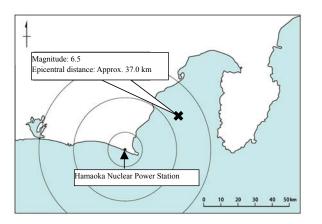
## **Explanatory materials**

## • Suruga Bay Earthquake

Time of occurrence: 5:07 AM, August 11, 2009

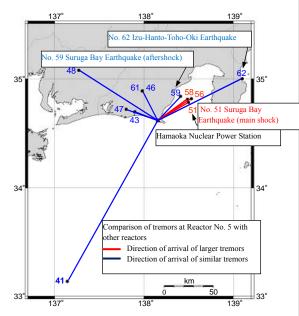
Earthquake data (Japan Meteorological Agency)/Magnitude: 6.5/Epicenter location: North latitude 34 degrees, 47.1 minutes; East longitude 138 degrees, 29.9 minutes/Earthquake focal depth: 23 km/Focal mechanism: Reverse fault-type with a strike-slip component (north-northeast and south-southwest pressure axes)

Distance from Hamaoka Nuclear Power Station/Epicentral distance: 37.0 km/Hypocentral distance: 43.5 km



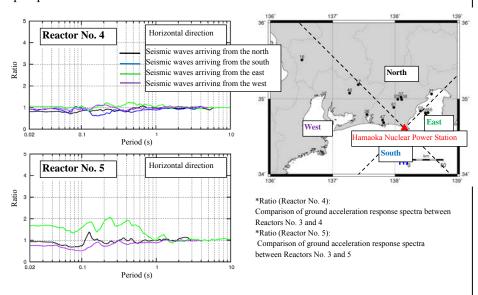
• Tremors at Reactor No. 5 from the perspective of direction of arrival of seismic waves

During the Suruga Bay earthquake (main shock), Reactor No. 5 experienced more intense tremors than other reactors. However, during more distant earthquakes and in response to seismic waves arriving from different directions, the tremors at Reactor No. 5 have been similar to those at other reactors.



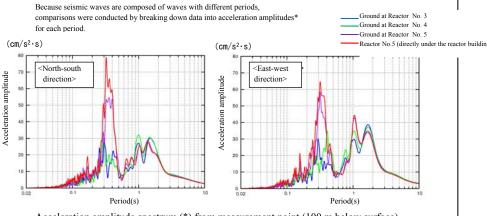
• Tremors at Reactors No. 3-5 from the perspective of direction of arrival of seismic waves

The results of a comparison of ground tremors at Reactors No. 4 and 5 against Reactor No. 3 show that tremors arriving from the east were approximately twice as intense in the case of Reactor No. 5.



### • Vibration characteristics of Suruga Bay earthquake (main shock)

Amplification of the tremors at Reactor No. 5 was also observed in a narrow band close to a period of 0.3-0.5 sec., but from 0.5 sec. and longer the tremors became similar to those recorded at other reactors

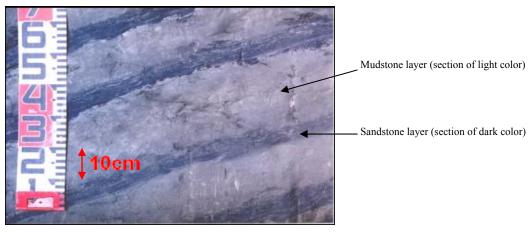


Acceleration amplitude spectrum (\*) from measurement point (100 m below surface)

\*Index expressing strength of seismic waves

# • Sagara layers

Alternating layers of mudstone and sandstone sedimented from the late Miocene Epoch to the early Pliocene Epoch of the Neogene Period (from some tens of millions to some millions of years ago).



Photograph of Sagara layers (close to surface layer)

# • Seismic reflection survey

Vibrations will be induced in the facility and the land and sea areas surrounding the facility, and elastic waves returning from the bottom of the sea and within the ground will be measured to enable study of the sea bottom and the characteristics of the underground geological structure.

### • Standard seismic vibration S<sub>1</sub>, S<sub>2</sub>

Seismic vibrations employed in aseismic design of reactor facilities, based on former guidelines.