

Cruise summary

1. Cruise Information :

(1) Cruise number, Ship name: KY14-07, R/V Kaiyo

(2) Title of the cruise: 2014FY “Research project for compound disaster mitigation on the great earthquakes and tsunamis around the Nankai trough region”

(3) Chief Scientist [Affiliation]: Mikiya YAMASHITA [JAMSTEC]

(4) Representative of Science Party [Affiliation]:
Yoshiyuki KANEDA [JAMSTEC]

(5) Title of proposal:

Research project for compound disaster mitigation on the great earthquakes and tsunamis around the Nankai trough region

(6) Cruise period, Port call:

2014/5/28-6/10, Wakayama Port to Sumijyu Port (Yokosuka)

(7) Research Area: from off Shikoku to off Kii Peninsula

(8) Research Map:

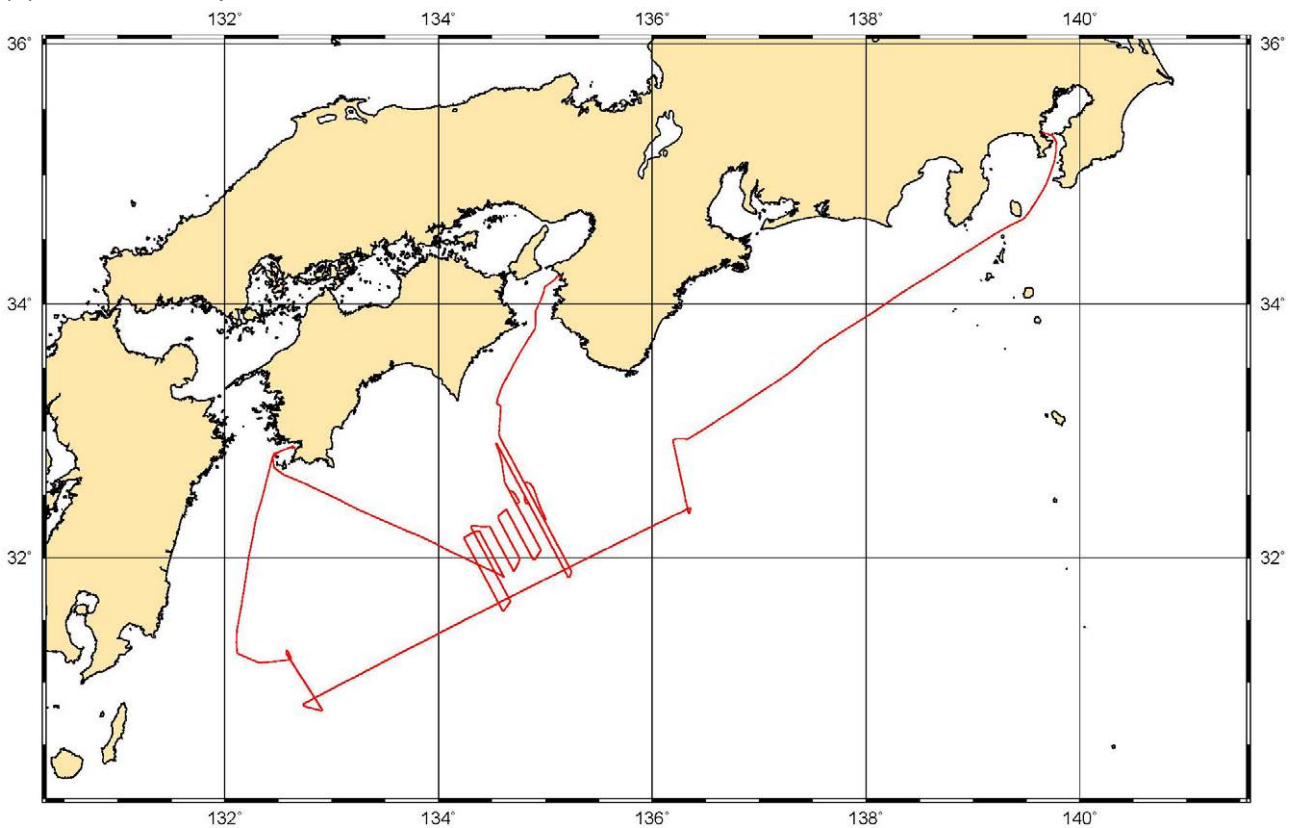


Fig.1 Ship track on KY14-07 cruise.

2. Overview of Observation :

(1) Objectives :

2011 Tohoku earthquake produced large disaster Tsunami by rupture from deep region to trench axis. Recently, drilling results suggests that there is large slip around trough axis in Nankai Trough. Therefore, high resolution multi-channel seismic reflection survey is carried out around the Nankai Trough in order to understand the distribution about the turbidite.

(2) List of observation instruments :

1) Seismic reflection survey

Seismic reflection surveys were carried out on all survey lines off Kochi using the airgun array of 380 cu. inch and a 192-ch. hydrophone streamer.

2) Bathymetry observation

During this cruise, bathymetry data have been recorded continuously by SEABEAM2112.

3) Temperature, Conductivity and Depth observation for oceanic fine imaging in reflection experiment

We have conducted 2 XCTD (eXpendable Conductivity, Temperature and Depth).

(3) Preliminary results

Figure 2 shows the example of onboard seismic profile obtained during KY14-07 cruise.

Fig.2 Onboard seismic reflection profile of line HDNT133

