

Internationale FTI-Kooperationen

- **Horizon Europe**
- **SET Plan Aktionen**
- **JPI Urban Europe**

SdZ Themenworkshop

„Auf dem Weg zum Plus-Energie-Quartier“

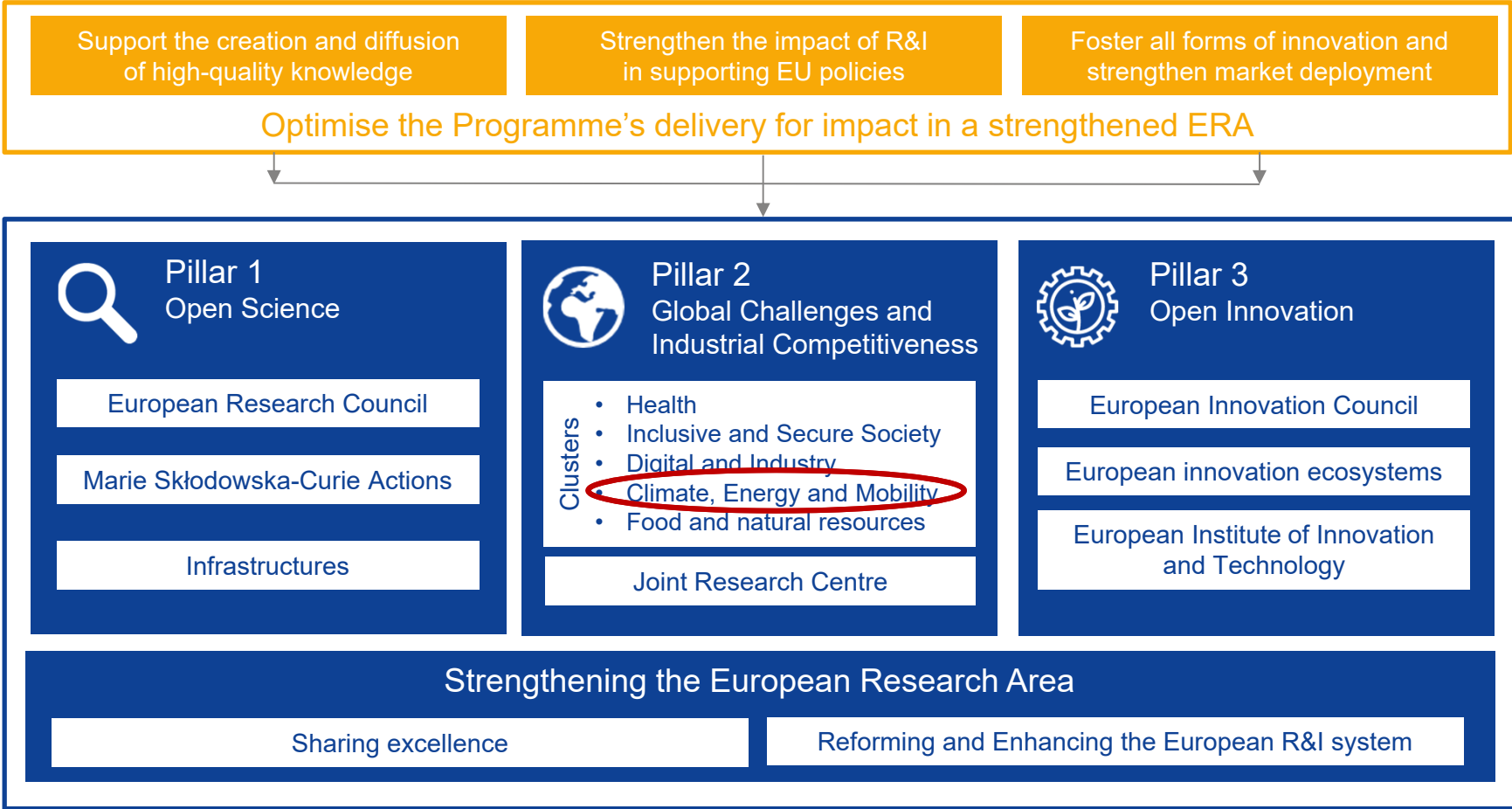
Horizon Europe

Das 9. EU-Forschungs-Rahmenprogramm

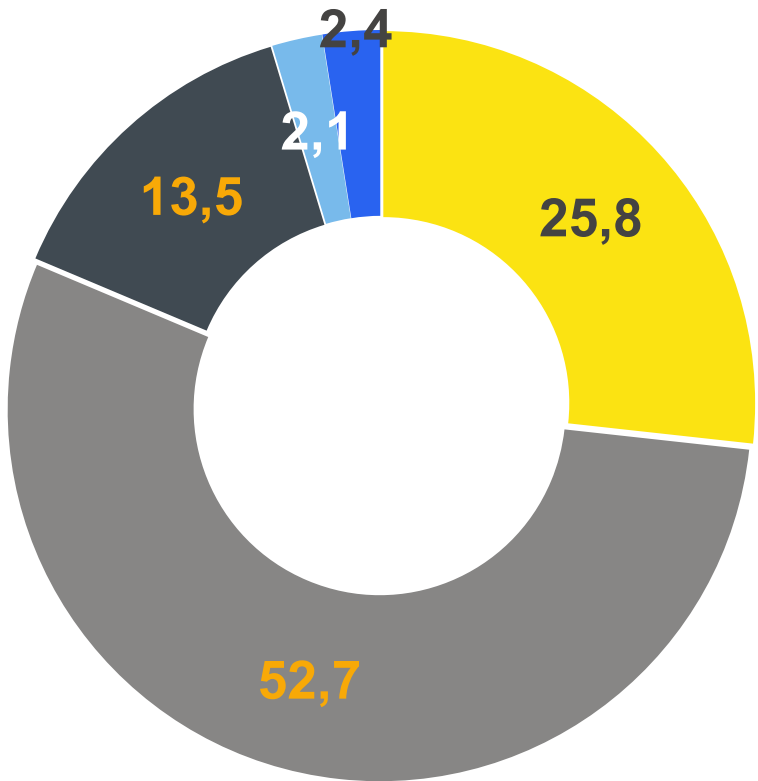
Hans-Günther Schwarz
BMVIT
Wien, 11. Oktober 2018

Horizon Europe evolution not revolution!

Specific objectives of the Programme



Budget of Horizon Europe: € 100 billion*



- Open Science
- Global Challenges & Ind. Competitiveness
- Open Innovation
- Strengthening ERA
- Euratom

100€ million € (in current prices)*

* This envelope includes EUR 3.5 billion allocated under the InvestEU Fund.



Lessons Learned from Horizon 2020 Interim Evaluation



Support breakthrough innovation



Create more impact through mission-orientation and citizens' involvement



Strengthen international cooperation based on reciprocity



Reinforce openness whilst safeguarding EU interests



Rationalise the funding landscape



Key Novelties in Horizon Europe

European Innovation Council

R&I Missions

Extended association and international cooperation possibilities

Open science policy

New approach to Partnerships

FTI-Partnerschaften im EK Vorschlag für Horizon Europe

- **Arten von europäischen Partnerschaften:**
 - **Co-programmed:** Beteiligung aus FP an gem. Programmen der Partner auf Basis von MoU, vertragl. Vereinbarungen); vergleichbar mit cPPP in H2020 -> Partner folgen gem. Strategie (mit jeweils eigener Finanzierung)
 - **Co-funded:** Beteiligung aus FP an gem. Programmen von MS auf Basis von Commitment der Partner (finanziell, in-kind, Alignment) -> **Finanzierung wird kombiniert in gemeinsamen Programmen**
 - **Institutionalized:** Nachfolge von Art 185, Art 187, JU, KIC... -> Ein ‚EU Undertaking‘ wird gegründet (Bspw. Joint Undertaking)
- CSAs zur Unterstützung von **Initiativen im vorw. Interesse von MS** weiterhin möglich (Auswahl in kompetitiven calls)

Missions in FP9

Große strategische Themen, gesellschaftliche und technologische

- Charakteristika
 - Intentionalität, Direktionalität
 - Klare Ziele, Meilensteine, Zeitpläne, Ressourcenrahmen; längerfristiges Commitment
 - Starke Programmanagementstrukturen
 - Einbeziehung von Sektoren über FTI hinaus, Bündelung aller Kräfte zur Erreichung eines gewissen Ziels
- Neue Anforderungen an FTI-Akteure
- Beispiele für Missions
 - Mögliche neue Missions: 100 Carbon neutral Cities by 2030, A Plastic-Free Ocean
 - Bereits umgesetzte Missions: Deutsche Energiewende, Man on the Moon

Joint Programming Initiative Urban Europe

- Forschungsförderungs-Netzwerk unter aktiver Beteiligung von 22 europäischen und ca. 10 außereuropäischen Ländern
- Etablierte transnationale Programm-Management-Struktur
- Mittlerweile 7 abgeschlossene transnationale Ausschreibungen
- Europäischer Hauptansprechpartner für transnationale Forschungsfinanzierung im Bereich urbaner Technologien
- Aktives Programm-Management mit Abstimmung nationaler Programme auch jenseits der Ausschreibungen

www.jpiurbaneurope.eu

Aktivitäten der JPI Urban Europe

- Jährliche bedarfsträger-orientierte Ausschreibungen („Making Cities Work“) unter starker Einbindung urbaner Akteure
- Ausschreibungen aus ERA-NET Cofund Aktionen zu Themen im Bereich Mobilität (2019), Transitionsstrategien (2020) und Plusenergie-Quartieren (2021)
- Programm-Management zur Implementierung der SET Plan Aktion Smart Cities and Communities mit dem Thema Plusenergie-Quartiere
- Neue Forschungsstrategie SRIA 2.0
- Jährliche Forschungs- und Politik-Konferenzen zum Thema urbaner Entwicklung und urbaner Technologien
- Regelmäßige Workshops (offline und online) zur Akteursvernetzung

SET Plan Aktionen

Technologien und Lösungen im Bereich
Energiepolitik und Energietechnologien

Strategic Energy Technology Plan (SET-Plan)

The SET-Plan is the technology pillar of the EU's energy and climate policy

The SET-Plan, adopted by the European Union in 2008, is a first step to establish an energy technology policy for Europe. It is the **principal decision-making support tool for European energy policy**, with a goal of:

- Accelerating knowledge development, technology transfer and up-take;
- Maintaining EU industrial leadership on low-carbon energy technologies;
- Fostering science for transforming energy technologies to achieve the 2020 Energy and Climate Change goals;
- Contributing to the worldwide transition to a low carbon economy by 2050.

A recap: SET Plan actions under the Energy Union

Energy Union

Research, Innovation and
Competitiveness Priorities

SET-Plan 10 Key Actions

No1 in
Renewables



- 1 Performant renewable technologies integrated in the system
- 2 Reduce costs of technologies

Sustainable
Transport



- 7 Competitive in global battery sector and e-mobility
- 8 Renewable fuels and bioenergy

Austria

Austria

Consumers in
the Energy
System



- 3 New technologies & services for consumers
- 4 Resilience & security of energy system

Carbon Capture
Utilisation and
Storage



- 9 Carbon Capture Storage / Use

Efficient Energy
Systems



- 5 New materials & technologies for buildings
- 6 Energy efficiency for industry

Austria

Austria

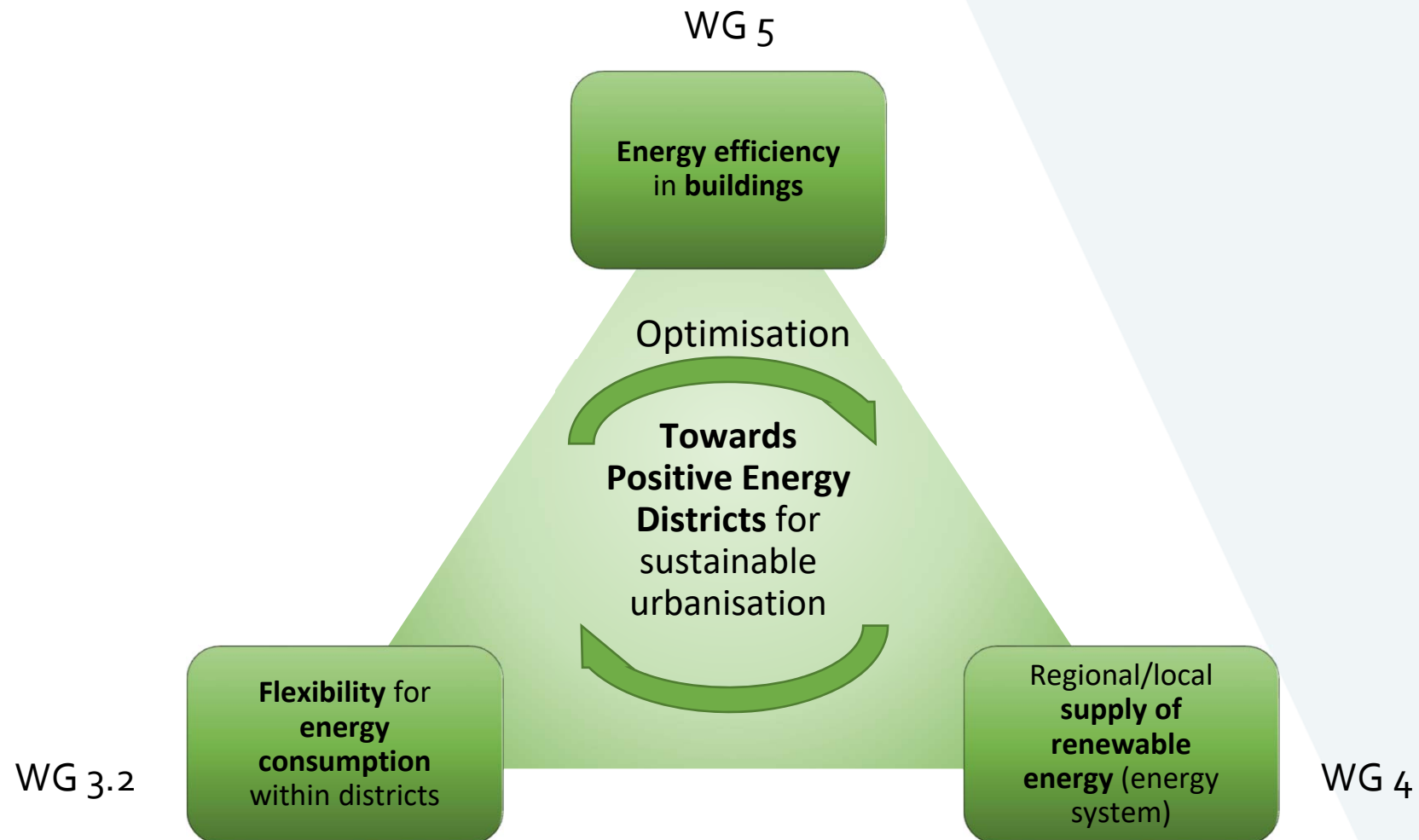
Nuclear Safety



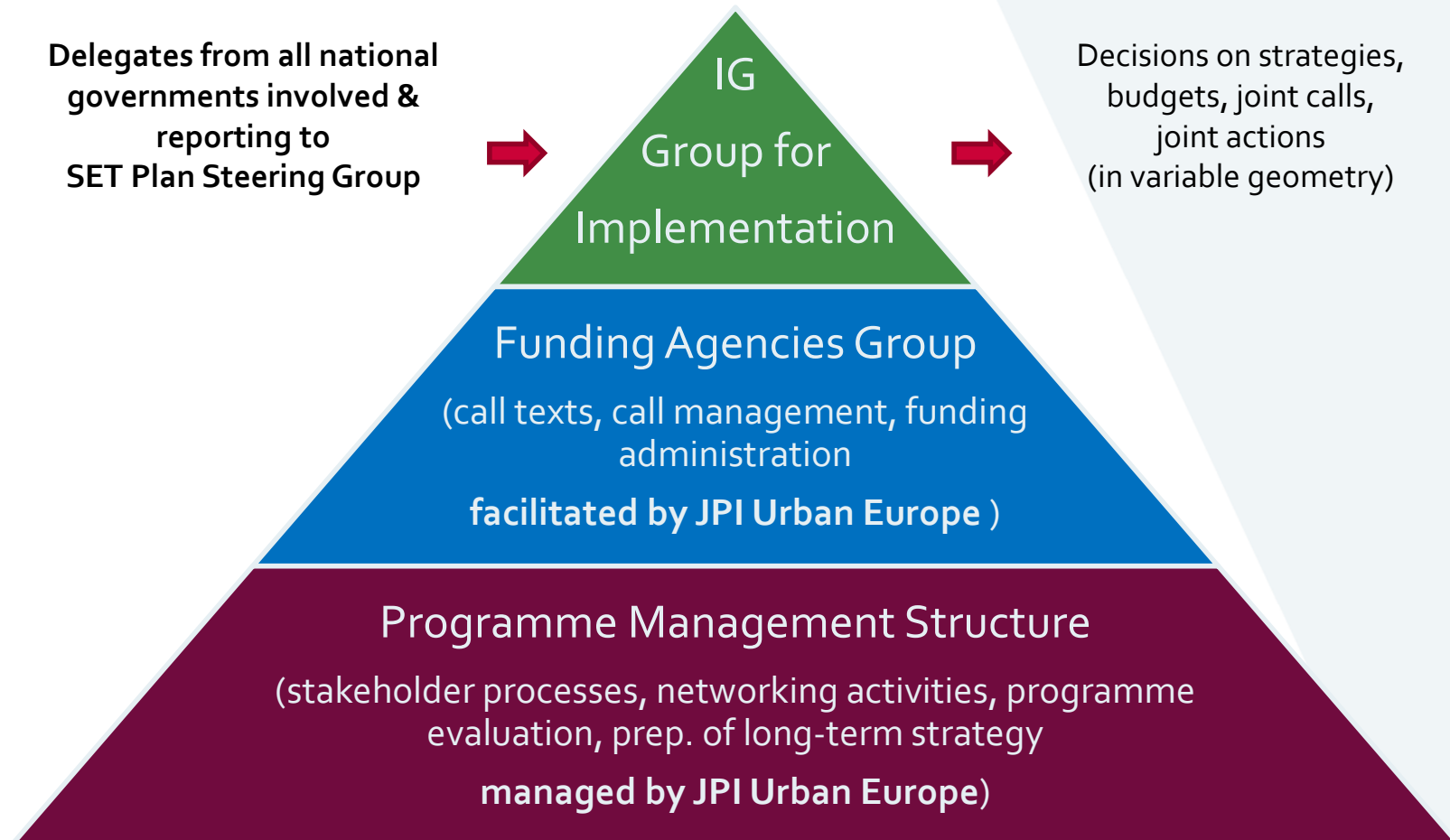
- 10 Nuclear safety

- 6 actions reflecting AT national focal areas
- 2 actions chaired by AT

How SET Plan Actions need to collaborate



Structure of PED Implementation Programme



PED Implementation: Current Programme Stakeholders

- 17 countries: AT (Chair), BE, CY, CZ, DE, ES, FI, FR, IT, LV, NL, NO, PT, SE, SK, TR, UK (more will join)
- Programme management: JPI Urban Europe
- Stakeholders: European City Networks, RTO Networks & Industrial Stakeholder Groups



Goals for SET Plan Action on Smart Cities

“Enhance capacities of cities, industry and research to make Europe a global role model and market leader

- in technology integration for and deployment of **Positive Energy Districts** taking into account aspects of inclusiveness
- with the aim **by 2025** to have at least **100 successful Positive Energy Districts** synergistically connected to the energy system in Europe and
- with a strong export of related technologies.”

Positive Energy Districts (PED) and Neighbourhoods (PEN)

- Urban districts or neighbourhoods with **annual net zero energy import** and net zero CO2 emissions **working towards a surplus production of renewable energy**, integrated in an urban and regional energy system
 - “High quality urban environment”: integral part of comprehensive approaches towards **sustainable urbanisation** including **technological, spatial, regulatory, financial, legal, social and economic perspectives**
 - Sector coupling of **built environment**, sustainable **production and consumption**, and **mobility** to reduce energy use and greenhouse gas emissions and to create added value and incentives for the consumer
- **development of PED/PEN framework as part of discussion process with cities and stakeholders**

Ambition & Goals of the PED Implementation Plan

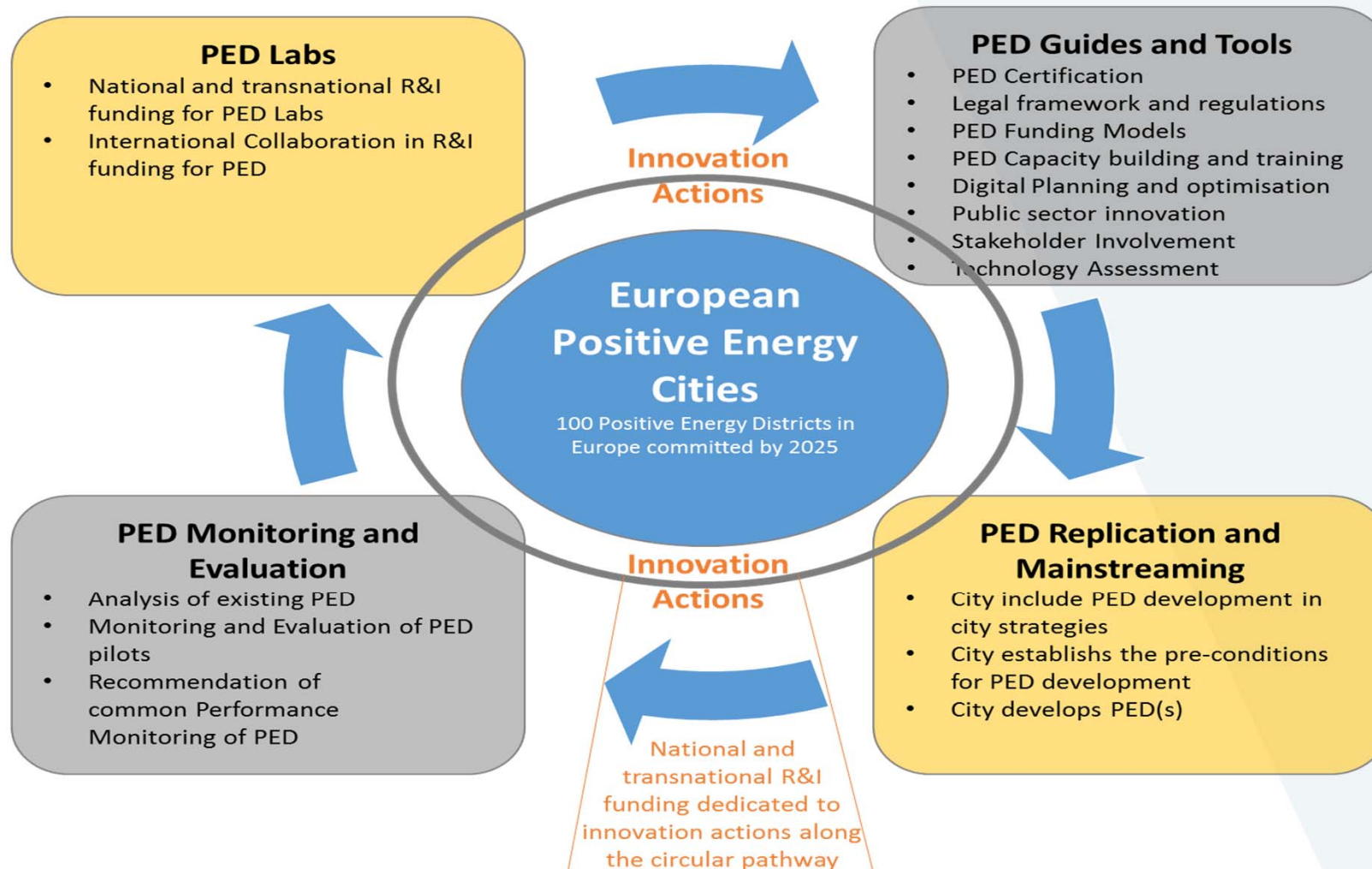
The implementation plan intends to

- raise the quality of life in European cities,
- contribute to achieve the COP21 targets and
- enhance European capacities and knowledge to become a global role model and market leader
- with the aim **by 2025** to have at least **100 successful Positive Energy Districts/Neighbourhoods** synergistically connected to the energy system in Europe

PEDs need an integrative approach including

- **technological, spatial, regulatory, legal, financial, environmental, social and economic perspectives,**
- support of **planning, deployment and replication of PEDs for sustainable urbanisation.**

Implementation Plan for Positive Energy Districts



Next Steps

Date	Activity	Goals
12-13 February	PED/PEN programme stakeholder meeting, Brussels (CoR)	Operational approaches and next steps among stakeholders
3 April	PED/PEN cities workshop, Vienna	PED problem owners offer input for first joint call (end of 2019)
22-24 May	Stakeholder meetings in the margins of the Urban Future Global Conference, Oslo	Stakeholders (city networks, RTOs & industry groups) to discuss common approaches
26-27 June	SET Plan Action 3.2 Steering Committee & Stakeholder Plenary, Copenhagen	Decisions on joint calls and mid-term R&I programme
October	Launch first PED innovation action (joint call)	Establish first PED innovation labs, including formats for exchange of experiences
November	Launch of European PED cities network based on mapping of PEDs/PENs	Ensure a strong voice of problem owners in the programming of annual joint calls and actions

Expected Results

Results 2019	Impact
Mapping of PED examples	Extend contacts to cities, basis for an Alignment Action, dissemination of good practice
PED framework	Identify cities' and stakeholders' requirements for PEDs, collect input for a possible Innovation Action
Cities Network	Reference for new formats to mobilise cities, contribution to AGORA, input for other JPI UE calls and activities
Roadmap for joint actions	Concept for joint actions and calls, involvement of new funding agencies, operationalise cooperation with ERRIN, SCIS, industry networks, etc.

**Danke für Ihre
Aufmerksamkeit!**

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