

SPACE PARTNERSHIP UNDER HORIZON EUROPE

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1. Background

- 2. Scope of the space partnership
- 3. Governance
- 4. What's in it for me?
- 5. Next steps



1. Some background information

A LONG PROCESS (1/2)

- 2016 2018 : STEPP process to collect views of industry, RTOs and academia on high level topics for inclusion in the SRIA for Horizon Europe (HE)
- Draft SRIA ToC to support working groups and discussions in the Commission led consultation platform structured around 4 topics:
 - Governance of space R&I under HE
 - Synergies
 - Access to Space
 - Satellite systems
- Strategic Research & Innovation Agenda endorsed in 2019 to foster competitiveness of space systems, reinforce the capacity of the EU to access and use space and to develop synergies with other actors outside the space sector and a chapter on space science
- 2020 : COM presents a discussion paper on the governance of space R&I and proposes a co-programmed partnership between COM and the private sector to implement the SRIA

A LONG PROCESS (2/2)

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- The COM-led consultation platform had some 'construction errors':
 - Only a limited number of national space agencies and MS were invited (FR, IT, ES, D)
 - Full HE Programme Committee not involved in the entire process
 - Budget / scope of the space partnership not specified
 - Role of ESA unclear (observer?, technical expert?)

→ Full HE Programme Committee asked to be involved in all steps of the process possibly leading to a co-programmed partnership

- April End 2021 : 6 ad-hoc meetings between COM HE PC to discuss all elements of the space partnership proposal (common understanding)
- 2022: meetings between COM and the private sector represented by SME4SPACE, Eurospace, EARTO, ESRE and EASN to establish the space partnership 'Globally Competitive Space Systems'
 End 2022 : principal agreement between COM & private sector to go ahead with the launch of the space partnership

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2. Scope of the space partnership



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SCOPE OF THE SPACE PARTNERSHIP

Only a limited number of sections from the Strategic Research & Innovation Agenda (SRIA)

- Link with the budget the Commission can dedicate to the partnership
- A lengthy process while the MFF / HE comitology started in 2021 ... so did other partnerships under Horizon Europe (first wave)
- Private sector to get organised and to adopt the new way of working
- A pilot for the next MFF with broader scope and higher budget

SRIA SECTIONS COVERED BY THE SPACE PARTNERSHIP

- Foster competitiveness of end-to-end systems and associated services
 - Telecommunication systems
 - Earth Observation
 - Ground Segment aspects
 - Data Chain aspects
- New industrial processes and product tools
 - Digitalisation and automation
 - MAIT at larger-scale
 - Lean qualification processes
- Innovation for launchers competitiveness targeting initial operational capabilities by 2030
 - Smart technologies (higher autonomy, in-flight configurability, modular wireless avionics with smart sensors)
- Fostering and enabling new commercial space transportation solutions
 - New space transportation services & concepts
 - Technologies to improve versatility, cost reduction & flexibility
 - New services requiring re-entry
 - Standardisation of services and actions promoting the use of COTS components

OBJECTIVES OF THE SPACE PARTNERSHIP

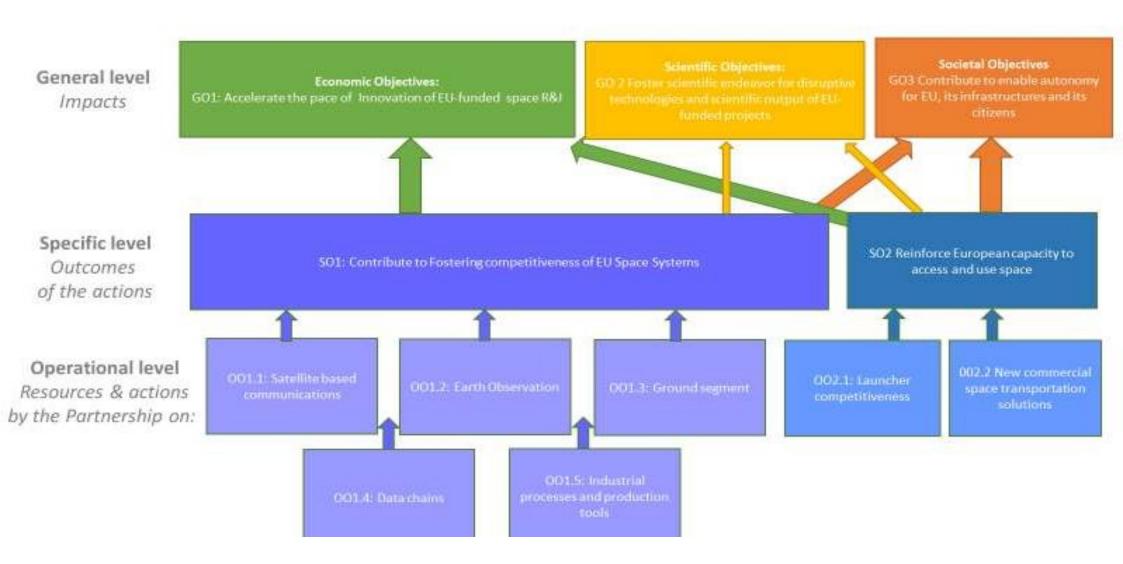
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General objectives

- Accelerate the pace of innovation (technological & ec. objectives)
- Foster scientific endeavour for disruptive technologies and scientific output of EU-funded projects (scientific objective)
- Contribute to enable autonomy for the EU, its infrastructure and its citizens (societal objective)
- Specific objectives
 - Foster global competitiveness and shorten time-to-market of EU space systems
 - Reinforce European capacity to access space
- Operational objectives
 - Contribute to risk reduction in technology building blocks, products and services for satellite communication
 - Contribute to risk reduction in products and services for EO
 - Contribute to risk reduction in products and services of ground segment
 - Improve data chain links to enable satellite missions with high productivity, growing data and service requirements
 - Develop new industrial processes and production tools
 - Improve launcher competitiveness by smart technologies
 - Foster and enable new commercial space transportation solutions

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INTERVENTION LOGIC



CONTRIBUTIONS BY EU & THE PARTNERS

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- ➤ The EU dedicates up to 150M€ to actions within the scope of the Coprogrammed European Partnership
- ➤ The 150M€ becomes available for actions (calls) in 2025 to 2027
- The Partnership duration is for the period 2023 2030 (if the MOU between the Union and the Partners is signed beginning of 2023)
- ➤ The private partners envisage to dedicate up to 180M€ in research, innovation and other activities in the area of the Co-programmed partnership engaging their constituent and affiliated entities to make such investments
- > Contributions by the private partners take the form of:
 - In-kind contributions to the Actions funded by the Union = eligible costs minus Union contribution
 - In-kind contributions to Additional Activities = activities which contribute to achieving the objectives of the partnership, including R&I at higher TRL and/or to ensure demonstration, market, regulatory and societal uptake but are not covered by EU funding
 - Investments in operational activities that go beyond the work foreseen in the SRIA

= Leverage of the private partners to the partnership

ADDITIONAL ACTIVITIES & INVESTMENTS (1/2)

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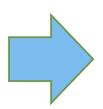
> Examples of in-kind Additional Activities:

- Demonstrator activities
- Test infrastructures
- System integration of technologies and solutions
- R&D technology activities
- Materials certification and characterisation
- Numerical modelisation and test
- Proof of concepts development
- Pre-commercial activities
- Dissemination and exploitation
- ...
- > Examples of investments in operational activities:
 - Improvement and maintenance of research labs & infrastructures
 - Training programmes for workers
 - Client and user SW integration
 - Pre-commercial trials and other activities for market introduction
 - Commercialisation including IPR related activities and market uptake/studies
 - Impact studies
 - ...

ADDITIONAL ACTIVITIES & INVESTMENTS (2/2)



- > The aim is to go higher, but the final workplan will decide
- Activities of SME4SPACE are also accounted
- The contributions of our Members should be mentioned in the Additional Activities Plan (AAP) to be completed by the start of 2023 and to be approved by the Partnership Board
- > Each year the AAP is evaluated and helps to demonstrate the leverage



ESA-projects, projects of national agencies, H2020/HE projects, national programmes, etc. in domains covered by the partnership

→ INPUTS OF S4S MEMBERS REQUESTED BY 16 JANUARY 2023

AAP REPORTING TEMPLATE (EXAMPLES FROM CIRA)

Additional Activities Plan reporting template

European Partnership for Globally Competitive Space Systems

The aim of this Additional Activities Plan is for the Partnership Board to annually list the Additional Activities they want to steer R&I investments towards to achieve partnership's objectives. The Additional Activities listed here would be the one available in the next annual reporting template for Additional Activities.

In order for the costs to be accounted for as in-kind contributions, the underlying additional activities shall be carried out in the European Union or countries associated to Horizon Europe.

	Year :	2023
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	Total annual envisaged in-kind contributions in Additional Activities by the Partners other than the	

Union:

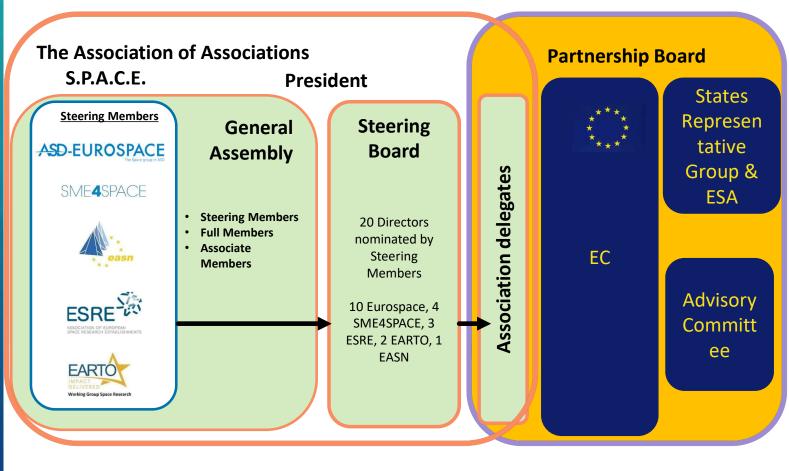
[...] M€

Category [please select]	Envisaged Additional Activities type (to be selected from "Additional Activities list" tab)	Description of the Additional Activities ([Free Text] Please provide more information on the envisaged Additional Activities)	Link to partnership's objectives / KPIs (to be selected from SRIA/MoU)	[Optional] Link to partnership's project/ topic (to be selected from HE Work Programme)	Estimated annual value [Free text] Per category
		Small technology demonstrator for re-entry of aerodynamically controlled stage, international cooperation with Southern Launch (Australia)	002.1, 002.2		~ 2m€/year in 2023 and expected until 2025
1. Support to additional R&I	Complementary research and innovation activities with a clear link to the Strategic Research and Innovation Agenda but not funded by Horizon Europé	Manufacturing of Composite Structures in Space, TRL 4 to TRL 6 activities	001.5		~250k€/year in 2023 and expected until 2025
 Demonstrators Creating new business opportunities 					
5. Training & skills development 6. Contribution to the					
development of new standards, regulations and policies					
7. Supporting ecosystem development					
8. Communication, dissemination, awareness raising, citizen engagement					

3. Governance

GOVERNANCE

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Association & Partnership

S.P.A.C.E. PURPOSE & ACTIVITIES

- Space Partnership Association for the Competitiveness of Europe
 - To engage the co-programmed partnership with the COM
 - To elaborate multi-annual innovation roadmaps addressing the scope of the partnership
 - To monitor the implementation of the roadmaps
 - Represents the private sector at the Partnership Board
- How the Interests of SMEs are safeguarded in S.P.A.C.E.
 - 20% of total votes in Steering Board for SME4SPACE
 - No association can veto or force strategic decisions against the others
 - At least 3/5 Steering Members have to approve roadmaps, representation at Partnership Board, special powers of S.P.A.C.E, nomination of the President
- S.P.A.C.E. signs on behalf of the private sector the MOU on the coprogrammed partnership for space with the European Commission
- Statutes of S.P.A.C.E. approved by private partners, but S.P.A.C.E. not yet created (lead party Eurospace)

PARTNERSHIP BOARD

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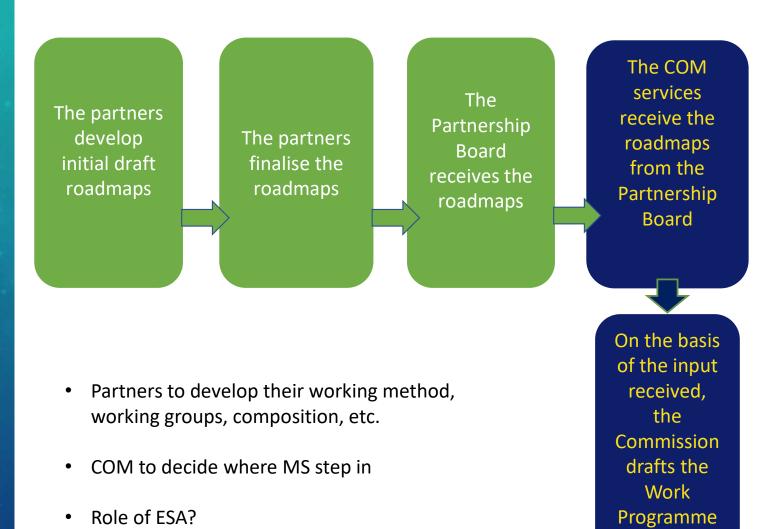
Partnership Board

- Main forum for dialogue and steering
- Monitoring of KPIs (realisation of objectives)
- To endorse the roadmaps created within S.P.A.C.E.
- Co-chaired by COM and an Association delegate
- Equal number of members private sector and COM
- Advisory Committee and SGR as observers (on invitation)
- Adequate representation of SMEs
- Secretariat : DG DEFIS
- DG Defis to communicate its requirements regarding the delegation of the private sector
- If the space partnership is launched beginning of 2023, a first meeting of the Partnership Board will take place soon after with following agenda:
 - Approval of AAP 2023
 - Approval of Rules of Procedure
 - Way forward

FOCUS ON ROADMAPPING



ROADMAP MODUS OPERANDI (DRAFT)



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(comitology)

4. Why bother?



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ADDED VALUE

- Direct access to Horizon Europe programming : opportunity "to set the agenda" and define the topics of the calls for WP 2025 2027
- Multiannual road mapping (less scattered initiatives and funding)
- Leveraging public and private R&I through dialogue, targeted approach
- Collaborative approach: industry, SMEs, RTOs, academia (new way of working)
- Concept of partnership to be scaled up for next MFF taking into account lessons learned, experiences, etc.
- On the other hand: effort vs. limited budget and scope?



5. Next steps

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NEXT STEPS

- 24 January 2023: Signature event @ Space Policy Conference between Th. Breton and the 5 private partners to officially kick-off the partnership?
- Q1 2023: 5 founding members (or S.P.A.C.E.) to submit a proposal for the management and the coordination of the space partnership
 - WP 2023 2024 foresees a budget of ± 1.5M€ for the set-up and initial operation of the space partnership
 - Stakeholder consultation
 - Roadmap definition
 - Dissemination activities
 - Community building
- ➢ Q1 2023 : First Partnership Board meeting → Members' input requested for the Additional Activities Plan 2023 by 16 January 2023
- Second half of 2023: start consultation round with stakeholders

CONCLUSIONS

- The space partnership proposes a new way of working between the private sector and the COM in the field of space R&I
- To be placed in a broader context of enhanced and formal consultation of the stakeholders:
 - Parts of the SRIA \rightarrow co-programmed partnership
 - Other parts of SRIA → consultation process under STARS*EU
- New step for SME4SPACE and its Members in the programming of space R&I under Horizon Europe
- > The proof of the pudding is in the eating

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SME4SPACE presentation



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