

<b>MOZ 3: Wave Climatology for the Mozambique Channel</b>	
<b>Keywords:</b> Waves, Climatology, Navigation, Port Development	
<b>Primary actors</b>	
<b>Mozambique:</b> INAM (Hipolito Cardoso, Zefanias Daniel), UEM (Fialho Nehama), support from UEM Student (Virgilio Alberto Mabjaia) <b>UK:</b> SatOC (Ellis Ash)	
<b>Stakeholders / End Users</b>	
INAM, UEM, INAHINA, INAMAR	
<b>Introduction / Statement of the Problem</b>	
Wave information is important for planning navigation and port developments. Climatologies that include monthly averages and extremes as well as information on inter-annual variability can be developed from archive data on significant wave height, derived from satellite altimetry.	
<b>Case study description</b>	
<p><b>The case study will involve the following activities:</b></p> <ul style="list-style-type: none"> <li>• Carry out a literature review (physical oceanography texts) and provide a summary of marine climate in the SW Indian ocean region.</li> <li>• Using the C-RISe wave data climatology generate maps for the Mozambique Channel of significant wave height and its variability for different months of the year.</li> <li>• From this initial analysis, and in discussion with INAM and INAHINA, identify two (or more) locations for a more detailed analysis. Use the C-RISe software to generate a detailed analysis of seasonal and year to year variability in the wave climate at these locations. Has the seasonal variability changed during the time of the climate data base? What does this mean for extreme wave values?</li> <li>• Produce a report on the Wave Climate in the selected regions, seasonal and year-to-year.</li> <li>• SatOC will provide support in using the C-RISe software.</li> </ul>	
<b>Expected Impacts</b>	
<p><i>Long Term Primary Impact:</i> After Project Completion (&gt; 2020)  Improved information can be used to support the planning of three large ports in the north of the country, and help engineers to identify suitable sites and specifications for new installations.</p> <p><i>Initial Secondary Impact:</i> To be reported on Case Study Completion at December 2018  UEM will develop the capability to access and process satellite data on ocean waves and to apply them in a collaboration with end-users.</p> <p>INAHINA will gain insight into remotely observed wave climatology and variability near the ports.</p>	
<b>SDG 9.A</b>	