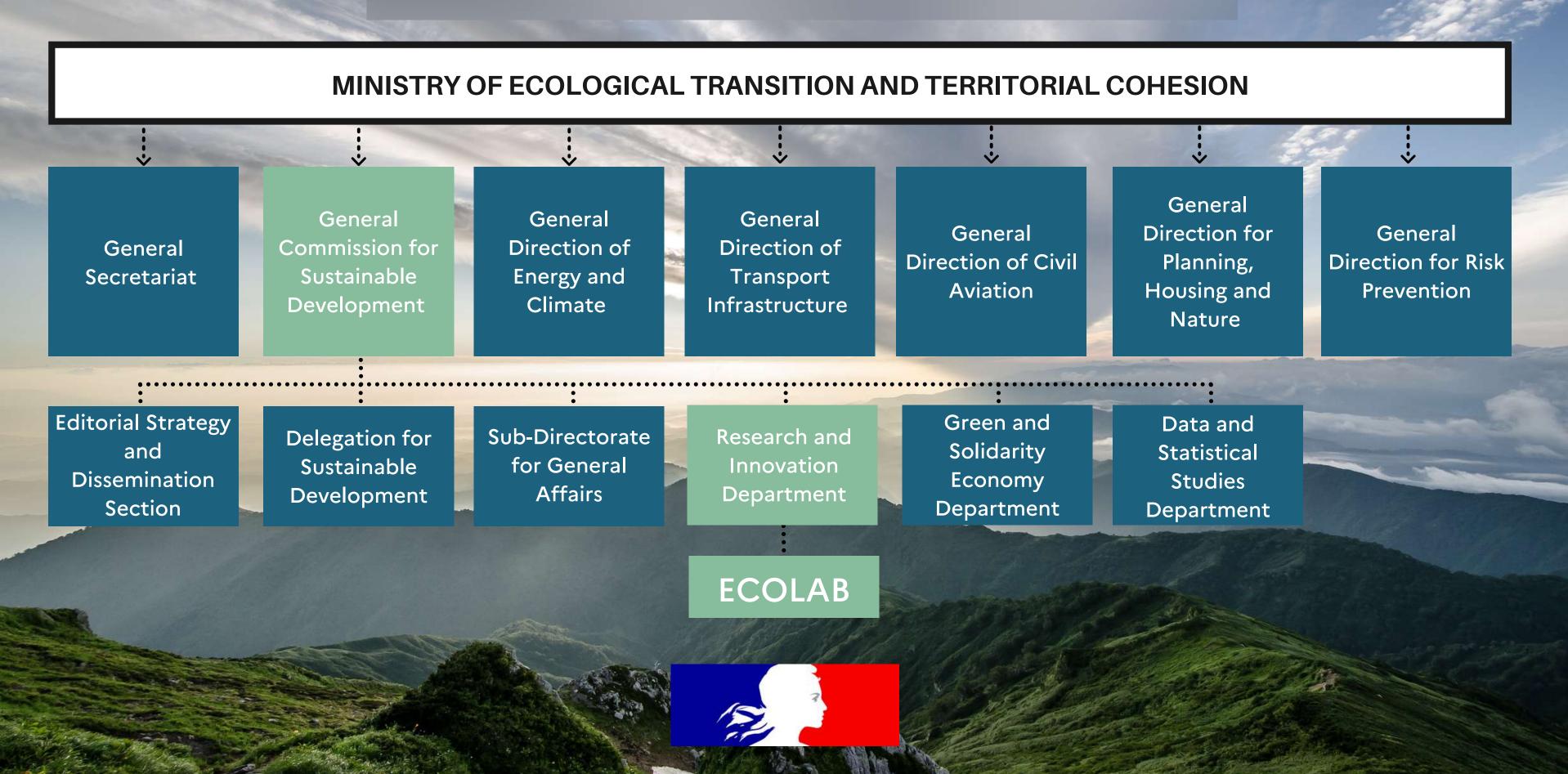


# Innovation laboratory for the ecological transition

For the valorisation of public data and innovative answers to the double emergency of ecological transition and digital transformation.



### Where ECOLAB is established?



### THE ECOLOGICAL TRANSITION IN FRANCE

Definition

An evolution towards a new economic and social model

Operates at all levels and covers several sectors



Aims to put in place a resilient and sustainable development model

Reshapes our ways of consuming, producing, working and living together



### THE ECOLOGICAL TRANSITION IN FRANCE

The scope of the ministry's actions

MISSION: To prepare and implement the Government's policy in all areas related to ecology, energy transition and biodiversity protection.

Decarbonization of industry Sustainable buildings and cities

Sustainable mobility

Eco-responsible digital technology

Renewable and decarbonized energy

Circular economy

Water, biodiversity and biomimicry

**Environmental health** 

Maritime innovation and marine ecosystems

Risk prevention

Sustainable finance & CSR

Sustainable food and agriculture



### **ECOLAB**

### A brief description



2020: Creation of the ECOLAB, Innovation Laboratory for the ecological transition



Promoting the production and use of public and private data for the ecological transition



Leading the Ministry's data strategy



Valorisation of open innovation within a complete and large-scale ecosystem (the Greentech ecosystem)



### **ECOLAB**

Vision and values



To act as a catalyser of the environmental ecosystem and facilitator of projects for the ecological transition, both through data and innovation.









### **ECOLAB**

Projects & fields of expertise

2 levers of action

### START-UP & OPEN INNOVATION

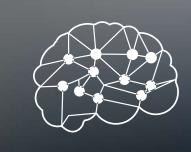








### DATA/AI













Research organisations

Schools

Public buyers

**Partners** 

Large companies

Ministries

Operators

Incubators

Start-up & SMEs

Investors

Local and regional authorities



### NATIONAL NETWORK OF GREENTECH INCUBATORS

Within its Greentech Innovation approach, the Ministry of Ecological Transition has promoted the creation of the National Network of Greentech Incubators. This network is aimed at all actors contributing to the acceleration of innovative Greentech start-ups and SMEs for the ecological transition.

- To offer a space for exchange and collective action
- To boost relations between territories
- To increase synergies between the different sectors of green innovation



List of incubators: https://bit.ly/3LHT2en



### GREENTECH INNOVATION INITIATIVE



### Specificities

#### Solutions

Need to accelerate ecological transition

Identification of French startups/SMEs with innovative greentech solutions

Strong french capabilities in R&D

Animation of french greentech ecosystem

Business creation is difficult

Service offer

A lack of trust due to greenwashing

Labelisation of greentech startups/SMEs



### GREENTECH INNOVATION INITIATIVE



Some figures













### 1150

Start-ups and SMEs at the Meet'up Greentech 2021: a dynamic ecosystem

215

Start-ups and SMEs with the Greentech Innovation label

30

Partner Incubators

33

Organisations
of the MET
scientific and
technical
network

5

Boosters to support greentech start-ups

20

Start-ups
selected with
Mission French
Tech for their
large-scale
green
innovation



### GREENTECH INNOVATION INITIATIVE



The support offer

Connecting greentech startups with the actors of the ecosystem to promote their commercial development

Making digital resources available to greentech companies

Ornetworks
Ograetworks

Green 20

Production

Green 20

Giving visibility to start-ups and SMEs that innovate for the ecological transition

Facilitating access to public procurement and green solutions

Co-sponsoring a selection of greentech start-ups with French Tech



### THE SUPPORT OFFER



Visibility Booster

### Giving visibility to greentech start-ups & SMEs

- Right to display Greentech Innovation's label (mark of support from the State)
- Communication through various media (social networks, website, newsletter, media, podcasts, interviews, etc.)
- Visibility in the index of eco-innovative start-ups and SMEs with the Greentech Innovation label
- Opportunity for visibility with the Ministry of Ecological Transition
- Module to highlight the CSR approach and the positive impacts of start-ups and greentech SMEs
- Presence at trade fairs
- Participation in panel discussions
- Participation in major events





**Axionable** GWENDAL BIHAN axionable



### LinkedIn publication

- Alors que la RE2020, la nouvelle réglementation environnementale du batiment, entre en vigueur pour les logements neufs en France, Kompozite lève 1.4 M€ pour déployer sa plateforme digitale d'aide à la conception du bâtiment bas carbone.
- La start-up, labellisée Greentech Innovation en 2020. s'entoure du pionnier de l'investissement impact en France Citizen Capital, du nouveau fonds AFI Ventures et de l'allemand Foundamental.

Kompozite, AFI Ventures, Citizen Capital, Foundamental #greentechinnovation #greentech #innovation #startup



BO EUN - MON

Directory

215 start-up labe

#### News

### Les actus **Greentech Innovation**

Février 2022



#### **Podcast**

"Réparer, composter : la vie secrète de nos objets"



Responsable communication et relations publiques

chez Spareka



Cyril Berton Expert technique chez Spareka





Membre du projet "Les Couches



Directrice "Les Couches Fertiles" chez Les

Alchimistes







### Social networks









### THE SUPPORT OFFER



Commercial & Networks Booster

### Connecting start-ups/SMEs with actors of the greentech ecosystem

- Professional events dedicated to business development (thematic business meetings, networking...)
- Pitching sessions in front of investors
- Access to the directory of impact investors
- Collaborative calendar of Greentech events (Tour de France des donneurs d'ordres Greentech, Meet'Up Greentech, Forum PEXE, Viva Technology, Pollutec, Salon des Maires des Collectivités locales...)
- Partnerships (Business France, French Tech...)
- Exchange space (access to the "Greentech Innovation Community" slack at Ecolab...)





### **Tour de France Greentech**

## 2ème étape du Tour de France des donneurs d'ordres Greentech

Les bâtiments et les services urbains innovants au coeur de la ville durable.







21 septembre











### **Grand Prize for Innovation**





### **GeoData Days**



### THE SUPPORT OFFER

Public Procurement Booster

### Startups/SMEs

Helping startups/SMEs to access public procurement



### **Public Buyers**

Helping local authorities to access green solutions



### THE SUPPORT OFFER



Public Procurement Booster

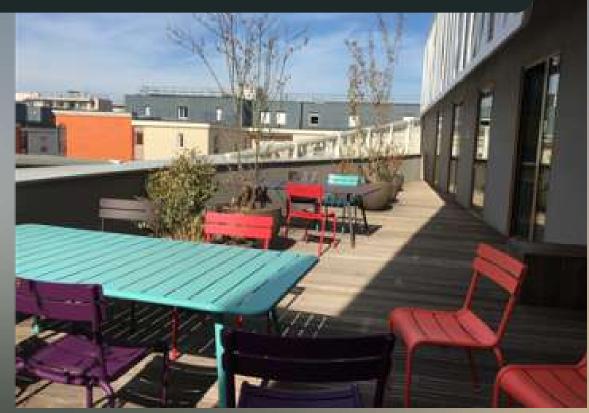
### Facilitating access to public procurement and green solutions

- Personalised support for accessing public contracts
- Training in public procurement (webinar, virtual café...)
- Connecting with buyers with sustainable procurement ambitions
- Dissemination of calls for projects & other public procurement tenders
- Presence in the directory for public buyers
- Support for UGAP referencing
- Access to Cision, a database of institutional contacts
- Access to the Greentech Living-Lab in Saint-Mandé (94)
- Participation in major events, often related to public procurement



# Living-Lab Greentech in St-Mandé





### Support for referencing







### Networking





ANNUAIRE
DES START-UP ET PME
ECO-INNOVANTES
LABELLISÉES
GREENTECH INNOVATION



A destination des décideurs publics

### THE SUPPORT OFFER



Digital Booster

Making digital resources available

- Seminar programme
- Presence on the Greentech Innovation Job Board
- Tools to measure environmental impact
- Online training courses
- Access to a media/press contact database
- Access to strategic and commercial documents (public procurement monitoring, market studies...)
- Access to ministerial data



# Contact database

### Market research















Webinaire Greentech Innovation

22 juillet 2021 16:00 - 17:00

Start-up et **commande publique** : stratégies et bonnes pratiques





### THE SUPPORT OFFER



Green20 Booster

### Co-sponsoring a selection of start-ups/SMEs with a key partner: French Tech



20 start-up companies have been selected by French Tech for the positive environmental impact of their solutions, their ability to deploy them on a large scale, as well as their potential to become future international leaders in the key sectors of the ecological transition.

These start-ups benefit from the support of the Mission French Tech, which works closely with the Ministry of Ecological Transition.



### MES SERVICES GREENTECH

An innovative marketplace with the "Entrepreneurs for General Interest" label

#### GOAL(S)

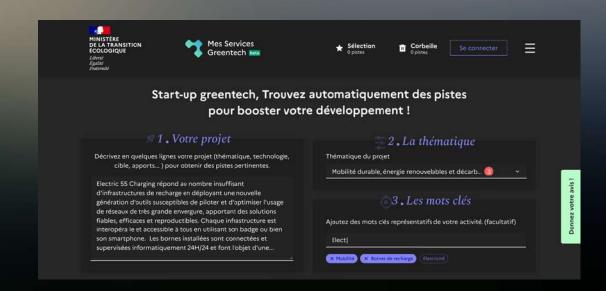
Creating a platform for public purchasers, investors, greentech start-ups and SMEs, in order to:

- Help startups/SMEs to access public procurement.
- Help local authorities to access green solutions.

Platform that allows to find green solutions, investors, public buyers, public actors, public aid for innovation, state aid for the acquisition of solutions and companies in a given field, according to the description of your need



https://messervices.greentechinnovation.fr/





### OPEN INNOVATION

### Events to stimulate open innovation

Over the year, the Ecolab organises a variety of events for the different stakeholders in greentech in order to encourage open innovation.

#### **INSTANCES**

#### **Pitch Sessions**

Greentech Innovation emerges as a trusted third party for investors

### Hackathon RenovAction

The solutions hackathon to accelerate energy renovation

#### **Datasessions**

Demystifying the use of data and better understand its challenges









Projects & areas of expertise

AI &Data roadmaps

**Green Data for Health** 

Al for environmental assessment

Mission Connaissance

Al demonstrators for/by territories

Mission Transition Écologique

A data desk for Ecological Transition

Pre-figuration for waste processing

**Geolocated** information

Covering the legal needs on DATA

Developing skills on DATA



# DATA STRATEGY FOR THE ECOLOGICAL TRANSITION

Roadmap for data, algorithms and source code

#### **CONTEXT**

We are experiencing a digital transformation characterised by an abundance of data and increasingly sophisticated technologies.

#### GOAL(S)

- Improve the production and use of public data for the ecological transition.
- Create and mobilise quality data.
- Involve all those who use or produce data within the central administration.

#### **ISSUES**

- Increasing the effectiveness and relevance of policies through the use of data
- Amplifying the ecological impact of policies
- Ensuring transparency of public action and innovation

#### **ACTIONS**

Selective and evolving, the roadmap proposes 13 actions that concretely address the needs identified by stakeholders.



### From objectives to action plan

#### 3 ENJEUX

Exploiter les données pour des politiques publiques du pôle ministériel plus pertinentes et efficientes

Partager les données, les algorithmes et les codes sources pour renforcer l'impact écologique des politiques publiques

Démocratiser la gestion de la donnée, des algorithmes et des codes sources pour plus de transparence de l'action publique et d'innovation

#### OBJECTIFS

- 1. Rendre la donnée mobilisable
- 2. Développer la culture et l'usage de la donnée
- 3. Partager les données entre administrations
- 4. Partager les données au travers d'une coopération dans la stratégie manière conforme public-privé
- 5. Positionner la France de données UE
- 6. Utiliser les données de et sécurisée

#### LEVIERS D'ACTION TRANSVERSES

Faire vivre la feuille de route via une gouvernance dédiée

Equiper le pôle ministériel des outils essentiels en matière de gestion des données

**ACTIONS PHARES** 

# STRATEGY ON ARTIFICIAL INTELLIGENCE FOR THE ECOLOGICAL TRANSITION

Artificial intelligence and ecological transition roadmap

#### CONTEXT

Al is part of our daily lives, as its field of application is so broad. Despite its limitations, it offers great possibilities for the ecological transition.

#### GOAL(S)

- Generalising the use of AI for the ecological transition
- Increasing Al-related skills
- Adopting an ethical charter
- Setting up an Al governance

#### **STAKES**

- Defining priorities for the implementation of artificial intelligence
- Defining priorities for the implementation of tools required by the departmental cluster

#### **ACTIONS**

Selective and evolving, the roadmap proposes 5 key commitments around the themes: data base, enterprises, territories, regal and ethics.



### Strategic areas



Axe 2 : soutenir les écosystèmes innovants en IA dans le secteur privé et dans les territoires

Axe 3 : transformer le pilotage de la transition écologique par l'IA

Axe 6 : déployer un socle technologique

Axe 7 : monter en compétence en IA

Axe 8 : se doter d'une charte éthique

Axe 9 : mettre en place une gouvernance de l'IA

Axe 4 : caractériser l'IA

Axe 5 : mobiliser des financements



### COMMON DATA SPACES

#### **GD4H - Green Data for Health**

#### CONTEXT

One of the Health-Environment objectives is to crossreference environmental data with health data in order to produce knowledge on the impact of environmental factors on health.

#### GOAL(S)

- To enable better mobilisation and valorisation of environmental data applied to health-environment by research and expertise actors.
- To respond to the need for better traceability, accessibility and quality of environmental data.

#### **ISSUES**

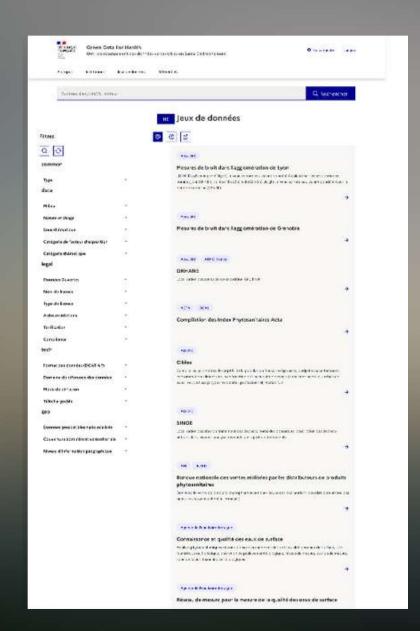
Improving the synergy between actors of the environmental health ecosystem, producers and consumers of environmental data.

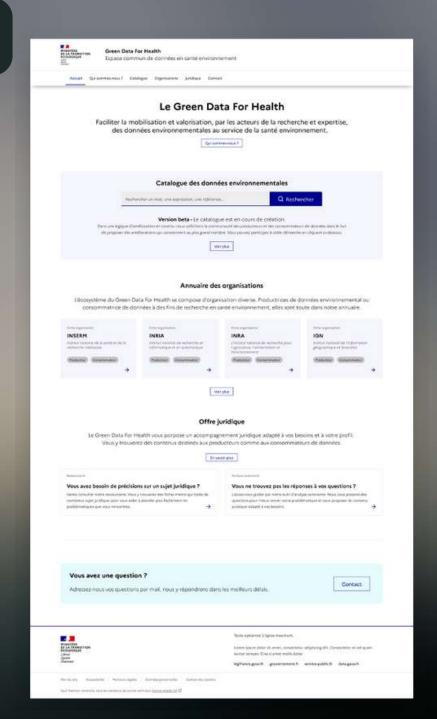
#### **ACTIONS**

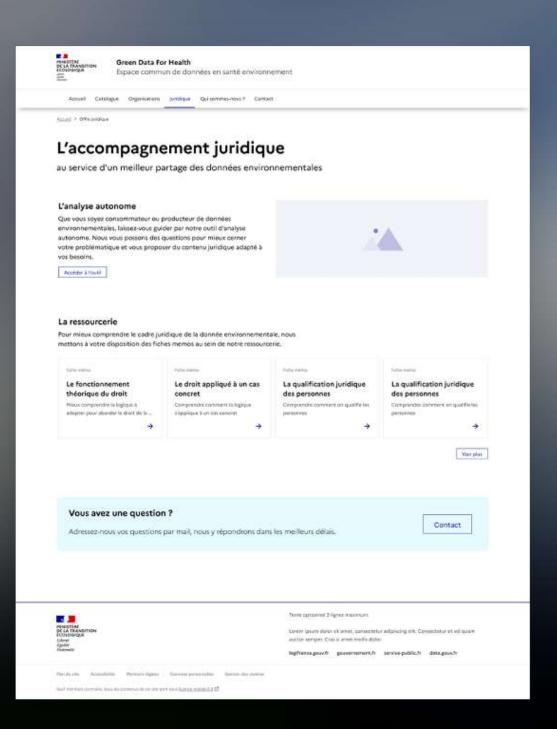
A service offer based on 3 axes: a catalogue listing 114 relevant and useful environmental data issues for use in health-environment and benefiting from a search engine / the animation of the community of producers, experts and researchers / a legal support module.



### Overview of the platform

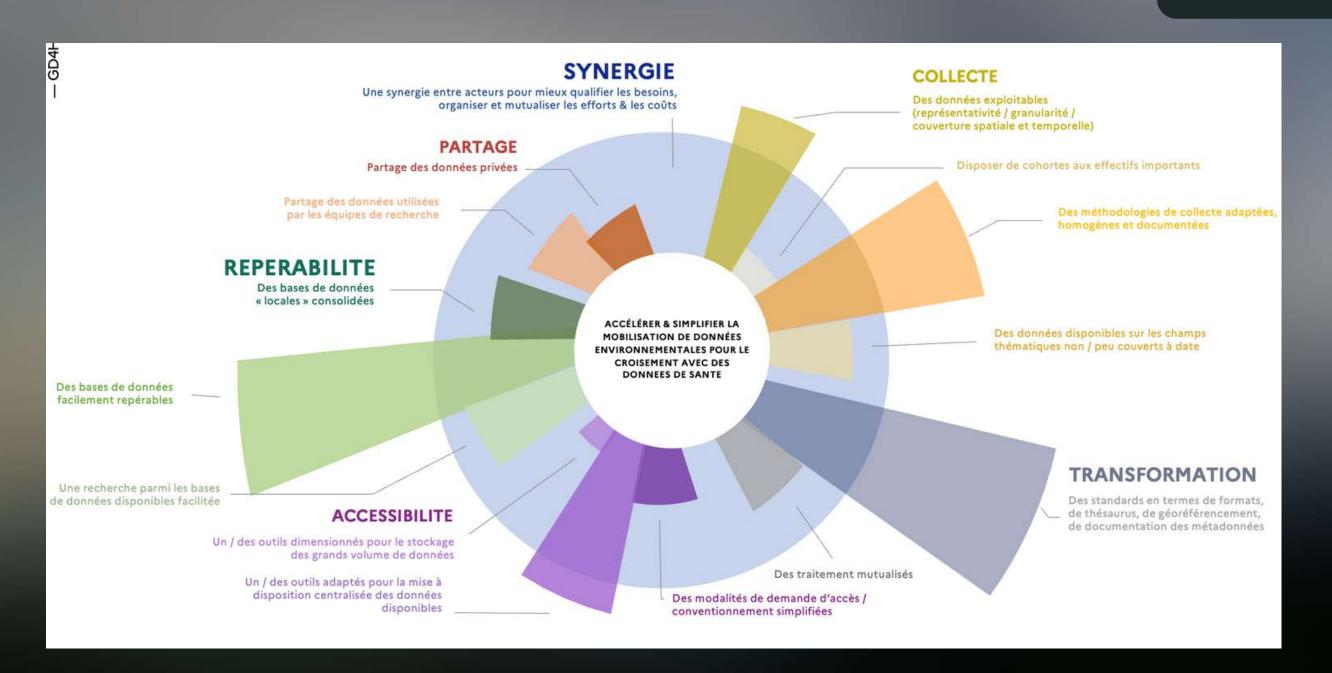








### Identified needs





### COMMON DATA SPACES

### Pre-figuration for waste processing and valorisation

#### CONTEXT

The European data strategy aims to structure common data spaces, according to sectoral entries (e.g. the "waste" sector), by gathering public and private data, aiming for interoperability.

#### GOAL(S)

- Stimulating the sharing of data on the waste sector between different actors.
- Making public policies and waste sector objectives converge.

#### **ISSUES**

- Bio-waste is a priority for the State and the CSF.
- Obligation to sort at source / selective collection and recovery of bio-waste from the end of 2023 (AGEC law)
- Multi-actor sector with a significant chain value
- Need to modernise and boost this sector.

#### **ACTIONS**

The definition of use cases is underway by the working group (MTE, CSF and DGE).



# USE CASE - IA FOR ENVIRONMENTAL ASSESSMENT

Al tool for environmental authorities

#### CONTEXT

Environmental authority's auditors find it difficult to analyse project files subject to environmental assessment. The task is complex because of the demanding deadlines, the size of the files and appendices and the lack of HR resources.

#### GOAL(S)

Helping auditors to review files, using ergonomic tools and language processing by AI.

#### **ISSUES**

- Several platforms are already collecting project files and opinions
- Possible extension with a "reader"
- Ensure quality of internet connections.

#### **ACTIONS**

- Facilitating the reading of files via PDF manipulation tools.
- Using advanced search functionalities for each of the files



### KNOWLEDGE AS A SUPPORT FOR PUBLIC POLICY

#### **Mission Connaissance**

#### **CONTEXT**

Knowledge is recognised as strategic in support of ecological transition policies in the territories.

#### GOAL(S)

- Ensuring a 360° management of the transformation of knowledge, by federating ecosystems.
- Providing each decentralised State department and each local authority with tools to territorialise priority policies (the P.A.R.C.: Plan, Accelerate, React, Target)

#### **ISSUES**

- Strategic project related to the data roadmap
- Demonstrated added value for public policies and ecosystems

#### **ACTIONS**

- Creation of regional thematic clusters with a national vocation: 3 initial experiments (energy renovation of buildings, renewable energies and soil artificialisation).
- Service offer (impact measurement, simulation, methodology...).



### KNOWLEDGE TO SUPPORT PUBLIC POLICY

**Mission Connaissance** 

PLANNING: Identifying energy renovation potential and fuel poverty

ACCELERATING: Identifying barriers (especially economic ones) and good practices (such as comparing territories)

REACTING: Continuously monitoring energy renovation targets

TARGETTING: Reconciling public policies



### IA DEMONSTRATORS FOR/BY TERRITORIES

#### Al demonstrators in the territories

#### CONTEXT

The 2nd stage of the National Artificial Intelligence Strategy aims to place France in promising Al segments and to bring out the champions of tomorrow.

#### GOAL(S)

Supporting the creation of a supply of frugal Al technologies in the territories through demonstrators, serving the objectives of ecological transition, decarbonisation and energy transition.

#### **ISSUES**

- Accelerating the rise of projects involving companies, territories and the State, using AI to improve territorial management services (mobility, energy, buildings...)
- Accelerating the development of AI in the French economy.

#### **ACTIONS**

A call for proposals linked to the "intelligent territory" approach will be launched in 2022.



### PUBLIC INNOVATION AND INTRAPRENEURSHIP

### Mission Transition Écologique

#### **CONTEXT**

80% of SME and SMI managers are aware of the climate emergency but only 13% say they will be able to reduce their carbon emissions "significantly" in the next 5 years, with half of them citing a lack of financial resources as the main reason. Although the number of financing mechanisms for VSEs, SMEs and SMIs has increased in recent years to help them finance their ecological and energy transition projects, public ecological aid remains unknown to companies, with complex mechanisms that are scattered among the websites of different operators.

#### GOAL(S)

Mission Transition Écologique, a smart and accurate search engine for public ecological aid for companies and economic development players, brings together in a single entry point the financing of the French Public Bank for Investments (Bpifrance), the ADEME, the Regions and even European or specific aid. All of this with the possibility of being called back by an advisor from the House of Trade and Industry, when research is not enough.



### PUBLIC INNOVATION AND INTRAPRENEURSHIP

### Mission Transition Écologique

#### **ISSUES**

- Motivating companies to initiate (or scale up) their ecological transition.
- Simplifying and enhancing access to the public green aid offer for end-users.
- Offering a public service co-constructed by the administration in line with end-users' needs.

#### **ACTIONS**

The search engine gives access to multiple financing options and offers the possibility to be called back by an advisor.



### FUNDAMENTAL TOOLS

### A data desk for Ecological Transition and Territorial Cohesion

#### CONTEXT

Data is a strategic tool: its use and development are part of the ministerial cluster's data roadmaps.

#### GOAL(S)

- Improving access to ecological transition and territorial cohesion data
- Facilitating the discovery of, and access to, data on ecological transition policies
- Build up reliable data catalogues

#### **ISSUES**

- Making better use of existing data catalogues
- Encouraging data producers to build catalogues
- Improving the quality of the metadata used

#### **ACTIONS**

The guichet provides a single point of access to data, using existing metadata in different data catalogues



### DEVELOPMENT OF GEOLOCATED INFORMATION

#### **National Council for Geolocated Information**

#### **CONTEXT**

The National Council for Geolocalised Information aims to advise the Government in the field of geolocalised information.

The General Secretariat of the NCGI is provided by the Ministry of Ecological Transition and the GCSD is the national contact point for the INSPIRE directive.

#### GOAL(S)

Strengthening the strategic role of the NCGI and its advisory role for the government as a facilitator of collective action.

#### **ISSUES**

- Ensuring collegial governance of French geolocated information (for sovereignty, ecological transition, competitiveness, etc.).
- Designing national standards and reference systems.

#### **ACTIONS**

- Establishment of a governance mechanism for the National Address Database (NAD).
- Launch of a working group on the definition of a building reference system.
- Coordination between the territories and the CNIG correspondents in the regions.



### DEVELOPING SKILLS ON DATA

Knowing how to collectively make the best use of data for the ecological transition

#### CONTEXT

Making better use of data for the benefit of the general interest, protecting sensitive data and encouraging innovation through data are some of the issues at stake in a public policy on data that has become strategic for administrations.

#### GOAL(S)

By proposing actions ranging from acculturation to cutting-edge expertise, the aim is to equip the ministerial pole to respond to all the strategic, operational and technical challenges of data.



### DEVELOPING SKILLS ON DATA

Knowing how to collectively make the best use of data for the ecological transition

#### **ISSUES**

- Being effective in a context of huge diversity of existing skills and needs
- Being part of the efforts to increase digital skills (articulating well the training courses)
- Being part of an inter-ministerial and inter-public service context (the needs are widely shared)

#### **ACTIONS**

- Initial training: what curriculum on data in public service schools?
- Continuing training: strengthening and diversifying the range of support and courses
- HR policy: recruiting and managing the careers of data specialists



### COVERING THE LEGAL NEEDS ON DATA

Build a quality legal support on data within the ministerial pole

#### CONTEXT

As public policy on data is strengthened, its variety and legal complexity are increasing for project developers.

#### **GOALS**

Cover current and future needs in terms of legal support on data for ministerial departments and operators.

#### **CHALLENGES**

- Tensions on staffing
- Dissemination and misidentification of existing skills
- Need for forward thinking
- Navigating a context between ministers and publics services

#### **ACTIONS**

Workshops to map the existing situation and define scenarios.



### OUR COMMUNICATION CHANNELS



Website: https://bit.ly/3x9SJVG



Twitter: https://bit.ly/3KkY6ow



LinkedIn: https://bit.ly/3DMt5ra



Youtube: https://bit.ly/3v2Don9



Instagram: https://bit.ly/3JijWYq



Podcast: https://bit.ly/3M3EAh5

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