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LIST OF ABBREVIATIONS AND DEFINITIONS

Abbreviation	Definition
AI	Artificial Intelligence
CPC	Cooperative Patent Classification
DoA	Description of Action
EBRD	European Bank for Reconstruction and Development
EC	European Commission
EIB	European Investment Bank
EIF	European Investment Fund
H2020	Horizon 2020
ICT	Information and Communications Technology
MIPM	Market and Innovation Positioning Map
ML	Machine Learning
МРМ	Market Positioning Map or Stakeholder Positioning Map (Can also be referred as MIPM, see below).
NB	Nota Bene
OEM	Original Equipment Manufacturer
PCP	Pre-Commercial Procurement
PPI	Public Procurement of Innovative Solutions
R&D&I	Research and Development and Innovation (also referred as RDI)
RTOs	Research and Technology Organisations
SME	Small and Medium Enterprise
T&M	Transport & Mobility
TRLs	Technology Readiness Levels
VC	Venture Capital



Short name and name of beneficiaries

Short name	Name
CIAOTECH*	Ciaotech Srl
PNO ES*	PNO Innovation S.L. (third party of CIAOTECH)
ALICE	Alliance for Logistics Innovation through Collaboration in Europe
CFH	CrowdfundingHub BV
IWT	European Inland Waterway Transport Platform

* CIAOTECH and PNO ES are both parts of PNO group. The content of this deliverable sometimes refers to "PNO group" or "PNO" intended as both companies.



1. EXECUTIVE SUMMARY

The ENTRANCE platform is expected to be the legitimate matchmaking platform for innovators in the transport and mobility sector as it will bridge the gap of finance towards the market for such innovative solutions.

ENTRANCE will offer a unique EU online Matchmaking platform for the entire European transport and mobility landscape. The platform will:

- connect a critical mass of relevant stakeholders from the "supply-demand-finance" triangle in the entire transport and mobility sector, including all transport means and modes,
- create an increased visibility of "first-of-a-kind" transport solutions, foreseen replacement plans and schedules of major buyers and public and private financing opportunities, and
- do an automatic matchmaking that will facilitate the scale up, market uptake, and access to finance.

In order to identify and attract the most innovative and active organisations as users of the platform to boost their uptake and upscaling and, at the same time, attract further stakeholders to the platform, this report contains insights about the key players in the recent years for decarbonising the transport and mobility sector of goods and passengers.

The information about these relevant stakeholders will be used during the project to attract best practices and relevant European stakeholders to the ENTRANCE community, through dedicated communication tools or by adapting the messages according to the market trends.

This report has been built using the same 'taxonomy' -categorisation by key concepts in different levelsthat has been used to develop the ENTRANCE platform. This means that this document presents a seamless organisation towards the actual ENTRANCE community.

The different stakeholders have been identified through desk research and by using dedicated tools, owned by PNO group, that have been organised not only by using the adapted ENTRANCE taxonomy, but also by linking such profiles with the main profiles of the ENTRANCE "supply-demand-finance" triangle.

In addition to this, to cover all the aspects that will feed the platform, this report also provides a glance of financing opportunities available at EU level, including the main definitions to consider and a high-level guidance to understand how to attract funding for innovative solutions. This information complements the entities that have been identified as investors during the stakeholder assessment (under the finance pillar).

This document may be updated on a continuous manner during the execution of the project so that it reflects all new identified stakeholders.



2. INTRODUCTION

This report on identified supply, demand and financing opportunities for feeding the ENTRANCE platform is based on a clear methodology created by PNO group. This methodology focuses on the identification of key stakeholders according to an innovation scoreboard of projects and patents that is part of the already mentioned methodology. This assessment is complemented with an identification of the key concept and the main financing opportunities that will complement the investors present on the ENTRANCE platform.

The report provides a clear description of the methodology used in section 3, to allow a clear understanding of how the information has been collected and how the main findings are organised. An analysis of public-funded project has been carried out to identify these key stakeholders for the ENTRANCE community, section 4 highlights such funding sources and the main financing opportunities.

Section 5 provides the main findings of the assessment that has been caried out, including the linkage of such findings with the main profiles of the ENTRANCE platform. On the other hand, section 6 organises such information by delivering position maps to understand better which players can cover which role under each transport mode and solution category.

The annex to this document provides the main boundaries used for the search involved in this analysis, the exhaustive list of projects analysed, and the overall list of entities identified during this assessment.



3. ENTRANCE IDENTIFICATION OF OPPORTUNITIES: METHODOLOGY AND SCOPE

3.1. SCOPE OF THE ASSESSMENT AND OVERVIEW OF THE WORK DONE

This assessment in the framework of the ENTRANCE project has the aim of finding and selecting a high number of actors and financing opportunities which operate in the transport and mobility sector and contribute on lowering the environmental impact of this sector.

The aim is to bring some of these actors to the ENTRANCE platform in order to help bridging the funding gap for technology providers, by reaching potential buyers and both public and private investors.



Figure 1: Snapshot of the process for this assessment.

All the players identified are split in three categories, being in line with the profiles already identified for the platform: **supply**, **demand** and **finance** (see Figure 1).

To identify the stakeholders, an original PNO's methodology has been customised, mixing a technology search based on an innovation scoreboard of projects & patents with a complementary desktop analysis, according to the methodology described in the following section.

The assessment of financing programmes includes exclusively the identification of the opportunities specific matches will be integrated through the platform and matched with user according to detailed descriptions of the funding opportunities.

3.2. TAXONOMY DEFINITION

Taxonomy Definition All possible modes of transport have been considered, both passengers and goods, and any type of vehicle. A specific taxonomy was defined and acknowledged by the ENTRANCE partners for technologies and transport modes.



In compliance to the ENTRANCE platform, all possible modes of transport were considered, both passengers and goods, and any type of vehicle. A specific taxonomy was defined and acknowledged by the ENTRANCE consortium for technologies, stakeholders' classification and transport modes

The adopted classification is reported in Table 1 and Table 2, which show the simplified *transport areas* and the *technology classification* used to tag the expertise of different organisations and to analyse different projects. For all of them, we have considered *passenger*, *freight* and *public transport*.

If an organization is involved or provides services for more than one of the macro areas or "what" categories just mentioned, it is classified as *multiple* mode of transport or type of what is transported. <u>Other</u> <u>technologies</u> can include -e.g.- the use of scrubbers to reduce NOx and SOx emissions), <u>actions</u> (e.g. upgrading of infrastructure to favour the multimodality) <u>engineering design</u> (e.g. improvement of aerodynamics or new powertrain conceptions) or <u>monitoring of pollution and emissions</u>.

	TRANSPORT SECTOR		
Level 1	Level 2		
RAIL TRANSPORT	Passenger Rail Transport (Interurban)		
	Freight Rail Transport		
	Rail vehicles		
ROAD	Freight transport services by road		
TRANSPORT	Public passenger transport by road		
	Interurban scheduled road transport		
	Road vehicles, including urban passenger vehicles and cars and public transport and commercial road		
WATERBORN	Inland passenger water transport		
E	Inland freight water transport		
TRANSPORT	Sea and coastal passenger water transport - Short Sea Shipping		
	Sea freight/Ocean freight - Deepsea		
	Waterborne vessels		
AIR	Passenger Air Transport		
TRANSPORT	Freight Air Transport		
	Air transport vehicles, including Unmanned Aerial Vehicle (UAV)		
MODALITY	Combined transport		
	Multimodality (Combined Transport.)		
	Intermodality (Transportation of freight in an intermodal container or vehicle)		
	Synchromodality (Evolution of inter- and co- modal transport concepts)		
	Co-modality		
	Urban Logistics - Distribution		
	Urban Mobility		

Table 1: Transport type classification in ENTRANCE

Table 2: Technology definitions in ENTRANCE.

	TECHNOLOGY CLASSIFICATION
Alternative fuels and vehicles	Alternative fuel
Alternative fuels and vehicles	Alternative fuel re-fuelling infrastructure
	Fuel cell system
	Hydrogen infrastructure
	Vehicle propulsion, Fuel cell electric vehicle (FCEV)
	Vehicle propulsion, Fuel cell vehicle (FCV)
Digitalisation	5G
Digitalisation	Advanced Driver Assistance System
	Artificial Intelligence (AI)
	Big Data
	Blockchain
	Collaborative or digital platform - connectivity platforms

Dissemination level – PU



	Cooperative, Connected and Automated Mobility (CCAM)
	Decision Support System
	Internet of Things (IoT)
Electrification (regarding the	Batteries
the chine at the the has a stime	Vehicle power/re-charging systems, operations and infrastructure
technologies that help boosting	Vehicle propulsion, Battery electric vehicle (BEV)
electromobility or the electrification of	Vehicle to Grid (V2G)
railways as well)	
Innovative Materials	Innovative Materials
Management Systems (technologies	Infrastructure management system
that halp to develop	Intelligent port systems
that help to develop	Intelligent Transport Systems (ITS)
fleet or traffic management, comprising	
ICT tools as AI, ML…)	
Smart as lutions	Boxes
Smart solutions	Combined passengers and goods delivery
	Container
	Load carriers
	Load Units
	Pallet
	Parking management
	Transport crate
	Urban delivery solutions
Transport & Logistics operations	Aircraft operations
	Cargo handling
	Cargo pooling
	Carpooling
	Corridor management
	Intelligent ports, terminals and hubs
	Logistics as a service (LaaS)
	Logistics nodes management
	Mobility as a Service (MaaS)
	Multimodal hub and network solution
	Physical Internet
	Pipeline as a Service (PaaS)
	Routing
	Smart contracts
	Systems and Technologies for Interconnected Logistics
	Transport Management Information System
Vehicle design	Aircraft propulsion
, C	Autonomous and semi-autonomous sailing
	Cabin and cockpit design
	Other green vehicles, including cargo bike, etc.
	Rail venicle design
	Ship design
	Snip/vessel wheelhouse
	I ransport infrastructure equipment/machinery, including cranes, etc.
	Unmanned vehicle
Vehicle technology	Delivery Robots
	Platooning
	Power train technology
	Rail control systems



Others

Other (e.g. Scrubbers))

Resilience Safety system

3.3. INNOVATION FINANCING PROGRAMMES



Bridging the gap for financing innovation is one of the main challenges for a company aiming to scale-up or grow. To this purpose, ENTRANCE is mapping EU's major types of programmes addressing the Transport and Mobility sector, alongside all those financing bodies with a focus on sustainability

Information about private and public financiers has been identified and collected. The main financing programmes have been described in section 4 while more than 217 financiers all around EU-27 and outside have been mapped in section 5. While sustainable finance is increasing, mobility is backed up by many corporate ventures by main OEMs. Early-stage finance is well represented too, from VCs to business angels to grants.

The considered **public investors** are *national bodies* and *European institutions* (e.g. EC and EIB); the **private investors** are usually *large companies with a corporate venture capital, private funds, venture capital and business angels* and *private banks and investment companies*; finally the **public-private investors** are represented by co-participated *funds* and *accelerators*. They have been selected and classified based on the ownership (public, private or a hybrid of the two) and the addressed beneficiaries (start-up, small-cap, mid-cap or consortia).

The following figure provides a summary of the framework for financing innovation and the landscape of how it is organised at international level:





Figure 2: Financiers mapping (Partial extract of the results, for illustrative purposes only).

With regards of innovation financing programmes, their identification has started with a clear definition of the criteria to select these opportunities. The following aspects have been considered:

- Outreach: European. This selection has been done considering the possibility of providing the same opportunities to entities or individuals throughout Europe. Including funding from local to national authorities would enlarge the list of specific entities from a certain country.
- **Scope:** Transportation or mobility solutions scale-up or implementation, including also support for investment in advanced technologies.
- Technology Readiness Level (TRL): ENTRANCE platform will provide support to near to the market innovative solution that need to bridge the gap of financing to reach the market. It has been considered that funding opportunities from TRL6¹ responds to the expectations of future ENTRANCE platform users.

It is important to mention here that the information collected and listed has been gathered from public sources with the utmost care and updated when creating this deliverable. However, this assessment responds only to the objective of the ENTRANCE project for identifying financing opportunities and shall not be considered as a financial advisory service by any party accessing to this document.

¹ Technology demonstrated in relevant environment (industrially relevant environment in the case of key enabling technologies).



3.4. SEARCHING FOR INNOVATION ECOSYSTEMS

Mapping Innovation Through multiple databases intelligence and desktop searches After the identification of public programmes supporting the road-tomarket of sustainable transport solutions, we have identified more than 2000 interesting stakeholders. They were spotted by mixing (i) a technology intelligence and stakeholder analysis on PNO's proprietary databases of R&D&I funded projects and patents and (ii) desktop research on multiple public databases

The initial steps allowed to rebuild a large ecosystem, while a second step consisted in categorizing it according to ENTRANCE's specific taxonomies (Chapter 5). Finally, the specific PNO's *Market & Innovation Positioning Maps* © have been adapted to the ENTRANCE scope to concretely highlight specific key-players (Chapter 6).



Figure 3: Overview of the Innovators mapping.

3.4.1. Organisations selection

More in detail, once the interesting projects and patents were identified², all the participating organisations / relevant-patents applicants have been analysed and evaluated considering the potential interest to join the ENTRANCE platform. The selected organisations have been first divided in supply, demand or finance (most of them can cover more roles as has been already identified in proposal stage and early execution stages) and have then been classified per typology, mode of transport and per type of technology (under development or for which there is an interest). Financiers have been instead classified based on their area of intervention.

The last brick consisted of performing a desktop analysis through various websites and databases of companies and entities active in the transport sector. The websites and databases have been chosen considering various accelerator platforms or EC-linked sources to bring out the most active and innovative

² See more details in the Annex 1.



organisations in proposing and financing state-of-the-art technologies in the transport sector at European level. The sources included are listed and described below in Table 3.

Eventually, the considered typology of organisations includes:

- Start-ups (companies with less than 5 years of activity excluding joint ventures);
- SMEs (companies with less than 250 employees);
- Large companies (companies with more than 250 employees);
- Universities;
- RTOs;
- Public bodies (this category embraces also port authorities);
- Municipalities (cities, counties and regions);
- Infrastructures (ports, air ports, hubs, etc.).

Table 3: Desktop search sources.

Innovations databases

Seal of Excellence - Access2EIC	The Seal of Excellence is a quality label awarded to project proposals submitted to Horizon 2020 which succeeded a highly competitive evaluation process by independent experts but did not receive funding due to budget limits.
Euroquity - Companies	Created by Bpifrance in 2008, EuroQuity is an online matchmaking platform that helps companies meet investors and partners.
Euroquity - Investors	Created by Bpifrance in 2008, EuroQuity is an online matchmaking platform that helps companies meet investors and partners.
<u>InvestHorizon</u>	InvestHorizon is a programme financed by the European Commission, in association with Eureka, to facilitate series A funding for selected deep tech companies boosting their investment readiness and investor relations. The programme is run by a consortium coordinated by Tech Tour. InvestHorizon Accelerator offers FREE services to raise the investment readiness of SMEs from EU, Horizon2020 and EUREKA countries.
<u>EIT Urban Mobility</u> <u>Accelerator</u>	The EIT Urban Mobility Accelerator is an EU-funded programme in five European regional hubs implemented through partners to take early-stage mobility start-ups to the next level. They are looking for early-stage start-up teams with business ideas that reduce congestion and increase efficiency in the transport system.
EIT InnoEnergy Start- ups Portfolio	EIT InnoEnergy brings people and resources together, catalysing and accelerating the energy transition.
EIT Climate-KIC Start-	Climate-KIC is Europe's largest public-private innovation partnership focused on climate innovation to mitigate and adapt to climate change.
EIT Digital Accelerator	EIT Digital is a leading European digital innovation and entrepreneurial education organisation driving Europe's digital transformation. It works as accelerator also for start- ups operating in transport and mobility sector.
EU-Startups Database	Database of European Start-ups.



Horizon Results Platform	EU-funded projects results platform in which technology developers can be matched with policy makers, investors or potential buyers.
Innovation Radar	The Innovation Radar is a European Commission initiative to identify high potential innovations and innovators in EU-funded research and innovation projects.

3.5. INTRODUCTION TO THE STAKEHOLDERS POSITIONING MAP



Market & Innovation Positioning Map © (MIPM) - PNO has been defining its own 4-quadrants matrix in the last 8 years. It is presented below. Its advantage is that it is built in such a way to particularly:

1) Define the general framework of noticeable companies working on a particular technology topic

 Evidence those key – smaller/emerging - players with a very specific knowledge on the analysis subject matter.

The analysis is intended to be qualitative, but based on a quantitative weighted measurement of a mixed scoreboard. More in detail,

- Innovation Vision and Specific Knowledge (x-axis) This takes into account both the R&D capacity in the field (including funding and IP) and a specific Affinity Index which weights the proximity to the specific project technology at the centre of the analysis (NOTE that in this case the Affinity was also defined by considering TRL)
- *Investing Capacity (y-axis)* This considers the capacity and structure to invest (e.g. turnover), including the nature of the organisation.

From the bottom to the top, the organisations with growing investing capacity are positioned. Going from the left to the right instead, the organisations with increased specific domain knowledge and innovation can be found. The upper-right quadrant defines organisations most likely to be market incumbents, whilst in the lower-right one relevant technology providers or visionaries can be found, with most specific knowledge with respect to the analysed topic.

The MIPM can identify the "position" of an organisation with respect to the investment capacity and readiness on products and technologies which -in the case of ENTRANCE project- sums to the requirement of lowering emissions in transport and mobility sector, according to ENTRACE's objectives. In the following, several Stakeholder Positioning Maps are reported, according to PNO's criteria to highlight the most relevant organisations in each mode of transport for each type of technology area.



4. INNOVATION FINANCING PROGRAMMES

As introduced in the methodology section, the financing programmes framework available for innovative solutions to approach the market is wide and can be divided among different categories. These categories have been organised according to the typology of support that ENTRANCE platform users could need:

4.1. EQUITY

Equity describes the ownership of assets of the company so when a company decides to expand its equity through external sources it is selling a part of the company to fund its own activity usually for expansion phases. By investing through equity mechanisms in a company the risk of the investment is linked to the company's success: the company assets are liquidated shareholders would receive the resultant money after paying company's debt.

In addition to this, there is also a mechanism called 'quasi equity' that combines the characteristics of equity and debt (see section 4.3).

While specific private entities supporting initiatives through funding will be identified during the upcoming sections of this assessment, the main public references with regards of public supported equity or quasiequity are the following:

- European Investment Bank (EIB) Venture Debt mechanism.
- European Investment Fund (EIF) through the COSME Equity Facility for Growth or InnovFin Equity mechanisms.

4.2. GUARANTEES

Guarantees supports both the disruptive suppliers of solutions and the investors in such initiatives as cover the risk in case it is not possible for the borrower to repay the debt at the end of a certain loan agreement.

There are three main forms of guarantees:

- Personnel: Personnel assets are included for repaying debts not legally protected from creditors.
- Collateral: A particular assets pledged for securing the debt.

The *Lien* is the legal mechanism for a creditor to hold the collateral in case it is not possible to pay a debt.

At EU level, the most relevant references that can be listed in this assessment are the ones managed by EIF through financial intermediaries. These mechanisms are the following:

- COSME Loan Guarantee Facility.
- EaSI Guarantee.



- InnovFin SME Guarantee Facility.

4.3. DEBT

Debt refers to an acquired liability with another party that shall be returned according to an agreed calendar and with a certain cost associated. Main financing alternatives that can be listed here are the following:

- *Loans* Short- and long-term funds that provide liquid assets to the company directly related with the financial structure and potentially linked to guarantees.
- Bonds Financing alternative that allows the attraction on capital with a long-term basis.

This kind of support can be articulated from both the public and private sector:

- *Public funding* There are also debt alternatives from public authorities through public banks at different levels. These alternatives play a key role on providing support for materialisation of public policies. At European level, it is possible to list the following entities:
 - EIB Focused on large scale loans for the public and private sector to deploy solutions in accordance to EU taxonomy for sustainable activities. EIB manages also the activities of InnovFin, that are also relevant to mention as it channels support for private funding facilitators in line with the EIF that will be described in upcoming sections.
 - European Bank for Reconstruction and Development (EBRD) Oriented to supporting economies and promoting private and entrepreneurial initiatives.
 - *Private funding* Conventional funding opportunities from the banking community.

4.4. GRANTS AND SUBSIDIES

Grants and subsidies can be understood as -in principle- non-reimbursable support from governments (the grantor bodies) to specific institutions according to a specific objective:

- Grants respond to direct support to actions in line with policy objectives of EU.
- Subsidies responds to the intention of influencing the market.

Intensity of funding received can vary depending on:

- Typology of project.
- Typology of beneficiary (the entity or group of entities receiving a grant).
- Thematic priority.
- Size of the investment or the proposed action.



- The associated risk to the proposed actions.
- Compliance with the requested actions by the grantor body.

The main European funding opportunities that can be listed for this assessment are the following:

- **CEF** (Connecting Europe Facility) Digital, Telecom and Transport.
- COSME (Competitiveness of enterprises and Small and Medium-sized Enterprises).
- Digital Europe Programme.
- EIC Accelerator (previously SME Instrument).
- **EuroStars** and other programmes managed by Eureka.
- European Structural and Investment Funds (ESIF).
- European Urban Initiative (EUI).
- **Horizon Europe** Innovation Actions under Cluster 5 (specific destinations under the work programme).
- Interreg Europe and other cross-border cooperation programmes.
- JPI Urban Europe.
- **LIFE** Programme (EUs financial instrument supporting environmental and nature conservation projects).
- NextGenerationEU funds.

4.5. PRE-COMMERCIAL PROCUREMENT (PCP)

Pre-commercial procurement (PCP) is an approach to public procurement of research and development (R&D) services. It is an important tool to stimulate innovation as it enables the public sector to steer the development of new solutions directly towards its needs.

In PCP, public procurers buy R&D from several competing suppliers in parallel to compare alternative solution approaches and identify the best value for money solutions that the market can deliver to address their needs. R&D is split into phases (solution design, prototyping, original development and validation/testing of a limited set of first products) with the number of competing R&D providers being reduced after each R&D phase.

PCP can go up to the development and the purchase of a limited volume of first products or services, but excludes quantity production and large scale commercialisation.

Information retrieved from official EC sources (European Commission, 2021).

4.6. PUBLIC PROCUREMENT OF INNOVATIVE SOLUTIONS (PPI)

Innovation procurement can refer to:

- Buying the innovation process (RDI services) and part of the outcomes.



- Buying the outcomes of innovation.

It is a market driven demand where public buyers act as early adopter and promotes business and researchers to develop the innovative products/services/processes that meet the need.

It is also interesting for public buyers as it enables similar or even better results at optimised costs from currently available solutions.

Information retrieved from official EC sources (European Commission, 2021)

4.7. ALTERNATIVE FINANCING SOLUTIONS

The alternative finance ecosystem can be used by any person or organisation to explore the funding landscape. The needs of those seeking financing are always the starting point. This ecosystem aims to better define what types of financing are suitable options. There are two main starting points to orient these that do not acknowledge the landscape of alternative financing solutions:

- Funding may come from: institutions, crowds and communities.
- There are different financing models to organise the investments: donating, reward seeking, investing and lending.

The following tables summarise the main aspects of these starting points:

Table 4: Origin of the sources in the alternative financing landscape.

	Financing sources	Description
1	Community funding (E)	Investors know each other directly or indirectly, are engaged and share a common goal or place
2	Crowdfunding (F)	Small amounts of money are raised from large amounts of people to fund something.
3	Institutional funding (G)	Investors invest indirectly through institutions, seeking profit and/or impact.

Table 5: How the investments can be organised in the alternative finance landscape.

Financing models	Description
Donating	Giving money for a cause and/or to serve a societal purpose.
Reward seeking	Giving money for a potential future (non-financial) reward.
Investing	Acquiring shares, potentially achieving future profit through ownership.
Lending	Allowing for the temporal use of a sum of money, usually with interest.

The elements listed above can be combined depending on the objective of investors or entities looking for funds.



5. MAPPING THE INNOVATION ECOSYSTEM FOR TRANSPORT AND MOBILITY SOLUTIONS

5.1. PROJECT ANALYSIS

The goal of this section is to identify the main organisations participating to the EU funded projects analysed that could have an interest and a correlation with the ENTRANCE goal. The methodology described above led to the selection of **556 projects** on a total of more than 2500 projects analysed.

5.1.1. Top funding schemes

Most of the identified projects have been selected from the <u>CEF programme (327)³</u> and from the <u>H2020</u> <u>programme's Innovation Action (109)</u>. For each selected programme and for the several starting years of the selected projects, the sum of funded received and the number of specific selected projects are highlighted in the two figures below.



Figure 4: Number of selected projects and funding received per starting year.

³ It is important to remark here that the CEF programme is way larger than others as it deals with infrastructures. However, even the figures may overshadow other programmes, these smaller programmes have also been considered for this assessment (inc. European Innovation Council opportunities).





5.1.2. Stakeholders mapping

From the 556 selected projects, **1508 different organizations** belong to the three categories of "Supply, Demand and Finance" and could be interested in the ENTRANCE platform. The prevalence of these organisations are <u>large companies with 541</u>, followed by SMEs with 401, universities with 132 and public <u>bodies with 127</u>. Besides the type, these organisations have been analysed by country of origin and the most represented is **Spain with 224 organisations**, <u>followed by Germany with 177</u>, Italy with 175 and <u>France with 171</u>. The following figure summarises the organisation count for both type and country levels:







Figure 6: Relevant organisations per type and country of origin.

Regarding the organisations with more participations, the figure below shows, on the one hand, the companies and, on the other, all the non-profit organisations (RTOs, Universities, Public Bodies) that have 10 or more participations. The **German Aerospace Agency (DLR) is the most active with 18 selected projects**, followed by the Italian car manufacturer <u>FCA SpA (now STELLANTIS Group) with 17</u> and <u>Swedish Transport Administration with 16</u>.

D3.1 – Report on identified supply, demand and financing opportunities Dissemination level – PU





Figure 7: a) Non-profit organisations with more participations in the selected projects. b) Private companies with more participations in the selected projects.

5.2. PATENT ANALYSIS

Regarding the patent analysis, the query launched in Wheesbee (tool property of PNO group, see description in Annex 4) <u>generated 2929 total patents</u> and the methodology described above led us to select **163 patents**. Before analysing more in-depth the selected patents, an overview is shown on all resulted patents by the query launched in Wheesbee highlighting the trends in time (publication years) and the main CPC categories emerged. As for the years of publication, <u>2018 and 2019 present a significant increase compared to the other years of the considered period, both having more than 500 published patents.</u>



Regarding the CPCs, on the other hand, **the majority includes patents relating to technologies for lowering the environmental impact in the transport sector**, <u>followed by the category of "Vehicles in</u> <u>general"</u> with respectively 26% and 25% of all patents resulting from the query launched on Wheesbee. The figure below shows both the analyses carried out.





Also the selected patents have been analysed by the CPC categories and the percentages substantially reflect those seen for all the resulting patents, with **the patents relating to technologies aimed at lowering the environmental impact which are 28%** and those which speak of vehicles in general 25%.



Figure 9: Selected patents per CPC categories (%).

The 163 selected patents have **136 different applicants**, most of all are <u>large companies (80) and SMEs</u> (<u>38</u>). Furthermore, as done for the projects analysis, the applicants have been analysed also based on their country and the most represented country is **Germany with 40 selected applicants**, followed by <u>France with 24</u>. The figure below shows the results for both categories just mentioned.





Figure 10: Relevant applicants per organisation type and country of origin.

The companies which have more patents under the list selected are **BMW**, **Scania and Siemens AG with 4 selected patents** each. **All the companies listed below are working in the road transport domain**, <u>identified by B60</u> (Vehicles in general) <u>CPC category</u>, <u>except Airbus Helicopters which has patented in</u> <u>Aircraft and Aviation (B64 CPC category) domain</u>.





Figure 11: Applicants with more selected patents.

5.3. DESKTOP SEARCH DERIVED ORGANISATIONS ANALYSIS

The last step of searching organisations to put in the ENTRANCE platform has been the **desktop search** and the sources listed in section 3.4.1, led to the selection of **309 organisations**. Before showing the results relating to the type and country of origin of the organisations identified as already done for the projects and patents analyses, the table below shows the number of organisations selected for each website consulted. (*N.B. some selected organizations have appeared in multiple sources mentioned*)

Number of Organisations per Source Analysed			
Seal of Excellence - Access2EIC	56	EIT Climate-KIC Start-ups	6
Euroquity - Companies	52	EIT Digital Accelerator	2
Euroquity - Investors	85	EU-Startups Database	50
InvestHorizon	16	Horizon Results Platform	36
EIT Urban Mobility Accelerator	20	Innovation Radar	74
EIT InnoEnergy Start-ups Portfolio	17		

Table 6: Number of organisations selected per website considered for the desktop search.

Most of the organisations selected from the various websites considered are **SMEs (130) and start-ups (98)**, and most of them **(54) came from France**, followed by <u>Germany and Spain with 41 and 36</u> <u>respectively</u>. The results of both categories are shown in the figure below.

Dissemination level - PU





Figure 12: Organisations from desktop search by type.

5.4. MATCHING IDENTIFIED STAKEHOLDERS WITH ENTRANCE PLATFORM'S PROFILES

After having analysed the organisations resulted from project, patent and desktop analysis based mainly on the type, country of origin and most active selected organisations, these have been divided in the three categories provided by ENTRANCE: Supply, Demand and Finance.

Even for these three categories, the organisations have been analysed by type and country of origin, but here the accent is also on the technologies provided/interested and on the modes of transport.

5.4.1. SUPPLY: Mapping of the identified stakeholders

A total of **945 organisations** can be considered under the SUPPLY category as "providers" of technologies aiming to the reduction of emissions in the transportation sector. Among these 945 organisations, **407 are SMEs**, while there are <u>187 large companies</u>, <u>136 universities</u>, <u>131 start-ups and 84 RTOs</u>. Most of the organisations belonging to the "Supply" category are from **Spain with 146**, followed by <u>Germany with 130</u>, <u>France with 114 and Italy with 105</u>. The figure below summarises the results of both categories.





Figure 13: Typology and country of origin of the organisation belonging to the "supply" category.

The technology area with more suppliers is the "**Electrification**" in which **420 organisations** provide technologies or products. The electrification is followed by <u>"Alternative Fuels and Vehicles" with 278 total providers and "Management Systems" with 233</u>.



Figure 14: "Suppliers" per technology area.



Finally, the mode of transport in which there are more suppliers is **road transport with 648 providers**, followed by <u>waterborne with 124, air with 119, rail with 117, multiple with 82 and modality with 9</u>.



Suppliers per Mode of Transport

Figure 15: Number of suppliers per mode of transport.

Once the numbers relating to the "supply" area were shown, the main suppliers were collected in a single figure and divided by mode of transport. <u>The top suppliers were chosen on the basis of a ranking</u> carried out which then established their position in the various Market and Innovation Positioning Maps shown in section 6 of this document. In addition to this ranking, <u>the number of participations in the selected projects</u>, <u>the number of patents selected and the number of times they appeared in the desktop analysis</u> were also considered, giving priority to private companies. The figure containing the top suppliers is shown below.

D3.1 – Report on identified supply, demand and financing opportunities





ROAD TRANSPORT	RAIL TRANSPORT SKELETON DIGAS BALLARD ORIFLIQUIDE SIEMENS Ande OT V MERANSPORT THALES O PRANA hydrogenious HYSILABS Ceit Indra	WATERBORNE TRANSPORT BALLARD ONCO ABB COCO O Air Liquide Indra McPhy VALENCEAPORT KONCSBERG O awake.ai Cacum Cacum Coco Coc
	RT MODA Moda SEFE Cinde DLR DLR DLR EDR EDR EDR	ALITY TRANSPORT

Figure 16: Top suppliers per mode of transport.

5.4.2. DEMAND: Mapping of the identified stakeholders

The analysis has also been carried out for the DEMAND category, identifying potential "buyers" of the technologies. **1013 organisations** can be considered under this category. Most of them are **large companies (448)** followed by <u>SMEs (143), public bodies (129) and municipalities (86)</u>. Regarding the countries most represented, **most of the "potential buyers" came from Spain (154)**, <u>Italy (123)</u>, <u>Germany (114) and France (113)</u>. The figure below summarises the results of the two categories just mentioned.





Figure 17: Typology and country of origin of the organisation belonging to the "demand" category.

The technology area in which more potential buyers are interested is the **"Electrification" with 473 organisations** present in the "demand" category, followed by <u>"Management Systems" with 426 and</u> <u>"Alternative Fuels and Vehicles" with 415</u>.

It is important to remark here that some profiles that could be expected to be considered as suppliers for the ENTRANCE platform like universities or start-ups, can at the same time play the role of 'demand' in case that they are requesting or acquiring knowledge to exploit or investing/purchasing disruptive solutions.




Figure 18: "Buyers" per technology area.

The mode of transport in which the selected potential buyers are more active is **road transport with 483 organisations** followed by <u>waterborne transport with 241, rail with 198, air with 110, multiple with 76 and modality with 48</u>.





Figure 19: Potential buyers per mode of transport.

As done for the suppliers, also for the "demand" category the top buyers were put together in a single figure and divided by mode of transport. The selection criteria are the same as those adopted for the "supply" category. The figure in question is shown below.





Figure 20: Top buyers per mode of transport.

5.4.3. FINANCE: Mapping of the identified investors

Regarding the "**Finance**" category, a total of **217 investors** have been selected. In this category the focus was on the typology (private, public or hybrid) of the selected investors and on the type of beneficiaries they address. Indeed, most of the identified investors are **large companies with corporate ventures (58)** and <u>venture capital and business angels (53)</u>. Furthermore, as done previously, the countries of origin of the selected investors have been analysed and most of them are from **France (41)**, followed by <u>Germany with 28 and Belgium with 20</u>. The figure below shows all the results about the type and country of origin of the selected investors.







Figure 21: Typology and country of origin of the organisation belonging to the "finance" category.

Finally, the selected investors have been analysed based on the beneficiaries they address and **almost all of them invest in start-ups (203)**. Then, <u>116 of the selected investors finance small-cap companies</u>, <u>106 mid-cap companies</u> and <u>44 finance mixed and consortia</u>.



Figure 22: Selected investors per type of addressed beneficiaries.

A list of top investors can be seen in section 3 of this document, in *Figure 2*. The investors in the figure in question have been represented by type and their choice is purely representative, as their selection process was different from the suppliers and buyers as explained above and therefore it was not possible to rank them.



6. IDENTIFICATION OF KEY PLAYERS FOR THE ENTRANCE PLATFORM

6.1. ENTRANCE POSITIONING MAPS

The identification of some of the most relevant organisations resulting from the analysis carried out and summarised in the previous section, has been illustrated by using PNO's *Market and Innovation Positioning Maps* © whose general concept is described above. They are organised per mode of transport and represented according to the ENTRANCE taxonomy (Table 2), except than for *Modality*, for which we have built a single MIPM.

Following the general description in Section 3, for each technology and mode of transport the results have been extracted and displayed in the related maps, where the following criteria have contributed to rank the organisations and position them therefore:

- More selected interesting project participations
- More selected related published patents
- More presences in the databases consulted for the desktop search
- Presence in all or two of the three (projects, patents, desktop) analyses carried out
- Priority to SMEs and Start-ups if they don't meet the above criteria.
- Higher TRLs and readiness

The resulting MIPM are displayed below. It should be noted that despite the detail, the classifications are very broad and in principle dynamic since positions can change in time. This reflects into the variety of companies found on the same map. In principle, more specific maps can be built effectively to scout specific sectors.

HOW TO READ THE MAPS?

- the more an organisation is on the right the more it respects the above criteria and is innovation oriented for the specific observed ENTRANCE technology.
- The right quadrants are thus more related to suppliers, with the lower part including innovators with lower financing capacity
- The left quadrants relate to interested buyers (up) or companies moving towards the market or part of niche experts crowd (down)
- Maps more crowded on the right represent more mature technology segments



6.2. ELECTRIFICATION

There is a large number of organisations contributing to the development, improvement and adoption of electric vehicles or other electrification technologies to reduce and mitigate emissions in the transportation sector.

The maps below show that for each mode of transport there are some companies that are ahead of others from an innovative point of view and for each mode of transport we can focus on different companies. This means that <u>there are companies specialised per each transport mode that are driving innovation</u>.

In the **road transport** segment, there are two SMEs having a higher innovation and affinity rate compared with other organisation present in the *Figure 23*: Lightyear One (a long range **solar electric vehicle**) and Tevva Motors (an **e-Trucks fleet**) can be indeed considered at the forefront in the electrification of road transport; besides these two, we can also mention Daze Technology SrI, an SME which produces and supplies **charging systems for electric cars** and which is very close to the right side of the map, having an excellent innovation and affinity rate.

The electrification of **rail transport** shows few interesting companies which are investing in or are developing innovative technologies. However, the map (*Figure 24*) shows a company which differs from the others by its position: Skeleton Technologies, an SME that develops ultracapacitors which have the potential to revolutionize the rail industry in terms of energy savings able to provide effective voltage stabilization for rail systems, greatly improves the performance of propulsion for light rail vehicles and significantly advances the locomotive engine starting technologies.

The electrification of **waterborne transport** shows such interesting companies which are investing in or are developing innovative technologies. Among the various big companies on the map (*Figure 25*) in the area of electricity production / supply / usage, to emerge is SeaBubbles, a French start-up which has developed a small, fast & very efficient **electric hydrofoil craft** that that can carry a driver & four passengers with a max speed of 30 km/h, while producing no emissions or noise.

Finally, the electrification of **air transport** sees several emerging companies in the right part of the map (*Figure 26*), which classifies them as the most innovative. Indeed, the map highlights Lilium Aviation and Volocopter GmbH as "incumbents". The two companies can be considered the pioneers of the electrification of air transport, both promoting **air electric mobility as a regional taxi service with vertical take-off landing (VTOL)** and being both very young and becoming large enterprises in a short time thanks to the huge funding received and then the revenues earned. Similar companies that in the next future can fall into the right part of the map are *Heart Aerospace* and *Neoptera Aero*.









Figure 24: Main actors in the electrification of rail transport.









Figure 26: Main actors in the electrification of air transport.



6.3. ALTERNATIVE FUELS AND VEHICLES

In this specific category, there is a large number of potential buyers of innovative technologies in its upperleft part and a more moderate number of followers / potential providers at the bottom. Again, this reflects an opportunity as long as the ecosystem will not generate "movement" to the right of the map and thus towards the market.

As the maps in this section show, the majority of large companies versus those that should drive innovation is evidenced by the fact that the market appears to be "dominated" by the same company in at least three out of four sectors: Ballard Power Systems Europe, which is a leader in developing **fuel cell solutions** for different types of transport, is the most innovative company emerged in the maps related the **road**, **rail and waterborne transportation**.

The map related the **road transportation** (*Figure 27*) shows that, besides Ballard positioned in the right part, there are two SMEs and a start-up which are next to the line that divides the most innovative companies from the least ones: ITM Power Plc, which manufactures integrated **hydrogen energy solutions** to enhance the utilisation of renewable energy that would otherwise be wasted; Carbon Recycling International (CRI EHF), an Icelandic SME that produces **renewable methanol** for the road transport sector; NanoSUN Limited, a UK start-up which has re-invented the **hydrogen refuelling station** to accelerate the adoption of hydrogen in transport.

Regarding the **rail transport**, the map (*Figure 28*) shows few companies related to the development and adoption of this technology and only one located below the line that divides those with more investment capacity from those with less, which should instead be technology suppliers. This company is Digas Group, a Latvian SME which has developed and patented a **dual fuel system**, called NYSMART, that can be quickly and simply installed onto diesel engine converting it into dual fuel engine where environmentally friendly, clean and inexpensive methane fuel (Natural gas, Bio methane, Synthetic gas) is used to substitute polluting and expensive diesel fuel in locomotives.

The **waterborne transport**, instead, sees a high number of companies, but none that differs from the others according to its position on the map (*Figure 29*), unlike the aforementioned Ballard.

Finally, the **air transport** is the unique transport mode in which Ballard does not appear. The map (*Figure 30*) highlights on the right side H2Fly GmbH, a start-up founded by DLR, which is building and promoting hydrogen electric passenger air travel with its in-house **hydrogen electric powertrain**. In addition to H2Fly, two SMEs are located further to the right of the others and therefore considered more "innovative": Ineratec GmbH, which provides modular chemical plants for **Power-to-X and Gas-to-Liquid applications** and supplies sustainable fuels (e-kerosene, clean diesel, methanol, etc.) and products, and AeroMobil SRO, which is developing a **flying car with hybrid propulsion**.









Figure 28: Main actors in alternative fuels and vehicles for rail transport.









Figure 30: Main actors in alternative fuels and vehicles for air transport.



6.4. MANAGEMENT SYSTEMS AND DIGITALISATION

As for digitalization technologies (AI, ML, big data and similar) and management systems (ITS and other management tools), the maps below show many start-ups and emerging companies that are driving innovation and that are in a transition phase from the left to the right of the maps, in the face of the big players of the various modes of transport ready to integrate these technologies into their already advanced systems and products.

The **road transport** is the unique transport mode for this category of technologies which sees a company in the right part of the map (*Figure 31*): Easymile, a joint venture formed by Ligier Group, a French manufacturer of micro-cars for innovative mobility, and Robosoft, a French provider of robotic and autonomous solutions for various sectors, which has developed the most-used **fleet management system for autonomous vehicles** in both passenger transport and logistics. In addition to Easymile, the map shows two interesting SMEs, GoOpti and Transmetrics, which are next to the most innovative area in the bottom-right quadrant. GoOpti has developed an innovative method for **booking via app the transport to airports**, while Transmetrics has developed an advanced **AI platform to optimize logistics** and they both can be considered as emerging companies and, probably, future technology providers in this category.

In the **rail transport** map (*Figure 32*), instead, there are no organizations with a relevant rate to be present in the most innovative quadrants of the map and in general there are few that stand out from the others. However, it is possible to highlight OTIV, a Belgian start-up which <u>is developing world-class</u> <u>algorithms</u> and <u>high-performance</u> <u>industrial-grade</u> <u>computing</u> unit able to upgrade rail operations and transportation to become safer and more efficient, teaching vehicles on rails to <u>drive autonomously</u>, and it can probably fall into the "technology provider" category in the near future.

Even the **waterborne transport** map (*Figure 33*) shows few players that are interested in or are developing innovative management systems for maritime/inland transport. The upper-left part of the map shows the big players which develops relevant technologies in this field, such as Kongsberg Maritime, ABB, Indra Sistemas, etc..., and the main tier-1/tier-2 of the marine sector resulted from the analysis, such as Wartsila, Volvo, Siemens. In the bottom of the map, instead, the focus can be on Awake.AI, a start-up that <u>fosters building an ecosystem focusing on developing smart ports and autonomous shipping</u> and which can fall into "technology provider" category in the near future.

Finally, the **air transport** map (*Figure 34*) shows that the big players in air transportation sector are interested in investing in management technologies to reduce their environmental impact, together with the leading companies which develop and provide this type of solutions. However, no one of the big players we're referring (upper part of the map) has an innovation rate that stands out from the others. On the other hand, we can focus our attention on Dronamics, a start-up with offices in Bulgaria and the UK which is developing the world-leading **cargo UAV** "The Black Swan" - a revolutionary fixed-wing unmanned aircraft that can transport 350 kg at a distance of 2,500 km cheaper than any aircraft in existence. It is possible to hypothesize that in the next few years the start-up can completely fall into the right side of the map.









Figure 32: Main actors in management systems and digitalisation technologies for rail transport.





Figure 33: Main actors in management systems and digitalisation technologies for waterborne transport.



Figure 34: Main actors in management systems and digitalisation technologies for air transport.



6.5. INNOVATIVE MATERIALS

The maps created for the innovative materials solutions highlight an overall less crowded ecosystem. The number of relevant organisations, in fact, in this field is lower than the other technologies analysed for the different mode of transports, except for air transportation.

Among these few companies, we can however highlight Hydrogenious Technologies GmbH, an SME which has developed an innovative Liquid Organic Hydrogen Carrier (LOHC) for hydrogen storage and transportation, and which has the highest innovation and affinity index in both road (*Figure 35*) and rail (*Figure 36*) transport modes. In the same modes of transport maps, another company can catch our attention: Hysilabs, which also produces an innovative hydrogen carrier, called HydroSil, and which is located in the middle part of both maps, thus being able to reach Hydrogenious on the right side in the near future.

The map related the **waterborne transport** (*Figure 37*) sees even fewer relevant players, among which Umicore stands out thanks to its high investing capacity and innovation/affinity index. Umicore, indeed, is a large enterprise leader in production of **catalysts to eliminate NOx** from vessel engines of all sizes and can be considered a market leader in the sector.

The map of **air transport** (*Figure 38*) is the unique for this technology with a good number of organisations represented. In fact, there are several organisations (big players such as Airbus, Safran, GE Aviation, etc.) which are interested in or are developing materials to reduce the weight of aircrafts parts or components and consequently reduce the emissions of air transport industry. However, the map shows that all the organizations are concentrated on the left side, testifying that there is no one company in this field that stands out from the others regarding the degree of innovation. It is a segment hold by established leaders, but we can still note the position of Composite Research Srl, which developed and patented MadFlex, a technology that allows the creation of **ultralight multilayer panels**, and which according to our calculation index is the one on the far right of the map.





Figure 36: Main actors in innovative materials solutions for rail transport.

Figure 38: Main actors in innovative materials solutions for air transport.

6.6. OTHER TECHNOLOGIES

This section will show the maps of the organizations related to the other technologies considered: *smart solutions, transport & logistics operations, vehicle design, vehicle technology, other.* These technologies have been put together (and divided by mode of transport) because they do not have many other relevant players based on our selection criteria.

The road transport map (*Figure 39*) highlights two SMEs on its right side: Nuwiel Gmbh, which has developed an electric trailer to transport goods with automated brake and acceleration system for bikes, and Fuelsave GmbH, which develops several solutions to increase efficiency and lower the impact in the environment, such as highly efficient new type of engine and other solutions able to save fuel.

In the **rail transport** map (*Figure 40*) there are no organizations that are particularly distinguished from the others. In fact, the map shows the main big players in rail transportation interested in and potentially buyers of new technologies capable to lower emissions in the sector and does not show emerging companies that can provide innovative solutions, with the exception of large companies such as Siemens AG and Thales Group.

Even in the **waterborne transport**, the number of small companies and organisations shown is limited, but it is possible to highlight SMEs which have fallen into the right side of the map (*Figure 41*): Norsepower Oy Ltd, which develops **rotor sails** able to make vessels fuelled by wind, and Bound4blue SL, which is also an engineering company with the mission to deliver **automated wind-assisted propulsion** systems as a turnkey solution for all shipowners and shipping companies looking for a reduction in fuel costs and pollutant emissions.

The map of **air transport** (*Figure 42*), instead, shows the usual big players in the air transport sector in the upper part, while in the lower part some organizations that conduct research and innovative engineering studies as well as some aeronautics engineering SMEs. The company that stands out from the others, with an innovation rate such as to make it fall into the right part of the map, is GKN Aerospace Sweden AB, company which is a major supplier of **integrated composite structures**, offers one of the most comprehensive capabilities in high performance metallics processing and is the world leading supplier of cockpit transparencies and passenger cabin windows.

Figure 40: Main actors in other technologies aiming to lower emissions for rail transport.

Figure 42: Main actors in other technologies aiming to lower emissions for air transport.

6.7. TECHNOLOGIES FOR MODALITY TRANSPORT

Finally, a separate map was built that included the main actors of combined transport (**modality transport**) because the technologies that favour its implementation can be considered different from those applied for other modes of transport. The map, shown below, allows the identification as most active and innovative organisations those which manage hubs and terminals (CSP Iberian Valencia Terminal Sausa, Duisport, PSA Antwerp, Interporto Padova, etc.), provide intermodal transport (Kombiverkehr, Hupac, Mercitalia, ZSSK Cargo, etc.) and some start-up/SME which develops technologies to favour the shift from a mode of transport to another. Among these, we can highlight Cargobeamer AG, an SME which provides a **smart**, **reliable and environmentally friendly system for intermodal transport** of all types of semi-trailers by rail and falls into the right part of the map.

Figure 43: Main actors in technologies able to implement modality transport.

7. CONCLUSIONS

This report clearly reflects on the complexity of the transport and mobility sector, while it at the same time clearly shows how vibrant it is while tackling its future sustainability. The ENTRANCE community will therefore be enriched by the possibility of contacting the wide range of identified stakeholders.

The main figures of this assessment considering the main profiles of the platform are:

- A total of **945 organisations** can be considered under the SUPPLY category.
- A total of **1013 organisations** can be considered under the DEMAND category.
- A total of **217 investors** have been identified as potential INVESTORS.

It is noticeable that all these entities are nowadays, or have been in recent years, active on innovation activities oriented to decarbonising the transport of goods and passengers.

This assessment will become a practical yet useful guidance for identifying the entities that could represent the early adopters for the ENTRANCE platform. The approach will combine the knowledge collected by performing this assessment with the strategy developed for the project and collected under deliverable 6.1 'Communication and Dissemination Plan'.

BIBLIOGRAPHY / REFERENCES

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- Ref2. European Commission. (2021). Shaping Europe's digital future Pre-Commercial Procurement.

8. ANNEX 1 – PROJECTS AND PATENTS IDENTIFICATION

The identification of R&D&I projects and patents has been performed on PNO's proprietary databases (e.g. on the Wheesbee intelligence platform (<u>link</u>)): each search is based on identified keywords as shown below.

All the projects funded by the listed programmes have been taken into account, considering the following boundaries:

- The project aims to lowering emissions in Transport and Mobility sector (e.g. projects regarding only to improve security in T&M sector are excluded);
- Technologies ready-to-market or TRL>6 for Smart, Green and Integrated Transport's H2020 call;
- Starting date from 01/2014 onwards.

The patent search has been instead performed considering the following boundaries:

- Patent with focus on lowering the environmental impact in the transport and mobility sector,
- Patent with *priority claim in Europe* (the technology has protection in Europe or in one of the European countries, also if it is patented by a non-European organisation);
- European applicants or applicants with offices in Europe;
- Patent with priority claim date from 01/2014 onwards;
- CPC codes regarding the field of lowering the emissions in the transportation sector: *B60* (Vehicles in General); *B61* (Railways); *B62* (Land Vehicles for Travelling otherwise than on Rails); *B63* (Ships or other Waterborne Vessels; Related Equipment); *B64* (Aircraft; Aviation; Cosmonautics); *E01* (Construction of Roads; Railways; or Bridges); *F01* (Machines or Engines in General); *F02* (Combustion Engines; Hot-Gas or Combustion-Product Engines Plants); *F03* (Machines or Engines for Liquids; Wind, Spring, or Weight Motors; Producing Mechanical Power or a Reactive Propulsive Thrust); *F16* (Engineering Elements and Units); *F17* (Storing or Distributing Gases or Liquids); *F23* (Combustion Apparatus; Combustion Processes); *H02* (Generation; Conversion or Distribution of Electric Power); *Y02T* (Climate Change Mitigation Technologies related to Transportation).

Table 7: Table of keywords

Sector/Objects	Land transport, Road transport, Logistics, Maritime transport, Seaborne transport, Sea transport, Waterborne transport, Inland waterways transport, Short-sea transport, Air transport, Rail transport, Railways, Locomotive, Train, Vessel, Ship, Shipping, Ferry, Boat, Car, Trailer, Truck, Bus, Aircraft, Tanker, Infrastructure, Freight transport, Mobility
Actions	Optimising, Improving, Reducing congestion, Enhancing, Reducing fuel consumption, Extending battery lifespan, Traffic controlling, Synchronising, Data sharing, Connecting, Increasing, Reducing weight
Solutions	Electrification, Electric vehicles, Fuel cell, Hydrogen, Liquid hydrogen, Alternative fuels, Biomethane, LNG, CNG, Bio-based fuels, Electric charging, Fast charging, EV range extender, Management systems, Smart charger, Internet of Things, ICT-based solution, Intelligent traffic system, Artificial intelligence, Intermodality, Smart system, Intelligent system, Lightweight material, Composites, Big data, 5G, Multimodality, Automation
Benefits	CO2 free, Zero emissions, Low fuel burn, Green transport, Low-emissions transport, Intelligent transport, Near to zero emissions, Low environmental impact, No pollutants, Decarbonization

D3.1 – Report on identified supply, demand and financing opportunities Dissemination level – PU

9. ANNEX 2 - PROJECTS IDENTIFIED

The list below, provides the acronym of all the projects that have been selected for this assessment. The total number of projects is 556. This list includes the results obtained by analysing projects under the programmes EIC Accelerator for SME (ex SME Instr.), LIFE, COSME (Competitiveness for SME), CEF Transport, EMFF (European Maritime and Fishery Fund), H2020 Smart, Green and Integrated Transport and INTERREG 2014-2020. It excludes other results that were found by desk research not corresponding to these programmes.

CASSIO FUTrailer **HvLIZER** IMPOWER2X MOBHYLE Simacan LINK DazePlug EEN HHSH **GREENing the BLUE** Cluster ACT FreShER SpaceTech4Sea ZboxBlueLogistics LIFE_SC LIFE ASPIRE LIVE ECOTRAVID LIFE GySTRA TankSensor LIFE LANDFILL BIOFUEL LIFE STEAM LIFE SAVE LIFE GYR **U-MOB LIFE** MILE21-Life i-SharE LIFE LIFE BrennerLEC LIFE GYM **BIOHEC-LIFE** FP TENDER ZapGoCharger Adaptcontrol comAUX Raven reinventing the tyre QualE-fly SMASH X-CAP LIFE METHAmorphosis BATTERY PLUS AVILOO bcheck MAXITHERM Capcooltech YawSTOP Triboconditioning WHIITE Seabubbles RebelRocket SmartRunway SkySaver SIADE SaaS UNITE SKLCarbonP2 SulPure SAFE-CTS RadiBond TrafficWise SMARTER-2 TRUFUS INCH PolyHalter

Hydrogenlogistics H2Engine Project Racoon Hailo-8 ONO HYDROSII Transmetrics OPTELA Matrix Charging I iveIT **HPCForEVs** INTRANSYS NYSMART Airport IQ Agro Highway FREEWAY GlobalBLED FastPrk-2 Echaea CONCEPT Circlenergy **BITRIDE BIKE SHARING** Addionics GoOpti CLOUD-VAS CREEV EHSTACK BUSUP LIFE 'N GRAB HY! **PROMETHEUS-5** LIFE BIOBCOMPO CAPOWER 4FOLD Phase 2 AINARA REBOOT LIFE CLINSH LIGHTYEAR Cryoshelter AQUASONIC DIESEL LIFE CIRCforBIO ACEP FENIX Decarbonised passenger transport at European Airports Connection of the Budapest-Arad railway line to the multimodal hub at Budapest Airport Implementation of Functional TWR at Göteborg Landvetter Airport Skavsta Access 2.0 Croatia Airlines joining the EGNOS family AIA's evolution into a high-performing node within the European ATM network Deployment of SESAR solutions in TAP's fleet Implementation of Voice over IP (VoIP) in the Barcelona Area Control Centre Watertruck+ Bridges and culverts in the Münster city section of the Dortmund-Ems canal

New multimodal terminal of the Port of Strasbourg/Lauterbourg Studies of river access to Port 2000 Breakthrough LNG deployment in inland waterway transport Core Network port Regensburg - improving accessibility LNG for shipping and logistics in Europe ING Logistics PAN-LNG-4-DANUBE Trimodal Linz port - Rail connection and port enhancement Port-Liner, "zero emission" ships for inland waterways Upgrade of the combined cargo terminal rail infrastructure at the Port of Moerdijk Upgrading infrastructure at Seville Port to improve interconnection between the waterway and rail and maritime transport Port development of the Ports of Mulhouse-Rhine Electrification of the Seine Axis: onshore power and water supply for fluvial units Upgrading infrastructure for waterborne operations at three locations on the Maas and Albertkanaal GAINN4SHIP INNOVATION Cleanport Nordic Maritime Hub The northern ScanMed ports - Sustainable maritime links Twin-Port 2 ReaLNG HEKLA STM Validation Project Back from Black Environmental compliance and upgrade of the North Sea MoS Felixstowe-Vlaardingen Biscay Line - Multiple port Finland-Estonia-Belgium-Spain long distance MoS, relevant to many core network corridors Zero Emission Ferries - a green link across the Oresund Planning, construction, demonstration and market roll-out of small-scale liquefaction and supply facility for Liquefied Biogas (LBG) as alternative fuel for the transport sector Upgrading and sustaining the competitive Germany-Finland (RoRo multiple ports loop) Baltic MoS link Rostock-Gedser Motorway of the Sea -Part 2 Poseidon-Med II elmpact GAINN4MOS Study and deployment of integrated gas & water cleaning system and biofuel-MGO blend for Atlantic Corridor upgrade

Installation of gas & water cleaning system for the upgrade of the Atlantic Arch CORE LNGas hive INES GAINN4CORE DOOR2LNG Bothnia Bulk Blue Baltics S/F SamueLNG for a Blue Atlantic Arch EG LNG bunker vessel SuperGreen LNGHIVE2 GAINN4MID TWIN PORT III LNGHIVE2 VESSELS DEMAND BlueHUBS Cargo capacity upgrade and LNG bunkering Swinoujscie - Ystad maritime link EU Green Loop Eastern Baltic Hub - Improving port access and hinterland connection of the HaminaKotka port in the ScanMed corridor Ravenna Port Hub: infrastructural works GAINN4SEA Intelligent Sea GREEN C PORTS iTerminals 4.0 SMART-C Upgrade of the combined transport RSC terminal Rotterdam Feasibility study and technical documentation of the intelligent cargo road traffic management system in the port of Gdynia Electronic and Autonomous Smart. Multimodal Transportation System and Port Operations Blue Port Kiel ALFION LNGHIVE2 Santander LNGHIVE2 Vessels Demand2 EALINGWorks Valenciaport LNGHIVE2 Barcelona LNGHIVE2 Algeciras Sea Li-ion EALING Upgrade of the Kapellskär-Naantali (MoS Finnlink) Baltic sea bridge Upgrading the port of St Malo for safe, secure and sustainable RoPax traffic development Upgrading works for a sustainable growth New RoRo ramp at Port of Dunkirk: securing & improving environmental performance of the traffic on the NS-Med corridor H2Bordeaux Hansalink 2 Naples LNG Coastal Depot High Voltage Shore Connection (HVSC) for the TEN-T Core Grand Harbour Port, Malta - Action A Bio2Bunker Preparing the port of Karlshamn for the next generation of large Ro-Pax vessels and provision of onshore power supply Gävle Port - Electrified railway connection Pilot deployment of a smart (bio-) in Flanders, LNG/CNG network investigating an innovative "mobile CNG pipeline" concept Safe and secure infrastructure in Flanders

FAST-E (DE/BE) MECOR NEXT-ITS 2 EU ITS Platform COHRS **URSA MAJOR 2** GREAT **CROCODILE 2** UNIT-E Arc Atlantique Corridor phase II Connect2LNG H2Nodes BESTWay FAST-E (SK\CZ) Development of LNG/L-CNG network in Finland EAS-HyMob TIMELY Development of LNG infrastructure in Poland - the pilot project Study of innovative natural gas solutions for road transport in north west Europe with pilot deployment in UK and the Netherlands CITRUS C-ROADS CZECH REPUBLIC Studies for construction of the D52 motorway, Bavory- CZ/AT border section Electric vehicle fast charging backbone network Central Europe C-Roads-Germany Deployment of autogas refuelling stations in different metropolitan areas between Spain and Portugal SolC-ITS POSTLowCIT INMAB SiLNGT Small Scale Transport InterCor EAST-E Creation of an LNG road haulage market in a smart & quick way Models for Economic Hydrogen Refuelling Infrastructure UI TRA-F CIRVE EVA+ LNG motion: Fuelling trucks with LNG/CNG along the Core Network AUTOCITS C-Roads France Deployment of autogas refuelling stations in different metropolitan areas between Spain and Portugal CIRVE_PT CNG ROMANIA C-Roads Slovenia NCE-FastEvNet C-Roads Belgium/Wallonia Modernisation of the I-8 Kalotina-Sofia Ring Road, from km 1+000 to km 15+500 and stage link URSA Czechia LNG4Trucks Study for a pilot CNG filling station network C-Roads Spain NEST-ITS 3 URSA MAJOR neo High speed electric mobility across Europe ECO-GATE SOCRATES2.0 H2Benelux

BENEFIC

CONCORDA

E-VIA - FLEX-E Comprehensive fast-charging corridor network in South East Europe NEXT-E URBAN-E MI2 C-ROADS ITALY GAINN4MED Upgrading of Modal Interconnection on Malta's TEN-T (road) Core Network: Marsaxlokk-Luqa-Valletta (Marsa - Action B1 and parts of Actions B2, B3 and B4) BIOLNG4EU LEM project C-ROADS Portugal Nordic Hydrogen Corridor Traffic Management Integration in the National Traffic Management Centre 2 FueLCNG Liquiefied BioGas: Fuelling renewable transport in the Visegrad countries EUROP-E H2Bus Europe Central European Ultra Charging MEGA-E BioLNG EuroNet MULTI-E Blue Stations Network Zero Emission Valley LAST MILE CORRI-DOOR² Olympic Energy Green Connect - A public CNG network CRE8 AMBRA-Electrify Europe Snam 4 Mobility **REMETBUS2** Rotterdam Zero emission public transport services for Schiphol Amsterdam Airport and along the core corridors. PURE H2 Building a charging infrastructure for electric vehicles in order to decarbonise public transport in Warsaw Svealand Public Transport infrastructure roll-out for biogas and electric buses C-ROADS Greece C-ROADS Austria 2 NordicWay 3 - Urban Connection InDID Mobilidata Construction of the Lefkosia South Orbital Motorway - Phase B3 Grupo Ruiz Clean Bus Fleet ISM Development of a network of alternative fuel technology in the Atlantic and Mediterranean corridors across Spain ECO-Net Total High Power Charging Planning and design phases of TEN-T priority route improvement in Donegal EV Charging Italy EV Stations 2.0 Zero Emission Buses for public transport in Amsterdam, The Netherlands RESTART Development of Sofia railway junction: Sofia-Voluyak railway section Knappenrode-Horka-German/Polish border section: upgrade, electrification and ETCS planning

40-CONTECH MEDAS 3.0

MEDAS 3.0

ETCS: development of the generic design Level 2, key catalyst for the roll-out of ETCS2 in Belgium

Coordinatedandharmonisedimplementation of rail freight corridors andfreight corridors andfreightandpassengertelematicsapplications

ETCS Petrovice u Karvine-Ostrava-Prerov-Breclav

ERTMS Deployment on the German part of the Rhine-Alpine Core Network Corridor Support and coordination of the Rhine-

Alpine Rail Freight Corridor for its long term sustainable operation RIO Railway Infrastructure Optimisation

ERTMS Trackside deployment along the Copenhagen H–Køge Nord–Ringsted section in East Denmark

Construction of railway infrastructure in the Rododafni-Psathopirgos section of the new Athens-Patras railway line

Murcia LAA

Aveiro-Salamanca-Medina del Campo railway connection: Works on energy facilities and services to follow-up works Implementation of UIC gauge (phase 1) on the Valencia-Tarragona-Barcelona section of the Mediterranean Corridor

New Southern Rail and Road Access to the Port of Barcelona - Phase 2 - Connection Works

Development of Rail Freight Corridor Atlantic "Sines-Lisboa/Leixões-Madrid-Medina del Campo/ Bilbao/San Sebastian-Irun-Bordeaux-Paris/Le Havre/Metz-Strasbourg /Mannheim/Sines-Elvas/Algeciras"

Support to ERTMS implementation

Studies and activities regarding the enhancement of Baltic-Adriatic Rail Freight Corridor

New high capacity railway line: Central Trans-Pyrenees crossing. Studies (Phase 2)

Development of a 1,435 mm standard gauge railway line in the Rail Baltica corridor through Estonia, Latvia and Lithuania

Creation of permanent counterflow installations on the Gazinet-Dax section to increase capacity

Rail2Bordeaux

ARMIS

Modernisation of the Serqueux-Gisors railway line

ETCS Deployment on the French part of the Antwerp-Basel route

Preparation for construction of a second track, upgrade and modernisation of the

Škrljevo-Rijeka-Jurdani railway section Design and study for the modernisation of the Békéscsaba–Lőkösháza (country

border) railway section Upgrading the Kelenföld-Pusztaszabolcs railway line, Stage I (Upgrading the Kelenföld-Százhalombatta section and installation of ETCS level 2)

ERTMS Deployment on the Italian part of the Rhine-Alpine Core Network Corridor

Upgrade and Strengthening of Rail Freight Corridor 6 - Mediterranean Corridor including extension to Croatia MXP-AT Railink

Enhancing the efficiency of the new container terminal of Interporto di Padova Brussel-Luxembourg-Strasbourg section of the "EuroCap-Rail" - Luxembourg rail network, works for the construction of a new section providing a direct link between Luxembourg Station and Bettembourg Station

Retrofitting locomotives with ETCS baseline 3

Preparatory study for the deployment of ERTMS on the Kijfhoek (Port of Rotterdam)–Roosendaal–Belgian border railway line section

Works on the E75 railway line (Sadowne-Czyżew section) along with the remaining works on the Warsawa Rembertów-Sadowne section

Studies for the Aveiro-Vilar Formoso rail section

Rehabilitation of the Brasov–Simeria railway line, upgrade for a maximum speed of 160 kph

MidNordic Corridor – Electrification and reconstruction of a Cross Border Link

Bottleneck rehabilitation in the area of Bivje on the Divača–Koper railway line

Technical Equipment and Infrastructure Upgrade: Londonderry to Coleraine Rail Line

Birmingham International Station integrated TEN-T transport hub

Deployment of ETCS Bsl3 L2 on 106 AM Break motor units - Retrofit action to promote safety and cross border transport Modernisation of the Kostenets–Septemvri railway section

Implementation of TAF TSI at private railway undertakings

Deployment of ERTMS/ETCS on-board components compliant with ETCS Baseline 3 in ČD CARGO, a.s. vehicles on the Rail Freight/Core Network Corridors Deployment of ERTMS/ETCS on-board components compliant with Baseline 3 in České dráhy a.s. vehicles

ETCS Beroun-Plzeň-Cheb

Paskov Multimodal Container Terminal Intermodal Terminal Melnik, Phases 2 and

Upgrade and retrofitting of on-board ERTMS in Renfe's vehicles

Sines/Lisboa-Madrid high speed rail line -Madrid urban node. Studies for an improved and intermodal adaptation of Chamartín station and high speed access to Madrid airport

Studies and works for connections by rail of 4 existing freight terminals along the Mediterranean Corridor in Spain RAISE-IT

Project to install ERTMS Baseline 3 on the Regional trains linking France and Luxembourg

Studies for the implementation of the Toulouse Aerospace Express project

Upgrade of the existing track and construction of a second one on the

Križevci-Koprivnica-state border railway line section

Upgrade of the Százhalombatta-Pusztaszabolcs railway section, including the installation of ETCS Level 2

Stage 2 deployment of the GSM-R system on the TEN-T Railway Core Network in Hungary

Enhancing Interporto di Padova - Step 2: ancillary measures and ICT solutions for optimising terminal operations, accessibility and interconnections

Vado Multimodal Platform rail/road terminal (core RRT node of the TEN-T network) intermodal connections optimisation and Upgrading (VAMP UP)

ERTMS L2 B3 On-board deployment on NS vehicles

Electrification of railway lines 278 and 274, Węgliniec-Zgorzelec section

Rehabilitation of the Braşov–Sighişoara railway section, Apaţa–Caţa sub-section

Deployment of on-board ERTMS in Sweden

Deployment of ERTMS/ETCS on the Dobova-Zidani Most and Pragersko-Maribor-Sentilj railway lines

Upgrade of the Zidani Most-Celje railway line

Implementation of the technical interoperability for TAF-TSI subsystem at ZSSK CARGO

Modernisation of the Žilina–Košice railway line, Liptovský Mikuláš-Poprad-Tatry (outside) section, stage 1 (Poprad-Lučivná)

Shifting Freight2Rail

Electrification of the Mol-Weert (Belgian part) railway line

Deployment of ETCS Bsl3 L1+L2 on 42 HLE 13 locomotives – retrofit action to promote safety and cross-border transport Development of the Plovdiv Railway Node Upgrade and electrification of the Lohsa– Horka (a) route section

HYBRID-INFRA-RAIL

TAF/TAP–TSI implementation in Greece: Design and development of scalable TAF/TAP–TSI systems

FPSII - Advanced deployment of innovative solutions to improve railway traffic management & operation on the Core Network

Demonstration study of infrastructure associated with an innovative LNG traction solution in railway operations

2EUStates2cross

Implementation Study for the optimisation of the cross-border rail infrastructure in the Ghent-Terneuzen port area

Sharing of train tracking & estimated time of arrival information

Implementation of TAF-TSI at the Hungarian private railway undertakings MiRO

ERTMS on strategic sections of 3 Core Network Corridors

Construction of a pilot docking station, as a part of an LNG distribution system based on cryogenic tank containers

Deployment of ERTMS/ETCS on TEN-T Core Network railway lines

Sustainable Public Transport in the Urban Node Malmö Deployment of on-board ERTMS in Sweden Delivery and installation of ETCS into 361 series motive power units for ZSSK Upgrading and electrification from Vienna Stadlau to the Slovakian Border near Marchegg (bottleneck removal) Cross-border TAF TSI Telematics investment Action TAF-TSI: Investing in digital DB communication infrastructure based on telematics application for freight Implementing the Scan-Med corridor -Upgrading the Danish railway access line to the Fehmarnbelt tunnel (Phase 1) Core Network - Elimination of Lyon railway bottleneck Track-side deployment of ERTMS level 2 baseline 3 on the Paris-Lyon HSL Rail Freight Strengthening Project -Retrofitting of MIR loco E405/E412 with ETCS/ERTMS L2 Baseline 3 ERTMS Baseline 3 upgrade on-board units (OBUs) Rhine-Alpine freight locomotives -Deployment of ERTMS On-board in Sweden 2017-2023 VTG Rail Europe status oriented and predictive maintenance Variable Gauge For Freight Transport Implementing Telematics Applications for European Interoperability Building interoperable rail system in the Baltic countries SaMiR MiRO I RAII Automated combined transport terminal in Calais enabling the modal shift of all types of semi-trailers from road to rail Centralising open access intermodal terminal operations for extra-long freight trains in the Kouvola rail-road terminal Track-side deployment of ERTMS in the Channel Tunnel and interfaces with neighbouring networks InGF Veneto Region coordinated initiative enhancing core intermodal nodes Upgrade and electrification of the Szentgotthárd/Jennersdorf (Hungary Austria)-Graz railway line Upgrade and electrification of the Wiener Neustadt-state border-Loipersbach-Schattendorf (-Sopron) railway line ERTMS prototyping for TRAXX MS2 and TRAXX AC3 locomotives On-board deployment of ETCS Baseline 3 for Siemens locomotives operating on the TEN-T ERTMS equipment of Baden-Wuertemberg regional rolling stock Electrification and signalling works in cross-border Guillarei-Tui section LARA TEN-T Upgrade DART+ South West, Engineering Design On Board ERTMS B3 equipment for the Lombardy Fleet

MXP-NLINE

Prototype for retrofit of Drielandentrein (through-train Liège-Maastricht-Aachen) with ERTMS (B3) on-board equipment Rotterdam and EU hinterland connection: Theemsweg railway section superstructure Establishment of a new Comprehensive TEN-T Network cross-border line linking the Katowice and Ostrava regions (Phase I) Feasibility study and technical design for the modernization of the Coslariu - Cluj-Napoca Railway Line Battery Cortex **DIS LOGUN** M4H2LM ITORQUE DEE-DCR-RE BAMBOO SMARTBUS X-Weaving LPG for downsized engines MODBATEV GALILEO 4 Mobility FLAGSHIPS THOR HEAVEN H2Haul H2ME JIVE JIVE 2 ZEFER FCH2RAIL StaSHH SAT GAM 2018 FR8RAIL II FR8RAIL III FR8RAIL IV FINF-2 X2RAIL-3 X2RAIL-4 PIVOT2 REG GAM 2018 SPARE TOD WINFRAME 4.0 EESTEM **cLEvER** FRC GAM 2018 TRAIL VOLT 9eGEN EINSTAIN PROPCONEL EDEC ENG GAM 2018 GAM-2020-ENG DEFLECT IMASAT MIDAS SYS GAM 2018 NSLGP SCOPUS CoCoNut IMPERIAL **INN-PAEK** FRCDoorDemonstrator HEPODIS LightAir **IOVISTAS VIRTEST** NADiA

ELCOCOS FITCoW WELTMAP GAM AIR 2018 GAM-2020-AIR INTELLICONT ITEMB LPA GAM 2018 HLFC 4.0 ShipFC COSMHYC DEMO HyShip CoacHyfied PJ28 IAO GRADE DIGITS-AU ALBATROSS PJ38-W3-ADSCENSIO E-ferry LeanShips GreenCharge MEISTER HySeas III HyMethShip 1000kmPLUS CEVOLVER SYS2WHEEL AUTOSHIP GasOn **ECOCHAMPS** HDGAS PORTIS IMPERIUM **HERCULES-2** ORCA THOMSON RotorDEMO ELECTRIC_AXLE GEE CIVITAS ECCENTRIC optiTruck C-MobILE ENABLEH2 SELFIE ICT4CART AEROFLEX EVC1000 TELL ASSURED STEVE COLHD GHOST LONGRUN SOLUTIONSplus SHOW INCIT-EV **USER-CHI** FASTWATER SeaTech eCharge4Drivers FLAMINGo LEONARDO REFLECTIVE MARBEL ALBATROSS ALMA HELIOS Current Direct URBANIZED PHOENICE

10.ANNEX 3 – STAKEHOLDERS IDENTIFIED

10.1. SUPPLY

The list below corresponds to all the entities that have been considered under the supply category. The total number of entities is 945.

"La Sapienza" University of Rome POMOS (Pole for Sustainable Mobility) Dept. 2ELECTRON **3DBATTERY LTD** 3LRobotics AAQIUS & AAQIUS SA AARHUS UNIVERSITET ABB Acc Mobility ADATICA ÉNGINEERING SL ADD Technologies ADDIONICS LTD ADDVOLT SA ADN CONTEXT - AWARE MOBILE SOLUTIONS SL ADVANCED INNOVATIVE ENGINEERING (UK) LIMITED AELER TECHNOLOGIES SA AERO CONSULTANTS AG AERO-MAGNESIUM LIMITED (A.C.S) AEROMECHS SRL AeroMobil AGA AB (LINDE GROUP) AGILE POWER S SWITCH 3D INTEGRATION AIMSUN SL AIR LIQUIDE SA AIRSEAS SAS AIRTEL ATN LIMITED AIT AUSTRIAN TECHNOLOGY GMBH OF INSTITUTE AKUO ENERGY SAS ALCATEL LUCENT (NOKIA) ALGRET INNOVATIONS LTD ALKE SRL ALLEGO BV ALTRAN ALTRAN ALTROCONSUMO EDIZIONI SRL ALTYS TECHNOLOGIES AMMINEX EMISSIONS TECHNOLOGY AS (FAURECIA) ANÈMOI MARINE TECHNOLOGIES LTD ANSYS UK LIMITED ANT Maschinen GmbH APPLIED NANO SURFACES SWEDEN AR AQUASONIC SL ARISTOTELIO PANEPISTIMIO THESSALONIKIS ARISTOTELIO PANEPISTIMIO THESSALONIKIS COMPUTER ENGINEERING DEPT. ARKEMA FRANCE SA ARTIN SPOL. S.R.O. ARTUS SAS (MEGGITT) ASCENDANCE Flight Technologies ASE SPA ASKOLL EVA SPA ASOCIACION CENTRO TECNOLOGICO CEIT ATAWEY ATLANTIS IT SL ATOM ATOS Auto Drive Solutions AUTOAID GMBH AUTOKAB SAS AUTOROUTES TRAFIC AUVE TECH OUE AVESTA BATTERY & ENERGY ENGINEERING AVIA INGENIERIA Y DISEGNO

AVILOO GMBH AVL SOFTWARE AND FUNCTIONS GMBH AVMAP AVT STOYE GMBH AVY BV Awake.Al AXEGAZ SA AZD PRAHA SRO BAE SYSTEMS (OPERATIONS) LIMITED Ballard Power Systems Europe A/S BASF SE BE CHARGE S.R.L BECKER MARINE SYSTEMS GMBH BE-MOBILE NV BENEVELLI SRL BESTMILE SA BIA POWER BigMile **BILLY BIKE** BIOWAY S.R.O BLACKSTONE TECHNOLOGY GMBH Blinkee.city BLU ELECTONIC SRL BLUE GRID GAS & POWER S.A. OF ENERGY BLUEBUS (BLUE SOLUTIONS, BOLLORE GROUP) BLUEDOT BLUEWAYS INTERNATIONAL BVBA BLYSTAD ENERGY MANAGEMENT AS BOC LIMITED (LINDE GROUP) BOUND4BLUE SL **BP CHARGEMASTER** Breda University of Applied Sciences BRIGHTLOOP SAS BringAuto BRNO UNIVERSITY OF TECHNOLOGY BROADBIT BATTERIES OY BRUSA ELEKTRONIK AG BULTACO MOTORS SL BUNKERNET LTD BUSINOVA BUSUP TECHNOLOGIES SL BUTAN PLIN CROATIA C.I.R.A. CENTRO ITALIANO RICERCHE AEROSPAZIALI SCPA C2C-NewCap CaCharge CAETANO AERONAUTIC SA CALBATT SRL CAPTAIN AI CARGOBEAMER AG CARGONEXX CARGOTEC OY Carplane® GmbH CEA - Commissariat à l'Energie Atomique et aux Energies Alternatives CEGELEC ŠA (ACTEMIUM) CEIIA CELCIBUS CELLINT TRAFFIC SOLUTIONS LTD CENEX - CENTRE OF EXCELLENCE FOR LOW CARBON AND FUEL CELL **TECHNOLOGIES** CENTRO NACIONAL DEL HIDROGENO CENTRUM DOPRAVNIHO VYZKUMU v.v.i. CEPSA CEREUS TECHNOLOGY CERTH-HIT CETIL DISPENSING TECHNOLOGY S.L.

CETMA - CENTRO DI RICERCHE EUROPEO DI TECNOLOGIE DESIGN E MATERIALI CEZ A.S. CHALMERS UNIVERSITY OF TECHNOLOGY CHAPS SPOL SRO ChargePoint CI COMPOSITE IMPULSE GMBH & CO Ciclogreen Move and Win S.L. CIMARRON COMPOSITES LLC CIMNE Circ CIRCLE SPA CIRCOMP GMBH CIRCONTROL SA CITYWAY CIXI CleanCar.io CLEANTRON CLEANTECH BATTERIES CLEM' CLEVER A/S CLMS (UK) LIMITED CLUE TECHNOLOGIES SL COLLECTE LOCALISATION SATELITTES (CLS GROUP) Composite Research srl COMPOSITES ARAGON SL COMPOXI S.L CONNECTED KERB CONOSHIP INTERNATIONAL BV CONTINENTAL AUTOMOTIVE GMBH CORIMA TECHNOLOGIES CORIOLIS COMPOSITES CORTUS ENERGY AB COSMOTE MOBILE TELECOMMUNICATIONS S.A. COVENTRY UNIVERSITY COVESS NV CRANFIELD UNIVERSITY CRI EHF CRYONORM SYSTEMS BV CRYOSHELTER GMBH CTAG CTLUP SRL D2M-ENERGYTRANSIT D3 Technologies AG DAEDALEAN AG Dancer Bus DANFOSS EDITRON OY DANMARKS TEKNISKE UNIVERSITET DAPHNE TECHNOLOGY SA DARETECH DATABEACON SL DAZETECHNOLOGY SRL DB ENERGIE GMBH DBA LAB SPA DBH LOGISTICS IT AG DecisionBrain DELORO WEAR SOLUTIONS GMBH DENISSON ENERGY S.R.L DEPA SA DEUTSCHE TELEKOM AG DEUTSCHES ZENTRUM FUR LUFT -UND RAUMFAHRT EV DIGITAL SYSTEM INTEGRATOR SRL DINITECH GMBH DOLPROP INDUSTRIES AB DRIVE SYSTEMS NV DRONAMICS DRONE-FUTURE BVBA DUBLIN CITY UNIVERSITY DUCKT

Dissemination level - PU

DUCKTRAIN DUFOUR AEROSPACE DYNAMIC E FLOW DYNNIQ NEDERLAND BV E.GO MOOVE GMBH E.ON EASE-LINK GMBH EASYMILE SAS EATON ELEKTROTECHNIKA SRO Eccocar Sharing S.L. ECHANDIA MARINE SWEDEN AB eCloud Company ECO EOLIC TOP SYSTEM SL ECOLE POLYTECHNIQUE FEDERALE DE LAUSANNE ECOVOLVE EDF - ELECTRICITE DE FRANCE EDISON SPA EDP ENERGIA EEBC - EUROPEAN ELECTRICAL BUS CO GMBH EESTI ENERGIA AS EFESTO EH GROUP ENGINEERING SA EIDGENOESSISCHE TECHNISCHE HOCHSCHULE ZUERICH EIFER EUROPAISCHES INSTITUT FUR ENERGIEFORSCHUNG EDF KIT EWIV EIFHYTEC EINRIDE ELAPHE POGONSKE TEHNOLOGIJE DOO ELECTREON ELECTROCHAEA GMBH ELECTROMAPS SL Electronic Solutions (ELSOL) ELEKTRO LJUBLJANA D.D. ELES DOO SISTEMSKI OPERATER PRENOSNEGA ELEKTROENERGETSKEGA OMREZJA ELOGEN ELONROAD AB ELRINGKLINGER GROUP ELWAYS AB EMINING AG EMPA FIDGENOSSISCHE MATERIALPRUFUNGS-UND FORSCHUNGSANSTALT Encolnvest International SL - ECO-CARS ENDESA ENERGIA SA ENEDIS SA ENEL GROUP ENERGETSKI INSTITUT HRV0.IF POZAR ENERTIME SA ENEXIS NETBEHEER BV ENGIE ENGIE INEO ENGIE LABORELEC ENI SPA ENIDE SOLUTIONS SL ENOS D.D. ENVIAM ENVIRONMENTAL PROTECTION ENGINEERING SA EOLY EP TENDER EPROINN SRL EQUINOR ENERGY AS ERICSSON AB ERNEO ERTMS SOLUTIONS SPRL ESTITI GMBH ESMART SYSTEMS AS ESSENCE Motocycles ETREL SVETOVANJE IN DRUGE STORITVE DOO E-TRUCKS EUROPE BVBA EURECOM EUROPEAN SUSTAINABLE PROPULSION EUROTECH SP ZOO EVA (Electric Visionary Aircraft) F-VAI SRI

EVARM INNOVATION SL EVBOX BV EVE SYSTEM SAS EVERFUEL EUROPE A/S **EVERYSENS** EVOLO EVOY AS FACHHOCHSCHULE NORDWESTSCHWEIZ FAIVELEY TRANSPORT ITALIA SPA (WABTEC) FCP FUEL CELL POWERTRAIN GMBH FELYX Fenris Motorcycles FERROAMP FIER Automotive BV FLUIDTIME DATA SERVICES GMBH FLYZEN FONDAZIONE BRUNO KESSLER FONDAZIONE DRUNO RESSI FONDAZIONE LINKS FORDONSGAS SVERIGE AB FORESHIP OY FORTUM OYJ FORTUM SVERIGE AB FRAUNHOFER VERKEHR FRAUNHOFER-CML FRAUNHOFER-IISB FRAUNHOFER-IMM FRAUNHOFER-ISE FRAUNHOFER-ISI FRAUNHOFER-ITWM FRAUNHOFER-IVI FRAUNHOFER-LBF FREEWAY SAS FREQUENTIS AG FREUDENBERG FST GMBH FRIEDRICH-ALEXANDER-UNIVERSITAET FRI ANGEN-NUERNBERG FUELSAVE GMBH FUNDACIO EURECAT Fundacio Privada i2Cat FUNDACION AITIIP FUNDACION ANDALUZA PARA EL DESARROLLO AEROESPACIAL FUNDACION CENTRO DF TECNOLOGIAS AERONAUTICAS FUNDACION CIDAUT FUNDACION CIDETEC FUNDACION CIBETEC FUNDACION CIRCE CENTRO DE INVESTIGACION DE RECURSOS Y CONSUMOS ENERGETICOS FUNDACION PARA LA INVESTIGACION, DESARROLLO Y APLICACION DE MATERIALES COMPUESTOS (FIDAMC) FUNDACION TECNALIA RESEARCH & INNOVATION FUNDACION VALENCIAPORT FUNKWERK SYSTEMS GMBH FURUNO FINLAND OY FUTURE PROOF SHIPPING BV FORSCHUNGSZENTRUM FZ INFORMATIK G.M.S. GLOBAL MARITIME SERVICES LIMITED G4S TELEMATIX S.A. GALILEO SATELLITE (GSN) LTD GALP GAS NATURAL SA NAVIGATION GARRETT MOTION GASPOL SA GASUM OY GAZELLE TECH Gdansk University of Technology GDYNIA Maritime University GECCO GERTEK SOCIEDAD DE GESTIONES Y SERVICIOS SA GERTRUDE SAEM GESTION INTELIGENTE DE CARGAS GEVAS SOFTWARE GMBH GEYSER BATTERIES OY GIVENTIS INTERNATIONAL BV

GLEAM TECHNOLOGIES GMBH GMVIS SKYSOFT SA GOOPTI INTELIGENTNE TRANSPORTNE RESITVE DOO GORDIAN Green Communications SAS GREENFLUX ASSETS BV Greensight GREENSPIDER GMBH GRUPA LOTOS SA GRUPO DISA GRUPO ETRA GTD SISTEMA DE INFORMACION SAU GULPLUG H2 ENERGY AG H2 MOBILITY GMBH H2FLY GMBH H2P SYSTEMS HACON INGENIEURGESELLSCHAFT MBH HAILO TECHNOLOGIES LTD HALMSTAD UNIVERSITY Hardt Hyperloop HEART AEROSPACE AB HEDNO SA Heilbronn University of Applied Sciences HEINZMANN GMBH & CO KG HELBIO S.A HELIOX BV HELMHOLTZ-ZENTRUM GEESTHACHT HEP D.D. HERA SPA HERE GLOBAL BV HEUSCH BOESEFELDT GMBH HEXAGON HEYCHAIGE GMbH HITACHI EUROPE LIMITED HITACHI RAIL STS SPA HIWITRONICS VERIEN ZUR UNTERSUCHUNG VON HI-FIDELITY WIRELESS ELEKTRONIK-LOSUNGEN HOCHSCHULE FUR TECHNIK UND WIRTSCHAFT DES SAARLANDES HOLLAND CONTAINER INNOVATIONS NEDERLAND B.V. HONEYWELL AEROSPACE Hrvatski Telekom d. d. HTREN FUEL SYSTEMS AS HUBJECT GMBH HUBUP HUG ENGINEERING AG Huvr Trek Group SL HUYGENS ENGINEERS BV HYBRID AIR VEHICLES LIMITED HYDROGENICS EUROPE HYDROGENIOUS **TECHNOLOGIES** HYDRUS ENGINEERING LIMITED HYGEAR BV HYGEN GMBH HYSILABS HYTCHERS I SEE MOBILITY GMBH I.M.A.S.T. DISTRETTO SULL'INGEGNERIA DEI MATERIALI POLIMERICI E STRUTTURE SCARL IBERDROLA SAU COMPOSITI IBIL SA IBK-INNOVATION GMBH & CO. KG IBM IRELAND LIMITED ICELANDIC NEW ENERGY LTD ICPE I-DE REDES **ELECTRICAS** INTELIGENTESSA IDEAS & MOTION SRL IDIADA AUTOMOTIVE TECHNOLOGY SA IDNEO TECHNOLOGIES SAU IEED VEDECOM IESTA - INSTITUT FUR INNOVATIVE ENERGIE STOFFAUSTAUSCHSYSTEME IFP Energies nouvelles

Dissemination level - PU

IFSTTAR IKEM - INSTITUT FUR KLIMASCHUTZ ENERGIE UND MOBILITAT-RECHT, OKONOMIE UND POLITIK EV **IKERLAN S. COOP** für Institut ILS-Landes und Stadtentwicklungsforschung gGmbH IM Efficiency IMEC IMECAR ELEKTRONIK INCAS - National Institute for Aerospace Research "Elie Carafoli" INDRA SISTEMAS SA INEGI - INSTITUTO DE CIENCIA E INOVACAO EM ENGENHARIA MECANICA Е ENGENHARIA INDUSTRIAL INERATEC GMBH INFORMATION TECHNOLOGY FOR MARKET LEADERSHIP InfoTripla Oy INGENIEURGESELLSCHAFT FUER AUTO UND VERKEHR GMBH INIT GROUP INLECOM INNOVATION INNOGY SE (E.ON.) INO8 InstaFreight INSTITUT MINES-TELECOM Institute for Innovative Technologies Ltd INSTITUTE METRON INSTITUTE OF COMMUNICATION AND COMPUTER SYSTEMS INTELLIGENT ENERGY LIMITED INTENS CORPORATION SRO INTERACTIVE FULLY ELECTRICAL VEHICLES SRL INTRACOM S.A. TELECOM SOLUTIONS INVENT GMBH **IO-DYNAMICS GMBH** IONITY GMBH IPT TECHNOLOGY GMBH IREC - FUNDACIO INSTITUT RECERCA DE L'ENERGIA CATALUNYA DE DE **IREN SPA** IRIZAR E-MOBILITY SL IRT ANTOINE DE SAINT EXUPERY ISTANBUL OKAN UNIVERSITESI ISTITUTO INTERNAZIONALE DELLE COMUNICAZIONI (IIC) ITACA SRL ITALIANA PETROLI SPA (GRUPPO API) ITM POWER PLC ITO WORLD LTD. IT'S'UNLIMITED SYSTEMS ENGINEERING BV TRADING AS NGENI IZIVIA (GROUPE EDF) JEMA ENERGY SA JOHNSON MATTHEY PLC Joulz Diensten B.V. Journify JSC VEJO PROJEKTAI KAPSCH KARDINAL KAROS KELAG KARNTNER ELEKTRIZITATS AKTIENGESELLSCHAFT KENTKART EGE ELEKTRONIK AS KEYOU GMBH KIDO DYNAMICS KIUNSYS (MUNICIPIA -ENGINEERING) GRUPPO KNORR-BREMSE SYSTEME SCHIENENFAHRZEUGE GMBH SYSTEME FUR KOLBERG CASPARY LAUTOM AS KONETIK KONGSBERG DIGITAL AS KONGSBERG MARITIME AS Koninklijke KPN NV TRANSPORTATION KONTRON AUSTRIA AG KRAFTHEM K-RYOLE

NAVLANDIS SL NAVYA NAWATechnologies Neander Shark GmbH NEDGIA MADRID S.A. (GRUPO NATURGY) NEDSTACK FUEL CELL TECHNOLOGY ΒV NEEL SP. ZOO NEL HYDROGEN AS NEOGLS NEOPTERA LTD NERVE SMART SYSTEMS APS NESTE OYJ Nevomo NEXEYA FRANCE NEXT Electric Motors NEXTANT APPLICATIONS & INNOVATIVE SOLUTION SRL (NAIS) NEXXTLAB SA NIMBER AS NLR - STICHTING NATIONAAL LUCHT-EN RUIMTEVAARTLABORATORIUM NOESIS SOLUTIONS NV NOKIA SOLUTIONS & NETWORKS NOMMON SOL TECHNOLOGIES SL NORDCOM SPA NORDSOL SOLUTIONS AND NORDSYS GMBH NORSEPOWER OY LTD NOVOTECH AEROSPACE ADVANCED TECHNOLOGY SRL NPROXX BV NTUA - NATIONAL UNIVERSITY OF ATHENS TECHNICAL NUWIEL GMBH NXP SEMICONDUCTORS NETHERLANDS B.V. OFFICINE MECCANICHE O.M.T. TORINO SPA O2 CZECH REPUBLIC OECON PRODUCTS & SERVICES GMBH OFFICE NATIONAL D'ETUDES ET DE RECHERCHES AEROSPATIALES OFFSHORE NAVIGATION LTD OLTIS GROUP A.S. OMV GROUP ON ELECTRIC SHARING MOBILITY ONOMOTION GMBH OnTruck OPEN TECHNOLOGY SERVICES AE OPUS REMOTE SENSING EUROPE SL Öresundskraft AB ORIBIKY ENGINEERING OTC SOCIEDAD LIMITADA OTIV OXEON AB OY LANGH TECH AB OY TURKU ENERGIA - ABO ENERGI AB Oy Woikoski Ab P.G.A. ELECTRONIC PANSA - POLSKA AGENCJA ZEGLUGI POWIETRZNEJ PARABOL ParkingMap PAROX ENERGY OU PASSION MOTORBIKE FACTORY SL PATENTEC AS Pavnext PAZTIR B.V. PENSO LTD PERS-EE PETROL GROUP PETROLEOS DE PORTUGAL PETROGAL S.A. PEX PHOENIX ISI PILDO LABS WESSEX LTD PIONIRA NV PITPOINT CLEAN FUELS

Dissemination level – PU

PJ MESSTECHNIK GMBH PLACE TO PLUG PLANET PLANUNGSGRUPPE ENERGIE UND TECHNIK GBR PLUSERVICE SRL POLITECNICO DI MILANO POLITECNICO DI MILANO - DAER POLITECNICO DI TORINO POLITECNICO DI TORINO - DIMEAS POLITECNICO DI TORINO - E3 GROUP POLYCOM PREDELAVA PLASTICNIH MAS INORODJARSTVO SKOFJA LOKA DOO POWER SYSTEM TECHNOLOGY PowerCell Sweden AB POWERDALE NV/SA POWERTECH SYSTEMS Poznan University of Technology PRAGMA INDUSTRIES FUEL CELLS PRIMARINE GMBH (ERC GROUP) Prins Autogassystemen B.V. PRISMA ELECTRONICS SA Privé S.r.I. PROBUNKERS PRODEVELOP SL PROMATECH MARITIME TECHNOLOGIES PROTASIS SA PROTOM GROUP SPA Proton Motor Fuel Cell GmbH PROTOTECH AS PTV AG QARIN BV QOOLERS S.R.O. QUMAK SA QWELLO R3 - RELIABLE REALTIME RADIO COMMUNICATIONS GMBH R53 ENGINEERING RADISURF APS RDIUP REBELROAM OU RED ELECTRICA DE ESPANA S.A.U. RenCat Aps Renovatio Asset Management SRL REPSOL SA RESCOLL RHEINENERGIE AG RHEINISCH-WESTFAELISCHE TECHNISCHE HOCHSCHULE AACHEN RHOE URBAN TECHNOLOGIES RISE RESEARCH INSTITUTES OF SWEDEN AB ROAD CLOUD OY ROBERT BOSCH GMBH ROLANDE BV ROOL'IN ROUTE220 SRL RUPTELA UAB RYSE HYDROGEN LIMITED SAAB TRASPONDERTECH AB SAFE GREEN LOGISTICS A/S SAFRAN AEROTECHNICS SAFRAN ELECTRICAL & POWER SAFRAN SA SAFT SammeVei SAMSUNG SDI BATTERY SYSTEMS GMBH SCANDINAOS AB SCANDINAVIAN AVIONICS GREECE SA SCHOLT ENERGY CONTROL BV SCOOBIC SeaBee SEABILITY LTD SEABUBBLES SEAFLEX AB SELT AEROSPACE & DEFENCE SEM SIGEIF MOBILITES SEM SRL - SMART ECO MOVING SENSEFIELDS SL SENSIBLE 4 OY SERVO MOVEMENT KFT SHELL

SHOTL SIA DIGAS SIEMENS AG SIEMENS INDUSTRY SOFTWARE SIEMENS MOBILITY GMBH SILENCE URBAN ECOMOBILITY SILEX INDUSTRIAL AUTOMATION PLC SIMACAN BV SINTEF AS SIQENS GMBH SIRRIS SiTI - Higher Institute on Territorial Systems for Innovation SKELETON TECHNOLOGIES SKYLIFE ENGINEERING SL Skymantics Europe SKYPULL SA SLOT CONSULTING LTD SMART AIRPORT SYSTEMS Smart Cylinders SMATRICS GMBH & CO KG SOFICO SOFLEET (SYNOX) SOFTECO SISMAT S.R.L. (ALGOWATT) SOFTWARE AG SOFTWHEEL LTD Sol Hivited Solbian Energie Alternative SRL Solmove GMBH Soltel IT Solutions SOLUM Solution F Sono Motors SOPHIA HIGH TECH SRL SPEAR POWER SYSTEMS BV SPIE SUD-EAST SPP A.S. SSPA SWEDEN AB Stadtwerke Bruneck Azienda Pubbliservizi Brunico STADTWERKE NORDERNEY GMBH STAM SRL STATENS VAG-OCH TRANSPORTFORSKNINGSINSTITUT STATIONS-E STATKRAFT HYDROGEN SWEDEN AB STEMMANN-TECHNIK GMBH STENA RECYCLING AB STORENGY STRATIO AUTOMOTIVE STREAMDATA.IO (AXWAY) SUBLIME Energie SUMY SUNSWAP SUPER RADIO AS SURFACE EFFECT SHIPS EUROPE AS (SES-X) SURVE MOBILITY GMBH SUSTAINABLE ENERGY AS SWARCO SWESTEP AB SWOBBEE GMBH SWUGO SYCUBE INFORMATIONSTECHNOLOGIE GMBH SYMBIO SYSADVANCE SISTEMAS DF ENGENHERIA S.A. TANKTWO OY INTERNATIONAL TASS MOBILITY CENTER B.V. (SIEMENS) TECHNI-MODUL ENGINEERING TECHNISCHE UNIVERSITAET GRAZ TECHNISCHE UNIVERSITAET ILMENAU TECHNISCHE UNIVERSITAET WIEN TECHNISCHE UNIVERSITAT BERLIN TECHNISCHE UNIVERSITEIT DELFT TECHNIUM AS (reTyre) TECHNO SYSTEM DEVELOPMENT SRL TECHNOLUTION BV TEKNO COMPOSITI SRL TEKNOLOGIAN TUTKIMUSKESKUS VTT OY

SHIFT Aviation Solutions Ireland

TEKNOLOGISK INSTITUT TELEFONICA SA TELENAVIS S.A. Teleport Mobility TERRAIN TECHNOLOGIES SL TERRAIN TECHNOLOGIES SL TEVVA MOTORS LIMITED THALES GROUP THYSSENKRUPP CARBON COMPONENTS TIER Mobility TITAN LNG BV T-MOBILE AUSTRIA GMBH T-MOBILE CZECH REPUBLIC TNO томтом TOTAL SA TRACKS TRACTABEL-ENGIE SA TRAFFIC TECHNIQUE SA Transilvania University of Brasov TRANSMETRICS AD TRANSPOLIS TRANSPORT & MOBILITY LEUVEN NV TRANSPORT SYSTEMS CATAPULT TRESOIL BIOFUELS SRL TRILOBES BV T-SYSTEMS INTERNATIONAL GMBH TTTECH GROUP TU EINDHOVEN Tuireann Energy Ltd. TURNN TWI LIMITED UBIGO INNOVATION AB UMICORE Uneed.IT Universidad Autonoma de Madrid Universidad Cardenal Herrera Universidad Carlos III de Madrid Universidad Complutense de Madrid Universidad de Alcalà Universidad de Almeria Universidad de Burgos Universidad de Cadiz Universidad de Cantabria Universidad de Cordoba Universidad de Extremadura Universidad de Granada Universidad de Jaèn Universidad de la Laguna Universidad de la Rioja Universidad de Las Palmas de Gran Canaria Universidad de Leon Universidad de Malaga Universidad de Murcia Universidad de Navarra Universidad de Salamanca Universidad de Valladolid Universidad de Vigo Universidad del País Vasco / Euskal Herriko Unibertsitatea Universidad Europea Universidad Francisco de Vitoria Universidad Miguel Hernandez UNIVERSIDAD POLITECN POLITECNICA DE MADRID UNIVERSIDAD POLITECNICA DE MADRID - INSIA DEPT Universidad Rey Juan Carlos Universidad San Pablo CEU UNIVERSIDADE DE COIMBRA Universidade de Coruna Università degli Studi della Basilicata Università degli Studi della Campania "Luigi Vanvitelli" Università degli Studi dell'Insubria Università degli Studi di Brescia Università degli Studi di Cassino e del Lazio Meridionale Università degli Studi di Catania UNIVERSITA DEGLI STUDI DI FIRENZE

Dissemination level – PU

UNIVERSITA DEGLI STUDI DI FIRENZE - DIE DEPT. Università degli Studi di Milano-Bicocca UNIVERSITA DEGLI STUDI DI NAPOLI FEDERICO II Università degli Studi di Perugia Università degli Studi di Torino UNIVERSITA DEGLI STUDI GENOVA -DITEN Università degli Studi ROMA TRE Università di Bologna Università di Camerino Università di Parma Università di Pavia UNIVERSITA DI PISA Università LUISS Guido Carli UNIVERSITAET STUTTGART UNIVERSITAET ULM Universitat Abat Oliba CEU Universitat de Barcelona UNIVERSITAT DE GIRONA UNIVERSITAT DE GIRONA - AMADE Universitat de Lleida Universitat de Valencia Universitat de Valencia - LISITT Universitat Hamburg Universität Hildesheim Universitat Jaume I UNIVERSITAT CATALUNYA POLITECNICA DE UNIVERSITAT POLITECNICA DE CATALUNYA - FIB UNIVERSITAT POLITECNICA DE VALENCIA UNIVERSITAT POLITECNICA DE VALENCIA - CMT THERMAL ENGINES Universitat Pompeu Fabra Universitat Rovira i Virgili Universitdad San Jorge UNIVERSITE DES SCIENCES ΕT TECHNOLOGIES DE LILLE - LILLE I

UNIVERSITEIT GENT UNIVERSITETET I OSLO University di Genova UNIVERSITY OF BATH University of Gothenburg University of Hertfordshire UNIVERSITY OF NOTTINGHAM-IAT UNIVERSITY OF PATRAS UNIVERSITY OF SOUTHAMPTON UNIVERSITY OF STRATHCLYDE University of Stuttgart UNIVERSITY OF SURREY University of Trás-os-Montes e Alto Douro UNIVERSITY OF TRENTO University of Worcester University of Zagreb Universotà di Siena Univrsidad de Zaragoza upBUS Urban Mobility Systems BV Urban Sharing URBFF7 Utrecht University of Applied Sciences UZE.energy VADECITY VALEO COMFORT AND DRIVING ASSISTANCE VELCO VEM SOLUTIONS SPA VEPLAS GROUP VERBUND AG VERKOR VESPUTI VESTEL ELEKTRONIK ELEKTRONIK SANAYI VE VIANOVA VIASERVICE SA VICUS **DESARROLLOS** TECNOLOGICOS SL VIMASOL E HIJOS SL VIRTUAL VEHICLE RESEARCH GMBH

BERLIN VMZ BETREIBERGESELLSCHAFT MBH Voi Technology VOLOCOPTER GMBH VOLTERO SAS Volvero VRIJE UNIVERSITEIT BRUSSEL AEROSPACE CZECH V7I U RESEARCH CENTRE WAERTSILA GAS SOLUTIONS AS WARTSILA WATTO WE DRIVE SOLAR NL BV WESTCON POWER AUTOMATION AS WESTERN SYSTEMS OY Wind Mobility WIND TRE SPA WINSLIM SARL WORLDSENSING S.L.N.E XELECTRIX POWER GMBH XEROLUTIONS SL XYZ Dynamics Yape YARA INTERNATIONAL ASA Západoslovenská energetika (ZSE) ZAPGO LTD ZEHUS SPA Zeleros ZEMISSION AB ZENTRUM FUR SONNENENERGIE-UND WASSERSTOFF-FORSCHUNG BADEN-WURTTEMBERG Zéphyr & Borée ZEPLUG Zepp.solutions B.V. ZET GMBH ZETA AUTOMOTIVE LTD zoov ZORLU ENERJI ELEKTRIK URETIM AS ZPARQ AB

10.2. DEMAND

The list below corresponds to all the entities that have been considered under the demand category. The total number of entities is 1013.

A. AGRATI SPA A/S FEMERN LANDANLÆG AB TRANSITIO ABB ABB TURBO SYSTEMS AG ABEKING & RASMUSSEN SCHIFFS-UND YACHTWERFT SE ABERDEEN CITY COUNCIL* ABERDEEN HARBOUR BOARD ABERDEENSHIRE COUNCIL Abertis Autopistas España S.A. ACB - AIR CARGO BELGIUM ACGB - ALUMINIUM RESERVOIRS ACITURRI ADMINISTRADOR ADIF DE INFRAESTRUCTURAS FERROVIARIAS ADIF-ALTA VELOCIDAD ADRIAFER SRL AREAF SRL AEFP - ASOCIACION DE EMPRESAS FERROVIARIAS PRIVADAS Aernnova Aerospace S.A.U. AERO KOMMUNE AeroMobil AEROSOFT SPA AERTEC SOLUTIONS SL AIR FRANCE SA AIR LIQUIDE SA Air Navigation Services of The Czech Republic AIR TRACTOR, INC. AIRBUS DEFENCE & SPACE AIRBUS HELICOPTERS

AIRBUS OPERATIONS AIRBUS SA AIRPORT NIKOLA TESLA BELGRADE AKIRA TECHNOLOGIES SARL ALEXELA ENERGIA AS ALKE SRL ALLIANDER NV ALLTOURS ALPHA TRAINS LUXEMBOURG S.A.R.L. ALSTOM TRANSPORT SA ALTRA SPA ALTROCONSUMO ANGLO BELGIAN CORPORATION ANTWERP EUROTERMINAL NV ANTWERP PORT AUTHORITY APDL - ADMINISTRAÇÃO DOS PORTOS DO DOURO LEIXÕÉS E VIANA DO CASTELO S.A APL - Administração do Porto de Lisboa SA APRAM ADMINISTRAÇÃO DOS PORTOS DA REGIÃO AUTÓNOMA DE MADEIRA SA APSS - ADMINISTRAÇÃO DOS PORTOS DE SETÚBAL E SESIMBRA S.A AREA M BARCELONA METROPOLITANA DE ARGONON SHIPPING B.V. (DEEN SHIPPING) Arista Shipping S.A. ARISTOTELIO PANEPISTIMIO THESSALONIKIS

Arnhem Municipality ARRIVA BUS ÜK ARRIVA NEDERLAND B.V. PERSONENVERVOER ARRIVAL LIMITED AS TALLINK GRUPP AS TALLINNA SADAM ASCO INDUSTRIES N.V. ASFA Association Sociétés des Françaises d'Autoroutes ASKOLL EVA SPA ASOCIACION AEDIVE ASOCIACION CLUSTER DE MOVILIDAD Y LOGISTICA DE EUSKADI ASOCIATIA DE DEZVOLTARE INTERCOMUNITARA ZONA METROPOLITANA CONSTANTA ASOCIATIA GAZULUI PENTRU VEHICULE- NGVA NATURAL Associated British Ports Association des Consommateurs Test-Achats SCRL ASSOCIATION EUROPEENNE DES FOURNISSEURS AUTOMOBILES ASSOCIATION EUROPEENNE DES VEHICULES ELECTRIQUES ROUTIERS ASSTRA – Associazione Trasporti ASTILLEROS ARMON SA ASTILLEROS DE SANTANDER SA ATC FRANCE ATHENS INTERNATIONAL AIRPORT S.A. ATHINAIKI METAFORIKI S.A.

BORGWARNER GMBH

Dissemination level - PU

Attica Ferries Maritime Company AUDI AG AUSTRIATECH - GESELLSCHAFT DES BUNDES FUR TECHNOLOGIEPOLITISCHE MASSNAHMEN GMBH AUSTRO CONTROL OSTERREICHISCHE GESELLSCHAFT FUR ZIVILLUFTFAHRT MBH AUTOBAHNEN-UND SCHNELLSTRASSEN-FINANZIERUNGS-AKTIENGESELLSCHAFT AUTORIDAD PORTI BALEARES PORTUARIA DE AUTORIDAD PORTUARIA DE BARCELONA AUTORIDAD PORTUARIA DE FERROL-SAN CIBRAO AUTORIDAD PORTUARIA DE LA BAHIA DE ALGECIRAS AUTORIDAD PORTUARIA DE VALENCIA Autorità di Sistema portuale del Mar Ligure Occidentale Autorità di Sistema Portuale del Mar Tirreno Settentrionale Autorita' di Sistema Portuale del Mare Adriatico Centrale Autorità di Sistema Portuale del Mare Adriatico centro-settentrionale Autorità di Sistema Portuale del Mare Adriatico Orientale Autorità di Sistema Portuale del Mare Adriatico Settentrionale AUTORITA PORTUALE DEL M. LIGURE ORIENTALE AUTOSTRADA DEL BRENNERO SPA MAR AVENTICS GMBH AVIO AERO SPA AVL LIST GMBH AYUNTAMENT DE BARCELONA AYUNTAMIENTO DE BILBAO AYUNTAMIENTO DE CALVIA AYUNTAMIENTO DE MADRID AYUNTAMIENTO DE MALAGA AYUNTAMIENTO DE MURCIA AYUNTAMIENTO DE VALENCIA AYUNTAMIENTO DE ZARAGOZA AZIENDA VENEZIANA DELLA MOBILITA SPA BAE SYSTEMS (OPERATIONS) LIMITED BAETSEN VERHUUR BV BALEARIA EUROLINEAS MARITIMAS BALLERUP KOMMUNE BANEDANMARK - RAIL NET DENMARK BARCELONA DE SERVEIS MUNICIPALS SA Basque Government - Traffic Directorate BATZ SOCIEDAD COOPERATIVA Bayernhafen GmbH & Co. KG BCT - Baltic Container Terminal Sp. z o.o. **BENEVELLI SRL** BENTELER INTERNATIONAL AG BERNHARD SCHULTE SHIPMANAGEMENT BETAMOTOR SPA BIRMINGHAM CITY COUNCIL BLUE GRID GAS & POWER S.A. OF ENERGY BLUE LINE LOGISTICS NV BLUEBUS (BLUE SOLUTIONS, BOLLORE GROUP) BMK - Federal Ministry for Climate Action, Environment, Energy, Mobility, Innovation and Technology BMVI - Bundesministerium für Verkehr und digitale Infrastruktur **BMW GROUP** BOEING BOLLORE PORTS BOLUDA CORPORACION MARITIMA S.L. BOMBARDIER TRANSPORTATION BORDEAUX METROPOLE

BOZANKAYA OTOMOTIV MAK IMALAT ITH VE IHR ANONIM SIRKETI BPOST Breda University of Applied Sciences Breuckmann eMobility BRIGHTON & HOVE BUS AND COACH COMPANY LIMITED BRITISH AIRWAYS PLC BRITTANY FERRIES BRUGG ROHR AG Brussels Capital Region - Brussels Mobility BUDAPEST AIRPORT ZRT. BUDAPEST FOVAROS ONKORMANYZATA BULATSA - BULGARIAN AIR TRAFFIC SERVICES AUTHORITY Bulgarian Ports Infrastructure Company Bundesanstalt für Straßenwesen BURSA BUYUKSEHIR BELEDIYESI BUSINOVA CA DE L'AUXERROIS CAETANOBUS CAF - Construcciones y Auxiliar de Ferrocarriles, S.A. Calais Promotion - Association pour le développement Économique du Pays du Calaisis Calvera Group CAMARA MUNICIPAL DE LISBOA CAPITAL-EXECUTIVE SHIP MANAGEMENT CORP CAPTRAIN ESPAÑA S.A.U CAPTRAIN ITALIA SRL CARNIVAL CORPORATION & PLC CARROSSERIE HESS AG CD CARGO A.S. CEREMA Ceska republika – Ministerstvo dopravy CESKE DRAHY A.S. CESKE PRISTAVY A.S CFR SA CFT - COMPAGNIE FLUVIALE DE TRANSPORT (SOGESTRAN GROUP) Chambre de Commerce et d'Industrie de Caen Normandie Chambre de Commerce et d'Industrie de Morlaix CHANTIERS DE L'ATLANTIQUE ChargePoint CHEP ESPANA SA CIFA SPA Città di Lucca City of Amsterdam CITY OF BRATISLAVA CITY OF BRNO City of Ghent City of Graz CITY OF KOUVOLA CITY OF LJUBLJANA CITY OF OSIJEK City of Stockholm CITY OF TURKU CITY OF ZAGREB CMA CGM S.A. CMTIR TRANSPORTES NACIONAIS E INTERNACIONAIS S.A. CNH INDUSTRIAL COLAS COLRUYT GROUP COMBINED CARGO TERMINAL BV COMMUNAUTE D'AGGLOMERATION DE VERSAILLES GRAND PARC COMMUNAUTE D'AGGLOMERATION SARREGUEMINES CONFLUENCES COMMUNAUTE DE COMMUNES TOURAINE VALLEE DE L'INDRE COMUNE DI FIRENZE COMUNE DI GENOVA COMUNE DI MILANO Comune di Palermo COMUNE DI TORINO COMUNE DI TRIESTE COMUNE DI VENARIA REALE

COMUNE DI VERONA CONFETRA SERVIZI SRL CONNEXXION NV Conseil Régional Auvergne-Rhône-Alpes Consejería de Fomento e Infraestructuras de la Región de Murcia (Ministry of Public Works and Infrastructure) CONSORCIO REGIONAL DF TRANSPORTES PUBLICOS REGULARES DE MADRID CONSORZIO ZAI CONSTELLIUM UK LIMITED CONTINENTAL AUTOMOTIVE GMBH CONTINENTAL RAIL S.A.U. COOPERATION POU DEVELOPPEMENT POUR LE ET L'AMELIORATION DU TRANSPORT URBAIN ET PERIURBAIN CORREOS SA COSTA CROCIERE SPA COSTIERO GAS LIVORNO SPA COSTRUZIONI AERONA AERONAUTICHE TECNAM SPA COUNCIL OF REGION BRITTANY COUNCIL OF VIGO CP - COMBOIOS DE PORTUGAL EPE CPK CENTRALNY PORT KOMUNIKACYJNY (SOLIDARITY TRANSPORT HUB) CROATIA AIRLINES CSP IBERIAN VALENCIA TERMINAL SAUSA Cyprus Ports Authority DAF TRUCKS NV DAIMLER AG DAMEN BV DANA TM4 ITALIA Dancer Bus DANFOSS EDITRON OY DANISH MARITIME AUTHORITY DANISH ROAD DIRECTORATE DASSAULT AVIATION DB CARGO AG DB NETZ AG DCP DUTCH CARGO PURCHASE BV DE VLAAMSE WATERWEG DECO ASSOCIATION DELLA BERNARDINA FLLI SRL DEMA SPA Département de l'Isère Department for Infrastructure Northern Ireland Department for Transport (UK) Department of Transport (Ireland) DETROIT ELECTRIC GROUP DEUTSCHE BAHN AG DEUTSCHE LUFTHANSA AKTIENGESELLSCHAFT DEUTZ AG DFDS A/S DFS DEUTSCHE FLUGSICHERUNG GMBH DHL FREIGHT GMBH DIANA SHIPPING SERVICES SA DIEHL AVIATION GMBH DINEX ECOCAT OY DIRECCIÓN CARRETERAS GENERAL DF MINISTERIO DF TRANSPORTES MOVILIDAD Y AGENDA URBANA DIRECCIÓN GENERAL DE LA MARINA MERCANTE DIRECCION GENERAL DE TRAFICO -MINISTRY OF INTERIOR DIRECTION DES SERVICES DE LA NAVIGATION AERIENNE DISTRIBUTORI ECOS SRL D-LOG Transportes LDA DOLDERMAN BV DONEGAL COUNTY COUNCIL DOUROGAS SA DRAGAGES-PORTS DUFOUR AEROSPACE Duisburger Hafen AG (DUISPORT)

FRENI BREMBO SPA

Dissemination level - PU

DUNDEE CITY COUNCIL EASYJET AIRLINE COMPANY LIMITED EATON ELEKTROTECHNIKA SRO E-DISTRIBUZIONE SPA EEIG Atlantic Corridor EEIG Baltic-Adriatic Corridor EEIG Corridor Rhine-Alpine EWIV EEIG ERTMS USERS GROUP EESTI RAUDTEE EGILE MECHANICS SL EIDESVIK SHIPPING AS EIDSVAAG AS ELENGY SA ELRINGKLINGER GROUP FI RON EMEL - Empresa Municipal de Mobilidade e Estacionamento de Lisboa Emerald Green Maritime Limited (MITSUI OSK LINES LTD) EMPRESA MARTIN S.A. (GRUPO RUIZ) EMPRESA MUNICIPAL TRANSPORTES DE MADRID SA DE ENAGAS SA ENAIRE ENAV SPA ENTE VASCO DE LA ENERGIA E-PORT-LINER HOLDING BV EQUINOR ENERGY AS ERMEWA SA ERTICO-ITS EUROPE E-SHUTTLE GMBH ESK SA ESL SHIPPING LTD ESSENCE Motocycles E-TRUCKS EURÓPE BVBA EUROPEAN FE FERRY COMPANY (INTERFERRY) EUROPEAN HYDROGEN ASSOCIATION EUROPEAN PASSENGERS' FEDERATION IVZW EUROPEAN SHIPPERS' COUNCIL EUROPORT RAUMA OY EUROVIA MANAGEMENT EVEKTOR SRO EWTC - East West Transport Corridor Association EXMAR MARINE F LLI CODOGNOTTO DI CODOGNOTTO GIANFRANCO&C SNC FAIVELEY TRANSPORT ITALIA SPA (WABTEC) FAURECIA FCA SPA (now STELLANTIS) FEDERATION INTERNATIONALE DE L'AUTOMOBILE Fenris Motorcycles FERGUSON MARINE ENGINEERING LTD FERROVIAL CORPORACION S.A. FERROVIENORD SPA FEV EUROPE FINCANTIERI SPA FINNLINES PLC Flemish Agency for Roads and Traffic FLEMISH GOVERNMENT - DEPT. MOW FLOYD ZRT. FLUGHAFEN STUTTGART GMBH (STUTTGART AIRPORT) FM LOGISTIC FNM SPA FOKKER TECHNOLOGIES HOLDING BV FORD MOTOR FORD OTOMOTIV SANAYI ANONIM SIRKETI FORSCHUNGSVEREINIGUNG SCHIFFBAU UNDMEERESTECHNIK E.V. FORSEA FERRIES FPT INDUSTRIAL FRAIKIN FRANCE FRANCE MANCHE AS - EUROTUNNEL (GETLINK GROUP) FRED.OLSEN, S.A. FREIE HANSESTADT BREMEN

FUORIMURO - SERVIZI PORTUALI E FERROVIARI S.R.L. FUTURE PROOF SHIPPING BV GARDNER DENVER LIMITED GAS NETWORKS IRELAND GAS2MOVE SL (LLEWO) GASFIN SA GASNAM GAVLE HAMN AB GAZELLE TECH GAZOCEAN GCA LOGISTIQUE Gdansk University of Technology GDYNIA Maritime University GE AVIATION LIMITED GEMEENTE EINDHOVEN GEMEENTE HELMOND Gemeente Nijmegen GEMEENTE TERNEUZEN General Directorate for National Roads and Motorways GEVEKE WERKTUIGBOUW BV **GEVEN SPA** GILBERT DE CLERCQ NV GKN AEROSPACE SWEDEN AB GKN DRIVELINE INTERNATIONAL GMBH GLOBAL MARITIME ENTERPRISES LTD GO4 SRO GOMORE APS GOODRICH ACTUATION SYSTEMS GOTEBORGS HAMN AB GOTEBORGS KOMMUN Grad Zadar GRAF SPA GRAND PORT MARITIME DE BORDEAUX GRAND PORT MARITIME DE DUNKERQUE GRAND PORT MARITIME DE MARSEILLE Grand Port Maritime de Nantes Saint-Nazaire Grand Port Maritime de Rouen GRAND PORT MARITIME DU HAVRE GREEN CARGO AB GREEN TOMATO CARS LIMITED GREENWAY INFRASTRUCTURE S.R.O. GRIMALDI DEEP SEA SPA GRIMALDI DEEP SEA SPA GRIMALDI EUROMED SPA GROUP ARRIVA SLOVENIA GROUP SAMAT S.A. GROUPE GALERIES LAFAYETTE GROUPE PSA (now STELLANTIS) GRUPA LOTOS SA GRUPO ALONSO GRUPO DISA GRUPO HAM GRUPO RENFE SA GRUPO SOUSA SGPS GRUPO TORO & BETOLAZA Gruppo Torinese Trasporti S.P.A. GTAX RAIL AUSTRIA GMBH GVB ACTIVA BV HALLANDSTRAFIKEN HAMBURGER HOCHBAHN AG HANS LEHMANN KG HAROPA GIE HAVI LOGISTICS UNIPESSOAL LDA HAVI LOGISTICS UNIPESSOAL LDA HEART AEROSPACE AB HEATHROW AIRPORT LIMITED HECTOR RAIL AB Heilbronn University of Applied Sciences HEINZMANN GMBH & CO KG HELLENIC AEROSPACE INDUSTRY SA HELLENIC ASSOCIATION OF ROAD NETWORK - HELLASTRON HELLENIC PETROLEUM TOLL Hellenic Seaways Maritime S.A. Hellenic Shortsea Shipowners Association HELSINGBORG HAMN AB Heraklion Port Authority S.A.

HERNING KOMMUNE Hessen Mobil Straßenund Verkehrsmanagement HEULIEZ BUS HEVIZ-BALATON AIRPORT HGM ENERGY GMBH HIGAS SRL HITACHI EUROPE LIMITED HITACHI RAIL STS SPA HONDA R&D EUROPE (DEUTSCHLAND) GMBH HUNGAROCONTROL ZRT. HUPAC INTERMODAL NV HUTCHINSON SA HUTCHISON PORTS VENLO HyCologne Rheinland e.V. Wasserstoff Region HYDROGEN EUROPE HYDROGEN SWEDEN HYPE-STEP HYSOLUTIONS GMBH HYSTER-YALE EUROPE HYUNDAI EUROPE HŽ INFRASTRUKTURA d.o.o. IBERIA LINEAS AEREAS DE ESPANA SA OPERADORE ICCT - INTERNATIONAL COUNCIL ON CLEAN TRANSPORTATION EUROPE GGMBH ICLEI EUROPEAN SECRETARIAT GMBH IGOUMENITSA PORT AUTHORITY SA ILIADIS CARGO SA INDUSTRIA DE TURBO PROPULSORES S.A.U. INECO S.A. INFINEON TECHNOLOGIES AG INFRABEL SA INFRAESTRUTURAS DE PORTUGAL SA INFRASTRUCTURE MALTA INGENIERIA TECNICA DEL TRASNPORTE TRIA SA INNIO JENBACHER GMBH & CO OG Intelligent Transport Systems Romania -ITS Romania INTERNATIONAL ROAD FEDERATION INTERPORTO BOLOGNA S.P.A INTERPORTO DI VADO V.I.O. SPA INTERPORTO PADOVA S.P.A Interregional Alliance for the Rhine-Alpine Corridor EGTC INVERSORA MELOFE SL IRIZAR E-MOBILITY SL IRIZAR S COOP IRU INTERNATIONAL ROAD TRANSPORT UNION ISRAEL AEROSPACE INDUSTRIES LTD. (IAI) i-Trans Association "Transports Terrestres Promotion" ITS MOBILITY GMBH ITS SPAIN IVECO SPA J.A.M DE RIJK B.V. JAC ITALY DESIGN CENTER SRL (JAC MOTORS) JACKY PERRENOT Jaguar Land Rover JIHOSTROJ AS JOHN DEERE FORESTRY OY JSC VEJO PROJEKTAI KARLSHAMNS HAMN AB KAUTEX TEXTRON KLAIPEDOS MIESTO SAVIVALDYBES ADMINISTRACIJA KLAIPEDOS NAFTA SC KNORR-BREMSE SYSTEME FUR SCHIENENFAHRZEUGE GMBH KNUTSEN OAS ESPANA SL KNV - KONINKLIJK NEDERLANDS VERVOER KOBENHAVNS KOMMUNE KOEDOOD DIESELSERVICE BV KOMBIVERKEHR GMBH KONECRANES

KONGSBERG MARITIME AS KONIG METALL GMBH CO KG KOSAN CRISPLANT A/S KOTUG INTERNATIONAL BV KOUKOUZELIS A.S. & SIA E.E. KUEHNE+NAGEL AG KUWAIT PETROLEUM ITALIA SPA LA COMPOSITE SRO LAER SPA LANDESHAUPTSTADT DRESDEN LANDESHAUPTSTADT MUENCHEN LANDI RENZO SPA LANGH GROUP OY AB LATECOERE SA Lavar Shipping Co. Ltd LCA LOGISTIK CENTER AUSTRIA SUD GMBH LDZ - LATVIJAS DZELZCELS LEONARDO SPA LETOVE PREVADZKOVE SLUZBY SLOVENSKEJ REPUBLIKY, STATNY PODNIK LHG - Lübecker Hafen-Gesellschaft mbH LIEBHERR SA LIEBHERR AEROSPACE LILIUM AVIATION LINDE AG LINEAS N.V./S.A Link Campus University LIQUIMET SPA LIQVIS GMBH LKAB LMG MARIN LNG CROATIA LLC LOGITREN FERROVIARIA SA LOHR ELECTROMECANIQUE London Buses Services LTD LOTOS PALIWA SP Z.O.O. LUBECK PORT AUTHORITY LUFTFARTSVERKET Luleå Hamn AB LUX EXPRESS MACHINEFABRIEK BOLIER BV MADRID CALLE 30 S.A. Magna Powertrain Engineering Center Steyr GmbH & Co KG MAGNA STEYR AG MAGNAGHI AERONAUTICA SPA MAGNETIC SYSTEMS TECHNOLOGY LIMITED (MAGTEC) MAGYAR MAGÁNVASÚT ZRT. MAHLE INTERNATIONAL GMBH MALMO STAD MALTA AIR TRAFFIC SERVICES LIMITED MAN ENERGY SOLUTIONS SE MAN TRUCK & BUS SE MARELLI EUROPE SPA MARFLET MARINE INTERNATIONAL SA Maritime Technology Cluster FVG S.c.a r.l. Mavel Powertrain MECAPROM MEDITERRANEAN RAIL FREIGHT CORRIDOR MEDWAY – OPERADOR FERROVIÁRIO DE MERCADORIAS S.A. MEGGITT AEROSPACE LIMITED MERCEDES-BENZ AG MERCEDES-BENZ TURK AS MERCITALIA INTERMODAL SPA MERCITALIA RAIL SRL MERITAITO OY (ARCTIA) MESTNA OBCINA VELENJE Métropole - Aix - Marseille - Provence METROPOLE DE LYON MEYER WERFT PAPENBURG GMBH & CO KG MICHELIN Ministère de la Mobilité et des Travaux Publics-MMTP Ministerie van Infrastructuur en Milieu Ministerie van Infrastructuur en Waterstaat Riikswaterstaat

Ministério das Infraestruturas e da Habitação (MIH) MINISTERIO DÉ FOMENTO do Planeamento Ministério das е Infraestruturas MINISTERO DELLE INFRASTRUTTURE E DEI TRASPORTI Ministrstvo za infrastrukturo (Ministry of Infrastructure) Ministry for ecological Transition - Ministry of Transport - MTE Ministry for Innovation and Technology (Hungary) Ministry for Transport & Infrastructure of Malta MINISTRY OF DEVELOPMENT AND INVESTMENTS GREECE Ministry of Economic Affairs and Communications of the Republic of Estonia Ministry of Economy, Infrastructure, Maritime and Tourism MINISTRY OF INFRASTRUCTURE AND TRANSPORT GREECE MINISTRY INFRASTRUCTURE OF SWEDEN MINISTRY OF TRANSPORT AND COMMUNICATION OF FINLAND Ministry of Transport and Communications of the Republic of Lithuania Ministry of Transport of the Republic of Latvia Minoan Lines Shipping S.A. MOBILITY MOTORS SWEDEN AB Møller Mobility Group MONFORT LOGISTICA S.L. MOTEG GMBH MOTHERSON GROUP MSE INTERNATIONAL MT-PROPELLER ENTWICKLUNG GMBH MTU AERO ENGINES AG MTU FRIEDRICHSHAFEN GMBH Multi-Link Terminals Ltd Oy MUNICIPALITY OF CELJE MUNICIPALITY OF EILAT MUNICIPALITY OF KOPER MUNICIPALITY OF LAVREOTIKI MUNICIPALITY OF SOSTANJ Municipio do Fundão MUNICIPIU RESEDINTA DE JUDET CONSTANTA MUTUALISTA AÇOREANA TRANSPORTES MARÍTIMOS S.A. MZA SP. Z.O.O. National Company for Road Infrastructure Administration National Company Maritime Ports Administration SA Constanta NATS (EN ROUTE) PUBLIC LIMITED COMPANY NAVAL GROUP NAVANTIA SA NCE MARITIME CLEANTECH Neander Shark GmbH Neoptera Aero Neptune Lines Shipping & Managing Enterprises S.A. NETHERLANDS MARITIME TECHNOLOGY NETWORK RAIL INFRASTRUCTURE LIMITED NEWCASTLE CITY COUNCIL NEXT Electric Motors Niedersächsisches Ministerium für Wirtschaft. Arbeit. Verkehr und Digitalisierung NIESTERN-SANDER REPARATIE BV NISSAN EUROPE NMBS/SNCB NV/SA NOMAGO D.O.O. NOORD-HOLLAND NORDIC RE-FINANCE AB NORD-MICRO GMBH & CO OHG NORLED AS

NORTH EAST SCOTLAND TRANSPORT PARTNERSHIP NORTH SEA PORT NV NORTH SEA SHIPPING AS NORWEGIAN COASTAL ADMINISTRATION NORWEGIAN ADMINISTRATION PUBLIC ROADS NOVA AIRLINES AB NRIC - National Railway Infrastructure Company NSB GROUP NUOVO PIGNONE (BAKER HUGHES) NVR Zweckverband Nahverkehr Rheinland ÖBB-Infrastruktur AG OBSHTINA RUSE OFFICINE MECCANICHE IRPINE SRL OGP GAZ SYSTEM S.A. OMPI SRL Organisation of Consumers and Users (OČU) ORKNEY ISLANDS COUNCIL OSLO KOMMUNE OTOKAR OTOMOTIV VE SAVUNMA SANAYI AS OV-BUREAU GRONINGEN FN DRENTHE Oxelösunds Hamn AB PATENTES TALGO SL Patras Port Authority S.A. PAU BEARN PYRENEES MOBILITES PCDC - PIRAEUS CONSOLIDATION AND DISTRIBUTION CENTER PD Teesport Limited PELLENC GROUP PEUGEOT MOTOCYCLES PIAGGIO & C S.P.A. PIAGGIO AERO INDUSTRIES SPA PIERBURG GMBH PIPISTREL AIRCRAFT PIRAEUS CONTAINERS TERMINAL SA PIRAEUS EUROPE ASIA RAIL LOGISTICS, S.A. (PEARL S.A.) PIRAEUS PORT AUTHORITY S.A. PIRELLI PKM PRZEDSIEBIORSTWO KOMUNIKACJI MIEJSKIEJ SP Z.O.O. PKP CARGO INTERNATIONAL A.S. PKP POLSKIE LINIE KOLEJOWE S.A PLASTIC OMNIUM AD INNOVATION AND RESEARCH PLUS METAFORIKI IKE ADVANCED PMC PERSONAL MOBILITY CENTER NORDWEST EG POLFERRIES SA POLIS PROMOTION OPERATIONAL LINKS WITH INTEGRATED SERV ASSOCIATION INTERNATIONALE SERVICES, POLITECNICO DI MILANO POLITECNICO DI TORINO POLSKIE ZAKLADY LOTNICZE PON POWER BV PORSCHE AG PORT AUTHORITY OF BILBAO PORT AUTHORITY OF CARTAGENA PORT AUTHORITY OF GIJON PORT AUTHORITY OF HUELVA PORT AUTHORITY OF MELILLA PORT AUTHORITY OF RAFINA SA Port Authority of Santa Cruz de Tenerife PORT AUTHORITY OF SEVILLE PORT AUTHORITY OF TARRAGONA PORT AUTHORITY OF VIGO PORT AUTHORITY OF VIGO PORT AUTONOME DE STRASBOURG PORT OF ANTWERP PORT OF BILBAO AUTHORITY Port of Cork Company PORT OF FREDERIKSHAVN PORT OF GDYNIA AUTHORITY SA PORT OF HAMINA KOTKA LTD PORT OF HELSINKI LTD PORT OF KOPER

Port of Moerdijk N.V. PORT OF NAANTALI LTD Port of Raahe Ltd PORT OF RAADE LTG PORT OF ROTTERDAM PORT OF TURKU LTD PORT OF YSTAD PORT OF ZEEBRUGGE PORTO ANTICO DI GENOVA SPA PORTOS DOS AÇORES S.A. PORTS OF NORMANDY PORTSMOUTH INTERNATIONAL PORT Poznan University of Technology PRIMAFRIO SL PROBUNKERS PRORAIL BV PROVINCE OF LIMBURG PROVINCIE ANTWERPEN Provincie Gelderland Provincie Noord-Brabant Provincie Utrecht PROVINCIE ZEELAND PROVINCIE ZUID-HOLLAND PSA ANTWERP NV Public Works Department – Ministry of Communications and Works, Republic of Cvprus PUERTOS DEL ESTADO PVF SCHIENENFAHRZEUGE SRO RACC - REIAL AUTOMÒBIL CLUB DE CATALUNYA RAIL CARGO AUSTRIA AG RAIL SERVICE CENTER ROTTERDAM ΒV RAILNETEUROPE RB RAIL AS REDERI AB ECKERO REGANOSA REGION BLEKINGE REGION GAVLEBORG REGION NORMANDIE REGION OF CENTRAL MACEDONIA REGION SKANE Regionalverband FrankfurtRheinMain Regionalverband Mittlerer Oberrhein Regionalverkehr Köln GmbH REGIONE VENETO REMONTOWA LNG SYSTEMS SP. Z.O.O. REN Gasodutos, S.A RENAULT SAMSUNG MOTORS RENAULT SAS RFI RETE FERROVIARIA ITALIANA S.P.A. Rheinbahn AG RHEINMETALL AUTOMOTIVE RHEIN-NECKAR-VERKEHR GMBH RIGAS SATIKSME SIA Rimorchiatori Riuniti Panfido & C. SRL Road and Motorway Directorate of the Czech Republic ROAD INFRASTRUCTURE AGENCY ROBERT BOSCH GMBH ROLANDE BV ROLLS-ROYCE ROMA CAPITALE ROMA SERVIZI PER LA MOBILITA SRL ROMAERO SA ROSETTI MARINO SPA ROSTOCK PORT GMBH ROTAREX S.A. Rotterdam Short Sea Terminals B.V. ROTTERDAMSE ELEKTRISCHE TRAM N.V. RUTER AS SAAB AB SAAB TRASPONDERTECH AB SAFRAN AIRCRAFT ENGINES SAFRAN ELECTRONICS & DEFENSE SAFRAN HELICOPTER ENGINES SAFRAN LANDING SYSTEMS SAFRAN NACELLES SAFRAN POWER UNITS SAFRAN SA SAFRAN SEATS SAG MOTION GMBH

SAGGAS SA SAM ALGECIRAS SL SANEF SA SAN-JOSE LOPEZ S.A. SANTANDER PORT AUTHORITY SANTIERUL NAVAL DAMEN GALATI SA SANTOS & VALE LDA SAPA GROUP SPA SAS DUNKERQUE LNG SASA SPA AG SOCIETA AUTOBUS SERVIZID'AREA SPA SCALE GAS SL SCANDINAOS AB SCANDLINES GEDSER-ROSTOCK APS SCANIA AB SCHAEFFLER TECHNOLOGIES AG & CO. KG SCHEEPSWERF DAMEN GORINCHEM ΒV SCHIPHOL NEDERLAND BV SCHMITZ CARGOBULL AG SCHWEIZERISCHE BUNDESBAHNEN SBB SCOOBIC SE Klaipeda State Seaport Authority SEA EUROPE SEAT SA SEEHAFEN KIEL GMBH & CO. KG SEOPAN - Asociación de Empresas Constructoras y Concesionarias de Constructoras y Infraestructuras SERFIM GROUP Servei Català de Trànsit SERVICIOS TERRESTRES Υ MARITIMOS SA (SETEMAR) SHELL SHFCA - Scottish Hydrogen & Fuel Cell Association Shipping Company of Crete S.A. (ANEK Lines) SHIPYARD GEBR. KOOIMAN BV SIA DOBELES AUTOBUSU PARKS SICAMB - SPA SIEMENS AG SIEMENS ENGINES SAU SIEMENS MOBILITY GMBH SJ AB SKANETRAFIKEN SKYGUIDE SICA - SERVICIOS LOGISTICOS DE COMBUSTIBLE DE AVIACION SL SLOCAT FOUNDATION SLOVENSKE ŽELEZNICE – POTNIŠKI PROMET D.O.O. SNAM 4 MOBILITY SPA SNCF RESEAU SOBY VAERFT AS SOCIETÀ AUTOBUS SERVIZI D'AREA STADTISCHER SPA-AUTOBUS SERVICE AG PER AZIONI ESERCIZI AEROPORTUALI S.E.A. SOCIETE DES TRANSPORTS INTERCOMMUNAUX DE BRUXELLES SOCIETE DU GRAND PARIS SOFITEC AERO SL SOLARIS BUS & COACH Solihull Metropolitan Borough Council Solution F SOMTRANS SONACA GROUP Sono Motors SPRAVA ZELEZNIC STAD ANTWERPEN STADT AACHEN STADT KOLN STADT ULM STADT VILLACH Stadtwerke Hürth AöR STADTWERKE OSNABRUCK AG STAR BULK SHIPMANAGEMENT CO. (CYPRUS) LTD STEMMANN-TECHNIK GMBH

STENA LINE SCANDINAVIA AB STENA REDERI AB STEYR MOTORS GMBH STOCKHOLM SKAVSTA FLYGPLATS AB STOCKHOLMS HAMN AB STOCKHOLMS STAD STOLT NIELSEN LTD STRAETO BS Strasbourg Eurometropole SUARDIAZ GROUP SUMY SVEALANDSTRAFIKEN AB SVITZER A/S SWDAVIA AB SWEDISH MARITIME ADMINISTRATION SWEDISH TRANSPORT ADMINISTRATION SWISS INTERNATIONAL AIR LINES AG Syndicat mixte des mobilités de l'aire grenobloise (SMMAG) Syndicat Mixte des Transports en Commun de l'agglomération toulousaine Syndicat Mixte pour la gestion des Ports du Sud Alsace SYNDICAT MIXTE REGIONAL DES PORTS DE CAEN-OUISTREHAM ET CHERBOURG DES TAB TRANSPORTS SA TAKARGO – TRANSPORTES DE MERCADORIAS S.A. TAMPEREEN KAUPUNKI TARGU MURES TRANSYLVANIA AIRPORT TATRAVAGONKA AS TAXIWAY TBP D.D. TELAIR INTERNATIONAL AB TEMPUS-TRANS S.R.O. TENNECO AUTOMOTIVE EUROPE BVBA TERMINAL DE CONTENIDORS DE BARCELONA, S.L TERMINAL LINK SAS TEVVA MOTORS LIMITED THIEN EDRIVES GMBH TIEL - TRANSPORTES E LOGISTICA S.A. TIRSAN TREYLER SANAYI VE TICARET AS TJA - TRANSPORTES J.AMARAL S.A. TOFAS TURK OTOMOBIL FABRIKASI ANONIM SIRKETI TORQEEDO TOTAL SA TOYOTA MOTOR EUROPE TRAFIKSELSKABET MOVIA TRAINOSE SA TRANSDEV GROUP TRANSFESA LOGISTICS S.A. Transilvania University of Brasov TRANSPORT MALTA TRANSPORTES AÉREOS PORTUGUESES, S.A. TRANSPORTES CENTRAL POMBALENSE LDA TRANSPORTES FIGUEIREDO & FIGUEIREDO LDA TRANSPORTES PASCOAL S.A. TRANSPORTES PAULO COSTA & FERREIRA LDA TRANSPORTES PAULO DUARTE LDA TRANSPORTES SÉRGIO LUDOVINO LDA TRANSPORTS DE BARCELONA SA TRELLEBORG SEALING SOLUTIONS FRANCE SAS TRENTINO TRASPORTI SPA TRIESTE TRASPORTI SPA TRIFLEET LEASING BV TRIUMPH AEROSPACE OPERATIONS UK LTD TT TRANSCOM - POINTER LINES TUCO YACHT VAERFT APS TURUN KAUPUNKILIIKENNE OY TX LOGISTIK AG
Dissemination level - PU

UIRR INTERNATIONAL UNION FOR ROAD-RAIL COMBINED TRANSPORT UMBRAGROUP SPA UNIFE - Union of European Railway Industries UNILEVER BV INTERNATIONALE UNION DFS TRANSPORTS PUBLICS UNIONTRASPORTI Universidad Autonoma de Madrid Universidad Cardenal Herrera Universidad Carlos III de Madrid Universidad Complutense de Madrid Universidad de Alcalà Universidad de Almeria Universidad de Burgos Universidad de Cadiz Universidad de Cantabria Universidad de Cordoba Universidad de Extremadura Universidad de Granada Universidad de Jaèn Universidad de la Laguna Universidad de la Rioja Universidad de Las Palmas de Gran Canaria Universidad de Leon Universidad de Malaga Universidad de Murcia Universidad de Navarra Universidad de Salamanca Universidad de Valladolid Universidad de Vigo Universidad del País Vasco / Euskal Herriko Unibertsitatea Universidad Europea Universidad Francisco de Vitoria Universidad Miguel Hernandez UNIVERSIDAD POLITECN POLITECNICA DE MADRID Universidad Rey Juan Carlos Universidad San Pablo CEU Universidade de Coruna Università degli Studi della Basilicata Università degli Studi della Campania "Luigi Vanvitelli" Università degli Studi dell'Insubria Università degli Studi di Brescia Università degli Studi di Cassino e del Lazio Meridionale

Università degli Studi di Catania UNIVERSITA DEGLI STUDI DI FIRENZE Università degli Studi di Milano-Bicocca Università degli Studi di Perugia Università degli Studi di Torino Università degli Studi ROMA TRE Università di Bologna Università di Camerino Università di Parma Università di Pavia Università LUISS Guido Carli Universitat Abat Oliba CEU Universitat de Barcelona UNIVERSITAT DE GIRONA Universitat de Lleida Universitat de Valencia Universitat Hamburg Universität Hildesheim Universitat Jaume I POLITECNICA UNIVERSITAT DE CATALUNYA UNIVERSITAT POLITECNICA DF VALENCIA Universitat Pompeu Fabra Universitat Rovira i Virgili Universitdad San Jorge University di Genova University of Gothenburg University of Hertfordshire University of Stuttgart University of Trás-os-Montes e Alto Douro University of Worcester University of Zagreb Universotà di Siena Univrsidad de Zaragoza UPS EUROPE SA URBAN ELECTRI ELECTRIC MOBILITY INSTITUTE (UEMI) GGMBH URBEEZ UTKILEN AS Utrecht University of Applied Sciences VALEO VALEO SIEMENS EAUTOMOTIVE VALSTYBES IMONE ORO NAVIGACIJA VAN ECK TRAILERS BV VARSINAIS-SUOMEN LIITTO VDL GROUP VENICE LNG S.P.A. VEPLAS GROUP



VERBAND DER BAHNINDUSTRIE IN DEUTSCHLAND (VDB) EV Verband Region Rhein-Neckar Verkehrsverbund Mainz-Wiesbaden GmbH (VMW) VIESOJI ISTAIGA KELEIVINIS TRANSPORTAS **KLAIPEDOS** VIIA VIKING LINE ABP VILLE DE PARIS VISION SYSTEMS AERONAUTICS VITESCO TECHNOLOGIES GMBH Vlaamse Vervoersmaatschappij De Lijn VNF - VOIES NAVIGABLES DE FRANCE VOLKSWAGEN AG VOLOCOPTER GMBH VOLVO AB VOLVO BUS CORPORATION VOLVO CARS VOLVO Trucks VOS LOGISTICS OSS BV VTG RAIL EUROPE GMBH WABCO WAERTSILA GAS SOLUTIONS AS WAGENBORG SHIPPING BV WARTSILA WATERSTOFNET VZW WESSEM HOLDING BV WIENER LINIEN GMBH &CO KG WILH WILHELMSEN HOLDING ASA WINTERTHUR GAS & DIESEL AG WIZZ AIR HUNGARY LEGIKOZLEKEDESI KORLATOLT FELELOSSEGU TARSASAG WIZZ AIR UK LIMITED WRIGHTBUS WSW MOBIL GMBH YESILOVA HOLDING AS ZAKLADY LOTNICZE MARGANSKI & MYSLOWSKI SA ZEEBRUGGE PORT AUTHORITY Zéphyr & Borée ZF FRIEDRICHSHAFEN AG ZODIAC AEROTECHNICS (SAFRAN) ZPMC SLU ZSR - Železnice Slovenskej Republiky ZSSK - ZELEZNICNA SPOLOCNOST SLOVENSKO ZSSK CARGO

10.3. FINANCE

The list below corresponds to all the entities that have been considered under the finance category. The total number of entities is 223. EIF/BlueInvest SCANIA GROWTH CAPITAL VOLVO GROUP VENTURE CAPITAL AB EIF (European Investment Fund) (FFG) CREDIT AGRICOLE F6s SFBW LANDESANSTALT dell'Università e della Ricerca Techstars EIT/EIT Urban Mobility SCHIENENFAHRZEUGE National Centre for BADEN-

EIT/EIT InnoEnergy EIT/EIT Climate-KIC EIT/EIT Digital EFSI (European Fund for Strategic Investment) ESI Funds (European Structural and Investment Funds) EIB (European Investment Bank) EC (European Commission) EIC (European Investment Council) INVESTITIONSBANK SCHLÉSWIG-HOI STEIN HAMBURGISCHE INVESTITIONS- UND FORDERBANK IBAN - ITALIAN BUSINESS ANGELS ASSOCIATION MERCATOR LEASING GMBH & CO. KfW Group INFORTAR AS STOLT NIELSEN GAS B.V.

WUERTTEMBERG (AöR) Bpifrance Caisse des Dépôts et Consignations (CDC) Council of Europe Development Bank (CEB) ÈBAŃ Instituto de Credito Oficial THE WORLD BANK VINNOVA ANI AGENCIA NACIONAL DE INOVACAO INNOVIRIS Flanders Innovation & Entrepreneurship NETHERLANDS ENTERPRISE AGENCY CDTI Ministry of Economic Development and Technology Innovate UK

Austrian Research Promotion Agency MIUR - Ministero dell'Istruzione, Ministero Research and Development (NCBR) TUBITÁK Research Council of Norway INNOSUISSE - SWISS INNOVATION AGENCY BUSINESS FINLAND Innovation Fund Denmark DLR Projektträger Investment AB Latour InnovationsKapital Chalmers Ventures Israel Innovation Authority National Research, Development and Innovation Office (NRDI) Unternehmertum Venture Capital (UVC) Partners DCP - DIFFUSION CAPITAL PARTNERS INNOGEST CAPITAL ENEL STARTUP Intesa Sanpaolo Innovation Center

D3.1 – Report on identified supply, demand and financing opportunities

Dissemination level - PU

ENAGAS EMPRENDE CO-PACE (Continental Start-Up Program) Faurecia Ventures ABB Technology Ventures Robert Bosch Venture Capital GmbH BMW i Ventures ENGIE New Ventures Shell Ventures Reefknot Investments Saab Ventures Next47 (Siemens Corporate Venture Capital) Repsol Corporate Venturing Total Carbon Neutrality Ventures CMA CGM Ventures Plug & Play Ventures Alliance Ventures Volkswagen Group Daimler Technology & Venture DEUTSCHE BAHN DIGITAL VENTURES GMBH EDF Pulse Croissance Air Liquide Venture Capital (ALIAD) T-Mobile Ventures INVEN CAPITAL Future Energy Ventures EDP Ventures Indraventures Galp Ventures DT Capital Partners TELEFÓNICA VENTURES Toyota Al Ventures PERSEO VENTURE BUILDER NOKIA GROWTH PARTNERS Aster Capital 574 Invest BlackRock Intel Capital ATOMICO BAILLIE GIFFORD FREIGEIST CAPITAL LGT BANK AG OBVIOUS VENTURES TENCENT HOLDINGS LTD. AIRBUS VENTURES NORRSKEN VC EQT VENTURES NEXT GEAR VENTURES HONDA XCELERATOR SBB STARTUP GE VENTURES SAFRAN CORPORATE VENTURES DIEHL VENTURES GMBH HONEYWELL VENTURES BAE Systems Investment in Innovation (I3) EQUINOR VENTURES

KONGSBERG INNOVATION LUFTHANSA INNOVATION HUB Zukunft Ventures ERICSSON VENTURES BOEING HORIZON X MOTHERSON INNOVATION VENTURE MAHI F CORPORATE CAPITAL R2 DATA LABS FORD X ROAD VENTURES EuraTechnologies DEMETER Partners WeLike SAMBRINVEST WeLikeAngels - Investessor Karot Capital Expon Capital PORTUGAL VENTURES GIANO VENTURES M Capital Partners Orevon Venture Partners Starquest Capital WakeUp Capital SpeedInvest Inventures Investment Partners btov Partners GMBH H.I. Capital AG Luxembourg Business Angel Network Alter Equity Lean Fund finance & invest.brussels TechAngels Breega Capital Estari Group Basinghall Partners Acceleration Venture Amadeus Capital Partners SFPI-FPIM GO CAPITAL **3LB SEED CAPITAL** Growth Partners Capital SOFINDEV MANAGEMENT NV Odyssée Venture Fil Rouge Capital Finaqui Business Angels EPIC ALFA SP. ZOO NEXTUP UNI.FUND UNIIQ ENEAS ALTERNATIVE INVESTMENTS Ostbelgieninvest AG PRACTICA CAPITAL TBA Network Evolem Start



Black Sea Trade and Development Bank (BSTDB) SAMAIPATA Clave Capital PMV Journey Partners Iris Capital Statkraft Ventures Contrarian Ventures SHIP2B CITA Investissement ING Corporate Investment Belgium Mustard Seed Maze Elaia KARISTA COREangels Impact Presto Ventures Faraday Venture Partners Mainport Innovation Fund II White Star Capital NovX Capital Verve Ventures (Investiere) Indufin BNP Paribas Fortis Private Equity Société Belge d'Investissement International (SBI) Waterland Private Equity Kima Ventures SRIW SA KATAPULT OCEAN Réseau Yeast Erganeo Uangel Jolt Capital ACT VC Fund Invest.BW Sarsia Seed Management AS Boost HEROES RAISE VENTURES Møller Mobility Group Selvaag Invest Sustainable Ventures Venture Kick Foundation for Technological Innovation (FIT) Cathay Innovation OGCI Climate Investments Idinvest Partners Northzone Mubadala Capital | Ventures Europe Goodwater Capital SoftBank Vision Fund InMotion Ventures MAN Impact Accelerator Hitachi Ventures Gmbh

D3.1 – Report on identified supply, demand and financing opportunities Dissemination level – PU



11.ANNEX 4 – ABOUT WHEESBEE

Wheesbee (<u>www.wheesbee.eu</u>) is a highly innovative information system offering a one-stop-shop to access, organize, analyse and share relevant information needed for research and technological innovation processes. It is one of the most important tools during Innovation Services.



