

Mitigating fear through the implementation of Tetrapods

(Courtesy: Metro Manorama June 14.06.2023 Author: Jacob Paul)

The transformative impact of Tetrapods on Chellanam's fate

The residents of Chellanam can now reside securely under the safeguard of tetrapods. Previously, the Chellanam sector experienced significant consequences from cyclones like Okhi and other storm events, causing substantial impacts. However, with the construction of the tetrapod seawall spanning 7.32 km from Chellanam harbour to Puthenthodu, residents are relieved from the concerns of inundation during the monsoon season. This construction project is now 90% complete, providing a sense of security and allowing residents to live without fear of flooding. The construction of groins is currently in progress, complementing the ongoing work on the tetrapod seawall. Both these endeavors are implemented based on the recommendations provided by the National Centre for Coastal Research in Chennai. These recommendations are derived from extensive studies and modeling work conducted by the center, ensuring that the construction aligns with sound scientific principles and coastal engineering practices. The absence of flooding and inundation last year indicates the success of the ongoing construction work. After many years of facing such challenges, the efforts put into the construction of the tetrapods seawall and groins have proven effective in mitigating these issues. The significant reduction in flooding and inundation demonstrates the positive impact of the ongoing construction work, providing reassurance to the local community. The stretch from Harbour to Bazaar, spanning approximately 2.07 km, has been fortified with 2-ton tetrapods. Similarly, the stretch from Bazaar to Puthenthode, covering approximately 3.69 km, has been fortified with 3.5-ton tetrapods. The first phase of the project is scheduled for inauguration in November of this month, marking a significant milestone in the construction process. Additionally, the construction of the seawall along the Kannammali stretch is set to commence concurrently with the first phase inauguration.

Transforming Coastal Protection into an Asset for Tourism

The proposed paved pathway connecting South Chellanam to Puthenthodu, in conjunction with the ongoing construction of the Chellanam tetrapods seawall will undoubtedly bolster tourism in this region. Tourists will greatly relish the opportunity to indulge in the enchanting experience of witnessing the sunset and embracing the refreshing sea breeze during the evenings. With a meticulous plan and execution that duly considers the tourist aspect, Chellanam has the potential to emerge as one of the prominent tourist destinations in Ernakulam district.

Eighteen months of dedicated effort

Commencing in January 2022, under the esteemed leadership of the Uralungal Labour Contract Co-operative Society (ULCCS LTD), the construction of the Tetrapods seawall at Chellanam was initiated. The concrete mixture, sourced from the ULCCS LTD Panthiruth office, was diligently transported to Chellanam, where the dedicated workers labored day and night to construct the Tetrapods for the seawall. The concrete mixture is carefully poured into the tetrapod-shaped hollow bricks, followed by meticulous strength testing of each individual tetrapod before they are utilized in the construction of the seawall. As a foundation, rocks are initially laid to a height of 2.5 meters, forming a sturdy base. The tetrapods are then strategically placed on top of this rock foundation. This combined structure of tetrapods and the rock base is designed to withstand the force of strong waves, ensuring its stability and durability. A workforce of 200 laborers is diligently engaged in the ongoing construction of the tetrapods seawall. A substantial quantity of materials has been utilized for this project, including 1.2 lakh tetrapods and 8.5 lakh metric tons of stones. The first phase of the seawall construction, with a proposed budget of 350 crore, is currently reaching its final stage.