D-ORBIT

NEW SPACE SOLUTIONS

ESA SPACE SAFETY ISAM DAYS

16-17 September 2025


D-ORBIT
PIONEERING SPACE LOGISTICS

D-ORBIT

OUR VISION

Creating the **first space logistics** infrastructure to enable the space economy and human expansion in a **sustainable space**

PIONEER IN SPACE LOGISTICS

600
people and growing

21
missions

19
ION launched

200
payloads in space

- Commercial customers in 4 continents
- Presence in Italy, UK, Portugal and USA
- Acquired Planetek in March 2025

PRODUCTS AND SERVICES

ADDRESSING THE NEEDS OF TODAY WHILE DESIGNING THE TECHNOLOGY OF TOMORROW

Space Transportation Services: solutions to address the needs of the small satellite market in terms of launch and deployment, operations on payloads, including testing of new technologies in orbit.

Space Cloud Services: an innovative space cloud-based technology that will enable close to real-time data computing and data storage directly in orbit.

Satellite as a Service: a model that allows customers to leverage the capabilities of satellite technology without having to invest in and operate their own satellite infrastructure.

In-Orbit Servicing: services powered by proprietary robotic servicing vehicles designed to achieve multiple mission objectives throughout their lifespan (e.g., inspection, assembly, refurbishment, refueling, and debris removal).

Downstream Services: Geospatial and Analytics provider for Government and Commercial users, cognitive Cloud Computing Service.

OUR CERTIFICATIONS

WE PURSUE THE HIGHEST QUALITY STANDARDS IN EVERY AREA

RATING DI LEGALITÀ

★★★

D-ORBIT PRINCIPLES

THE NATURAL STEP AND B-CORPORATION

Backcasting from the Future:

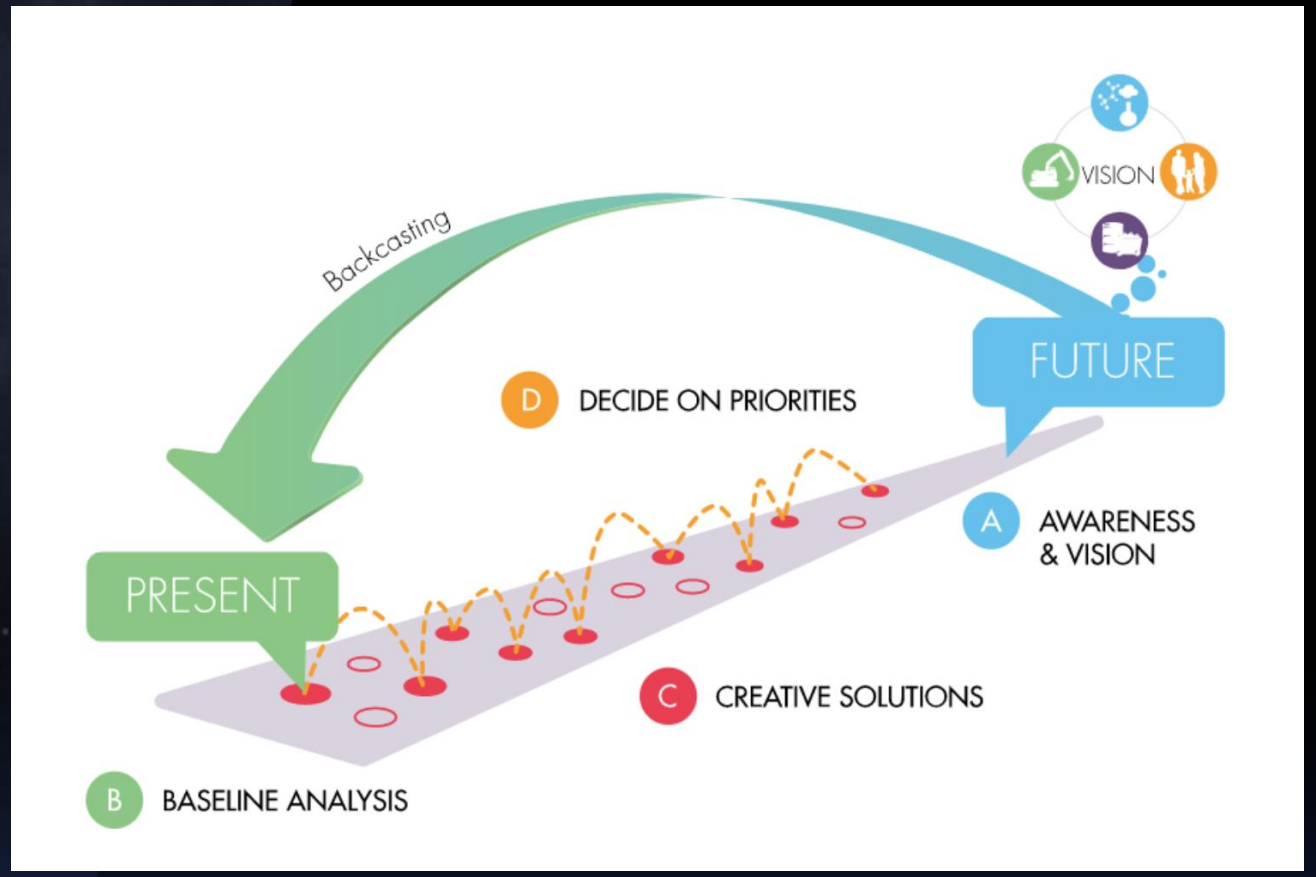
- Starting from the vision and identify the steps that can get us there from now.

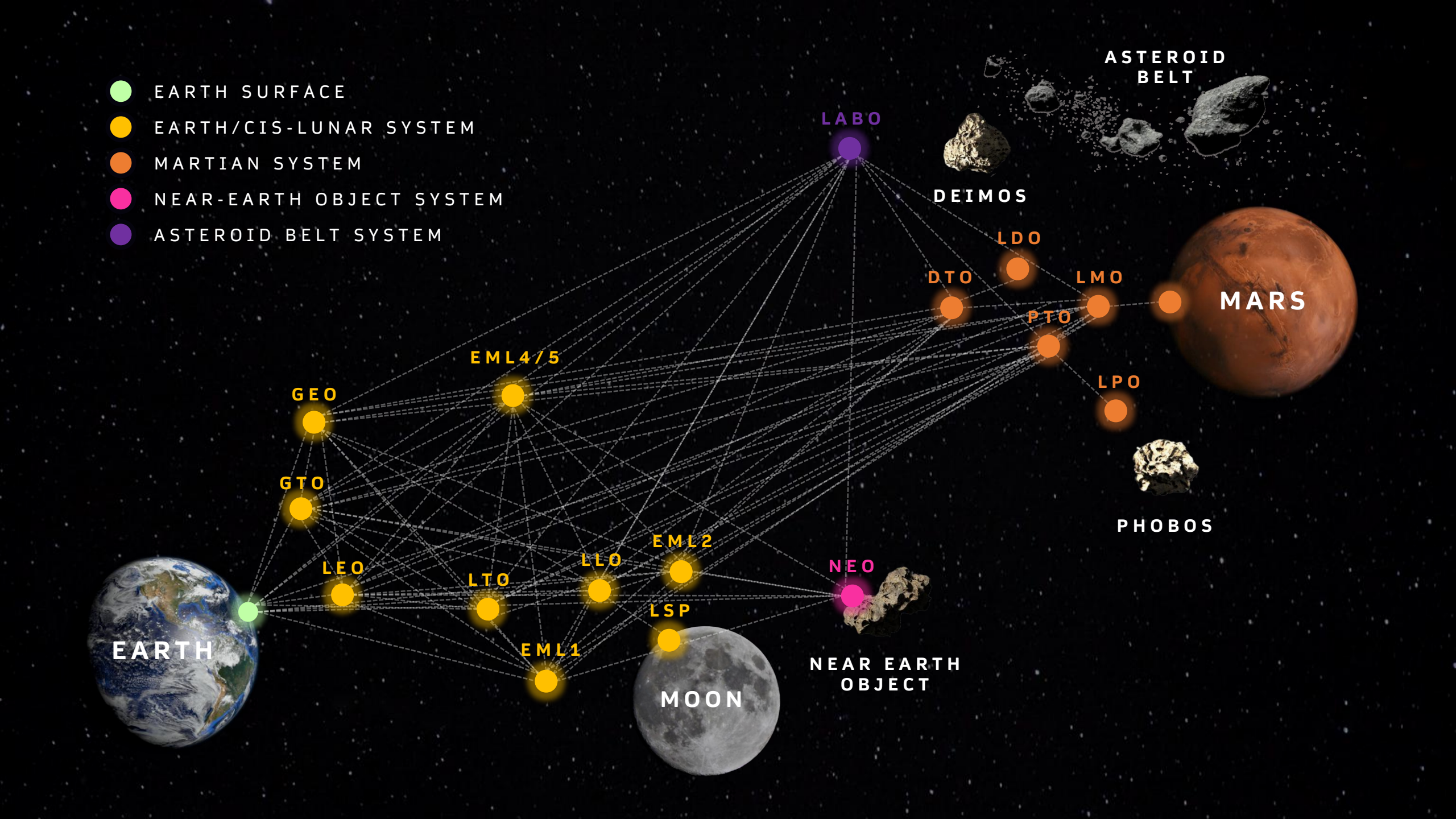
Each step shall be:

- Sustainable
- Enabling the next step
- An open platform.

A **B-Corp** (short for Certified B Corporation) is a for-profit company that meets rigorous standards of social and environmental performance, accountability, and transparency. These principles are embedded in both legal structure and operational practices.

This led D-Orbit to move from a "take-make-waste" to a "circular economy" model.




EARTH SURFACE
EARTH/CIS-LUNAR SYSTEM
MARTIAN SYSTEM
NEAR-EARTH OBJECT SYSTEM
ASTEROID BELT SYSTEM
ASTEROID BELT
LABO
DEIMOS
LDO
DTO
LMO
PTO
MARS
LPO
PHOBOS
EML4/5
GEO
GTO
LEO
LTO
LLO
EML2
NEO
LSP
EML1
EARTH
MOON
NEAR EARTH OBJECT

D-ORBIT PRINCIPLES

Backcasting from Future

Smart Deorbiting Sub-syst. → Space Systems → Space Transportation → In-Orbit Servicing → In-Orbit Assembly & Refurbishment → On-Orbit Manufacturing and Recycling → Full Solar System Logistics

D3 (2014) → D-Sat (Demo) (2017) → ION Carrier (2020) → GEA → Rise

GEA: GENERAL EXPANSION ARCHITECTURE

ENABLING SPACE CIRCULAR ECONOMY

Conceived to be:

- **Refuelable**,

  in order to provide extended services

- **Stackable**

  to function as a fuel depot or to combine functionalities (e.g. extended power)

- **Modular**

  so that can be refurbished or repurposed with new elements/subsystems

- **Multi-mission**,

  multi-environment through physical re-configuration

- **Inter-operable**,

  with the objective to work in an ecosystem of heterogenous spacecrafts and space assets (including D-Orbit's ION)

FUTURE ESA MISSION

CIRCULAR ECONOMY IN SPACE

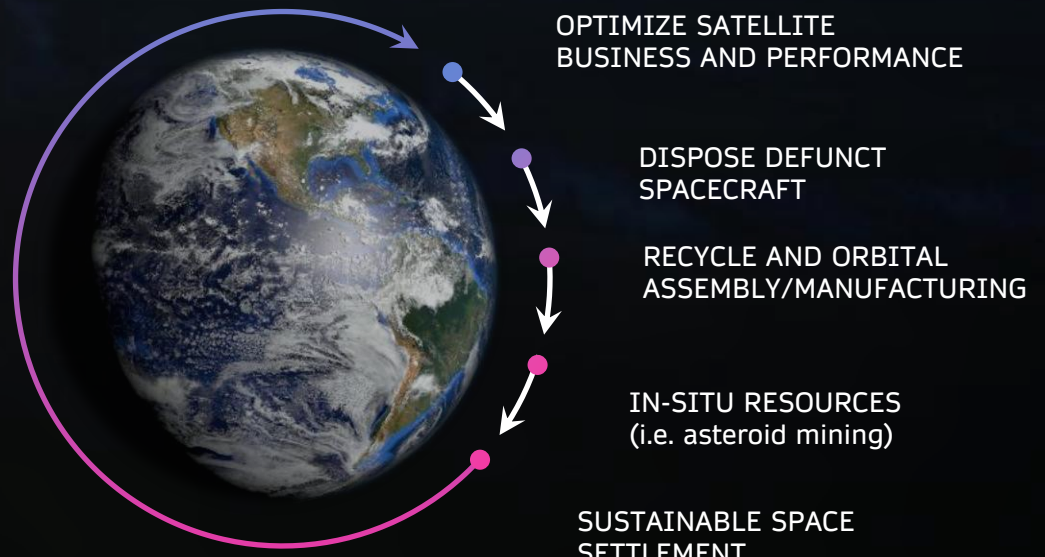
D-Orbit has vast experience in developing gradually space systems:

- The ION OTV is at its 19 launches with 1 major upgrade and 5 different versions: current version is ION mk02 v5. ION mk03 will be announced soon.
- A similar approach is expected with GEA

D-Orbit is working with ESA to design a follow-on mission to enable extended services, including:

- Refurbishment and Repair
- Assembly
- Refuelling

The objective is to bring into use the full circular economy capabilities which take advantage of the GEA design philosophy.



Solving circular barrier to entry

D-ORBIT EXTENDED IOS

In order for global satellite designers to be incentivised to implement circular economy features, circular economy services need to be available, but in order to develop those services, the market needs to exist.

D-Orbit plans to get around this main impediment to the implementation of a circular economy (lack of addressable market) by relying on itself as anchor customer (GEA fleet), demonstrating the usefulness and competitive advantage of this solution.

We welcome European disruptive technologies providers to join forces for make this In-Orbit Service more competitive, resilient and interoperable.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Thanks!