

New Broad-Band Seismic Network for Imaging the Stagnant Slab beneath the Far Eastern Russia

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In order to image of the stagnant slab of Pacific plate beneath the Far Eastern Russia, new broad-band seismic network is going on installation since 2005 under the collaboration between Japanese Universities and Russian Research Institutes, Russian Academy of Science (RAS). Six IRIS stations are operating in the far-eastern Russia as shown by Black Square in Fig.1. However, there is wide empty area of observation, especially long period seismic observation, in this area. To provide the data for imaging stagnant slab of Pacific plate it is most important matter to establish new and good long-period seismic network in this region. Three local departments of seismological observation team of Geophysical Survey, RAS, have responsibility for seismic monitoring in this area. They are located at Sakhalin, Kamchatka and Magadan and mainly focusing the seismicity in plate boundary. Sakhalin department has several seismic stations equipped short and middle period seismometer and optical recording system in Far Eastern Siberia continent. We started to set up new broad-band seismometer system at these seismic stations from June of 2005. The system consists of STS-2 and L4C seismometers and LS7000SX data logger with 2GB flash memory. All data are saved in this memory and once a month this memory will be changed by operator and send it to each department by post. In 2005, we installed 5 stations marked by dark color hexagon as shown in Fig.1. In 2006, 5 stations marked by light color hexagon will be installed. We will operate this new network at least by the end of 2009. We need permission from Russian Government for the exchange of seismic data. This procedure is now processing and will finish by next March. We will be able to show several seismograms recorded by new stations at the time of the meeting

