategy of the city. Consider teasing out positive knock-ons for the ecosystem if this vision is achieved and focus on the excitement
	9.30-10.30	Discuss the vision	Presentation	ICC city representatives	Discuss the vision as a group . If responses are slow, option to go round the room and share; - One thing they like about the vision and its rationale - One thing they would challenge or improve upon (or a challenge the city will need to overcome to get there)
Part 1 - How we can work together to get there	10:30-11.30	Discuss local enablers	Presentation and group discussion	Lead expert	Present insights of what defines the city ecosystem and what people consider to be its strengths and weaknesses, derived from the local enablers questionnaire . Frame these as concepts that may help or hinder the vision . Transition in to group discussion, example structure: How do we all see the city? What makes it special? Where do we share the same views? Where do we see things differently? What do we see as the city's strengths and how can we use these to achieve the vision? Where do we see our city's weaknesses , and what can we do about them to make sure they don't get in the way of the vision? Are there any structural issues in the ways in which the ecosystem works together today that we can improve for the ICC? Are there any key stakeholders that we have not yet engaged that are important to the vision?
	11.00-11.30	What does good collaboration look like?	Group discussion and ideation session	Lead expert	Discuss what stakeholders want to achieve and what would inspire collaboration ; what is it that they want to get out of the programme? What are they keen to bring to the table? Consider past and current successful initiatives – what did successful projects have in common, what mistakes did less successful projects do that we can learn from? What do we all agree on and what issues do we need to return to in future meetings?
	11.30-12.00	Identify win-win models	Group discussion and ideation session	Lead expert	Combining both our discussions on the vision and collaboration: distill what win-win-models would look like. Not diving into concrete solutions just yet, but identify practical conditions to a good form of collaboration . To end, each party round the table mentions one thing they would like to achieve in the next 12 months through the ICC and something they would like to see the city achieve by end of the ICC
	12.00-12.15	Look forward: what to expect + closing	Wrap-up	Lead expert	Give overview of what to expect in the further trajectory of the ICC and how today contributed to a good start. Highlight that as a next step, the vision will be refined, and the next workshop of the city will discuss solutions to achieve that vision
	12:15- 13.00	Networking	Informal	All	Networking and refreshments to foster city-ecosystem relationships

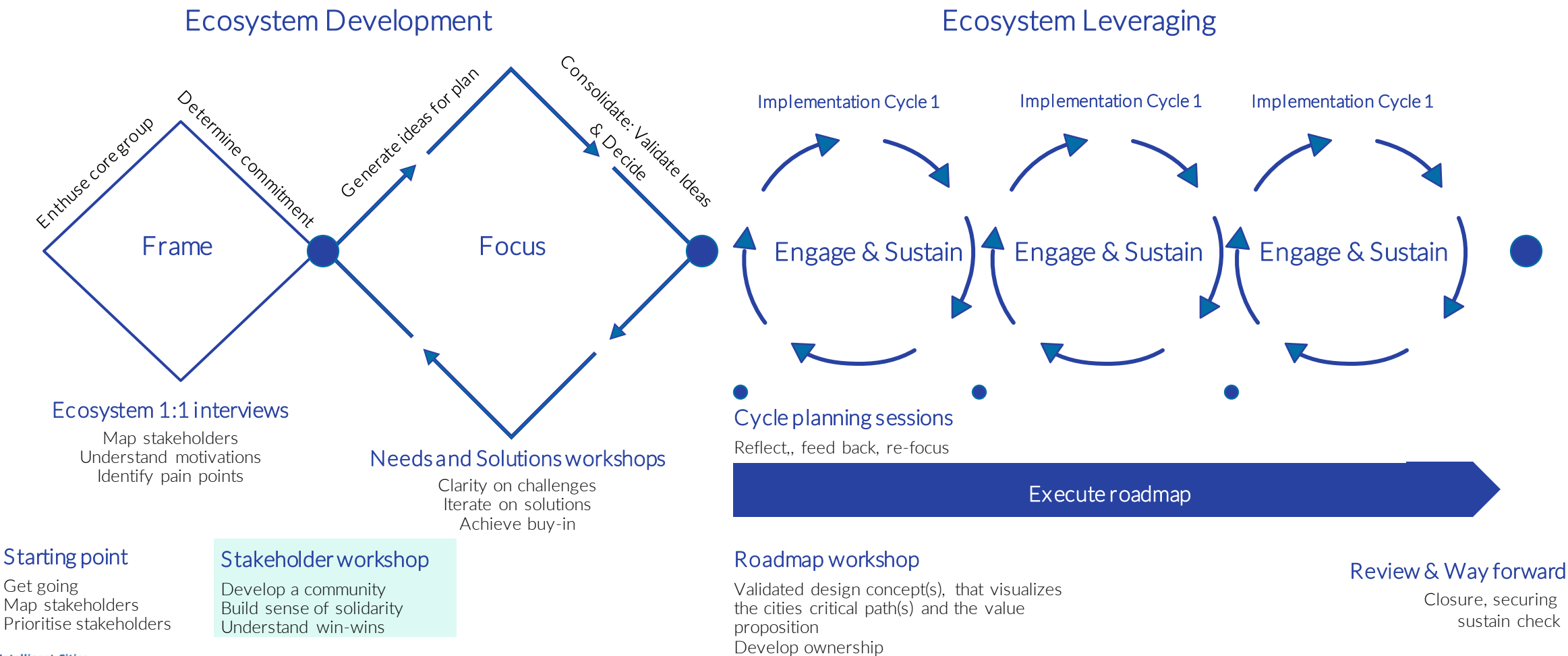
Stakeholder workshop

Supporting materials

Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

Detailed next



Why assess local enablers?



Local enablers

The effectiveness of any city initiatives depends on a number of **non-quantifiable factors** that are called “Local Enablers”. These are unique characteristics of the city that should be harnessed when creating any city strategy to make it specific and thus more successful. They may cover the city’s culture, economy, geography or other relevant facets. Local enablers should be considered when defining and developing advanced technology solutions.

What this can do

- ✓ Provide an initial assessment of a city’s particular strengths and weaknesses beyond the quantitative indicators
- ✓ Helps cities to design ICC initiatives and the corresponding roadmaps in line with their strengths

What this cannot do

- ✗ Predict changes in local enablers over time
- ✗ Quantify the impact of the respective factors

Used to assess? ☒ Used to track? ☐



Local enablers questions need to be supplemented with city-specific questions and shared on an appropriate survey tool

Output of local enablers

Local enablers will serve three purposes:

1. To provide a starter for discussion at the at the local stakeholders workshop
2. To provide lead experts and city reps with an insight in to ecosystem that they refer to back to at the Needs Workshop, Solution Workshop and Roadmap Workshop
3. To provide the overall ICC programme with an insight on how different cities compare and identify issues where one city can provide coaching to others at a city lab

How to use local enablers

1. Review the suggested local enablers questions that follow
2. Add any additional questions of importance to your city or remove questions, but remember;
 - Questions should only be included if the answer might provoke a useful discussion among the city ecosystem, or could inform the design your city's activities on the ICC programme
 - Type A questions are far easier to answer than Type B
 - Questions should be of general relevance to all stakeholder types – specific questions can be asked to individual stakeholders later
 - This is an ideal time to ask more sensitive topics while respondents can be anonymous
3. Upload the questions to a suitable survey tool, either from your city, your organization, or a third party like SurveyMonkey
4. Share the survey with invitees to the Stakeholder Workshop
5. Send necessary reminders to fill out a week in advance of the Stakeholder Workshop
6. Choose selected insights from the results to discuss in the Stakeholder Workshop

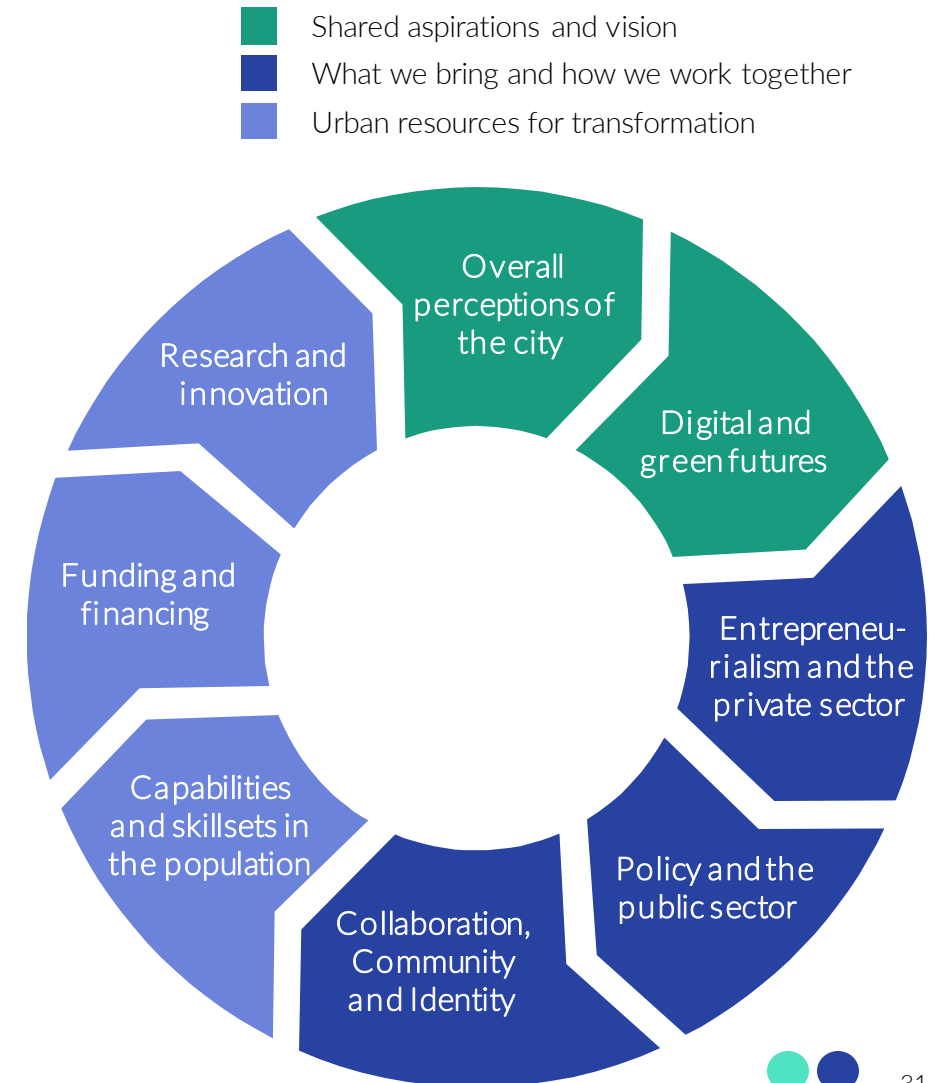
Local enablers reveal city-specific strengths and weaknesses that complement the city performance and maturity assessments

The local ecosystem enablers

The objective of this assessment is to explore the city's strengths and weaknesses that complement the city performance ("needs") and maturity ("solutions") assessments. This assessment aims to understand the unique characteristics of the city that will come to tailor your approaches to the transformation of your city. Broadly, these questions cover:

- **Shared aspirations and vision** – do all stakeholders see the city in the same light and believe we are already on a journey?
- **What we bring and how we work together** – what capabilities are different parties bringing to the party? Do we work together well in ecosystem situations?
- **Urban resources for transformation** – does our wider city more broadly have the typical assets needed for a major transformation like access to capital, a skilled labour force and critical thinking

What follows is a suggested list of questions that can be added to or reduced.



Local enablers template questions - detail

<div> <div>Key</div> <div>Type A = Strongly agree / agree / neutral / disagree / strongly disagree</div> <div>Type B = free text response</div> </div>							
Overall perceptions of the city	Digital and green futures	Entrepreneurialism and the private sector	Policy and the public sector	Collaboration, Community and Identity	Capabilities and skillsets in the population	Funding and financing	Research and innovation assets
<p>What makes this city great?</p> <p>What is this city's greatest weakness?</p> <p>Which industries define this city in your eyes?</p> <p>What one thing does this city have that most do not?</p> <p>What one word would you use to describe your city?</p> <p>Our city has a strong identity that stakeholders and citizens are proud of</p>	<p>There is a clear vision in our city on digital innovation and smart cities</p> <p>There is a clear vision in our city on our response to the green deal and decarbonisation</p> <p>I generally support the city's visions</p> <p>My city is more digitally innovative than most</p> <p>My city has an open data strategy and this generally brings value to the city</p> <p>Citizens of this city are generally trusting when it comes to data privacy, security and ethics</p> <p>There is a norm of sharing data between city stakeholders</p> <p>Decarbonisation is a top priority in our citizen's minds</p> <p>We are making progress towards the EU's goal of 55% CO2 emission reduction by 2030 and net zero by 2050</p> <p>Others look to us for inspiration on green innovation</p> <p>It's clear to me what are targets are for digital and green transitions and we regularly track our progress</p> <p>The city's plans and corresponding actions are well designed but local impact until now has been limited</p> <p>Is there one particular part of the city's digital or green future that you are particularly passionate about?</p> <p>In what ways do you think the city's green and digital future can also create jobs and growth?</p> <p>Other comments?</p>	<p>Which sectors have been particularly successful at driving new technologies so and why?</p> <p>Which are still lagging but have high potential?</p> <p>What are some of the main barriers keeping the private sector from making a more intensive use of technological solutions (e.g. cultural, financial, skills-related)?</p> <p>What opportunities do you see for technology solutions to help overcome some of the private sector's key development challenges?</p> <p>Over the last 5 years the private sector has helped drive economic growth and employment in the city</p> <p>There are opportunities for both big and small businesses in this city</p> <p>The private sector is generally more digitally innovative than the public sector in my city</p> <p>There is continuous stream of new ideas and innovative proposals from start-up economy to other stakeholders</p> <p>We have a vibrant start up community, and anyone with a new viable business idea can get support to build on it</p> <p>The private sector gives enough acknowledgment of local authority policy objectives</p> <p>The private sector is held back in technological development by the public sector</p> <p>Other comments?</p>	<p>What one thing does the local authority do well?</p> <p>What one thing could the local authority do better?</p> <p>There is a culture of experimentation within the city governance and taking measured risks</p> <p>The regulative environment allows others to experimentation and launching of new initiatives</p> <p>Public sector leadership in this city has a long term mindset</p> <p>The speed of legislative / administrative process is fast</p> <p>It's easy for citizens to get what they need from public processes</p> <p>The capability of public sector civil servants is generally high</p> <p>It feels like the local government works in siloes</p> <p>We are very reliant on National policies to determine our future</p> <p>We have a strong sense of civic community who engage in government decision making and our citizens generally feel heard</p> <p>Other comments?</p>	<p>The level of collaboration between private / public sector players is high</p> <p>The existing interest groups and consortia in the city are strong, persist over time and city authorities recognize that urban leadership has many forms</p> <p>Public and private collaboration is supported by the wider population</p> <p>The city regularly collaborates with other cities</p> <p>We are known for being a city that takes control of its future</p> <p>I find it is easy to connect with city leadership, I feel I know them well and can easily be heard</p> <p>The EU is popular in the local population and its ideals inspire people to act</p> <p>The ecosystem often finds it hard to square the achievement of political objectives and the need for private sector to be profitable</p> <p>Technology development between local stakeholders can deliver win-win benefits</p> <p>Collaboration with other local stakeholders only costs me time without any tangible benefits</p> <p>Other comments?</p>	<p>The city has a high skill population compared to others in my country</p> <p>It is easy to find competent people for new initiatives when needed</p> <p>It is easy for anyone to access training through public or private courses</p> <p>As a city we are good at pre-empting and reacting to new skill needs</p> <p>Available upskilling/reskilling courses are of sufficient quality</p> <p>What types of skills are in high demand? In which sectors?</p> <p>Other comments?</p>	<p>Availability of public grants / tax incentives for new initiatives is high</p> <p>Access to private financing for new urban initiatives is easy</p> <p>It is easy to receive international funding to initiatives within the city</p> <p>The city has benefited a great deal from EU funding historically (e.g. structural funds)</p> <p>We experiment with innovative business models e.g., outcomes-contracts in procurement, social impact bonds, subscription packages to city services</p> <p>It is easy to agree on public/private co-funding for a new initiative</p> <p>What do you think will be the most important funding or financing arrangements for your future city transformation?</p> <p>Other comments?</p>	<p>We have access to a high quality Higher Education Institution capable of supporting the transformation</p> <p>Higher Education Institutions are well connected with other international organisations and initiatives</p> <p>The Higher Education Institution performs research in cooperation with other city stakeholders</p> <p>Research in Universities is either too empirical or otherwise lacks a direct link to local challenges, preventing meaningful impact on the ground</p> <p>EU research in particular has brought benefits to my city</p> <p>Other comments?</p>

Lead expert guide

Overview and supporting material for physical events

Issue 1



European
Commission

The Intelligent Cities Challenge is funded by COSME, the EU
programme for the Competitiveness of Enterprises and SMEs

This lead expert addendum is a guide for understanding your role in the programme, helping you channel your expertise to best support the city



What this document will provide

A guide to understanding your **role** and **responsibilities**

Support in setting up and **running in-person and online events**

Illustration of **event** and **activity types** and **objectives**

Guidance that helps ICC cities receive a **tailored experience but consistent high quality** across all cities

A source of **templates** for key deliverables



What this document will not provide

A **general introduction to the ICC methodology**. For this, see the methodological handbook.

An exhaustive view of all events – this is focused on areas where Lead Experts are leading, and so, e.g., city labs or TAGs are not detailed herein

A comprehensive guide of **delivery content** – experts are expected to design own material tailored to needs of assigned city

Overview to lead expert role

Events per phase

RECAP: Lead experts are a city's permanent coach; thematic experts provide targeted specialist advice along the way, overseen by the coordinators

Expert type

Overview of role



Lead experts

- Acts a city's **dedicated point of contact** for the full duration of the programme, providing 1:1 support
- Provides guidance on **common features of the programme** such as the assessment, strategy and roadmap activities
- Typically **native speaker** who can help you **interact with your ecosystem**



Thematic experts

- Serves as **targeted specialist support** for areas where cities wish to specialise
- Provides support to a **range of cities**, in **both 1:1 and 1:many** arrangements
- Speaks the language where possible



Thematic network coordinator

- Oversees all activities related to the **operation of each thematic network** and creates and curates Thematic Action Groups
- **Monitors quality and fit of materials and guidance** but does not advise cities directly

How should lead experts and city reps work together?

A lead expert should expect to be...



Shepherd

Guiding cities through the activities and formal requirements of the programme; help use your relative neutrality to bring new ecosystem players on board



Council

Providing advice on how best to approach the design, planning and delivery of a city's transformation with actionable advice



Coach

Help build city rep and ecosystem capabilities; call it out when things aren't going to plan and help the city get back on track



Cheerleader

Promoting city successes to other cities, and giving city reps the confidence to take risks on the journey; encourage collaboration and partnerships between different types of cities



Point of call

Dedicated to city reps, responsive in 48 hours for on-the-fly small queries of larger problem solving

...but you should not expect to...

Produce the deliverables

– lead experts can advise cities on content, review what cities produce and find relevant resources, but they are not there to write things on a city's behalf

Be the only one putting in the effort

– there will be considerable preparation, communication and critical thinking needed on the part of the city to be successful

Own the transformation

– cities are the masters of their own fate. The expert will become deeply embedded in the city and invested in its successes, but all decisions are ultimate the city's to take

Do low value logistical work

– cities are responsible for logistical arrangements for in-city events (you may however be asked to provide guidance on approach)

General guidelines for workshop facilitation

Flex your skillset to the role needed

As facilitator

- Ensure norms for a collaborative and open discussion are followed
- Provide initial conversation starters
- Ensure conversation flows smoothly and provide follow-up questions if conversation is lagging
- Monitor conversation to ensure group stays on-topic

As time-keeper

- Keep track of time during activity and give group a half-way warning
- Provide a 5-minute warning before activity ends
- Ensure prompt and on-time end to discussion

As learning provider

- Oversee room to answer any questions that may arise throughout activity
- Be prepared with extra-materials

Assign roles and responsibilities during breakout group discussions

A note taker

- Take notes that can be used to synthesize discussion and report back to larger group

A representative

- Volunteer to present group's findings/synthesis to larger group

Define norms for each workshop or meeting, for example:



Stay solution focused

- Determine what must be true for an idea to work



Build up, don't break down

- Take a problem-solving approach
- Build off others' ideas, don't squash them



Focus on required actions

- Determine what the next steps are and who should be responsible



Think "outside the box"

- Challenge incoming assumptions; remove boundaries from traditional thinking



No sacred cows

- No stones unturned



Bring solutions along with the problems

- Turn stories into constructive ideas



Be respectful

- One person speaks at a time
- Listen to all opinions and ideas



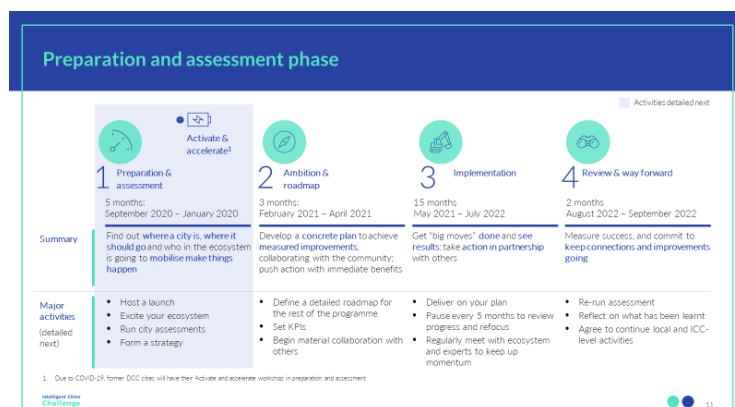
Remain realistic

- Proposed solutions must be feasible

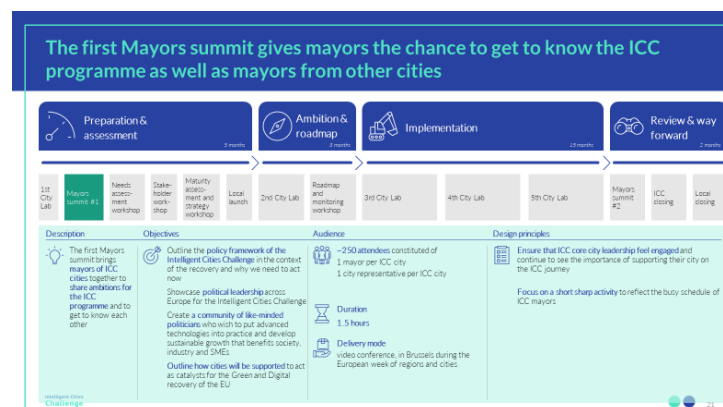
Overview to lead expert role

Events per phase

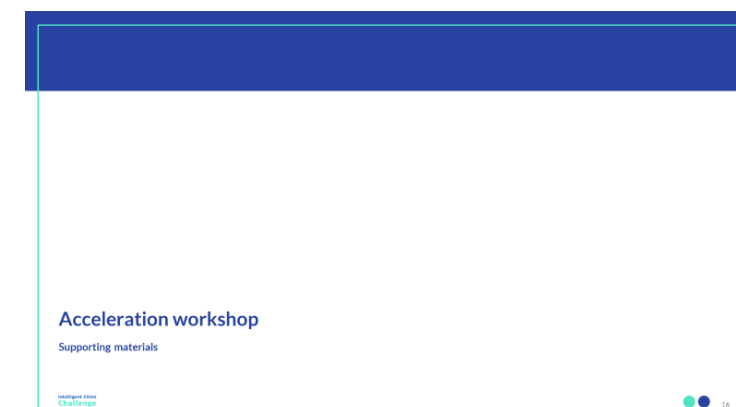
How to use this document



This section is first sorted by phase...



...exploring each activity in order, starting with a recap of purpose of the event, followed by additional content that may be helpful in running the activity...



...finishing (where relevant) with a set of templates for either activities or deliverables

This document is intended to steer and support Lead Experts in delivery, and provide clarity on expected outputs. Experts are expected to use their own expertise and local knowledge to build supporting presentations for events

Preparation and assessment phase







Activities detailed next



1. Due to COVID-19, former DCC cities will have their Activate and accelerate workshop in preparation and assessment







The ICC kick-off will launch cities on their ICC journey, inspired, and ready to collaborate



Description	Objectives	Audience	Design principles
 The ICC kick-off event celebrates the initiation of a joint intelligent city transformation journey and the beginning of a strong pan-European and international city community .	 Publicly launch ICC with participants and the press, sparking excitement Set the scene with major trends in the EU urban agenda and affirm the EU's commitment to sustainable urban development Introduce the ICC programme structure Inspire with successful mentor case studies Introduce and test the content of themes and transversal services Introduce cities to the idea of quick wins Encourage community building amongst ICC members	 ~200 attendees constituted of 2 attendees per participating city (170), EU and international mentors (~15), thematic experts and speakers (~15)  Duration 5 half days  Delivery mode Digital conference	 Spark excitement with high quality speakers front-loaded at the start of the week Engage participants through interactive communication tools like 'Mentimeter' during formats with large groups Focus on interactive activities and peer-to-peer discussions in breakout rooms , to set the tone that all multi-city meetings are collaborative and action-orientated Allow participants to voluntarily book 1 : 1 video calls with each other at the side of the programme Introduction of the day sessions to help cities understand the purpose of each day and orientate themselves on the agenda and closing sessions to help crystallise key learnings and gather feedback

The first Mayors summit gives mayors the chance to get to know the ICC programme as well as mayors from other cities



Description	Objectives	Audience	Design principles
 <p>The first Mayors summit brings mayors of ICC cities together to share ambitions for the ICC programme and to get to know each other</p>	 <p>Outline the policy framework of the Intelligent Cities Challenge in the context of the recovery and why we need to act now</p> <p>Showcase political leadership across Europe for the Intelligent Cities Challenge</p> <p>Create a community of like-minded politicians who wish to put advanced technologies into practice and develop sustainable growth that benefits society, industry and SMEs</p> <p>Outline how cities will be supported to act as catalysts for the Green and Digital recovery of the EU</p>	 <p>~150 attendees constituted of 1 mayor per ICC city 1 city representative per ICC city</p>  <p>Duration 1.5 hours</p>  <p>Delivery mode video conference, in Brussels during the European week of regions and cities</p>	 <p>Ensure that ICC core city leadership feel engaged and continue to see the importance of supporting their city on the ICC journey</p> <p>Focus on a short sharp activity to reflect the busy schedule of ICC mayors</p>

1:1 ecosystem interviews serve to understand, spot opportunities and generally warm up a city's powerful stakeholder networks



Objective



The objective is threefold:

Diagnose characteristics of the local ecosystem and its members, including sensitive topics that might not be shared plenary in the workshop

Get a **first perspective of the possible win-win opportunities** across multiple ecosystem members that will serve as content for the local ecosystem workshop

Warm up enthusiasm for the city's participation in the ICC

Focus



Targeted interview participants are:

Members of the local ecosystem representing **different interest groups** who can help the city better understand strengths, weaknesses, risks and opportunities

Important ecosystem stakeholders who the cities will not normally work with and may not feel comfortable speaking up during a workshop

Potential **ambassadors** who will actively support the city's vision and can play a strategic role in the ecosystem workshop to spark interest and help keep up the momentum

Tools



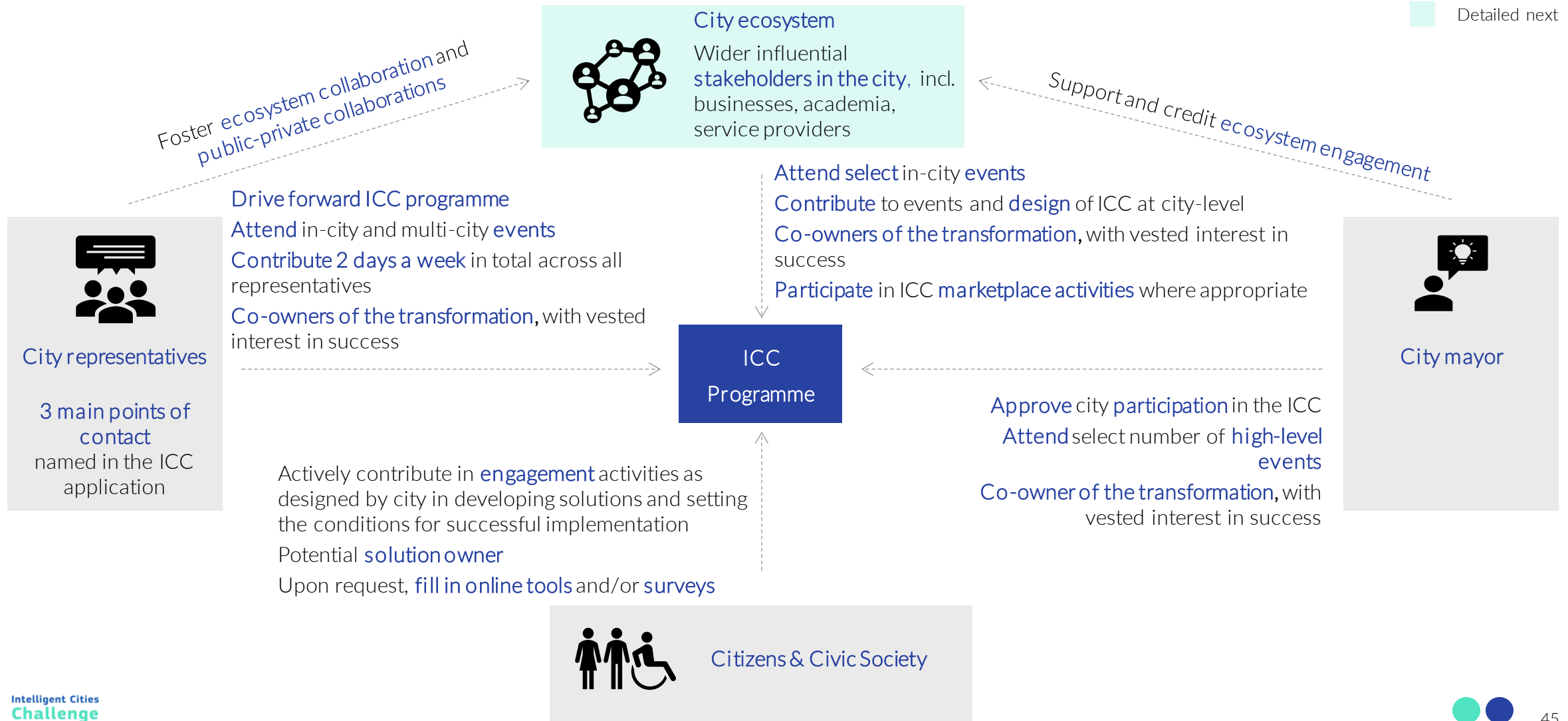
Stakeholder Mapping: a tool that assesses which people or groups of people are affected by the decisions or can influence the implementation of its decisions.

Stakeholder Mapping ensures that you know which stakeholders should be included and to which extend.

1-2-1 Interview checklist

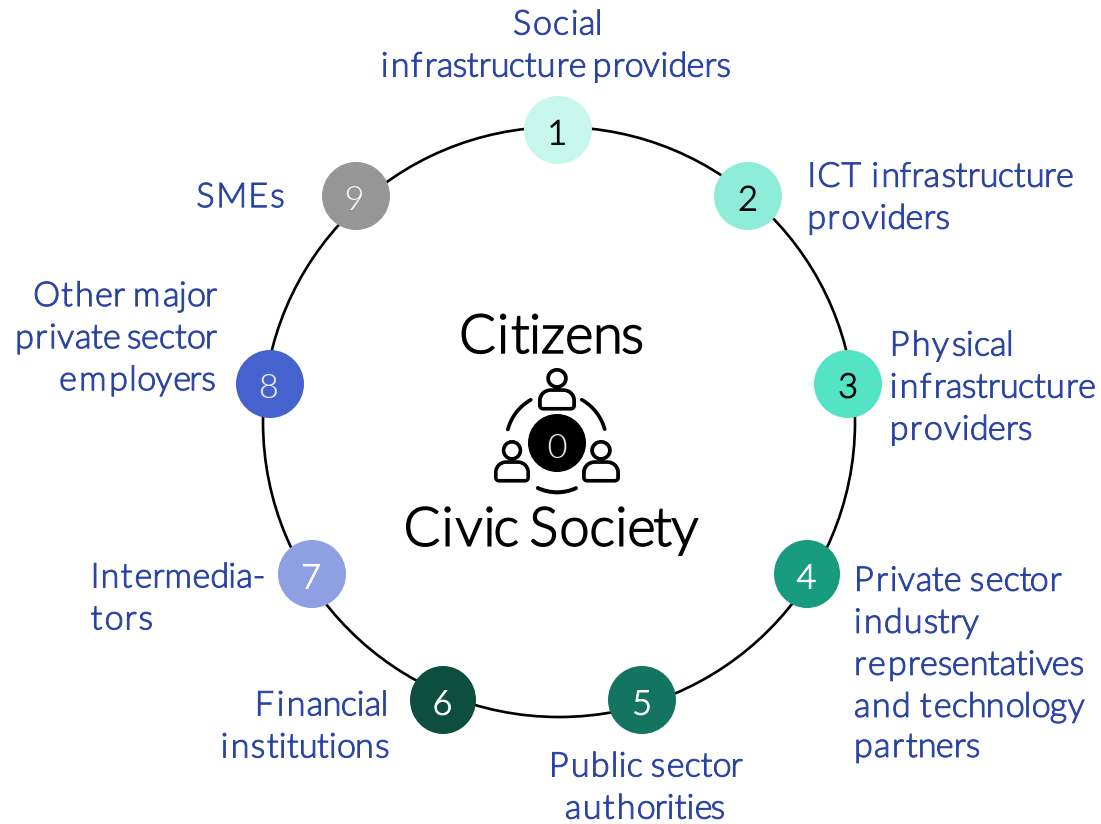
Interview Questionnaire: a set of questions to get you started

City representatives lead the engagement in ICC, but all parties work together to achieve success



While each city's ecosystem is unique, there is a wide range of ecosystem players that should be engaged

Example visualisation of ecosystem



- 0 **Citizens and Civic Society**, citizens are not passive consumers but also contributors as partners or local residents in problem solving or as producer. Civic society includes non governmental institutions that manifest interests also contribute to solutions
- 1 **Social infrastructure providers**, incl. academia and education, research institutions), healthcare providers (e.g., hospitals, care centres)
- 2 **ICT infrastructure providers**, incl. city connectivity and digital infrastructure, security providers and services
- 3 **Physical infrastructure service providers**, incl. energy utility, water utility, waste management, transport utility, postal services, real estate developers
- 4 **Private sector industry representatives and technology partners**, incl. startups, tech and media companies, incubators, accelerators
- 5 **Public sector authorities**, incl. representatives of national government, judiciary infrastructure and law enforcement, other local government entities not directly running the ICC
- 6 **Financial institutions**, incl. banks, trust companies, venture capital funds, insurance companies
- 7 **Intermediators**, incl. trusts, foundations, cross-ecosystem networks, trade unions and associations, citizen interest groups
- 8 **Other major private sector employers e.g., with HQ in city**, incl. retail, hospitality, food, leisure
- 9 **SMEs**, Innovation (start-up) hubs,, incubators, accelerators,

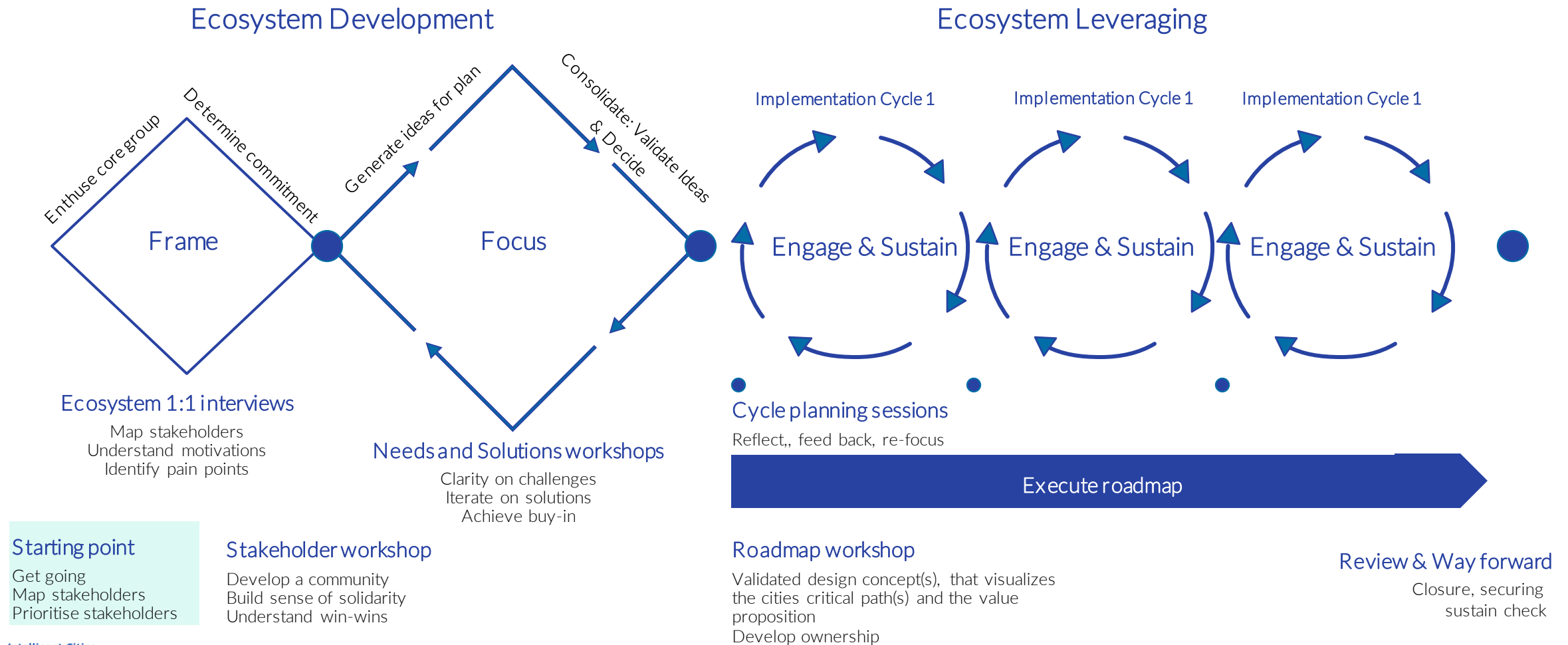
Ecosystem 1:1 interviews

Supporting materials

Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

■ Detailed next



Stakeholder mapping is a tool that assesses which people or groups of people are most important to the city

 Detailed next

Overview

Big programmes naturally have many stakeholders. Stakeholder mapping is a tool that assesses which people or groups of people are affected by the decisions or can influence the implementation of its decisions.

Objectives

Mapping stakeholders' influence and support stance is very important.

The first step is to explore who is a stakeholder in the program using brainstorming techniques.

Stakeholder Mapping ensures that you know which stakeholders should be included and at what level.

Actions could range from involvement in the very first conversations to just informing stakeholders on the progress of the program.

Stakeholder maps are never finalized and need to be updated every now and then.

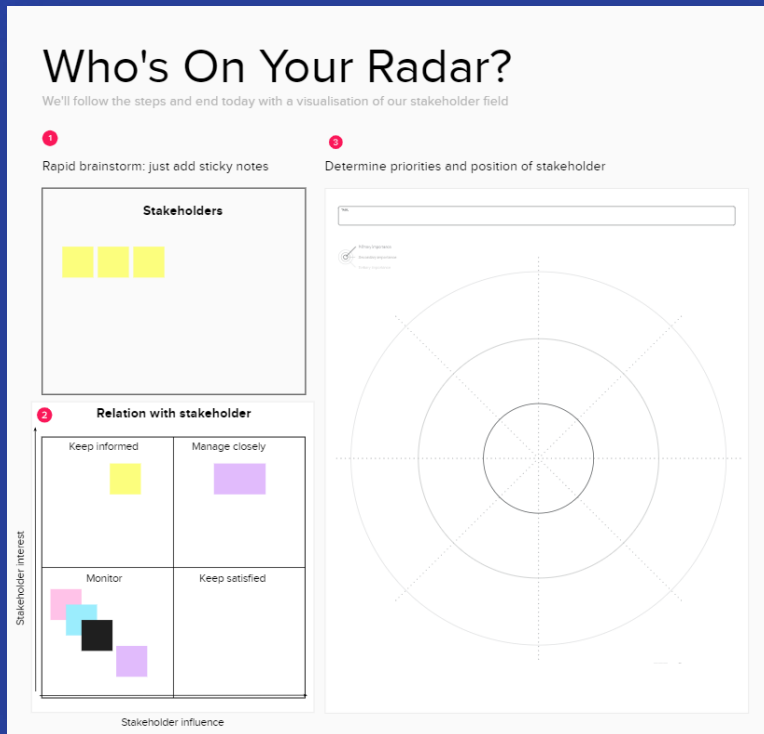
Suggested Process

1. **Brainstorm** to identify stakeholders
 - Produce list of functional groups e.g. programme delivery, suppliers / partners
 - Plot their significance on a matrix
 - Define the roles and responsibility of the stakeholders
2. **Identify** current and desired commitment levels
 - Define current and desire commitment level (building stakeholders map if applicable)
 - Validate with team
 - Check commitment levels with stakeholders
3. **Collect** stakeholder details
 - Create stakeholder management log to track stakeholders at programme / project level
4. **Plan** interaction and track relationship
 - Develop a communication plan for priority stakeholders
 - Implement communication plan
 - Track relationship
5. **Develop** and analyze Status reports
 - Produce and review individual communication plan

Stakeholder mapping: Brainstorming

Approach

Template to use: (zoom in)



Who's On Your Radar?

An interactive exercise to become familiar with your stakeholders.

Preparations: Provide enough space, walls, brown paper, sticky notes, pens to bring stakeholder mapping to a successful conclusion. There is also a digital version available

1. Rapid brainstorm

- Just at stick notes with every stakeholder you can think off to produce a list (potential) stakeholders
- Discuss the stakeholders listed on the sticky notes and critically examine whether you have overlooked any of them.
- In the case of overlap or interfaces, cluster them at the end of this step

2. Relation with stakeholder

- Create stakeholder matrix of stakeholder interest & stakeholder influence
- Divide the previously defined stakeholders in the matrix by scoring 1-5 on each dimation

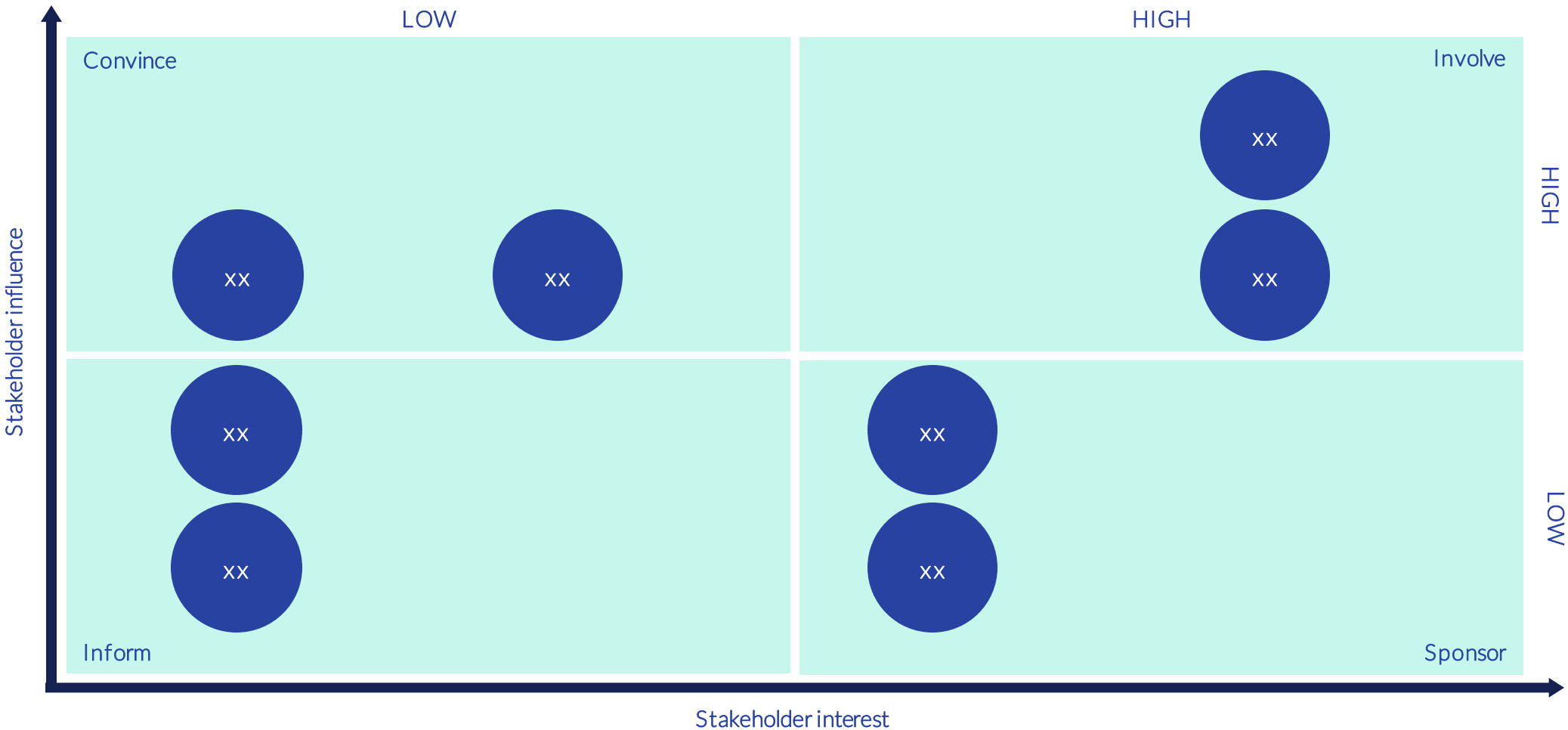
3. Determine priorities and position of stakeholders

- Prioritize stakeholder
- Track relationship

Tool to use: Klaxoon, Mural, or when held offline: post-its and whiteboards with markers.

Stakeholder mapping: Brainstorming

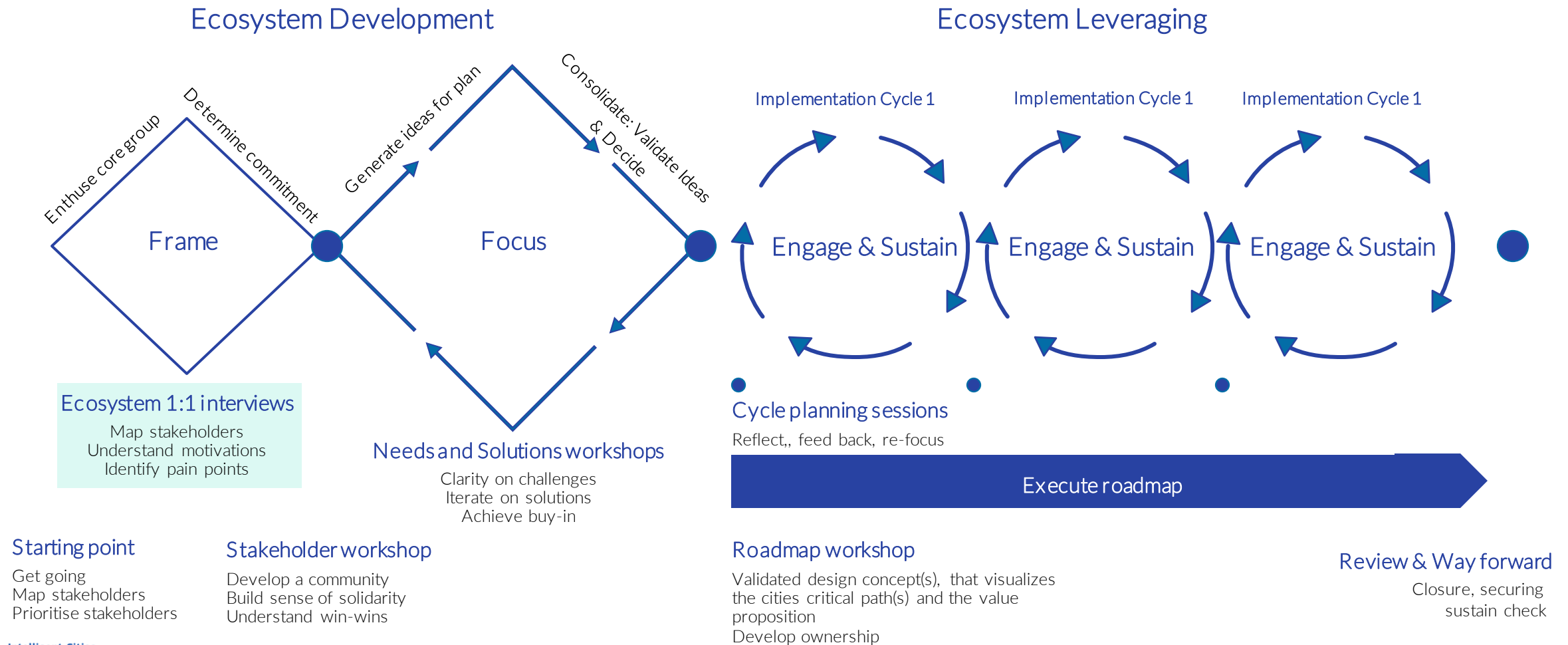
Template output



Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

■ Detailed next



Before the 1:1 ecosystem interviews it's important that cities work with lead experts to dissect the local stakeholder landscape

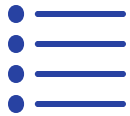


1:1 ecosystem
interviews

Key elements to consider in preparation to the interviews:



Use the [stakeholder mapping tool](#) in advance to identify who to interview. Do the exercise together with your local advisers to identify stakeholders you do not normally work with



Prioritise those stakeholders that could become your [ambassadors](#) and could unlock access to key stakeholders



Due to Covid-19 restrictions interviews can be done via [video conferencing](#) but make sure to use your camera for a more personal touch. Interviews are [ideally conducted by the lead expert](#) to stimulate a more open discussion



[Prepare questions in advance](#) - consult the ICC toolbox for a set of possible questions for a discussion between 30 to 45 minutes

Notes on using the supplied questions

General guidelines

The ecosystem interviews will be **organised by the city representatives in collaboration with the city lead expert**. The lead expert will propose a standard visit program based on his/her availability during in-city visits. The visit will consist of a mix of face-to-face and if deemed relevant collective interviews with city stakeholders. If Covid-19 prevents face-to-face interviews these should be held via video-conference. **Experts should aim to interview 5-10 stakeholders.**

The interviews can be build on the results of the ICC city scan (that was optional for cities to do). However the interviews should not be seen as an opportunity to fill out the ICC city scan. Instead, the **interviews should be used to deep dive, from a qualitative standpoint**, into the composition and the dynamics of the local eco-system.

Based on the stakeholder you are interviewing and the theme the city is leaning do, **you will need to tailor the questions.**

Notes from the interview should be written up, including interviewee name, type of stakeholder, date/time and other relevant details.

The following interview guidelines have been developed for a mock interview with a local eco-system representative. These should be adapted to the format of the interview (individual vs. collective, short or long), as well as the type of interviewee.

Key questions to consider when interviewing

What **motivates** this stakeholder? What do they aspire to? What are they afraid of?

What do they bring to the party? What capabilities do they lack but others might have?

What **history of collaborating** with the city does this stakeholder have?

Does this stakeholder have any **natural conflicts** with other stakeholders?

Does this stakeholder have any **particular thematic leanings**?

Does this stakeholder have any **existing initiatives** that can be leveraged?

Which stakeholders **warrant more time** in a longer interview? Which need less?

When does it make sense to do **these interviews without the city rep?** When is it better to have them present?

Detailed interview guidance

Introduction

Please take five minutes to position the ICC in your city's portfolio of related actions and the reason for which you are visiting them. Some pointers to keep in mind while explaining this are:

- ICC as one of the programmes the city is involved in that fits the city's vision, complements its current portfolio of actions
- This is an initiative sponsored by the EU, which selected cities with high potential to transform with the help of advanced technologies
- Make sure you highlight the link between technological transformation and growth / economic development / competitiveness
- Emphasize the collective dimension of the exercise and the fact that you would like their support and involvement throughout the process but also highlight this is an exciting opportunity for them
- Mention who the contact point at the city level is (i.e. local city project manager)
- You may already decide (if relevant) to invite them to join the local stakeholder workshop at this point
- Highlight you came to them because you think THEY are significant in the ecosystem because you would like THEM onboard – and that it is likely to bring them benefits
- The interview aims to:
 - Warm up enthusiasm for the city's participation in the ICC and gauge individual interest levels
 - Increase awareness on the city's participation in the programme
 - Diagnose characteristics of the local ecosystem and its members
 - Get a first perspective of the possible win-win opportunities across multiple ecosystem members that will serve as content for the local ecosystem workshop

Key learnings and outcome of the interview will be summarised in the stakeholder workshop

Background of the interviewee & expectations

What is your background and current position?

Could you explain the position of your organization within the broader context of the local eco-system and what function it carries out?

What are the main strategies of your organisation/company in relation to the city or theme?

Stakeholder expectations

Would you be interested in participating in the city's ICC journey?

If they are interested, what are your expectations regarding your engagement in a local ecosystem:

- Ways you could contribute? / What could the city learn from working with you?
- What has the city done right and what it still needs to achieve?
- What would you value from the other stakeholders in the local ecosystem?

What do you hope to get out of this collaboration? (What's in it for you?)

If they are not interested, what would make them?

Related initiatives to theme

Can you list the initiatives where you are currently playing a role?

How is the city currently facilitating/supporting your organization (funding, organizational support in the execution of your projects, etc.)?

What would you need to increase the success of current projects or to spur/launch new initiatives?

What is currently blocking you from implementing projects?

What are the unique features of the city that do help it to drive innovation and improvement?

Does the city do a good job of tracking impact?

Suggestions on how to move forward to the theme

To what extent are the policies/programmes/actions which are in place to support [theme] at the city level appropriate?

What are the specific fields you would like to see improvements in the short, mid and long term?







Where would you like the city to be in one, five and ten years when it comes to its [theme]?

What concrete actions would you like to see taken at the city level in order to engage the ecosystem?






What stakeholders are currently under or over represented in the steering and governance of the city's [theme] strategy?

The stakeholder workshop will bring together the ecosystem to discuss shared aspirations and focuses on 'local enablers' – unique characteristics of a city



Description	Objectives	Audience	Design principles
 A workshop bringing together all the relevant ecosystem stakeholders for the first time to identify win-win models of engagement throughout the ICC	 Understand what excites stakeholders , what motivates them to play a role in the transformation of the city and their ambitions Get to know who is who is who and how the community can benefit from engaging with one another Receive feedback on the local enablers and the needs assessment conducted in the earlier steps, whilst also acknowledging local weaknesses Gauge relative enthusiasm for further engagement – who are your champions? Jot down actions expected for the next workshop on maturity assessment	 ICC city representatives, Wider group of city ecosystem representatives (10-25 key partners in the ecosystem) 1 lead expert  Duration 1 day  Delivery mode In-person , led by lead expert	 Held after the 1:1 interviews and the needs assessment workshop to ensure city reps have a good understanding of the city's challenges, local enablers (strengths and weaknesses), currently employed solutions Uses the SAT tool to gather local enablers data so that stakeholders can express opinions anonymously before the meeting Comes after the ecosystem 1:1 interviews so that the lead expert can carefully shape the agenda towards win-win opportunities or away from sensitive topics

Stakeholder workshop I Suggested agenda

	 Schedule	 Agenda item	 Format	 Lead	 Suggested activities
	9.00-9.15	Introduction to the workshop and attendees	Presentation	Lead expert	Introduction to the workshop objectives and agenda of the day , round table of introduction (perhaps supported by faces page). Make it clear that we are early in the journey , much is still to be defined, but regardless of the direction, the city's ecosystem is critical and should be given space to share its perspectives
Part 1 - Where we want to go	9.15-9.30	The ICC story	Presentation	ICC city representatives	Share the city's draft vision for the ICC , explain the thought process that went in to this at the Needs workshop, and how this fits in the broader strategy of the city. Consider teasing out positive knock-ons for the ecosystem if this vision is achieved and focus on the excitement
	9.30-10.30	Discuss the vision	Presentation	ICC city representatives	Discuss the vision as a group . If responses are slow, option to go round the room and share; - One thing they like about the vision and its rationale - One thing they would challenge or improve upon (or a challenge the city will need to overcome to get there)
Part 1 - How we can work together to get there	10:30-11.30	Discuss local enablers	Presentation and group discussion	Lead expert	Present insights of what defines the city ecosystem and what people consider to be its strengths and weaknesses, derived from the local enablers questionnaire . Frame these as concepts that may help or hinder the vision . Transition in to group discussion, example structure: How do we all see the city? What makes it special? Where do we share the same views? Where do we see things differently? What do we see as the city's strengths and how can we use these to achieve the vision? Where do we see our city's weaknesses , and what can we do about them to make sure they don't get in the way of the vision? Are there any structural issues in the ways in which the ecosystem works together today that we can improve for the ICC? Are there any key stakeholders that we have not yet engaged that are important to the vision?
	11.00-11.30	What does good collaboration look like?	Group discussion and ideation session	Lead expert	Discuss what stakeholders want to achieve and what would inspire collaboration ; what is it that they want to get out of the programme? What are they keen to bring to the table? Consider past and current successful initiatives – what did successful projects have in common, what mistakes did less successful projects do that we can learn from? What do we all agree on and what issues do we need to return to in future meetings?
	11.30-12.00	Identify win-win models	Group discussion and ideation session	Lead expert	Combining both our discussions on the vision and collaboration: distill what win-win-models would look like. Not diving into concrete solutions just yet, but identify practical conditions to a good form of collaboration . To end, each party round the table mentions one thing they would like to achieve in the next 12 months through the ICC and something they would like to see the city achieve by end of the ICC
	12.00-12.15	Look forward: what to expect + closing	Wrap-up	Lead expert	Give overview of what to expect in the further trajectory of the ICC and how today contributed to a good start. Highlight that as a next step, the vision will be refined, and the next workshop of the city will discuss solutions to achieve that vision
	12:15- 13.00	Networking	Informal	All	Networking and refreshments to foster city-ecosystem relationships

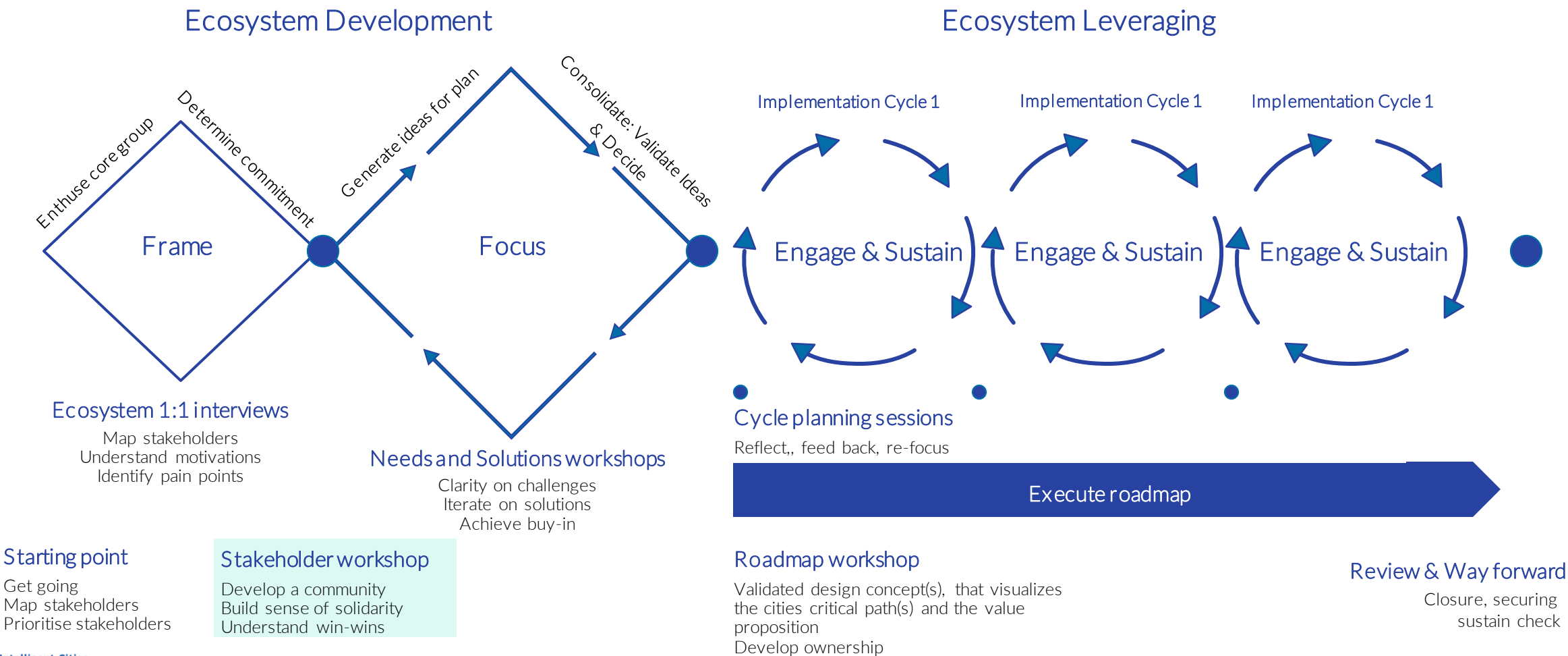
Stakeholder workshop

Supporting materials

Ecosystems first need to be developed before they can be leveraged

Empowering Ecosystems: Frame, Focus, Mobilize, Sustain

Detailed next



Why assess local enablers?



Local enablers

The effectiveness of any city initiatives depends on a number of **non-quantifiable factors** that are called “Local Enablers”. These are unique characteristics of the city that should be harnessed when creating any city strategy to make it specific and thus more successful. They may cover the city’s culture, economy, geography or other relevant facets. Local enablers should be considered when defining and developing advanced technology solutions.

What this can do

- ✓ Provide an initial assessment of a city’s particular strengths and weaknesses beyond the quantitative indicators
- ✓ Helps cities to design ICC initiatives and the corresponding roadmaps in line with their strengths

What this cannot do

- ✗ Predict changes in local enablers over time
- ✗ Quantify the impact of the respective factors

Used to assess? ☒ Used to track? ☐



Local enablers questions need to be supplemented with city-specific questions and shared on an appropriate survey tool

Output of local enablers

Local enablers will serve three purposes:

1. To provide a starter for discussion at the at the local stakeholders workshop
2. To provide lead experts and city reps with an insight in to ecosystem that they refer to back to at the Needs Workshop, Solution Workshop and Roadmap Workshop
3. To provide the overall ICC programme with an insight on how different cities compare and identify issues where one city can provide coaching to others at a city lab

How to use local enablers

1. Review the suggested local enablers questions that follow
2. Add any additional questions of importance to your city or remove questions, but remember;
 - Questions should only be included if the answer might provoke a useful discussion among the city ecosystem, or could inform the design your city's activities on the ICC programme
 - Type A questions are far easier to answer than Type B
 - Questions should be of general relevance to all stakeholder types – specific questions can be asked to individual stakeholders later
 - This is an ideal time to ask more sensitive topics while respondents can be anonymous
3. Upload the questions to a suitable survey tool, either from your city, your organization, or a third party like SurveyMonkey
4. Share the survey with invitees to the Stakeholder Workshop
5. Send necessary reminders to fill out a week in advance of the Stakeholder Workshop
6. Choose selected insights from the results to discuss in the Stakeholder Workshop

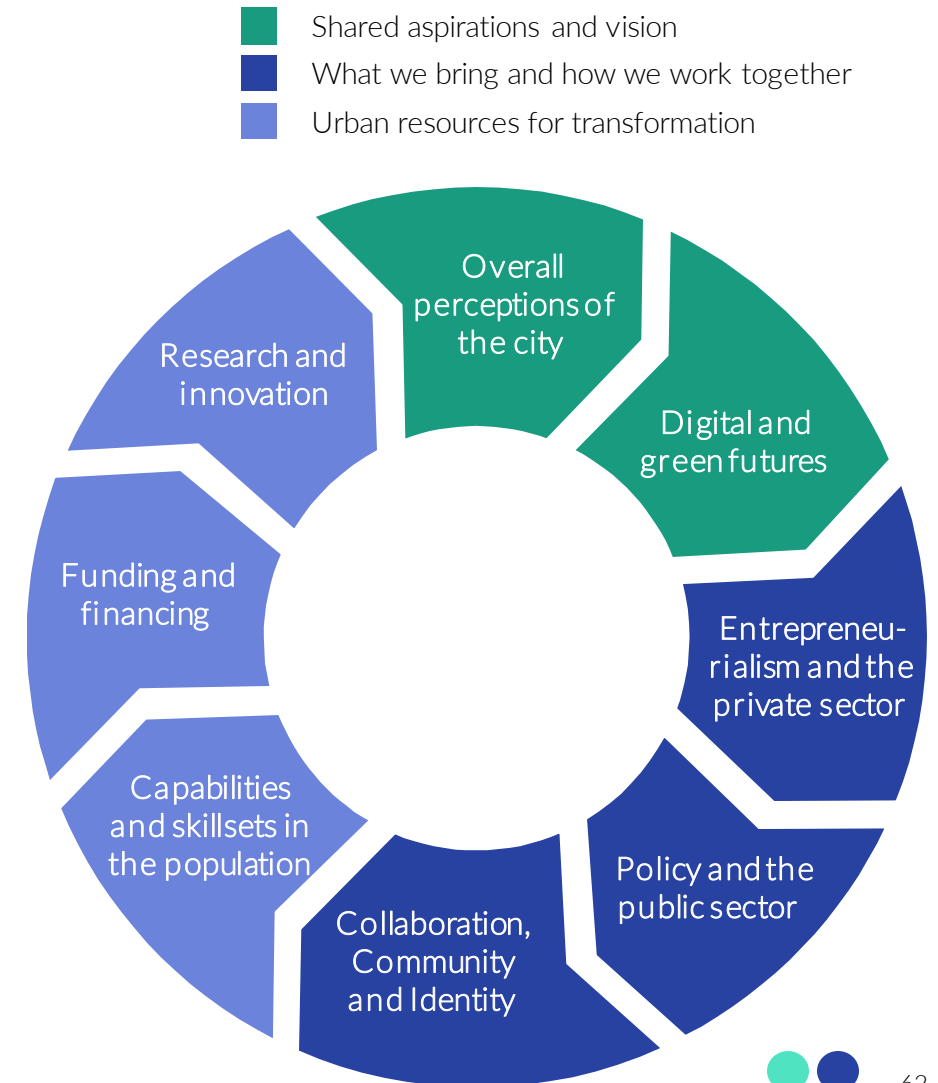
Local enablers reveal city-specific strengths and weaknesses that complement the city performance and maturity assessments

The local ecosystem enablers

The objective of this assessment is to explore the city's strengths and weaknesses that complement the city performance ("needs") and maturity ("solutions") assessments. This assessment aims to understand the unique characteristics of the city that will come to tailor your approaches to the transformation of your city. Broadly, these questions cover:

- **Shared aspirations and vision** – do all stakeholders see the city in the same light and believe we are already on a journey?
- **What we bring and how we work together** – what capabilities are different parties bringing to the party? Do we work together well in ecosystem situations?
- **Urban resources for transformation** – does our wider city more broadly have the typical assets needed for a major transformation like access to capital, a skilled labour force and critical thinking

What follows is a suggested list of questions that can be added to or reduced.



Local enablers template questions - detail

<div> <div>Key</div> <div>Type A = Strongly agree / agree / neutral / disagree / strongly disagree</div> <div>Type B = free text response</div> </div>							
Overall perceptions of the city	Digital and green futures	Entrepreneurialism and the private sector	Policy and the public sector	Collaboration, Community and Identity	Capabilities and skillsets in the population	Funding and financing	Research and innovation assets
<p>What makes this city great?</p> <p>What is this city's greatest weakness?</p> <p>Which industries define this city in your eyes?</p> <p>What one thing does this city have that most do not?</p> <p>What one word would you use to describe your city?</p> <p>Our city has a strong identity that stakeholders and citizens are proud of</p>	<p>There is a clear vision in our city on digital innovation and smart cities</p> <p>There is a clear vision in our city on our response to the green deal and decarbonisation</p> <p>I generally support the city's visions</p> <p>My city is more digitally innovative than most</p> <p>My city has an open data strategy and this generally brings value to the city</p> <p>Citizens of this city are generally trusting when it comes to data privacy, security and ethics</p> <p>There is a norm of sharing data between city stakeholders</p> <p>Decarbonisation is a top priority in our citizen's minds</p> <p>We are making progress towards the EU's goal of 55% CO2 emission reduction by 2030 and net zero by 2050</p> <p>Others look to us for inspiration on green innovation</p> <p>It's clear to me what are targets are for digital and green transitions and we regularly track our progress</p> <p>The city's plans and corresponding actions are well designed but local impact until now has been limited</p> <p>Is there one particular part of the city's digital or green future that you are particularly passionate about?</p> <p>In what ways do you think the city's green and digital future can also create jobs and growth?</p> <p>Other comments?</p>	<p>Which sectors have been particularly successful at driving new technologies so and why?</p> <p>Which are still lagging but have high potential?</p> <p>What are some of the main barriers keeping the private sector from making a more intensive use of technological solutions (e.g. cultural, financial, skills-related)?</p> <p>What opportunities do you see for technology solutions to help overcome some of the private sector's key development challenges?</p> <p>Over the last 5 years the private sector has helped drive economic growth and employment in the city</p> <p>There are opportunities for both big and small businesses in this city</p> <p>The private sector is generally more digitally innovative than the public sector in my city</p> <p>There is continuous stream of new ideas and innovative proposals from start-up economy to other stakeholders</p> <p>We have a vibrant start up community, and anyone with a new viable business idea can get support to build on it</p> <p>The private sector gives enough acknowledgment of local authority policy objectives</p> <p>The private sector is held back in technological development by the public sector</p> <p>Other comments?</p>	<p>What one thing does the local authority do well?</p> <p>What one thing could the local authority do better?</p> <p>There is a culture of experimentation within the city governance and taking measured risks</p> <p>The regulative environment allows others to experimentation and launching of new initiatives</p> <p>Public sector leadership in this city has a long term mindset</p> <p>The speed of legislative / administrative process is fast</p> <p>It's easy for citizens to get what they need from public processes</p> <p>The capability of public sector civil servants is generally high</p> <p>It feels like the local government works in siloes</p> <p>We are very reliant on National policies to determine our future</p> <p>We have a strong sense of civic community who engage in government decision making and our citizens generally feel heard</p> <p>Other comments?</p>	<p>The level of collaboration between private / public sector players is high</p> <p>The existing interest groups and consortia in the city are strong, persist over time and city authorities recognize that urban leadership has many forms</p> <p>Public and private collaboration is supported by the wider population</p> <p>The city regularly collaborates with other cities</p> <p>We are known for being a city that takes control of its future</p> <p>I find it is easy to connect with city leadership, I feel I know them well and can easily be heard</p> <p>The EU is popular in the local population and its ideals inspire people to act</p> <p>The ecosystem often finds it hard to square the achievement of political objectives and the need for private sector to be profitable</p> <p>Technology development between local stakeholders can deliver win-win benefits</p> <p>Collaboration with other local stakeholders only costs me time without any tangible benefits</p> <p>Other comments?</p>	<p>The city has a high skill population compared to others in my country</p> <p>It is easy to find competent people for new initiatives when needed</p> <p>It is easy for anyone to access training through public or private courses</p> <p>As a city we are good at pre-empting and reacting to new skill needs</p> <p>Available upskilling/reskilling courses are of sufficient quality</p> <p>What types of skills are in high demand? In which sectors?</p> <p>Other comments?</p>	<p>Availability of public grants / tax incentives for new initiatives is high</p> <p>Access to private financing for new urban initiatives is easy</p> <p>It is easy to receive international funding to initiatives within the city</p> <p>The city has benefited a great deal from EU funding historically (e.g. structural funds)</p> <p>We experiment with innovative business models e.g., outcomes-contracts in procurement, social impact bonds, subscription packages to city services</p> <p>It is easy to agree on public/private co-funding for a new initiative</p> <p>What do you think will be the most important funding or financing arrangements for your future city transformation?</p> <p>Other comments?</p>	<p>We have access to a high quality Higher Education Institution capable of supporting the transformation</p> <p>Higher Education Institutions are well connected with other international organisations and initiatives</p> <p>The Higher Education Institution performs research in cooperation with other city stakeholders</p> <p>Research in Universities is either too empirical or otherwise lacks a direct link to local challenges, preventing meaningful impact on the ground</p> <p>EU research in particular has brought benefits to my city</p> <p>Other comments?</p>




Solution maturity and strategy workshop

Expert supporting deck




6 December 2020

The solution maturity and strategy workshop will focus in on the priority concepts the city will scale – and how to drive their success



Description	Objectives	Audience	Design principles
 <p>The solution maturity and strategy workshop follows on from the needs assessment workshop – which works out what the city should be like in the future – and works out how the vision can be achieved with priority solutions, leading to the formation of an intelligent city strategy to drive their success</p>	 <p>Assess the maturity of the priority solutions and how they could be improved. Decide which priority solutions will be pursued</p> <p>Design the strategy for the successful scale up of solutions, including, for example, how local enablers (city specific characteristics) can help</p> <p>Define the role of the city ecosystem in delivering strategy and bring to light ‘win-win’ opportunities for participating in the solution scale-up</p> <p>Determine opportunities for cross-city collaboration</p>	 <p>3 ICC city representatives, listed in the application process City ecosystem (selected) 1 lead expert 1 thematic expert minimum</p>  <p>Duration 2 days</p>  <p>Delivery mode In-person, led by lead expert</p>	 <p>Provide city-specific advice and support through holding an in-city workshop</p> <p>Agile approaches to strategy design to get to minimal viable solution plans as quickly as possible – a technique that will be re-used in the implementation phase</p> <p>Co-create with the city ecosystem with a particular focus on shared benefits from working together, to make sure that strategies are self-sustaining</p>

Solution Maturity and Strategy Workshop | Suggested agenda – Day 1

 Schedule	 Agenda item	 Format	 Lead	 Overview to activities
9.00 - 9.20	Welcome and introduction to the objectives and deliverables of the day	Presentation	Lead expert	Presentation explaining the key agenda items and objectives , highlighting previous achievements and introducing key considerations for a successful strategy design
9.20-9.30	Recap what happened in last workshop and since then	Discussion with full group	All, moderated by the lead expert	Shore up excitement for progress achieved to date in the programme and key items for participants to remember heading in to today's activities
9.30-10.15	Explore solution maturity results	Discussion with full group	All, moderated by the thematic expert	Experts to go through the interpretation of the results of the solution maturity analysis and discuss how this improves their understanding of the solution and which should stay as priority solutions
10:15-10:30	Coffee break	-	All	-
10:30-11.30	Map priority solutions against maturity and local enabler ecosystems	Discussion in breakout groups	All, moderated by the thematic expert	In groups, participants will map their prioritised solutions against their technology maturity assessment and stakeholder network strengths/weaknesses to form a comprehensive perspective on their local enabler ecosystem
11:30-12:00	Intro to Agile and Design Thinking	Presentation	Either pre-recorded video or expert can presence	Presentation explaining the value of using agile and design thinking to organize the development of intelligent solutions and to shift how cities approach solving big problems
12:00-13:00	Lunch break	Networking	All	Informal discussions
13:00-13:30	Starting the solution strategy design	Group activity	All, moderated by the lead expert	Group work to create a workplan and assign tasks to members ahead of the prototype sprints
13:30-16:15	Prototyping and testing solution strategy	White board group activity	All, moderated by the lead expert	Teams (including both politicians and technical experts) and stakeholder participants run through multiple mini scrum sprints to develop an initial conceptual design of their prioritized solution Teams will peer review 1-2 other team's solution strategy to provide feedback and spark additional ideation. Each team will then break for the day before returning for Day 2 for a second iteration on their solution designs.
16:15-16:30	Day 1 closing remarks and recap	Discussion with full group	All, moderated by the lead expert	Lead expert should wrap Day 1 following peer review activities – They should can also recap learnings from the day, e.g., asking city teams what they were most surprised about from the first day's introduction to agile design

Solution Maturity and Strategy Workshop | Suggested agenda – Day 2



Schedule



Agenda item



Format



Lead



Overview to activities

9.00 - 9.20	Welcome and recap on the day	Presentation	Lead expert	Presentation explaining the key agenda items and objectives, highlighting previous day's achievements
9:20-11:45	Iterating solution design to incorporate peer-review feedback: Sprint 2	White board group activity	All, moderated by the lead expert	Teams will regroup for their second mini scrum sprint to iterate on their initial conceptual design of their prioritized solution, incorporating feedback given during the peer-review session at the end of Day 1 Each team should be prepared to share their prototyped solution design with the broader group
11:45-12:45	Showcase prototypes & reflections	Discussion with full group	All, moderated by the lead expert	Each team presents their solution strategy; Lead experts then lead a retrospection for the full activity
12:45-13:15	Identify win-wins and commit to further work on ideas	Discussion with full group	All, moderated by the lead expert	Using the cooperation models from the stakeholder engagement workshops as a basis, stakeholders highlight where one another have benefits from working with one another from the ideas shown, and start committing to push particular ideas further and flesh out full strategies
13:15-14:15	Lunch break	Networking	All	Informal discussions
14:15-14:30	List collaboration opportunities with other cities	White board ideation session	All, moderated by the lead expert	Ecosystem partners will be invited to highlight collaboration opportunities with other cities and their respective ecosystem. These may be divided into categories, e.g., "areas of expertise", "seeking advice in..."
14:30-15:00	Identifying areas of expertise and potential roadblocks	Live poll	All, moderated by the lead expert	Participants will be asked to participate in live polls (via Menti) to identify areas of expertise where cities may feel comfortable sharing experiences in future cross-city labs, as well as to bring up roadblocks to tailor future programming towards city concerns
15:00-15:30	Closing remarks and announce next steps with Q&A	Presentation Q&A	Lead expert	Presentation highlighting commitments made by ecosystem partners during the two workshop days. Definition of next steps, incl. outlook on upcoming cross-city lab and roadmap and monitoring workshop, followed by a Q&A
15:30-16:30	Networking and refreshments			Informal discussions

End deliverables from the solution maturity and strategy workshop

Item	Output format	Characteristics of final deliverable	Detailed next
Review of the solution maturity assessment	~1 PowerPoint slide per priority solution	Record of the results of the solution maturity assessment and 'so what?' implications for: a) whether the solutions should be prioritized in the city's ICC journey, B) what can be learnt from the assessment for strategy development of those that are pursued	
Solution strategy	~20 PowerPoint slides in total	Document discussing the strategy for each solution and the overarching integration This will be peer-reviewed at the next cross-city lab, and subsequently used at the next core workshop	
Mapping of local enablers to top city opportunities	~2 PowerPoint slides	Identification of strengths and weaknesses of local enablers based on the local enabler assessment results Strategic mapping of local enablers to top city opportunities	
List of of 3-5 'win-win' opportunities identified per stakeholder	1 PowerPoint slide per stakeholder	List of potential win-win opportunities , incl. a brief explanation	
List of anticipated roadblocks in the intelligent city transformation	~1-2 PowerPoint slides	Detailed list of anticipated roadblocks to intelligent city transformation faced by city to be shared at cross-city labs for peer review and advice	
List of potential cross-city collaboration activities	~1-2 PowerPoint slides	Detailed list of suggested cross-city collaboration activities to be shared at cross-city labs for peer review and advice	

The solution strategy deliverable is the most critical document that you will make on the ICC programme

Suggested approach to strategy deliverable

Element	Suggest effort	Key elements
Solution strategy (for each solution)	~20-30 pages per solution	<p>What does the solution set out to solve? What is its problem statement? How is this linked to the vision, and any specific data points from the Needs Workshop?</p> <p>What are the main features of the solution? What should happen? Where? Why? Can we visualize what it might look or feel like?</p> <p>Why is this the right solution for the city? How does it link to the results of the maturity assessment? How does it fit to the local enablers? What can we say on stakeholder enthusiasm or fit?</p> <p>What is the business model? How can it be funded from tomorrow? How can it become sustainable so it is still having impact in 5 years from now? Include a business model canvas exercise</p> <p>What are the main blockers and risk and how will they be overcome? What big assumptions does the solution rest on? Why hasn't this solution happened already?</p> <p>What, at the highest level, are the main stages from today to getting this solution at full impact? What are the 3-5 life stages of this solution?</p> <p>Who is making it happen? How do different parties interact to make it happen? What does each get out? Consider a diagram of different 'contributions' and 'benefits' from each party involved. What could the management structure be?</p> <p>What major uncertainties still need to be investigated? If there was one more piece of analysis, or one more stakeholder group you'd speak to, who would it be?</p>
Overall strategy (for city as a whole)	~3-6 pages	<p>How do the solutions interact? Do some have positive synergies that reinforce the success of one another? Or are there conflicting interactions that need to be managed carefully?</p> <p>If you could boil down your strategy to three thoughts that have best guided you on your way, what would they be? These ways of thinking will be helpful when things get tough in implementation</p> <p>What are the key factors that define success across all of your solutions? These could not be solution related, e.g., managing political cycles</p>

Principles to follow throughout

Explain 'why?' – ensure that you always document the rationale for why the strategy is how it is – this will be critical for testing and refining in implementation

Be data-driven – to strengthen your arguments and to be specific (and thus actionable) think on what data (that you have gathered so far, or could investigate) that justifies your design decisions; this can also more easily enable visuals on your strategy

Refer back to the ten tests (see subsequent slides) – and any other sources that provides good guidance on public sector strategy development – check with your expert

Provide something 'stand alone' – when questioning the level of detail you need to go to, ask if another city could pick this up, understand why you made every main decision, and set about starting the same project tomorrow. The suggested effort is only a guide – add more or less to meet this bar

Adjusting this workshop for different cities

Remember – light blue stickers throughout this document are for the facilitator's benefit, and not to be presented

As with all ICC events, this workshop deck is not intended to be sufficient itself. It is intended to be adjusted and complimented with material from the Lead and Thematic experts

Activity	Possible adjustments
Assessing solution maturity	<p>Higher maturity cities should find this process easy, and can simply go in to greater analytical detail and rigour. If they have existing programmes they can easily find data on how the performance of those is running; these cities are also typically better at effectively gathering and analysing data</p> <p>Lower maturity cities may find this process difficult, and can instead inspire to do any data-driven analysis of the design of effective solutions. The EC's concept of 'maturity' will have less relevance if the city is only pursuing priority solutions that have no trace in the city today. In these instances the important point is that a city simply does some data-driven analysis that helps inform the nature of the solution. Rather than strictly adhering to the concept of a maturity KPI, less mature cities can instead find data points that illuminate, e.g., where should this solution be deployed? How should it be designed to be most effective? What might it cost? Etc.</p>
Solution design and strategy creation	<p>The creation of strategy for the deployment of solutions uses an effective agile approach, that should be applicable to most cultures and contexts. This is widely considered to be best practice in the fast design of new concepts, and while it first emerged in the private sector, it is now used in many best-in-class governance situations. Part of using this here is to provide cities with a way of working that may well suit the pace of the ICC, and is thus something they can use elsewhere. None-the-less, it involves a learning curve, and for less mature cities with audiences who are not familiar with being so practical, experts can consider alternate delivery approaches</p> <p>The number of solutions covered in the solution strategy activity can be flexed. Depending on the size and maturity of the city, either one solution can be explored in this workshop as a group (and the rest done offline). Alternatively, all three priority solutions (or indeed more, for the most mature cities) can be pursued by smaller teams in parallel</p>

The breadth of the workshop is a good way to manage the maturity of the city

Remember – it is not expected that this workshop makes the entirety of the city's strategy on the ICC, but makes some initial progress and helps city reps become familiar with one approach to strategy design

Focus by stage				
	During maturity/ enablers mapping	During design stage prioritisation	During solution strategy development	By end of deliverable
Higher maturity city	Arrive at 3-6 priority solutions to push	If the solutions are already in use in the city, the design stage can be used to prioritize interventions	Run a larger number of smaller groups, each of which can explore many different aspects of the same solution (e.g., a team can take electrification of personal mobility as a solution, and consider different user groups)	Detail solution strategy for 2-5 solutions
Lower maturity city	Arrive at 1-2 priority solutions to push	Use the design stage to consider different approaches to a given solution	Focus on fewer, larger groups, who can share the same solution, but focus on different aspects of it (e.g., for retrofitting, one group takes commercial retrofit, another residential)	Detail solution strategy for 1-3

Solution Maturity and Strategy Workshop

Diligent workshop preparation will allow this event to become the impact-driven foundation of the city's ICC journey

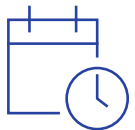
Key elements to have ready for the workshop



Complete and analyse the **solution maturity assessment** results jointly with the thematic and lead experts, based on the priority solutions that were suggested in the Needs workshop and tested with the Ecosystem workshop



Have to hand the **local enablers analysis** that should have been completed in the preceding stakeholder workshop to assess the city's local characteristics, which will now be relevant for solution design and strategy



Facilitate the attendance of local ecosystem by **planning ahead carefully**, incl. sending out workshop invitations well in advance



Undertake logistical arrangements, incl. venue and technical equipment, food and beverages, event support staff

Support for the solution maturity and strategy workshop

■ Detailed next

What this document contains:

The purpose of this document is to provide lead experts with the materials they will need to guide the Solution Maturity and Strategy workshop with participants. More specifically, this document contains:

- Instructions to encourage cities to share activity undertaken since last meeting of the workshop invitees
- Support on mapping existing technology maturity assessment results to cities' stakeholder networks
- Support on using Agile and Design Thinking to scale priority solutions
- Idea-starters for common strategic challenges cities may face along the way
- Support on identifying win-win opportunities
- Templates for workshop deliverables, including prep for upcoming cross-city labs

Instructions for experts:

The materials contained in this document are intended to be a **starting point for hosting creative brainstorming sessions with city leaders**. Experts should be prepared to:

- 1) Adapt the recap discussion to provide cities an opportunity to share their stories and energize the start of the day the start of the day
- 2) Take the time to review city technology maturity assessment results and pull out interesting insights
- 3) Facilitate critical thinking that prompts cities to **creatively map their maturity assessments against existing stakeholder strength/weaknesses**
- 4) Help city reps **understand the trade-offs associated with the different approaches to implementing solutions**, depending on each city's own maturity level

To start the day, lead experts should encourage cities to share their Visions and State of the City results from the Needs workshop

Cities should be prepared ahead of the workshop to share their stories, mindful of:

- Keeping presentations concise
- Focusing on areas that cities are most excited to build on

Possible prompts for city talking points could include:

- What were the insights of the work done since the Needs Workshop?
- How have stakeholders responded to the vision in the Stakeholder Workshop?
- Did the initial priority solutions prove popular? What is the main feedback?
- What topics are they excited to continue learning more about?

By getting cities to open, it helps **signal that they are in charge of their transformation journey** – you are just there to support. In addition, it helps show stakeholders that work is happening between workshops, and that **they are important participants on a journey with the city**, so should be kept abreast of developments

State of the city overview: City X

On this page list, after the following pages:

The state of our city today

Having seen the results of your city performance analysis, how would you describe the state of your city to another city's mayor in 2-3 minutes?

Think about:

- Is this a story of getting better where you are already ahead? Addressing weak points head-on? Or a bit of both?
- What is the common thread that links together the higher performance areas? What about the lower? Put out key linkages – e.g. a lack of skills in the workforce driving up personal transport?
- What is the inspiration of the assessment? Is it a highlight? What do you think you are really stuck with for structural reasons? What areas feel the most addressable?

Aim to write 100-150 words in this synthesis

Key insights from city performance analysis

Higher performance observed	Lower performance observed
1 City X's public transport system has some of the highest accessibility of comparable cities	1 City X's public transport system is underfunded in suburban regions, leading to more car use and driving up private transport commuter costs
2 Among young people, public transport is 3x higher in the city than comparable cities	2 City X's active transport use is far below comparable cities, resulting in higher private car use in the demand parts of the city
3 Despite a rise in demand over the last 10 years, freight traffic rates in urban areas remain low	3 City X's commuters are on average 2x the country average
4 Most multimodal journeys in city X are easily planned with short connection times	4 City X's car ownership per family is 1.5x higher than the national average
5 The average private car in the city is becoming older faster than the national average	City X's roads have high fatality rates

Please fill these using the insights from the following page, and assess importance to your ICC journey according to the scale. Above are simply examples

So what?

Details of thoughts on the city's reaction to this learning. Consider:

- **Visionability** – acknowledging that the city has not yet gotten to solutions in detail, does this feel like something the city can influence? Or is it too dependent on historic, structural, cultural, national or international factors beyond their control?
- **Significance** – is the ecosystem relevant to other observations – is this something we feel passionate about addressing (high performance) or improving (low performance)?
- **Feasibility** – on balance of everything observed, will it be something the city considers a key area of performance for the ICC strategy to address?

Guidance for facilitators – not for presentation

Support for the solution maturity and strategy workshop

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- 4) Help city reps understand the trade-offs associated with the different approaches to implementing solutions, depending on each city's own maturity level

In this activity, participants will first explore the maturity results and what this may mean for the solution choices

 TIME: ~45 min

OUTPUT

- An understanding of the 'So Whats?' to come out of the solution maturity assessments

OBJECTIVE

- Present the solution assessment results and the main takeaways
- Discuss how this may influence the solutions that are taken forward

INSTRUCTIONS

- 20 mins: Lead or thematic expert presentation on [the assessment results](#)
- 20 mins: Discussion and interpretation
- (it is suggested the above is done with a presentation then discussion slot per each priority solution)
- 20 mins: [Group reflections on how this adjusts the priority solutions](#)



Thematic experts should prepare a custom presentation to discuss the city's technology maturity assessment for each solution

Guidance for facilitators; not for presentation

Thematic experts should be prepared to present and discuss cities' technology maturity assessments, and to share additional nuances or reflections based on their understanding of the local context, so that the thematic expert does not appear to have been 'parachuted in' and further helps the cities feel the advice is tailored and relevant

Recall that the purpose of the solution maturity assessment is to help the city understand where the city is now with the solution, and how to be most effective with an intervention (including how to start the solution from scratch, if it does not exist today) to improve its effectiveness

Possible 'so what' questions to be answered with cities for each prioritized solution could include:

- How would we describe the state of the solution's current use in the city? Is it one that is growing already and needs to be accelerated? Or is it widely available and used but suffers in its effectiveness for some reason?
- Are there existing initiatives to drive the solution? If so are these flawed in some way?
- Is there evidence that scaling up the solution would bring significant benefits to the city?
- Do citizens and businesses respond to a need for the solution?
- Is the solution enabled or restricted by underlying infrastructure?
- Can the solution be scaled using the current business model?
- Where/how is the solution most used today? Where is it most needed?
- Are there any other indications that the solution should or should not be a big part of the city's ICC strategy?

In this activity, participants work in groups to further reflect on priority solutions mapped against their local enablers

 TIME: ~1 hour

Output

- A high level map of the existing maturity assessments and local enabler strengths and weaknesses per solution
- A collective view on on which priority solutions should make it to the final strategy

Objective

- Map quality of deployment of each solution (via tech maturity assessment) against the local enabler analysis and insights from the Stakeholder workshop
- Understand how local enablers may help drive or impede maturity improvement
- Set the stage to unlock additional collaboration with stakeholders when building out prioritised solution strategies
- Decide which solutions are best prioritized in the city's strategy

Instructions

- 20 mins: presentation on [the archetypes of local enabler ecosystems](#) and initial reflections from the broader group
- 5 mins: Go to your [assigned group](#)
- 30 mins: Within your group, [create your local enabler map](#) for your city's solutions
- 5 mins: [Partner with another group](#) to exchange results
- 30 mins: [Share](#) your map with your partner group and crowdsource potential local enablers that you may have left out (~15 min per group)



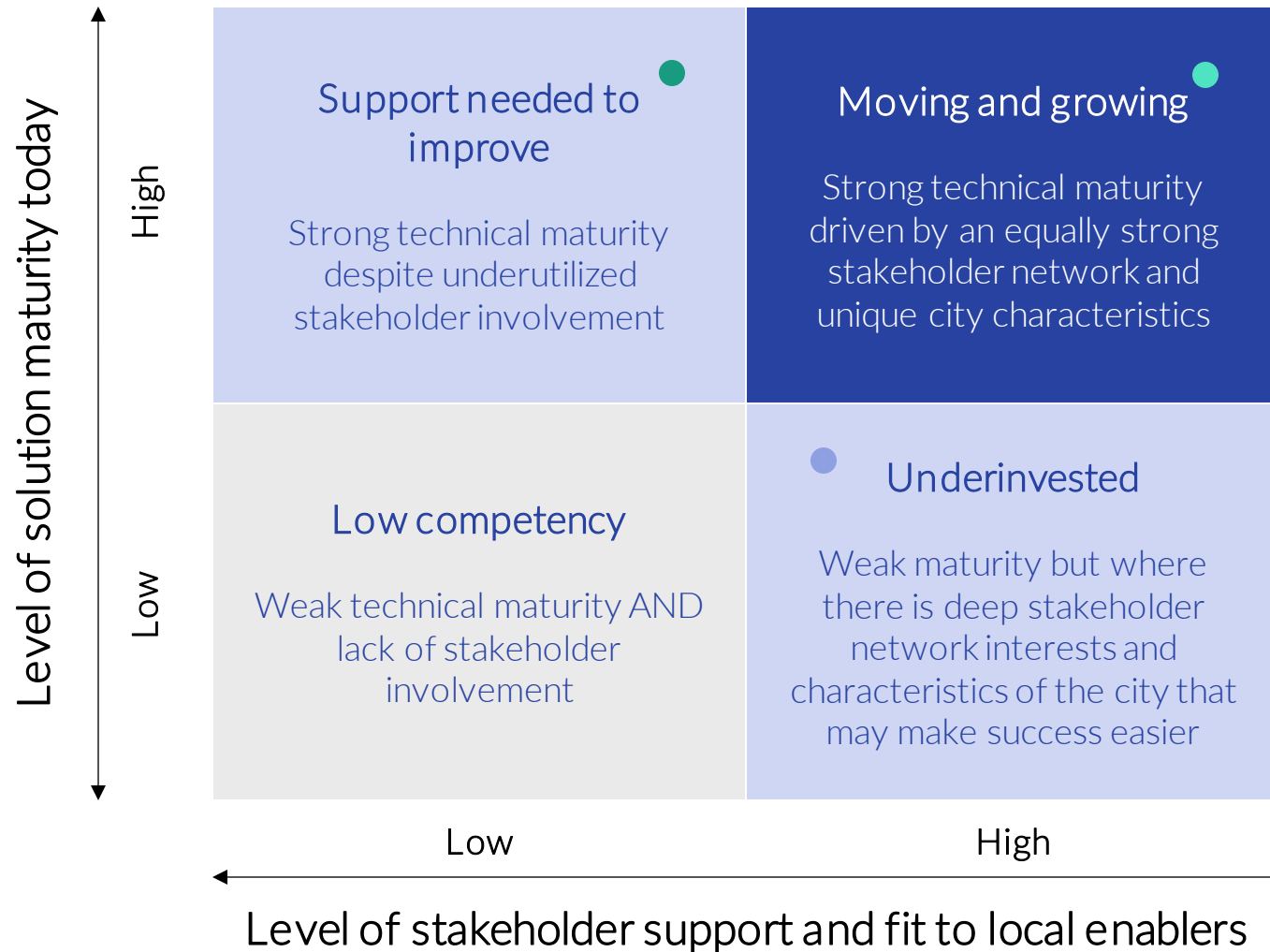
One approach to prioritizing many different solutions is to map maturity against local enablers and stakeholder appetite

The playbooks for transformation vary depending on which category your solution falls in, but the first step is correctly identifying where your prioritised use cases are on this map

Solution maturity – what level of deployment is the solution today?

Fit to local enablers and stakeholder enthusiasm – to what degree did the local enablers analysis suggest the city might have an advantage on this solution, and were stakeholders at the stakeholder workshop genuinely excited?

Intelligent Cities
Challenge



Illustrative for Green Economy Theme city aspiring to decarbonize while creating jobs

- Retrofitting domestic homes
- Increasing renewable power use
- Kick starting a hydrogen economy

This assumes all solutions have a similar level of effectiveness for addressing the vision

Cities can use these archetypes to guide the prioritization of their shortlisted solutions

Cities should prioritise solutions where there is some maturity and also enthusiasm /enablers (A) – technical maturity and/or strong stakeholder buy-in, providing there is still room to improve

Following that, solutions with stakeholder enthusiasm / enablers but low maturity (B) are better than low enthusiasm / enablers and high maturity (C)

It is likely best if cities deprioritize solutions that lack both of these components ('low competency' archetypes) if the solution is to make material progress in the ICC (D)

C) Support needed to improve 3 RD PRIORITY	A) Moving and growing 1 ST PRIORITY
D) Low competency DEPRIORITIZE	B) Underinvested 2 ND PRIORITY

...and each archetype will have unique implications for how cities approach the implementation phase

Key questions to consider within each archetype:

Maturity issues



How much funding is needed to support the initial launch of the solution? What sources (public and private) can cities leverage?



Is there talent and capacity within the city to deploy and maintain the solution?



Is there demand from businesses/citizens for the solution?

Stakeholder / enabler issues



What role will the city play? (e.g., convener vs. asset owner/general contractor)



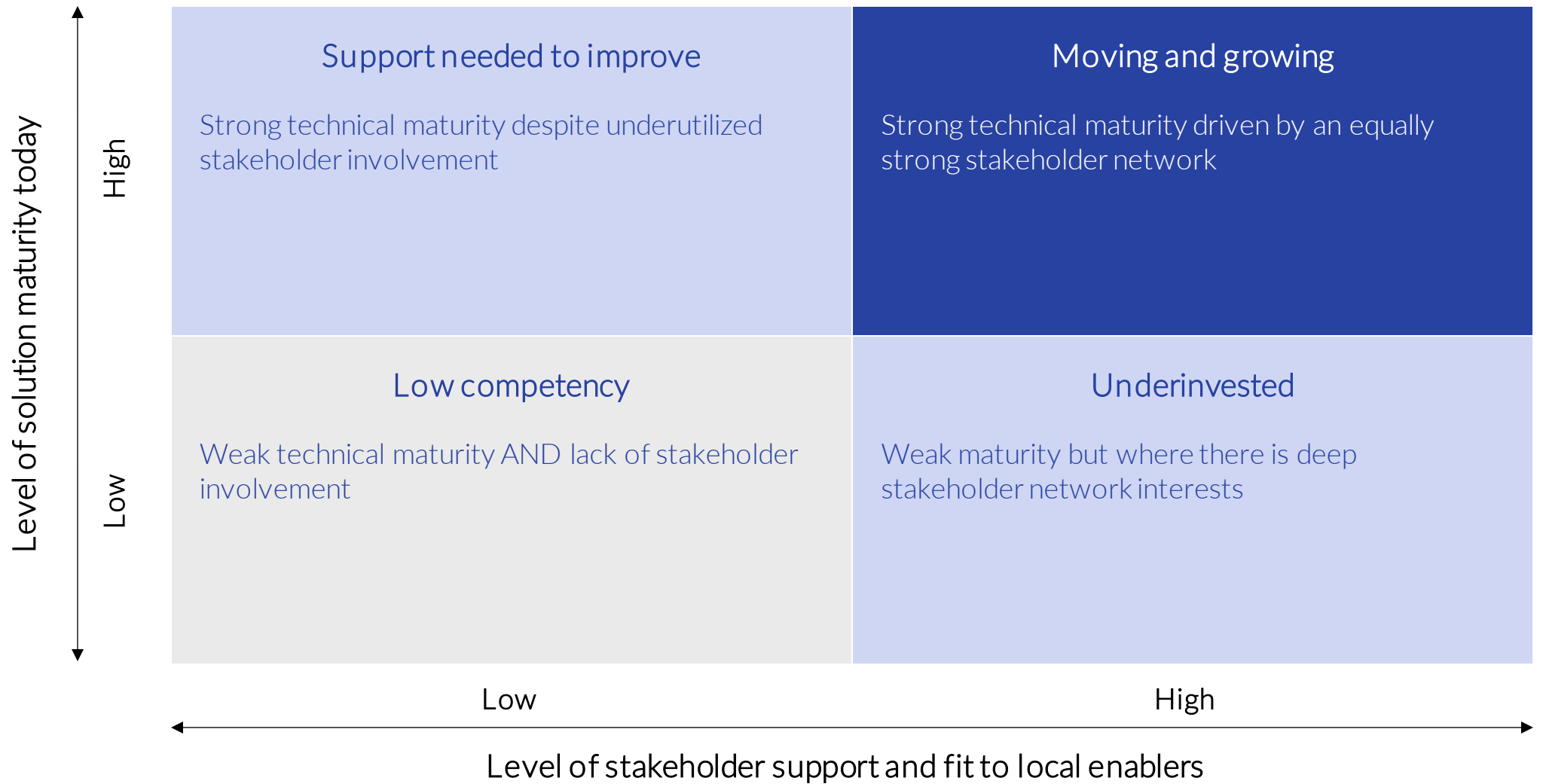
Are there existing regulatory barriers that prevent stakeholders from fully contributing?



How can the city better access private sector players' value chains to deploy solutions at scale?

In Mural, use dot stickies to show which archetype you feel each of your city's solutions falls into

- Solution #1
- Solution #2
- Solution #3



In Mural, use stickies to ideate and vote on the big unlocks for each of your city's shortlisted solutions

Questions for each archetype are example only

 Solution #1

 Solution #2

 Solution #3

Support needed to improve

E.g., what incentives would help activate stakeholders to contribute to and build on the strong existing technical maturity?

Moving and growing

E.g., what potential roadblocks could disrupt momentum of existing solutions in the future?

Low competency

E.g., what are the biggest roadblocks that are impeding technical maturity and stakeholder engagement today?

Underinvested

E.g., what underlying investments will most help the city leverage high enthusiasm and strong enablers?

Local enabler ecosystem mapping template: (SOLUTION NAME)

Please complete this table for each prioritized solution. Solution name: xx Archetype: xx

Local enablers of relevance xx

Cover any relevant buckets, and stakeholder workshop insights

Solution maturity xx

Cover all criteria and include 'so whats'

Wider thoughts and reflections on appeal of solution xx



Support for the solution maturity and strategy workshop

■ Detailed next

What this document contains:

The purpose of this document is to provide lead experts with the materials they will need to guide the Solution Maturity and Strategy workshop with participants. More specifically, this document contains:

- Instructions to encourage cities to share activity undertaken since last meeting of the workshop invitees
- Support on mapping existing technology maturity assessment results to cities' stakeholder networks
- Support on using Agile and Design Thinking to scale priority solutions
- Idea-starters for common strategic challenges cities may face along the way
- Support on identifying win-win opportunities
- Templates for workshop deliverables, including prep for upcoming cross-city labs

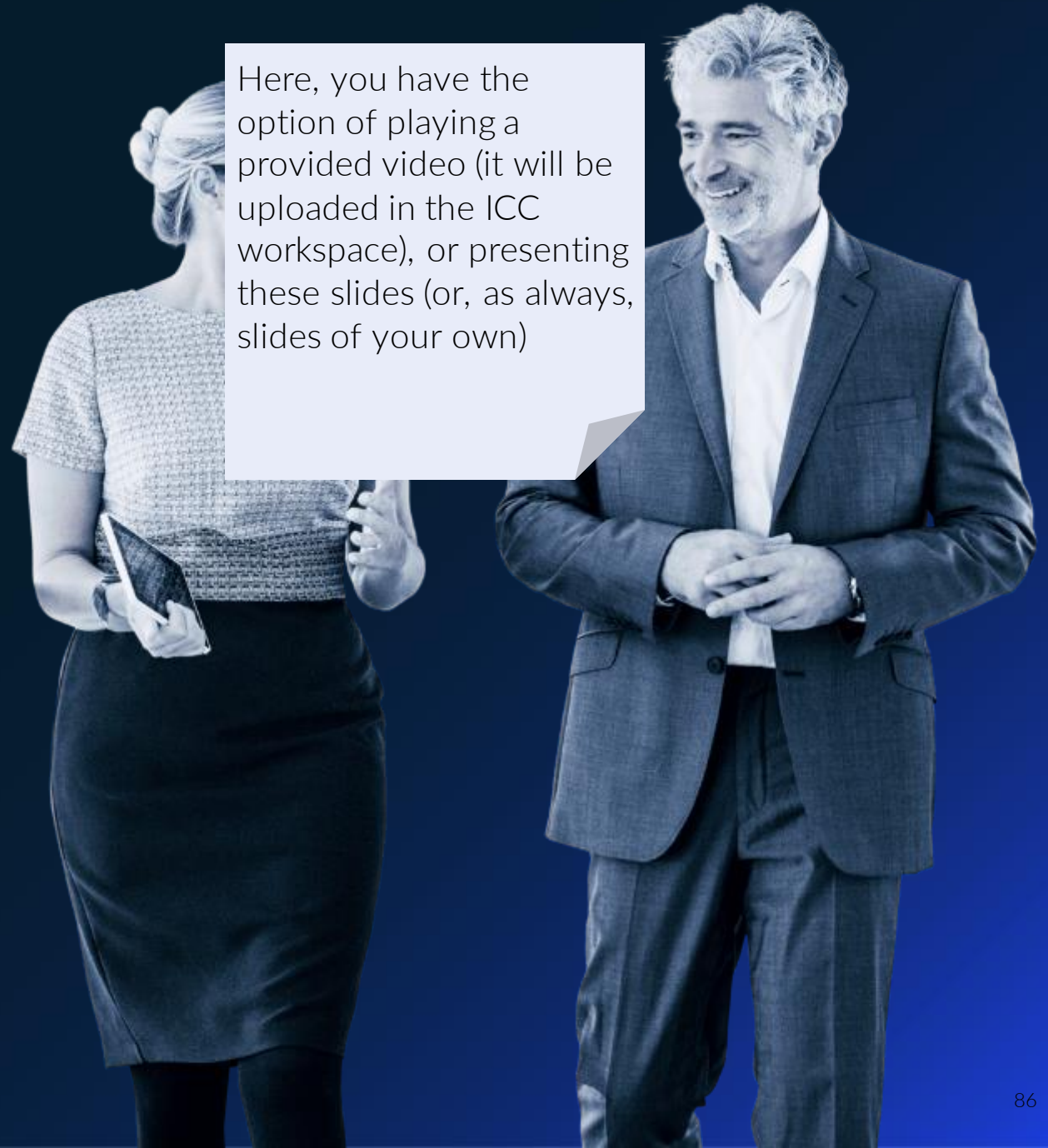
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- 1) Adapt the recap discussion to provide cities an opportunity to share their stories and energize the start of the day the start of the day
- 2) Take the time to review city technology maturity assessment results and pull out interesting insights
- 3) Facilitate critical thinking that prompts cities to creatively map their maturity assessments against existing stakeholder strength/weaknesses
- 4) Help city reps understand the trade-offs associated with the different approaches to implementing solutions, depending on each city's own maturity level

Agile – Introduction (15 mins)

Here, you have the option of playing a provided video (it will be uploaded in the ICC workspace), or presenting these slides (or, as always, slides of your own)



Agile focuses on getting something that is 'good enough' for people to move forward

Traditional 'waterfall' approach



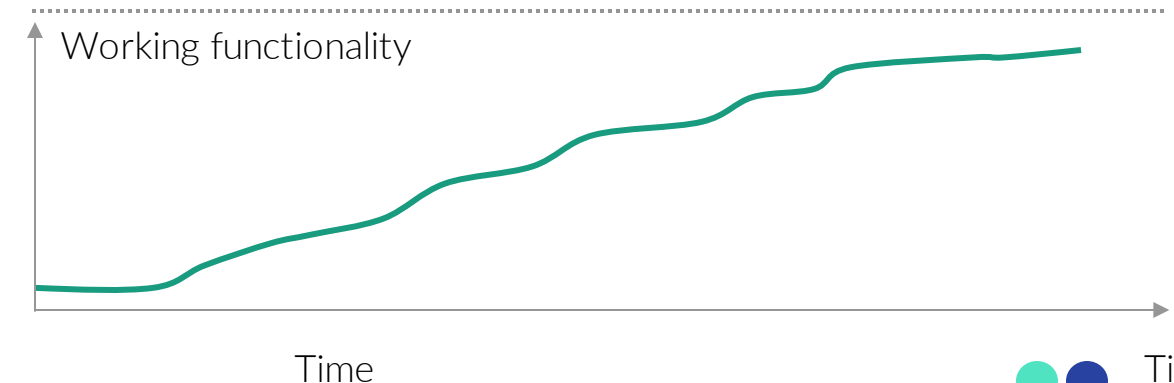
New agile approach



Iterative and NON-incremental development



Iterative and incremental development



Although originating from the private sector, many government agencies have now found agile can unlock multiple benefits



Benefits of Enterprise Agility

Increase customer/
citizen satisfaction



Develop better products
and services cheaper and
faster



Increase employee
satisfaction

Quantitative examples
of benefits of
Enterprise Agility

~50%

improvement
in customer satisfaction

~70%

decrease in product and
service defects

15%

increase in employee
engagement

Agile government agencies exhibit five trademarks that allow them to capture these opportunities

			Traditional government agencies	Agile government agencies	
1		Strategy	North Star embodied across the organization	Common vision often in place, but management and employee goals and actions not always aligned	Clear North Star to which entire organization (management and employees) is aligned and working towards
2		Structure	Network of empowered teams	Functions working in silos ; limited ability for cross-functional teams to move with authority and speed	Small, cross-functional teams with clear missions that can rapidly be deployed and are organized in as few layers as possible
3		Process	Rapid decision and learning cycles	Work carried out with detailed planning and little testing and learning	Work carried out in short iterations with the goal of minimizing risk through testing and learning
4		People	Dynamic people model that ignites passion	Static people model that follows formal hierarchies, with little emphasis on developing, attracting and retaining talent	Culture focused on fostering, attracting and retaining talent, through empowerment, servant leadership and job satisfaction
5		Technology	Next generation enabling technology	Highly customized legacy technology stack requiring significant changes to support business needs	Simplified, modular technology stack (e.g., DevOps, Cloud) to support quick iterations, higher deployment velocity and resiliency

Of most relevance to the ICC, agile brings 4 main benefits for delivery of solutions



Be closer to the user/citizen/business

Co-create solutions, prioritising scalable prototypes that respond to citizen and business needs

Start with a blank slate that allows you to consider what actually matters to those involved



Deliver in weeks rather than years

Develop value faster

Prototype a minimum viable concept

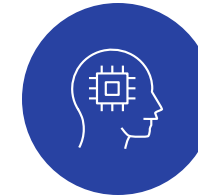
Experiment and fail often



Build more usable/simple solution

Obsessive focus on user experience and creating value for citizens and businesses

Reduce hurdles, e.g. input required



Adopt new technologies faster

Take full advantage of new technologies

Includes facilitator notes



If you define the problem correctly, then you almost have the solution.

Steve Jobs

Includes facilitator notes

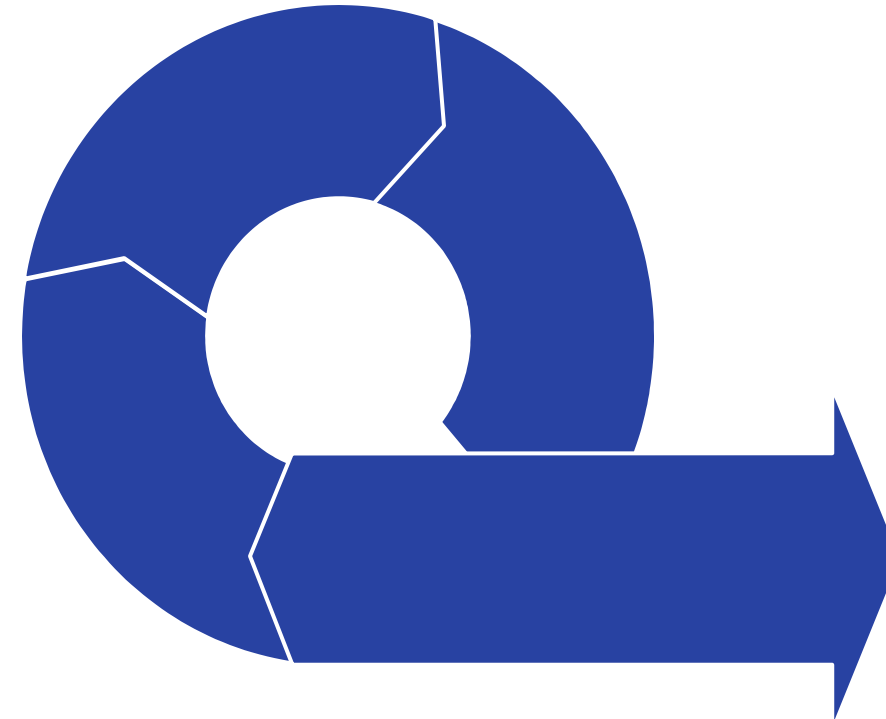
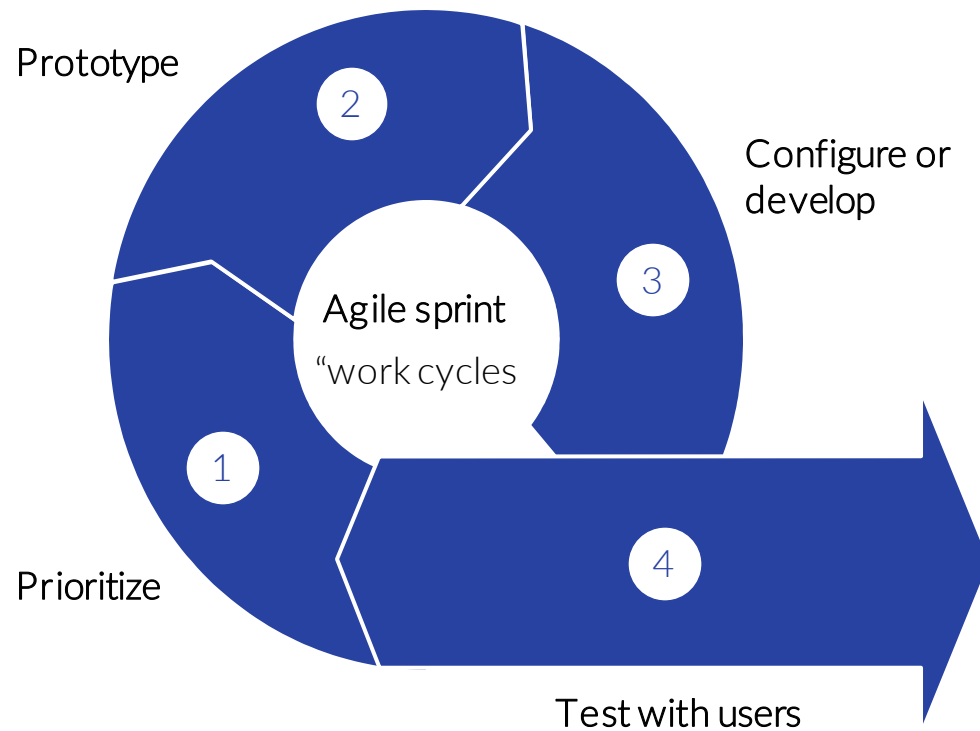






Includes facilitator notes

At the core of agile are short cycles that allow us to accelerate the pace of innovation – like the sprints you will see during the implementation phase



Flexible and adaptable to changes
Cheaper
Dramatically faster (time to completion)
Business aligned

Reduced risk
Improved accountability
Can be more complex to manage

Includes facilitator notes

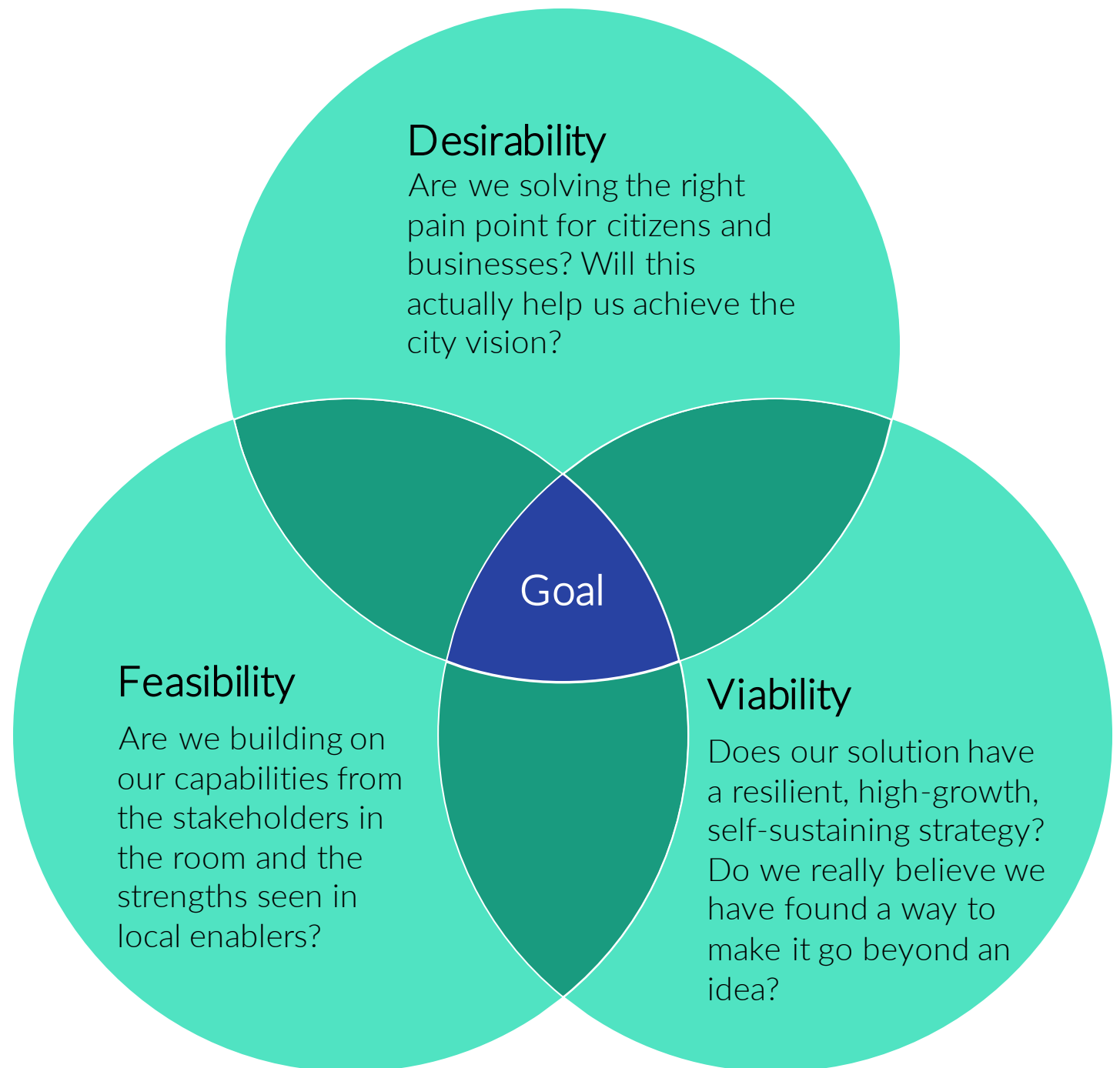
Challenge





Design Thinking – Introduction (15 mins)

Design creates value by delivering impact



Includes facilitator notes



Includes facilitator notes



Includes facilitator notes



Includes facilitator notes



Includes facilitator notes



Includes facilitator notes



Includes facilitator notes

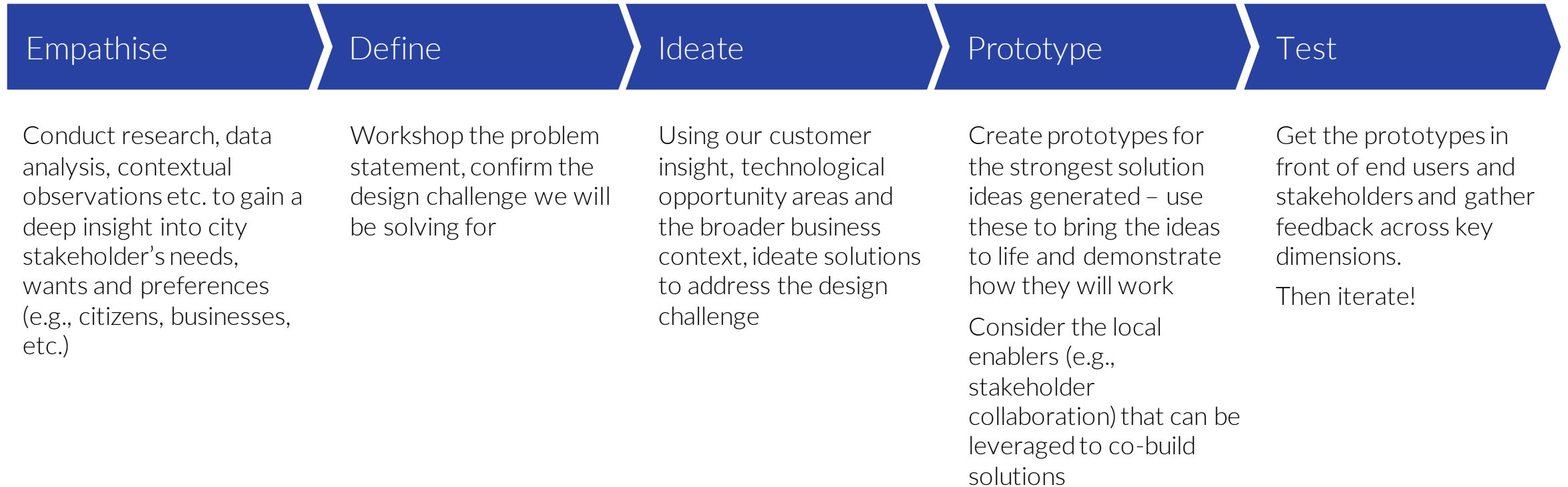


Includes facilitator notes

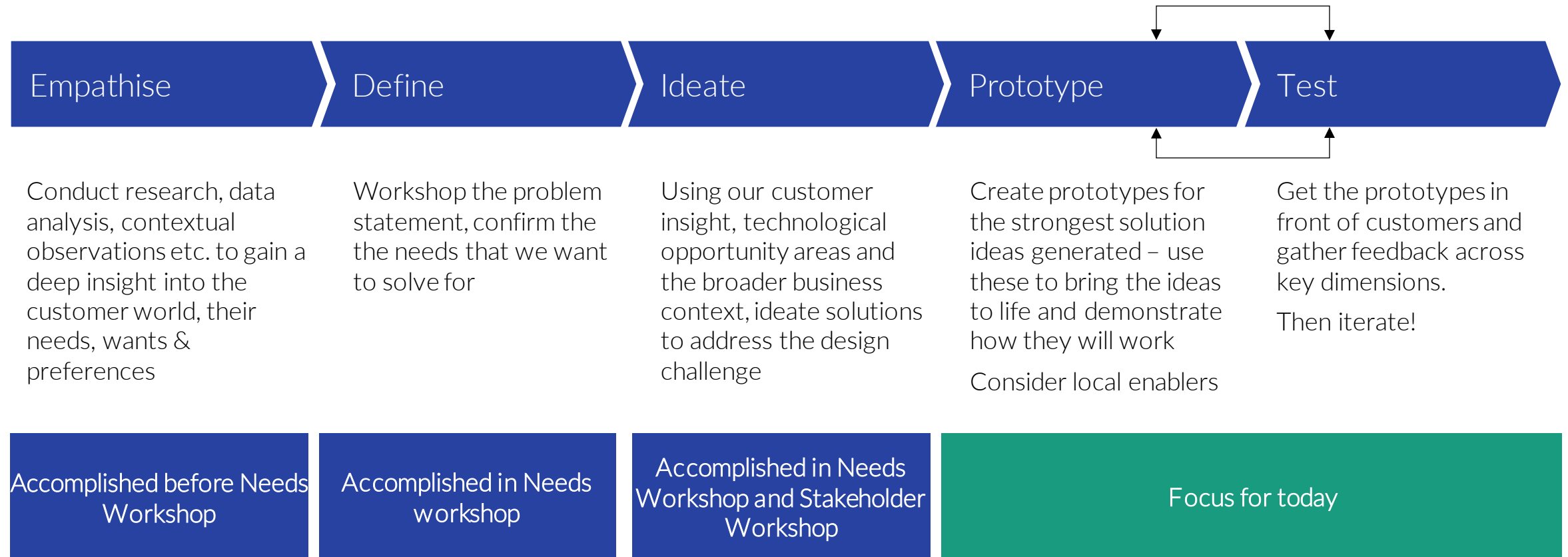


Includes facilitator notes

The design thinking process progresses through 5 key stages



Today, we'll mainly be drawing on the 'prototype' and 'test' elements of design thinking



Includes facilitator notes



Agile sprints – group
activity
(~2.5 hours)

Today is our chance to think differently and collaboratively re-imagine the future

Understand how to merge design thinking and agile methodologies through hands-on exercises

Participating teams are going to run through multiple mini scrum sprints to develop a prototype leveraging each city's local enablers

Share back the great ideas and take them to the next level

Rules for the day

Be open to new concepts and ideas – not the place for devil's advocate

Be supportive - not judgmental

Share your experiences

No idea is bad, everyone's ideas are equally valued

Respect everyone's right to be heard – don't have side conversations while someone is talking

Listen and ask clarifying questions

Stay focused. Signal when going off-track

Use parking lot for off-track topics



First, pick your idea coordinator



5 min

Team up in to 2-4 groups.

Select an idea coordinator for your team.

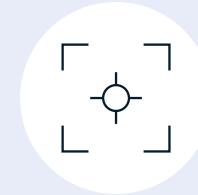
Role of an Idea Coordinator is to set direction for the team and prioritise what the team works on next.

Agile teams should not have “managers” or “dictators”. Discourage these behaviours if you see them.

The Ideal Idea Coordinator



Business need



User Focused



Idea vision



Domain Expertise

Sprint Zero – Evaluation



15 min

First, each team needs to pick a solution in collaboration with your hosts. How many your city covers in the workshop will depend on the size of the workshop and where your city is on its transformation journey.

For each city's team, align on the goal and parameters you would like your solution to achieve (e.g., doubling the number of charging stations in the city to successfully adopt EVs)

Then, think about different ways you could attempt to achieve this. This could be focusing on different user groups who might benefit from the solution, different areas of the city, or different ways of coming at the problem.

Fill the Feasibility, Viability and Desirability matrix for each of your ideas on how to scale the solution

Based on the matrix, choose the top 1 idea you would like to take to the next level and prototype



Example criteria that can be used for the assessment

This list is entirely illustrative – consider the best way for groups to prioritise different high level approaches to scaling a solution

Category	Criteria	Definitions	Rating (High, Medium, Low)
Viable	Business model	Is this likely to be a sustainable approach	
	Low Cost	Is this project relatively low-cost?	
Feasible	Technology maturity/Risk	What is the probability of overcoming the technical challenges related to this idea?	
	Local enablers	Do we have stakeholder support to co-build this solution with?	
	Resources - People	Do we have the skills & bandwidth to execute this idea?	
	Ease of implementation	How easy or hard is it to implement and execute the idea?	
Desirable	Pains	Does it address the user pains identified?	
	Gains	In what way is this idea going to make user's life easier?	

Feasibility, Viability and Desirability matrix for idea assessment

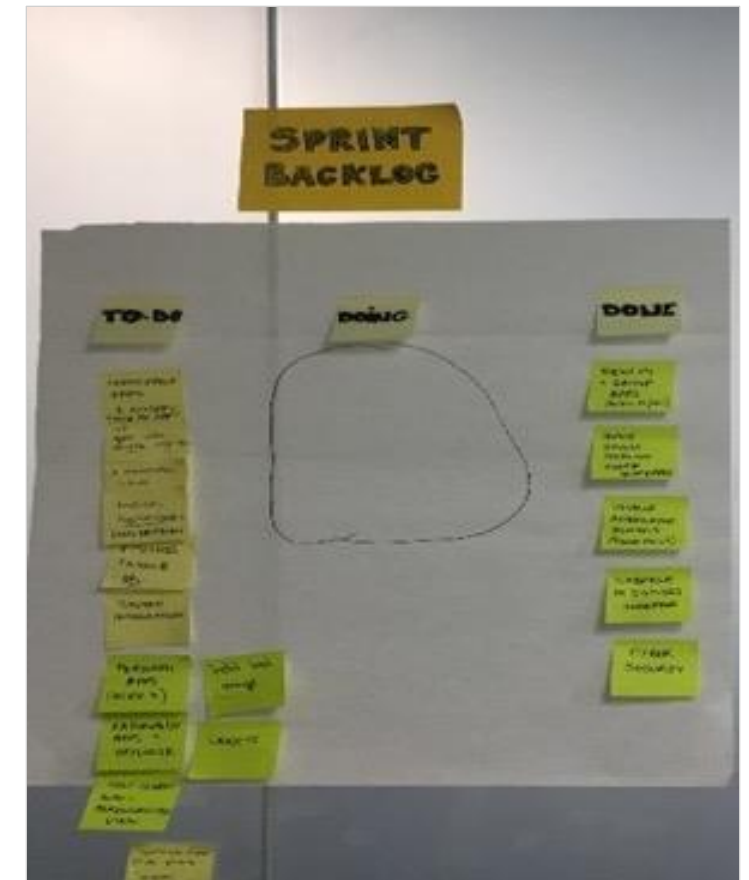
TEMPLATE for Mural

Idea	Feasibility	Viability	Desirability	Total Score
...
...
...

The solution approach with the highest score will be used for the remainder of today's breakout activities

Participants can leverage digital tools (e.g., Mural¹) to ideate and virtually whiteboard their solution designs

Example outputs – Sprint planning



(1) Mural (<https://www.mural.co>) provides the option of a free license with unlimited visitors who can all collaborate but they cannot facilitate or access other areas of your workspace

Sprint 1 – Prototype and test your idea (iteration 1)



~2.5 hour

Prototype (120 mins)

Assign tasks and prototype your idea. Be creative. Be Visual. Start drawing.

Make sure to include everything you have learn so far on the city journey – needs, maturity, local enablers and stakeholder perspectives.

Testing (20 mins)

Present your prototype to the team next to you for feedback. Give feedback to the other team's prototype in return

Retro (10 mins)

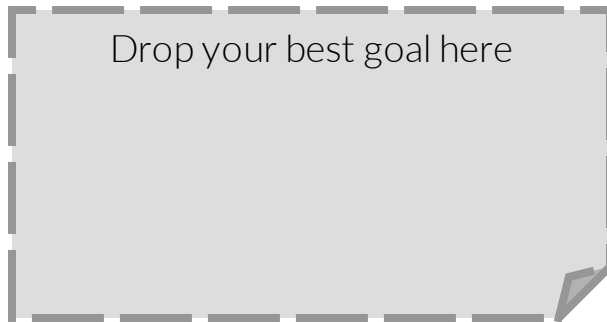
What did you do well as a team and what can be improved?

This is just a list of suggested activities in the design of a solution and its strategy. These should be adjusted / replaced and complimented with relevant materials from the city



Mural template for concept sprint – problem statement (5min)

- 1 **Prompt:** What problem is your solution solving for? (think back to the vision)



- 2 Vote on the problem statement that is the best or most compelling to you



- 3 Group idea owner leads short group discussion on goal statement with most votes

Mural template for concept sprint – what does the solution implementation look like? (10 min)

- 1 **Prompt:** What are the key features of your idea as you originally envisaged it?
- 2 Add in any visualization that helps other groups understand the concept

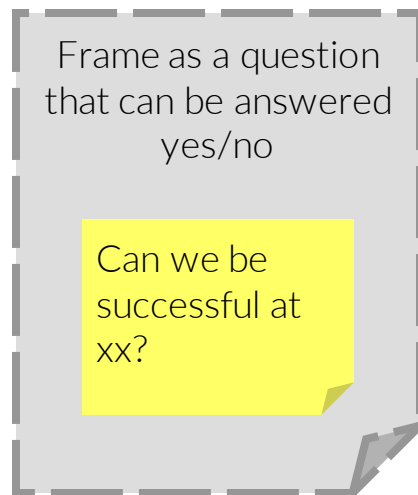
Mural template for concept sprint – roadblocks (10 min)

- 1 **Prompt:** We're in the future, and we failed, what tripped us up?

Make it specific

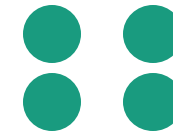


Write it as a question



- 2 Vote on the question that is the best or most compelling to you

- Each participant gets 4 votes
- Use one vote to many questions, or many votes to one



- 3 Group idea owner leads short group discussion on questions with most votes

Mural template for concept sprint – business model – 20 mins

Key partners



Who are our key partners?
Which key resources are we acquiring from partners?
Which key activities do partners perform?

Key activities



What key activities does our solution require to have impact?
How does the solution keep running behind the scenes?

Value propositions



What value do we deliver to users?
What value proposition to we deliver to partners?
How does the wider city benefit?

Customer relationships



What type of relationship does each of our users expect us to establish and maintain with them?

Channels



How do we reach different users involved in the solution?

User segments



Who are the different groups who could benefit from the solution?
What differentiates them?
Do they all get the same benefit? Do they all cost the same to serve?

Cost structure



What are the most important costs?
Which key activities are most expensive?

Revenue streams



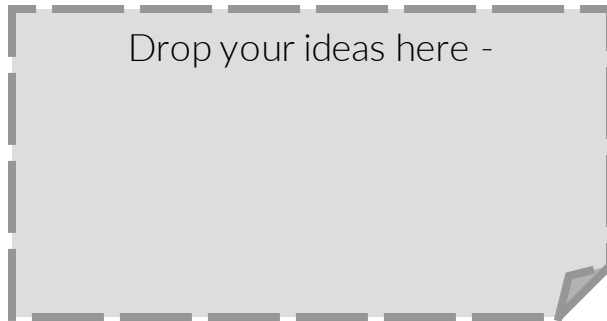
Who is willing to pay for this benefit?
Who should pay?
Who can pay?

1 Prompt: The solution needs to be sustainable economically. One way to consider different business models is to use a 'business model canvas'. Fill in different ideas that answer the questions

2 Prompt: A business model canvas can be good for spotting 'reinforcing loops' in the business model. E.g., does the proposition become more compelling to support or cheaper to run the larger it is?

Mural template for concept sprint – business models (cont.) (10 min)

- 1 **Prompt:** Considering the different options on the business model canvas think about the two or three different business models (sets of choices across the different groups) that your idea could take. Discuss the pros and cons of each



- 2 Vote on the business model that is the best or most compelling to you

- Each participant gets 6 votes
- Use one vote to many questions, or many votes to one



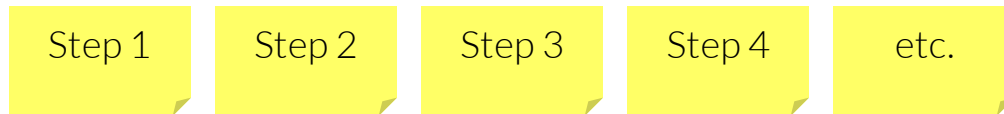
- 3 Group idea owner leads short group discussion on results with most votes

Mural template for concept sprint – visualize key actors (20min)

- 1 **Prompt:** What are the main stages of scale up of your solution? How would you describe its lifecycle? What defines the steps that move between each?

Phase 1

Phase 2



- 2 **Group idea owner leads short brainstorm with group on the different phases**

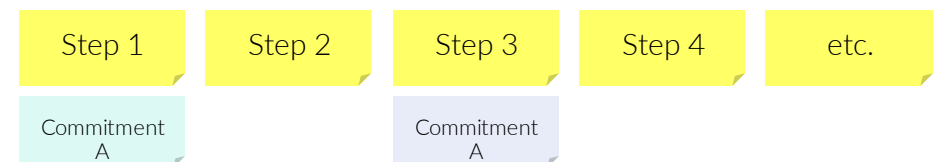
Rearrange phases and steps into one final mapping

- 3 **Group idea owner leads short brainstorm about which stakeholders are most influential to achieving the different steps**

Use coloured stickers for different stakeholders and commitments that are necessary from them at each stage

Phase 1

Phase 2



template for concept sprint – management model (10 min) Mural

- 1 **Prompt #1:** Which actor/stakeholder is best positioned to be the primary driver for the solution's development?

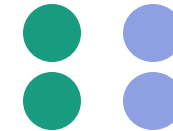
Drop your ideas here -

Prompt #2: Which stakeholder is best positioned own/manage the solution at full-scale end state?

Drop your ideas here -

- 2 Vote on the stakeholders that are the most compelling to you

- Each participant gets 2 votes per
- Use votes to different stakeholder, or both votes to one stakeholder

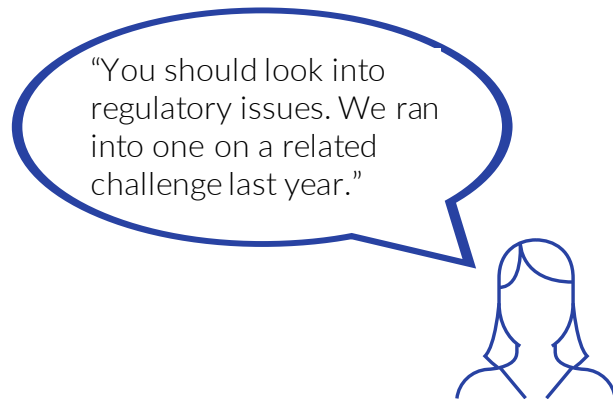


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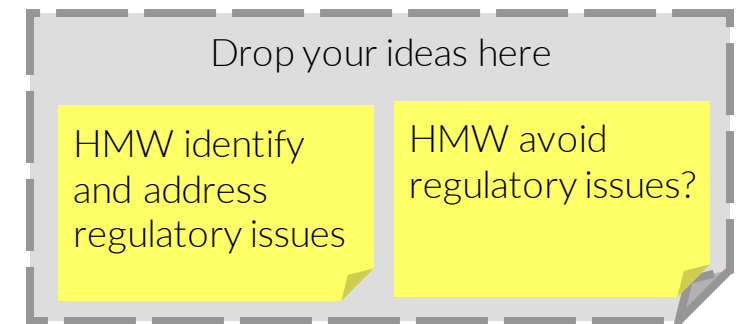
Mural template for concept sprint – expert input (15min)

1 Prompt: Ask your experts:

- What are we missing?
- What else should we consider?
- What have you seen work or not work before?



2 Capture as 'How might we' questions




3 Vote on the most important consideration that is the best or most compelling to you

- Each participant gets 4 votes
- Use one vote to many questions, or many votes to one



Mural template for concept sprint – solution prototype (20min)

- 1 **Prompt:** Review your team's results – draw a sketch of how the solution will be deployed
 - What does the value chain necessary to deploy and scale your solution look like?
 - What would your ideal prototype look like for end users (e.g., business, citizens)?
 - Participants should upload pictures of their sketches (or draw virtually in Mural)

- 2 Review all of the sketches by yourself
Vote on the best or most compelling ideas
 - Each participant gets 6 votes
 - Use one vote to many questions, or many votes to one
- 3 **In 2 minutes or less**, the facilitator will walk through the highlights of the solutions sketch and each may share aloud what they liked about each solution

Facilitator will capture positive attributes on stickies

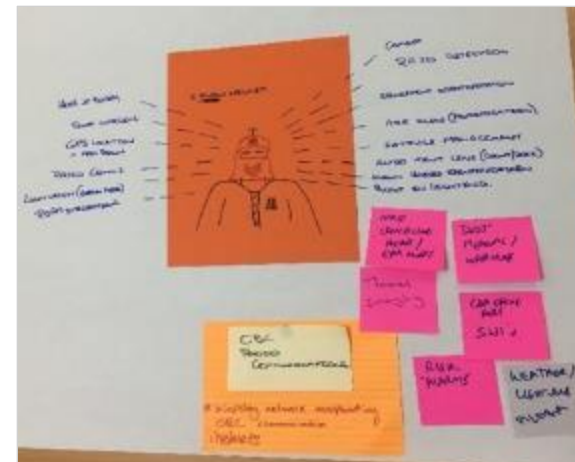
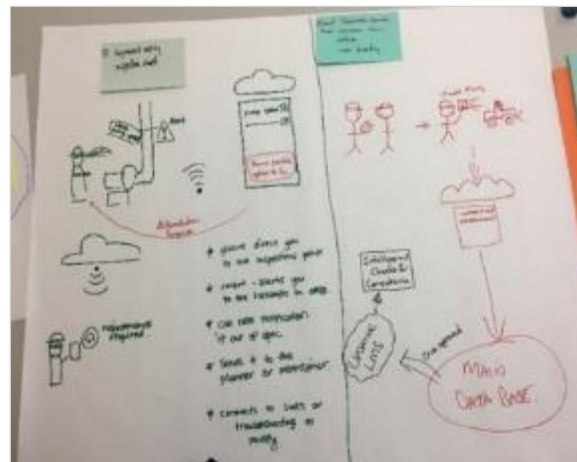
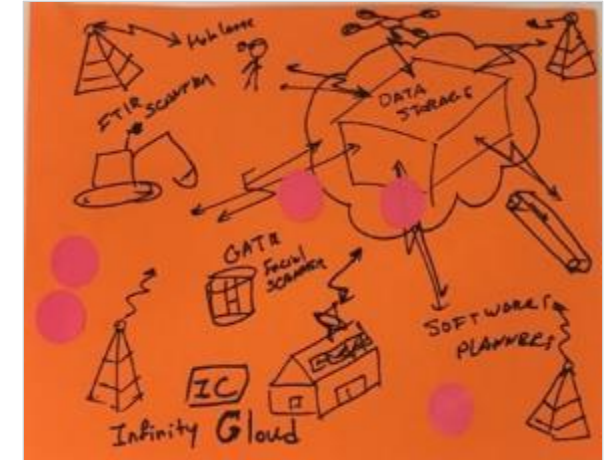
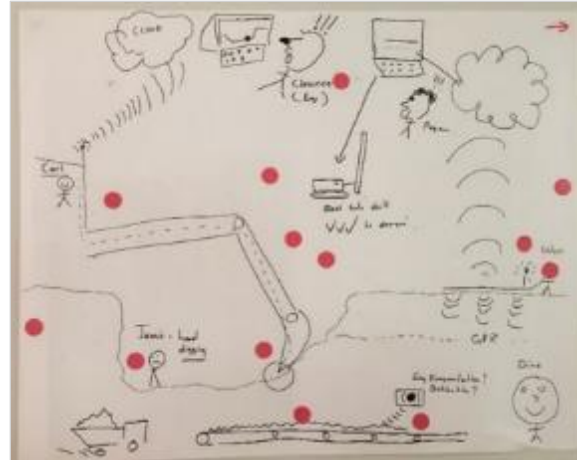
User friendly

Easy setup

Sustainable revenue

Example sketches of prototypes

Example outputs – Prototype designs



Break (coffee or pulse check)

Gather feedback from a partner team

Testing – presenting (20 mins)

Partner with another group to present and share feedback on each team's first prototype sprint

Sprint Retro - Example discussion questions for retro (10 mins)

A sprint retro is a common part of the end of an agile sprint, where teams reflect on how they worked together – what went well and what can be improved. Questions can include?

What surprised you about this way of working?

In what ways was your team successful?

What challenges impacted your team performance?

How will you do things differently tomorrow?



Using Mural the discussion with a Retrospective Board as a group



What went well?



What could be improved?



Key changes to make

Remember to use the voting function to vote for your favorite responses

DAY 2

Sprint 2 – Prototype and test your idea (iteration 2)



2hr 25min

Sprint Planning (5 mins) – What are you going to do for the next 20mins?

Prototype (90 mins) – Self organize by assigning tasks and refining your prototype based on the feedback received - incorporate any feedback you received from the other team into your prototype

Prepare (45 mins) – Work as a group to create your final prototype sketch that you would like to present to the broader audience (elect a presenter)

Retro (5 mins) – What did you do well as a team and what can be improved?



Showcase



30 min

Each team has 5 minutes to showcase their final prototype to everyone in the room

Teams can use whatever creative mediums to do so, including Mural boards

Highlight how you will leverage your local enablers to ensure a more successful prototype

Finish on next steps that you'd pursue to take the idea to the next level

Ask the audience to provide you with feedback on how you could improve your prototype

Includes facilitator notes



Retro and key takeaways as a group



30 hour

Within your team, take a 15 minutes to think about key takeaways from the day.

Present back to the group – 1-2 min per team

Includes facilitator notes



Example discussion questions for retro

In what ways was your team successful?

What challenges impacted your team performance?

How will your team strategy change from one sprint to the next?

If your team were to implement learnings from this in their current project, what is it that you will take back to your project?



Using Mural the discussion with a Retrospective Board as a group



What went well?



What could be improved?



Key takeaways

Remember to use the voting function to vote for your favorite responses

Sprint Zero – Backlog Creation



15 min

As a team, think of what would you need to do to make your selected idea happen

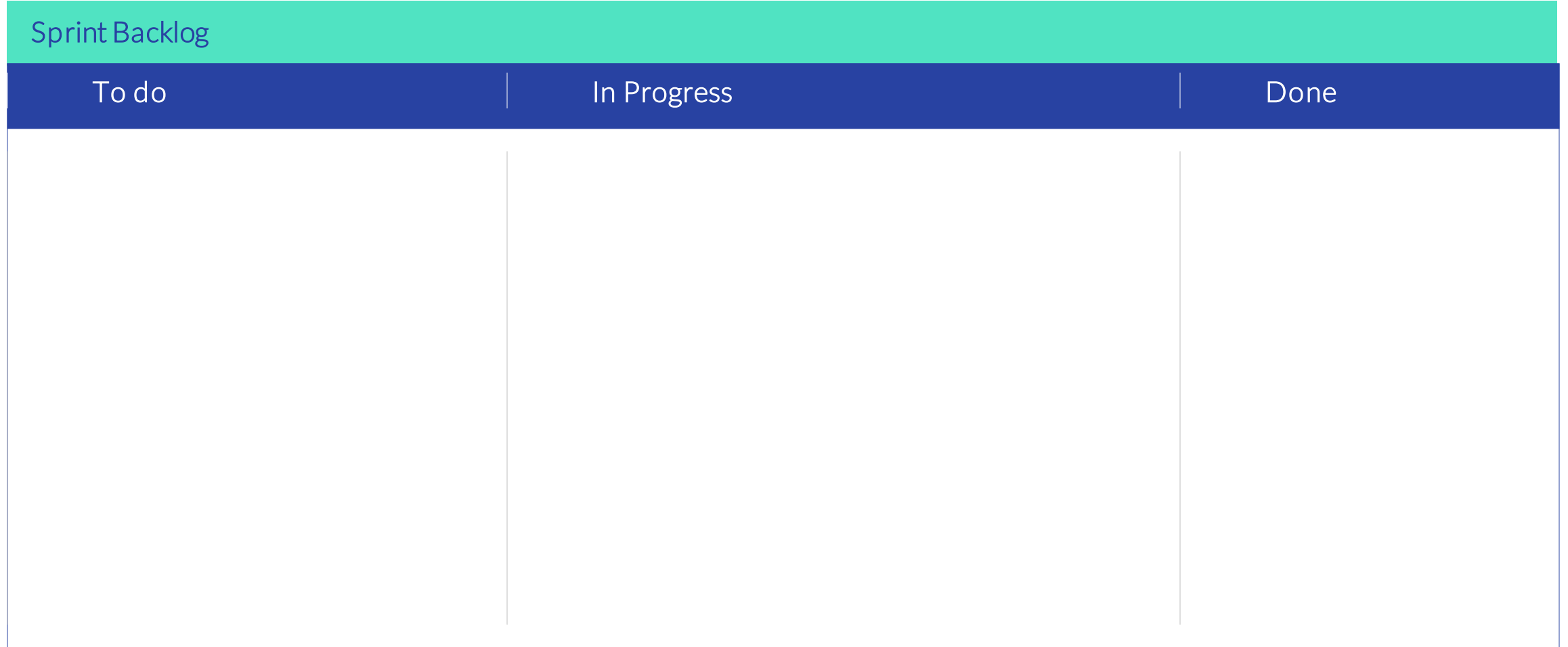
Idea Owner needs to define the solution vision and create a backlog of activities for the team to work on to bring the selected idea to life

Consider what key activities will still need to be addressed post-workshop

Focus on the minimal viable product for the idea



Put together the Sprint Backlog board with 'to dos' using Mural



Support for the solution maturity and strategy workshop

■ Detailed next

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- 3) Facilitate critical thinking that prompts cities to **creatively map their maturity assessments against existing stakeholder strength/weaknesses**
- 4) Help city reps **understand the trade-offs associated with the different approaches to implementing solutions**, depending on each city's own maturity level

The Ten Tests that define the elements of a good business strategy can also help cities shape a best in class intelligent city strategy...

1	Is your solution going to have a material impact on the city?	...or are we just playing lip service?
2	Does the solution strategy tap into your city's true source of advantage?	...or is it full of generic statements that could apply to your neighbours?
3	Is the solution strategy granular about where and how to push solutions?	...or is it just a general statement about wanting to be better wherever you can?
4	Does it put the city ahead of trends and discontinuities?	...or does it assume continuation of the status quo, not reacting to change until it's too late?
5	Does the solution strategy embed privileged insight and foresight about what might work in your city?	...or does it rely on common analysis of common data to yield common wisdom?
6	Is uncertainty properly defined and accounted for?	...or is uncertainty either being ignored or inducing paralysis?
7	Does it balance commitment-rich choices with flexibility and learning?	...or is there too much planning and too little focus on choices that can unfold over time?
8	Have alternatives been evaluated without bias or false inference?	...or does the strategy fall victim to biases and faulty logic in the way decisions are made?
9	Is there true conviction to act?	...or are the old beliefs behind the new strategy left unchanged?
10	Is the solution strategy translated into clear actions and reallocation of resources?	...or is it a vague statement of intent that doesn't connect to new actions?

...and at the end of the workshop, step back and do four more checks



If we are pursuing more than one solution, do they have positive interactions?



Do your key stakeholders have skin in the game?



Is the route to funding clear? Or at least several options can be pursued to reduce risk?



Can the city pursue all the desired solutions, or do they need to pick?

Support for the solution maturity and strategy workshop

■ Detailed next

What this document contains:

The purpose of this document is to provide lead experts with the materials they will need to guide the Solution Maturity and Strategy workshop with participants. More specifically, this document contains:

- Instructions to encourage cities to share activity undertaken since last meeting of the workshop invitees
- Support on mapping existing technology maturity assessment results to cities' stakeholder networks
- Support on using Agile and Design Thinking to scale priority solutions
- Idea-starters for common strategic challenges cities may face along the way
- Support on identifying win-win opportunities
- Templates for workshop deliverables, including prep for upcoming cross-city labs

Instructions for experts:

The materials contained in this document are intended to be a **starting point for hosting creative brainstorming sessions with city leaders**. Experts should be prepared to:

- 1) Adapt the recap discussion to provide cities an opportunity to share their stories and energize the start of the day the start of the day
- 2) Take the time to review city technology maturity assessment results and pull out interesting insights
- 3) Facilitate critical thinking that prompts cities to creatively map their maturity assessments against existing stakeholder strength/weaknesses
- 4) Help city reps understand the trade-offs associated with the different approaches to implementing solutions, depending on each city's own maturity level

In this activity, participants will reflect on the ideas they have seen and spot 'win-win' relationships between stakeholders



TIME: 30 minutes



OUTPUT

- A clear mapping of stakeholders against the solutions being developed



OBJECTIVE

- Highlight where the ecosystem has shared benefits from working together
- Instill a sense of ownership of the priority solutions as they are further developed



INSTRUCTIONS

- 15 mins: Discussion with stakeholders in the room volunteering what interest they have in different ideas, what they could bring to the table, and things they'd be keen to get in return
- 10 mins: Discussion repeating the above exercise, but speculating for stakeholders not in the room
- 5 mins: Stakeholders fill in the win-win template live, and commit to follow-on sessions on each of the solutions




Mapping stakeholder commitments and needs can spotlight win-win opportunities

 *Solution #1*
...

 Description
...

 Relevant to which city opportunity
...

 Benefit to city
...

Stakeholder	Benefit to stakeholder	Contributions to solution	Resources needed from city/other stakeholders
Stakeholder #1
Stakeholder #2
Stakeholder #3

Live poll – Question 1: cities' areas of expertise

Please select **up to three answer choices** that you feel are your city's best areas of expertise on which it may share knowledge with peer cities at upcoming cross-city labs.

These make the city believe that it is possible to achieve the desired transformation. This expertise may be based on, e.g.,

- city pilots on intelligent solutions,
- collaboration with ecosystem players in the city
- experience in attracting additional funding for city projects

Please use your computer or mobile device to

visit [Menti.com](https://www.menti.com)

Use code: **xx**

This is just a list of examples – do not feel compelled to use these, and ideally, create a customer list based on your read of the city's journey to date



Technical implementation of pilot solutions



Supporting a successful organizational culture and agile working model



Incentivizing key stakeholders to contribute to the success of intelligent solutions



Unlocking funding sources to secure the start of projects and sustaining them over time



Convincing customers (residents and businesses) of benefits to increase solution usage



Protecting against data privacy and data security concerns



Ensuring equitable reach and access to the public



Other – please specify

Live poll – Question 2: cities' anticipated roadblocks

Please select **up to three answer choices** that you anticipate to be a potential roadblock for a successful intelligent city transformation in your city.

These responses will be used to help match you with cities that have more experience overcoming these specific obstacles during the cross-city labs.

Please use your computer or mobile device to

visit [Menti.com](https://www.menti.com)

Use code: **xx**

This is just a list of examples – do not feel compelled to use these, and ideally, create a customer list based on your read of the city's journey to date



Technical implementation of pilot solutions



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Protecting against data privacy and data security concerns



Ensuring equitable reach and access to the public



Other – please specify

Facilitators should show on the screen the responses to Question 2 to guide these follow up questions

Live discussion



- 1) For the most commonly identified roadblocks in Question 2, what are the potential causes that cities feel should be addressed?
- 2) What types of support do cities want to see more of in future ICC programming (e.g., presentation, online material, local activity)?

List of dimensions for potential cross-city collaboration

Area of collaboration	Description	Partner city/cities	Benefit for this city	Benefit for other cities
...
...
...
...
...

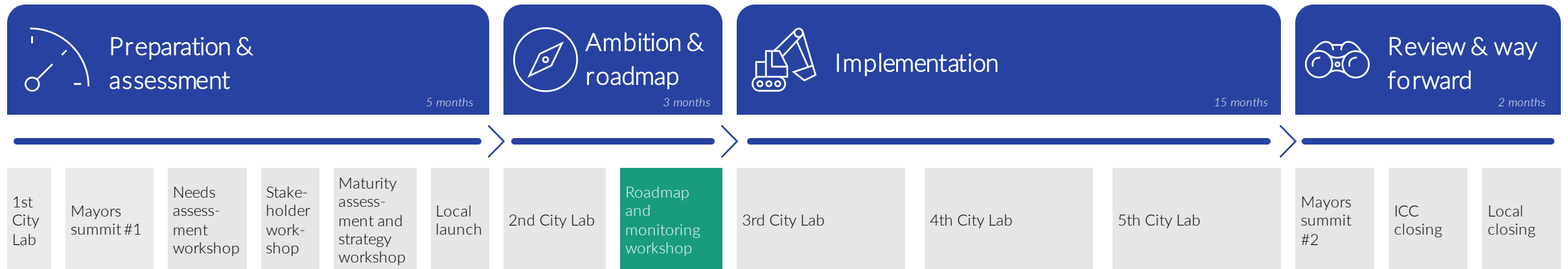
PHASE II – Ambition and roadmap


Roadmap and monitoring workshop

Guidance document

21 March 2021

The roadmap and monitoring workshop has the objective to set the city up for success in the upcoming implementation phase



Description	Objectives	Audience	Design principles
 The Roadmap and Monitoring workshop supports the city in developing a concrete way to deliver and track progress on the strategy through the implementation phase	 Develop an implementation roadmap with priorities and have view of budget and funding for activities during implementation phase Prioritise activities for implementation cycle 1 (the ICC will feature three implementation cycles in total) Determine specific KPIs to be tracked throughout the implementation phase Ensure stakeholder action plans are driven by KPI targets	 3 ICC city representatives , listed in the application process City ecosystem 1 lead expert for the city 1 thematic expert  Duration 1.5 days  Delivery mode In person	 Spending the most time in the first phase to ensure cities get off to a good start , while still having a view of the long term plan Focus on committing to key actions and avoiding funding barriers by defining budget per cycle and thus exploring ways to get funding before implementation begins Leverage local expertise and experience by inviting ecosystem

IMPORTANT NOTE

This document shows **one possible approach** to how to run this workshop. Providing the goals are achieved and the deliverables produced, **the workshop can be run however the lead expert wishes. This includes workshop duration.** Even if following this approach, please note:

- Some customisation is needed
- Some pages are purely for lead expert benefit, and are not designed to be city-ready

The roadmap and monitoring workshop should be designed to achieve 5 objectives

1



Refine solutions through concrete initiatives

2



Develop an activity-based implementation roadmap with milestones and activity owners for each initiative

3



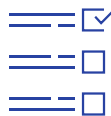
Establish a governance framework for the roadmap implementation

4



Determine specific KPIs to be tracked throughout the implementation phase

5



Ensure that stakeholder action plans are driven by KPI targets

The roadmap workshop consists of 3-4 key interactive activities for participants

Activity	Goal and expected output
1 Ideate initiatives	This activity aims to give cities a chance to ideate and prioritize specific initiatives that will support the implementation of their chosen solutions
2 Defining high-level milestones & detailing roadmap	The goal of this activity is for the cities to develop a high-level roadmap with about 3-5 major milestones for each prioritized initiative
3 Defining governance structure	In this activity, participants should think through how the drafting and implementation of the roadmap should be organized.
4 Setting KPIs	In the final activity, participants are supposed to learn about the different types of KPIs and how to choose sensible KPIs to measure progress and impact of their overall roadmap as well as specific initiatives.

Roadmapping and Monitoring Workshop | Suggested agenda – Day 1



Schedule



Agenda item



Format



Lead



Overview to activities

9.00 - 9.20	Welcome and introduction to the objectives and deliverables of the day	Presentation	Lead expert	Presentation explaining the key agenda items and objectives, highlighting previous achievements and introducing key consideration for a successful roadmap design
9.20 - 9.40	Recap what happened in last workshop and since then	Discussion with full group	All, moderated by the lead expert	Shore up excitement for progress achieved to date in the programme and key items for participants to remember heading into today's activities
9:40-10:30	Ideating concrete initiatives supporting each solution	Discussion in breakout groups	All, moderated by the thematic expert	In groups, participants will generate ideas for specific initiatives that will underpin the implementation of each solution chosen by the city.
10:30-10:45	Coffee break	-	All	-
9:40-11:30	Ideating concrete initiatives supporting each solution	Discussion with full group	All, moderated by the thematic expert	Initiatives should then be prioritized and chosen in a way to create a balanced portfolio.
11:30-12:00	Intro to roadmap planning	Presentation	Expert input	Presentation by the lead experts explaining the most important elements on how to plan a roadmap
12:00-13:00	Lunch break	Networking	All	Informal discussions
13:00-14:30	Setting milestones and sketching a high-level roadmap	Group activity	All, moderated by the lead expert	Group work to create a high-level roadmap based on the most important milestones for each solution and the underlying initiatives.
14:30-15.00	Coffee break	-	All	-
15:00-16.15	Detailing out implementation plans for key initiatives	Group activity	All, moderated by the lead expert	Group work to detail out the roadmap for 1-2 initiatives, incl. milestones, activities and actions, task owners as well as potential dependencies and risks.
16:15-16:30	Day 1 closing remarks and recap	Discussion with full group	All, moderated by the lead expert	Lead expert should wrap Day 1 following peer review activities – They should can also recap learnings from the day,

Roadmapping and Monitoring Workshop | Suggested agenda – Day 2



Schedule



Agenda item



Format



Lead



Overview to activities

9.00 - 9.20	Welcome and recap on the day	Presentation	Lead expert	Presentation explaining the key agenda items and objectives, highlighting previous day's achievements
9:20-10:30	Identifying typical governance problems in multi-stakeholder projects	White board group activity	All, moderated by the lead expert	Lead expert will lead a structured reflection with the group on typical governance problems and issues encountered in previous multi-stakeholder projects implemented
10:30-11:00	Developing a draft governance for roadmap implementation	Discussion with full group	All, moderated by the lead expert	Under the guidance of the lead expert, the group will develop a draft governance framework for the implementation of the roadmap
11:00-11:15	Coffee break			
11:15-13:15	Choosing KPIs to measure progress and impact of roadmap implementation	Short brain teaser presentation followed by discussion with full group	All, moderated by the lead expert	Lead expert will give a short input on the different types of KPIs . The group will then together will the lead expert identify potential KPIs
13:00-13:30	Closing remarks and next steps with Q&A	Presentation Q&A	Lead expert	Presentation highlighting commitments made by ecosystem partners during the two workshop days. Definition of next steps, incl. outlook on upcoming cross-city lab and roadmap and monitoring workshop, followed by a Q&A
13:30-14:30	Lunch break	Networking	All	Informal discussions

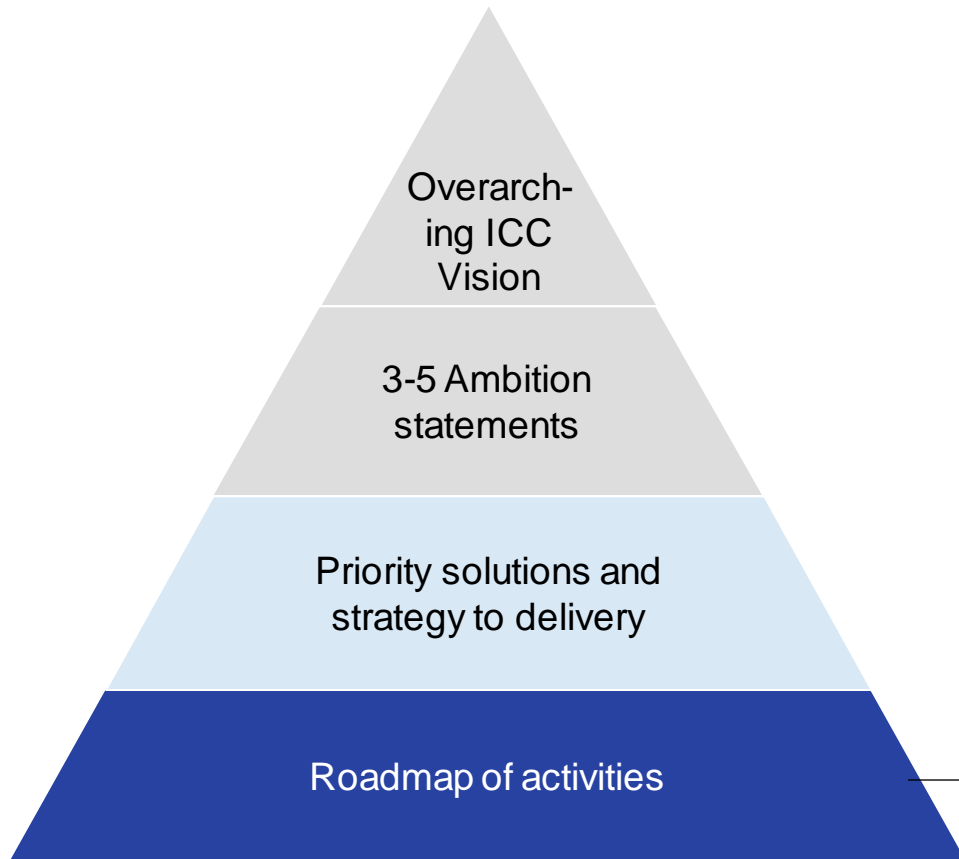
Adjusting this workshop for different cities

As with all ICC events, this workshop deck is not intended to be sufficient itself. It is intended to be adjusted and complimented with material from the Lead and Thematic experts

Activity	Possible adjustments
Ideation of initiatives	<p>The level of detail that different cities already have for their solutions varies widely. More mature cities will likely have the first layer of detail of their roadmap ('initiatives') and can go to the next level immediately</p> <p>Alternatively, other cities may have defined each of their solutions at a higher level of detail, so they also resemble initiatives. Again, review the examples of what is meant by initiatives and choose the best approach based on your knowledge of the city</p>
Developing a roadmap	<p>High maturity cities may already have both "10,000m" and "300m" roadmaps and are very welcome to use these. Lower maturity cities may struggle to produce "300m" roadmaps, but in which case should be encouraged to focus on fewer initiatives for each solution</p>
Defining governance structure	<p>The degree of sophistication that can be achieved in a governance structure will heavily depend on a city's maturity. For low maturity cities this section will need to be significantly simplified. All that needs to be achieved here is a clear understanding of how decision making works for the ICC programme, and who is accountable for outcomes on different parts of the roadmap</p>
Setting KPIs	<p>The KPI activity requires a large amount of tailoring to the city's maturity. On city performance, high maturity city visions may already have KPIs baked in to city visions – they can simply copy these across if so. For low maturity cities this activity will be harder, but cities can focus on a lower number per type (but must have at least one city performance KPI and one solution maturity KPI per solution)</p>
Budgetary changes	<p>Some cities may be facing budgetary restrictions due to Covid-19. Cities are however encouraged to design their roadmap considering the sources of funding such as the combination of the Recovery Plan for Europe, and related National Recovery and Resilience Plan, and of the EU Cohesion Policy, plus programs/instruments managed directly by the European Commission or indirectly, particularly through the European Investment Bank</p>

Recap: this is the workshop that creates a roadmap of how the solutions are delivered, so they in turn can achieve the ICC vision

Discussed in needs workshop Discussed in solution strategy workshop Discussed in this workshop

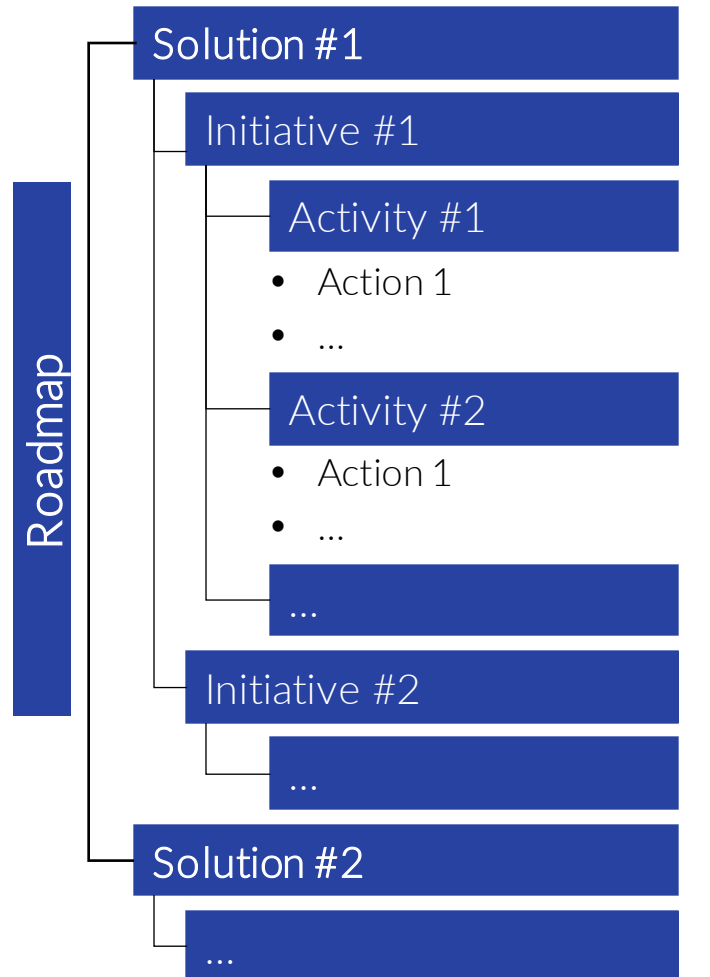


What we'll do, when

- Specific activities each city will do to drive the implementation of the strategy and priority solutions at the most detailed level
- This will be achieved by making a series of initiatives for each solution, activities for each initiative and actions for each initiative

1. Testing whether something is Specific, Measurable, Attainable, Relevant and Time-Based

The roadmap has three layers of detail under each solution



Solution

A solution and corresponding strategy that you designed previously

Initiative

Concrete projects / changes that taken together help implement the solution and achieve the target

Example: “Set up recycling stations for batteries and electronic equipment in public locations”

Activity

Basic building blocks of each initiative

Example: “Carry out workshop to assess current availability of recycling stations and identify gaps as well as blockers”

Action

Specific operational actions, steps necessary to carry out an activity

Example: “Draft concept note for workshop together with municipal garbage department”

Access to finance considerations for cities

This is a reminder of what was presented during the Access to Finance session of the 2nd ICC city lab.

	<i>Pro active actions at city level</i>	<i>Support via ICC</i>
<ul style="list-style-type: none">Some draft National Recovery and Resilience Plans have already been submitted to the European Commission and the complete version of all National Recovery and Resilience Plans will have to be submitted by April 2021. However, in some cases, the NRRPs include big projects at national-level.	<ul style="list-style-type: none">Since national plans encompass local and regional dimension, identify locally the content of the national plan to align/position cities financing needsMight be difficult to align to a national dimension	<ul style="list-style-type: none">Inform on Priorities for investment to your MS known via European semesterEnable access to national plans and national decisions for allocation – follow- up EC's feedbacks to national plans – guidance on the flagships initiativesContact points nationally
<ul style="list-style-type: none">ReactEU resources for the remaining years of the EU Cohesion Policy 2014-2020 period shall be allocated according to the “Partnership principle” and revised Programmes are expected soonPartnership Agreements and Programmes for the EU Cohesion Policy 2021-2027 period are expected in the next months	<ul style="list-style-type: none">Get involved early in this process where cities can really play the local partner role..Issue of co-financing in some MS	<ul style="list-style-type: none">Mature process in place in each Country - Guidance to onboard on the programming exercise

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	<i>Pro active actions at city level</i>	<i>Support via ICC</i>
<ul style="list-style-type: none"> The EU Cohesion Policy fosters integrated territorial development and the share of ERDF resources for sustainable urban development will be the 8% in 2021-2027. 	<ul style="list-style-type: none"> Update your Urban Development Strategy 	<ul style="list-style-type: none"> Leverage on ICC to refine your Urban Development Strategy
<ul style="list-style-type: none"> The combination of the Recovery Plan for Europe, and related National Recovery and Resilience Plan, and of the EU Cohesion Policy, plus programs/instruments managed directly by the European Commission or indirectly, particularly through the European Investment Bank, will mean that multiple initiatives and multiple sources of funding will be available. 	<ul style="list-style-type: none"> Consider to combine different sources according to subject, time-span and partnership of your projects Consider the use of financial instruments using EU funding as guarantee 	<ul style="list-style-type: none"> Workshop on financial instruments via EIB (InvestEU) Size of the projects can be an issue for small cities – consider joint efforts
<ul style="list-style-type: none"> Therefore, strong administrative capacity will be needed to manage and implement all funding within its deadlines. 	<ul style="list-style-type: none"> Consider availability of the EU Cohesion Policy funds to enhance administrative capacity 	<ul style="list-style-type: none"> Guidance on how to access EU Cohesion Policy funds for administrative capacity and on DG REGIO initiatives to this aim

Annex – Useful links

- Multiannual Financial Framework and Next Generation EU: <https://www.consilium.europa.eu/en/infographics/mff2021-2027-ngeu-final/>
- Recovery Plan and Recovery and Resilience Facility: [Recovery plan for Europe | European Commission \(europa.eu\)](#)
- Coronavirus Response Investment Initiative: https://ec.europa.eu/info/live-work-travel-eu/coronavirus-response_en
- EU Cohesion Policy - ERDF: [InfoREGIO - EU Regional Policy - Regional Policy - European Commission \(europa.eu\)](#)
- EU Cohesion Policy - ESF: [Employment, Social Affairs & Inclusion - European Commission \(europa.eu\)](#)
- Eur-Lex: [EU law - EUR-Lex \(europa.eu\)](#)

- European Investment Advisory Hub (EIAH) by the EIB: [Advisory Hub \(eib.org\)](#)
- **URBIS:** [URBIS \(eib.org\)](#) (The advisory platform within the European Investment Advisory Hub set up to provide advisory support to urban authorities)
- **European Investment Project Portal (EIPP):** [European Investment Project Portal \(europa.eu\)](#) (to boost visibility of projects to a network of international investors)
- EU One Stop Shop for Cities: [Cities and urban development | European Commission \(europa.eu\)](#)

Developed for the 2014-2020 period, but will remain in the new 2021-2027 period

- Horizon National Contacts Points: <https://ec.europa.eu/info/funding-tenders/opportunities/portal/screen/support/ncp>
- Enterprise Europe Network: <https://een.ec.europa.eu/>
- Digital Innovation Hubs per country: [Digital Innovation Hubs - Smart Specialisation Platform \(europa.eu\)](#)

The roadmap workshop consists of 3-4 key interactive activities for participants

 Covered next

Activity	Goal and expected output
1 Ideate initiatives	This activity aims to give cities a chance to ideate and prioritize specific initiatives that will support the implementation of their chosen solutions
2 Defining high-level milestones & detailing roadmap	The goal of this activity is for the cities to develop a high-level roadmap with about 3-5 major milestones for each prioritized initiative
3 Defining governance structure	In this activity, participants should think through how the drafting and implementation of the roadmap should be organized.
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Activity summary: Ideating initiatives for your city's solutions

Goal

- Help cities refine and add more specificity to their chosen solutions
- Develop specific initiatives to be implemented as part of the roadmap under each solution

Guidance for facilitator

- The ideation activity is designed to help city leaders sharpen their solutions and develop concrete initiatives that will deliver their solution and target ambition.
- For example, if the overall solution is to provide households with recycling option you might want to use this activity to force the city to think through how exactly this can happen (e.g. provide bins to households, provide collection points at post offices, etc.), how options might differ per waste stream and what partnerships/communicate measures might be necessary
- Depending on the maturity level of your city and the specificity of the solutions, the ideation activity can be optional.
- In designing this activity, you are free to choose any ideation method that you deem appropriate (e.g. Crazy 8, Brainwriting, Double Diamond)
- It will be important that you encourage the group to think outside of the box and think big without considering practical feasibility of each idea yet
- As a brain teaser, it will be good to prepare and provide the group with several case examples of innovative best practice initiatives that other cities have launched. Those best practices do not have to relate directly to the solution of your city, but should show that small innovative approaches and hacks can make a real difference

Output → |

- List of 3-5 specific and actionable initiatives for each solution

You may check the Tech4Good marketplace or post a question in the ICC's messaging board that you can access through the [ICC website's dashboard section](#) (requires login). It can equally be accessed through the ICC workspace (see tab 'Messaging Board').

Productive ideation: Best practices for ideation...

Do



Encourage outside the box thinking (e.g., outside the industry or what's been done in the past) and generate **unconstrained ideas**



Remind team members to **take both a impact enhancing as well as cost-saving perspective when ideating**



Ideate rapidly. Don't forget to contribute as many ideas as possible, regardless of your role



Think about **how ideas brought up in past rotations can be expanded upon in later rotations** or be applied across other items



Keep an open mind and encourage team members to do so as well. We want to maximize perspectives brought into the session (e.g., culinary, ops, business owner, supply)

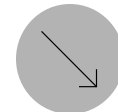


Root ideas in a hypothesis when possible and help your group keep track of hypotheses guiding your ideation

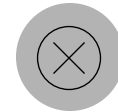
Do not...



Talk over other team members; if you see this occurring, try to get others to speak up more



Shoot down crazy or wild ideas



Talk about why something **can't be done** (e.g., "That's a great idea but it will be challenging because...")

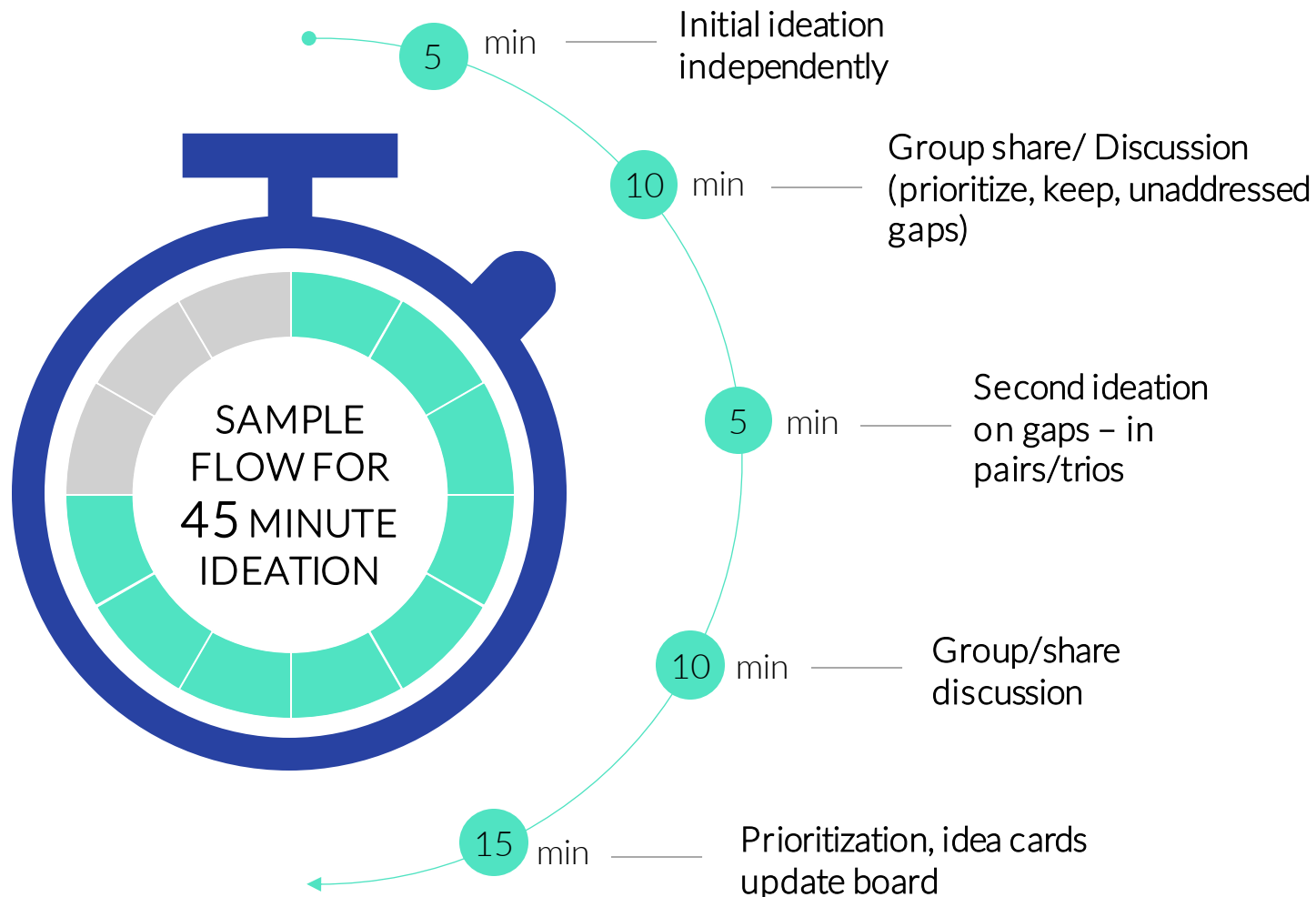


Concern yourself with feasibility (these concerns will be addressed later in the workshop) or **exact size of the cost**



Go too deep into a single idea, once you have a sense of the idea encourage the team to move onto the next

...and sample ideation exercise to allow for unencumbered brainstorming



IDEATION TACTICS...

Place stickers on surprising ideas and insights

Time box to prevent second guessing (e.g., top 20 ideas in 2 minutes)

Provide question cards to prompt discussion

...AND MINDSET FRAMES

In light of what you've seen from the case examples, how would you ...

... think about the experience you want your citizens to have?

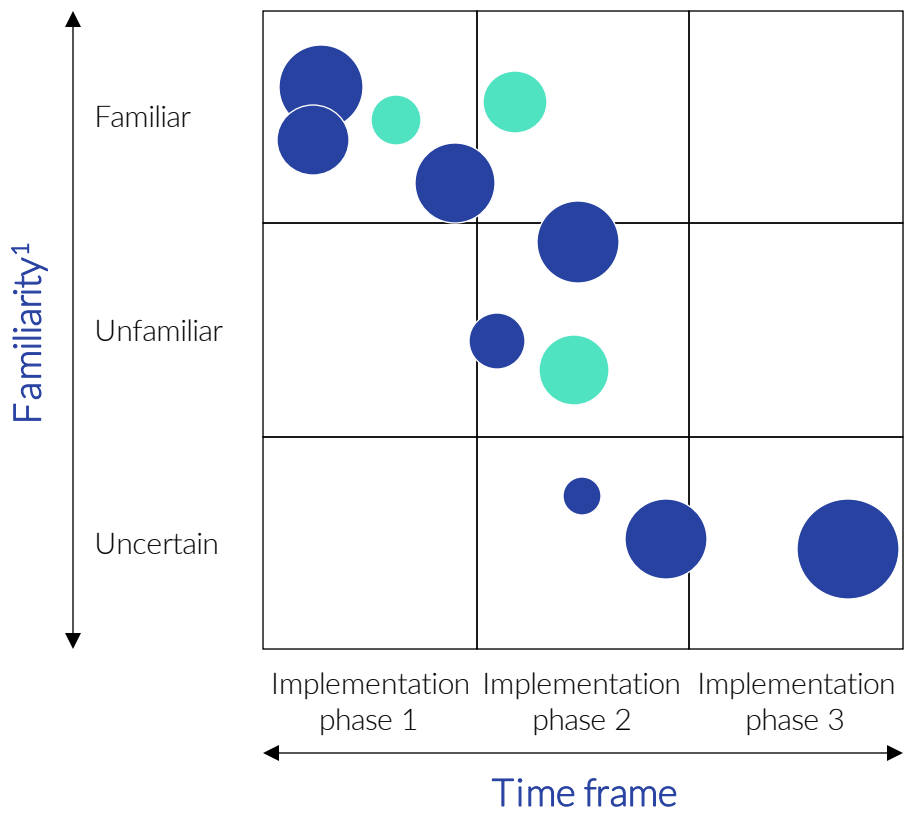
... think about potential partnerships?

... would transfer this approach for your solution?

Your city's roadmap should consist of a balanced portfolio of different initiatives under each solution

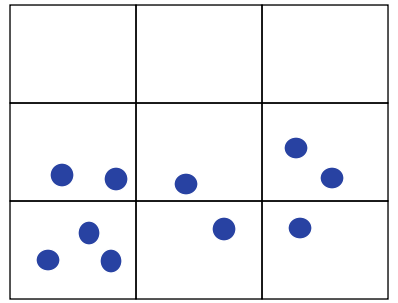
● Circle size = scale of effort ● Solution A ● Solution B

Balanced portfolio of initiatives

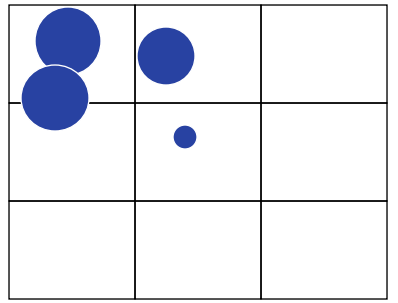


Unbalanced portfolios

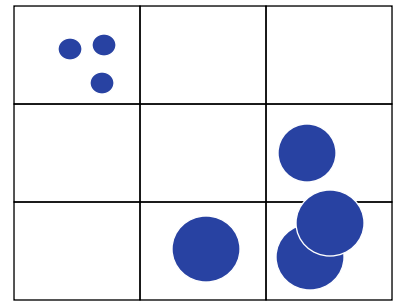
Risky



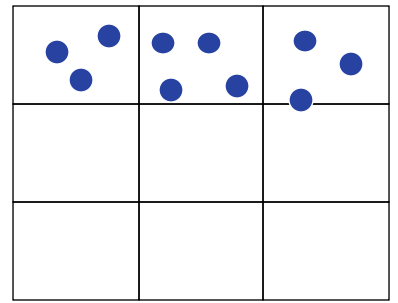
Not enough risks



Big long term bets



Risk averse



1. Familiarity here refers to how much capabilities and experience the organization has to implement a particular initiative
Source: McKinsey's Organization Practice
Intelligent Cities Challenge

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Activity summary: Defining milestones and drafting a roadmap for your initiatives

Goal

- Introduce the city leaders to the essentials of project planning and roadmapping best practices
- Draft a first high-level overall roadmap as well as specific implementation roadmaps for initiatives

Guidance for facilitator

- When designing your activity, make sure that the group will start with defining general overall milestones for the roadmap implementation and then move to more specific milestones for individual initiatives
- Milestones should also be limited in number, spaced throughout the entire implementation phase and represent a significant achievement for the overall program as well as specific initiatives
- Challenge the group to think about dependencies, ownership as well as cross-cutting initiatives/activities that are necessary (such as communication campaigns, planning and review, budget creation etc.)

Output →

- High-level aggregated roadmap across all solutions and initiatives
- Detailed implementation Gantt-Charts for 1-2 key initiatives

Roadmap planning

Starting with where you want the city to go



Recap on your vision statements and the solutions you believe will get you there

Ideating initiatives



Generating and prioritizing initiatives that will be part of your solutions (e.g. Set-up battery collection stations in post offices and super markets)

Defining key activities for each initiative



Define key activities that are necessary to implement each prioritized initiative



You are here

Sequencing and prioritizing

- 1 — Prioritize and sequence your overall roadmap as well as initiative plans according to impact and feasibility
- 2 —
- 3 —

Detailing actions



For each activity, list all necessary steps/actions that need to be carried out

Assigning owners



Assign an overall owner for the initiative as well as owners for each activity

Establishing milestones and identifying dependencies



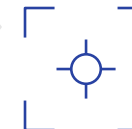
Establish clear overall milestones as well as initiative milestones with fixed dates as targets to work against

Setting up governance structure and starting proactive communication



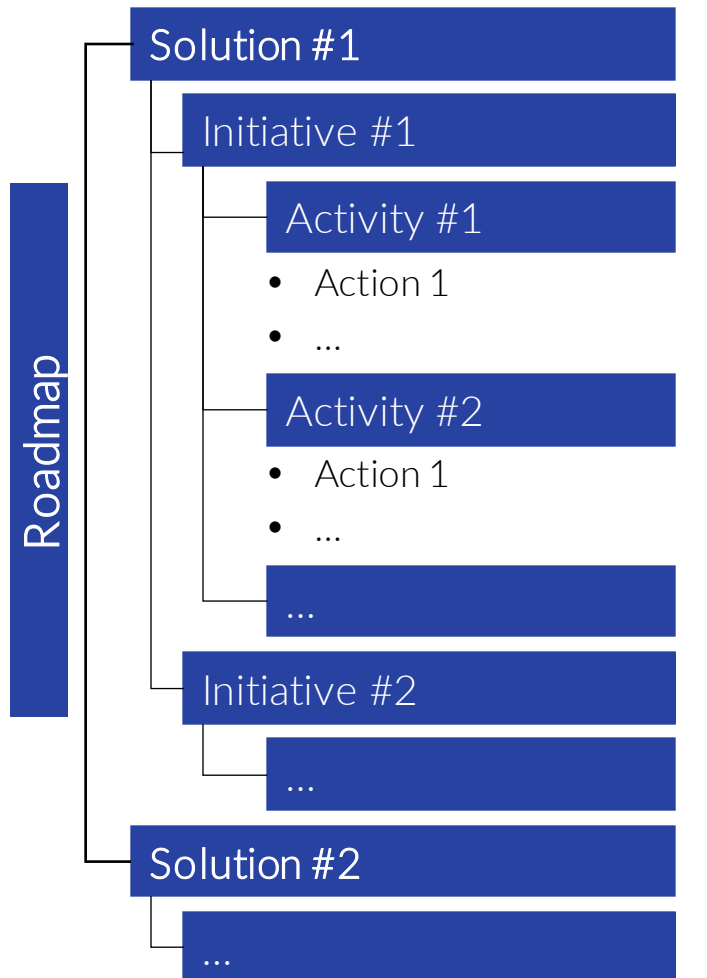
Determine how your overall project and initiatives should be governed and start engaging key stakeholders

Continuous tracking



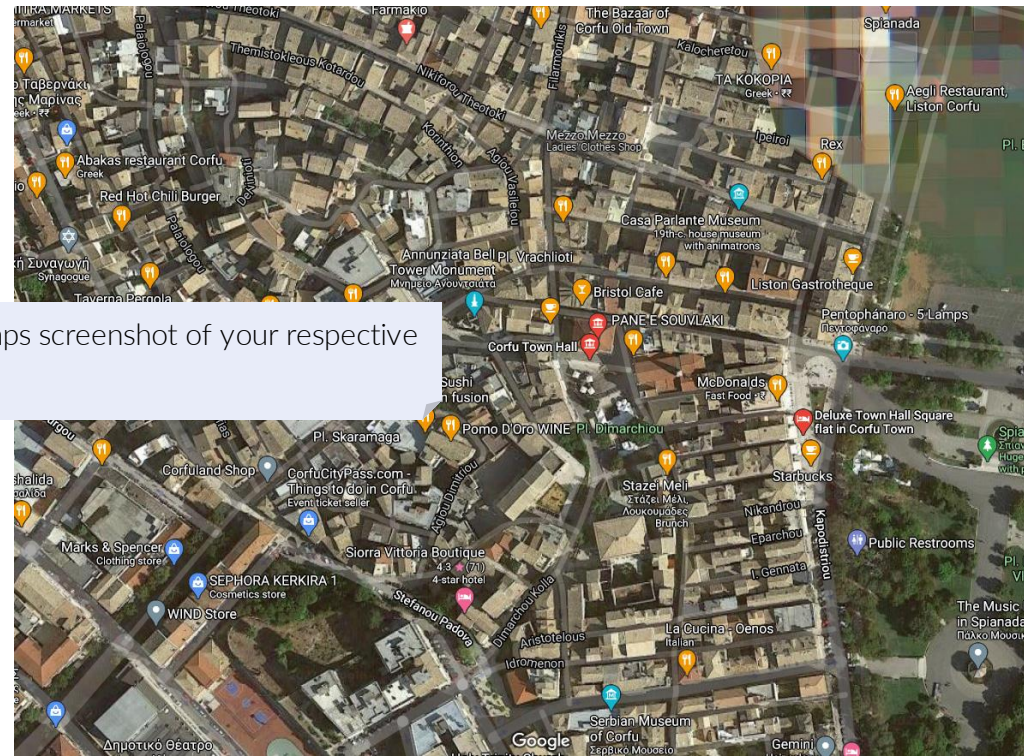
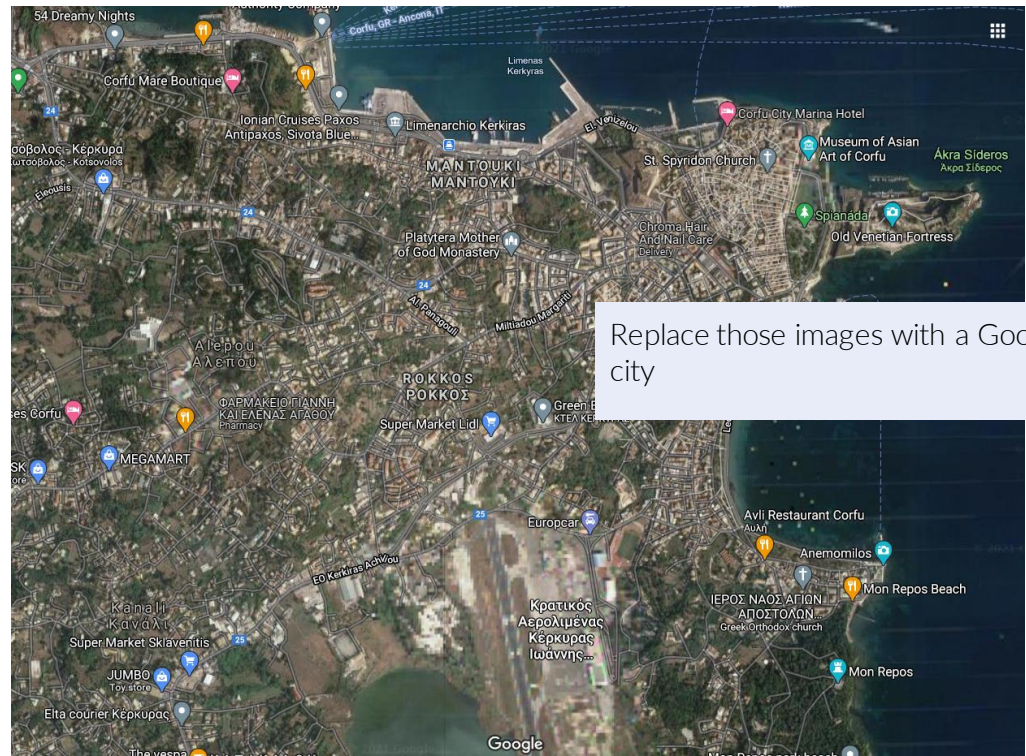
Define a set of lagging and leading KPIs that help you continuously keep track of progress and impact

The roadmap has three layers of detail under each solution



Solution	A solution and corresponding strategy that you designed previously
Initiative	Concrete projects / changes that taken together help implement the solution and achieve the target <u>Example</u> : “Set up recycling stations for batteries and electronic equipment in public locations”
Activity	Basic building blocks of each initiative <u>Example</u> : “Carry out workshop to assess current availability of recycling stations and identify gaps as well as blockers”
Action	Specific operational actions, steps necessary to carry out an activity <u>Example</u> : “Draft concept note for workshop together with municipal garbage department”

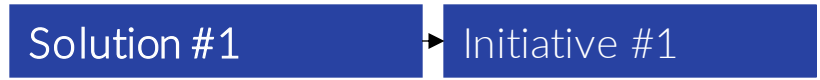
10000m plan gives an overview of your overall roadmap while a 300m plan shows all the details for single initiatives



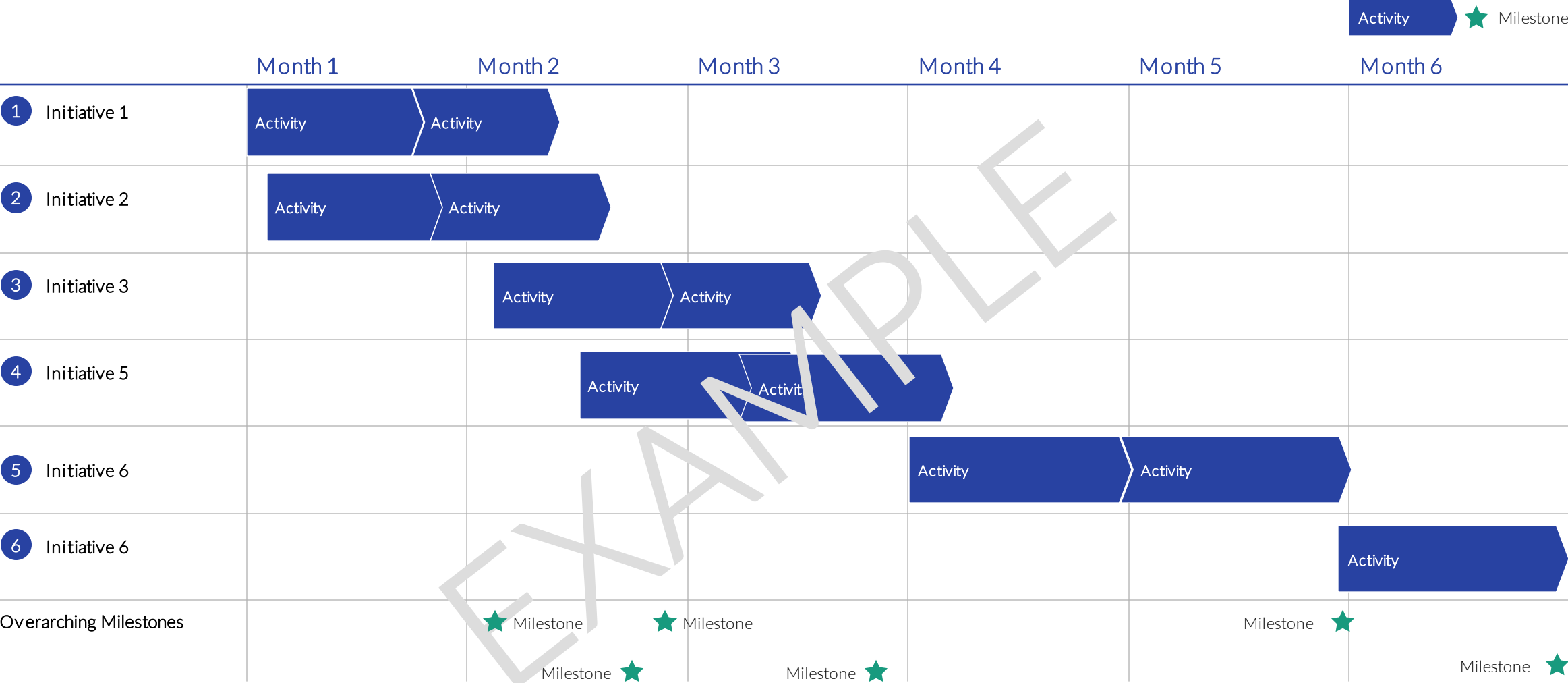
Replace those images with a Google Maps screenshot of your respective city

10000 m plan shows the major milestones and key activities without details

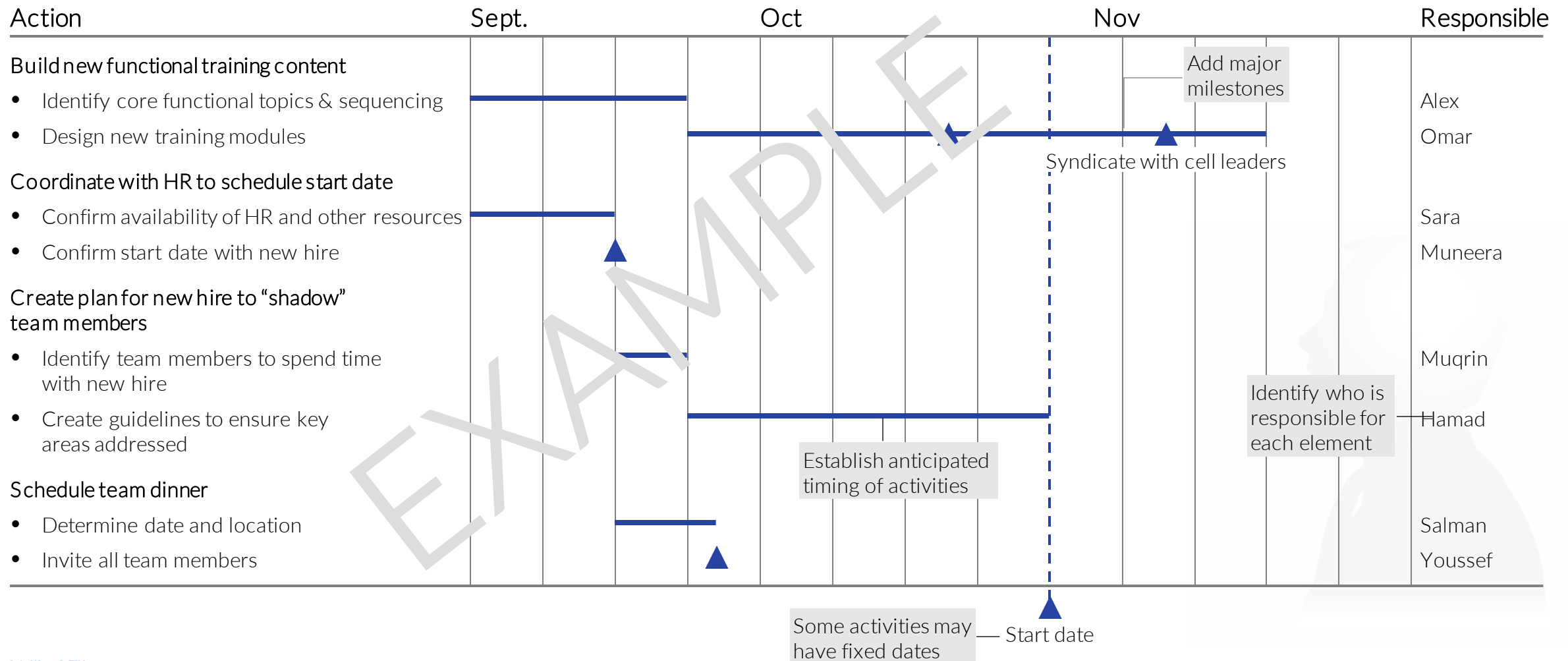
300m plan shows actionable implementation details with specific timeline for implementation



Example: High level implementation roadmap for a given solution (“10000m plan”)



Example: Detailed initiative Gantt chart for onboarding a new colleague in HR unit (100m plan)



Elements to pressure test your roadmap

Key element	Criteria
✓ Realistic deadlines	Developed incorporating: 1) previous, comparable tasks; 2) proposed manning levels and; 3) the critical path
✓ Sufficient bandwidth	Allocation of enough time per week to work on business-as-usual tasks as well as tasks related to the plan
✓ Requisite skill/will	Stakeholders support the change and you (and the team) have access to the skills needed to complete planned tasks
✓ Understand impact	The team understands the impact on impact drivers or the consequences of late/noncompletion
✓ Managed risks	Possible risks have been investigated (including unintended consequences) and mitigated

The roadmap workshop consists of 3-4 key interactive activities for participants

 Covered next

Activity	Goal and expected output
1 Ideate initiatives	This activity aims to give cities a chance to ideate and prioritize specific initiatives that will support the implementation of their chosen solutions
2 Defining high-level milestones & detailing roadmap	The goal of this activity is for the cities to develop a high-level roadmap with about 3-5 major milestones for each prioritized initiative
3 Defining governance structure	In this activity, participants should think through how the drafting and implementation of the roadmap should be organized.
4 Setting KPIs	In the final activity, participants are supposed to learn about the different types of KPIs and how to choose sensible KPIs to measure progress and impact of their overall roadmap as well as specific initiatives.

Activity summary: Determining a governance model for the implementation of your city's roadmap

Goal

- Discuss issues/challenges with regards to the governance that the group has encountered in previous projects
- Discuss who needs to be included in what function

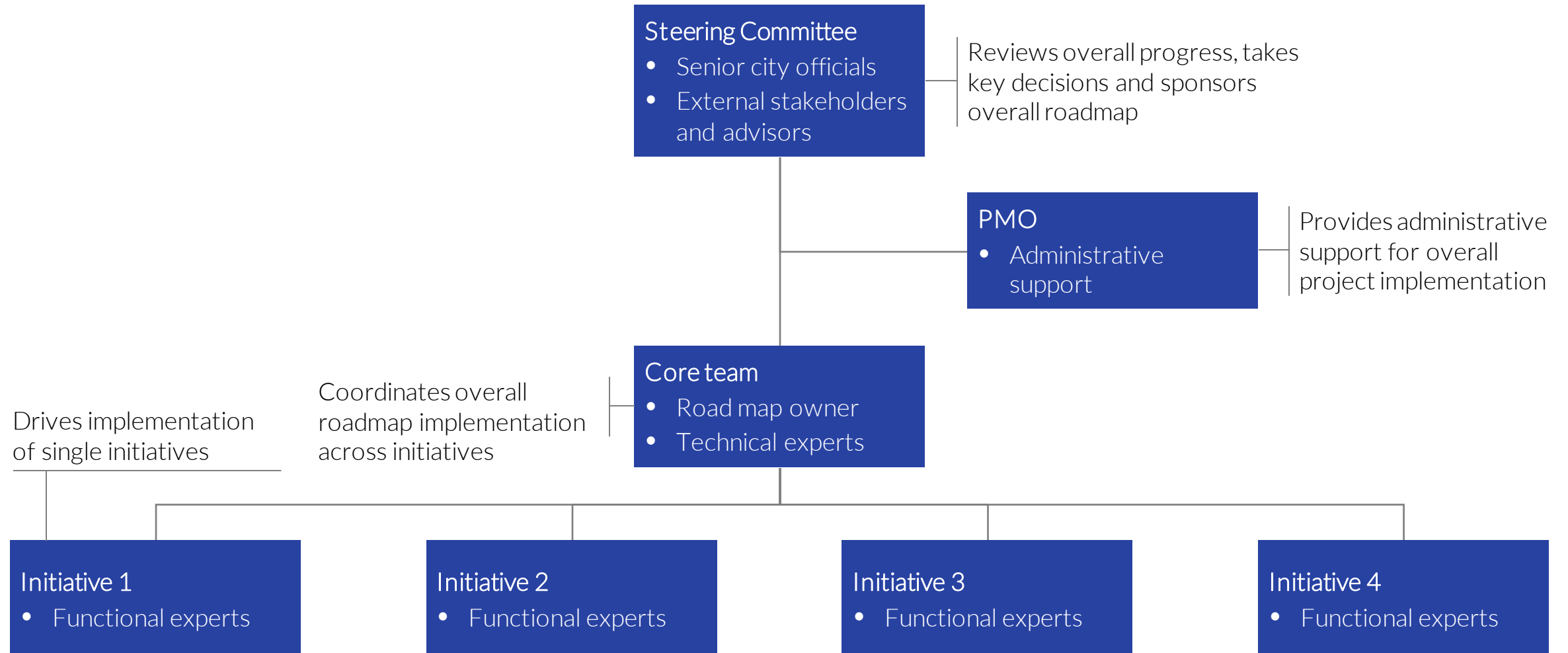
Guidance for facilitator

- Use the insights gained from the reflection exercise and challenge the group to think about how the governance for the implementation of the roadmap should look like
- Challenge the group to keep the number of roles, people and decision/reporting meetings to the necessary minimum
- Keep the best practices in mind laid out on page 31 when discussing any potential governance

Output → |

- Draft governance structure and reporting/decision making formats

For effective implementation of the roadmap, a clear project structure and reporting lines need to be defined



Governance guidelines should clearly lay out the meeting's size, purpose, and approval processes to accelerate efficient decision making

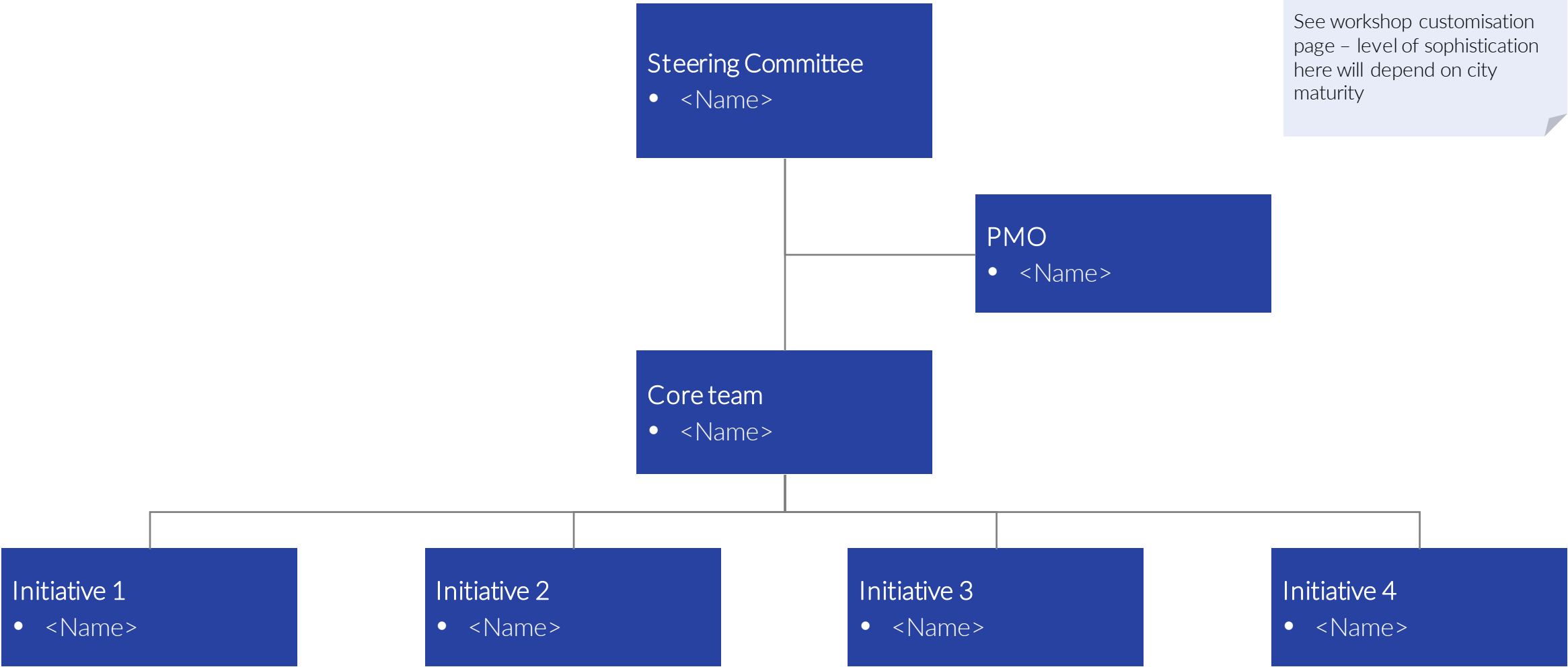
The following principles will help programs/projects succeed

- Simplified and leaner governance structure
- Streamlined approval/sign-off process – reduced number of sign-offs on document
- Empowered decisions-makers at the right level
- Suggested solutions presented to Steering Committee – not only problems
- The “right” conversations in the appropriate forums (Committees)

Governance meeting guidelines

Area	From	To
Size	• 8+ stakeholders covering all areas	• 2-4 core decision-makers
	• Several members from each business area	• A single, empowered decision-maker from key areas (IT&S, business, etc.)
	• All stakeholders attend	• Core group only • Other stakeholders invited on as-needed basis
Purpose	• Inform stakeholders about program/project status	• Make program/project decisions • Non-decision parties informed separately
Approvals	• 20+ signatures on key project documents	• Empowered decision makers sign-offs only

Template: Draft governance structure for roadmap implementation



Template: Draft reporting formats for roadmap implementation



Format

Steering
Committee
Meeting

...

...



Goals and recurring agenda points

• ...

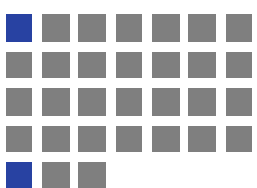
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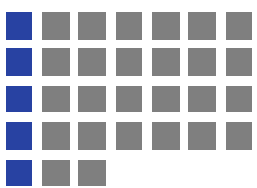


Frequency

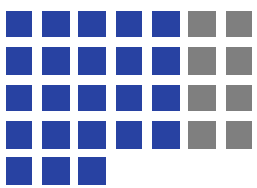
Monthly



Weekly



Daily



Participants

• ...

• ...

• ...

See workshop customisation page – level of sophistication here will depend on city maturity. Not a suggestion that daily reporting formats are needed – cities just need to be clear on how they will be keeping track. ICC tracking (each implementation cycle) will be separate to this

The roadmap workshop consists of 3-4 key interactive activities for participants

 Covered next

Activity	Goal and expected output
1 Ideate initiatives	This activity aims to give cities a chance to ideate and prioritize specific initiatives that will support the implementation of their chosen solutions
2 Defining high-level milestones & detailing roadmap	The goal of this activity is for the cities to develop a high-level roadmap with about 3-5 major milestones for each prioritized initiative
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4 Setting KPIs	In the final activity, participants are supposed to learn about the different types of KPIs and how to choose sensible KPIs to measure progress and impact of their overall roadmap as well as specific initiatives.

Activity summary: Choosing KPIs to keep track of the progress and impact of the implementation of your city's roadmap

Goal

- Introduce city leaders to the importance of tracking progress and impact through KPIs
- Explain the different kinds of KPIs as well as best practices
- Define KPIs for the city's initiatives

Guidance for facilitator

- Make sure to give the group a reminder of the different types of KPIs
- Encourage the group to discuss the pros and cons of different KPIs that could be used to track progress and impact

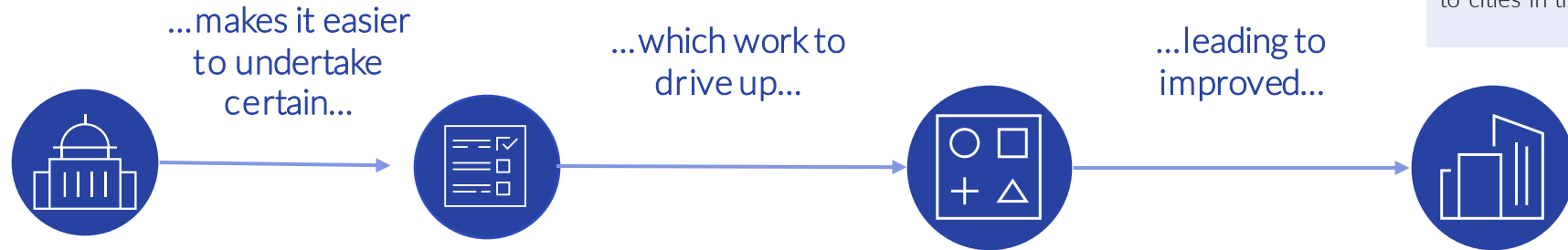
Output → |

- Select the three types of KPIs (and where necessary, set targets)

Lead experts – the slides in this section are largely for your benefit, and are not intended to be presented (although you are free to do so if you wish)

There are four types of measurable concepts that come together to drive success in the ICC

For the benefit of lead experts
– this is already communicated
to cities in the flipbook






Idea	Local enablers – city characteristics	Activities – inputs and actions	Solution maturity – outputs	City performance – outcomes and impacts
Description	Each city has unique strengths and weaknesses that help action happen . These can be stakeholder networks, local capabilities, cultural factors or many more that drive success in ICC projects.	Cities main intervention on the ICC is to take actions . These can be direct (e.g., procuring technology), or indirect , (e.g., forming a working group on a topic). The right actions can lead to the right inputs going in to the ICC (e.g., funding, time)	Cities can drive technological solutions to try and improve city performance. How well these solutions are currently used can be described as their ‘maturity’ , - considering whether they are available for stakeholder use, what stakeholders think of them, and so on	Success of an intelligent city is ultimately measured by its ability to address city needs . These can be considered an improved quality of citizen life and a better environment for stakeholders
Example	A history of strong collaboration between city and a local university...	...allows the creation of a new e-health pilot project using social housing in the city...	...leads to the launch a new tele-health solution utilising 4G data connections...	...resulting in pre-emptive diagnosis and lower wait times at medical facilities

In this workshop three types of KPIs will be considered




 Discussed today

 Not used today

	Idea	What does it examine?	When is it first explored?	What is it 'attached' to	How often is it updated?
 Helps deliver  Helps deliver  Helps deliver 	City performance	How well a city is performing on outcomes and impacts (e.g., quality of life)	Discussed at Needs assessment workshop	City programme as a whole	At the end of Implementation cycle 2 and for Programme Review workshop
	Solution maturity	How well a city is using new technological solutions	Discussed at Solution assessment and strategy workshop	Each solution	At the end of Implementation cycle 2 and for Programme Review workshop
	Activities	How well a city is taking action and encouraging others to take action	Discussed at Roadmap workshop	Each activity	Once per month
	Local enablers	Unique features of a city that help it take action	Discussed at ecosystem workshop	City programme as a whole	Not during programme

1. Note, different to the DCC self-assessment tool

Some of these ideas you will have touched on in earlier workshops – these can guide you as you set KPIs, but do not be limited by them

	<u>Idea</u>	<u>What have you already done before?</u>	<u>What do you need to do in this workshop?</u>
 Helps deliver  Helps deliver 	City performance	Explored city performance issues in the City Needs workshop, to work out your city's biggest issues and which solutions to prioritize	Define 2-5 city performance KPIs (at the city level) that you track every implementation cycle and set target values you want to reach by end of the ICC
	Solution maturity	Explored how well the city is currently using various solutions when considering how to design strategy for scaling them	Define 2-5 city performance KPIs (for each solution) that you track every implementation cycle, with targets you want to reach by each implementation cycle
	Activities	Not examined yet in the ICC journey	City ecosystem KPIs (e.g., are we driving investment in to our solutions?) and Overall activity KPIs (e.g., how quickly are activities getting done?). Setting targets for these is optional

Do I need to look at the same issues as before?

It likely makes sense to **start with the city performance and solution maturity issues you looked at during assessment phase**, and see if these make most sense for setting a KPI against. However, if your understanding of your city's needs and the best solutions has moved on, **do not be limited by this**

These materials are split in to two sections



 Featured next



1 General guidance on setting KPIs



2 Setting each type of KPI

City assessment and progress tracking are important to target actions at real needs and to demonstrate results

Thorough assessment and progress tracking helps cities both during the ICC and beyond

- 1 Understand city's strengths and leverage them to achieve the city's objectives
- 2 Target the most effective solutions to the biggest problems; know what interventions will be best
- 3 Realize which initiatives are effective and discontinue those that are ineffective
- 4 Improve chances to receive project funding by clearly communicating demonstrated and expected benefits
- 5 Celebrate successes in a way that can easily be understood by citizens and stakeholders
- 6 Cities build capabilities and processes for steering urban development long term

The KPI and tracking process has been designed to use easy-to-collect, action-orientated indicators that have been chosen to fit a given city's situation

 Priority

Overall design approach - “city first” mentality

In most instances, cities work with their experts to choose the best fitting KPIs for their city in terms of availability of data and fit to the specific needs and the solution maturity of most interest. This will give a better KPI experience than forcing the use of a pre-defined framework

Design criteria for individual indicators

Meaningful	Represents a key dimension of intelligent cities
Actionable	Provides insight that helps steer corrective action
Available	Is accessible to city representatives or local stakeholders without substantial cost or effort
Comparable	Allows benchmarking with other (similar) cities ¹
Trackable	Captures improvements within a short timeframes (3 months to 2 years)
Valid	Is objective, easy to interpret and cities have some meaningful way to influence

1. including cities beyond the ICC by ensuring compatibility with other EU indicator sets

KPIs will be a useful long term tool for cities to work out if they are on track and what can be done if not

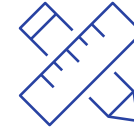
1 Set target (KPIs)



Disturbances



2 Measure output



Input



Execution



Output

4 Follow up and check if corrective actions have actually solved the problem

3 If there are deviations between actual and target value, take corrective action (problem solving)

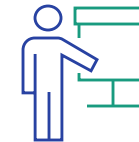
These materials are split in to two sections



 Featured next

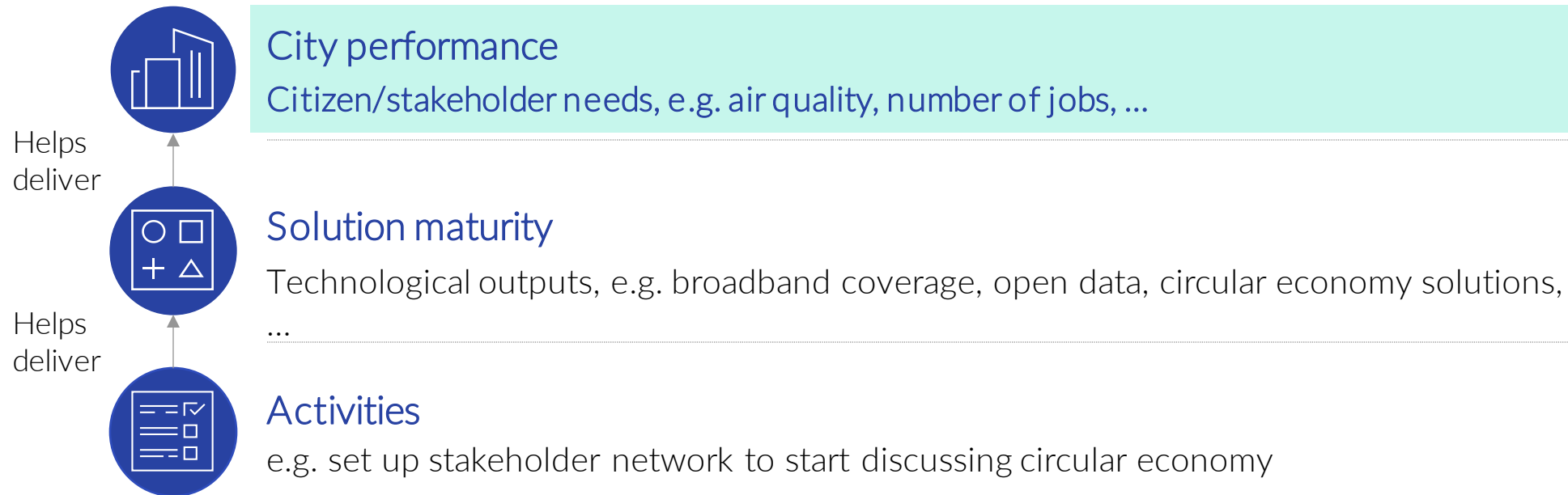


1 General guidance on setting KPIs



2 Setting each type of KPI

We will set three types of KPIs in the roadmap workshop



Why measure city performance?



City performance

The eventual goal of cities is to **enable people to advance socially and economically**. To do so, they have to be functioning hubs for ideas, commerce, culture, science, productivity, social development and much more.¹ Any efforts should be targeted at improving this performance. City performance indicators help to identify such dimensions with potential for improvement.

Questions City Performance helps answer...

...in the City Needs Workshop...

- Where is my **city currently performing well** in this theme?
- Where could my city's **performance be improved**?
- What does this imply for the **solutions I should prioritise**?

...in Roadmap workshop and tracking thereafter...

- How well is the city **delivering on citizen needs**?
- How does the city **compare to other cities**?
- Has there been a **tangible progress** towards better city performance?



1. Compare United Nations Sustainable Development Goal #11: Make cities inclusive, safe, resilient and sustainable (<https://www.un.org/sustainabledevelopment/cities/>)

City performance or 'need' indicators were introduced to measure aspects that are directly relevant to citizens and stakeholders

Cities select 3-5 outcome and impact KPIs to suit their theme in **collaboration with thematic experts** for each theme. In addition, it is compulsory to include two cross-cutting KPIs of your choice.

Indicators are chosen based on **relevance, availability and trackability**

An illustrative list of indicators is given on the following pages and these will be familiar from the **city needs assessment**

Where possible, cities are encouraged to **consider the link between city performance KPIs and the SDGs.**

City performance indicators – illustrative examples by theme (1/2)

Skills

Strategic planning and implementation

- Degree of involvement of skills community (share of relevant stakeholders engaged)

Talent pool

- Participation of STEM HEIs of the region in your city skills programmes
- # STEM graduates in your city/region
- Share of STEM graduates employed in the local economy
- People with advanced digital skills measured per capita
- Share of tertiary educated people

Talent attraction

- Persons Employed with 'skills of tomorrow' (also known as 21st century skills/future skills/skills for jobs in the digital and green transitions)
- Settlement of (new) large companies in the city (# by sector)
- Business satisfaction on the availability of skills (21st century skills)

Reskilling/upskilling

- Share of workforce following vocational training courses to develop new/upgrade skills (e.g. skills of tomorrow)
- Share of workforce receiving in house training from companies
- Basic digital skills of population measured per capita

Innovators

- Presence of innovation labs/ accelerators/ fablabs/ citylabs
- # of companies/individuals engaged in innovation labs/ accelerators/ fablabs/ citylabs
- # tech start-ups

Employment

- Share of employment in sectors prone to automation
- Share of employment in high tech sectors

Government services and social connectedness

Increase trust and improved citizen experience with public services

- Citizen satisfaction/NPS overall
- CSAT/NPS by agency
- CSAT by customer journey
- Complaints received
- Time taken to do common public interaction (e.g., pay fine, apply for building permit) against current baseline
- Positive/Negative mentions on social media

Win war for talent and increase productivity

- Employee satisfaction
- Share of government services available online
- Acceptance/use of digital offerings
- Lag time in responding / actioning citizen reports (e.g., litter)

Increase citizen engagement

- Total number of people participating in participation offerings
- Consistency of representation across demographic (e.g., age, ethnic groups, socioeconomic classes)
- Presence of participatory mechanisms by policy area (e.g., participatory budgeting; incident reporting; digital planning consultations)
- Proxies for citizen engagement, e.g., municipal website views, voter turnout

Green economy and local green deals

Decarbonisation

- CO2 per capita
- CO2 per GDP in sector
- Energy use per capita
- Quantity of CO2 absorbed in negative emissions (e.g., nature based solutions)
- Average energy efficiency rating of building stock
- % renewable power use
- % of EV penetration
- % unrecycled waste
- Air quality metrics (PM, Air Quality Index, etc.)

Build green economy

- # of jobs in "Green" sectors
- # of jobs in high CO2 emitting sectors, e.g., traditional iron and steel, cement, oil and gas refining
- # of jobs in very high CO2 emitting sectors, e.g., coal power

Climate resilience

- Amount of money earmarked for adaptation
- Proxies for risk assessment, e.g., % of city GDP undergone flood risk assessment
- Proxies for resilience preparation, e.g., % of GDP at risk from major flood events; % of at risk groups prepared for major heat wave

City performance indicators – illustrative examples by theme (2/2)

Tourism

Strategic planning and implementation

- Degree of stakeholder participation in the process of developing and implementing the plan (e.g. numbers involved in advisory panels, working groups etc.)

Tourism enterprise(s) performance and competitiveness

- Relative contribution of tourism to the destination's economy (% GDP)
- Daily spending per overnight tourist
- Daily spending per same-day visitor
- Average length of stay of tourists (nights)
- Occupancy rate in commercial accommodation per month and average for the year
- Cost/price ratios (including gross margin) of tourism businesses (accommodation, attractions, tours, packages, etc.) compared to industry norms or ratios for similar products at other destinations

Sustainability of tourism

- Number (percentage) of tourism enterprises and establishments in the destination (e.g. hotels, tour operators, sub-destinations) using a voluntary sustainability, environmental or corporate social responsibility certification/label
- Energy consumption per tourist night compared to general population energy consumption per resident night
- Percentage of total waste recycled per tourist compared to total waste recycled per resident per year
- Percentage of tourism enterprises in contact with the Destination Marketing Organization (DMO) that are involved in climate action and climate adaptation measures
- Accessibility of to the destination: airport, port, train...
- Consumption of fossil fuels for tourist transportation within the destination (categorized by transport type)

1. Decarbonisation of transport is primarily addressed in the Green Economy theme but cities are free to add sustainability KPIs to this theme

Supply chains, logistics and the economics of mobility

Availability

- Passenger KM per year total
- % public transport use
- % population within x mins walk of public transport access
- Public transport frequencies
- Public transport total capacity

Affordability

- Cost per km of average journey
- Cost per km of public transport journey
- Share of household income spent on transport
- Sales of public transport season tickets/subscription packages

Accessibility

- Walkability scores
- Share of micro-mobility trips that would otherwise be a car trip
- % of multi-modal trips
- % of public transport modes with real time data availability
- Overcrowding scores in public transport / public transport utilisation
- Punctuality scores for public transport
- Transport satisfaction scores
- Share of public transport facilities with step-free access

Safety

- Road deaths/injuries

Efficiency

- Average duration of journey
- Average road speeds
- Average response times of emergency services
- % of shared transport modes

Sustainability¹

- % of EV in private transport
- % of EV in public transport

Cross-cutting

Active population, in thousands of people

Average annual population growth past 5 five years

Average annual GDP growth past 5 five years

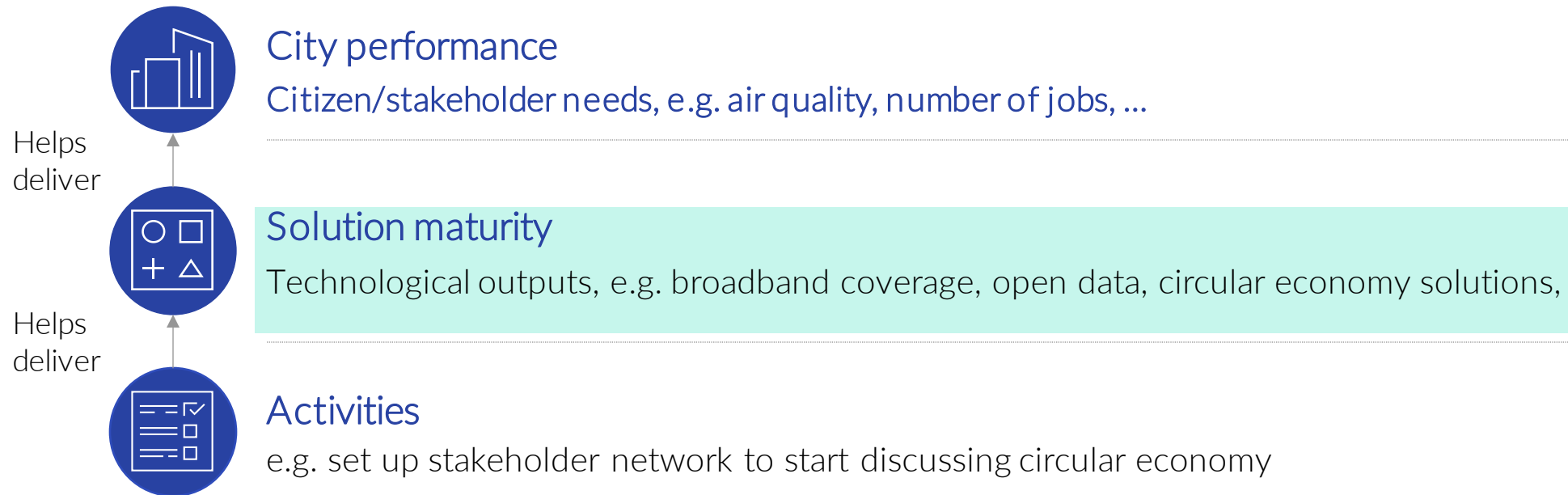
New jobs created

Number of new businesses registered in the past 12 months

Employment rate (number of person aged 20 to 64 in employment divided by the total population of the same age group)

Youth employment rate (number of person aged 20 to 29 in employment divided by the total population of the same age group)

We will set three types of KPIs in the roadmap workshop



Why measure Solution maturity?



Solution maturity

In times of limited space and tight investment budgets, new technological solutions can be a **powerful tools for making a city great**. The interplay of infrastructure, solutions and users satisfaction is called Solution maturity. Indicators assess performance in all 3 dimensions.

Questions Solution maturity helps answer...

...assessment

- Where is my **city currently performing well** in this theme?
- Where could my city's **performance be improved**?
- What does this imply for the **solutions I should prioritise**?

...and in tracking

- How well is the city **delivering on citizen needs**?
- How does the city **compare to other cities**?
- Has there been a **tangible progress** towards better city performance?



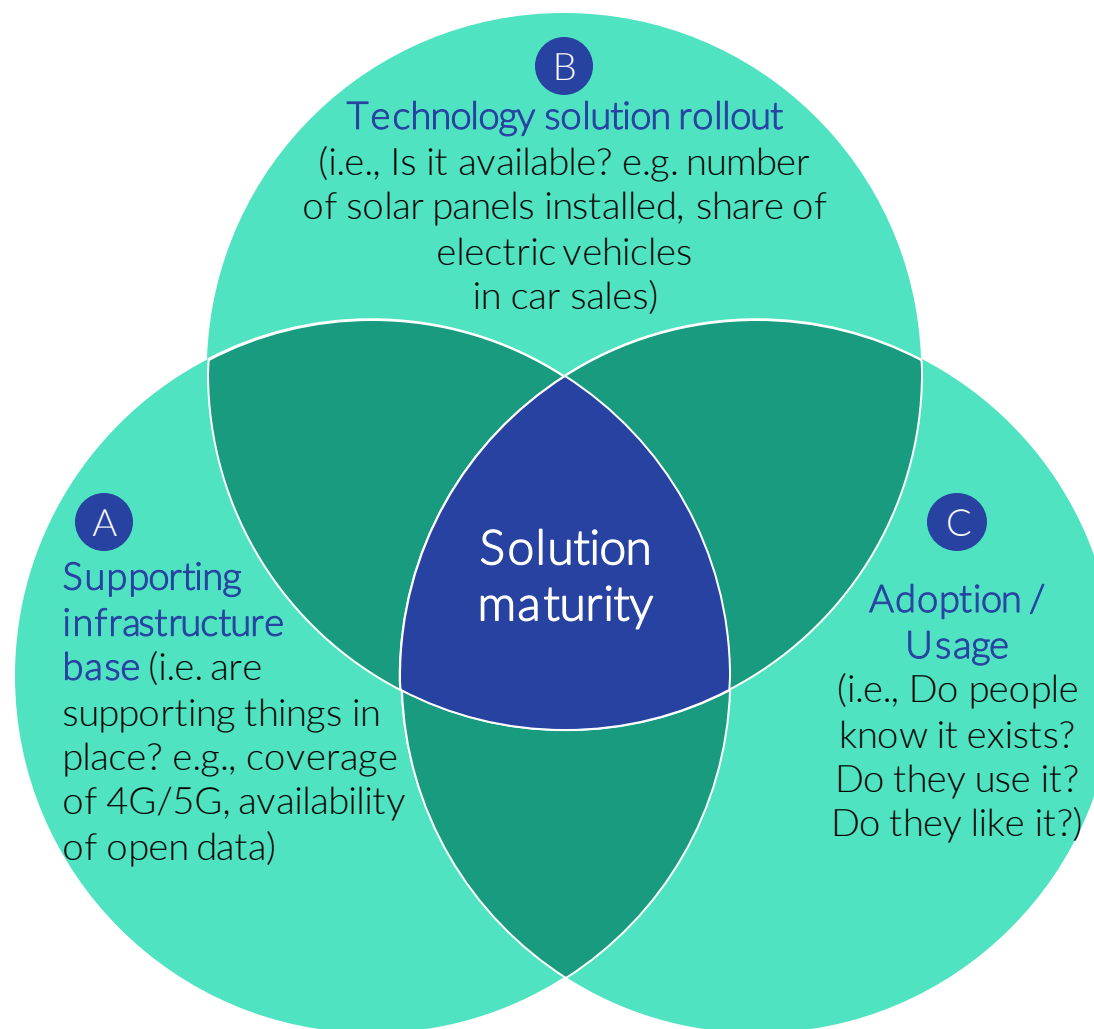
Maturity can be thought of as the intersection of three drivers

Selection of maturity indicators

Indicators will have already been discussed **in cooperation with thematic experts** as part of the Solution Strategy Workshop. The indicators used to assess solution maturity can be re-used, or new indicators can be identified


Either way, it is now up to the thematic and lead experts, plus the city leadership, to set specific targets against these

Maturity indicators can be thought of as coming in three different types, featured right. We recommend 2-5 indicators per solution, ideally mixed across the three categories



Maturity focuses on asking if underlying infrastructure is in place, solutions are available, and stakeholders genuinely use and like them

Maturity KPIs

	Approach	Example use of indicators
 C Adoption / Usage (i.e., Do people know it exists? Do they use it? Do they like it?)	Where relevant for citizen-facing solutions Collected via a citizen survey or by engaging local ecosystem stakeholders	Asking 3Qs for each priority solution : <ul style="list-style-type: none">• Do you know this solution?• How often do you use this solution?• How satisfied are you with this solution?
B Technology solution rollout (i.e., Is it available? e.g. number of solar panels installed, share of electric vehicles in car sales)	For a given set of priority solutions Obtained from available city data sources	Output indicators to be defined by cities with expert support for each priority solution . Priority solutions are decided in collaborations with experts – illustrative lists are provided
A Supporting infrastructure base (i.e. are supporting things in place? e.g., coverage of 4G/5G, availability of open data)	For a predefined set of infrastructures Obtained from available city data sources or dedicated data request	Output indicators to be defined by cities with expert support

Cities should choose maturity indicators that work for them; below follows some illustrative examples but this is not exhaustive

Ⓐ Example indicators for infrastructure / technology base

- Penetration of smart water and energy meters
- Density of water and air quality sensors
- Smartphone and PC penetration
- Availability and extent of LPWAN infrastructure
- % of households covered by broadband
- % of city covered with 4G/5G
- Extent of data publicly available
- Availability of IoT infrastructure (LTE-M network /NB-IoT network) (Yes/No)
- Number of free hotspots per capita
- Electrical grid infrastructure

Infrastructure / technology base indicators may not be relevant to all city situations, but it is important to reflect if there are any underlying physical enablers that need to be furthered that may not necessarily be solutions themselves

Ⓑ Example solution rollout indicators

- Share of government services available online
- Availability of public transport passenger information systems
- Frequency of resident surveys
- Number of companies involved in a circular economy network
- Number of smart parking sensors per 1000 spaces
- Number of on-demand bikes per 1,000 people
- EV charging stations per capita/vehicles
- Number of IoT devices deployed: wearables, computer vision cameras, sensors temperature, humidity for comfort in hotel rooms, control of people/crowds, etc
- Visits to monuments with AR/VR solutions
- Number of digital services for tourism available through smart devices
- GB of tourist data collected

C: Where relevant, cities should try to measure the adoption of solutions

Ways to explore the adoption of solutions

©

Approach

Direct method

Conduct survey using direct citizen engagement, using citizen engagement guidance material²

Indirect method

Request data from relevant city departments or intelligent city solution providers (potentially ecosystem stakeholders)¹

Indicators

For the 3-5 most relevant intelligent city solutions identified in step 2, ask citizens:

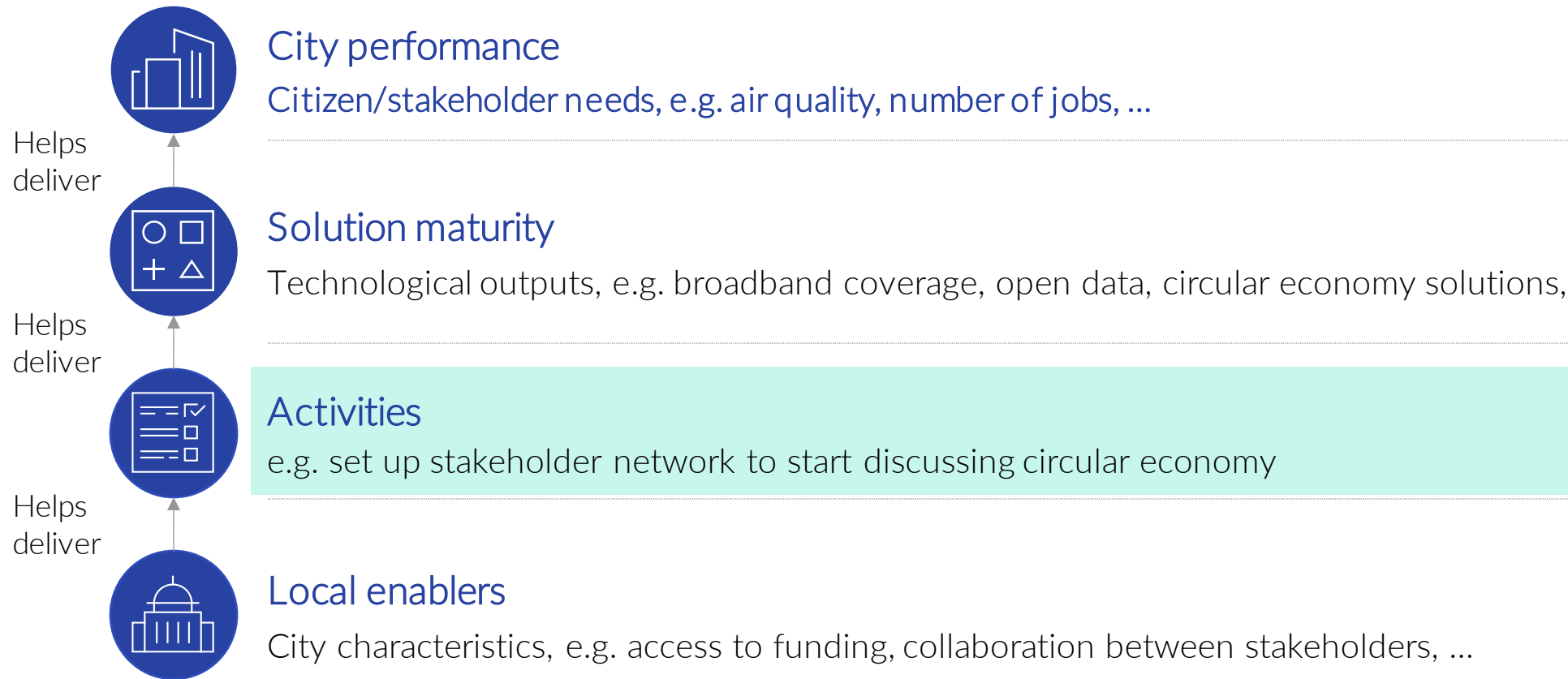
- Do you know this solution?
- How often do you use this solution?
- How satisfied are you with this solution?
- Combine with socio-demographic information if possible

For each intelligent city solution identified in step “b”, ask:

- How many citizens (or stakeholders) have registered for / installed the solution?
- How many citizens (or stakeholders) use the solution per day?
- If available: Is there any general feedback on the solution?

1. e.g. a bike-sharing operator
2. see separate instructions and documentation

There are four concepts within the ICC's assessment and tracking



Why consider Activities?



Activities

The day to day actions of cities on the ICC is what ultimately drives progress. Keeping track of how different planned activities are moving helps pre-empt slow-downs. Looking at the underlying drivers of activity helps cities work out if they are using all potential resources effectively.

Questions Solution maturity helps answer in tracking

- Am I on **course with my plan**?
- Are any delays likely to have knock-on effects to later actions? Are there any **pre-emptive actions** I can take?
- Am I driving effort too much myself, and not **leveraging the resources of others in my ecosystem**?

What this can do

- ✓ Helps cities keep track of their progress across the roadmap
- ✓ Helps cities understand what is driving activity in their city

What this can do

- ✗ Be a substitute for regular meetings of the ecosystem to discuss and explore progress



Activity KPIs are tracked both for each individual activity, but also an ecosystem level

Activity is tracked at an ecosystem level...

Ecosystem-level tracking is designed to give cities a holistic **overview to activity. Three indicators are mandatory**, and help not only the city, but also the programme understand its structural effectiveness:

- Funding committed by city authority
- Funding committed by other city ecosystem players
- Funding committed on initiative in partnership with other ICC city

We then recommend cities work with lead experts to decide **1-2 other indicators of activity tailored to the city**

...and also tracked against the roadmap

Activity will also be tracked by monitoring progress against the roadmap of each city, created in the Roadmap workshop. We then recommend cities work with lead experts to decide **1-2 indicators of roadmap progression that suit the city**. For example:

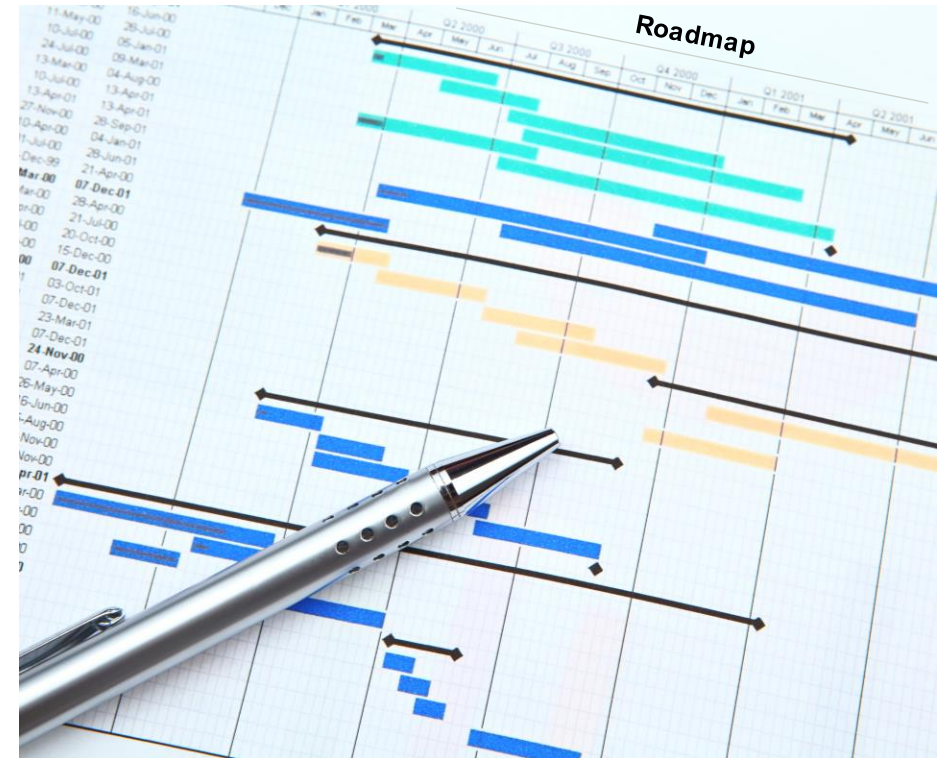
- % of activities completed on time
- Number of months ahead or behind specific deadlines

We recommend city representatives monitor these in Ecosystem calls of their own initiation. This will also be a **key focus of the Lead expert check-ins** throughout the implementation phase












City deliverable outline: Key elements of the Roadmap

■ Detailed next

- ✓ Roadmap summary (explaining on one page the key features of the city roadmap)
- ✓ High-level „10000m“ roadmap timeline with major milestones
- ✓ Initiative charter per initiative
- ✓ Detailed „300m“ initiative Gantt-Chart for each activity that falls in the **first implementation phase**
- ✓ All of three types of KPIs selected and with targets (where needed)
- ✓ Governance structure



Example – initiative charter template

Initiative name: 	What is the name of this initiative? (concise and different enough from other initiatives)	Ultimate goal and scope of this initiative 	What is the purpose of this initiative? What is the underlying issue this initiative is solving? How do we define ultimate success for this initiative? What is included in the scope of this initiative (countries, entities)	Impact and timing 	When will the initiative begin to create impact?
Initiative lead: 	Which entity and individual are accountable for delivering this initiative? (ideally one name)			Risks 	What are the key risks? What challenges are likely to arise?
Initiative working team: 	Who are working team members tasked with delivering this initiative? (highlighting main contact)	Major milestones 	What are the top 3-5 milestones necessary to achieve success? When must they be completed and who is responsible for them?	Support needed 	What funding is necessary to ensure that the workstream is successful? What other resources / investments are necessary? Who does the team need support and input from?
Contributors: 	Who else might contribute to this initiative? (in case of other entities, mention key contacts)	Dependencies 	Where are there major interdependencies with other initiatives (or other reforms)?		
		Key stakeholders 	Who are the stakeholders that the team needs to communicate with? How often does the team communicate with each stakeholder group? Which stakeholders influence / make decisions affecting the initiative?		

Cycle and review planning sessions

Guidance document

September 2021

IMPORTANT NOTE

Remember – light blue stickers throughout this document are for the facilitator's benefit, and not to be presented

This document shows **one possible approach** to how to run this cycle and review planning session. Providing the goals are achieved and the deliverables produced, **this session can be run however the lead expert wishes**, including its **duration**. Even if following this approach, please note:

- Some customisation is needed
- Some pages are purely for lead expert benefit, and are not designed to be city-ready

Welcome to the cycle and review planning session

City representatives



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role

Lead Expert



First name
Last name
Role

Thematic Experts



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role

City ecosystem



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role



First name
Last name
Role

Our agenda today

Schedule is indicative



Schedule



Agenda item



Format



Lead



Overview to activities

9.00 - 9.10	1. Welcome and introduction to the objectives of the day	Speech	Lead expert	Presentation explaining the key agenda items and objectives and why people are gathered here today
9.10 - 9.25	2. Overall reflections on the current cycle	Presentation (supported by ppt)	All – interactive, moderated by the lead expert	Overall reflections on the cycle, particular on the experience, collecting feedback from the audience
9:25 - 10:00	3. Progress against plan - '10.000m' assessment	Group interactive activity	All – interactive, moderated by the lead expert	Presentation of the city's high level progress against the plan. Problem solving around the challenges and blockers, celebrating successes and reviewing focus of effort versus results
10:00 - 10:50	4. Progress against plan - '300m' assessment	Group interactive activity	Thematic Experts	Presentation of the city's more detailed progress against the plan
10:50 -11:00	Coffee break	-	-	-
11:00 - 11:50	5. Progress against KPIs	Group interactive activity	Thematic Experts	Presentation of the progress of the city activities' against the KPIs
11:50 – 12:00	6. Closing remarks	Speech	Lead expert	Recap of the key takeaways of the day and describing the next steps

Adjusting this session for different cities

As with all ICC events, this deck is not intended to be sufficient itself. It is intended to be adjusted and complimented with material from the Lead and Thematic experts

Activity*	Possible adjustments
Overall reflections on this cycle	The degree of analysis or tracking a city wishes to do on stakeholder sentiments between cycle and review planning sessions will depend on maturity. The important objective of this section is that city reps reflect on the experience of city ecosystem members and think about how they can always be improving it
10,000m	Cities are not obliged to produce a dashboard (page 17) – only if there is appetite
300m	In an ideal world the various initiatives are owned by particular city reps or members of the city ecosystem, who own the progress and report back in this section of the agenda. Less mature cities may need more lead expert and thematic expert support

*Not all the cities may have used this tracking targets, depending on how they originally defined their solutions.

Note on invitees: the ideal invitation list for this session is anyone who has had at least some material involvement in the city's ICC journey over the last implementation cycle. This can be a broader or narrower group depending on the city norms, but should aspire to include more than just the city reps

Welcome and introduction

Name, Role



Time to take stock on the journey

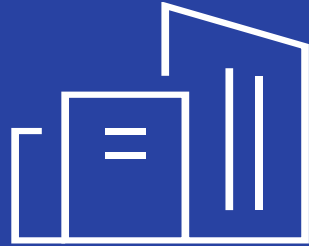
The Lead Expert should:

- A. Shore up excitement for progress achieved to date by the city
- B. Reiterate why reflecting on progress is important – it helps ensure that efforts are going in to things that have the most impact
- C. Encouraging members to question everything – this is a time to make changes to the plan and where efforts are focused



Overall reflections on this cycle

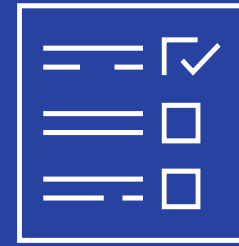
This first section is about high level reflections, including subjective feelings about the experience and learnings about how the city ecosystem is working



City progress against plan – 10,000m assessment



City progress against plan – 300m assessment



City progress against KPIs

Guidance on overall reflections on the stakeholder experience for the current cycle

GUIDANCE PAGE

How to think about overall reflections

Before city progress against the plan is investigated, the lead expert should make space for people to share high level reflections, including those that reflect on subjective or emotional reflections on the wider experience of being part of the city ecosystem since the start of the ICC.

It is up to the lead expert how structured to make this part of the session, but it is important space is given to reflect on more subjective experiences that cover topics such as overall energy and working norms.

For example, this assessment could consider 3 layers: the **city as a whole**, its **internal ecosystem**, and the different **stakeholders** involved.

Progress could be evaluated against 3 main performance areas:

- Whether the city is delivering the expected impact
- Whether the internal ecosystem of stakeholder interactions are effective
- Whether stakeholders at personal level feel motivated by the project

The purpose of this activity is to gather honest and open reflections on the overall experience of the ICC team and whether working norms are being effective.

This session could be moderated by the Lead Expert who provides overview of the current cycle from their perspective.

Followed by feedback/questions from the audience.

Ways to gather stakeholder perspectives

There are different ways that experts could aim to gather thoughts on this

- **Option 1: Survey to be distributed ahead (e.g. 2 weeks) of the session**, asking participants to score the identified city performance areas qualitatively (from 1=very poor to 6=excellent); the next slide shows the types of questions the survey could be built around;
- **Option 2: A set of questions participants will do live on the day of the session**. Slide 11 provides examples of the types of interactive questions that could be used.
- **Option 3: An unstructured live discussion**: however participants may feel less comfortable sharing on the spot

EXAMPLE 1 – SURVEY. The ICC experience on 6 dimensions that are critical to overall city journey success

Note, These are just examples

Key areas	Dimensions	Example questions to build the survey around
City impact	Overall achievement	<ul style="list-style-type: none">How do you feel about our overall progress? Are the project goals clear to you? Do you believe the city is delivering the expected impact?
	Focus of effort	<ul style="list-style-type: none">Is the city spending time on the right activities? Are we investing time in things that aren't yet yielding a return?
Collaboration	Ecosystem collaboration within the city	<ul style="list-style-type: none">What is the level of cooperation and communication in the ecosystem within your city? What is working well in the way we work together? What could we be doing better as an ecosystem? What do we think is challenging us from making more progress?
	Interaction with the wider ICC community	<ul style="list-style-type: none">How well is the ecosystem connected with the wider ICC community, i.e. other cities? What more support would you value from it?
Stakeholders Mindset	Personal involvement	<ul style="list-style-type: none">How do you feel overall about your involvement in the city's ICC activities? Are you enjoying it? What would make it a better experience?Are there any things you would change about the process of the city's ICC activities at the city level? E.g., meeting cadence

EXAMPLE 2 – SET OF QUESTIONS LIVE, during the session. Initiatives are scored on 6 dimensions that are critical to overall city journey success

This could be created live in Conceptboard

Example live question type 1:

☐ XX

1

2

3

4

5

6

☐ XY

1

2

3

4

5

6

Example live question type 2:

☐ YES

Please specify why YES

☐ NO



Ranking questions: using the annotate function, participants could be asked to evaluate a dimension on a range from e.g. 1 (very poor) to 6 (excellent)

Closed questions (with comments possible): using the annotate function, participants could tick the answer (YES/NO) and provide additional information

Debate: this could be an open question for the audience



Overall reflections on
this cycle

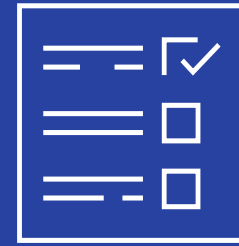


City progress against
plan – 10,000m
assessment

This second section is about high level objective progress – are we still pushing the right solutions/initiatives towards our goals?



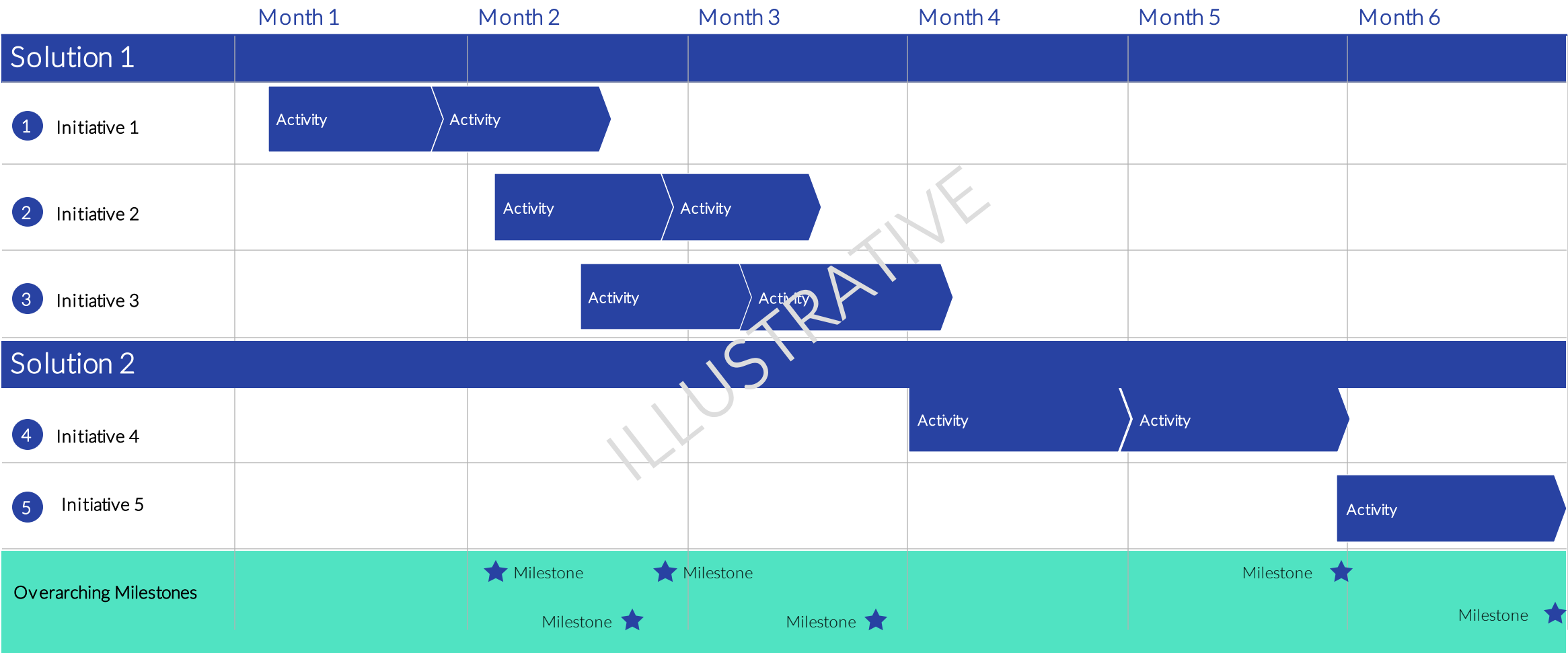
City progress against
plan – 300m
assessment



City progress against
KPIs

Overview of the city Roadmap

The city should recap an overview of the solutions and the initiatives outlined in the latest version of the city Roadmap – to recap what is being considered at the 10.000m assessment.



Example output 3a: Assessment of the city progress against plan

Initiative by initiative, the city rep could present their assessment on the progress against plan. This provides an operational perspective to move forward. Alternatively, in less mature cities, the Lead Expert can drive this.

We recommend the presenter engages the audience: the 3 questions provided as examples in the box on the next page to collect feedback and ensure participation from the session participants. Note, the purpose of this is to look at the solutions at a high level – are they as suited to our city and its problems as we originally thought? There will be time in the next section to diagnose why given solutions are or are not going as well

		Overall Status ¹	Key achievements to date	Main challenges encountered and solutions found	Main risks identified and mitigating measures	Next steps	Owner	Resources
Solution 1								
1	Initiative 1	■	■ ... ■ ...	■ ... ■ ... ■ ... ■ ...	■ ... ■ ... ■ ... ■ ...	■ ... ■ ...	■ ...	■ ... ■ ...
2	Initiative 2							
3	Initiative 3							
Solution 2								
4	Initiative 4							
5	Initiative 5							

1. Lead Experts should calibrate 'at risk', 'on track', and 'oof track' (e.g. 'at risk' could be 1-3 months behind). Moreover, it would be important to add a time element to the legend, based on the city's overall maturity/pace.

Example output 3b: Assessment of the city progress against plan (10.000m)

- Are we focusing our efforts correctly across the solution portfolio?
- Are there any common challenges or success factors across the solution portfolio?
- We thought these endeavours were the best path forwards when we started, but do we still think this set of solutions is right in terms of both our capacity to deliver and city needs?

City Monitoring Dashboard

At Risk On track Off track

		Overall Status ¹	Things to celebrate	Risks to be monitored	Next milestone expected	Main owner
Solution 1						
1	Initiative 1					
2	Initiative 2					
3	Initiative 3					
Solution 2						
4	Initiative 4					
5	Initiative 5					
6	Initiative 6					

The overall outcome of the discussion in the sessions so far could be an operational tool – **the city monitoring dashboard** – providing a high level overview on the overall status of the city progress, on the activities that present risks and need to be monitored closely, and giving information on when the next milestones are planned. This could be a tool to revisit in monthly city meetings

1. Lead expert should calibrate 'at risk', 'on track', and 'oof track' (e.g. 'at risk' could be 1-3 months behind)



Overall reflections on
this cycle

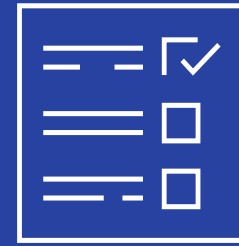


City progress against
plan – 10,000m
assessment



City progress against
plan – 300m
assessment

This second section is about
delving in to each
solution/initiative and working
out if the activities planned are
still the right ones at the right
cadence



City progress against
KPIs

Initiative owners who will be taking us through a review of plans today

This page is simply to structure who will be speaking when against each of the initiatives or solutions, depending on how the city structures the ICC

1 Initiative / Solution 1

2 Initiative / Solution 2

3 Initiative / Solution 3

Overview of the activities planned under each initiative or so

In turn, each initiative owner should present an overview of progress against the initial planning. This will have been created in the previous workshop. This can be done at a solution level or initiative level, depending on the maturity of the city. The purpose is to focus on the activities that are planned to take place in the following implementation cycle

Review of this solution/initiative

Going into the detailed list of activities, the lead experts should involve participants as much as possible, asking questions to provide an operational perspective to move forward. Below is an example set of questions that could be used

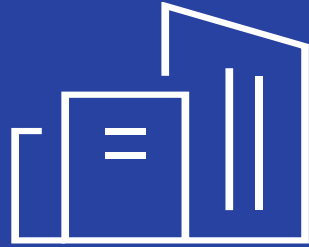
- Are the activities going according to the plan?
- Have we had any big successes?
- Are there any activities that are proving challenging? If so, can anyone here do anything to unlock them?
- Do we need to make any changes to future activities? Either way they are or when we have them?
- Do we think we have the capacity to deliver the future activities and actions as planned

COFFEE BREAK





Overall reflections on
this cycle



City progress against
plan – 10,000m
assessment



City progress against
plan – 300m
assessment






City progress against
KPIs

The final section is then about reviewing progress against city KPIs. Some cities may prefer to do this as agenda item 2. Others will prefer to talk about plans first. Experts can decide based on the local nuances and we make no recommendation either way

Overview of our approach to the development of KPIs to assess city performance and activities

■ Detailed next

	Idea	What purpose do they serve?	What is it 'attached' to	When do we measure them?	What have we set?
 Helps deliver	City performance	How well a city is performing on outcomes and impacts (e.g., quality of life)	City programme as a whole	At the end of Implementation cycle 2 and for Programme Review workshop	< >
 Helps deliver	Solution maturity	How well a city is using new technological solutions	Each solution	At the end of Implementation cycle 2 and for Programme Review workshop	< >
	Activities	How well a city is taking action and encouraging others to take action	City programme as a whole	Once per month (light touch) and in city check ins	< >

Lead experts should fill in an overview of the KPIs, recapping the purpose they serve and the ones that were set

The assessment of the solution maturity will happen only in the 2nd implementation workshop; activities should happen in all

Assessment of solution maturity- progress against KPIs (1/2)

Lead expert should fill this in in advance. To make more visual, city reps can colour (e.g., with green / yellow/ red) circles if desired

	Where we started	Where we are today	Considerations on our performance
Solution 1			
1	KPI 1		
2	KPI 2		
3	KPI 3		
Solution 2			
1	KPI 1		
2	KPI 2		
3	KPI 3		
4	KPI 4		
5	KPI 5		




ILLUSTRATIVE

Assessment of solution maturity- progress against KPIs (2/2)

- Are our solution maturity KPIs helpful? Are they easy to collect? Do they reflect our real solution rollout performance?
- Are we on track? Does this lead us to think differently about the plan?
- Do we still believe these maturity KPIs will lead to improved citizen performance?

The discussion could be led by the Lead Expert, involving all participants. The box provide example of questions that could spark discussion.

Overview of our approach to the development of KPIs to assess city performance and activities

	Idea	What purpose do they serve?	What is it 'attached' to	When do we measure them?	What have we set?
 Helps deliver	City performance	How well a city is performing on outcomes and impacts (e.g., quality of life)	City programme as a whole	At the end of Implementation cycle 2 and for Programme Review workshop	<div> <div></div> <div>Detailed next</div> </div> < >
 Helps deliver	Solution maturity	How well a city is using new technological solutions	Each solution	At the end of Implementation cycle 2 and for Programme Review workshop	< >
	Activities	How well a city is taking action and encouraging others to take action	City programme as a whole	Once per month	< >

Activity KPIs are tracked both for each individual activity, but also at ecosystem level

Lead experts will provide the overview of KPIs both at activity and ecosystem level

Ecosystem KPIs

- Funding committed by city authority
- Funding committed by other city ecosystem players
- Funding committed on initiative in partnership with other ICC city
- 1-2 other indicators of activity tailored to the city

Overall activity KPIs

- % of activities completed on time
- Number of months ahead or behind specific deadlines

Assessment of city ecosystem and activities - progress against KPIs

	Where we started	Progress			Other considerations
		Implementation cycle 1	Implementation cycle 1	Implementation cycle 1	
Ecosystem					
1 KPI 1					
2 KPI 2					
3 KPI 3					
Overall activity					
1 KPI 1					
2 KPI 2					
3 KPI 3					

The discussion could be led by the Lead Expert, involving all participants. The box on the right side of the slides provide example of questions that could spark discussion.

- Are our KPIs helpful? Are they easy to collect? Do they reflect our real solution rollout performance?
- Are we on track? Does this lead us to think differently about the plan?
- Do we still believe these maturity KPIs will lead to improved citizen performance?

Closing remarks

Name, Role



Key takeaways and next steps

Annex 1: Main takeaways n the current cycle



What has worked well during this cycle? What is the impact you are proud of?

- ...
- ...
- ...



What are the main lessons you learnt?

- ...
- ...
- ...



What will you focus on in the next cycle?

- ...
- ...
- ...



What are they key areas you would be keen to learn from the experience of other cities?

- ...
- ...
- ...

Annex 2: Initiative Sheet Template

Initiative Sheets could be distributed with the survey, or ahead of this session, to remind participants of the scope of work under assessment.

Stakeholders involved

Initiative name:



What is the name of this initiative? (concise and different enough from other initiatives)

Initiative lead:



Which entity and individual are accountable for delivering this initiative? (ideally one name)

Initiative working team:



Who are working team members tasked with delivering this initiative? (highlighting main contact)

Contributors:



Who else might contribute to this initiative? (in case of other entities, mention key contacts)

Key stakeholders



Who are the stakeholders that the team needs to communicate with?

How often does the team communicate with each stakeholder group?

Which stakeholders influence / make decisions affecting the initiative?

Milestones and expected impact

Ultimate goal and scope of this initiative



What is the purpose of this initiative?

What is the underlying issue this initiative is solving?

How do we define ultimate success for this initiative?

What is included in the scope of this initiative (countries, entities)

Major milestones



What are the top 3-5 milestones necessary to achieve success? When must they be completed and who is responsible for them?

Dependencies



Where are there major interdependencies with other initiatives (or other reforms)?

Impact and timing



When will the initiative begin to create impact?

Progress assessment and next steps

Milestones achieved to date



What are the key achievements so far?

Next steps



What are the next planned steps and what is their deadline?

Who are the owners?

Risks



What are the key risks? What challenges are likely to arise?

What are the mitigating measure that are being put in place?

Support needed



What funding is necessary to ensure that the workstream is successful?

What other resources / investments are necessary?

Who does the team need support and input from?

Intelligent Cities Challenge

PHASE IV – Review and way forward

Programme Review Workshop

Sep 2022



European
Commission

The Intelligent Cities Challenge is funded by COSME, the EU programme for the Competitiveness of Enterprises and SMEs



Final Deliverable Workshop | Suggested agenda



Schedule



Agenda item



Format



Lead



Overview to activities

9:00 – 9:10	Welcome and ICC recap	Presentation	Lead expert	Presentation explaining the key agenda items and objectives for the day, and an overview of the ICC to date
9:10 - 9:20	Recap of vision statements and KPIs	Presentation	Lead expert	Brief recap on vision and ambition statements set by participant cities and the KPIs to achieve their visions
9:20 - 9:35	Assessment of progress against KPIs	Presentation	Representative, participant city	Presentation from participant city on the progress they made against their KPIs during the ICC
9:35 - 09:50	Discussion	Discussion in breakouts	All	Breakout rooms for participant cities to discuss their city's progress against KPIs, and reflect on lessons learned
9:50 - 10:05	Reflections on the ICC	Presentation	Representative, participant city	Presentation from participant city on some of the key lessons they took from the ICC
10:05 - 10:20	Discussion	Discussion in breakouts	All	Breakout rooms for participant cities to discuss the key lessons they took away from the ICC
10:20 - 10:35	Future commitments	Presentation	Representative, participant city	Presentation from participant city looking ahead to what's next
10:35-10:50	Discussion	Discussion in breakouts	All	Breakout rooms for participant cities to discuss their 3-year plans
10:50 – 11:00	Closing remarks	Presentation	Lead expert	Closing presentation and remarks

Progress

Things to discuss in this section

Think about the KPIs your city set at the start of the ICC to move towards your vision statement.

How much progress have you made in the last 3 years?

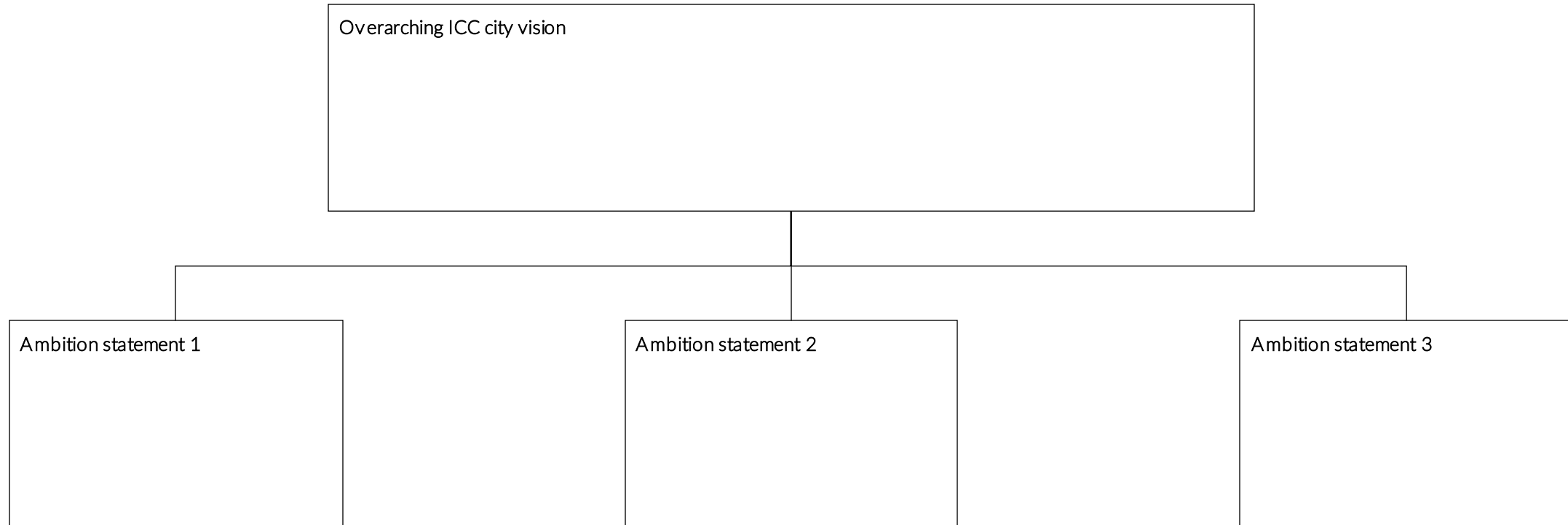
Where did you encounter difficulties?

What moved faster or easier than expected?

How have the KPIs interacted?




RECAP: Vision and ambition statements

Describe the ICC strategy: Vision and ambition statements



Note – Cities have chosen as many ambition statements as necessary. Suggestion is 3-5

RECAP: Overview of our approach to the development of KPIs to assess city performance and activities

	Idea	What purpose do they serve?	What is it 'attached' to	When do we measure them?	What have we set?
 Helps deliver	City performance	How well a city is performing on outcomes and impacts (e.g., quality of life)	City programme as a whole	At the end of Implementation cycle 2 and for Programme Review workshop	< > <div>This information can be found in your implementation workshop answers</div>
 Helps deliver	Solution maturity	How well a city is using new technological solutions	Each solution	At the end of Implementation cycle 2 and for Programme Review workshop	< >
	Activities	How well a city is taking action and encouraging others to take action	City programme as a whole	Once per month (light touch) and in city check ins	< >

Assessment of city performance - progress against KPIs

This table is designed for you to quantitatively track progress against your KPIs. Each of the cells in the 3 right hand side columns should include numbers

City performance			
	Where we started	Midway through the challenge	Final results
1 KPI 1			
2 KPI 2			
3 KPI 3			
4 KPI 4			
5 KPI 5			

Assessment of city performance - discussion

This page is designed for you to reflect and discuss the progress against KPIs without using numbers. For example, did your solutions make the difference you thought they would? Did other factors influence your KPIs that you did not see before implementing your projects?

Assessment of solution maturity - progress against KPIs

This table is designed for you to quantitatively track progress against your KPIs. Each of the cells in the 3 right hand side columns should include numbers

Where we started		Midway through the challenge	Final results
Solution 1			
1 KPI 1			
2 KPI 2			
3 KPI 3			
4 KPI 4			
5 KPI 5			
Solution 2			
1 KPI 1			
2 KPI 2			
3 KPI 3			
4 KPI 4			
5 KPI 5			

Assessment of solution maturity - discussion

This page is designed for you to reflect and discuss the progress against KPIs without using numbers. For example, did you scale the solutions fast enough? Were you measuring the right things?

Assessment of city ecosystem and activities - progress against KPIs

This table is designed for you to quantitatively track progress against your KPIs. Each of the cells in the 3 right hand side columns should include numbers

Where we started		Midway through the challenge		Final results	
Ecosystem					
1	KPI 1				
2	KPI 2				
3	KPI 3				
4	KPI 4				
5	KPI 5				
Activity					
1	KPI 1				
2	KPI 2				
3	KPI 3				
4	KPI 4				
5	KPI 5				

Assessment of city ecosystem and activities - discussion

This page is designed for you to reflect and discuss the progress against KPIs without using numbers. For example, did you stick to the plan? Did the ecosystem collaborate easily and readily with you?

Reflections

Things to discuss in this section

What were the key lessons for you and your ecosystem in the ICC?

What factors have enabled project successes?

What has typically blocked projects from succeeding?

Where has the ecosystem worked together well? What could have gone better?

5 key lessons

What are the 5 key lessons your city has taken from the ICC? You can mention any reflections you have had during the challenge. Questions that may help are what factors have enabled project successes? What has typically blocked projects from succeeding? What did the teams carrying out these projects do well, and what could have been done better? Where did the ICC help you succeed, and what else could it have done to help you?

Lesson	Reflections
1	
2	
3	
4	
5	

Reflections on city collaborations

What are the main lessons your city has learned from working with other cities during the ICC? Can you give specific examples?

Commitments

Think about the vision statements you made earlier in the challenge, how far are you towards realising this vision?

How do you develop your current initiatives to progress towards your vision?

What else can you commit to that will help you achieve this vision over the next 3 years?

Commitments

This page is designed for you to make a series of commitments that will allow you to continue to progress your projects and ambitions beyond what you have already achieved during the ICC.

Commitments to on-going resources	Commitments to on-going collaboration	Commitments to on-going KPIs
< _____ >	< _____ >	< _____ >

3 Year plan

This page is a chance for your city to make a high level 3 year plan that will help you to make commitments for the future and lay the foundations of your future roadmap. Think about the vision statements you made earlier in the challenge, how far are you towards realising this vision? How do you develop your current initiatives to progress towards your vision? What else can you commit to that will help you achieve this vision over the next 3 years?

Building on the ICC, what would you like your city to achieve in 3 years time?

Text

How will you make sure that your city achieves these goals?

Text

What steps will you take over the next 3 years to achieve these goals?

Text

3 Year plan

This page is a chance for your city to make a more granular 3 year plan that will help you to make commitments for the future and lay the foundations of your future roadmap. Think about the KPIs you have set in the city performance, solution maturity and activities and ecosystem categories. How can you continue to develop these KPIs over the next 3 years? How will you achieve this?

KPI	Category	What will you commit to over the next 3 years, and how will you achieve this?
1	E.g. City Performance, Solution maturity or activities & ecosystem	< ____ >
2	< ____ >	< ____ >
3	< ____ >	< ____ >
4	< ____ >	< ____ >
5	< ____ >	< ____ >