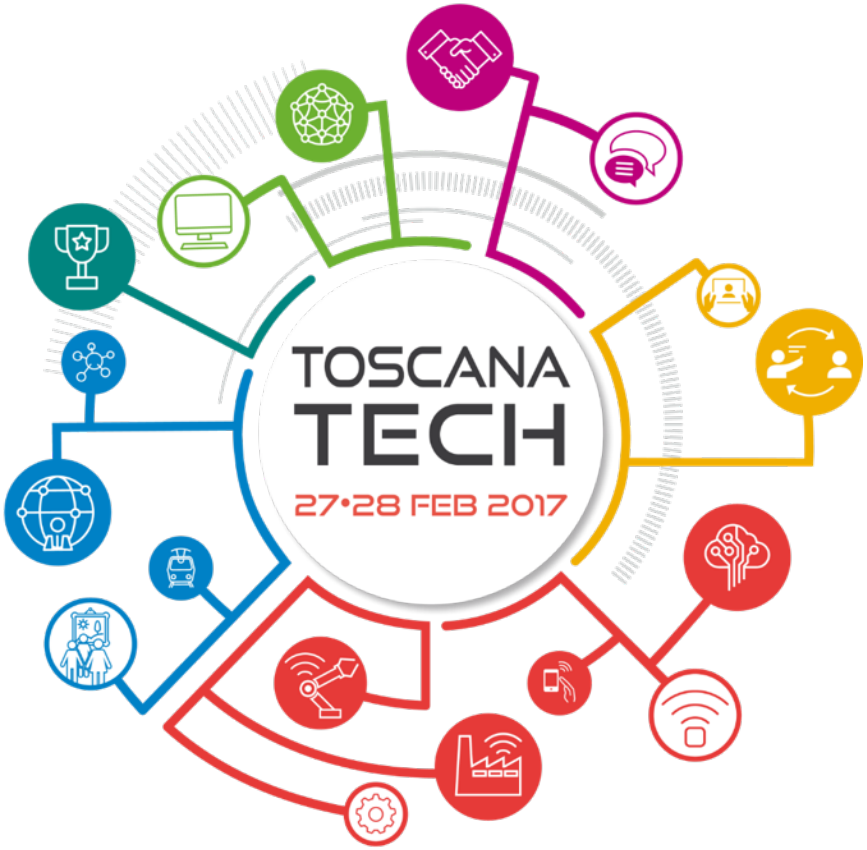
POR CreO
PROGRAMMA OPERATIVO REGIONALE CRESCITA e OCCUPAZIONE

REPUBBLICA ITALIANA



Firenze

Palazzo dei Congressi
27 Febbraio 2017

BASQUE INDUSTRY 4.0

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GRUPO spri TALDEA

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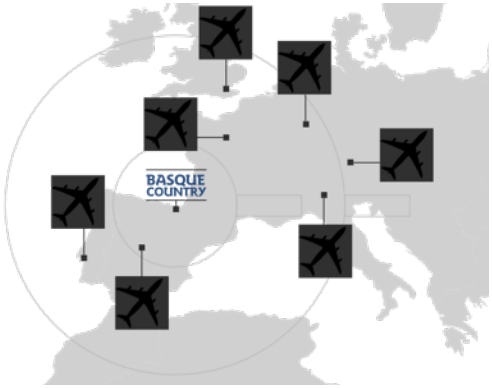
CORRIERE DELLA SERA
La libertà delle idee

Basque Country



INDUSTRIAL REGION

€32,500
GDP per capita
122% (UE28=100)

22.8%
Industrial GDP
(EU28=19.3%)

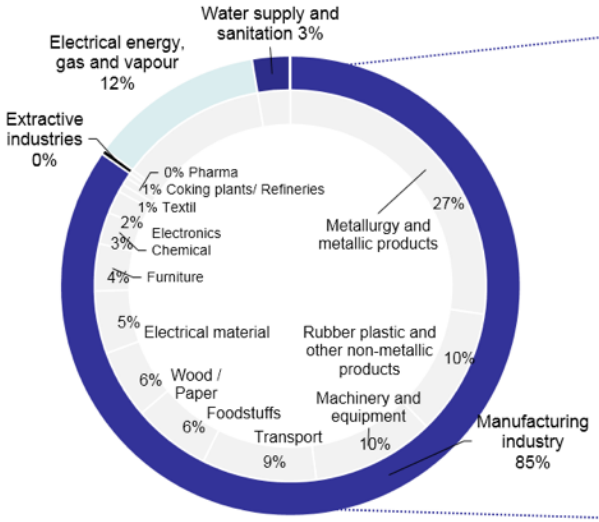
128.5
Productivity per employee

31.9%
Exports to GDP ration

2.09%
R&D expenditure on GDP

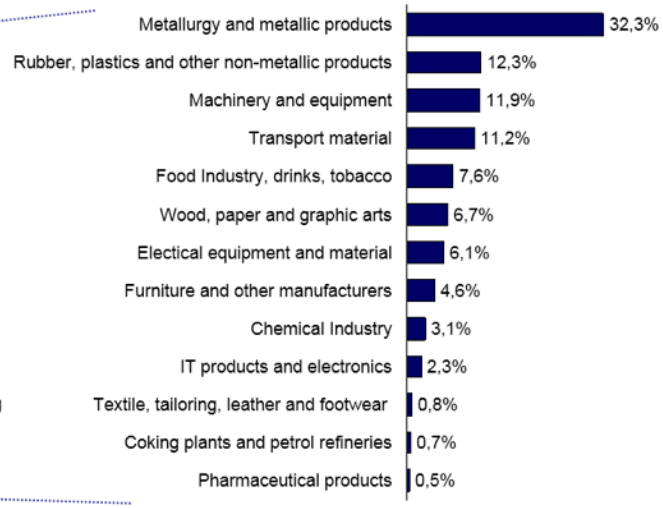
30,000
People in R&D

GAV Distribution by sector (%, 2012)*



(*) basic prices and current euros (base 2010)
Source: Eustat

Distribution of the manufacturing GAV by activities (%, 2012)*



(*) basic prices and current euros (base 2010)
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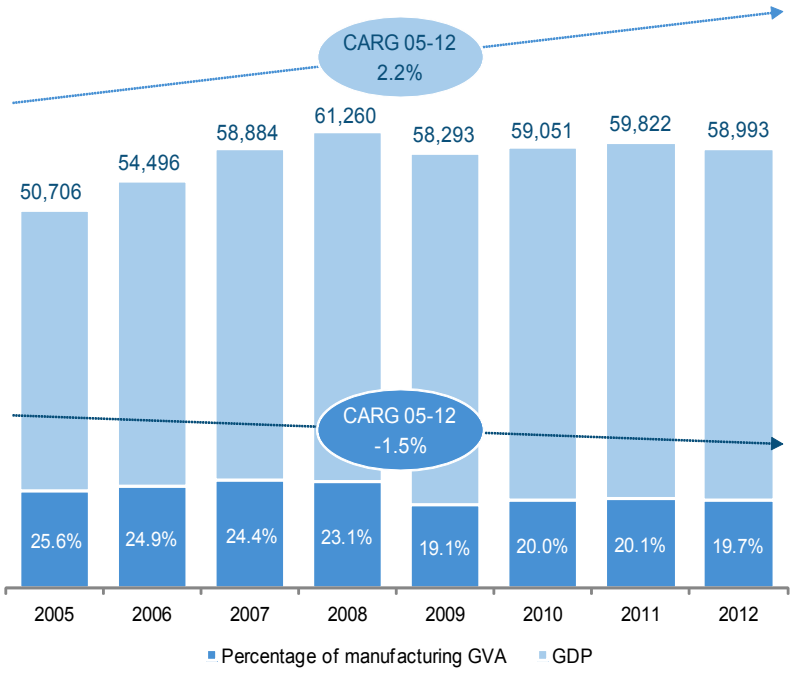
Basque Country

INDUSTRIAL POLICY

The Basque Country is usually seen as a successful industrial trasnformation and innovation upgrading

But…in 2014, a moment of reflection and change to align Basque industry with a strategy of re-industrialization… through the upgrading and focusing on the higher added value activities

Evolution of manufacturing's share of Basque GDP (Millions of current Euros, %, 2005-2012)*

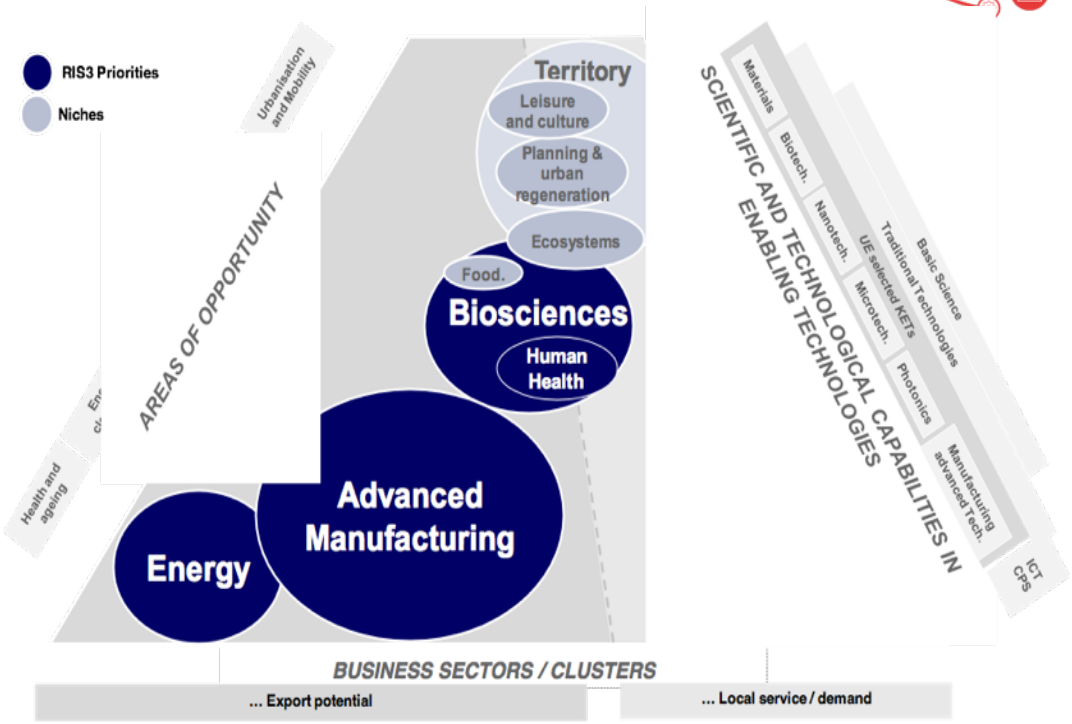


6% less of manufacturing share in GDP

Industry 4.0.: the strategy

BASQUE COUNTRY'S RIS3

Priority domains are a combination of technologies, products, processes and services from the different sectors and knowledge areas to give response to the opportunity areas.



RIS3 strategy is a natural extension of Basque historical policies in this area.

- Basque Country has a long history defining economic development strategies over the last 35 years.
- Consecutive plans and strategies, responding to specific needs of each stage, have progressively sought modernization, competitiveness, specialization, diversification and sophistication of Basque economy.

Industry 4.0.: the strategy

ADVANCED MANUFACTURING is a multisector priority with plenty of economic agents to be taken into account

BASQUE INDUSTRY 4.0

"A main bet in the Basque Country's Industrial strategy".

Materials	Processes	Means	Systems
Materials and their transformation processes	Manufacturing processes	Products and production tools	ITC support equipment to optimize the manufacturing resources
Transformation of raw materials into materials suitable for use in manufacturing processes	Set of phases necessary for the transformation of raw materials	The means utilized for carrying out the various manufacturing processes	Intelligent support tools for design, development, production and integrated manufacturing management

Industry 4.0.: the strategy

Joining visions, steps and strategies requires a really intensive-cooperation driven process

Advanced Manufacturing Strategy Mision

To strengthen the position of the Basque Country as an economy with an industrial base through the promotion of knowledge intensive manufacturing

Strategic Objectives

SO1. To help and guide Basque companies towards more knowledge intensive manufacturing activities which have greater added value

Added Value

Integration of KETs

SO2. To promote multi-disciplinary and technological convergence in a structured fashion so as to develop *best-in-class* manufacturing capacities and solutions while optimizing existing resources

Global value chains– Cluster 2.0

SO3. To integrate local and international value chains to meet the challenges of Advanced Manufacturing using the sum of the particular capacities of each sector and its companies

Scaling Up

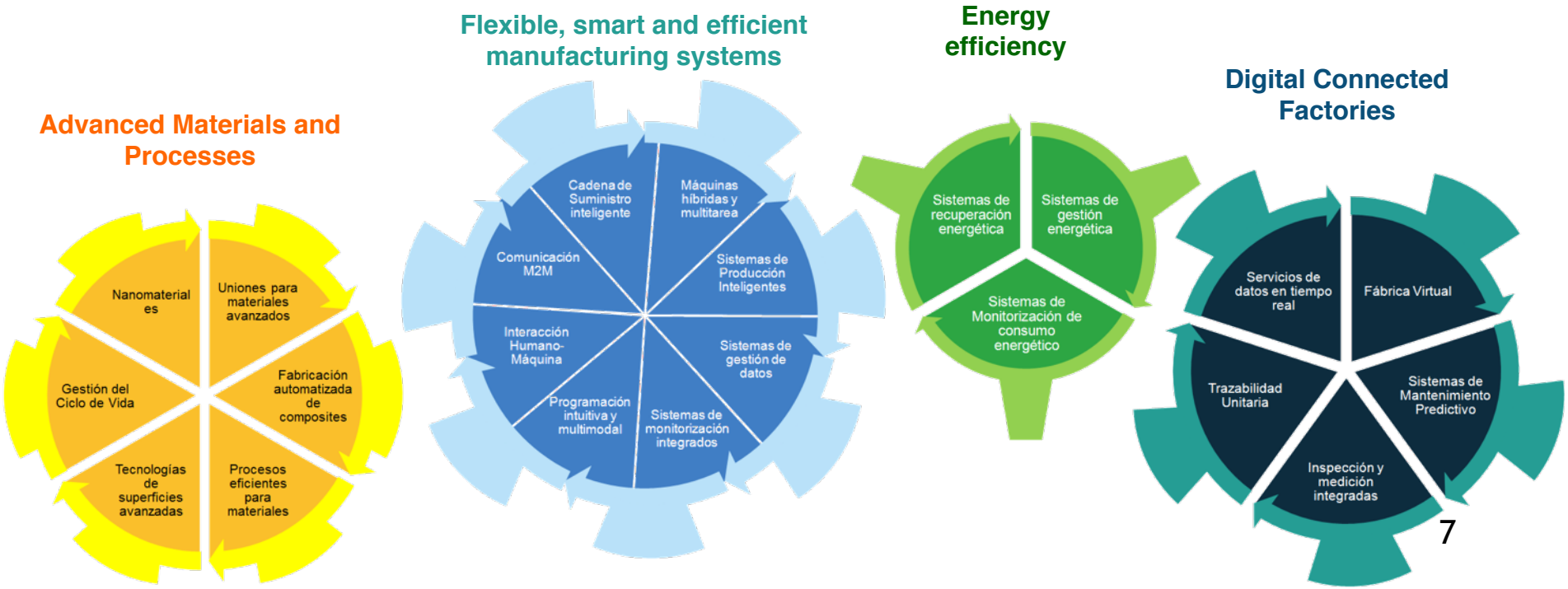
SO4. To foster collaboration and support as a catalyst for the industrialization of the results of R+D+i in Advanced Manufacturing

SO5. To support education and job training in technologies and management systems related to Advanced Manufacturing

Talent

Industry 4.0.: the Action plan

A commitment to technological development in Advanced Manufacturing is crucial to maintain competiveness in industry and to secure positioning in market niches with greater added value



Industry 4.0.: the Action plan

Policy Mix for Advanced Manufacturing Strategy

1. Support for scientific-technological Agents within the Manufacturing Community
2. Support for Excellence in Basic Directed Research

3. Support for R+D projects: Strategic industrial research; Business product development R+D; Company start-up R+D
4. Help and support for the introduction of TEICs (Electronics, IT and Telecommunications Clusters)

5. Design and support for Advanced Manufacturing Centres (CFAs)
6. Setting up a network of show-rooms pilot plants

Generating Know-How KET (GC)

Technological Development (DT)

Industrial Scaling up (EI)

7. Help and support for design
8. Setting up Models of Advanced Management in companies

Non technological Innovation (INT)

Training and enablement (FC)

9. Training of high-level researchers
10. Training and enablement in design
11. Training and enablement in business models and manufacturing management (postgraduate in manufacturing)
12. Dual FP- (professional training)
13. Teaching and Learning Factories- CFAs

Dinamisation and Boosting(DI)

14. Clusters policy
15. Coordination with and participation in European R+D+I programs: *Basque Contact Points*
16. Advanced Manufacturing Steering Group

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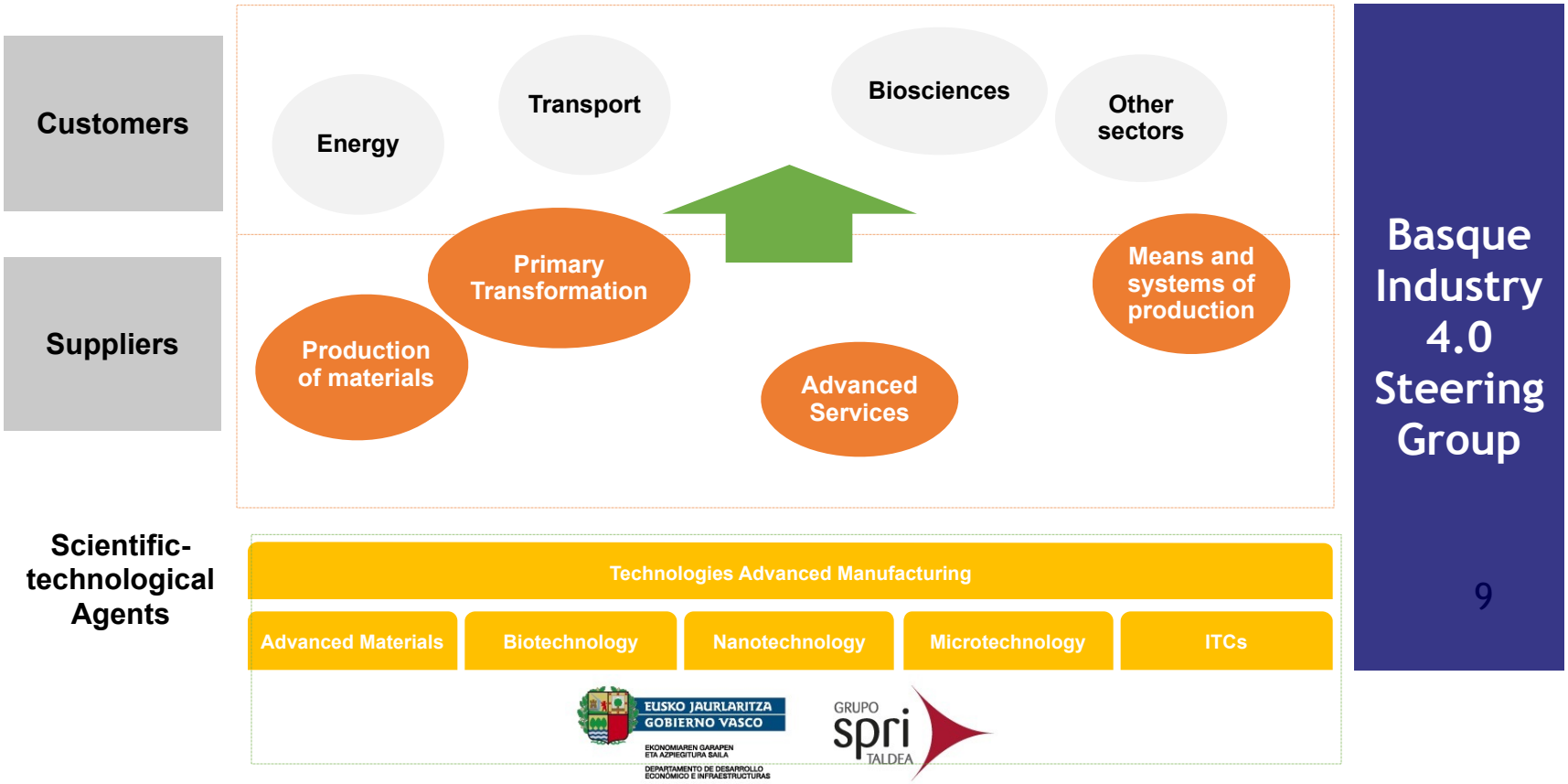
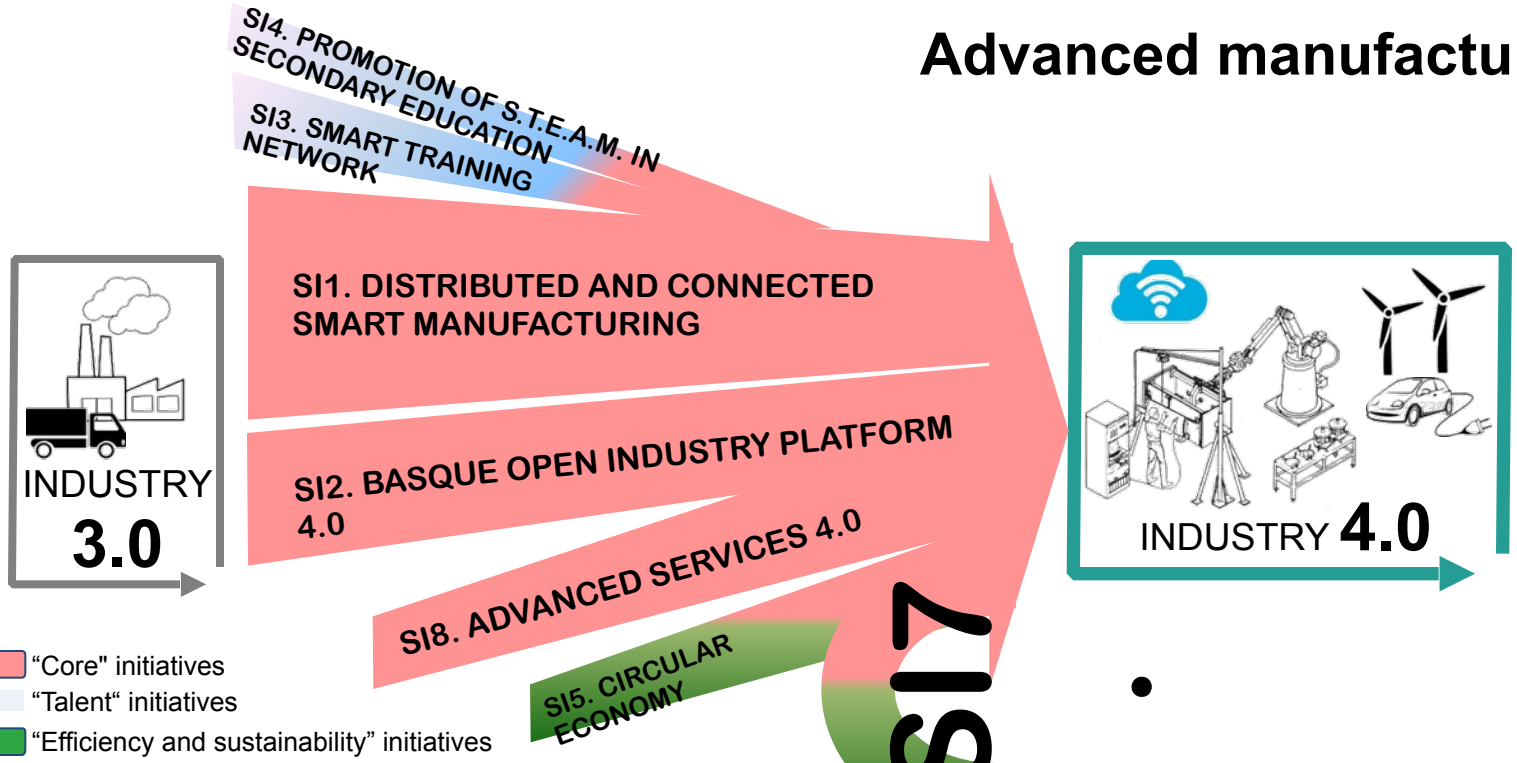
Industry 4.0.: Challenges

Coordination of a Manufacturing Community made up of clusters, scientific-technological agents and institutions around a public-private collaboration scheme: BASQUE INDUSTRY 4.0 STEERING GROUP



Industry 4.0.: Challenges

8 Strategic Initiatives capable of transforming Basque industry to "Basque Industry 4.0"



Industry 4.0.: Challenge

Interregional cooperation

VANGUARD INITIATIVE
NEW GROWTH THROUGH SMART SPECIALISATION

Catalonia
Lombardy

VANGUARD INITIATIVE
New growth through smart specialisation

Efficient and Sustainable Manufacturing

Basque Country
Scotland

VANGUARD INITIATIVE
New growth through smart specialisation

Advanced Manufacturing for Energy Applications in harsh environments

European Commission
SMART SPECIALISATION PLATFORM

Industry 4.0.: Next Steps

BASQUE DIGITAL INNOVATION HUB

- Advanced Automatization, Perception e Interaction
- Flexible Multifuntional Robotics

Flexible Robotics

- 3D-BIDE
- Additive Manufact.

Additive Manufacturing

Big Data Analytics

- Data Analytics for Manufacturing

New Materials

- New efficient manufact. processes

Smart and Connected Machines

Cybersecurity

- Cybersecurity

- KONPOFAB
- Manufact Cell 4.0
- Near Net Shape 4.0

R&D pilot projects	Product/process/service Pilots	Industrial Scaling	Showroom	Learning Factory

Thanks

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