Title : The Application of GIS to Analysis the Risk area of flood

in Nakhon Pathom Province

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Abstract

The research has purpose for study the topography of Nakhon Pathom Province as information to search for flooding risk area by GIS. It is area model feature altitude terrain model and water level model. Data use to the model such as topography map L7017, hight-defination satellite image and high level of area. The result indicates that Nakhon -Pathom has high area differently range 1-15 meter from MSL. Tha-jeen River flow Butthamonthon is minimum area but Khamphaengsan is maximum area. Flooding risk area start at 1 meter from MSL, most of area is in some area in Bhutthamonthon district. Both of Tha-jeen coastal river are risky when high flooding at 3.9 meter from MSL. That hold one-third of whole province. When flooding reaches 4 meter, risky area holds half of province area and risk around east of area Nakhon Pathom city municipa. Until flooding level reaches 5 meter from MSL, Nakhon Pathom city municipal will flood whole all area. Whole Nakornpathom areas will be flooded at 15 meters from MSL.