

Plant Status of Fukushima Daiichi Nuclear Power Station

August 18, 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.
- 7/2 18:00 We completed installing buffer tanks and resumed circulating injection cooling via buffer tanks.
- 8/1 17:00 Water injection and water flow test of Cesium adsorption Instruments No.2 (SARRY) started.
- 8/7 16:11 Evaporative Concentration Facility, which was additionally installed to Water Treatment Facility to produce fresh water from concentrated seawater generated at Water Desalination Facility, has started full operation.
- 8/16 12:04 We stopped the operation of the water treatment facility and started the test operation of Cesium adsorption Instruments No.2.
- 8/17 10:40 Water leakage from mechanical seal on Concentrated Water Transfer Pump for Evaporative Concentration Apparatus was found and the pump was manually stopped. Water injection to Desalination System, Evaporative Concentration Apparatus and Reactor is continued.
- 8/18 11:28 We injected water from filtered water tank to buffer tank.
- ~ 17:11
- 14:43 We started the operation of the water treatment system
(We started treatment of accumulated water including highly concentrated radioactive materials by cesium adsorption Instrument, 2nd cesium adsorption Instrument and decontamination instrument)
- 15:50 We confirmed flow rate reached normal level ,water treatment facility operated stably and operation status had no problem)

[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]	·8/18 16:19 ~ Transferring is in operation
3u	·3u T/B → Central Radioactive Waste Treatment Facility [Process Main Building]	·8/5 16:46 ~ Transfer stopped
6u	·6u Turbine Building → temporary tanks	·8/18 10:00 ~ 17:00 transferred
	·Temporary tanks → Mega Float	·8/17 No transfer

Transfer to:	Status of Water Level (as of 7:00 on 8/18)
Process Main Building	Water level : O.P.+ 5,332mm (Accumulated total increase : 6,549mm) 109 mm increase from 8/17 7:00
Miscellaneous Solid Waste Volume Reduction Treatment Building (High Temperature Incinerator Building)	Water level : O.P.+ 3,576mm (Accumulated total increase : 4,302mm) 134 mm decrease from 8/17 7:00

- 8/17 8:50 ~ 17:25 Transfer from Miscellaneous Solid Waste Volume Reduction Treatment Building to Process Main Building was resumed.

Water level at the vertical shaft of the trench and T/B (as of 8/18 7:00)

	Vertical Shaft of Trench (from top of grating to surface)	T/B
1u	O.P. <+850mm (>3,150mm), No change since 8/17 7:00	O.P. +4,920mm, No change since 8/17 7:00
2u	O.P. +3,589mm (411mm), 43mm increase since 8/17 7:00	O.P. +3,606mm, 40mm increase since 8/17 7:00
3u	O.P. +3,657mm (343mm), 21mm increase since 8/17 7:00	O.P. +3,570mm, 23mm increase since 8/17 7:00
4u	-	O.P. +3,553mm, 13mm increase since 8/17 7:00

- Water level at Unit 1 R/B: 8/17 7:00, O.P. +4,517 mm, 14mm decrease since 8/17 7:00.

<Monitoring of Radioactive Materials>

Nuclide Analysis of Seawater (Reference)

Sampling Location	Date	Time	Ratio to Criteria (times)		
			Iodine-131	Cesium-134	Cesium-137
North of Discharge Channel of 5-6u of 1F (approx. 30m north of 5-6u discharge channel)	8/17	9:55	ND	ND	0.32

* All the samples collected at 3 points along the coast and 3 points offshore of Fukushima Prefecture on August 17 were all below the detectable threshold.

<Cooling of Spent Fuel Pools> (as of 8/18 11:00)

Unit	Cooling type	Status of cooling	Temperature of water in Pool
1u	Circulating Cooling System	Operating from 8/10 11:22	34.0
2u	Circulating Cooling System	Operating from 5/31 17:21	37.0
3u	Circulating Cooling System	Operating from 6/30 18:33	34.2
4u	Circulating Cooling System	Operating from 7/31 10:08 ¹	47

8/18 11:06 ~ 13:00 We injected hydrazine (approx 2m³) to spent fuel pool of Unit 3 through Circulating cooling line.

<Water Injection to Pressure Containment Vessels> (as of 8/18 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. 3.8m ³ /h)	102.2	92.6	129.2kPaabs
2u	Injecting freshwater (approx. 3.9m ³ /h)	107.9	114.1	119kPaabs
3u	Injecting freshwater (approx. 9.0m ³ /h)	106.1	103.9	101.5kPaabs

[Units 4] [Unit 5] [Units 6] [Common spent fuel pool] No particular changes in parameters.

- 8/18 12:27 We additionally Installed flow regulating valves of water injection line of unit 3. After that, we adjusted the rate of water injection from 9.0m³/h to 8.0m³/h.

<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
- 8/18 14:30 We confirmed the instrument reading of transportable monitoring post installed near main gate of the power station became unreadable
- 16:00 We restored data transfer.

END