P25: Identification of trends related to shifts in rainfall patterns Maturity score STD: 0.70

Constraints and limitations

- Uncertainties related to precipitation estimation of the products due to the sensors, or the methodology of calculation the amount of precipitation.
- Lack of in-situ data to evaluate the products.

Relevant user needs

- UN12: Analysis of potential risks in specific regions.
- UN13: Need to geo-map clients.
- UN14: Need to screen the feasibility of projects against different hazard criteria.
- UN43: Need to monitor changing precipitation patterns and flood risk in the \mathbf{v} icinity of vulnerable assets.

R&D gaps

- Low spatial resolutions of the precipitation products.
- · Vulnerability assessment of assets is missing

Potential improvements drivers

- Climate trends of rainfall are available. Work on displaying and quantifying movements from those trends over time is something that could possibly be developed based on the categorization of annual rainfall seasons.
- New precipitation products with higher spatial resolution
- Additional data on vulnerability and exposure is required to evaluate the impacts

Utilisation level review

Utilisation score

Mean: 2.60 STD: 1.02

No utilisation

- Users' lack of EO knowledge and skills to utilize the EO product.
- Unawareness of the existence of this EO product.

Low utilisation

- Unawareness of the existence of commercial EO products with better specifications.
- Do not have proper skills and knowledge internally.

Medium utilisation

- Higher cost of using the best available commercial EO product.
- The product is already satisfying the technical and usability requirements.

High utilisation

Critical gaps related to relevant user needs