



# MANUMIX

Interreg Europe



European Union  
European Regional  
Development Fund

## MANUMIX

*Monitoring & Indicators*

**Basque Country**



17<sup>th</sup> of April 2018

- I. General introduction: MANUMIX programmes
- II. Indicators of MANUMIX programmes
- III. Annexes

# I. General introduction: MANUMIX programmes

## General introduction: MANUMIX programmes

The Basque policy-instrument addressed by MANUMIX includes three RDI programmes.

All of them are oriented to support companies but the objective and the scope are different.

Name	Policy objective	Objective	Main target group	Sectoral scope	Year of launch	Annual budget
<b>Gauzatu Industria</b>  <i>Industrial investments</i>  <i>Loans</i>	Creation and development of technology or innovation-based SMEs	Supporting new investments in the following categories: IP, ICTs, land/natural assets, buildings, technical installations, machinery, tools	Industrial SMEs (including manufacturing) and SMEs of industry-related technical services	Industry <i>Advanced Manufacturing is the main domain</i>	2000	€28.0 millions 2017
<b>Basque Industry 4.0</b>  <i>Incorporation of ICTs</i>  <i>Grants</i>	Technological training and promotion of business R&D	Supporting business industrial research and experimental development projects for technology transference of ICTs from RTOs to manufacturing companies	Manufacturing companies	Advanced Manufacturing	2015	€2.2 millions 2017
<b>Hazitek</b>  <i>Collaboration &amp; R&amp;D investments</i>  <i>Grants</i>	Technological training and promotion of business R&D	Supporting business industrial research or experimental development projects, both of competitive (“small” projects; budget ≥€10k) or strategic (“big” projects; budget ≥€4M) nature	Companies <i>Large, SMEs and micro-companies</i>	Horizontal <i>Nevertheless, the 80% of the budget is for RIS3 priorities, including Advanced Manufacturing</i>	2016  <i>Relevant modification of previously existing 3 programmes that were merged</i>	€82.8 millions 2017

## **II. Indicators of MANUMIX programmes**

**Types of indicators and what & why**

**Towards monitoring at policy-mix**

## Indicators of MANUMIX programmes. Types of indicators and what & why

**The majority of Gauzatu Industria's indicators are monitored ex-ante; the ones that try to measure results or outcomes/impacts of the public intervention are gathered when the payment takes place.**

Yearly, result and outcome/impact indicators are estimated and compared with the expected objectives of the programme and the results of previous years.

All data are gathered through the reports (applications and justification) from the beneficiaries.

Indicators	Timing	Type	Nature	Composition	Source
Number of applications	Ex-ante	Effort	Quantitative	Simple	Applications
Number of approved projects		Effort	Quantitative	Simple	Projects
Quality of approved projects		Effort	Qualitative	-	
Approved budget		Effort	Quantitative	Simple	
Repayable advances lent		Effort	Quantitative	Simple	
Estimated induced investment		Result	Quantitative	Simple	
Estimated number of jobs created		Outcome/Impact	Quantitative	Simple	
Estimated number of jobs saved		Outcome/impact	Quantitative	Simple	
Executed expenditure	Interim	Activity	Quantitative	Simple	
Repaid loans		Activity	Quantitative	Simple	

## Indicators of MANUMIX programmes. Types of indicators and what & why

**Measuring result and outcome/impact indicators ex-post would improve the monitoring system of the programme.**

Indicators/What do we measure?	Why do we measure it?
Number of applications	To know if the programme is interesting for companies
Number of approved projects	To know the efforts made and if the required selection criteria are still adequate
Quality of approved projects	To ensure that public money has been well spent
Approved budget	To know the efforts that will be made and for financial management
Repayable advances lent	
Estimated induced investment	To estimate the additional effect of the intervention
Estimated number of jobs created	To estimate the impact of the intervention
Estimated number of jobs saved	
Executed expenditure	To know the efforts made and for financial management
Repaid loans	

*Would we measure something more?*



Satisfaction level	To know if the programme is relevant for the companies' needs, is enough and is comprehensive
Induced investment	To know the additional effect of the intervention
Number of product/process innovations	To know the results of the investments
Turnover increase/cost reduction	To know the impact of the public intervention (data gathered at the justification stage)
Number of jobs created	
Number of jobs saved	

## Indicators of MANUMIX programmes. Types of indicators and what & why

**Apart from monitoring the number of projects and budget-related indicators, Basque Industry 4.0 plays special attention to the technologies that are supported.**

Additionally to the monitoring system, there is a qualitative assessment done yearly based on meetings with participating companies and RTOs.

Indicators	Timing	Type	Nature	Composition	Source
Number of applications	Ex-ante	Effort	Quantitative	Simple	Applications
Number of approved projects		Effort	Quantitative	Simple	
Approved budget		Effort	Quantitative	Simple	
Approved grants		Effort	Quantitative	Simple	
Technologies expected to be used		Result	Qualitative	-	
Executed expenditure	Interim	Activity	Quantitative	Simple	Projects
Paid grants		Activity	Quantitative	Simple	
New technologies incorporated	Ex-post	Result	Qualitative	-	



## Indicators of MANUMIX programmes. Types of indicators and what & why

**Including outcome/impact indicators would be a major improvement that could be made to its monitoring system.**

In addition, measuring the innovations introduced would also be an improvement.

Indicators/What do we measure?	Why do we measure it?
Number of applications	To know if the programme is interesting for companies
Number of approved projects	To know the efforts that will be made and if the required selection criteria are still adequate
Approved budget	To know the efforts that will be made and for financial management
Approved grants	
Technologies expected to be used	To know the relevance of eligible technologies
Executed expenditure	To know the efforts made and for financial management
Paid grants	
New technologies incorporated	To know the effectiveness of the public intervention and to know the relevance of eligible technologies

*Would we measure something more?*



Satisfaction level	To know if the programme is relevant for the companies' needs, it is enough and it is comprehensive (done in an informal way)
Number of product/process innovations	To know the results of the technologies incorporated
Turnover increase/cost reduction	To know the impact of the public intervention

## Indicators of MANUMIX programmes. Types of indicators and what & why

**Hazitek has a wide range of indicators including outcome/impact ones, both of quantitative and qualitative nature, an even a composed indicator.**

Outcome/impact indicators are measured through an special monitoring system called SIME.

Indicators	Timing	Type	Nature	Composition	Source
Number of applications	Ex-ante	Effort	Quantitative	Simple	Applications
Number of approved projects		Effort	Quantitative	Simple	
Approved budget		Effort	Quantitative	Simple	
Approved budget in RIS3 priorities		Effort	Quantitative	Simple	
Approved grants		Effort	Quantitative	Simple	
Executed expenditure	Interim	Activity	Quantitative	Simple	Projects
Grants paid		Activity	Quantitative	Simple	
Scientific publications	Ex-post	Result	Quantitative	Simple	Projects
EPO/PTC patent applications		Result	Quantitative	Simple	
New/improved processes		Result	Quantitative	Simple	
New/improved products		Result	Quantitative	Simple	
SIME indicator	Ex-post	Outcome/Impact	Quantitative	Composed	SIME
Additional incomes		Outcome/Impact	Quantitative	Simple	
Jobs created/saved		Outcome/Impact	Quantitative	Simple	
Internationalisation degree		Outcome/Impact	Qualitative	Simple	
Competitiveness degree		Outcome/Impact	Qualitative	Simple	

## Indicators of MANUMIX programmes. Types of indicators and what & why

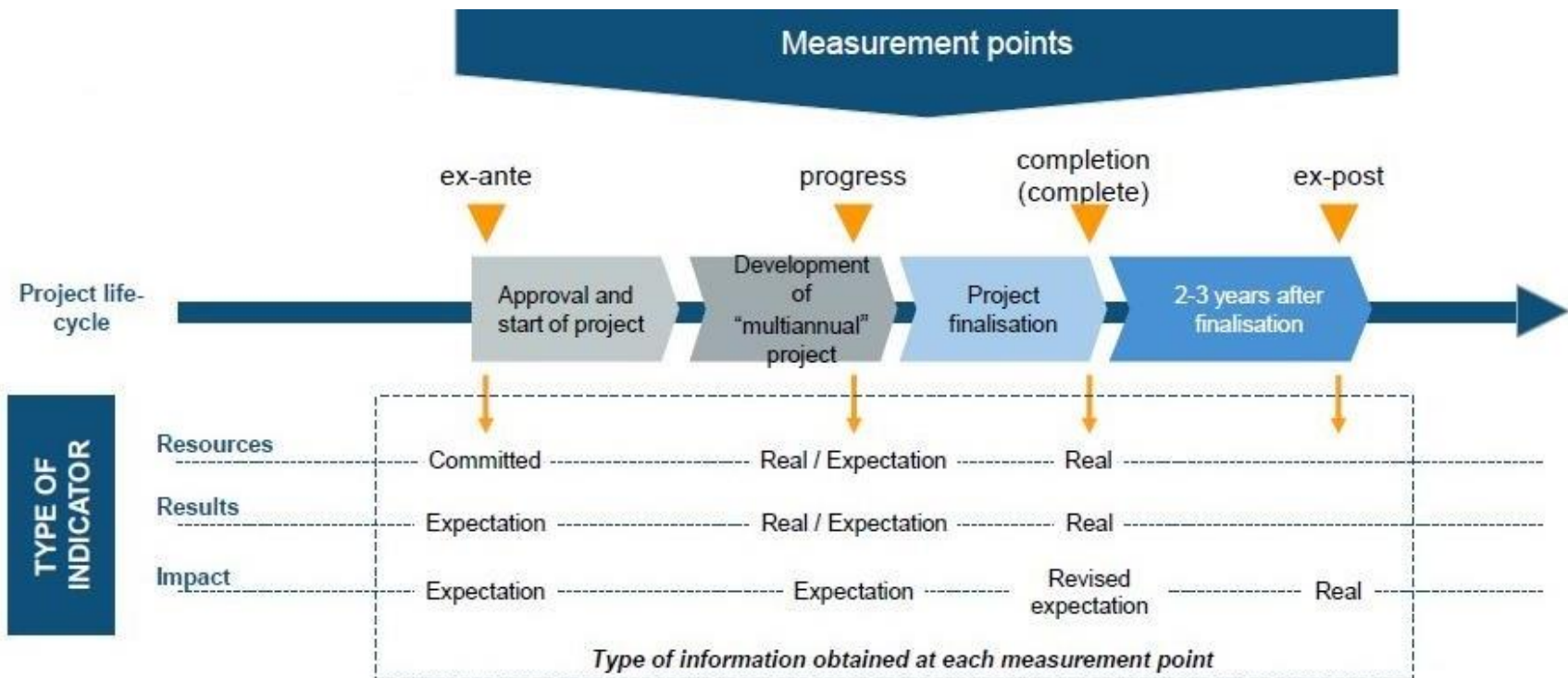
**Result indicators are compared to the expected objectives of the projects and to the results of previous years, but there are no goals at programme level.**

Indicators/What do we measure?	Why do we measure it?
Number of applications	To know if the programme is interesting for companies
Number of approved projects	To know the efforts that will be made and if the required selection criteria are still adequate
Approved budget	To know the efforts made, for financial management and to measure the contribution to the different priorities
Approved budget in RIS3 priorities	
Approved grants	
Executed expenditure	To know the efforts made and for financial management
Grants paid	
Satisfaction level	To know if the programme is relevant for the companies' needs, is enough and is comprehensive
Scientific publications	To know the effectiveness of the public intervention
EPO/PTC patent applications	
New/improved processes	
New/improved products	
SIME indicator	To know the impact of the public intervention
Additional incomes	
Jobs created/saved	
Internationalisation degree	
Competitiveness degree	

## Indicators of MANUMIX programmes. Types of indicators and what & why: SIME

**SIME is the monitoring system of the R&D programmes that belong to the Technology & Strategy Directorate of the Basque Government among which Hazitek is one of the most relevant.**

The information is collected from the beneficiaries at projects' different moments, including 3 years after the completion of the project. In this case, the data is gathered with questionnaires to a sample of beneficiary companies.



(\* ) Hazitek is the only MANUMIX programme included in SIME since Gauzatu Industria and Basque Industry 4.0 belong to other directorates (see annexes).

## Indicators. Towards monitoring at policy-mix level

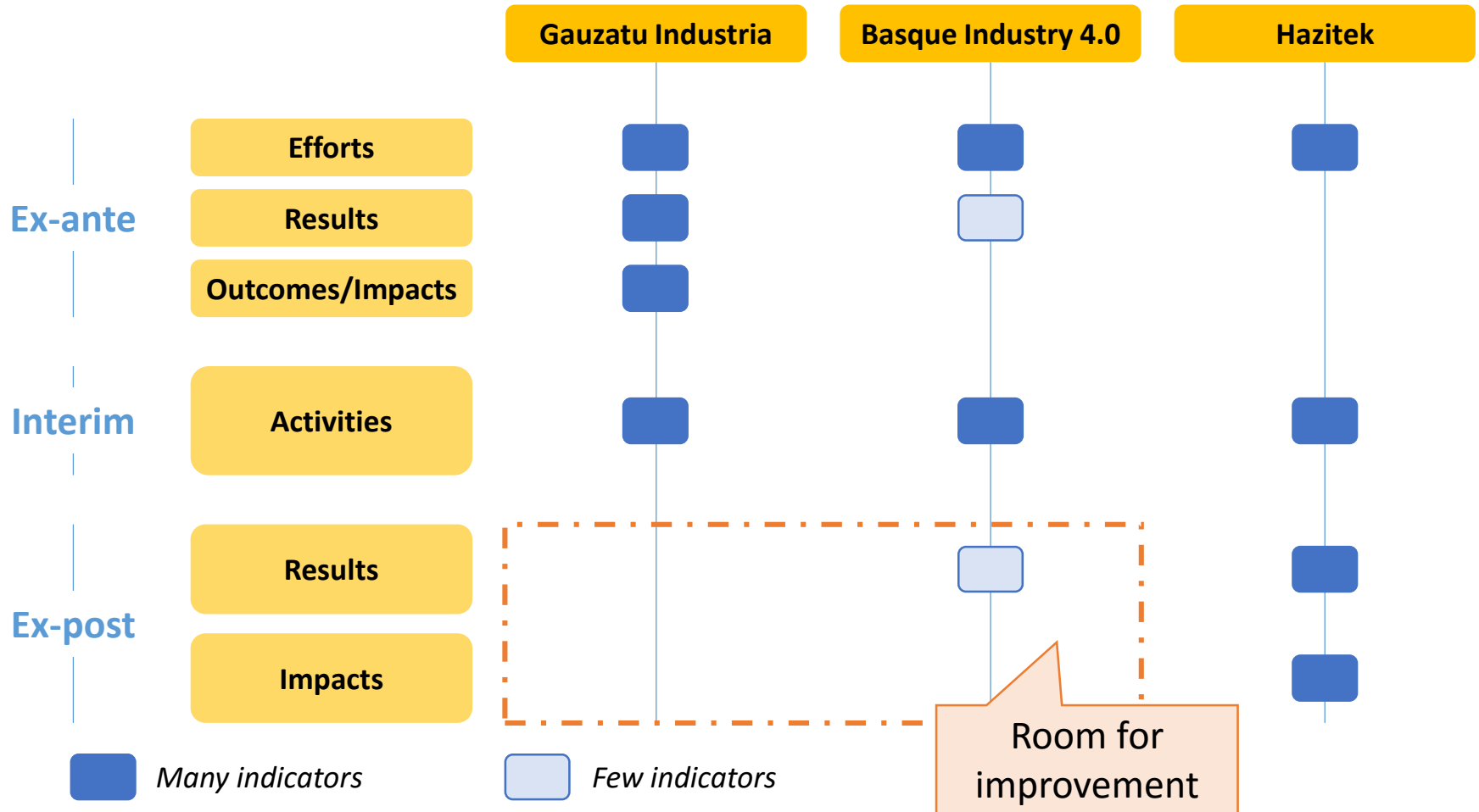
**The evaluation system of all MANUMIX programmes at policy mix level should take into account the intervention logic of the mix and the interaction among programmes.**

In order to do that, we need to work on indicators that measure different aspects of the mix.

- **Work on indicators that measure the level of interaction among the selected programmes.**
- **Work on indicators to measure the joint contribution to the Advanced Manufacturing Strategy.**
- **Work on indicators to measure the joint results and impacts ex-post (jobs, competitiveness, turnover, exports, etc.).**

Indicators. Towards monitoring at policy-mix level

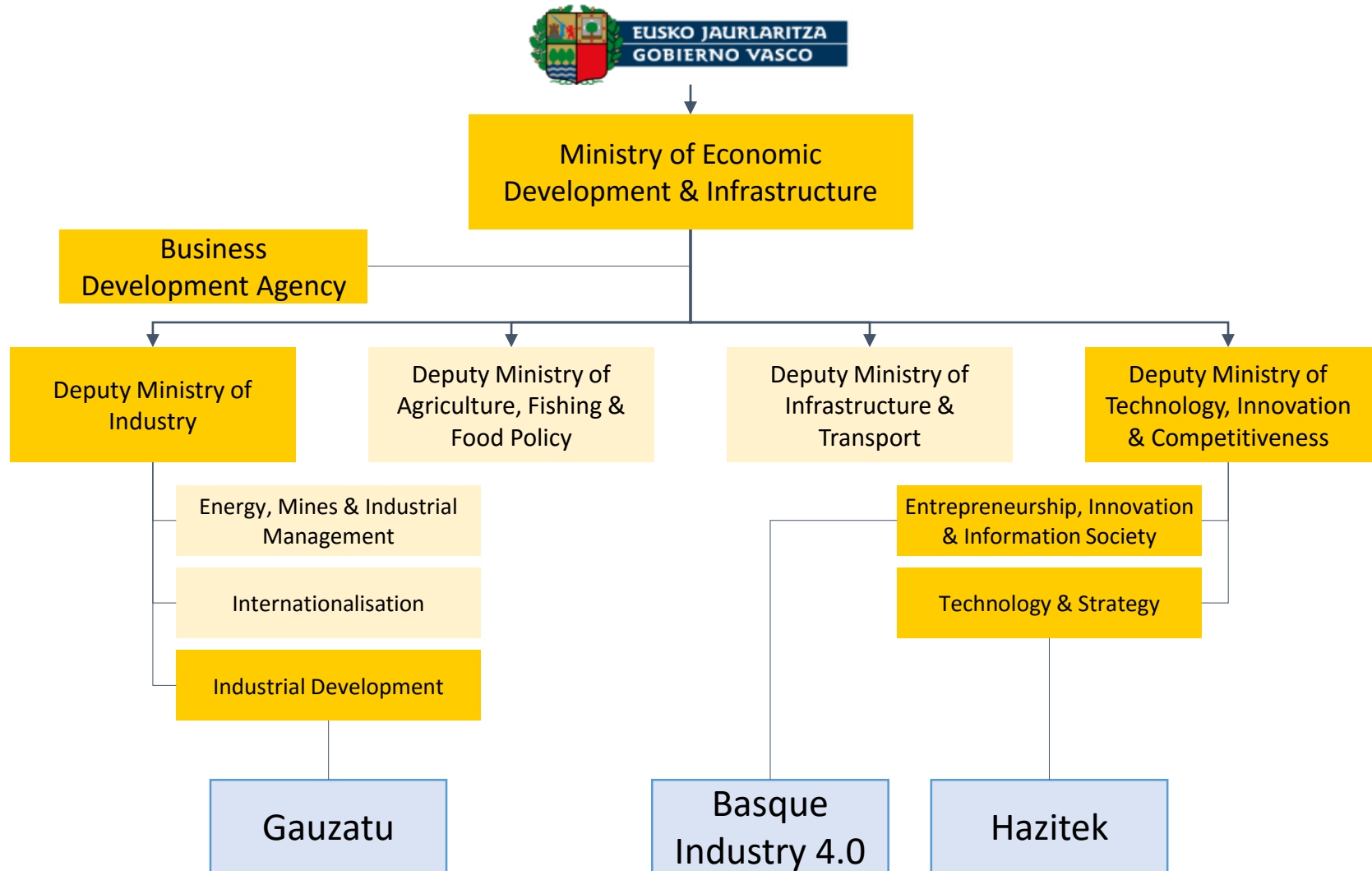
Regarding measuring the results and impacts of all MANUMIX programmes, there is room for improvement mainly in ex-post indicators.



## III. Annexes

## Annexes. Programme owners

Each programme is owned by a different directorate of the Basque Economic Competitiveness & Infrastructure Ministry.





**Annexes. Gauzatu Industria: Programme’s description**

**Technological upgrading for industrial SMEs**

Purpose	Creation and development of industrial SMEs based on technology and/or innovation.	Instrument	Loans
		Beneficiaries	Industrial SMEs or related services
Sectors	Industry and related services	Year of launch	2000
		Annual budget	€28.0M (2017)

**Description**

- Support for new investments:
  - Industrial Property.
  - Software.
  - Terrains and natural assets.
  - Buildings.
  - Technical installations.
  - Machinery and tools.
  - Hardware for information processing.
- 24 MONTHS + GRACE PERIOD + 5 REPAYMENT
- Minimum project investment: €120,000
- Recoverable advances that may amount to 25%-35% of the investment supported, depending on firm size and its nature of innovative or technological.
- Maximum advance of €1.5M.
- Maximum of €150,000 per job created and a maximum of €100,000 in the case of saving jobs.

**Annexes. Basque Industry 4.0: Programme’s description**

**Technology transference of electronics and ICT related to Advanced Manufacturing**

Purpose	Support of Industrial Research and Experimental Development projects with demonstrative effect that involve technology transfer of electronics and ICT related to AM from technology suppliers to companies (TRL5-TRL9)	Instrument	Subsidies
		Beneficiaries	Manufacturing companies
Sectors	Advanced Manufacturing	Year of launch	2015
		Annual budget	€2.2M (2017)

**Description**

- Technologies supported (CPS):
  - Cybersecurity and industrial communications.
  - Cloud Computing.
  - Big Data.
  - Advanced Analytics and Business Intelligence.
  - Collaborative robotics.
  - Augmented reality.
  - Artificial vision.
  - Sensor systems.
  - Design & additive manufacturing in metallic and advanced materials (ceramics, composites, etc.).
- Subsidy figures: up to the 25% of the eligible expenses and investments approved +15% when the project involves effective collaboration between a company and one or more research and knowledge dissemination entities, up to a limit of €200,000 per company.
- Minimum budget of the projects: €75,000.

**Annexes. Hazitek: Programme’s description**

**Industrial research and experimental development**

Objective	Support industrial research (TRL3) and experimental development (TRL6) projects, of either a competitive or strategic nature.	Instrument	Subsidies
		Beneficiaries	Companies <i>Bigs &amp; SMEs</i> RVCTI (start-ups)
Sectors	Priorities of the Basque Science, Technology & Innovation Plan 2020 <i>In strategic projects the 80% of the budget is for RIS3 priorities</i>	Year of launch	2016
		Annual budget	82.8M€ (2017)

**Description**

- A. Competitive projects (annual projects).**
- Development of new products or new companies based on science and technology.
  - Individual projects or in collaboration.
  - Total minimum annual budget of €100,000; in the case of collaborative projects, €50,000 per company.
  - Subsidy: up to the 25% of eligible costs. 30% in transnational collaborative projects (e.g. Manunet).
  - Maximum amount of non-refundable subsidy: €250,000 per beneficiary each year.
- B. Strategic projects (muti-annual projects, up to a maximum of 3 years).**
- Strategic R&D projects in the priorities of the Basque Science, Technology and Innovation Plan 2020.
  - Strategic projects, developed under collaboration or one-off projects. Minimum budget of €4M.
  - Subsidy: up to 40% of eligible costs for industrial research projects.
  - Subsidy: up to 25% of eligible costs for experimental development projects.



# MANUMIX

Interreg Europe



European Union  
European Regional  
Development Fund



EUSKO JAURLARITZA  
GOBIERNO VASCO

**inno**basque  
berrikuntzaren euskal agentzia    agencia vasca de la innovación