



Developing a regional Energy Plan

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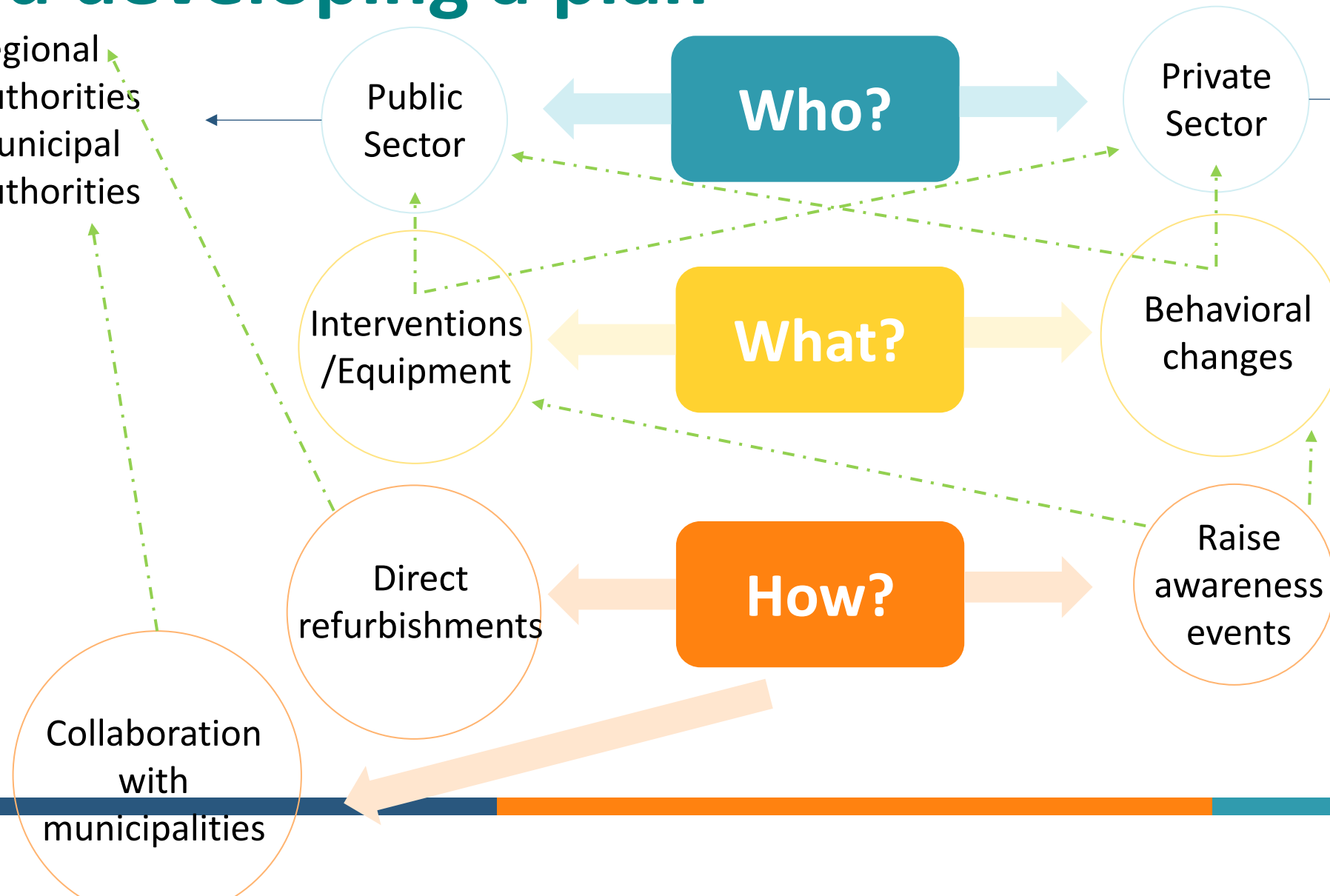
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1. Considerations when designing actions and developing a plan
2. How to best incorporate the EE1st principle
3. Designing the monitoring and evaluation of actions
4. Putting all the stages together to develop a plan

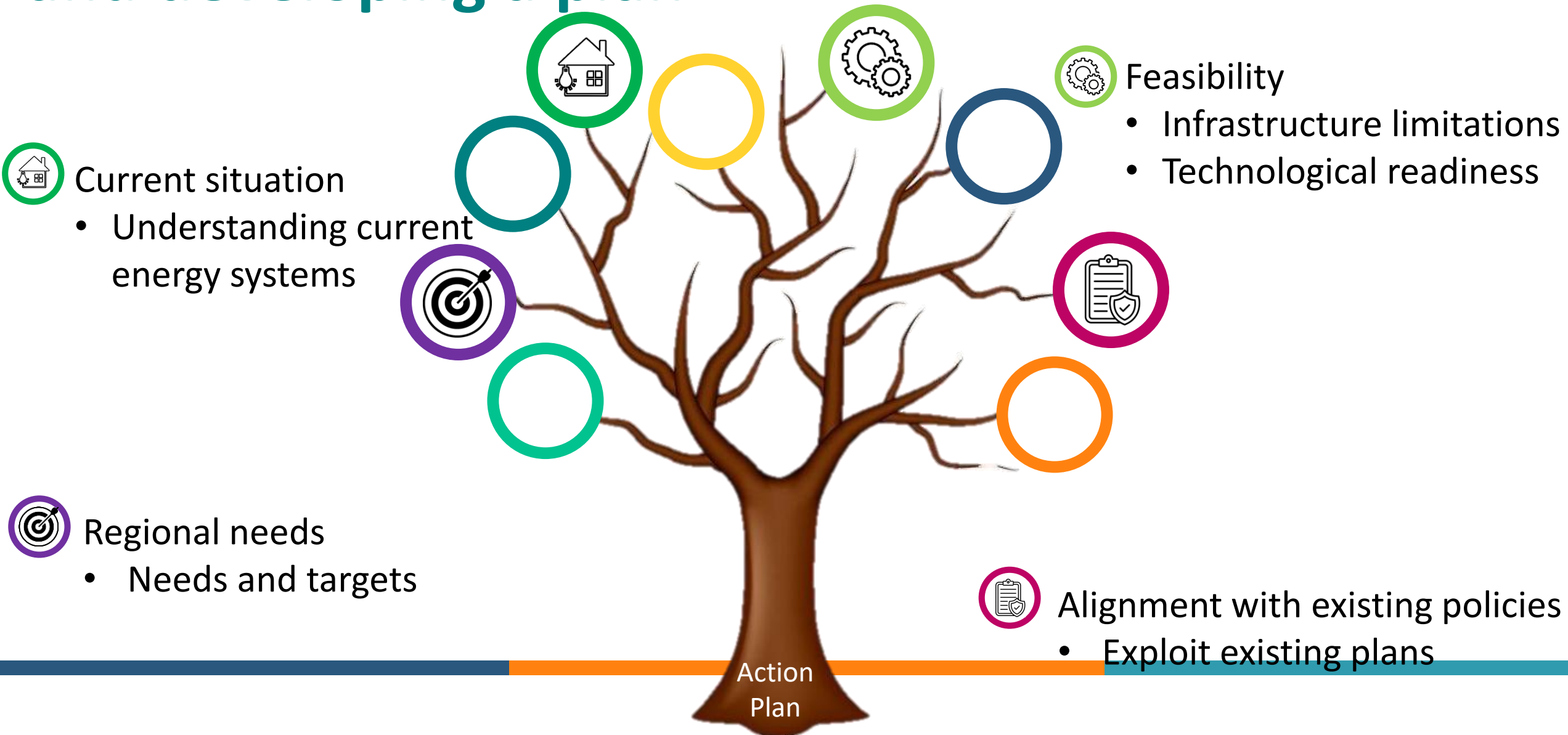
Considerations when designing actions and developing a plan

- Regional Authorities
- Municipal Authorities

- Residents
- Businesses-Professionals



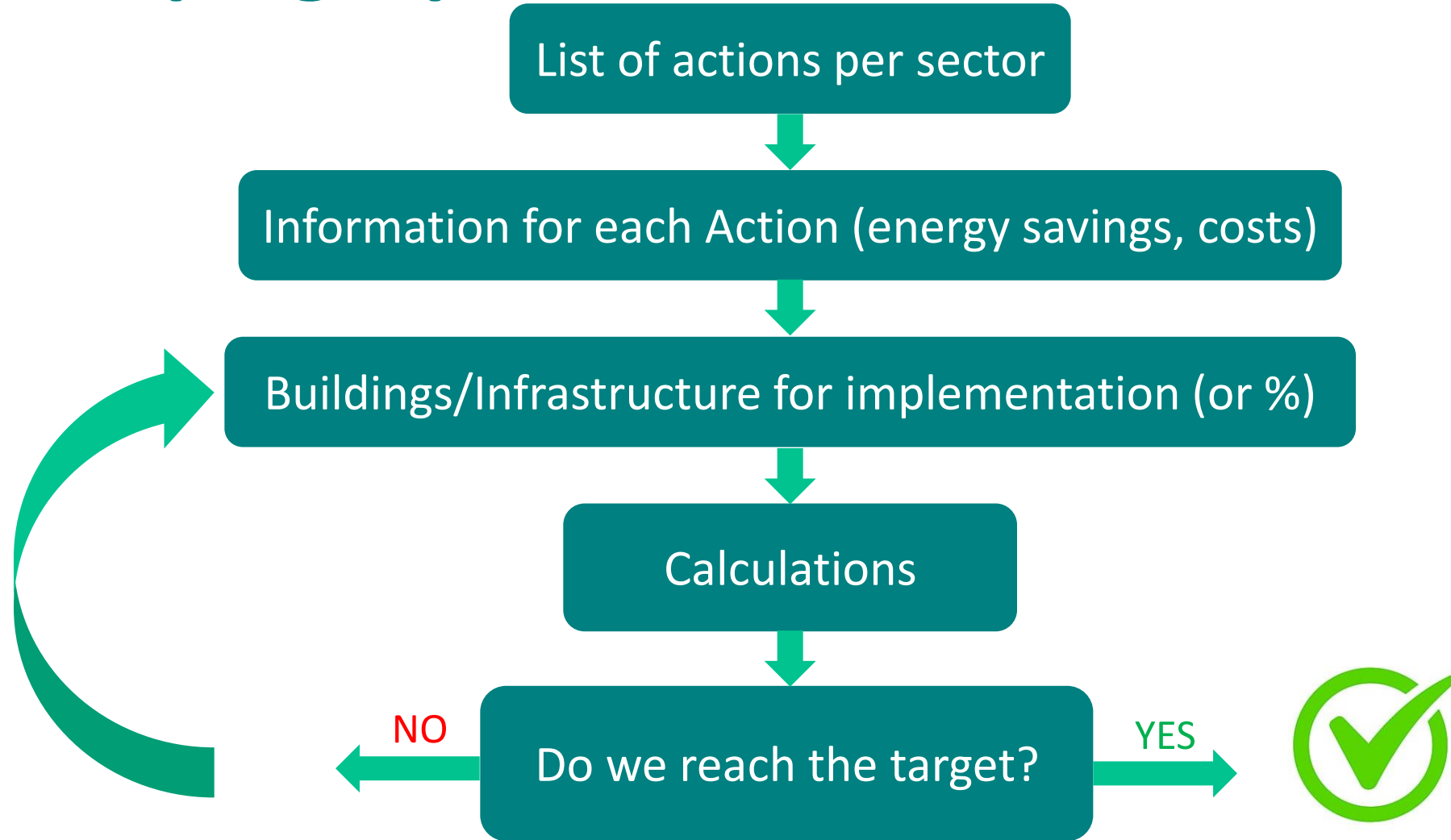
Considerations when designing actions and developing a plan



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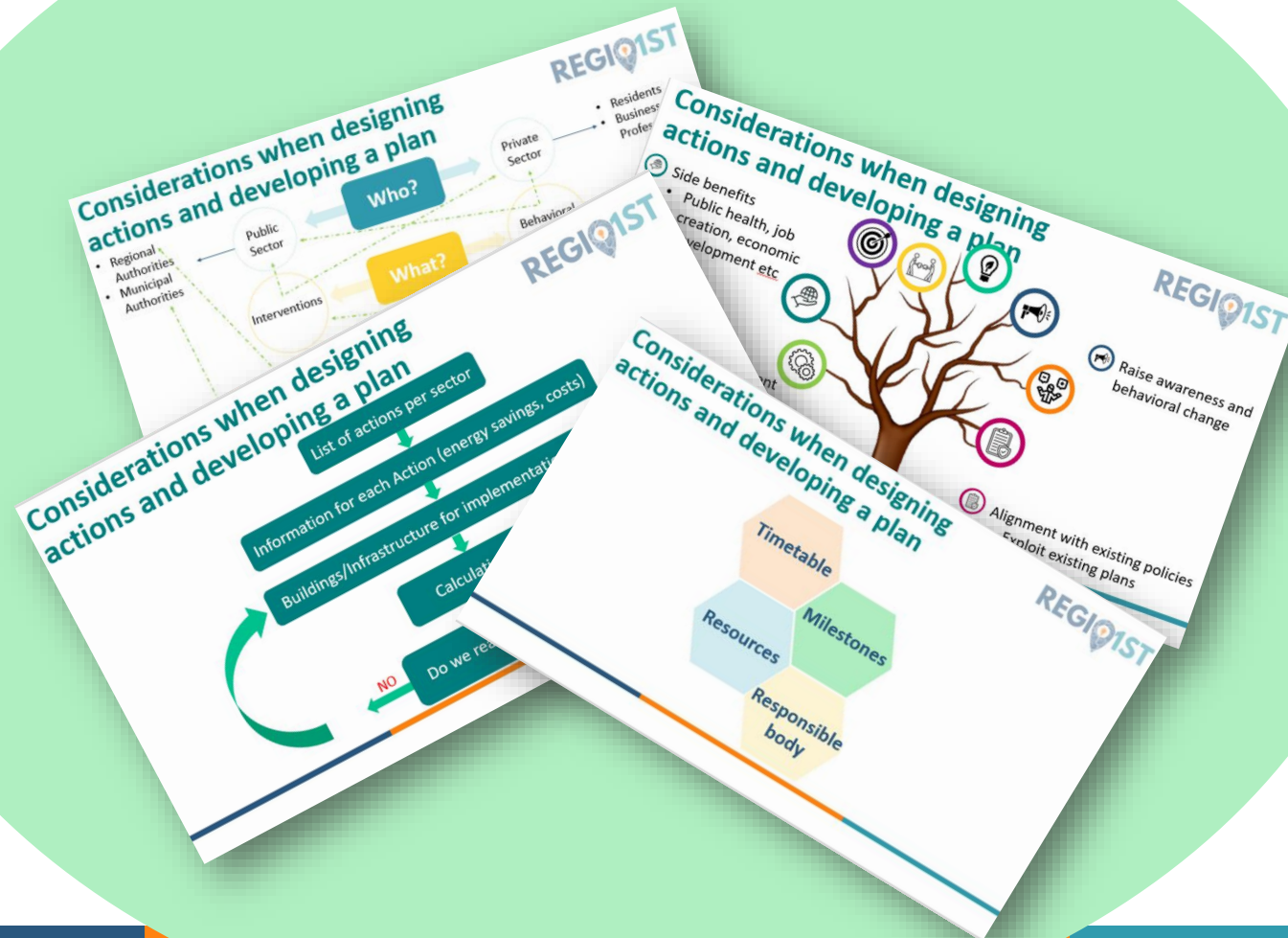


Considerations when designing actions and developing a plan



How to best incorporate the EE1st principle

EE1st principle



How to best incorporate the EE1st principle

EE1st principle

- only the energy really needed is produced
- investments in stranded assets are avoided
- demand for energy is reduced and managed in a cost-effective way

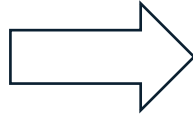
➔ Prioritize Energy Efficiency over Renewable/energy supply investments ➔

How to best incorporate the EE1st principle

EE1st principle



- Energy planning
- Policy
- Investment decisions



- Cost-effective end-use energy savings
- Demand response initiatives and
- More efficient conversion, transmission and distribution of energy



More efficient energy demand and energy supply

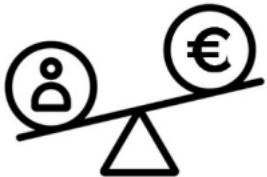
How to best incorporate the EE1st principle



Apply EE1st in planning, policy and major investment decisions in energy systems & non-energy sectors with significant impact on energy consumption



Monitor the application of EE1st (identify a monitoring entity or entities)



Promote and apply cost-benefit methodologies (wider benefits of energy efficiency, societal perspective)

How to best incorporate the EE1st principle



Your energy targets should be guided by the EE1st principle

Establish energy efficiency standards in all sectors

Focus on energy efficiency, ensuring that EE measures are implemented before considering additional energy sources

Retrofit: Upgrade existing infrastructure and buildings with energy-efficient technologies

Promote Behavioral Change

Educate! Raise awareness events, incentives, info days for citizens and businesses

How to best incorporate the EE1st principle



Horizontal energy efficiency actions

Incorporate Energy Audits

Identify energy-saving opportunities and implement cost-effective efficiency measures

Deploy Smart Energy Management Systems

To enable real-time energy monitoring, optimization, and demand management across residential, commercial, and municipal sectors within the region

Designing the monitoring and evaluation of actions



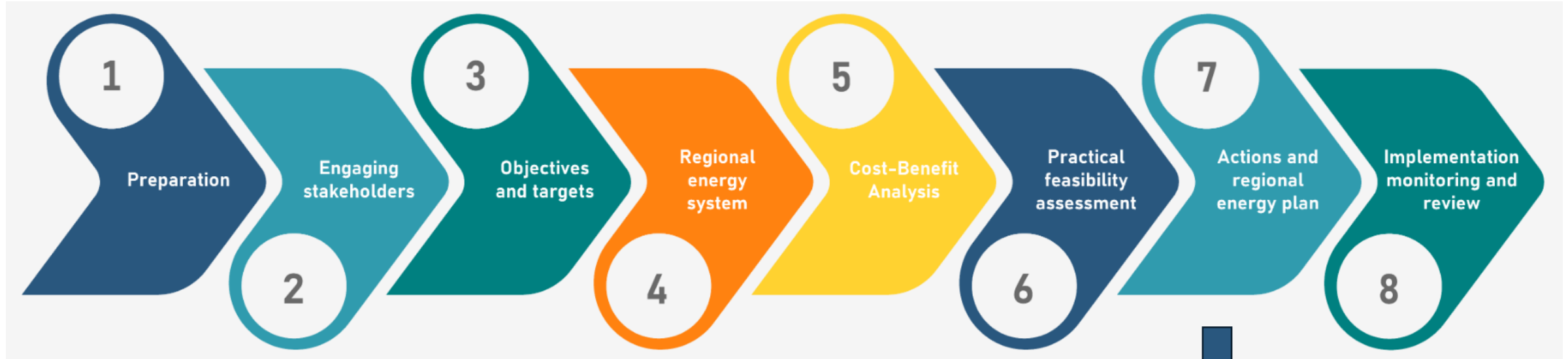
Designing the monitoring and evaluation of actions

Key points to be included in the monitoring plan

1. Set people in charge for overseeing the monitoring process.
2. Define the parts of the plan to be monitored
3. Set a time schedule for monitoring the actions and the energy inventory
4. Identify data sources
5. Make conclusions and corrective actions
6. Disseminate the results to the stakeholders and discuss for new decisions



Designing the monitoring and evaluation of actions



Regio1st Monitoring Tool

Designing the monitoring and evaluation of actions

Actions	Status (drop-down list)	Duration				Budget	
		Estimated start	Actual start	Estimated end date	Actual end date	Estimated budget (Euros)	Cost spent so far (Euros)
Energy upgrade of the 1st, 3rd and 6th highschool of Municipality of ***	Completed	February 2020	18/2/2020	August 2020	1/10/2020	300.000	300.000
Thermal insulation in selected public buildings in the region of ***	Ongoing	June 2022	1/7/2020	December 2023	ongoing	1.000.000	700.000

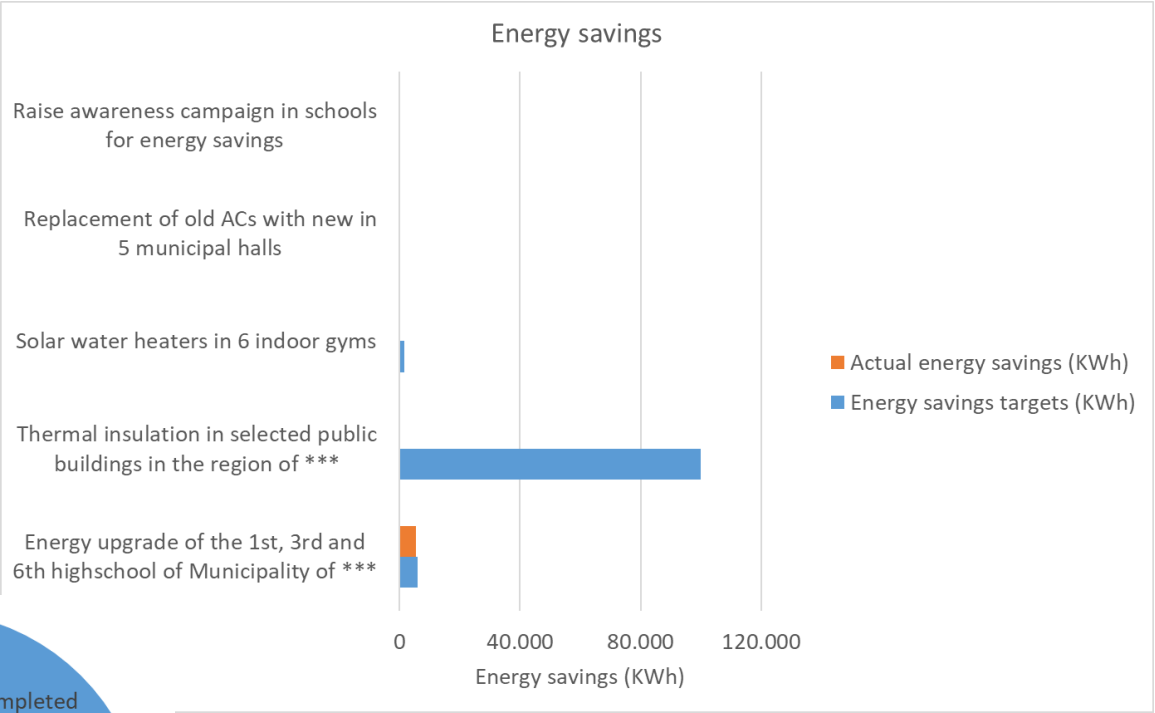
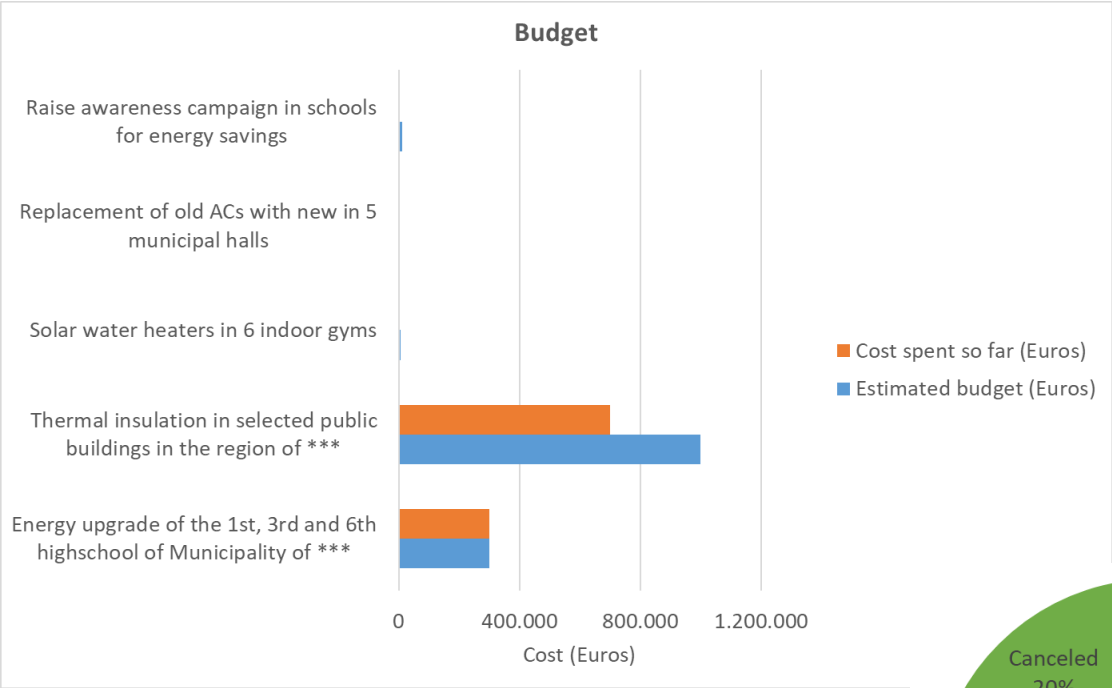
Designing the monitoring and evaluation of actions

Actions	Energy savings		RES production		Other impacts e.g new jobs	Main barriers (if any)
	Energy savings targets (KWh)	Actual energy savings (KWh)	RES production targets (KWh)	Actual RES production (KWh)		
Energy upgrade of the 1st, 3rd and 6th highschool of Municipality of ***	6.000	5.500				delays due to bureaucracy issues
Thermal insulation in selected public buildings in the region of ***	100.000				-some employes already state the improvement in thermal comfort -three municipal halls reckon that the last winter they used less the heating system	

Designing the monitoring and evaluation of actions

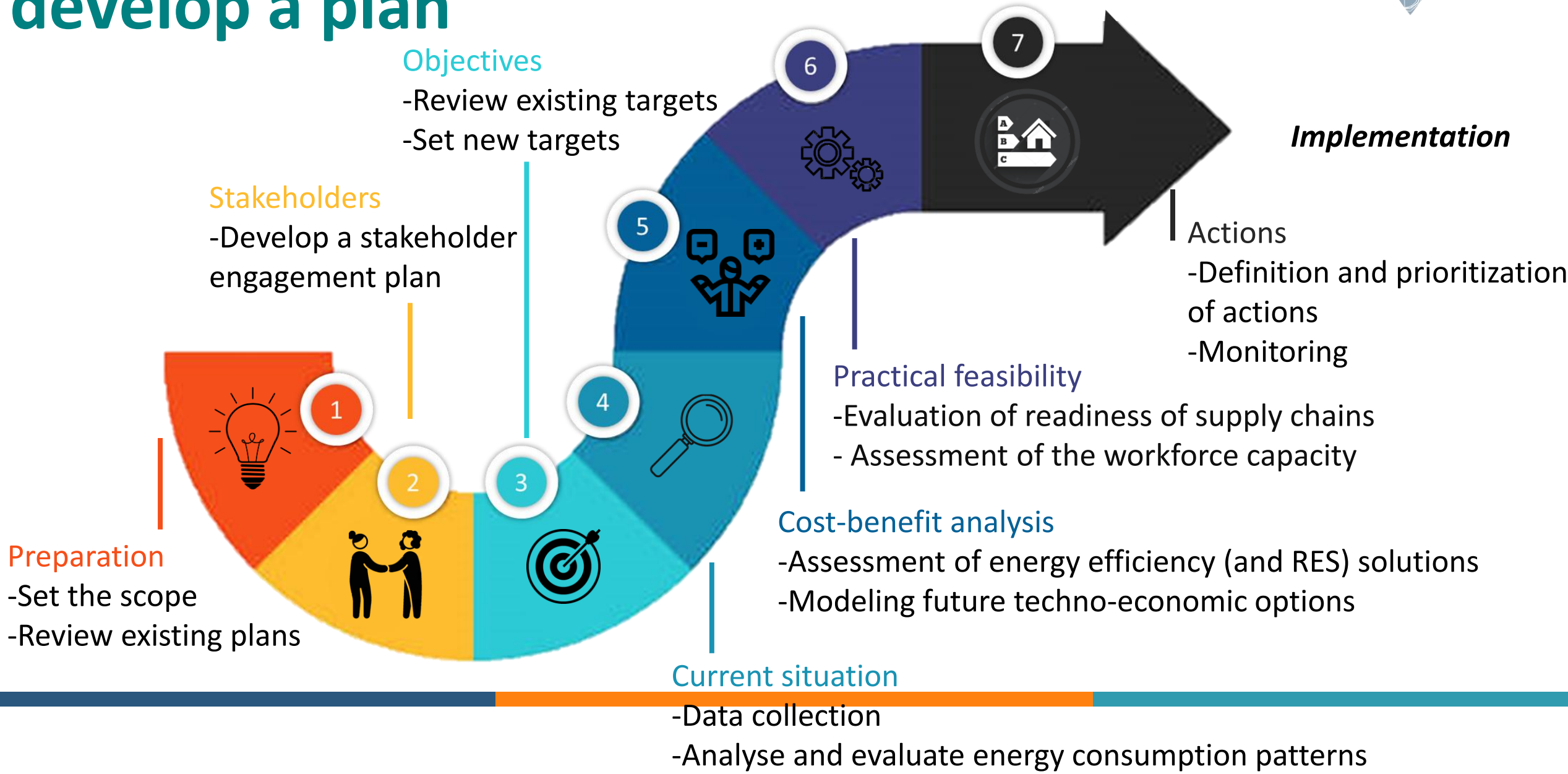
Actions	Indicators					
	Type of key indicator monitored	Achievement until now	Type of key indicator monitored	Achievement until now	Type of key indicator monitored	Achievement until now
Energy upgrade of the 1st, 3rd and 6th highschool of Municipality of ***	Number of new heating systems (natural gas)		3 Double glazing	150 m ²	Number of lamps replaced with LEDs	52
Thermal insulation in selected public buildings in the region of ***	Number of buildings with new insulation	23/35				

Designing the monitoring and evaluation of actions



Status of Actions

Putting all the stages together to develop a plan



Thank you!

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[Get Started | Regio1st-planning-framework \(fedarene.org\)](https://fedarene.org/regio1st-planning-framework)



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