Digital Europe
and Future Role of DIHs/S3

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DIGITAL IN MFF 2021-2027

Objective: *ensure that **Europe <u>drives</u> the digital transformation** of society and economy, bringing **benefits to <u>all</u> citizens and businesses***

More specifically to:

- Reinforce the EU's digital capacities
  (computing, data, cybersecurity, AI,..)

- Ensure their widest possible roll out and maximise their benefits
  (to all citizens and businesses including SMEs in all regions in all sectors)

- Prepare for and lead the development of next generation technologies

- Build a world-leading connectivity infrastructure

DIGITAL IN THE NEXT MFF: OVERVIEW

Digital Europe: Capacities & roll out

1. High Performance Computing
2. Artificial Intelligence (AI)
3. Cybersecurity
4. Advanced digital skills
5. Digital transformation and interoperability

€9.2 billion

Digital in Horizon Europe R&D&I

1. Digital under "global challenges"
   - Digital and industry cluster
   - Digital in other clusters - health, mobility, energy, environment,..
2. FET Open under EIC
3. Research Infra in Open Science

> Current budget (~14 B€)

Connecting Europe Facility - Digital Connectivity

- 5G roll out
- BB 4EU, Connecting communities
- Synergies with Transport /Energy

€3 billion

Creative Europe MEDIA

- Distribution of works
- Creation

€1.1 billion
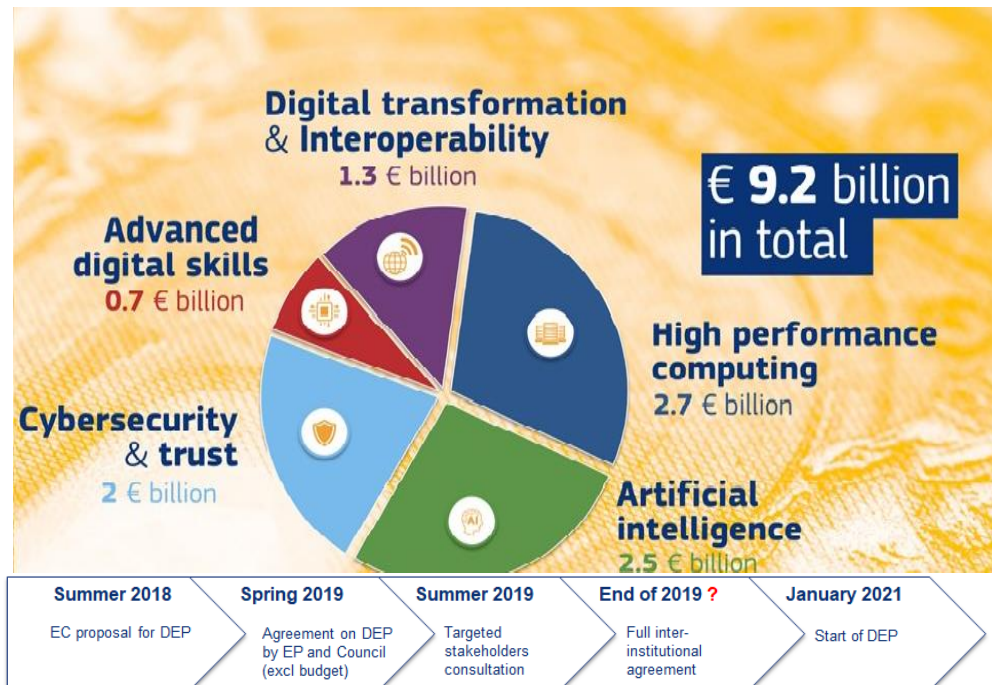
Funding the digital transformation

	Research & Innovation	Strategic capacities (Computing, data,..)	Communication Infrastructure, Broadband, etc.	Human capital	Deployment
National regional and local	Cohesion	Cohesion	Cohesion	Cohesion	Cohesion Agri. funds
EU wide Collective effort	Horizon Europe	**Digital Europe**	Connecting Europe Facility 2,0	**Digital Europe**, Horizon Europe	**Digital Europe**
Financial Instrument	InvestEU	InvestEU	InvestEU	InvestEU	InvestEU

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Digital Europe Programme

* Funding programme focused on building the strategic digital capacities of the EU and on facilitating
the wide deployment of digital technologies, to be used by Europe's citizens and businesses

What?

Why?

Digital transformation & Interoperability
1.3 € billion

€ 9.2 billion in total

Advanced digital skills
0.7 € billion

High performance computing
2.7 € billion

Cybersecurity & trust
2 € billion

Artificial intelligence
2.5 € billion

Summer 2018	Spring 2019	Summer 2019	End of 2019 ?	January 2021
EC proposal for DEP	Agreement on DEP by EP and Council (excl budget)	Targeted stakeholders consultation	Full inter-institutional agreement	Start of DEP

- Compete globally
- Achieve scale through collective co-investments
- Regain control over Europe's value chains and ensure Europe's strategic autonomy
- Better address Europe's economic and societal challenges
- Ensure broad take-up of digital technologies across all regions of EU
- Address difficulties SMEs face to acquire/access latest technologies and skills

Where do we stand today?
Areas of public interest

Inadequate uptake of digital solutions

- Europe slow
  in adopting and diffusing
  digital innovations

- Adoption uneven
  between Member States

- Solving the issue only at national level
  likely lead to fragmented
  approach due to different starting
  points

Adoption of Digital Technologies by Businesses
Spread between Member States

Categories (top to bottom): eInvoices, Enterprise resource planning…, Advanced cloud, Electronic supply chain, Analytical CRM, RFID, Big data

Axis: 0%, 19%, 38%, 56%, 75%

■ Best Performing Member State
■ Worst Performing Member State

- Public sector does not play its role of "first mover" in deploying latest technologies to offer best services to citizens and business

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EUROPE IS ONLINE
81% of EU citizens use the Internet regularly

GROWTH
Investment in ICT & competitiveness
30% of all economic growth in the EU for 2001-2011 can be attributed to ICT investment

NEW BUSINESS MODELS
New business models, e.g. online platforms (e.g. amazon)
Enable new useful interactions; **70% of "unicorns"** are online platforms

JOBS
+ 2.7 million new ICT specialist posts in the EU (since 2005)
More than 50% of companies in the EU trying to recruit ICT specialists

CROSS-BORDER TRADE
E-commerce potential
E-commerce has been growing **by 20% a year for a decade;** 8% of the world's retail spending

Building essential digital capacities

High Performance Computing
- Acquire exascale and new petascale machines while upgrading existing supercomputers
- Develop European access to supercomputers and federate European HPC and data resources
- Widen the use of HPC and applying it across sectors

Artificial Intelligence
- Establish EU-wide common data spaces
- Develop Large-scale Testing and Experimentation Facilities
- Scale up the European AI platform

Cybersecurity
- Key capacity building: the cybersecurity shield
- Accelerate cybersecurity certification
- Widen the deployment of cybersecurity tools
- Support the NIS Directive implementation

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Building essential digital capacities (cont.)

Advanced Digital Skills

- Develop Master's programmes or modules in key capacity areas
- Develop short term training courses in key capacity areas
- Support job placements in key capacity areas
- Maintaining and populating the platform for Skills and Jobs
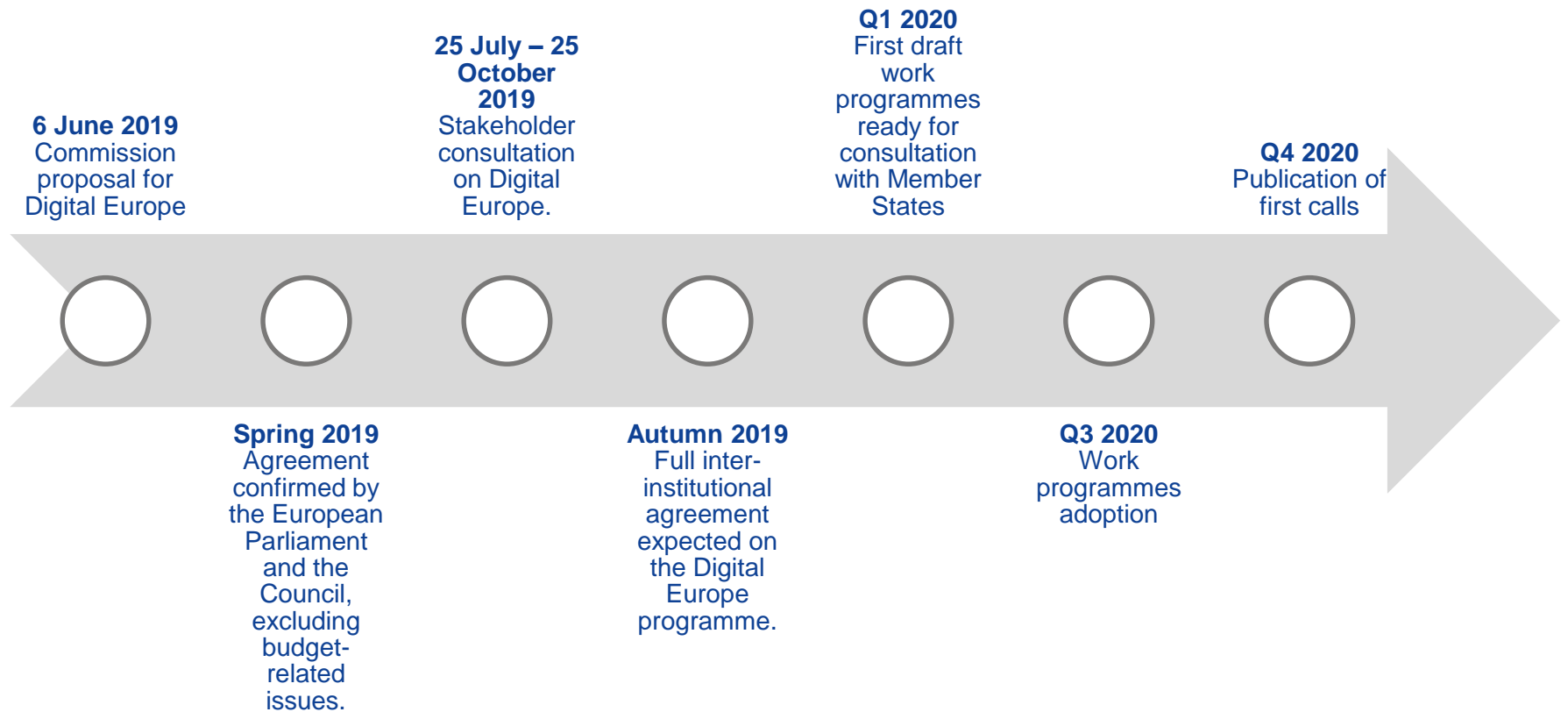
Accelerating the best use of technologies

Aiming for high-impact deployment
- Climate & environment
- Modern public services
- Technologies supporting deployment of digital services

Widening the best use of digital technologies
- Building trust for the digital transformation.
- Language Technologies
- Digital Transformation of Learning and Education.

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Indicative timeline

6 June 2019
Commission proposal for Digital Europe

25 July – 25 October 2019
Stakeholder consultation on Digital Europe.

Q1 2020
First draft work programmes ready for consultation with Member States

Q4 2020
Publication of first calls

Spring 2019
Agreement confirmed by the European Parliament and the Council, excluding budget-related issues.

Autumn 2019
Full inter-institutional agreement expected on the Digital Europe programme.

Q3 2020
Work programmes adoption

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Thank you !

#DigitalEurope

http://ec.europa.eu/digital-europe