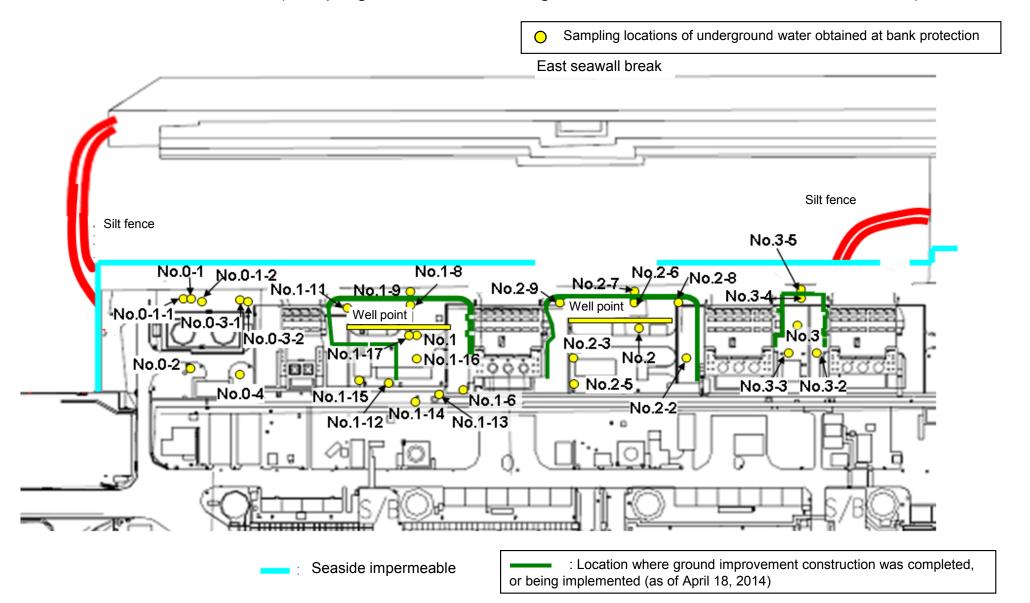
Detailed Analysis Results in the Port of Fukushima Daiichi NPS, around Discharge Channel and Bank Protection (Sampling Locations of Underground Water Obtained at Bank Protection)



Detailed Analysis Results in the Port of Fukushima Daiichi NPS, around Discharge Channel and Bank Protection (1/2) Underground Water Obtained at Bank Protection

Unit: Bq/L (exclude chloride)

		Underground water observation hole No.0-1	Underground water observation hole No.0-1-2	Underground water observation hole No.0-2	Underground water observation hole No.0-3-1	Underground water observation hole No.0-3-2	Underground water observation hole No.0-4	Underground water observation hole No.1	Underground water observation hole No.1-6	Underground water observation hole No.1-8	Underground water observation hole No.1-9 (note)		Underground water observation hole No.1-12	Underground water observation hole No.1-14	Underground	Underground water observation hole No.1-17
	Date of sampling	/	/	/	/	/	/	/	/	/	1	/	/	1	1 /	/
	Time of sampling			/									/	/		
	Chloride (unit: ppm)															
Cs	s-134 (Approx. 2 years)															
Cs	-137 (Approx.30 years)															
The																
other y																
	Gross β															
H	I-3 (Approx. 12 years)															
Sr	-90 (Approx. 29 years)			/											/	
		Groundwater pumped up from	Underground water observation	Underground water observation	Underground	Underground water observation	Underground water observation	Underground water observation	Underground water observation	Groundwater pumped up from the well point	Underground water observation	Underground	Underground	Underground	Underground	
		the well point (between Unit 1 and 2)	hole No.2	hole No.2-2		hole No.2-5 (note)	hole No.2-6	hole No.2-7	hole No.2-8	(between Unit 2 and 3)	hole No.3	water observation hole No.3-2	water observation hole No.3-3	water observation hole No.3-4	water observation hole No.3-5 (note)	
	Date of sampling	(between Unit 1								(between Unit 2						
	Date of sampling Time of sampling	(between Unit 1	hole No.2	hole No.2-2	hole No.2-3 (note)			hole No.2-7	hole No.2-8	(between Unit 2 and 3)						
		(between Unit 1	hole No.2 November 30, 2014	hole No.2-2 November 30, 2014	hole No.2-3 (note) November 30, 2014			hole No.2-7 November 30, 2014	hole No.2-8 November 30, 2014	(between Unit 2 and 3) November 30, 2014						
	Time of sampling	(between Unit 1	November 30, 2014 9:12 AM	November 30, 2014 11:03 AM	November 30, 2014 10:01 AM			November 30, 2014 10:23 AM	November 30, 2014 10:42 AM	(between Unit 2 and 3) November 30, 2014 10:00 AM						
Cs	Time of sampling Chloride (unit: ppm)	(between Unit 1	hole No.2 November 30, 2014 9:12 AM	hole No.2-2 November 30, 2014 11:03 AM	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400	hole No.2-8 November 30, 2014 10:42 AM	(between Unit 2 and 3) November 30, 2014 10:00 AM						
Cs	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44)	hole No.2-2 November 30, 2014 11:03 AM - 2.8	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43)	November 30, 2014 10:42 AM ND(0.41)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43)						
Cs Cs	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44)	hole No.2-2 November 30, 2014 11:03 AM - 2.8	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43)	November 30, 2014 10:42 AM ND(0.41)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43)						
Cs	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44)	hole No.2-2 November 30, 2014 11:03 AM - 2.8	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43)	November 30, 2014 10:42 AM ND(0.41)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43)						
Cs Cs	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44)	hole No.2-2 November 30, 2014 11:03 AM - 2.8	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43)	November 30, 2014 10:42 AM ND(0.41)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43)						
Cs Cs	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44)	hole No.2-2 November 30, 2014 11:03 AM - 2.8	November 30, 2014 10:01 AM —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43)	November 30, 2014 10:42 AM ND(0.41)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43)						
Cs Cs The other y	Time of sampling Chloride (unit: ppm) s-134 (Approx. 2 years) -137 (Approx.30 years)	(between Unit 1	November 30, 2014 9:12 AM - ND(0.44) ND(0.45)	hole No.2-2 November 30, 2014 11:03 AM - 2.8 10	November 30, 2014 10:01 AM — — — —			hole No.2-7 November 30, 2014 10:23 AM 400 ND(0.43) ND(0.64)	November 30, 2014 10:42 AM - ND(0.41) ND(0.44)	(between Unit 2 and 3) November 30, 2014 10:00 AM - ND(0.43) 0.53						

^{*} Data announced this time is provided in a thick-frame. The other data was announced on December 1, 2014.

(Note) As for No. 1-9, 2-5, and 3-5, γ was not measured because they are samlpled by sampler. Gross β were measured after filtation for references.

^{* &}quot;ND" indicates that the measurement result is below the detection limit, and the detection limit of each nuclide is provided in parentheses, except "the other y".

^{* &}quot;-" indicates that the measurement was out of range.

Detailed Analysis Results in the Port of Fukushima Daiichi NPS, around Discharge Channel and Bank Protection (2/2) Underground Water Obtained at Bank Protection

Unit: Bq/L (exclude chloride)

		Underground water observation hole No.0-1		Underground water observation hole No.0-2	Underground water observation hole No.0-3-1	Underground water observation hole No.0-3-2	Underground water observation hole No.0-4	Underground wate observation hole No.1	r Underground water observation hole No.1-6	Underground water observation hole No.1-8		Underground water observation hole No.1-11	Underground water observation hole No.1-12	Underground water observation hole No.1-14		Underground water observation hole No.1-17
	Date of sampling	/	1 /	1 /	1 /	l /	1 /	,	1 /	1	/	/) /	1 /] /	1 /
	Time of sampling					/		/		/						
	Chloride (unit: ppm)															
Cs-	-134 (Approx. 2 years)															
Cs-	-137 (Approx.30 years)															
The																
other y																
,	Gross β															
H	-3 (Approx. 12 years)															
Sr-	90 (Approx. 29 years)		/	/			/		/	/		/		/		

		Groundwater pumped up from the well point (between Unit 1 and 2)	Underground water observation hole No.2	Underground water observation hole No.2-2	Underground water observation hole No.2-3	Underground water observation hole No.2-5 (note)	Underground water observation hole No.2-6	Underground water observation hole No.2-7	Underground water observation hole No.2-8	Groundwater pumped up from the well point (between Unit 2 and 3)	Underground water observation hole No.3*	Underground water observation hole No.3-2	Underground water observation hole No.3-3	Underground water observation hole No.3-4	Underground water observation hole No.3-5(note)
	Date of sampling	/	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014	/	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014	December 03, 2014
	Time of sampling		10:22 AM	12:00 PM	10:56 AM	10:10 AM		11:18 AM	11:36 AM	10:15 AM	10:15 AM	11:20 AM	11:53 AM	10:36 AM	9:40 AM
	Chloride (unit: ppm)		-	-	-	-		600	-	_	-	-	-	_	650
C	Cs-134 (Approx. 2 years)		ND(0.39)	6.1	ND(0.41)	-		ND(0.36)	ND(0.39)	ND(0.41)	-	11	43	5.0	-
С	s-137 (Approx.30 years)		ND(0.54)	12	ND(0.49)	-		0.69	ND(0.44)	0.61	-	33	110	14	-
The															
other y															
	Gross β		150	350	690	4,000		640	2,700	33,000	ND(21)	2,400	3,100	ND(21)	26
	H-3 (Approx. 12 years)		Under analysis	Under analysis	Under analysis	Under analysis		Under analysis	Under analysis	Under analysis	Under analysis	Under analysis	Under analysis	Under analysis	Under analysis
S	r-90 (Approx. 29 years)		-	-	-	-		-	-	-	-	-	-	_	-

^{* &}quot;ND" indicates that the measurement result is below the detection limit, and the detection limit of each nuclide is provided in parentheses, except "the other y".

(Note) As for No. 1-9, 2-5, and 3-5, γ was not measured because they are samlpled by sampler. Gross β were measured after filtation for references.

^{* &}quot;-" indicates that the measurement was out of range.

 $^{^*\}gamma$ was not measured because the water was highly turbid. (Gross β were measured after filtration as references.)

<Reference> The Highest Dose Until the Previous Measurement (Groundwater Obtained at Bank Protection)

u	Init:	Bo	1/

		Groundwater observation hole No.0-1		Groundwater observation hole No.0-1-1		observa	Groundwater observation hole No.0-1-2		dwater tion hole .0-2			Groundwater observation hole No.0-3-2		Groundwater observation hole No.0-4		Groundwater observation hole No.1		Groundwater observation hole No.1-1*		Groundwater observation hole No.1-2*		Groundwater observation hole No.1-3*		Groundwater observation hole No.1-4*		Groundwater observation hole No.1-5*		Groundwater observation hole No.1-6	
C	Cs-134 (Approx. 2 years)	29	<5/25>	ND		0.61	<3/2>	0.61	[10/13]	0.64	<4/6>	1.3	<9/25>	0.70	<6/29>	13	[8/29]	1.9	[7/8]	11,000	[7/9]	10	[9/2]	1.5	[7/8]	310	[8/5]	67,000	<10/17>
С	Cs-137 (Approx.30 years)	78	<5/25>	ND		1.5	<3/2>	2.2	<1/12>	1.1	<4/6>	5.1	<9/25>	1.6	<6/29>	31	[8/29]	3.6	[7/8]	22,000	[7/9]	24	[9/2]	3.6	[7/8]	650	[8/5]	200,000	<10/16>
	Ru-106 (Approx. 370 days)	ND		ND		ND		ND		ND		ND		ND		26	[5/24]	7.9	[7/8]	160	[8/15]	17	[7/22] [8/8]	3.1	[8/8]	ND		ND	
The	Mn-54 (Approx. 310 days)	ND		ND		ND		ND		ND		0.64	<2/20>	ND		ND		1.0	[7/5]	62	[7/5]	ND		ND		ND		700	<10/13>
other \	Co-60 (Approx. 5 years)	ND		ND		ND		ND		ND		ND		ND		0.50	[7/19]	ND		3.1	[7/8]	ND		ND		ND		3,600	<10/13>
	Sb-125 (Approx. 3 years)	ND		ND		ND		ND		ND		ND		ND		1.7	[7/11]	ND		250	[7/15]	1.4	[7/12] [8/26]	ND		12	[8/8]	34	<5/19>
	Gross β	300	[8/29] <5/18>	21	[12/7]	24	<6/22>	87	[10/13]	ND		74	<10/9>	44	<6/22>	1,900	[5/24]	4,400	[7/8]	9,300,000	[7/8]	160,000	[8/12] [8/15]	380	[8/19]	56,000	[8/5]	7,800,000	<10/13>
	H-3 (Approx. 12 years)	45,000	[8/29]	18,000	[12/7]	74,000	[12/15] <1/19>	6,800	<2/16>	ND		76,000	<2/6>	56,000	<2/23>	500,000	[5/24] [6/7]	630,000	[7/8]	430,000	[9/16]	290,000	[7/12]	98,000	[7/11]	72,000	[8/15]	110,000 * 2	<2/6>
	Sr-90(Approx. 29 years)	140	[8/8]	7.9	[12/7]	2.6	[11/10]	0.73	[9/2]	1.5	[11/20]	2.3	[12/6]	ND(0.83)	[10/27]	1,300	[8/22]	2,300	[6/28]	5,000,000	[7/5]	130,000	[8/8]	200	[7/8]	5,100	[8/22]	1,100,000	<8/4> <10/2>

Unit: Bq/L Groundwater pumped up from Groundwater Groundwater observation hole the well point No.1-8 No.1-9 No.1-10 No.1-11 No.1-12 No.1-13 No.1-14 No.1-15 No.1-16 No.1-17 (between Unit 1 No.2 No.2-1 No.2-2 Cs-134 (Approx. 2 years) 47 [11/25] 170 [9/3] 1.1 <1/13> 74 [10/21] 37,000 <2/13> 130 <10/18> ND 30 <7/28> 1.4 <7/7> 920 <11/13> 0.88 <2/26> 0.66 [9/1] 15 <2/12> [8/29] Cs-137 (Approx.30 years) 110 [11/25] [9/3] 3.4 <4/28> [10/21] <7/10> <11/13> <2/12> 380 170 93,000 <2/13> 390 <10/20> 0.88 86 <7/28> 3.0 <9/29> 3,000 2.5 <2/26> 1.1 38 <4/21> Ru-106 (Approx. 370 days 5.4 [10/28] ND ND 9.2 [10/28] 5.5 25 [9/2] ND ND Mn-54 (Approx. 310 days 12 <2/3> ND ND ND ND 3.8 <12/1> ND 11 <8/25> ND 110 <11/13 ND ND ND The other Co-60 (Approx. 5 years) 1.3 <2/3> ND [10/24] ND 0.44 <5/29> 0.9 [11/7] 0.61 [11/25] 3.0 <11/24> ND ND 0.51 Sb-125 (Approx. 3 years) ND ND ND 61 [10/21] ND ND ND 24 <6/16> 2 1 [11/25] ND ND ND ND <11/20> (1/20) * 2 2.100 78^{* 2} Gross B 59,000 (2/3) [11/17] <1/27> 2.300 [12/26] 1,100 <5/5> 260,000 31,000 <7/10> 3,100,000 <1/30> ,200,000 <10/9> 3,200,000 <11/13> 1,700 [7/8] 380 [7/29] <4/16> <11/24> 110 600 <2/13> <12/1> <2/3> <10/13> H-3 (Approx. 12 years) 45,000 <11/24> 860 [11/14] 270,000 <1/27> 85.000 [9/13] 440,000 [10/31] 88,000 <2/12> 23.000 <2/13> 74.000 <7/10> 43.000 [9/26] 160,000 <10/16> 460,000 [8/19] 1.000 <2/23> 440 [8/26] 660 <1/8> <11/3> Under Sr-90(Approx. 29 years) 35,000 <2/17> 300 [10/3] 170 <8/4> 290 [10/21] 160,000 <2/12> 28,000 <10/2> 2,700,000 <2/13> 990,000 <10/2> 54 [5/31] 5.9 [7/25] 320 [12/25]

																											Unit: Bq/L
			Groundwater observation hole No.2-3		Groundwater observation hole No.2-5		Groundwater observation hole No.2-6		Groundwater observation hole No.2-7		Groundwater observation hole No.2-8		Groundwater observation hole No.2-9		Groundwater pumped up from the well point (between Unit 2 and 3)		Groundwater observation hole No.3		Groundwater observation hole No.3-1		Groundwater observation hole No.3-2		Groundwater observation hole No.3-3		ndwater ation hole 5.3-4	observa	idwater ition hole .3-5
C	s-134 (Approx. 2 years)	2.2	<2/26>	41	<5/7>	17	<3/11>	3.5	<2/23>	1.3	<7/20>	ND		2.2	<9/7>	3.5	[7/25]	1.2	[7/25] [8/8]	23	<8/27>	180	<7/2>	5.1	<7/23>	100	<7/30>
С	s-137 (Approx.30 years)	5.5	<2/26>	110	<5/7>	50	<3/11>	9.0	<2/23>	3.4	<7/20>	0.58*2	<2/11>	5.7	<9/7>	5.9	[8/8]	2.6	[8/1]	68	<9/3>	500	<7/2>	16	<8/27>	310	<7/30>
	Ru-106 (Approx. 370 days)	ND		ND		ND		ND		ND		6.5*2	<2/11>	ND		ND		ND		ND		ND		ND		-	
The	Mn-54 (Approx. 310 days)	0.29	[12/6]	0.95	<6/4>	ND		ND		ND		ND		ND		ND		ND		ND		ND		0.54	[10/30]	-	
other y	Co-60 (Approx. 5 years)	ND		ND		ND		ND		ND		ND		ND		ND		ND		ND		ND		ND		1	
	Sb-125 (Approx. 3 years)	ND		74	<5/7>	ND		ND		ND		ND		ND		1.6	<1/1>	ND		ND		ND		ND		-	
	Gross β	1,500	[12/6] <1/8>	150,000	<2/12>	3,200	[12/5] <11/6>	1,300	<6/20>	5,800	<7/23>	1,700	<2/7>	240,000	[12/12]	1,400	[7/11]	180	[8/1]	3,100	<8/20> <8/28>	8,900	<7/2>	46	<8/13>	510	<7/16>
	H-3 (Approx. 12 years)		[12/6]	7,900	<4/9>	1,900	<8/10>	1,100	<1/19>	1,700	<4/6> <8/6> <8/13>	*2 13,000	<2/7> <2/11>	13,000	<10/19> <10/26> <10/29>	3,200	[2012. 12/12]	460	[8/1]	3,700	<7/9>	8,000	<5/7>	170	[9/18]	170	<1/8>
5	Sr-90(Approx. 29 years)	1,200	[12/6]	34,000	<5/7>	Under analysis		ND(1.4)	[11/21]	3,900	<3/30>	1,200 * 2	<2/11>	-		8.3	[2012. 12/12]	4.4	[7/23]	2000	<4/18>	3,600	<4/30>	ND		200	<5/28>

Since some samples are still under analysis, the highest dose of the Strontium-90 is among those previously announced.

^{*1} Analysis result of pumped water.

^{*2} The results are for reference, since the water was highly turbid. (γ and Gross β were measured after filtration.)

^{* &}quot;ND" indicates that the measurement result is below the detection limit.

^{*} Date of sampling is provided in parentheses. []: 2013, < >: 2014

^{* &}quot;*" is provided next to the name of the holes where the sampling could not be performed due to the chemical injection of ground improvement.

⁽Note) As for No. 1-9, 2-5, and 3-5, since September 17, γ was not measured because they are samlpled by sampler. Gross β were measured after filtration for reference.