As of 19:00, March 21, 2011
Japan Atomic Energy Agency

Situation and response of JAEA to the Earthquake in Northeastern Japan (Outline of activities on March 11-21)

Summary

The Japan Atomic Energy Agency (JAEA) established emergency response headquarters lead by the president immediately after the earthquake in northeastern Japan. The headquarters are continuously collecting detailed information of the equipment and facilities from all the sites of JAEA as well as giving directions to the sites towards recovery. JAEA is also, as a designated public institute, supporting activities of other organizations.

Situation of each site

- Checks of facilities were made immediately after the earthquake of March 11.
- Commercial electric supply was stopped at the sites in Ibaraki Prefecture. There has been no effect on the environment, no fire accident and no serious injury, although there were some damages to facilities and equipment. Necessity minimum facilities were operated based on electric supply from emergency electric generators using heavy oil or other fuel.
- On March 13, commercial electric supply has resumed and facilities are in the process of restart in the Nuclear Science Research Institute and the Nuclear Fuel Cycling Engineering Laboratories. In O-arai R&D Center, commercial electric supply has resumed in the northern half part of the Center on March 13 and in the southern part on March 19 and facilities are in the process of restart. On March 16, commercial electric supply to Naka Fusion Institute has resumed and facilities are in the process of restart.
- On March 11, electric supply to the Aomori R&D Center was stopped. There was no damage to the facility. Commercial electric supply was resumed by March 13.
- There has been no abnormality in any other sites (Horonobe, Takasaki, Tono, the Tsuruga Head Office, Monju, Fugen, Kansai, and Ningyotoge).

Assistance to the Accident of Fukushima No.1 and No. 2 Nuclear Power Plants

- Nuclear Emergency Assistance & Training Center (NEAT) is assisting activities of the Fukushima No.1 and No. 2 Nuclear Power Plants upon request by Ministry of Education, Culture, Sports, Science and Technology (MEXT).
- Experts from JAEA are participating in the emergency advisory group of The Nuclear Safety Commission of Japan.

Situation of each Site

Nuclear Science Research Institute including J-PARC

- Checks of facilities were made immediately after the earthquake of March 11.There

have been no effects on the environment, no fire accident and no serious injury, although there were some damages to facilities and equipment. Necessity minimum facilities were operated based on electric supply from emergency electric generators using heavy oil or other fuel.

- Great gaps between buildings of J-PARC and surrounding ground have occurred. Examination on the accelerators inside the facilities has not been conducted due to lack of electric supply. Restart of the facility may take long time.
- On March 13, commercial electric supply has resumed since around 15 o'clock and electric supply from the ultrahigh voltage transformer station to each facility has completely restored by March 16. Electric power sources for lightings and other purposes were recovered in almost all facilities and fire alarms were recovered in around 80% of facilities.
- On March 15, industrial water supply from Ibaraki Prefecture was received and water supply was restored to the inlet of each facility. Checkups of piping and related equipment are being conducted.
- Due to the damage to the 1st Administration Building, the use of the building was stopped and the on-site emergency headquarters was established in a temporary building in front of the 1st Administration Building.

Nuclear Fuel Cycling Engineering Laboratories

- Checks of facilities were made immediately after the earthquake of March 11. There has been no effect on the environment, no fire accident and no serious injury, although there were some damages to facilities and equipment. Necessity minimum facilities were operated based on electric supply from emergency electric generators.
- On March 13, commercial electric supply has resumed since around 15:30 and all the electric supply was replaced from emergency electric generators to commercial supply by March 14. Other systems, for which soundness of buildings are being conducted, are in the process of restart.
- On March 15, industrial water supply from Ibaraki Prefecture was received and water supply was restored to the reprocessing facility within the same day. Checkups of piping and related equipment of the other facilities are being conducted.
- On March 19, 1 expert of monitoring survey was dispatched to Ibaraki Prefectural Government to participate in the planning of environmental sampling program (monitoring program) of the prefecture.

O-arai Research and Development Center

- Checks of facilities were made immediately after the earthquake of March 11. There has been no effect on the environment, no fire accident and no serious injury, although there were some damages to facilities and equipment. Necessity minimum facilities were operated based on electric supply from emergency electric generators using heavy oil or other fuel.

- Commercial electric supply resumed through transformer station of the northern part of the center at around 20:00 on March 13, all the equipment and facilities have been restored on March 14. The transformer station of the southern part of the center requires repairing work, which is expected to start on or after March 14. Until recovery of the station, necessity minimum facilities operate using emergency electric generators.
- The northern part of the center is receiving public drinking water supply as well as industrial water.
- The center is supporting drinking water supply to the public in Oarai-town from March 18.
- Reinforcement works on the transformer station building of the southern part of the Center were almost finished on March 18. Commercial electric supply was recovered on March 19. Experimental Fast Reactor Joyo has started to receive commercial electric supply and the emergency electric generator has been stopped. Other facilities are in the process of restart.
- On March 20, works for receiving commercial electricity to facilities in southern part of the center is under way.

Naka Fusion Institute

- Checks of facilities were made immediately after the earthquake of March 11. There has been no effect on the environment, no fire accident and no serious injury, although there were some damages to facilities and equipment. Electricity supply was terminated at around 17:30 and the operation of facilities was stopped.
- The monitoring posts resumed operation at around 19:30 on March 12 using emergency electric generators.
- Situation of damages to equipment and facilities were checked on March 13.
- On March 16, commercial electric supply has resumed since around 18:30 and all the electric supply to each facility will be resumed after checkup of equipment.

Aomori Research and Development Center

- Checks of facilities were made immediately after the earthquake of March 11. There has been no damage to the facilities.
- Electric supply was resumed to the Ominato facility on March 12 and the Sekinehama facility on March 13. Electric supply resumed to the Rokkasho facility on March 13. All the facilities are receiving commercial electric supply.

Head Office (Tokai, Ibaraki)

- Some building facilities have been damaged and the building usage has been suspended.
- On March 16, water flow examination was conducted in the Head Office building. Checkups of other equipment and facilities are under way.
- Emergency activities are conducted at the Nuclear Emergency Assistance & Training Center (NEAT).

Other sites

- There has been no trouble in other sites, namely, Horonobe, Takasaki, Tono, Tsuruga Head Office, Monju, Fugen, Kansai, and Ningyotoge
- No abnormality at intakes of sea water at Monju and Fugen.

Assistance to the Accident of Fukushima No.1 and No. 2 Nuclear Power Plants
Nuclear Emergency Assistance & Training Center (NEAT)

- Emergency activities have been conducted in cooperation with the government.
- Experts of environmental radiation monitoring were dispatched to Fukushima No. 1 Nuclear Power Plant upon request from MEXT. The first group of 7 experts departed at 4:30 by a helicopter from Hyakuri airbase and started monitoring work at 10:00 March 12.
- The second group of 9 experts departed with a monitoring car over the land route and started monitoring work on March 13.
- The third group of 12 monitoring experts arrived on March 14 at a building (called Jichikaikan) of Fukushima local government and started its activities using this place as a base.
- The fourth group of 11 experts with 5 vehicles (monitoring 2, mobile whole-body counter 1, body surface contamination counter 1 and body cleansing 1) left NEAT at around 12:30 on March 15 over the land route and started activities in the morning of March 16 based on the Fukushima Jichikaikan.
- On March 15, experts were dispatched to the head office of Fukushima prefectural government to perform radiation dose assessment upon request from Fukushima Prefecture and started activities on March 16.
- On March 16, an expert of radiation assessment made explanation about health influence of radiation at the meeting for evacuees from Fukushima Prefecture in Tsukuba city.
- On March 17, Resident health consultation hotlines were installed.and are responding about 400 inquiries per day.
- The fifth group of 12 experts was dispatched to Fukushima Prefecture on March 18.
- On March 18, two experts were dispatched to the public consultation section installed in Fukushima Prefectural Office.
- On March 19, 1 expert of monitoring survey was dispatched to Ibaraki Prefectural Government to participate in the planning of environmental sampling program (monitoring program) of the prefecture.
- On March 20, the sixth group of 12 experts was dispatched to Fukushima Prefecture.
- On March 21, a whole body counter car was dispatched and started measurement upon request of Tokyo Electric Power Company.

Emergency advisory group of The Nuclear Safety Commission of Japan

- Nine experts of JAEA are participating in the emergency advisory group of The Nuclear Safety Commission of Japan.

- Experts of several Departments of JAEA are also supporting activities.

Attachment

JAEA's Assistance regarding the Fukushima No.1 and No. 2 Nuclear Power Plants

1. Supporting Staff members (as of March 21)

(1) Dispatched members to other organizations

Place	Prime objective	March 21	Accumulated Man-days from March 11
Fukushima Prefecture	Emergency monitoring	11	173
	Contamination survey (Fukushima Prefectural Medical University)	11	99
	Consultation to the Public (Fukushima Jichikaikan)	2	8
	Whole body counting (upon request from TEPCO) (Onahama Call Center)	2	4
	Logistics support (transportation etc.)	6	84
Ibaraki Prefecture	Consultation to the Public (Ibaraki Prefecture)	1	8
	Contamination survey (Hitachi Health Center)	2	26
	Explanation to evacuated residents, etc. (Tsukuba-city Douhou Park)	-	3
	Support of Monitoring Program (Ibaraki Prefecture Emergency Response Headquarters)	-	2
Cabinet Office, Government of Japan	Emergency Response Committee, Nuclear Safety Commission	7	43
	Sub-total (A)	42	450

(2) Activities at Nuclear Emergency Assistance & Training Center (NEAT),etc.

Place	Prime objective	March 21	Accumulated Man-days from March 11
NEAT (Ibaraki)	Direction, Report and Coordination by NEAT	24	309
	Coordination of dispatching experts by Safety Administration Department	8	65
	Environmental Monitoring Cars	2	9
	Whole body countering in NEAT	-	6
	Public consultation at NEAT	21	94
	Assessment and analysis of diffusion	2	18
NEAT (Fukui Branch)	Direction, Report and Coordination by NEAT	3	57
Nuclear Science and Engineering Directorate*	Assessment and analysis of diffusion	4	16
	Sub-total (B)	64	574

Total (A+B)	106	1024

*Experts from other departments of JAEA are also supporting activities.

2. Supporting equipment from JAEA (As of March 21)

Items	Categories	Numbers
Special Mobile Cars	Whole Body Counter Car	1
	Surface Contamination Counter Car	1
	Body Decontamination Car	1
	Monitoring Cars	3
Measurement Devices	Survey Meters	168
	Personal Dosimeters	18