

# ESTIMATION OF TSUNAMI VULNERABLE AREAS WEST COAST REGION OF BANTEN PROVINCE

Kris Sunarto<sup>1</sup>, Jaka Suryanta<sup>2</sup> & Sumartoyo<sup>3</sup>

<sup>1,2,3</sup> Geospatial Information Agency ( BIG )

Jl. Raya Jakarta – Bogor, Km. 46, Cibinong, 16911, Indonesia, [sunarto02@yahoo.com](mailto:sunarto02@yahoo.com)

**Abstract:** Western coast of Banten Province quite vulnerable of tsunami hit. Tsunami disaster that may occur in the study area are two causes, the first one is extra ordinary eruption of Krakatoa and the second one is devastating earthquake due to continental drift. Impact damage are not only a moment of disaster damage in the form of destruction of buildings and human lives, but also the impact of the double disaster (multiple effect). Double disasters will occur by the chemical industry as well as many important industries that use chemicals. The impact of strategic industries heaviest losses are very detrimental to the country, particularly the national entrepreneurs and foreign businessmen.

The objective of the study is to determine the spatial distribution of tsunami prone areas. For that research , the data and information of : industrial, residential and high economic value areas. The methods used are remote sensing image interpretation and application of GIS. Tsunami prone areas can be known using the thematic data and maps used, existing remote sensing image, Topographical Map on scale 1: 25,000, the primary data field surveys and secondary data. Research activities started from data and spatial information collection, analysis and distribution of depictions of areas prone to tsunami disaster preparation description. Multiple impacts can be expressed in descriptive effect based on the type and capacity of the industrial products.

Result of this study is map of the distribution of tsunami prone areas in the study area, particularly the Sub districts located in the western coastal area of Banten, Sub district of Panimbang, Cilegon, Anyer and Carita tourist areas. The data generally can be used by local governments and other data users for minimize vulnerable tsunami hazard in prone areas.

Keywords: Banten, Tsunami, disaster prone areas.