

Analysis of Storm Surge in Kobe University caused by Typhoon Jebi, T1821, by using the in-situ observation data.

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Typhoon Jebi, T1821, hit Japan on 4 September, 2018, and a storm surge occurred in the harbor of Fukae Campus of Kobe University. The maximum tide level (TL) occurred between 14:16 and 14:18, and was estimated to be 305 cm by in-situ data such as traces of the surge, level gauge data and imaging data. The maximum deviation from the predicted TL was 254 cm. The main factor in the Jebi storm surge was the wind effect of the southerly wind on the inner part of Osaka Bay. The outside maximum water level in Fukae Harbor was 336 cm, and was 31 cm higher than the maximum TL. The flooding was produced not only by the overflow caused by the storm surge but also by waves overtopping. If the storm surge had occurred at the maximum TL of the year, flooding would have produced t by the overflow alone.

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