Artemis

- Artemis is one of the 3 laboratories hosted at the Observatoire de la Cote d'Azur in Nice.
- Created in 1999 by Alain Brillet, one of the founder father of the Virgo project.
- Main science topic: gravitational waves from theory to detectors passing through data analysis and astrophysics.
- ~40 members, including permanents, PhD and postdocs.







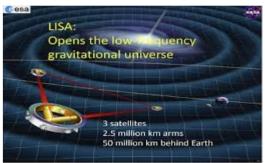


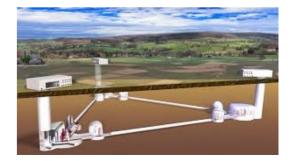


Teams @ Artemis

- GW projects:
 - Virgo, LISA and Einstein Telescope
- Laser & cavities
- Metrology
- MIGA (atomic GW detector)
- GW data analysis
- Alternative theories to general relativity







Focusing on gravitational wave physics

Virgo group

High power stabilized laser



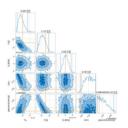
Scattered light measurement



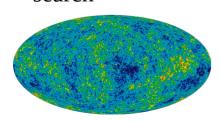
 Search for new transient sources



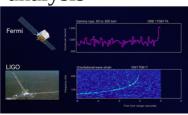
Burst source parameter estimation



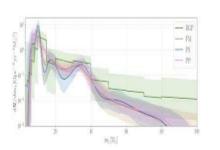
Background GW search



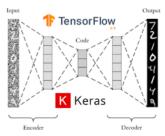
Multi-messenger analysis



CBC population

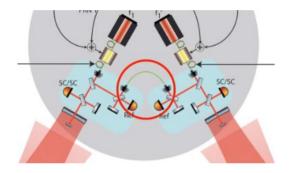


Machine learning for GW detection

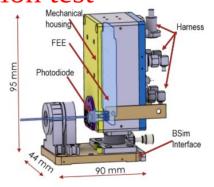


LISA group

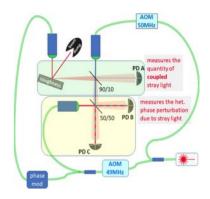
• Stray light studies



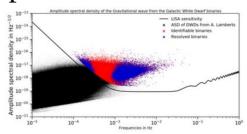
Photodiodes radiation test



Prototype SL-OGSE

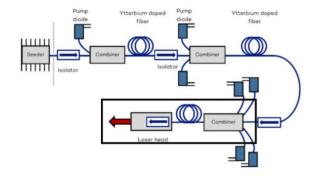


LISA Distributed Data Processing Center: catalogue Population studies

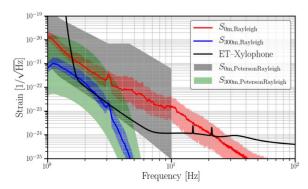


Einstein Telescope group

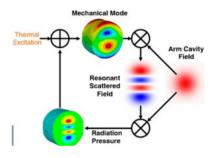
High power Laser



Correlated noise studies



Optomechanics



• Core collapse supernova PE



Artemis @ OCA

- Permanent members:
 - MA Bizouard, N Christensen, W Chaibi, F Cleva, JP Coulon, N Dinu-Jaeger, N Korsokova, H Heitmann, A Lamberts, M Lintz, M Merzougui, M Nardello, M Pichot, E Polini, M Trad Nery, M Turconi.
- Postdoc
 - G Boileau, S Galaudage, J Suresh
- PhD

H Einsle, Alice Perogo

OCA environnement

