

Generation of the data selection information for PALSAR focused on the geographic feature

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The objective of this study is to propose the SAR data selection support information using digital elevation model. The synthetic aperture radar (SAR) data is very useful for earth observation at the time of a natural disaster because it's possible to observe without depending on the weather.

At present, analytical data is selected by using the orbit distance and weather condition in an observation date. But the analysis precision falls at the territory a microwave doesn't reach by the topography condition. So, we proposed generation method of the data selection support image using a slope direction and a hill shade image. The results of this study were as follows;

(1)It was generated that new data selection map which is informed the area of shielded and reflected using a slope direction and a hill shade image.

(2)We were found that in the region microwaves is reflected, it can be observed within the range of the nominal elevation value. And in the region microwave is shielded, it existed the area that cannot be observed in a range of nominal elevation.

Keywords: SAR, data selection support information, slope direction map, hillshade map