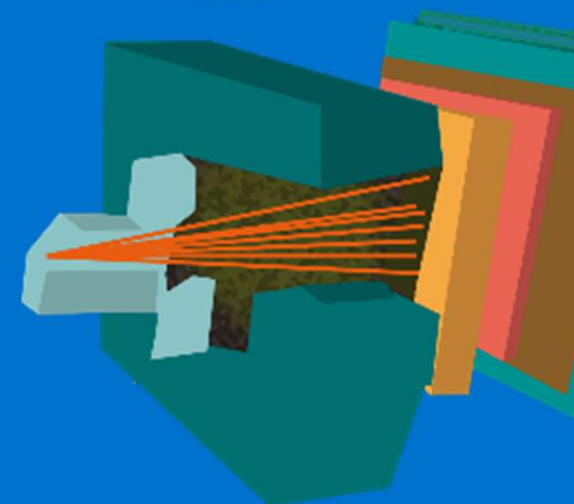
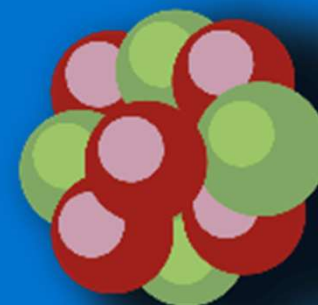
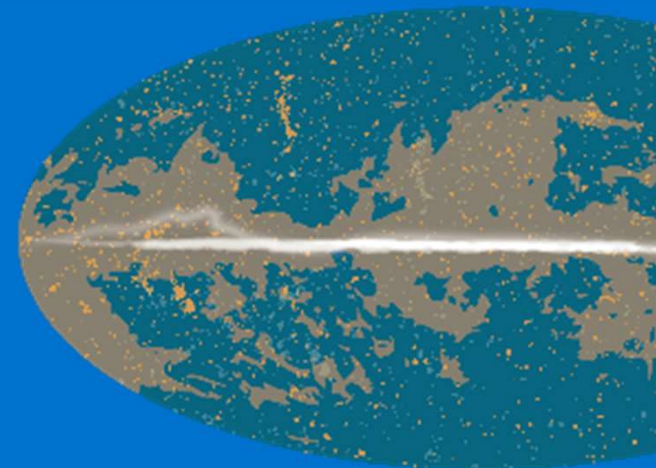


Institut de Ciències del Cosmos Winter Meeting 2022

Welcome and status review

Xavier Luri, Director

Assumpta Parreño, Vice-Directora



Direction

Director: Xavier Luri
Vice-Director: Assumpta Parreño
Secretary: Federico Mescia



Scientific director: Jordi Miralda (MdM IP)



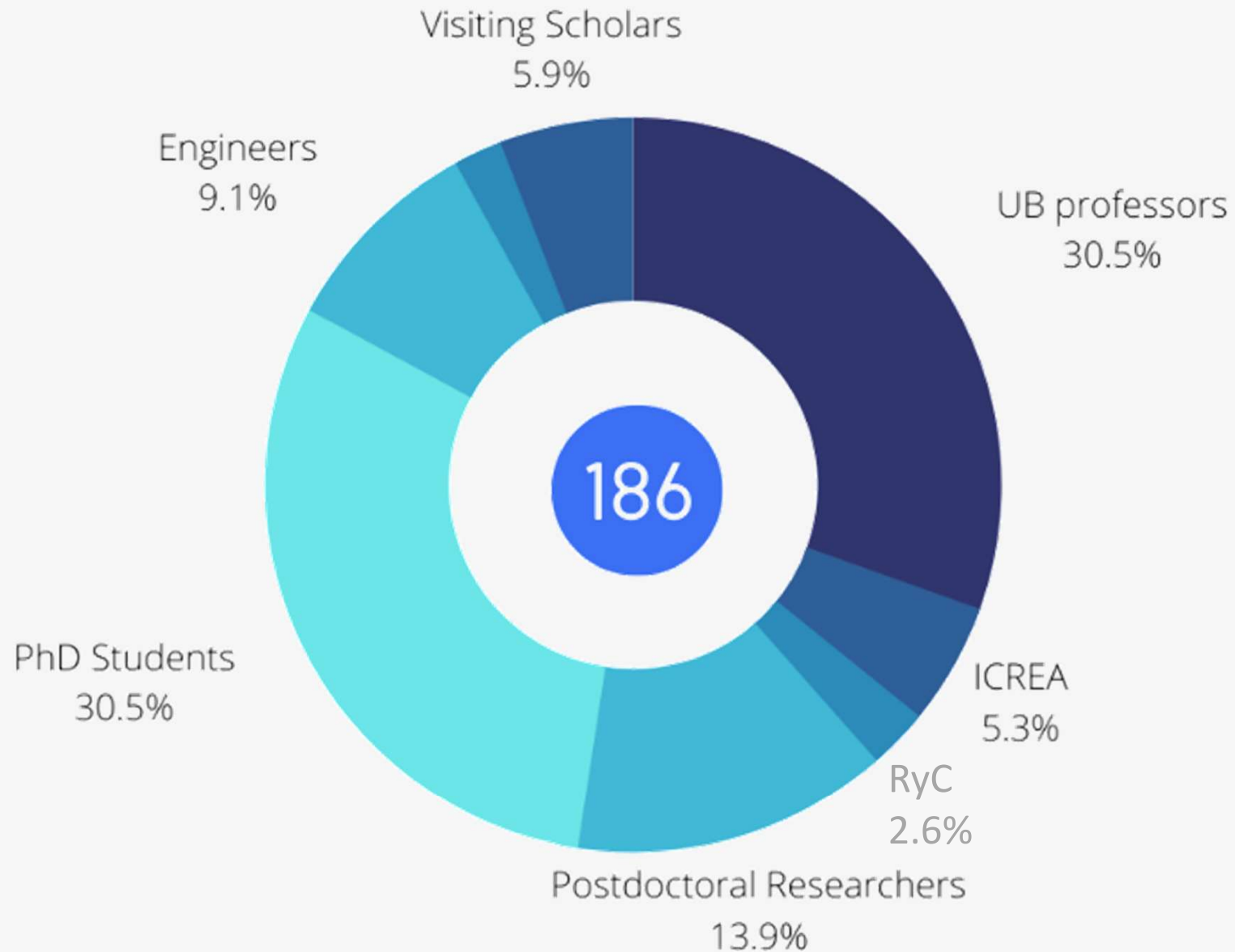
Tech. unit: David Gascon, Jordi Portell



Organization

The ICC new statutes have been recently approved, giving formal recognition to structures like the DEIC and the technological unit

Members (2021)



Awards to ICCUB members 2018-2021

- 2018: Jordi Torra and Licia Verde awarded the Narcís Monturiol medal for their scientific contributions
- 2018: Licia Verde awarded the *Premi nacional de recerca*
- 2018: Alba Cervera winner of the teach me qiskit prize
- 2018: Adrià Gómez-Valent and Ignasi Pérez, outstanding PhD award, UB
- 2019: Licia Verde awarded the Lodewijk Woltjer Lecture prize
- 2020: Héctor Gil-Marín young researcher prize on theoretical physocs RSEF-BBVA
- 2020: José Luis Bernal, PhD award, Spanish Astronomical Society
- 2021: Licia Verde, Jaume I prize to basic research
- 2021: Teresa Antoja awarded a BBVA Leonardo grant

Research outputs 2018-2020

	PhD thesis	Publications	Invited talks	SOC
2018	8	289	74	14
2019	13	262	130	20
2020	9	308	35	8

COVID

272 Q1 (88,31%) and 141 D1 (45,78%)

Premises

Multipurpose
room

ICREA , PhD and
student offices

Scientific office

Tech-U premises at the Parc Científic (offices and labs)

+

- Department offices (3rd to 7th floor, Physics faculty building)
- Faculty of physics common facilities
- **Currently refurbishing a dedicated room to host computer clusters (co-funded)**

Technological Unit

Many groups in the ICCUB are carrying research where technology is a key element

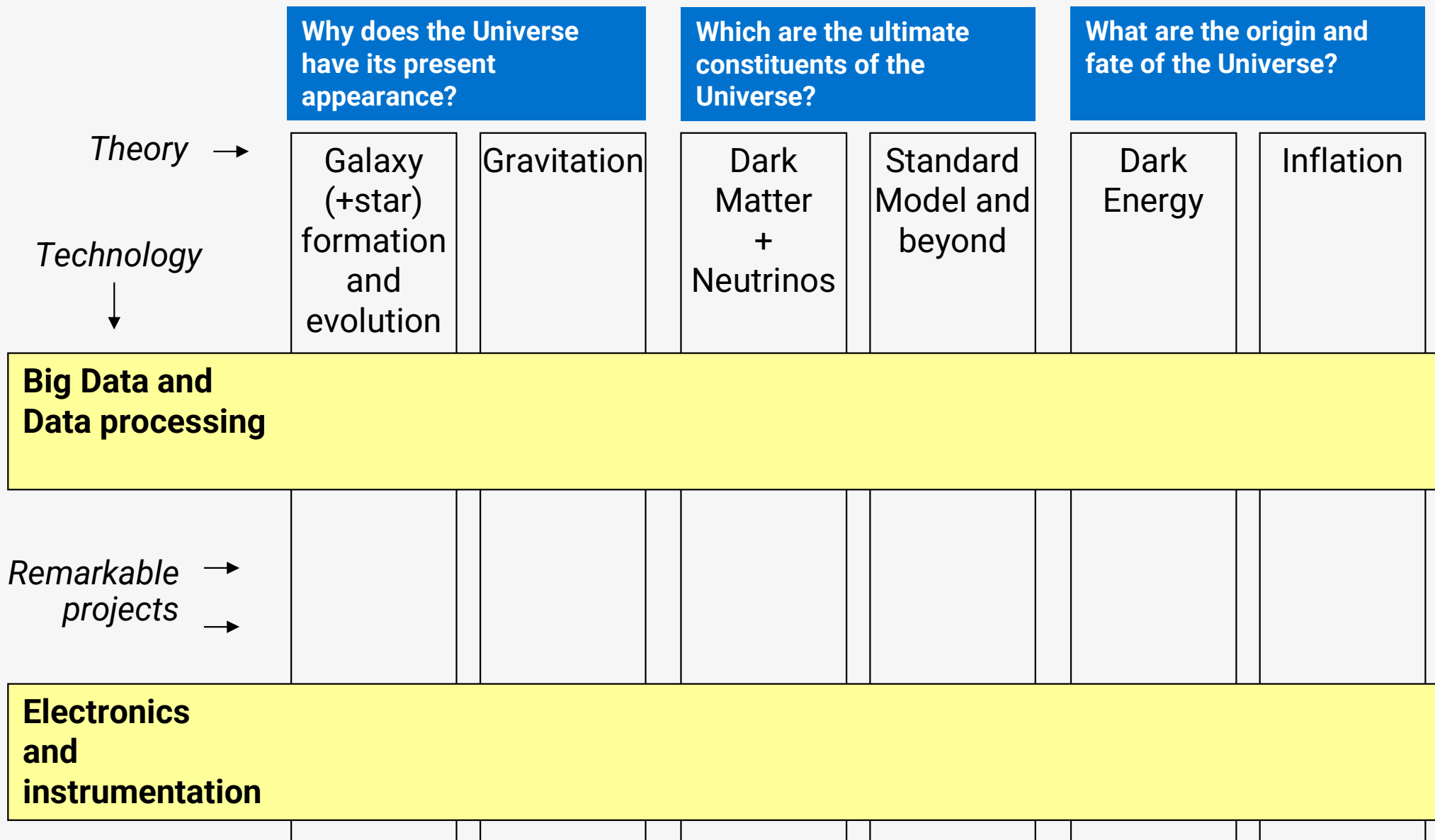
Main technological activities:

- **Instrumentation**
- **Electronics**
- **Very large data processing**

for:

- Space missions
- Particle physics experiments
- On ground detectors
- Medical applications

Research activities



Projects

DESI
[A]

Euclid
[A]

Weave
[A] [E]

Virgo
[B] [TU]

LISA
[B] [TU]

LHCb
[D] [TU]

IAXO
[D] [TU]

Gaia
[E] [TU]

MAGIC
[TU] [E] [B]

CTA
[TU] [E] [B]

ERA participation

SUBLIME
[F]

ATTRACT
[D] [TU]

AIDA
[D] [TU]

COST actions

GWverse
[B]

PHAROS
[C]

GREAT
[E]

Maria de Maeztu excellence award

A very important asset for the ICC

We have been successful in two calls:

- 2014-2018
- 2020-2023



EXCELENCIA
MARÍA
DE MAEZTU

We have to start preparing for the 2023 call

Master studies associated to ICCUB

- [Astrophysics, Particle Physics and Cosmology](#)
Fully managed by ICCUB members, 31 students, 15 PhD (2020)
- [Inter-university master in Nuclear Physics](#)
Coordinated with 7 other universities, 46 students, 6 PhD (2020)
- [Quantum Science and Technology](#) **(NEW)**



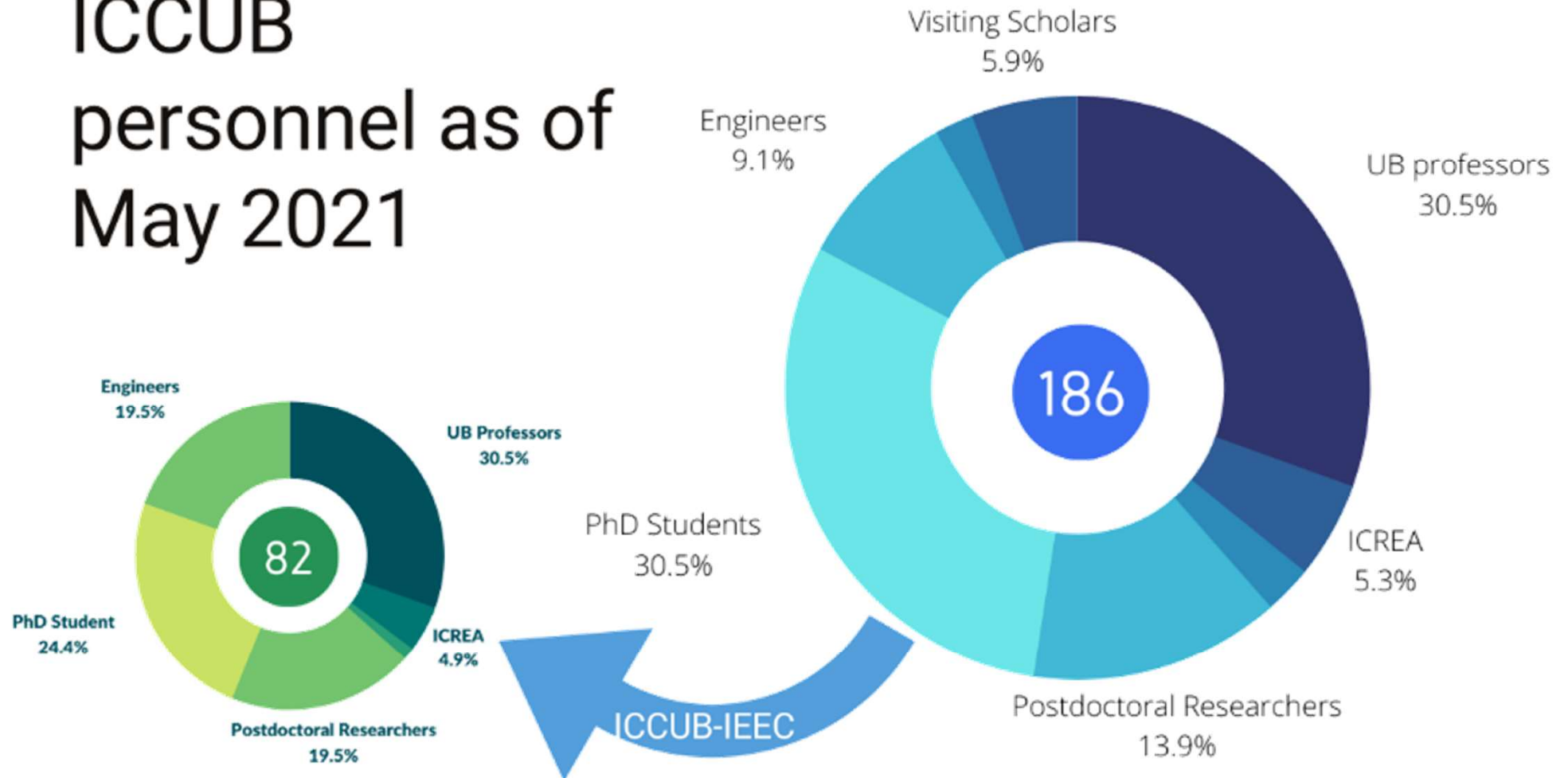
MdM grant programme aimed to attract bright students for the three of them

Institut d'Estudis Espacials de Catalunya

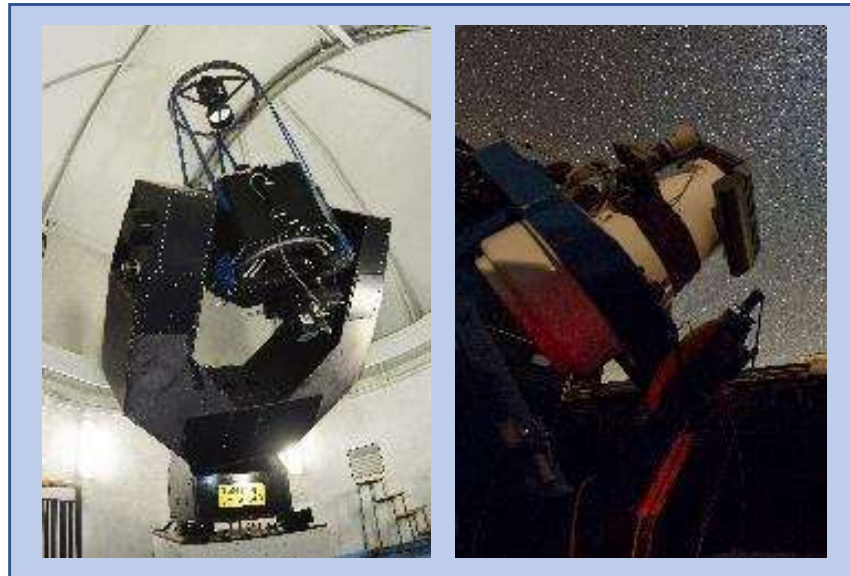
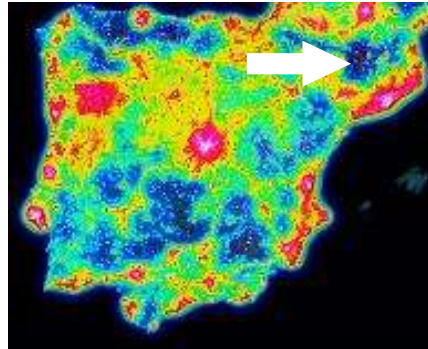


Institut d'Estudis
Espacials de Catalunya

ICCUB personnel as of May 2021



Montsec Observatory (OAdM)



New Space Research and Innovation

3Cat program

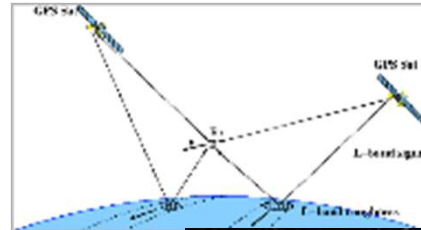


4
ESA 'Fly your Satellite!' program
Launch: ISS, 2021



5A 5B
FSSCat: Copernicus Masters Winner
Launch: Vega SSMS, August 2020

GNSS-R/PRO program



ROHP-PAZ



C3SatP project



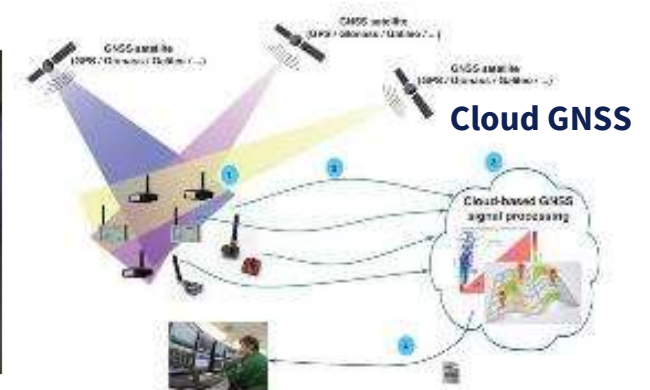
SDR+OBDH+OBC (RTOS-based)



Observatori del Montsec



NanoSat Lab



Cloud GNSS



Estratègia NewSpace de Catalunya

Generalitat de Catalunya



Institut de Ciències del Cosmos
UNIVERSITAT DE BARCELONA



Enjoy the Winter Meeting!!

