

## Plant Status of Fukushima Daiichi Nuclear Power Station

September 10, 2011  
Tokyo Electric Power Company

### <Draining Water on Underground Floor of Turbine Building (T/B)>

Status of highly concentrated accumulated radioactive water treatment facility and storage tank facility

#### [Treatment Facility]

- 6/17 20:00 Full operation started.
- 6/24 12:00 Treatment started at desalination facilities
- 6/27 16:20 Circulating injection cooling started.
- 8/7 16:11 Evaporative Concentration Facility has started full operation.
- 8/19 19:33 We activated second cesium adsorption facility (System B) and started the treatment of accumulated water by the parallel operation of cesium adsorption instrument and decontamination instrument. At 19:41, the flow rate achieved steady state.
- 9/4 19:44 Considering the current balance between the storage capacity of fresh water and the amount of water injection to reactors, we stopped all of the evaporative concentration apparatuses of water desalination facilities, while desalination (reverse osmosis membrane type) continues.
- 9/8 8:00 Cesium absorption apparatus No.2 at the water treatment facility stopped. As we found out that the cause was erroneous operation, we restarted the apparatus at 12:09 pm. At 12:12 pm, the facility reached rated flow.

#### [Storage Facility]

From June 8, big tanks to store and keep treated or contaminated water have been transferred and installed sequentially.

Accumulated water in vertical shafts of trenches and at basement level of building

Unit	Draining water source → Place transferred	Status
2u	·2u Vertical Shaft of Trench → Central Radioactive Waste Treatment Facility [Process Main Building]	·8/30 9:39 ~ Transferring
3u	· 3u T/B→Central Radioactive Waste Treatment Facility [Process Main Building]	·9/8 9:30 ~ Transferring
6u	·6u Turbine Building → temporary tanks	·9/9 No Transfer

Transfer to:	Status of Water Level (as of 7:00 on 9/10)
Process Main Building	Water level : O.P.+ 4,882mm (Accumulated total increase : 6,099mm) 225 mm increase from 9/9 7:00
Miscellaneous Solid Waste Volume Reduction Treatment Building (High Temperature Incinerator Building)	Water level : O.P.+ 2,053 mm (Accumulated total decrease : 2,779mm) 419 mm increase from 9/9 7:00

Water level at the vertical shaft of the trench and T/B (as of 9/10 7:00)

	Vertical Shaft of Trench (from top of grating to surface)	T/B
1u	O.P. <+850mm (>3,150mm), No change since 9/9 7:00	O.P. +4,920mm, No change since 9/9 7:00
2u	O.P. +2,990mm (1,010mm), 48mm decrease since 9/9 7:00	O.P. +3,046mm, 44mm decrease since 9/9 7:00
3u	O.P. +3,282mm (718mm), No change since 9/9 7:00	O.P. +3,095mm, 60mm decrease since 9/8 7:00
4u	-	O.P. +3,137mm, 29mm decrease since 9/9 7:00

- Water level at Unit 1 R/B: 9/8 7:00\*, O.P. +4,755 mm
- \*After 7:00 on 8 September, relevant data could not be collected because of the camera surveillance did not work by the malfunction of light for water level gauge.

<Monitoring of Radioactive Materials>

Nuclide Analysis of Seawater (Reference)

\*Results of nuclide analysis of seawater, sampled at 4 points of Fukushima Pref. coastal area and 11 points of offshore, are all ND for the 3 major nuclides (iodine-131, cesium-134 and cesium-137).

<Cooling of Spent Fuel Pools> (as of 9/10 11:00)

Unit	Cooling type	Status of cooling	Temperature of water in Pool
1u	Circulating Cooling System	Operating from 8/10 11:22	30.0
2u	Circulating Cooling System	Operating from 5/31 17:21	33.0
3u	Circulating Cooling System	Operating from 6/30 18:33	32.0
4u	Circulating Cooling System	Operating from 7/31 10:08	40

[Unit 4] 8/20 ~ We started operation of desalinating facility of the spent fuel pool.

<Water Injection to Pressure Containment Vessels> (as of 9/8 11:00)

Unit	Status of injecting water	Temp. of feed-water nozzle	Bottom of reactor pressure vessel	Pressure of Primary Containment Vessel
1u	Injecting freshwater (approx. 3.6m <sup>3</sup> /h)	90.6	85.6	126.0 kPaabs
2u	Injecting freshwater (approx. 3.7m <sup>3</sup> /h)	107.6	113.7	120 kPaabs
3u	Injecting freshwater (Feed Water system: approx. 5.0m <sup>3</sup> /h CS system: approx. 2.9 m <sup>3</sup> /h)	106.1	98.0	101.5 kPaabs

[Unit 2] At 10:33 pm on 8 September, we adjusted the rate of water injection from 3.4m<sup>3</sup>/h to 3.8m<sup>3</sup>/h.

[Unit 4] [Unit 5] [Unit 6] No particular changes in parameters.

<Others>

- 4/10 ~ Clearance of outdoor rubbles by remote control to improve working conditions.
  - 6/3 ~ Restoration works of port related facilities has been under operation.
  - 7/12~ Construction work of installing steel pipe sheet pile against water leakage in the water intake channel.
  - 6/28 ~ Main construction work for installing the cover for the reactor building of Unit 1
  - 8/10 Started setting up iron framework of the cover for the reactor building of Unit 1
  - 9/9 Construction of steel erection of cover of reactor building of Unit1 completed.
  - 9/10 Installment of wall panel for cover of reactor building of Unit1 started.
  - 9/9 15:00 Installment of water level gauge and surveillance camera in the underground level of reactor building of Unit 3.
  - 9/10 14:29 RHR (B) of Unit 6 out serviced.
  - 9/10 15:12 RHR (A) of Unit 6 in serviced.
- Cooling of water in the reactor and spent fuel pool will be conducted by using RHR (A) by turn.