

<b>P24: Identification of flood hazard areas</b>	
<b>Maturity score</b>	
<b>Mean:</b> 2.7	<b>STD:</b> 0.61
<b><u>Constraints and limitations</u></b>	
<ul style="list-style-type: none"> <li>• False positives from the changes on the land surface, not caused by flooding.</li> <li>• Difficulties in detecting floods in urban or densely vegetated areas.</li> <li>• False positives caused by differences in relative orbits of Sentinel-1</li> <li>• Complex in areas of local hydrology</li> <li>• Limitations in detecting water under vegetation,</li> <li>• Discrimination of "Artificial flooding" from irrigated fields (E.g. rice paddy fields).</li> </ul>	
<b><u>Relevant user needs</u></b>	
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.	
UN37: Projection of risk to portfolio assets into the future.	
UN43: Need to monitor changing precipitation patterns and flood risk in the vicinity of vulnerable assets.	
<b><u>R&amp;D gaps</u></b>	
<ul style="list-style-type: none"> <li>• Limitations of revisit time-frequency (potentially missing flood events or max flood peak)</li> <li>• Unavailability of global high-resolution DEM</li> </ul>	
<b><u>Potential improvements drivers</u></b>	
<ul style="list-style-type: none"> <li>• More revisit time of SAR data.</li> <li>• Additional data on vulnerability and exposure is required to evaluate the impacts of some perils/hazards.</li> <li>• Global high-resolution DEM.</li> </ul>	
<b>Utilisation level review</b>	
<b>Utilisation score</b>	
<b>Mean:</b> 3.13	<b>STD:</b> 0.60
<b><u>No utilisation</u></b>	
<b><u>Low utilisation</u></b>	
<b><u>Medium utilisation</u></b>	
<ul style="list-style-type: none"> <li>• The product is already satisfying the technical and usability requirements.</li> <li>• Lack of a single database, costs, and the need may not be as crucial in some sectors like the asset management space (different story for insurance, and re-insurance companies which need this product)</li> <li>• Efforts to use this EO product more are ongoing in academic literature. Higher utilisation is blocked because of a lack of data to combine with this EO product - e.g., the boundary locations of assets, buildings, and other properties.</li> </ul>	
<b><u>High utilisation</u></b>	
<b>Critical gaps related to relevant user needs</b>	
<b>Guideline gap</b>	

UN37: Projection of risk to portfolio assets into the future.