

FY2012 Gunma Prefecture Survey Results

[Survey Results]

Radioactive iodine was not detectable at any of the locations tested.

Water Quality

Rivers

Radioactive cesium (Cs-134, Cs-137): Not detectable at any location

Lakes and headwaters

Cs-134: ND-0.81Bq/L

Cs-137: ND-1.0Bq/L

Sediment

Rivers

Cs-134: ND-580Bq/kg (dried mud)

Cs-137: ND-980Bq/kg (dried mud)

Lakes and headwaters

Cs-134: ND-1,600Bq/kg (dried mud)

Cs-137: 16-2,500Bq/kg (dried mud)

Surrounding Environment

(1) Soil

Rivers

Cs-134: ND -3,500Bq/kg (dry)

Cs-137: 7.7 -5,800Bq/kg (dry)

Lakes and headwaters

Cs-134: 25 -2,500Bq/kg (dry)

Cs-137: 61 -4,100Bq/kg (dry)

(2) Spatial dose

Rivers 0.04-0.39 μ Sv/h

Lakes and headwaters 0.04-0.35 μ Sv/h

Table 4.6.1.1 Gunma Pref. River (Water Quality)

Sampling point				Sampling date	Weather	Air temperature ℃	Full depth m	Water quality										Remarks	
No.	Water body	Point	Municipality					General items						Radioactive material concentration (Bq/L)					
								Water temperature	Sampling depth m	Color	Odor	Transparency cm	Electrical conductivity	SS mg/L	Turbidity	Radioactive iodine I-131	Radioactive cesium Cs-134		Radioactive cesium Cs-137
R i v e r s	T o n e g a w a R i v e r	Hirosebaishi Bridge	Minakamimachi Town	2012/05/30	Sunny	20.0	1.4	8.3	0.0	None	>100	2.9	<1	0.6	<0.57	<0.61	<0.69		
				2012/09/10	Sunny	22.3	1.5	14.8	0.0	Light grayish yellowish green	None	>100	4.1	<1	0.8	<0.55	<0.56	<0.50	
				2012/11/29	Cloudy	1.3	0.3	5.2	0.0	Greenish yellowish white	None	>100	6.1	9.8	3.0	<0.53	<0.66	<0.68	
				2013/01/29	Snow	-1.0	0.6	3.0	0.0	Light grayish yellow green	None	>100	4.1	<1	0.9	<0.43	<0.48	<0.63	
				2012/05/30	Sunny	23.0	0.6	10.2	0.0	Grayish yellowish green	None	>100	45	3.5	1.0	0.9	<0.41	<0.53	<0.60
				2012/07/10	Sunny	29.0	0.7	14.4	0.0	Yellow reddish gray	None	>100	58	3.6	<1	0.4	<0.62	<0.80	<0.85
		Tsukiyonobashi Bridge	Minakamimachi Town	2012/08/07	Sunny	24.0	0.3	14.7	0.0	Colorless transparent	None	>100	86	6.4	<1	0.3	<0.50	<0.58	<0.60
				2012/08/29	Sunny	30.8	0.3	15.5	0.0	Grayish yellow green	None	>100	65	3.4	<1	0.8	<0.48	<0.58	<0.52
				2012/09/27	Sunny	24.1	0.3	20.8	0.0	Light grayish yellow green	None	>100	9.3	<1	0.3	<0.54	<0.70	<0.66	
				2012/11/27	Cloudy	4.7	0.4	7.4	0.0	Greenish yellowish white	None	>100	5.9	<1	0.7	<0.63	<0.60	<0.54	
				2013/01/22	Sunny	3.9	0.3	4.0	0.0	Greenish yellowish white	None	>100	3.8	<1	1.4	<0.46	<0.61	<0.59	
				2012/05/30	Sunny	24.0	0.5	12.4	0.0	Light grayish yellowish green	None	>100	6.1	<1	0.3	<0.73	<0.66	<0.51	
	Akiyagawa River	Kosodebashi Bridge	Kawabamura Village	2012/09/10	Sunny	24.4	0.5	24.6	0.0	Grayish yellowish green	None	>100	80	19.6	<1	0.2	<0.54	<0.50	<0.62
				2012/11/27	Snow	6.1	0.4	9.9	0.0	Greenish yellowish white	None	>100	9.8	<1	1.2	<0.50	<0.60	<0.52	
				2013/01/22	Sunny	7.5	0.3	4.9	0.0	Colorless transparent	None	>100	22.9	<1	1.1	<0.58	<0.74	<0.55	
				2012/05/30	Sunny	21.0	0.4	13.1	0.0	Light grayish yellow green	None	>100	5.0	1.4	0.6	<0.53	<0.68	<0.60	
				2012/07/09	Sunny	23.3	0.6	14.1	0.0	Yellow greenish white	None	>100	4.8	2.4	0.4	<0.40	<0.65	<0.54	
				2012/08/07	Sunny	27.5	0.3	17.9	0.0	Colorless transparent	None	>100	9.0	2.1	0.5	<0.58	<0.78	<0.70	
	Sakuragawa River	In Oaza Yachi	Kawabamura Village	2012/08/29	Sunny	26.9	0.4	18.8	0.0	Yellow greenish white	None	>100	6.5	<1	0.2	<0.53	<0.56	<0.60	
				2012/09/27	Cloudy	22.7	0.2	16.1	0.0	Greenish yellowish white	None	>100	6.7	<1	0.3	<0.43	<0.67	<0.57	
				2012/11/27	Snow	2.6	0.3	5.9	0.0	Colorless transparent	None	>100	7.2	<1	0.1	<0.50	<0.44	<0.63	
				2013/01/29	Sunny	1.4	0.3	3.4	0.0	Light grayish greenish yellow	None	>100	8.2	1.1	0.4	<0.48	<0.58	<0.56	
				2012/05/30	Sunny	19.0	0.1	11.2	0.0	Light grayish yellow green	None	>100	3.7	2.5	0.5	<0.57	<0.79	<0.59	
				2012/09/10	Sunny	30.4	0.2	19.5	0.0	Colorless transparent	None	>100	8.6	<1	<0.1	<0.46	<0.72	<0.52	
K a t a s h i n a g a w a R i v e r	Kiritokubashi Bridge	Katashinamura Village	2012/11/27	Snow	5.0	0.6	4.2	0.0	Greenish yellowish white	None	>100	6.5	<1	0.2	<0.51	<0.68	<0.62		
			2013/01/29	Sunny	-2.3	0.3	2.7	0.0	Colorless transparent	None	>100	6.7	<1	0.2	<0.65	<0.72	<0.58		
			2012/05/31	Sunny	18.9	0.6	11.9	0.0	Light grayish yellow green	None	>100	6.4	<1	0.6	<0.48	<0.44	<0.56		
			2012/07/10	Sunny	28.0	0.4	14.8	0.0	Yellow greenish white	None	>100	87	1.6	0.2	<0.54	<0.72	<0.53		
			2012/08/07	Sunny	32.0	0.4	20.7	0.0	Colorless transparent	None	>100	13.8	<1	1.3	<0.44	<0.61	<0.54		
			2012/08/29	Sunny	26.3	0.1	21.3	0.0	Yellow greenish black	None	>100	9.4	<1	0.3	<0.65	<0.72	<0.68		
	Tonemachitakatoya	Numata City	2012/09/28	Sunny	21.0	1.3	15.8	0.0	Light grayish yellow green	None	>100	10.4	<1	0.4	<0.55	<0.66	<0.53		
			2012/11/27	Sunny	8.0	0.5	6.4	0.0	Greenish yellowish white	None	>100	10.5	<1	0.4	<0.52	<0.64	<0.65		
			2013/01/22	Sunny	1.4	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground	
			2012/05/29	Sunny	26.0	2.1	13.7	0.0	Dark blue green	None	>100	8.1	1.0	0.7	<0.61	<0.63	<0.66		
			2012/07/10	Sunny	30.0	1.2	16.7	0.0	Yellow greenish pale gray	None	>100	27	6.9	7.0	2.3	<0.65	<0.80	<0.76	
			2012/08/07	Sunny	32.3	1.0	24.4	0.0	Greenish yellowish white	None	>100	79	12.3	2.4	1.0	<0.66	<0.80	<0.64	
Futaebashi Bridge	Numata City	2012/08/29	Sunny	32.0	1.0	24.9	0.0	Yellow greenish white	None	>100	12.1	<1	1.0	<0.46	<0.53	<0.67			
		2012/09/28	Sunny	22.4	0.8	18.0	0.0	Greenish white	None	>100	13.4	<1	0.7	<0.65	<0.75	<0.68			
		2012/11/28	Cloudy	3.7	0.4	7.4	0.0	Greenish yellowish white	None	>100	13.8	1.9	1.1	<0.50	<0.65	<0.56			
		2013/01/23	Cloudy	5.3	0.3	5.1	0.0	Dark grayish greenish yellow	None	>100	16.2	<1	0.9	<0.58	<0.60	<0.54			
		2012/05/29	Cloudy	14.5	0.5	14.2	0.0	Deep Greenish yellow	None	>100	28	21.5	14	6.9	<0.46	<0.56	<0.60		
		2012/08/30	Sunny	22.9	0.5	20.9	0.0	Grayish reddish yellow	None	>100	30	21.0	18	5.7	<0.46	<0.48	<0.49		
Agiatsumagawa River	Shintobashi Bridge	Naganoharumachi Town	2012/11/28	Sunny	0.3	0.3	3.5	0.0	Greenish yellowish white	None	>100	45	24.9	6.4	8.4	<0.61	<0.70	<0.62	
			2013/01/23	Sunny	-0.1	0.8	3.5	0.0	Dark grayish greenish yellow	None	>100	32	27.2	15	11	<0.58	<0.72	<0.56	
			2012/06/11	Cloudy	17.0	1.5	15.4	0.0	Light grayish bluish green	None	>100	14.3	1.2	0.9	<0.67	<0.83	<0.64		
			2012/09/27	Sunny	17.5	1.0	16.6	0.0	Light grayish yellow green	None	>100	18.1	<1	0.3	<0.51	<0.61	<0.68		
			2012/11/28	Sunny	4.8	1.0	5.7	0.0	Greenish yellowish white	None	>100	79	43.9	3.2	3.0	<0.46	<0.56	<0.37	
			2013/01/23	Sunny	2.8	1.3	4.1	0.0	Greenish yellowish white	None	>100	18.2	<1	0.4	<0.46	<0.56	<0.52		
Sirasunagawa River	Shuttatsubashi Bridge	Nakanomachi Town	2012/06/11	Cloudy	17.0	1.5	15.4	0.0	Light grayish bluish green	None	>100	14.3	1.2	0.9	<0.67	<0.83	<0.64		
			2012/09/27	Sunny	17.5	1.0	16.6	0.0	Light grayish yellow green	None	>100	18.1	<1	0.3	<0.51	<0.61	<0.68		
			2012/11/28	Sunny	4.8	1.0	5.7	0.0	Greenish yellowish white	None	>100	79	43.9	3.2	3.0	<0.46	<0.56	<0.37	
2013/01/23	Sunny	2.8	1.3	4.1	0.0	Greenish yellowish white	None	>100	18.2	<1	0.4	<0.46	<0.56	<0.52					

Table 4.6.1.1 Gunma Pref. River (Water Quality)

No.	Sampling point				Sampling date	Weather	Air temperature ℃	Full depth m	Water quality										Remarks
	Water body	Point	Municipality	General items						Radioactive material concentration (Bq/L)									
				Water temperature					Sampling depth m	Color	Odor	Transparency cm	Electrical conductivity	SS mg/L	Turbidity	Radioactive iodine I-131	Radioactive cesium Cs-134	Radioactive cesium Cs-137	
10	Agatsumagawa River	Downstream of Azumabashi Bridge	Higashigatsunamachi Town	2012/05/30	Sunny	17.5	0.5	16.7	0.0	Dark grayish yellow green	None	24	28.0	15	6.7	<0.64	<0.87	<0.60	
				2012/07/10	Sunny	28.0	0.2	20.9	0.0	Yellowish white	None	40	16.2	10	2.7	<0.60	<0.50	<0.53	
				2012/08/07	Sunny	32.3	0.2	24.8	0.0	Colorless transparent	None	>100	20.3	1.0	0.6	<0.56	<0.70	<0.60	
				2012/08/30	Sunny	25.2	0.2	25.2	0.0	Yellowish white	None	>100	21.9	<1	0.7	<0.58	<0.80	<0.71	
				2012/09/27	Sunny	28.2	0.3	18.2	0.0	Grayish yellow green	None	45	31.7	11	4.9	<0.64	<0.70	<0.66	
				2012/11/28	Sunny	9.1	0.3	7.2	0.0	Greenish yellowish white	None	28	24.9	17	11	<0.65	<0.75	<0.60	
11	Nakatagawa River	Tonodabashi Bridge	Takayamamura Village	2013/01/23	Sunny	5.0	0.3	5.5	0.0	Greenish yellowish white	None	74	37.4	4.5	4.8	<0.65	<0.78	<0.68	
				2012/06/15	Sunny	23.0	0.2	16.6	0.0	Grayish yellow green	None	>100	10.3	2.4	1.0	<0.60	<0.68	<0.58	
				2012/09/11	Sunny	28.3	0.3	21.1	0.0	Light grayish greenish yellow	None	>100	12.0	1.1	0.3	<0.57	<0.61	<0.57	
12	Agatsumagawa River	Agatsumabashi Bridge	Shibukawashi City	2012/11/28	Sunny	5.5	0.4	7.4	0.0	Greenish yellowish white	None	73	14.0	<1	0.4	<0.56	<0.53	<0.47	
				2013/01/29	Sunny	4.5	0.3	3.8	0.0	Light grayish yellow green	None	>100	14.3	<1	0.6	<0.50	<0.51	<0.52	
				2012/05/29	Cloudy	25.5	0.5	19.2	0.0	Dark grayish green	None	52	18.7	2.7	1.8	<0.46	<0.44	<0.59	
				2012/06/27	Sunny	28.0	0.4	20.0	0.0	Grayish yellowish green	None	80	18.5	4.2	1.8	<0.46	<0.67	<0.64	
				2012/07/17	Sunny	34.5	0.2	26.0	0.0	Yellowish white	None	62	19.0	4.4	2.5	<0.47	<0.59	<0.53	
				2012/08/08	Sunny	25.2	0.3	25.0	0.0	Colorless transparent	None	>100	19.1	<1	0.6	<0.64	<0.72	<0.82	
13	Tonegawa River	Tashobashi Bridge	Shibukawashi City	2012/08/29	Sunny	27.2	0.4	27.1	0.0	Yellow greenish white	None	>100	19.3	<1	0.7	<0.55	<0.56	<0.57	
				2012/11/29	Sunny	11.2	0.7	6.2	0.0	Greenish yellowish white	None	25	35.2	19	12	<0.45	<0.58	<0.57	
				2013/01/24	Sunny	1.8	0.3	4.5	0.0	Greenish yellowish white	None	42	33.3	9.6	7.9	<0.70	<0.70	<0.58	
				2012/05/29	Cloudy	28.0	1.4	12.8	0.0	Dark grayish blue green	None	>100	5.0	<1	0.5	<0.47	<0.68	<0.65	
				2012/06/26	Sunny	24.0	0.2	16.0	0.0	Yellow greenish white	None	65	6.1	2.1	1.3	<0.56	<0.59	<0.62	
				2012/07/17	Cloudy	27.0	0.9	21.8	0.0	Greenish yellowish white	None	87	8.0	2.6	1.1	<0.44	<0.56	<0.47	
14	Takizawagawa River	Shintakizawabashi Bridge	Shibukawashi City/Yoshiokamachi Town	2012/08/08	Sunny	29.7	0.5	18.5	0.0	Yellow greenish white	None	>100	8.6	<1	0.2	<0.44	<0.64	<0.65	
				2012/08/31	Cloudy	24.8	0.3	20.4	0.0	Yellow greenish white	None	83	8.6	<1	0.5	<0.49	<0.53	<0.49	
				2012/11/29	Cloudy	16.6	0.5	7.3	0.0	Greenish yellowish white	None	>100	14.9	1.0	1.1	<0.52	<0.66	<0.64	
				2013/01/24	Sunny	1.4	0.7	4.4	0.0	Greenish yellowish white	None	>100	11.9	2.3	1.5	<0.48	<0.58	<0.59	
				2012/06/07	Sunny	19.0	0.2	21.7	0.0	Yellow greenish pale gray	None	93	21.9	3.7	1.8	<0.48	<0.67	<0.52	
				2012/09/12	Sunny	24.2	0.2	22.7	0.0	Colorless transparent	None	97	20.5	1.9	0.5	<0.51	<0.70	<0.65	
15	Tonegawa River	Gummadashi Bridge	Maebashishi City	2012/11/30	Cloudy	9.1	0.2	10.5	0.0	Yellowish white	None	60	25.9	6.2	3.5	<0.51	<0.64	<0.60	
				2013/01/24	Sunny	9.3	0.3	8.8	0.0	Greenish yellowish white	None	>100	29.5	2.7	1.7	<0.47	<0.76	<0.57	
				2012/06/07	Sunny	26.3	0.1	15.6	0.0	Light grayish yellow green	None	91	11.3	2.8	1.2	<0.53	<0.74	<0.47	
				2012/09/11	Cloudy	31.2	0.5	23.3	0.0	Grayish green	None	48	17.8	3.2	0.8	<0.68	<0.75	<0.64	
				2012/12/06	Cloudy	11.1	0.3	8.1	0.0	Light grayish yellow green	None	81	22.5	3.7	3.6	<0.55	<0.59	<0.62	
				2013/01/24	Sunny	10.1	0.7	6.5	0.0	Greenish yellowish white	None	48	22.4	7.1	3.9	<0.68	<0.80	<0.76	
16	Tonegawa River	Fukushimaishi Bridge	Tanamuramachi Town	2012/06/07	Cloudy	29.0	0.3	16.6	0.0	Yellow greenish white	None	90	11.7	3.4	1.6	<0.65	<0.78	<0.68	
				2012/09/13	Sunny	35.7	0.2	24.7	0.0	Light grayish yellow green	None	50	22.5	3.8	1.0	<0.48	<0.65	<0.54	
				2012/12/05	Cloudy	11.6	0.3	8.0	0.0	Light grayish yellow green	None	>100	24.4	2.3	1.5	<0.65	<0.80	<0.66	
				2013/01/24	Sunny	12.2	0.3	7.1	0.0	Greenish yellowish white	None	50	27.4	7.6	4.1	<0.44	<0.61	<0.52	
				2012/06/06	Cloudy	23.0	0.4	16.1	0.0	Yellow greenish pale gray	None	>100	11.4	2.9	1.2	<0.50	<0.56	<0.67	
				2012/09/11	Cloudy	27.7	0.3	20.6	0.0	Light grayish yellow	None	89	11.7	<1	0.3	<0.57	<0.66	<0.65	
17	Karasugawa River	Kamigondabashi Bridge	Takasakishi City	2012/12/04	Cloudy, partly sunny	8.1	0.3	10.3	0.0	Colorless transparent	None	>100	12.4	<1	0.6	<0.50	<0.61	<0.62	
				2013/01/23	Sunny	3.1	0.3	6.0	0.0	Yellowish white	None	>100	14.0	<1	0.8	<0.45	<0.50	<0.59	
				2012/06/06	Cloudy	22.0	0.2	16.6	0.0	Light grayish yellow green	None	>100	10.9	2.5	0.8	<0.53	<0.64	<0.59	
				2012/09/11	Cloudy	27.6	0.4	23.2	0.0	Light grayish yellow green	None	>100	11.2	<1	0.2	<0.62	<0.67	<0.62	
				2012/12/04	Sunny	6.3	0.5	9.7	0.0	Grayish yellow green	None	>100	12.3	<1	0.4	<0.49	<0.58	<0.57	
				2013/01/23	Sunny	4.8	0.5	5.2	0.0	Yellow greenish white	None	>100	15.0	<1	0.6	<0.55	<0.56	<0.53	
18	Karasugawa River	Karasugawabashi Bridge	Annakashi City	2012/06/06	Rain	18.5	0.2	16.8	0.0	Yellow greenish pale gray	None	62	13.1	2.9	1.1	<0.65	<0.70	<0.71	
				2012/09/06	Cloudy	29.4	0.3	23.4	0.0	Yellow greenish white	None	>100	16.8	<1	0.6	<0.48	<0.59	<0.55	
				2012/12/09	Cloudy	4.1	0.2	5.9	0.0	Light grayish yellow green	None	>100	21.7	1.2	0.6	<0.73	<0.98	<0.75	
				2013/01/31	Sunny	3.8	0.4	6.9	0.0	Light grayish yellow green	None	>100	20.6	1.2	1.0	<0.51	<0.64	<0.59	
19	Usuigawa River	Nakasebashi Bridge	Annakashi City	2012/06/06	Rain	18.5	0.2	16.8	0.0	Yellow greenish pale gray	None	62	13.1	2.9	1.1	<0.65	<0.70	<0.71	
				2012/09/06	Cloudy	29.4	0.3	23.4	0.0	Yellow greenish white	None	>100	16.8	<1	0.6	<0.48	<0.59	<0.55	
				2012/12/09	Cloudy	4.1	0.2	5.9	0.0	Light grayish yellow green	None	>100	21.7	1.2	0.6	<0.73	<0.98	<0.75	
				2013/01/31	Sunny	3.8	0.4	6.9	0.0	Light grayish yellow green	None	>100	20.6	1.2	1.0	<0.51	<0.64	<0.59	

Table 4.6.1.1 Gunma Pref. River (Water Quality)

Sampling point				Sampling date	Weather	Air temperature ℃	Full depth m	Water quality										Remarks
No.	Water body	Point	Municipality					General items						Radioactive material concentration (Bq/L)				
								Water temperature	Sampling depth m	Color	Odor	Transparency cm	Electrical conductivity	SS mg/L	Turbidity	Radioactive iodine I-131	Radioactive cesium Cs-134	
20	Unigawa River	Hanatakahashi Bridge	Takasakishi City	2012/06/06	Cloudy	21.8	0.2	19.5	0.0	Grayish yellow green	None	66	27.1	6.2	2.0	<0.47	<0.60	<0.56
				2012/09/19	Cloudy	24.0	0.2	25.6	0.0	Grayish yellow green	None	>100	30.8	2.1	0.8	<0.48	<0.61	<0.57
				2012/12/05	Sunny	6.3	0.3	6.2	0.0	Grayish yellow green	None	>100	42.3	1.8	1.0	<0.46	<0.51	<0.57
21	Kaburagawa River	Tadokawabashi Bridge	Shimonitama Town	2013/01/23	Sunny	7.7	0.7	5.1	0.0	Dark grayish yellow green	None	>100	78.8	1.2	1.5	<0.54	<0.78	<0.58
				2012/06/04	Sunny	27.5	0.3	22.2	0.0	Grayish yellow green	None	>100	21.5	1.9	1.3	<0.55	<0.66	<0.53
				2012/09/19	Cloudy	24.3	0.5	22.6	0.0	Yellow greenish pale gray	None	>100	23.7	<1	0.4	<0.56	<0.64	<0.59
22	Kaburagawa River	Kaburagawabashi Bridge	Takasakishi City/Fujiokashi City	2012/12/13	Sunny	5.8	0.7	2.7	0.0	Grayish yellow green	None	>100	40.7	<1	0.5	<0.66	<0.66	<0.60
				2013/01/31	Sunny	5.9	0.4	6.2	0.0	Colorless transparent	None	>100	42.4	<1	0.8	<0.65	<0.66	<0.51
				2012/06/05	Cloudy	23.0	0.3	22.2	0.0	Dark grayish yellow green	None	83	27.6	4.7	2.6	<0.55	<0.70	<0.47
23	Ogawa River	Kinzabashi Bridge	Kanramachi Town	2012/09/26	Sunny	27.1	0.5	21.7	0.0	Light grayish yellow green	None	88	25.6	3.9	1.6	<0.48	<0.76	<0.56
				2012/12/05	Sunny	9.4	0.7	7.0	0.0	Light grayish greenish yellow	None	>100	39.9	1.2	1.0	<0.56	<0.56	<0.57
				2013/01/23	Cloudy	5.8	0.5	5.8	0.0	Yellowish white	None	>100	49.0	2.0	1.6	<0.50	<0.72	<0.47
24	Nanmokuogawa River	Ozawabashi Bridge	Nanmokuura Village	2012/06/13	Cloudy	20.5	0.3	16.5	0.0	Yellowish pale gray	None	>100	16.5	<1	0.9	<0.63	<0.72	<0.73
				2012/09/12	Sunny	23.9	0.2	21.3	0.0	Colorless transparent	None	>100	15.1	2.1	0.2	<0.61	<0.70	<0.76
				2012/12/13	Sunny	3.6	0.2	6.5	0.0	Yellow greenish white	None	>100	24.3	<1	0.2	<0.54	<0.61	<0.59
25	Someyagawa River	Yakushibashi Bridge	Shintomura Village	2013/01/31	Sunny	7.5	0.2	8.9	0.0	Light grayish yellow green	None	>100	22.9	<1	0.6	<0.66	<0.78	<0.88
				2012/06/13	Cloudy	20.5	0.3	16.3	0.0	Greenish yellowish white	None	>100	12.9	<1	1.0	<0.47	<0.65	<0.54
				2012/09/12	Sunny	28.1	0.2	23.1	0.0	Colorless transparent	None	>100	15.9	<1	0.1	<0.49	<0.50	<0.62
26	Inogawa River	Kamakurabashi Bridge	Takasakishi City	2012/12/13	Sunny	6.4	0.3	3.0	0.0	Light grayish yellow green	None	>100	29.6	<1	0.6	<0.46	<0.63	<0.47
				2013/01/31	Sunny	5.9	0.4	2.4	0.0	Colorless transparent	None	>100	29.1	<1	0.6	<0.51	<0.50	<0.63
				2012/06/08	Sunny	28.0	0.2	22.5	0.0	Yellow greenish pale gray	None	78	21.5	3.8	2.2	<0.66	<0.80	<0.70
27	Karasugawa River	Iwakurabashi Bridge	Takasakishi City/Tamamura Town	2012/09/13	Sunny	31.1	0.2	25.1	0.0	Light grayish yellow	None	85	19.7	3.3	1.0	<0.46	<0.58	<0.49
				2012/12/09	Cloudy, partly snow	5.8	0.2	6.9	0.0	Yellowish white	None	>100	34.7	1.8	1.5	<0.65	<0.70	<0.64
				2013/01/30	Sunny	7.7	0.2	6.8	0.0	Light grayish yellow	None	75	32.6	2.8	2.3	<0.47	<0.53	<0.60
28	Shinkanabashi Bridge	Uenomura Village	Uenomura Village	2012/06/06	Cloudy	24.0	0.2	19.9	0.0	Grayish yellow	None	31	24.8	12	3.1	<0.50	<0.53	<0.59
				2012/09/11	Sunny	31.9	0.2	27.2	0.0	Light grayish yellow green	None	>100	27.5	4.3	0.8	<0.59	<0.59	<0.72
				2012/12/05	Cloudy	11.1	0.3	12.1	0.0	Light grayish reddish yellow	None	>100	44.0	2.9	1.0	<0.61	<0.83	<0.54
29	Kamagawa River	Moritobashi Bridge	Kamamachi Town	2013/01/23	Cloudy	7.4	0.5	10.2	0.0	Yellowish white	None	>100	53.5	3.6	2.2	<0.49	<0.43	<0.51
				2012/06/07	Sunny	29.0	0.3	25.3	0.0	Grayish yellow	None	>100	35.7	2.9	0.8	<0.46	<0.56	<0.62
				2012/09/12	Sunny	31.2	0.3	26.6	0.0	Dark grayish yellow green	None	88	36.3	4.9	1.1	<0.63	<0.83	<0.56
30	Tobukyo Bridge	Fujiokashi City/Kamistomachi Town	Kamistomachi Town	2012/12/05	Sunny	12.7	0.3	14.8	0.0	Grayish yellow green	None	>100	39.3	1.5	0.6	<0.47	<0.66	<0.73
				2013/01/23	Cloudy	9.7	0.4	11.7	0.0	Light grayish greenish yellow	None	>100	45.3	1.1	0.8	<0.62	<0.83	<0.88
				2012/06/13	Cloudy	21.0	0.3	16.6	0.0	Yellow greenish pale gray	None	>100	13.0	<1	1.3	<0.52	<0.63	<0.52
31	Kamagawa River	Kamagawabashi Bridge	Kamistomachi Town	2012/09/12	Sunny	27.5	0.2	23.7	0.0	Grayish greenish yellow	None	>100	15.8	<1	0.1	<0.46	<0.51	<0.59
				2012/12/13	Sunny	6.1	0.5	4.6	0.0	Light grayish yellow green	None	>100	22.9	<1	0.1	<0.65	<0.75	<0.66
				2013/01/31	Sunny	2.3	0.2	2.6	0.0	Yellow greenish white	None	>100	22.0	<1	0.6	<0.41	<0.58	<0.50
32	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2012/06/04	Sunny	28.9	0.5	21.7	0.0	Yellow greenish white	None	>100	15.2	<1	0.2	<0.55	<0.59	<0.62
				2012/09/04	Sunny	28.2	0.5	24.4	0.0	Yellowish white	None	>100	15.9	<1	0.4	<0.67	<0.60	<0.56
				2012/12/13	Sunny	5.2	0.5	4.1	0.0	Light grayish yellow green	None	>100	23.6	<1	0.2	<0.52	<0.68	<0.55
33	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2013/01/31	Sunny	0.3	0.5	1.1	0.0	Colorless transparent	None	>100	22.5	<1	0.6	<0.47	<0.69	<0.59
				2012/06/05	Cloudy	23.0	0.1	21.7	0.0	Dark grayish yellow green	None	>100	23.0	1.5	0.8	<0.60	<0.70	<0.73
				2012/09/03	Sunny	27.8	0.4	23.5	0.0	Yellow greenish white	None	>100	17.5	<1	0.3	<0.46	<0.61	<0.61
34	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2012/12/18	Sunny	12.6	0.4	9.4	0.0	Light grayish yellow green	None	50	25.0	<1	0.3	<0.48	<0.56	<0.60
				2013/01/30	Sunny	6.9	0.2	8.1	0.0	Colorless transparent	None	>100	24.6	1.2	1.0	<0.63	<0.78	<0.62
				2012/06/13	Cloudy	23.0	0.4	21.1	0.0	Greenish white	None	>100	18.0	<1	0.7	<0.56	<0.68	<0.62
35	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2012/09/12	Sunny	24.8	0.2	26.0	0.0	Colorless transparent	None	>100	20.9	<1	0.2	<0.58	<0.61	<0.72
				2012/12/18	Sunny	8.4	0.4	9.8	0.0	Dark grayish yellow	None	65	23.8	5.6	1.1	<0.49	<0.56	<0.54
				2013/01/30	Sunny	6.0	0.2	6.7	0.0	Colorless transparent	None	>100	25.6	1.4	1.0	<0.61	<0.66	<0.58
36	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2012/06/05	Cloudy	25.0	0.1	21.4	0.0	Yellow greenish white	None	65	20.1	3.0	1.3	<0.44	<0.63	<0.49
				2012/09/13	Sunny	30.3	0.4	25.1	0.0	Grayish yellow green	None	67	22.1	4.8	1.2	<0.42	<0.50	<0.49
				2012/12/18	Sunny	9.2	0.3	9.3	0.0	Grayish yellow green	None	15	29.3	36	5.1	<0.55	<0.68	<0.69
37	Tonogawa River	Bandoobashi Bridge	Honjoshi City	2013/01/31	Sunny	7.4	0.4	7.2	0.0	Grayish yellow	None	90	30.3	5.0	3.3	<0.49	<0.70	<0.65

Table 4.6.1.1 Gunma Pref. River (Water Quality)

Sampling point				Sampling date	Weather	Air temperature ℃	Full depth m	Water quality										Remarks		
No.	Water body	Point	Municipality					General items						Radioactive material concentration (Bq/L)						
								Water temperature	Sampling depth m	Color	Odor	Transparency cm	Electrical conductivity	SS mg/L	Turbidity	Radioactive iodine I-131	Radioactive cesium Cs-134		Radioactive cesium Cs-137	
33	Akagishirakawa River	In Shimochosomachi Town	Maebashi City	2012/06/08	Sunny	26.1	0.4	19.7	0.0	Dark grayish greenish yellow	None	48	21.4	8.1	2.8	<0.60	<0.74	<0.62		
				2012/09/11	Rain	22.8	0.3	25.3	0.0	Dark grayish greenish yellow	None	62	19.0	2.9	0.5	<0.53	<0.66	<0.55		
				2012/12/17	Cloudy	6.9	0.2	6.0	0.0	Yellow greenish pale gray	None	>100	37.7	2.9	0.8	<0.54	<0.67	<0.59		
				2013/01/30	Sunny	10.0	0.2	5.2	0.0	Colorless transparent	None	>100	35.6	<1	1.1	<0.51	<0.70	<0.47		
				2012/06/07	Sunny	28.0	0.3	21.0	0.0	Light grayish yellow green	None	52	20.2	4.3	1.8	<0.56	<0.75	<0.70		
	34	Momonokigawa River	Utsuboishi Bridge	Maebashi City	2012/09/13	Sunny	29.1	0.2	25.1	0.0	Grayish yellow green	None	63	26.0	2.6	0.7	<0.56	<0.80	<0.66	
					2012/12/17	Cloudy	7.1	0.2	7.1	0.0	Grayish yellow green	None	35	28.9	5.4	1.8	<0.52	<0.66	<0.65	
					2013/01/30	Sunny	10.2	0.2	11.7	0.0	Colorless transparent	None	>100	29.2	<1	0.9	<0.57	<0.72	<0.55	
					2012/06/07	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to river construction
					2012/09/13	Sunny	33.0	0.4	26.4	0.0	Colorless transparent	None	78	27.4	3.4	1.0	<0.41	<0.56	<0.54	
35	Aratogawa River	Okuharabashi Bridge	Maebashi City	2012/12/17	Cloudy	5.2	0.2	7.7	0.0	Grayish yellow	None	43	31.4	4.6	2.5	<0.43	<0.72	<0.52		
				2013/01/30	Sunny	9.4	0.1	7.0	0.0	Light grayish greenish yellow	None	25	44.3	8.3	7.9	<0.62	<0.83	<0.81		
				2012/06/05	Cloudy	26.0	0.2	20.8	0.0	Dark grayish greenish yellow	None	54	24.7	6.2	1.8	<0.63	<0.72	<0.64		
				2012/09/13	Sunny	28.5	0.5	24.9	0.0	Dark grayish yellow green	None	84	28.0	2.5	0.6	<0.50	<0.50	<0.60		
				2012/12/17	Rain	5.4	0.2	7.0	0.0	Dark grayish yellow	None	60	43.9	3.3	1.4	<0.49	<0.61	<0.59		
36	Kasukawa River	Hozumibashi Bridge	Isesaki City	2013/01/31	Sunny	5.9	0.5	8.7	0.0	Dark grayish greenish yellow	None	42	49.1	9.3	5.8	<0.54	<0.75	<0.74		
				2012/06/05	Cloudy	25.0	0.2	20.7	0.0	Reddish yellowish pale gray	None	55	22.9	8.8	4.0	<0.46	<0.53	<0.48		
				2012/09/13	Sunny	30.6	0.6	23.9	0.0	Grayish yellow green	None	76	25.1	3.8	0.9	<0.55	<0.60	<0.68		
				2012/12/18	Sunny	8.4	0.3	12.2	0.0	Dark grayish reddish yellow	None	43	38.6	2.3	1.9	<0.43	<0.70	<0.59		
				2013/01/31	Sunny	8.8	0.2	9.3	0.0	Grayish greenish yellow	None	65	39.4	5.6	3.4	<0.52	<0.56	<0.60		
37	Hirosegawa River	Nakajimbashi Bridge	Isesaki City	2012/06/12	Cloudy	23.0	0.2	16.2	0.0	Yellow greenish pale gray	None	39	14.8	3.3	1.5	<0.65	<0.75	<0.70		
				2012/12/14	Sunny	2.1	0.2	3.3	0.0	Grayish yellow	None	34	34.7	11	7.4	<0.53	<0.50	<0.63		
				2012/06/12	Light rain	23.0	0.2	18.3	0.0	Yellowish light gray	None	53	25.0	5.5	1.5	<0.50	<0.63	<0.56		
				2012/12/18	Sunny	12.1	0.4	11.8	0.0	Grayish greenish yellow	None	60	54.8	4.6	2.5	<0.56	<0.53	<0.57		
				2012/05/28	Sunny	25.5	0.5	22.2	0.0	Dark grayish yellow	None	32	17.9	19	5.1	<0.63	<0.73	<0.68		
38	Hayakawa River	Hayakawabashi Bridge	Osaki City	2012/07/11	Sunny	29.0	0.6	26.2	0.0	Yellowish white	None	34	19.1	12	3.0	<0.46	<0.72	<0.54		
				2012/08/09	Sunny	30.7	0.7	27.1	0.0	Grayish greenish yellow	Faint sewage	35	20.8	6.1	1.6	<0.50	<0.65	<0.44		
				2012/10/08	Sunny	23.6	0.6	21.5	0.0	Light grayish yellow green	None	21	23.4	20	7.3	<0.50	<0.60	<0.63		
				2012/10/30	Cloudy	17.7	0.6	16.2	0.0	Light grayish yellow	None	50	27.9	7.1	5.8	<0.46	<0.69	<0.54		
				2012/12/18	Cloudy	10.1	0.4	9.6	0.0	Dark grayish yellow green	None	45	32.5	2.7	2.0	<0.57	<0.66	<0.47		
	39	Tonegawa River	Toneozeki Weir	Chiyodamachi Town/Gyodashi City	2013/01/31	Sunny	8.5	0.3	7.0	0.0	Dark grayish greenish yellow	None	34	31.7	7.1	4.9	<0.59	<0.61	<0.59	
					2012/05/29	Sunny	18.0	0.9	11.9	0.0	Colorless transparent	None	>100	6.8	1.4	0.6	<0.49	<0.41	<0.54	
					2012/07/11	Sunny	17.8	0.6	14.7	0.0	Colorless transparent	None	>100	5.9	<1	0.1	<0.48	<0.53	<0.56	
					2012/08/08	Cloudy	19.0	0.4	16.4	0.0	Colorless transparent	None	>100	8.3	<1	0.2	<0.62	<0.75	<0.54	
					2012/10/08	Sunny	18.0	0.5	14.2	0.0	Yellow greenish white	None	>100	8.1	<1	0.4	<0.62	<0.47	<0.60	
40	Kogaragawa River	Kayanobashi Bridge	Kiryu City	2012/10/29	Sunny	12.6	0.5	11.6	0.0	Greenish yellowish white	None	>100	7.7	2.0	1.0	<0.51	<0.50	<0.59		
				2012/12/12	Sunny	0.3	0.5	3.4	0.0	Yellow greenish white	None	>100	8.4	<1	0.1	<0.54	<0.50	<0.59		
				2013/02/05	Sunny	-1.5	0.4	3.9	0.0	Light grayish reddish yellow	None	>100	7.8	<1	0.5	<0.69	<0.67	<0.79		
				2012/06/12	Cloudy	26.0	0.6	16.8	0.0	Yellow greenish light gray	None	>100	9.7	3.1	1.2	<0.51	<0.61	<0.55		
				2012/09/20	Sunny	28.5	0.5	20.6	0.0	Light grayish yellow green	None	56	12.2	3.3	1.9	<0.61	<0.78	<0.73		
	41	Watarasegawa River	Intake for Akaiwayouji water channel	Ouramachi Town	2012/12/12	Sunny	8.0	0.4	8.5	0.0	Greenish yellowish light gray	None	>100	12.8	<1	0.9	<0.63	<0.70	<0.71	
					2013/02/04	Sunny, then cloudy	8.5	0.6	6.3	0.0	Greenish yellowish white	None	>100	12.3	2.4	1.6	<0.57	<0.64	<0.55	
					2012/05/28	Cloudy	23.0	0.8	17.3	0.0	Dark grayish green	None	>100	10.2	1.2	1.0	<0.53	<0.70	<0.55	
					2012/07/11	Sunny	32.0	0.5	19.9	0.0	Dark grayish reddish yellow	None	97	8.4	1.0	0.2	<0.51	<0.66	<0.57	
					2012/08/08	Sunny	31.2	0.5	24.8	0.0	Colorless transparent	None	>100	12.5	1.0	0.4	<0.47	<0.50	<0.51	
42	Tataragawa River	Ejiribashi Bridge	Ouramachi Town	2012/10/10	Sunny	22.0	0.6	18.0	0.0	Greenish yellowish white	None	>100	12.6	<1	0.6	<0.47	<0.67	<0.56		
				2012/10/30	Cloudy	13.1	1.3	14.2	0.0	Grayish greenish yellow	None	>100	10.9	2.3	1.9	<0.62	<0.70	<0.68		
				2012/12/12	Sunny	8.8	1.2	9.0	0.0	Grayish yellow green	None	>100	12.8	<1	0.6	<0.55	<0.75	<0.73		
				2013/02/07	Cloudy	3.5	1.4	5.4	0.0	Grayish yellow	None	>100	13.2	<1	0.6	<0.51	<0.68	<0.49		
				2012/06/14	Cloudy	26.0	0.2	20.2	0.0	Grayish yellow green	None	53	19.0	3.2	1.2	<0.63	<0.80	<0.56		
43	Tataragawa River	Ejiribashi Bridge	Ouramachi Town	2012/12/19	Sunny	5.5	0.3	8.7	0.0	Grayish yellow green	None	70	29.1	4.4	2.3	<0.59	<0.64	<0.60		
				2013/01/31	Sunny	11.0	0.2	8.4	0.0	Grayish greenish yellow	None	32	52.0	15	10	<0.60	<0.70	<0.62		

Table 4.6.1.1 Gunma Pref. River (Water Quality)

River	Sampling point				Sampling date	Weather	Air temperature ℃	Full depth m	Water quality										Remarks								
	No.	Water body		Point					Municipality	General items						Radioactive material concentration (Bq/L)											
										Water temperature	Sampling depth m	Color	Odor	Transparency cm	Electrical conductivity	SS mg/L	Turbidity	Radioactive iodine I-131		Radioactive cesium Cs-134	Radioactive cesium Cs-137						
R i v e r s	45	T o n e g a w a	R i v e r	W a t e r	Kamonbashi Bridge	Kiryushi City	2012/06/12	Cloudy	23.5	0.3	16.1	0.0	Greenish yellowish pale gray	None	>100	6.2	<-1	0.9	<-0.58	<-0.63	<-0.64						
							2012/09/20	Sunny	25.3	0.4	22.6	0.0	Light grayish greenish yellow	None	>100	7.8	<-1	0.8	<-0.45	<-0.71	<-0.52						
							2012/12/12	Sunny	4.8	0.2	7.5	0.0	Light grayish yellow green	None	>100	8.5	<-1	0.6	<-0.50	<-0.65	<-0.70						
	46	R i v e r	g a w a	s e r	R i v e r	Kiryugawa River	Kiryushi City	2013/02/05	Sunny	10.3	0.4	6.8	0.0	Light grayish yellow green	None	>100	7.9	1.3	0.8	<-0.63	<-0.75	<-0.73					
								2012/05/28	Rain	20.0	0.6	18.3	0.0	Grayish yellow green	None	>100	39	7.7	4.0	2.0	<-0.65	<-0.83	<-0.78				
								2012/07/11	Sunny	32.0	0.4	24.0	0.0	Yellow greenish white	None	>100	10.4	8.2	1.9	<-0.57	<-0.70	<-0.62					
						47	S y s t e m	R i v e r	s e r	R i v e r	Sakaihashi Bridge	Kiryushi City/Ashikagashi City	2012/08/08	Sunny	28.5	0.4	24.2	0.0	Colorless transparent	None	>100	9.2	1.4	0.4	<-0.51	<-0.44	<-0.50
													2012/10/10	Sunny	23.2	0.3	20.0	0.0	Greenish yellowish white	None	>100	13.0	<-1	0.6	<-0.53	<-0.64	<-0.59
													2012/10/30	Sunny	13.2	1.0	14.8	0.0	Light grayish yellow	None	>100	10.4	<-1	0.9	<-0.48	<-0.65	<-0.57
													2012/12/14	Sunny	2.7	0.3	7.1	0.0	Greenish yellowish white	None	>100	12.1	<-1	0.6	<-0.49	<-0.61	<-0.57
	48	Yatagawa River	Togodahashi Bridge	Meiwamachi Town/Itakuramachi Town	2013/02/07	Sunny	4.9	1.2	6.9	0.0	Light grayish yellow green	None	>100	10.0	<-1	0.5	<-0.47	<-0.53	<-0.56								
					2012/06/14	Cloudy	23.5	2.0	21.1	0.0	Dark grayish yellow green	None	35	33.9	6.9	3.2	<-0.43	<-0.69	<-0.49								
					2012/12/10	Sunny	7.6	1.4	6.5	0.0	Grayish yellow green	None	36	40.9	13	10	<-0.51	<-0.64	<-0.59								
	48	Yatagawa River	Togodahashi Bridge	Meiwamachi Town/Itakuramachi Town	2013/01/31	Sunny	3.6	1.0	6.8	0.0	Dark grayish yellow green	None	14	54.5	18	15	<-0.51	<-0.59	<-0.62								
					2012/06/14	Cloudy	28.0	0.2	21.9	0.0	Light grayish yellow green	None	51	33.0	7.5	3.2	<-0.56	<-0.47	<-0.51								
2012/12/19					Sunny	3.0	0.6	10.0	0.0	Dark grayish greenish yellow	None	52	111.5	7.9	4.7	<-0.50	<-0.53	<-0.59									
2013/01/31	Sunny	4.6	0.2	7.0	0.0	Dark grayish greenish yellow	None	40	103.7	6.5	5.2	<-0.44	<-0.56	<-0.64													

Table 4.6.1.2 Gunma Pref. River (Sediment)

Sampling point				Sampling date	Weather	Air temperature °C	Full depth m	Sediment														Radioactive material concentrations (Bq/kg dried mud)			Remarks		
No.	Water body	Point	Municipality					Mud sampling depth cm	Color	Odor	Mechanical composition %							Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium					
											Medium grave	Fine gravel	Coarse sand	Medium sand	Fine sand	Silt	Clay					Cs-134	Cs-137				
Rivers	Tonegawa River	Hiroobashi Bridge	Minakamimachi Town	2012/05/30	Sunny	20.0	1.4	9.8	5	Dark yellow red	None	0.0	2.5	0.4	23.4	38.3	35.1	0.3	70.1	2.649	Sand	<4.2	130	220			
				2012/09/10	Sunny	22.3	1.5	14.9	5	Dark grayish reddish yellow	None	7.4	30.4	49.6	10.6	1.0	1.1	0.0	91.7	2.66	Sand	<4.6	26	48			
				2012/11/29	Cloudy	1.3	0.3	5.1	3	Reddish yellowish black	None	0.0	43.3	38.3	9.0	3.7	5.7	0.1	88.2	2.651	Sand	<4.6	32	58			
				2013/01/29	Snow	-1.0	0.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to snow on the ground.
				2012/05/30	Sunny	23.0	0.6	11.6	5	Dark grayish reddish yellow	None	0.0	0.6	17.7	76.7	2.6	2.3	0.0	86.8	2.697	Sand	<5.1	39	63			
				2012/07/10	Sunny	29.0	0.7	17.0	3	Yellow greenish white	None	9.0	27.8	43.0	19.9	0.3	0.0	0.0	94.7	2.791	Sand	<4.2	13	24			
		Tsukuyonobashi Bridge	2012/08/07	Sunny	24.0	0.3	14.1	7	Very pale yellow red	None	0.0	23.5	57.7	15.9	2.6	0.3	0.0	93.4	2.694	Sand	<4.5	22	33				
			2012/08/29	Sunny	30.8	0.3	14.3	5	Dark grayish reddish yellow	None	3.3	8.3	73.5	14.8	0.1	0.0	0.0	93.5	2.681	Sand	<3.7	18	36				
			2012/09/27	Sunny	24.1	0.3	20.3	3	Dark grayish greenish yellow	None	7.9	38.0	30.4	21.3	0.6	1.2	0.0	93.1	2.7	Sand/gravel	<4.2	22	38				
			2012/11/27	Cloudy	4.7	0.4	7.4	3	Dark grayish reddish yellow	None	3.1	18.9	59.8	14.4	1.3	2.5	0.0	92.5	2.689	Sand	<4.9	28	40				
			2013/01/22	Sunny	3.9	0.3	3.8	3	Dark grayish reddish yellow	None	4.0	25.4	30.9	32.3	4.6	2.7	0.0	91.4	2.685	Sand	<4.5	24	47				
			2012/05/30	Sunny	24.0	0.5	12.3	5	Dark reddish yellow	None	5.2	2.5	27.3	57.4	4.1	3.4	0.0	81.3	2.627	Sand	<5.6	28	40				
	Akayagawa River	Kosodobashi Bridge	2012/09/10	Sunny	24.4	0.5	24.5	2	Dark grayish reddish yellow	None	7.5	40.1	28.1	15.4	5.8	3.2	0.0	90.9	2.696	Sand/gravel	<4.0	15	27				
			2012/11/27	Snow	6.1	0.4	9.3	3	Dark grayish reddish yellow	None	0.0	2.1	28.5	63.4	2.9	3.1	0.0	84.9	2.67	Sand	<4.3	11	29				
			2013/01/22	Sunny	7.5	0.3	4.7	3	Dark grayish yellow red	None	0.0	2.9	17.9	54.3	14.2	10.6	0.1	79.7	2.685	Sand	<4.8	42	71				
	Sakuragawa River	In Oozaya Yachi	Kawabamura Village	2012/05/30	Sunny	21.0	0.4	12.9	5	Very dark reddish yellow	None	1.1	13.4	67.8	11.4	2.1	4.2	0.0	79.0	2.677	Sand	<7.2	160	250			
				2012/07/09	Sunny	23.3	0.6	14.0	3	Dark yellow red	None	8.0	11.0	43.5	31.1	3.0	3.4	0.0	87.2	2.85	Sand	<6.4	94	150			
				2012/08/07	Sunny	27.5	0.3	19.0	3	Dark yellow red	None	7.0	49.3	2.6	23.8	8.3	9.0	0.0	87.9	2.801	Sand	<5.3	87	140			
				2012/08/29	Sunny	26.9	0.4	18.9	4	Dark grayish reddish yellow	None	1.1	7.4	6.0	40.2	26.4	18.6	0.3	72.1	2.653	Sand	<8.3	180	320			
				2012/09/27	Cloudy	22.7	0.2	16.6	6	Dark grayish reddish yellow	None	4.7	45.1	40.8	5.1	1.4	2.9	0.0	83.4	2.711	Sand	<5.8	90	180			
				2012/11/27	Snow	2.6	0.3	5.5	2	Dark grayish reddish yellow	None	14.6	55.4	16.7	8.7	2.2	2.4	0.0	82.9	2.77	Sand	<5.4	99	160			
				2013/01/29	Sunny	1.4	0.3	2.6	3	Strong reddish yellow	None	18.1	46.7	2.8	15.4	10.5	6.4	0.0	85.0	2.713	Gravel/sand	<5.3	91	180			
				2012/05/30	Sunny	19.0	0.1	16.7	5	Dark reddish yellow	None	20.3	24.7	33.5	21.1	0.0	0.5	0.0	91.3	2.659	Sand	<4.0	14	24			
				2012/09/10	Sunny	30.4	0.2	19.4	1	Dark grayish yellow red	None	6.0	39.2	21.5	17.4	7.5	8.4	0.0	78.6	2.65	Sand	<5.4	65	94			
				2012/11/27	Snow	5.0	0.6	3.7	2	Dark grayish reddish yellow	None	8.7	50.1	20.0	21.0	0.1	0.0	0.0	92.5	2.692	Sand	<4.2	12	19			
				2013/01/29	Sunny	-2.3	0.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to snow on the ground.
				Katahira River	Tonemachikataya	Numatsuchi City	2012/05/31	Sunny	18.9	0.6	11.6	5	Dark reddish yellow	None	0.0	1.7	12.6	68.5	17.0	0.3	0.0	93.7	2.73	Sand	<4.1	6.6	9.7
	2012/07/10	Sunny	28.0				0.4	15.5	3	Dull yellow	None	8.5	6.9	1.0	50.4	30.0	3.3	0.0	89.2	2.85	Sand	<3.9	5.9	10			
	2012/08/07	Sunny	32.0				0.4	24.7	5	Grayish yellow	None	2.4	19.3	14.7	59.4	3.0	1.1	0.0	93.2	2.749	Sand	<3.7	5.5	7.7			
	2012/08/29	Sunny	26.3				0.1	21.9	1	Grayish yellow	Moss	6.5	53.7	29.8	7.6	1.0	1.4	0.0	91.0	2.65	Sand	<4.1	7.7	15			
2012/09/28	Sunny	21.0	1.3				15.0	7	Yellowish gray	None	2.2	48.5	43.8	3.7	0.1	1.7	0.0	94.5	2.701	Sand/gravel	<3.6	6.3	7.7				
2012/11/27	Sunny	8.0	0.5				5.8	2	Grayish yellow	None	17.0	39.9	26.0	13.1	1.2	2.8	0.0	89.0	2.677	Sand	<4.3	8.3	5.7				
2013/01/22	Sunny	1.4	-				-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to snow on the ground.	
2012/05/29	Sunny	26.0	2.1				17.9	5	Very dark greenish yellow	None	6.3	11.4	9.8	62.5	6.3	3.8	0.0	92.1	2.949	Sand	<3.8	1.7	22				
2012/07/10	Sunny	30.0	1.2				23.2	2	Dark grayish reddish yellow	None	6.8	9.1	0.0	37.9	36.6	9.7	0.0	82.9	2.775	Sand	<4.1	32	54				
2012/08/07	Sunny	32.3	1.0				24.6	3	Dark reddish yellow	None	0.0	3.3	1.2	83.8	7.7	3.9	0.0	86.8	2.808	Sand	<5.2	35	61				
2012/08/29	Sunny	32.0	1.0				22.1	4	Dark grayish reddish yellow	None	0.0	1.7	48.9	40.5	4.3	4.6	0.0	81.3	2.794	Sand	<5.8	61	93				
2012/09/28	Sunny	22.4	0.8				16.5	2	Yellowish dark gray	None	3.0	11.3	72.9	9.3	1.5	2.1	0.0	92.2	2.909	Sand	<4.6	20	27				
2012/11/28	Cloudy	3.7	0.4	7.3	2	Dark grayish yellow red	None	3.3	28.8	23.5	35.5	4.3	4.6	0.0	88.2	2.837	Sand	<4.1	28	46							
2013/01/23	Cloudy	5.3	0.3	5.3	2	Dark grayish yellow red	None	24.1	39.0	23.7	9.6	1.2	2.3	0.0	88.0	2.802	Sand	<5.0	42	84							
Agatsumagawa River	Shintobashi Bridge	Nagahoromachi Town	2012/05/29	Cloudy	14.5	0.5	12.0	5	Very dark greenish yellow	None	0.0	0.5	9.9	77.8	9.4	2.4	0.0	91.7	2.879	Sand	<3.6	9.5	11				
			2012/08/30	Sunny	22.9	0.5	17.5	8	Yellow reddish black	Sludge	0.0	0.0	0.0	23.7	32.0	44.2	0.1	57.9	2.466	Silt	<8.5	7.7	110				
			2012/11/28	Sunny	0.3	0.3	3.7	3	Dark grayish yellow red	None	0.0	1.0	0.0	66.5	27.6	4.8	0.0	85.5	2.772	Sand	<4.1	35	60				
			2013/01/23	Sunny	-0.1	0.8	3.0	2	Dark grayish reddish yellow	None	0.0	3.2	71.2	25.5	0.1	0.0	0.0	90.3	2.721	Sand	<4.4	6.2	8.5				
Shirasugawa River	Shuttatsubashi Bridge	Nakanojomachi Town	2012/06/11	Cloudy	17.0	1.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to many rocks.		
			2012/09/27	Sunny	17.5	1.0	16.7	2	Reddish yellowish dark gray	None	8.8	38.3	14.9	21.5	11.7	4.8	0.0	87.2	2.669	Sand/gravel	<4.0	9	12				
			2012/11/28	Sunny	4.8	1.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to many rocks.	
			2013/01/23	Sunny	2.8	1.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to many rocks.	

Table 4.6.1.2 Gunma Pref. River (Sediment)

Sampling point				Sampling date	Weather	Air temperature °C	Full depth m	Sediment																Remarks				
No.	Water body	Point	Municipality					General items								Radioactive material concentrations (Bq/kg dried soil)												
								Mud temperature °C	Mud sampling depth cm	Color	Odor	Mechanical composition %					Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium							
10	Agetamagawa River	Downstream of Aomabashi Bridge	Higashigunmauchi Town	2012/05/30	Sunny	17.5	0.5	16.2	5	Very dark yellow	None	0.0	0.0	5.5	47.1	47.2	0.3	0.0	0.0	92.2	2.703	Sand	<4.8	<7.1	11			
				2012/07/10	Sunny	28.0	0.2	21.7	2	Reddish yellowish dark gray	None	0.0	16.3	78.1	5.2	0.1	0.3	0.0	91.7	2.683	Sand	<4.3	10	12				
				2012/08/07	Sunny	32.3	0.2	25.7	2	Very dark yellow	None	3.7	33.6	19.9	32.1	8.0	2.7	0.0	94.9	2.872	Sand	<3.0	6.5	6.6				
				2012/08/30	Sunny	25.2	0.2	25.2	2	Reddish yellowish dark gray	None	1.5	16.7	49.2	29.8	0.8	1.6	0.0	92.6	2.901	Sand	<3.3	8.3	14				
				2012/09/27	Sunny	28.2	0.3	22.4	5	Greenish yellowish black	None	4.8	41.5	42.9	9.6	0.4	0.8	0.0	93.0	2.829	Sand/gravel	<4.0	7.4	14				
				2012/11/28	Sunny	9.1	0.3	6.5	3	Reddish yellowish black	None	1.0	32.8	48.5	15.6	1.0	1.1	0.0	90.7	2.794	Sand	<3.6	7.2	10				
				2013/01/23	Sunny	5.0	0.3	4.7	2	Dark grayish reddish yellow	None	9.7	18.8	46.4	23.3	0.7	1.1	0.0	90.4	2.73	Sand	<4.6	<7.4	5.8				
				2012/06/15	Sunny	23.0	0.2	16.7	3	Yellow greenish dark gray	None	0.6	17.9	51.0	20.6	3.9	6.0	0.0	84.5	2.697	Sand	<5.4	47	86				
				11	Nakutagawa River	Tonodabashi Bridge	Takayamamura Village	2012/09/11	Sunny	28.3	0.3	20.5	3	Dark grayish reddish yellow	None	1.2	25.2	58.3	11.8	1.4	1.8	0.0	87.4	2.665	Sand	<4.7	32	49
								2012/11/28	Sunny	5.5	0.4	6.2	2	Dark grayish yellow red	None	4.4	33.3	0.0	38.9	15.2	8.2	0.0	82.4	2.71	Sand	<5.0	32	53
2013/01/29	Sunny	4.5	0.3					3.0	2	Dark grayish reddish yellow	None	15.0	32.7	40.6	8.4	1.1	2.3	0.0	87.6	2.679	Sand	<4.3	26	57				
2012/05/29	Cloudy	25.5	0.5					19.7	5	Dark yellow	None	0.0	2.1	67.8	25.6	1.4	3.1	0.0	88.2	2.64	Sand	<4.2	17	36				
12	Agetamagawa River	Agetamabashi Bridge	Shibukawashi City	2012/06/27	Sunny	28.0	0.4	20.0	5	Reddish yellowish black	None	0.0	0.6	5.9	90.1	3.5	0.0	0.0	91.9	2.818	Sand	<4.7	8.5	19				
				2012/07/17	Sunny	34.5	0.2	26.5	3	Dark grayish reddish yellow	None	0.0	0.1	18.8	76.6	3.8	0.6	0.0	84.4	2.729	Sand	<3.9	14	23				
				2012/08/08	Sunny	25.2	0.3	23.0	3	Yellow reddish black	None	0.0	0.3	1.6	50.8	32.3	15.0	0.0	75.0	2.687	Sand	<5.3	70	100				
				2012/08/29	Sunny	27.2	0.4	26.9	4	Dark grayish reddish yellow	None	0.0	0.0	0.4	31.7	43.5	24.4	0.0	67.3	2.646	Mud	<8.7	240	370				
				2012/11/29	Sunny	11.2	0.7	6.8	2	Yellow reddish black	None	13.4	1.7	15.6	62.5	5.0	1.8	0.0	91.2	2.825	Sand	<5.3	<5.2	9				
				2013/01/24	Sunny	1.8	0.3	6.1	2	Dark grayish reddish yellow	None	1.7	14.8	14.0	63.1	4.0	2.4	0.0	90.5	2.721	Sand	<3.9	7.4	11				
				13	Tonegawa River	Taishobashi Bridge	Shibukawashi City	2012/05/29	Cloudy	28.0	1.4	12.7	5	Dark yellow	None	3.5	4.3	41.9	45.0	5.1	0.1	0.0	92.0	2.790	Sand	<4.1	12	18
								2012/06/26	Sunny	24.0	0.2	16.0	3	Reddish yellowish dark gray	None	0.0	1.3	16.1	79.6	2.5	0.5	0.0	91.6	2.688	Sand	<4.8	17	32
								2012/07/17	Cloudy	27.0	0.9	21.1	2	Dark grayish yellow	None	20.4	28.6	3.6	35.6	10.2	1.6	0.0	94.2	2.799	Sand	<3.3	7.8	15
								2012/08/08	Sunny	29.7	0.5	16.7	10	Dark yellow	None	0.0	1.7	1.8	58.1	35.0	3.4	0.0	87.8	2.736	Sand	<4.3	23	33
2012/08/31	Cloudy	24.8	0.3					17.5	5	Dark grayish reddish yellow	None	0.0	0.5	1.4	74.4	20.2	3.5	0.0	85.3	2.756	Sand	<4.4	25	44				
2012/11/29	Cloudy	16.6	0.5					10.5	3	Reddish yellowish black	None	16.1	20.2	16.0	37.6	5.9	4.2	0.0	91.4	2.871	Sand	<3.9	12	18				
14	Takizawagawa River	Shintakizawabashi Bridge	Shibukawashi City/Yoshiokamachi Town	2013/01/24	Sunny	1.4	0.7	8.5	5	Dark grayish yellow red	None	18.4	18.1	26.2	30.2	4.8	2.3	0.0	87.9	2.648	Sand	<3.8	19	31				
				2012/06/07	Sunny	19.0	0.2	20.4	3	Yellowish dark gray	None	2.2	20.3	55.8	12.3	3.6	5.7	0.1	91.5	2.913	Sand	<3.9	30	50				
				2012/09/12	Sunny	24.2	0.2	22.3	3	Yellow reddish dark gray	None	1.8	23.8	48.7	24.8	0.6	0.3	0.0	92.7	2.846	Sand/gravel	<4.2	20	30				
				2012/11/30	Cloudy	9.1	0.2	10.8	2	Dark grayish yellow red	None	11.9	40.4	26.5	12.2	3.2	5.7	0.0	87.4	2.821	Sand	<4.3	15	33				
15	Tonegawa River	Gummaabashi Bridge	Maebashishi City	2013/01/24	Sunny	9.3	0.3	9.0	2	Dark grayish reddish yellow	None	8.2	13.0	15.0	15.8	17.5	30.0	0.6	70.4	2.7	Sand	<6.4	85	160				
				2012/06/07	Sunny	26.3	0.1	15.9	2	Reddish yellowish gray	None	0.0	0.1	0.9	52.4	38.0	8.7	0.0	85.5	2.762	Sand	<5.4	26	38				
				2012/09/11	Cloudy	31.2	0.5	23.2	2	Yellowish black	None	6.2	78.1	11.6	4.0	0.1	0.0	0.0	95.9	2.791	Sand/gravel	<3.1	<4.7	4.4				
				2012/12/06	Cloudy	11.1	0.3	8.2	3	Reddish yellowish dark gray	None	0.0	0.0	0.0	68.6	27.0	4.3	0.0	82.8	2.775	Sand	<4.4	13	24				
				2013/01/24	Sunny	10.1	0.7	9.5	3	Dark grayish yellow	None	0.0	0.0	1.1	52.3	34.9	11.8	0.0	80.6	2.791	Sand	<3.7	19	34				
				2012/06/07	Cloudy	29.0	0.3	17.0	5	Dark grayish greenish yellow	None	0.0	0.0	1.0	55.8	38.7	4.5	0.0	88.7	2.792	Sand	<4.0	16	28				
16	Tonegawa River	Fukachimabashi Bridge	Tamamura-machi Town	2012/09/13	Sunny	35.7	0.2	25.2	3	Yellow reddish dark gray	None	0.7	2.5	61.9	32.1	1.8	1.0	0.0	89.7	2.844	Sand	<4.4	18	25				
				2012/12/05	Cloudy	11.6	0.3	7.9	3	Yellowish dark gray	Faint fish and shellfish	0.0	0.3	0.0	41.2	52.2	6.3	0.0	82.3	2.92	Sand	<4.0	14	32				
				2013/01/24	Sunny	12.2	0.3	9.4	1	Dark grayish greenish yellow	None	0.0	0.0	2.0	54.9	35.1	8.0	0.0	85.0	2.85	Sand	<3.9	14	25				
				2012/06/06	Cloudy	23.0	0.4	16.2	4	Reddish yellowish dark gray	None	0.2	0.8	15.7	72.9	4.8	5.6	0.0	87.5	2.882	Sand	<5.9	120	190				
17	Nagigawa River	Kamigodabashi Bridge	Takasaki City	2012/09/11	Cloudy	27.7	0.3	20.5	3	Reddish yellowish black	None	1.4	38.6	35.1	19.7	2.7	2.5	0.0	92.3	2.908	Sand/gravel	<4.0	39	68				
				2012/12/04	Cloudy partly sunny	8.1	0.3	10.2	2	Greenish yellowish dark gray	None	0.0	7.1	12.6	50.8	21.6	7.9	0.0	83.0	2.785	Sand	<5.2	87	160				
				2013/01/23	Sunny	3.1	0.3	6.5	3	Yellow reddish dark gray	None	3.4	14.4	8.8	58.6	9.8	5.0	0.0	82.0	2.838	Sand	<5.8	60	110				
				2012/06/06	Cloudy	22.0	0.2	16.0	5	Reddish yellowish black	None	0.0	0.0	2.7	62.9	30.3	4.1	0.0	86.3	2.705	Sand	<4.2	29	32				
18	Karasugawa River	Karasugawabashi Bridge	Annakashi City	2012/09/11	Cloudy	27.6	0.4	23.6	2	Reddish yellowish dark gray	None	13.0	18.3	6.3	40.3	18.3	3.8	0.0	86.1	2.836	Sand/gravel	<3.6	19	32				
				2012/12/04	Sunny	6.3	0.5	9.2	3	Very dark reddish yellow	Faint seaweed	0.0	6.3	64.9	27.7	0.6	0.4	0.0	88.8	2.768	Sand	<4.0	17	28				
				2013/01/23	Sunny	4.8	0.5	4.6	4	Dark grayish reddish yellow	None	0.0	2.0	59.2	29.2	3.1	6.5	0.0	83.8	2.719	Sand	<4.8	12	27				
19	Usuigawa River	Nakasebashi Bridge	Annakashi City	2012/06/06	Rain	18.5	0.2	16.4	5	Dark grayish yellow	None	2.8	33.5	58.1	2.8	1.2	1.6	0.0	85.4	2.657	Sand	<6.4	140	230				
				2012/09/06	Cloudy	29.4	0.3	23.2	3	Dark reddish yellow	Faint fish and shellfish	3.3	29.6	47.4	11.3	5.5	2.9	0.0	91.4	2.731	Sand/gravel	<4.2	44	76				
				2012/12/09	Cloudy	4.1	0.2	5.8	3	Dark grayish reddish yellow	None	5.1	33.6	40.7	11.4	5.0	4.3	0.0	84.7	2.675	Gravel/sand	<5.2	35	62				
2013/01/31	Sunny	3.8	0.4	5.2	4	Reddish yellowish dark gray	None	4.7	63.9	23.2	1.6	2.4	4.1	0.0	87.0	2.687	Sand	<4.3	24	39								

Table 4.6.1.2 Gunma Pref. River (Sediment)

Sampling point				Sampling date	Weather	Air temperature °C	Full depth m	Sediment														Radioactive material concentrations (Bq/kg dried soil)			Remarks
No.	Water body	Point	Municipality					Mud sampling depth cm	Color	Odor	Mechanical composition %							Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium			
											Medium grave	Fine gravel	Coarse sand	Medium sand	Fine sand	Silt	Clay					Cs-134	Cs-137		
Rivers	Tonetsugawa River	Usuigawa River	Hanatabashi Bridge	Takasaki City	2012/06/06	Cloudy	21.8	0.2	19.1	2	Reddish yellowish black	None	7.7	4.4	13.1	54.4	11.9	8.5	0.0	84.0	2.77	Sand	<5.0	29	45
					2012/09/19	Cloudy	24.0	0.2	25.4	3	Yellowish dark gray	None	0.0	3.0	6.9	66.0	13.6	10.5	0.0	81.7	2.728	Sand	<4.5	30	52
					2012/12/05	Sunny	6.3	0.3	5.6	3	Reddish yellowish black	None	0.0	3.3	3.8	68.0	18.9	6.0	0.0	82.9	2.861	Sand	<4.3	13	27
		Kabunogawa River	Tadakawabashi Bridge	Shimontamachi Town	2013/01/23	Sunny	7.7	0.7	5.1	3	Dark grayish reddish yellow	Faint sludge	7.2	14.5	4.7	44.9	15.9	12.9	0.0	80.6	2.741	Sand/silt	<4.5	19	42
					2012/06/04	Sunny	27.5	0.3	20.9	5	Yellowish dark gray	None	0.0	0.4	16.1	80.0	2.2	1.3	0.0	91.1	2.713	Sand	<4.7	23	33
					2012/09/19	Cloudy	24.3	0.5	22.4	3	Dark grayish yellow	None	0.0	7.6	70.7	20.7	0.7	0.4	0.0	92.9	2.703	Sand	<3.7	11	18
					2012/12/13	Sunny	5.8	0.7	2.9	3	Dark grayish yellow	None	7.2	22.3	55.1	13.7	0.8	1.0	0.0	83.7	2.71	Gravel/sand	<4.6	9.3	15
					2013/01/31	Sunny	5.9	0.4	5.7	10	Yellowish dark gray	None	11.7	39.8	8.9	27.1	5.7	6.9	0.0	89.4	2.693	Sand	<3.4	9.2	17
					2012/06/05	Cloudy	23.0	0.3	22.2	5	Reddish yellowish black	None	6.6	40.2	27.5	14.9	5.8	5.1	0.0	90.7	2.681	Sand	<4.2	19	23
		Kabunogawa River	Kabunogawabashi Bridge	Takasaki City/ Fujiokashi City	2012/09/26	Sunny	27.1	0.5	21.5	3	Greenish yellowish dark gray	None	6.7	39.8	16.0	27.7	4.8	4.9	0.1	90.8	2.695	Sand/gravel	<4.2	12	26
					2012/12/05	Sunny	9.4	0.7	7.1	3	Greenish yellowish dark gray	None	0.0	1.5	0.0	26.3	48.2	24.0	0.0	68.5	2.759	Sand/silt	<4.8	27	64
					2013/01/23	Cloudy	5.8	0.5	6.1	4	Dark grayish reddish yellow	None	0.0	1.1	0.4	32.3	31.9	33.5	0.8	65.0	2.64	Sand/silt	<5.1	27	46
		Ogawa River	Kinzanbashi Bridge	Kamamachi Town	2012/06/13	Cloudy	20.5	0.3	16.2	2	Reddish yellowish dark gray	None	8.7	31.9	51.9	3.9	1.2	2.4	0.0	91.1	2.729	Sand	<4.3	34	53
					2012/09/12	Sunny	23.9	0.2	20.5	3	Reddish yellowish dark gray	None	13.5	58.9	19.8	3.4	1.7	2.7	0.0	92.9	2.731	Gravel	<4.7	32	58
					2012/12/13	Sunny	3.6	0.2	6.5	2	Yellow greenish dark gray	None	10.9	36.2	18.5	19.7	7.8	7.0	0.0	91.9	2.705	Gravel/sand	<3.7	13	23
					2013/01/31	Sunny	7.5	0.2	7.4	5	Yellowish dark gray	None	14.3	43.0	34.5	5.9	0.6	1.6	0.0	92.3	2.736	Sand	<3.7	7.3	13
		Nannokugawa River	Ozawabashi Bridge	Nannokumura Village	2012/06/13	Cloudy	20.5	0.3	15.8	3	Reddish yellowish dark gray	None	0.0	1.3	40.2	53.3	4.1	1.2	0.0	88.9	2.718	Sand	<4.0	29	39
					2012/09/12	Sunny	28.1	0.2	21.8	2	Reddish yellowish black	None	1.2	30.4	45.1	20.0	2.2	1.2	0.0	93.8	2.754	Gravel	<3.2	<5.2	10
					2012/12/13	Sunny	6.4	0.3	2.1	2	Reddish yellowish black	None	15.7	31.2	27.3	24.2	1.3	0.4	0.0	86.6	2.707	Gravel/sand	<4.5	9.7	18
		Someiyagawa River	Yakushibashi Bridge	Shintomura Village	2013/01/31	Sunny	5.9	0.4	1.1	10	Reddish yellowish gray	None	20.1	59.7	17.1	1.8	0.5	0.8	0.0	92.1	2.719	Gravel/sand	<3.6	<6.1	8.1
					2012/06/08	Sunny	28.0	0.2	20.8	3	Yellowish dark gray	None	18.8	23.7	38.6	14.8	1.4	2.8	0.0	85.4	2.889	Sand/mud	<3.9	4.5	68
					2012/09/13	Sunny	31.1	0.2	24.8	3	Reddish yellowish dark gray	Faint earth	0.0	2.9	2.6	75.2	9.7	9.7	0.0	85.9	2.82	Sand	<4.9	49	84
					2012/12/09	Cloudy, partly sunny	5.8	0.2	6.8	3	Reddish yellowish dark gray	Faint seaweed	0.0	9.0	25.2	59.1	4.4	2.4	0.0	84.3	2.854	Sand	<4.9	24	43
		Inogawa River	Kamakurabashi Bridge	Takasaki City	2013/01/30	Sunny	7.7	0.2	5.8	6	Dark grayish reddish yellow	None	24.2	32.7	25.2	15.8	0.6	1.4	0.0	89.5	2.827	Gravel/sand	<3.5	20	33
					2012/06/06	Cloudy	24.0	0.2	19.7	2	Dark grayish reddish yellow	Sludge	0.6	1.4	0.4	46.1	35.6	15.8	0.0	77.3	2.76	Mud	<4.9	56	69
					2012/09/11	Sunny	31.9	0.2	27.3	3	Reddish yellowish black	None	5.3	42.3	29.9	20.5	1.7	0.4	0.0	93.7	2.738	Sand/gravel	<3.5	6.5	12
					2012/12/05	Cloudy	11.1	0.3	11.6	3	Reddish yellowish dark gray	Fish and shellfish	10.8	37.9	45.4	3.8	0.7	1.3	0.0	88.9	2.793	Gravel/sand	<4.4	<6.8	11
					2013/01/23	Cloudy	7.4	0.5	9.8	3	Reddish yellowish dark gray	Fish and shellfish	4.9	15.9	31.9	39.0	6.0	2.4	0.0	88.1	2.774	Sand	<3.3	<5.2	9.6
		Karasugawa River	Iwakurabashi Bridge	Takasaki City/ Tamamura Town	2012/06/07	Sunny	29.0	0.3	24.8	2	Reddish yellowish black	None	0.0	0.3	0.3	26.6	35.2	37.6	0.0	61.5	2.571	Mud/sand	<6.3	40	61
					2012/09/12	Sunny	31.2	0.3	24.7	2	Yellowish dark gray	Sludge	0.0	0.2	0.0	9.8	37.1	52.8	0.1	59.2	2.362	Mud	<1.2	280	440
2012/12/05	Sunny				12.7	0.3	13.2	3	Yellow greenish dark gray	Faint mud	0.0	5.0	8.0	15.5	34.9	36.5	0.0	56.4	2.608	Silt	<7.6	110	200		
2013/01/23	Cloudy				9.7	0.4	11.5	4	Yellowish dark gray	Faint sludge	1.2	3.6	0.0	10.4	41.8	43.0	0.0	62.7	2.629	Silt	<7.9	140	240		
2012/06/13	Cloudy				21.0	0.3	16.0	5	Yellowish dark gray	None	0.0	0.0	25.4	72.4	1.6	0.6	0.0	89.4	2.7	Sand	<4.8	14	23		
Shinkanabashi Bridge	Uenomura Village	2012/09/12	Sunny	27.5	0.2	23.1	1	Dark grayish reddish yellow	None	1.5	23.2	45.3	24.0	3.9	2.1	0.0	93.1	2.718	Sand/gravel	<3.4	5.6	7.9			
		2012/12/13	Sunny	6.1	0.5	4.4	1	Reddish yellowish dark gray	None	23.1	19.5	16.6	35.7	4.5	0.9	0.0	89.4	2.735	Gravel/sand	<3.6	6.1	16			
		2013/01/31	Sunny	2.3	0.2	1.5	5	Grayish greenish yellow	None	22.8	56.9	11.2	4.7	2.4	2.0	0.0	91.3	2.645	Gravel/sand	<3.6	<4.9	5.3			
		2012/06/04	Sunny	28.8	0.5	21.8	5	Yellowish dark gray	None	1.0	18.1	25.3	48.7	5.3	1.8	0.0	92.4	2.699	Sand	<3.6	<5.8	<5.2			
Morioebashi Bridge	Kamamachi Town	2012/09/04	Sunny	28.2	0.5	24.0	3	Reddish yellowish black	None	0.9	17.9	19.8	50.6	9.1	1.7	0.0	93.6	2.703	Sand	<3.4	<5.4	7.4			
		2012/12/13	Sunny	5.2	0.5	3.0	3	Yellowish dark gray	None	0.0	6.2	46.0	47.0	0.8	0.0	0.0	92.2	2.727	Sand	<3.5	<5.8	7.3			
		2013/01/31	Sunny	0.3	0.5	0.3	5	Yellowish dark gray	None	0.0	42.4	49.4	6.9	0.3	1.1	0.0	94.7	2.673	Sand	<3.7	<5.5	<4.5			
		2012/06/05	Cloudy	23.0	0.1	21.5	5	Yellowish gray	None	3.5	14.5	45.3	34.7	0.3	1.7	0.0	93.4	2.725	Sand	<3.0	<3.8	4.5			
Tobakyo Bridge	Fujiokashi City/ Kamisatomachi Town	2012/09/03	Sunny	27.8	0.4	23.8	3	Very dark reddish yellow	None	3.5	35.1	18.0	32.7	6.1	4.6	0.0	93.2	2.698	Sand	<3.4	<5.9	4			
		2012/12/18	Sunny	12.6	0.4	8.6	3	Dark grayish reddish yellow	None	6.1	16.8	7.8	29.9	23.1	16.3	0.0	86.9	2.723	Sand	<3.1	11	29			
		2013/01/30	Sunny	6.9	0.2	7.6	1	Reddish yellowish black	None	12.7	38.0	39.8	6.0	1.0	2.5	0.0	91.5	2.687	Gravel/sand	<3.6	<5.7	9.7			
		2012/06/13	Cloudy	23.0	0.4	20.0	5	Reddish yellowish gray	None	6.2	14.1	4.0	58.9	10.2	6.6	0.0	89.9	2.698	Sand	<4.4	7.5	14			
Kannagawabashi Bridge	Kamisatomachi Town	2012/09/12	Sunny	24.8	0.2	25.2	2	Yellow reddish black	None	5.6	26.4	47.8	19.5	0.8	0.0	0.0	94.3	2.743	Gravel	<3.2	<4.8	7.5			
		2012/12/18	Sunny	8.4	0.4	8.9	4	Dark grayish reddish yellow	None	12.9	10.0	0.0	3.2	30.5	37.6	5.8	74.3	2.773	Clay	<4.4	11	22			
		2013/01/30	Sunny	6.0	0.2	6.9	2	Dark grayish greenish yellow	Sewage	0.0	1.5	7.9	44.2	29.2	17.2	0.0	69.6	2.655	Silt	<5.3	36	71			

Table 4.6.1.2 Gunma Pref. River (Sediment)

Sampling point				Sampling date	Weather	Air temperature °C	Full depth m	Sediment														Radioactive material concentrations (Bq/kg diox method)			Remarks	
No.	Water body	Point	Municipality					Mud temperature °C	Mud sampling depth cm	Color	Odor	Mechanical composition %								Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium Cs-134		Cs-137
												Medium gravel	Fine gravel	Coarse sand	Medium sand	Fine sand	Silt	Clay								
Rivers	Tonogawa River	Bandohashi Bridge	Honjoshi City	2012/06/05	Cloudy	25.0	0.1	21.6	10	Dark grayish reddish yellow	None	4.4	14.7	4.1	27.2	25.4	24.0	0.1	78.3	2.712	Mud	<5.3	35	58		
				2012/09/13	Sunny	30.3	0.4	25.0	5	Yellow reddish dark gray	None	5.9	14.3	1.4	68.6	9.3	0.4	0.0	93.0	2.845	Sand	<3.0	5.1	8		
				2012/12/18	Sunny	9.2	0.3	9.4	1	Dark grayish yellow	None	11.2	22.6	2.6	33.5	12.4	17.6	0.0	33.4	2.394	Silt	<13	92	160		
				2013/01/31	Sunny	7.4	0.4	10.3	1	Yellowish black	None	0.4	0.7	6.3	81.3	7.6	3.7	0.0	84.6	2.734	Sand	<3.8	6.7	17		
		Akagishirakawa River	In Shimohosomachi Town	Machishishi City	2012/06/08	Sunny	26.1	0.4	19.4	4	Greenish yellowish dark gray	None	4.2	10.4	6.5	48.3	22.4	8.1	0.0	86.2	2.861	Sand	<3.8	15	25	
					2012/09/11	Rain	22.8	0.3	25.4	6	Dark grayish reddish yellow	None	0.0	0.9	0.4	56.7	30.4	11.6	0.0	79.8	2.782	Silt	<4.4	27	51	
					2012/12/17	Cloudy	6.9	0.2	4.9	1	Dark grayish yellow	None	0.0	0.6	2.2	94.1	2.2	1.0	0.0	80.4	2.939	Sand	<4.0	20	41	
					2013/01/30	Sunny	10.0	0.2	5.0	2	Greenish yellowish black	None	0.0	1.2	2.7	61.3	19.8	15.0	0.0	80.3	2.853	Sand	<3.9	13	28	
					2012/06/07	Sunny	28.0	0.3	19.1	4	Yellow reddish dark gray	None	0.0	3.1	12.3	60.7	16.4	7.5	0.0	83.0	2.486	Sand	<6.1	31	44	
					2012/09/13	Sunny	29.1	0.2	24.6	2	Reddish yellowish black	None	9.8	21.7	5.8	57.5	2.2	3.0	0.0	93.0	2.947	Sand/gravel	<3.5	6.6	14	
	Momonokigawa River	Utsubobashi Bridge	Machishishi City	2012/12/17	Cloudy	7.1	0.2	9.4	3	Dark grayish reddish yellow	Earth	7.6	4.0	34.0	43.5	4.5	6.1	0.0	88.9	2.964	Sand	<3.6	11	27		
				2013/01/30	Sunny	10.2	0.2	12.2	5	Dark grayish reddish yellow	None	1.1	9.8	13.6	40.2	20.2	15.1	0.1	81.9	2.789	Sand/gravel	<3.8	5	8.2		
				2012/06/07	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to construction.
				2012/09/13	Sunny	33.0	0.40	23.1	5	Reddish yellowish black	None	5.3	6.8	0.0	53.3	27.9	6.7	0.0	80.1	2.770	Sand	<4.8	9.4	13		
	Aratogawa River	Okuharabashi Bridge	Machishishi City	2012/12/17	Cloudy	5.2	0.20	6.8	4	Dark grayish yellow	None	12.5	11.7	2.1	27.8	30.9	15.0	0.0	78.7	2.797	Sand	<4.1	<5.6	8.7		
				2013/01/30	Sunny	9.4	0.10	10.8	4	Dark grayish reddish yellow	None	0.4	10.5	5.5	70.2	9.7	3.7	0.0	88.2	2.912	Sand	<3.6	<4.3	8		
	Kasukawa River	Hozumbashi Bridge	Machishishi City	2012/06/05	Cloudy	26.0	0.20	21.7	4	Reddish yellowish black	None	2.2	1.8	6.8	79.2	7.6	2.4	0.0	90.5	2.876	Sand	<3.8	14	25		
				2012/09/13	Sunny	28.5	0.50	26.9	3	Dark grayish yellow red	None	3.2	21.3	53.3	22.0	0.3	0.0	0.0	93.2	2.864	Sand/gravel	<3.4	8.5	18		
				2012/12/17	Rain	5.4	0.15	9.2	4	Dark grayish reddish yellow	None	17.6	8.6	1.0	62.2	8.8	1.8	0.0	89.6	2.950	Sand/gravel	<3.8	10	21		
				2013/01/31	Sunny	5.9	0.50	8.4	3	Dark grayish greenish yellow	None	5.4	0.6	25.6	65.4	1.8	1.3	0.0	89.2	2.814	Sand	<4.7	6.5	16		
Hirosegawa River	Nakajimbashi Bridge	Isezaki City	2012/06/05	Cloudy	25.0	0.20	20.7	4	Yellow reddish black	None	0.0	0.2	2.3	70.5	20.2	6.8	0.1	85.1	2.726	Sand	<4.8	26	42			
			2012/09/13	Sunny	30.6	0.60	24.3	3	Reddish yellowish dark gray	None	0.0	1.8	0.8	89.1	5.0	3.3	0.0	84.9	2.871	Sand	<3.8	17	24			
			2012/12/18	Sunny	8.4	0.30	10.5	2	Grayish yellow	None	34.9	17.7	0.2	14.6	15.6	16.5	0.5	88.5	2.771	Clay/gravel	<3.9	<6.0	<4.2			
			2013/01/31	Sunny	8.8	0.20	9.2	4	Reddish yellowish black	Faint sludge	11.9	1.3	3.1	60.0	15.5	8.2	0.0	80.0	2.801	Sand/silt	<3.7	13	22			
			2012/06/12	Cloudy	23.0	0.20	15.8	3	Yellow reddish dark gray	None	11.3	30.0	26.3	23.0	5.2	4.2	0.0	89.8	2.733	Sand	<5.8	61	86			
			2012/12/14	Sunny	2.1	0.20	3.7	2	Reddish yellowish dark gray	None	0.0	2.9	6.6	48.5	17.9	23.9	0.2	66.5	2.612	Sand	<5.4	91	170			
Hayakawa River	Hayakawabashi Bridge	Otashi City	2012/06/12	Light rain	23.0	0.20	18.4	5	Greenish yellowish dark gray	None	0.0	0.1	0.0	47.2	42.3	10.4	0.0	78.3	2.759	Sand	<5.1	63	120			
			2012/12/18	Sunny	12.1	0.40	10.7	3	Dark grayish yellow	None	0.0	2.9	4.7	82.8	5.6	3.9	0.0	87.9	2.825	Sand	<4.5	27	50			
Tonogawa River	Tonesoeki Weir	Chiyodamachi Town/ Gyodamachi City	2012/05/28	Sunny	25.5	0.45	19.7	5	Very dark yellow	None	0.0	0.0	0.0	12.4	46.7	41.0	0.0	66.7	2.626	Mud	<7.0	160	250			
			2012/07/11	Sunny	29.0	0.60	22.6	5	Greenish yellowish black	Sludge	0.0	0.0	0.0	9.8	40.5	49.5	0.1	62.9	2.389	Silt	<7.4	130	210			
			2012/08/09	Sunny	30.7	0.70	23.6	10	Dark grayish greenish yellow	Sludge	0.0	0.1	0.0	15.3	54.7	30.0	0.0	69.2	2.641	Sand	<6.4	110	170			
			2012/10/08	Sunny	23.6	0.60	20.3	5	Yellow reddish black	None	0.0	0.0	0.4	10.8	28.2	58.5	2.2	54.5	2.512	Sand	<11	230	410			
			2012/10/30	Cloudy	17.7	0.60	15.5	6	Reddish yellowish dark gray	Sludge	0.0	0.0	0.0	8.1	42.5	48.2	1.3	59.2	2.62	Silt	<8.7	130	250			
			2012/12/18	Cloudy	10.1	0.40	8.2	5	Dark grayish yellow	None	0.0	1.4	0.0	44.4	48.2	6.0	0.0	82.3	2.718	Sand	<4.1	22	50			
			2013/01/31	Sunny	8.5	0.30	5.7	5	Dark grayish reddish yellow	None	6.3	6.4	1.2	31.7	46.1	8.3	0.0	83.7	2.75	Sand	<4.7	30	53			
			2012/05/29	Sunny	18.0	0.90	12.0	5	Very dark yellow	None	12.6	23.7	37.6	20.0	2.4	3.7	0.0	85.7	2.783	Sand	<4.6	40	63			
			2012/07/11	Sunny	17.8	0.60	14.8	3	Dark grayish yellow	None	1.2	15.9	35.5	35.2	6.5	5.6	0.0	87.0	2.879	Sand	<4.8	54	82			
			2012/08/08	Cloudy	19.0	0.40	16.5	10	Very dark yellow red	None	5.7	19.7	31.4	31.9	6.3	5.0	0.0	87.9	2.881	Sand	<5.1	78	120			
Kogunogawa River	Kayanobashi Bridge	Kiryushi City	2012/10/08	Sunny	18.0	0.50	14.0	5	Dark grayish yellow red	None	1.5	12.6	12.6	52.8	12.6	8.0	0.0	82.4	2.803	Sand	<5.2	88	140			
			2012/10/29	Sunny	12.6	0.50	12.6	4	Greenish yellowish dark gray	None	3.7	21.3	36.8	28.9	3.4	5.7	0.0	91.1	3.046	Sand	<4.0	45	75			
			2012/12/12	Sunny	0.3	0.50	3.6	3	Reddish yellowish dark gray	None	3.5	12.6	46.3	22.8	6.8	8.0	0.0	80.2	2.792	Sand	<5.3	67	120			
			2013/02/05	Sunny	-1.5	0.40	3.2	7	Dark grayish reddish yellow	None	9.0	38.6	14.1	20.6	8.8	8.9	0.1	86.8	2.749	Sand	<5.8	46	93			
			2012/06/12	Cloudy	26.0	0.60	16.7	10	Reddish yellowish dark gray	None	0.0	0.5	7.8	85.1	5.6	0.9	0.0	90.9	2.805	Sand	<4.3	26	34			
			2012/09/20	Sunny	28.5	0.50	20.8	3	Dark grayish greenish yellow	None	0.0	0.9	12.0	84.0	1.6	1.5	0.0	90.2	2.754	Sand	<5.0	24	32			
Watarasegawa River	Taktasudo	Kiryushi City	2012/12/12	Sunny	8.0	0.40	8.8	5	Yellowish dark gray	None	0.0	0.1	12.0	65.7	16.4	5.8	0.0	81.0	2.79	Sand	<4.3	30	54			
			2013/02/04	Sunny, then cloudy	8.5	0.55	6.1	5	Yellowish dark gray	None	0.0	0.0	2.8	70.9	21.4	4.9	0.0	85.6	2.864	Sand	<4.4	20	44			

Table 4.6.1.2 Gunma Pref. River (Sediment)

Sampling point				Sampling date	Weather	Air temperature °C	Full depth m	Sediment														Radioactive material concentrations (Bq/kg dived mud)			Remarks	
No.	Water body	Point	Municipality					Mud temperature °C	Mud sampling depth cm	Color	Odor	Mechanical composition %							Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium			
												Medium gravel	Fine gravel	Course sand	Medium sand	Fine sand	Silt	Clay					Cs-134	Cs-137		
R i v e r s	T o n e g a w a R i v e r	Watarasegawa River	Intake for Akawayosui water channel	Kiryushi City	2012/05/28	Cloudy	23.0	0.80	17.9	5	Very dark greenish yellow	None	4.0	6.1	39.9	48.1	1.1	0.8	0.0	92.1	2.788	Sand	<4.0	32	50	
					2012/07/11	Sunny	32.0	0.50	21.7	5	Yellow greenish white	None	0.9	3.9	13.5	76.3	3.7	1.6	0.0	88.8	2.764	Sand	<4.0	23	46	
					2012/08/08	Sunny	31.2	0.50	23.0	5	Very dark reddish yellow	None	7.2	4.1	1.3	56.3	25.2	5.8	0.0	85.7	2.745	Sand	<5.0	29	37	
					2012/10/10	Sunny	22.0	0.60	18.1	2	Dark grayish reddish yellow	None	7.8	11.8	33.6	43.7	2.4	0.7	0.0	91.0	2.794	Sand	<4.0	28	46	
					2012/10/30	Cloudy	13.1	1.30	14.6	4	Dark grayish reddish yellow	None	9.6	13.0	30.7	39.8	3.0	3.9	0.0	88.6	2.817	Sand	<4.2	27	53	
					2012/12/12	Sunny	8.8	1.20	8.3	2	Reddish yellowish dark gray	None	11.7	14.7	6.0	56.6	7.2	3.9	0.0	86.7	2.736	Sand	<4.7	27	49	
		2013/02/07	Cloudy	3.5	1.40	5.2	10	Dark grayish reddish yellow	None	15.1	9.9	8.3	54.5	7.7	4.5	0.0	86.6	2.795	Sand	<4.4	30	51				
		2012/06/14	Cloudy	26.0	0.15	18.6	5	Yellow greenish black	Sludge	0.0	0.0	0.0	0.0	8.9	91.0	0.1	56.0	2.42	Mud	<9.5	240	390				
		2012/12/19	Sunny	5.5	0.30	7.5	3	Greenish yellowish black	None	17.7	10.5	20.5	39.7	7.1	4.5	0.0	82.1	2.92	Sand/gravel	<4.8	64	100				
		2013/01/31	Sunny	11.0	0.20	6.3	4	Dark grayish yellow red	Faint sewage	4.9	10.7	1.2	45.7	22.0	15.4	0.0	82.4	2.832	Sand	<4.7	67	130				
	R i v e r	S y s t e m	Kannonbashi Bridge	Kiryushi City	2012/06/12	Cloudy	23.5	0.25	13.6	4	Yellow reddish dark gray	None	0.0	1.1	5.3	64.0	23.1	6.4	0.0	84.1	2.787	Sand	<6.1	90	150	
					2012/09/20	Sunny	25.3	0.40	22.6	5	Dark grayish yellow	None	0.0	6.9	11.9	59.1	17.1	5.0	0.0	86.8	2.844	Sand	<5.3	49	79	
					2012/12/12	Sunny	4.8	0.20	7.1	3	Dark grayish reddish yellow	None	1.3	0.8	15.6	66.7	9.0	6.5	0.0	81.1	2.826	Sand	<5.3	33	67	
					2013/02/05	Sunny	10.3	0.40	5.8	4	Dark grayish reddish yellow	None	0.0	0.8	9.1	55.0	23.6	11.6	0.0	78.1	2.71	Sand	<6.8	75	160	
			2012/05/28	Rain	20.0	0.55	18.3	5	Very dark greenish yellow	None	18.6	35.9	13.5	25.2	4.5	2.3	0.0	93.5	2.729	Sand	<4.5	40	73			
			2012/07/11	Sunny	32.0	0.40	22.6	2	Dark grayish greenish yellow	None	1.1	6.5	17.5	45.8	19.7	9.3	0.0	81.3	2.723	Sand	<6.5	93	150			
			2012/08/08	Sunny	28.5	0.40	23.5	5	Very dark reddish yellow	None	5.7	35.5	30.8	11.5	10.7	5.7	0.0	88.6	2.74	Sand	<4.1	53	87			
			2012/10/10	Sunny	23.2	0.25	20.2	3	Dark grayish yellow red	None	7.8	33.2	50.1	6.7	0.7	1.4	0.0	91.3	2.766	Sand	<5.0	34	61			
	R i v e r	S y s t e m	Kiryugawa River	Sakabashi Bridge	Kiryushi City/ Ashikagashi City	2012/10/30	Sunny	13.2	1.00	17.1	10	Dark grayish yellow	None	0.0	16.8	65.8	17.2	0.1	0.0	0.0	92.7	2.710	Sand	<4.2	48	70
						2012/12/14	Sunny	2.7	0.30	7.0	3	Dark grayish reddish yellow	None	31.2	22.9	16.1	25.5	1.7	2.6	0.0	92.1	2.727	Gravel/sand	<4.7	38	67
						2013/02/07	Sunny	4.9	1.20	9.0	6	Dark grayish reddish yellow	None	0.0	12.3	48.1	37.9	1.1	0.7	0.0	91.0	2.726	Sand	<4.6	36	68
						2012/06/14	Cloudy	23.5	2.00	19.7	20	Greenish dark gray	Sludge	0.0	0.7	5.1	10.4	38.0	45.8	0.0	39.3	2.321	Mud	<13	440	640
						2012/12/10	Sunny	7.6	1.40	8.6	5	Greenish yellowish dark gray	Faint sludge	0.0	0.2	4.6	28.4	32.1	34.7	0.0	36.3	2.344	Mud/silt	<21	580	980
						2013/01/31	Sunny	3.6	1.00	7.3	15	Dark grayish yellow green	Humus	0.0	0.2	0.0	7.1	41.8	50.7	0.2	34.4	2.371	Silt	<11	51	90
	R i v e r	S y s t e m	Yatagawa River	Togobashi Bridge	Meiwamachi Town/ Itakuramachi Town	2012/06/14	Cloudy	28.0	0.20	19.9	5	Yellow greenish dark gray	Sludge	2.5	4.6	0.3	23.3	37.2	31.2	0.9	58.0	2.548	Mud	<11	250	390
						2012/12/19	Sunny	3.0	0.60	9.3	3	Dark grayish yellow green	Mad	0.0	1.1	2.2	15.6	24.0	55.3	1.8	67.7	2.617	Clay	<5.0	<8.0	8.7
						2013/01/31	Sunny	4.6	0.20	7.8	10	Reddish yellowish black	Sludge	0.0	0.0	0.0	20.8	39.9	39.3	0.0	59.6	2.583	Silt	<7.4	170	320

Table 4.6.1.3 Gunma Pref. River (Surrounding Environment)

Sampling point				Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)													Remarks			
No.	Water body	Point	Municipality				Left bank						Right bank						Air dose μSv/h				
							Soil			Radioactive material concentrations (Bq/kg (dry))			Soil			Radioactive material concentrations (Bq/kg (dry))							
							Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium		Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium						
				Cs-134	Cs-137					Cs-134	Cs-137												
R i v e r S y s t e m	T o n e g a w a R i v e r	Hiroeshashi Bridge	Minakamurachi Town	2012/05/30	Sunny	20.0	Very dark reddish yellow	Earth	Loamy	<16	870	1,300	0.30	Very dark reddish yellow	Earth	Loamy	<11	460	720	0.27			
				2012/09/10	Sunny	22.5	Dark reddish yellow	Faint earth	Loamy	<13	640	1,100	0.28	Very dark reddish yellow	Faint earth	Loamy	<13	750	1,200	0.26			
				2012/11/29	Cloudy	1.3	Very dark yellow red	Faint earth	Loamy	<24	1,400	2,600	0.30	Dark yellow red	Faint earth	Loamy	<16	780	1,400	0.28			
				2013/01/29	Snow	-1.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.
				2012/05/30	Sunny	23.0	Very dark yellow red	Earth	Loamy	<7.9	140	210	0.14	Very dark yellow red	Earth	Loamy	<10	410	620	0.12			
		Tsukiyonobashi Bridge	Minakamurachi Town	2012/07/10	Sunny	29.0	Very dark yellow	Faint earth	Loamy	<6.4	150	230	0.13	Very dark yellow red	Faint earth	Loamy	<7.6	140	230	0.12			
				2012/08/07	Sunny	24.0	Very dark yellow red	Faint earth	Loamy	<6.3	120	200	0.14	Dark reddish yellow	Faint earth	Loamy	<8.0	230	360	0.12			
				2012/08/29	Sunny	30.8	Very dark reddish yellow	Earth	Loamy	<6.8	180	300	0.11	Dull reddish yellow	Earth	Loamy	<9.3	230	380	0.11			
				2012/09/27	Sunny	24.1	Dark reddish yellow	Earth	Loamy	<7.7	200	350	0.13	Dull reddish yellow	Earth	Loamy	<9.7	350	600	0.13			
				2012/11/27	Cloudy	4.7	Very dark yellow red	Earth	Loamy	<7.5	180	320	0.13	Very dark yellow red	Faint earth	Loamy	<13	340	610	0.12			
	Akayagawa River	Koudobashi Bridge	Minakamurachi Town	2013/01/22	Sunny	3.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.	
				2012/05/30	Sunny	24.0	Very dark reddish yellow	Earth	Loamy	<9.5	390	620	0.09	Very dark reddish yellow	Earth	Loamy	<6.3	140	220	0.10			
				2012/09/10	Sunny	24.4	Dark reddish yellow	Faint earth	Loamy	<8.4	330	510	0.08	Very dark reddish yellow	Earth	Loamy	<5.7	120	210	0.11			
				2012/11/27	Snow	6.1	Very dark reddish yellow	Faint earth	Loamy	<8.2	170	330	0.10	Very dark yellow red	Earth	Loamy	<8.2	240	440	0.10			
				2013/01/22	Sunny	7.5	Dull reddish yellow	Faint earth	Sandy	<5.4	51	79	0.10	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.	
	S a k u r a g a w a R i v e r	Sakuragawa River	In Oozaya Yachi	Kawabamura Village	2012/05/30	Sunny	21.0	Very dark yellow	Earth	Loamy	<16	1,100	1,600	0.38	Very dark reddish yellow	Earth	Loamy	<17	1,100	1,700	0.32		
					2012/07/09	Sunny	23.5	Very dark yellow red	Faint earth	Loamy	<12	840	1,400	0.35	Very dark yellow red	Faint earth	Loamy	<12	640	1,000	0.28		
					2012/08/07	Sunny	27.5	Dark grayish reddish yellow	Faint earth	Loamy	<14	730	1,300	0.39	Very dark yellow red	Faint earth	Loamy	<11	450	770	0.39		
					2012/08/29	Sunny	26.9	Dark yellow	Earth	Loamy	<21	2,300	3,700	0.31	Very dark yellow red	Earth	Loamy	<13	570	890	0.25		
					2012/09/27	Cloudy	22.7	Dark reddish yellow	Earth	Loamy	<23	1,900	3,100	0.35	Deep yellow red	Earth	Loamy	<15	730	1,200	0.28		
2012/11/27					Snow	2.6	Very dark reddish yellow	Earth	Loamy	<9.5	520	910	0.35	Very dark reddish yellow	Earth	Loamy	<20	1,400	2,500	0.33			
2013/01/29					Sunny	1.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.
2012/05/30					Sunny	19.0	Very dark yellow	Earth	Loamy	<6.5	210	320	0.14	Reddish yellowish black	Earth	Loamy	<11	340	530	0.16			
2012/09/10					Sunny	30.4	Very dark reddish yellow	Faint earth	Loamy	<7.6	160	260	0.13	Very dark yellow	Faint earth	Loamy	<14	760	1,300	0.15			
K a t a s h i n a m u r a V i l l a g e					Katashinagawa River	Tonemuchitakaya	Numatsuchi City	2012/11/27	Snow	5.0	Very dark yellow red	Earth	Loamy	<8.4	280	510	0.15	Very dark reddish yellow	Earth	Loamy	<12	410	700
	2013/01/29	Sunny	-2.3	-				-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.	
	2012/05/31	Sunny	18.9	Soft reddish yellow				Earth	Sandy	<4.9	22	36	0.12	Dull reddish yellow	Earth	Sandy	<5.6	48	83	0.12			
	2012/07/10	Sunny	28.0	Grayish yellow				None	Sandy	<5.0	30	43	0.10	Very dark reddish yellow	None	Loamy	<10	340	550	0.11			
	2012/08/07	Sunny	32.0	Dark grayish reddish yellow				Faint earth	Sandy	<5.9	21	41	0.09	Very dark yellow red	Faint earth	Loamy	<11	300	490	0.14			
	2012/08/29	Sunny	26.5	Light grayish yellow				None	Sandy	<5.2	23	40	0.10	Dark yellow red	Earth	Sandy	<7.6	200	320	0.11			
	2012/09/28	Sunny	21.0	Dark reddish yellow				Earth	Loamy	<12	300	490	0.13	Very pale greenish yellow	Faint earth	Sandy	<4.5	19	37	0.13			
	2012/11/27	Sunny	8.0	Dull reddish yellow				Faint earth	Sandy	<6.3	57	84	0.09	Soft reddish yellow	Faint earth	Sandy	<5.2	17	31	0.11			
	2013/01/22	Sunny	1.4	-				-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.
	2012/05/29	Sunny	26.0	Very dark yellowish red				Earth	Loamy	<13	630	940	0.11	Very dark reddish yellow	Earth	Loamy	<6.2	140	210	0.10			
F u t a b a s h i B r i d g e	Futaebashi Bridge	Numatsuchi City	Numatsuchi City	2012/07/10	Sunny	30.0	Very dark yellow red	Faint earth	Loamy	<11	350	580	0.11	Dull yellow	Faint earth	Loamy	<8.3	310	460	0.12			
				2012/08/07	Sunny	32.5	Very dark yellow red	Faint earth	Loamy	<13	640	1,100	0.11	Dark yellow red	Faint earth	Loamy	<7.8	250	410	0.12			
				2012/08/29	Sunny	32.0	Dark reddish yellow	Earth	Loamy	<12	580	920	0.09	Dark reddish yellow	Earth	Loamy	<6.9	210	330	0.12			
				2012/09/28	Sunny	22.4	Dark yellow red	Earth	Loamy	<16	920	1,600	0.10	Very dark yellow red	Earth	Loamy	<8.9	580	640	0.10			
				2012/11/28	Cloudy	3.7	Very dark yellow red	Faint earth	Loamy	<8.3	240	450	0.10	Very dark yellow red	Faint earth	Loamy	<5.5	91	170	0.11			
				2013/01/23	Cloudy	5.5	Very dark yellow red	Earth	Loamy	<15	630	1,100	0.10	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.	
				2012/05/29	Cloudy	14.5	Dark reddish yellow	Earth	Loamy	<5.8	38	53	0.09	Very dark yellow red	Earth	Loamy	<6.9	140	210	0.13			
				2012/08/30	Sunny	22.9	Dull reddish yellow	Earth	Loamy	<5.4	76	110	0.06	Dark grayish reddish yellow	Earth	Loamy/sandy	<4.1	61	92	0.08			
				2012/11/28	Sunny	0.5	Dark yellow red	Earth	Loamy	<11	310	580	0.09	Very dark yellow red	Earth	Loamy	<6.3	130	220	0.09			
				2013/01/23	Sunny	-0.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.
S h i r a s u n a g a w a R i v e r	Shittasubashi Bridge	Nakanomachi Town	Nakanomachi Town	2012/06/11	Cloudy	17.0	Very dark yellow	Faint earth	Loamy	<9.4	110	180	0.06	Very dark yellow	Earth	Loamy	<10	400	650	0.10			
				2012/09/27	Sunny	17.5	Dark yellow red	Faint earth	Loamy	<8.4	140	210	0.08	Dull yellow red	Earth	Loamy	<5.7	83	140	0.09			
				2012/11/28	Sunny	4.8	Dark yellow red	Faint earth	Loamy	<8.4	130	240	0.06	Very dark reddish yellow	Earth	Loamy	<8.7	180	320	0.08			
				2013/01/23	Sunny	2.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground.	

Table 4.6.1.3 Gunma Pref. River (Surrounding Environment)

Sampling point				Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)																Remarks	
No.	Water body	Point	Municipality				Left bank									Right bank								
							Soil			Radioactive material concentrations (Bq/kg (dry))						Air dose μSv/h	Soil			Radioactive material concentrations (Bq/kg (dry))				
							Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium		Radioactive iodine I-131	Radioactive cesium	Radioactive iodine I-131		Radioactive cesium	Radioactive cesium	Air dose μSv/h					
Cs-134	Cs-137	Cs-134	Cs-137																					
10	Agatsumagawa River	Downstream of Azumabashi Bridge	Hisagatsumamachi Town	2012/05/30	Sunny	17.5	Very dark yellow	Earth	Loamy	<13	890	1,400	0.29	Dark yellow	Earth	Loamy	<5.7	100	150	0.09				
				2012/07/10	Sunny	28.0	Dark reddish yellow	Faint earth	Sandy	<7.9	240	390	0.06	Very dark reddish yellow	Faint earth	Loamy	<3.8	38	62	0.09				
				2012/08/07	Sunny	32.3	Dark reddish yellow	Faint earth	Loamy	<8.3	410	690	0.21	Very dark yellow green	Faint earth	Loamy	<12	310	490	0.10				
				2012/08/30	Sunny	25.2	Very dark yellow red	Earth	Loamy	<12	500	800	0.11	Greenish yellowish gray	Earth	Loamy	<7.2	280	460	0.17				
				2012/09/27	Sunny	28.2	Dark yellow red	Earth	Loamy	<9.1	240	410	0.12	Dark reddish yellow	Earth	Loamy	<5.2	25	40	0.08				
	11	Nakutagawa River	Tomodabashi Bridge	Takayamamura Village	2012/11/28	Sunny	9.1	Very dark yellow red	Earth	Loamy	<5.5	41	58	0.10	Very dark reddish yellow	Earth	Loamy	<17	790	1400	0.11			
					2013/01/23	Sunny	5.0	Very dark reddish yellow	Faint earth	Sandy/skeletal	<3.8	<6.4	7.7	0.09	Very dark yellow red	Earth	Loamy	<8.8	220	420	0.06			
					2012/06/15	Sunny	23.0	Dark yellow red	None	Slightly loamy	<5.9	130	180	0.08	Dark yellow red	None	Loamy	<8.1	220	350	0.07			
					2012/09/11	Sunny	28.3	Very dark reddish yellow	Earth	Loamy	<13	360	570	0.11	Dark reddish yellow	Earth	Loamy	<9.9	200	340	0.08			
					2012/11/28	Sunny	5.5	Dark yellow red	Faint earth	Loamy	<6.6	160	270	0.08	Dark reddish yellow	Earth	Loamy	<6.2	100	210	0.07			
12	Agatsumagawa River	Agatsumabashi Bridge	Shibukawashi City	2013/01/29	Sunny	4.5	-	-	-	-	-	-	-	-	-	-	<8.4	130	270	0.06	Left bank's banks to collect samples due to rain on the ground.			
				2012/05/29	Cloudy	25.5	Very dark reddish yellow	Earth	Loamy	<12	360	560	0.21	Very dark reddish yellow	Earth	Loamy	<13	550	850	0.11				
				2012/06/27	Sunny	28.0	Very dark reddish yellow	Earth	Loamy	<12	440	630	0.12	Very dark yellow	Earth	Loamy	<13	480	760	0.11				
				2012/07/17	Sunny	34.5	Very dark reddish yellow	Faint earth	Loamy	<9.5	440	720	0.09	Very dark reddish yellow	Faint earth	Loamy	<12	250	370	0.12				
				2012/08/08	Sunny	25.2	Dull yellow red	Faint earth	Loamy	<14	460	750	0.12	Very dark yellow red	Faint earth	Loamy	<11	530	850	0.14				
				2012/08/29	Sunny	27.2	Dull reddish yellow	Earth	Loamy	<15	890	1,400	0.10	Dark yellow red	Earth	Loamy	<12	630	1,000	0.09				
				2012/11/29	Sunny	11.2	Very dark yellow red	Earth	Loamy	<9.7	280	490	0.10	Very dark yellow red	Faint earth	Loamy	<12	550	980	0.10				
				2013/01/24	Sunny	1.8	Dark reddish yellow	Earth	Loamy	<12	270	500	0.09	Very dark reddish yellow	Earth	Loamy	<17	1,100	1,900	0.10				
				2012/05/29	Cloudy	28.0	Yellowish reddish black	Earth	Loamy	<11	510	830	0.10	Very dark yellow red	Earth	Loamy	<11	480	730	0.10				
				2012/06/26	Sunny	24.0	Very dark reddish yellow	Earth	Loamy	<9.8	390	620	0.10	Very dark reddish yellow	Earth	Loamy	<14	820	1300	0.10				
13	Tonegawa River	Taisohbashi Bridge	Shibukawashi City	2012/07/17	Cloudy	27.0	Very dark yellow red	Faint earth	Loamy	<7.6	160	280	0.11	Very dark reddish yellow	Faint earth	Loamy	<5.5	72	110	0.08				
				2012/08/08	Sunny	29.7	Dark yellow	Faint earth	Loamy	<9.1	270	410	0.15	Very dark yellow red	Faint earth	Loamy	<6.6	160	240	0.12				
				2012/08/31	Cloudy	24.8	Dark grayish reddish yellow	Earth	Sandy	<8.4	250	420	0.12	Dark grayish reddish yellow	Earth	Loamy	<8.6	180	300	0.08				
				2012/11/29	Cloudy	16.6	Very dark yellow red	Faint earth	Loamy	<12	490	800	0.09	Dark yellow red	Faint earth	Loamy	<8.3	180	320	0.08				
				2013/01/24	Sunny	1.4	Dark reddish yellow	Earth	Loamy	<12	580	1,100	0.10	Very dark reddish yellow	Earth	Loamy	<11	420	720	0.10				
				2012/06/07	Sunny	19.9	Greenish yellowish black	Earth	Loamy	<6.8	170	260	0.07	Very dark yellow	Earth	Loamy	<7.4	160	220	0.07				
14	Takizawagawa River	Shintakizawabashi Bridge	Shibukawashi City/ Yoshiokamachi Town	2012/09/12	Sunny	24.2	Dark reddish yellow	Earth	Loamy	<9.8	470	760	0.07	Dark reddish yellow	Earth	Sandy	<4.2	34	63	0.07				
				2012/11/30	Cloudy	9.1	Very dark yellow red	Faint earth	Loamy	<7.8	240	390	0.07	Very dark reddish yellow	Earth	Loamy	<5.7	96	160	0.06				
				2013/01/24	Sunny	9.3	Very dark reddish yellow	Earth	Loamy/skeletal	<7.1	160	290	0.06	Very dark reddish yellow	Earth	Loamy	<7.3	160	310	0.07				
				2012/06/07	Sunny	26.5	Dark reddish yellow	Earth	Loamy	<5.5	11	24	0.09	Very dark reddish yellow	Earth	Loamy	<7.4	150	240	0.06				
15	Tonegawa River	Gunmohashi Bridge	Maebashi City	2012/09/11	Cloudy	31.2	Dull reddish yellow	Earth	Loamy	<5.4	10	22	0.08	Dark reddish yellow	Earth	Loamy	<7.9	95	160	0.07				
				2012/12/06	Cloudy	11.1	Dark yellow red	Earth	Loamy	<6.0	<9.2	11	0.05	Very dark yellow red	Earth	Loamy	<7.6	90	160	0.07				
				2013/01/24	Sunny	10.1	Deep reddish yellow	Earth	Loamy	<6.3	15	34	0.05	Very dark yellow red	Earth	Loamy	<7.7	75	130	0.06				
				2012/06/07	Cloudy	29.0	Very dark yellow red	Earth	Loamy	<5.1	22	37	0.06	Very dark reddish yellow	Earth	Loamy	<6.0	44	79	0.06				
				2012/09/13	Sunny	35.7	Dark reddish yellow	Earth	Loamy	<5.4	57	110	0.06	Dull reddish yellow	Earth	Loamy	<5.2	28	46	0.06				
16	Tonegawa River	Fukushimaishi Bridge	Tamamura City	2012/12/05	Cloudy	11.6	Very dark yellow red	Earth	Loamy	<4.9	24	45	0.06	Very dark yellow red	Earth	Loamy/skeletal	<5.5	46	73	0.07				
				2013/01/24	Sunny	12.2	Dark reddish yellow	Earth	Loamy	<5.2	40	88	0.06	Very dark reddish yellow	Earth	Loamy	<6.5	49	87	0.07				
				2012/06/06	Cloudy	23.0	Very dark yellow red	Earth	Loamy	<7.5	240	390	0.14	Very dark reddish yellow	Earth	Loamy	<17	970	1,500	0.16				
				2012/09/11	Cloudy	27.7	Very dark reddish yellow	Earth	Loamy	<11	400	680	0.13	Very dark reddish yellow	Earth	Loamy	<13	500	870	0.16				
17	Nagaigawa River	Kamigondabashi Bridge	Takasaki City	2012/12/04	Cloudy, partly sunny	8.1	Very dark yellow green	Earth	Loamy/skeletal	<9.5	380	690	0.12	Very dark yellow green	Grass	Loamy/skeletal	<13	560	1,000	0.14				
				2013/01/23	Sunny	3.1	-	-	-	-	-	-	-	-	-	<18	950	1,800	0.13	Left bank's banks to collect samples due to rain on the ground.				
				2012/06/06	Cloudy	22.0	Very dark yellow	Earth	Loamy	<8.7	280	450	0.12	Very dark yellow	Earth	Loamy	<12	580	930	0.17				
				2012/09/11	Cloudy	27.6	Very dark reddish yellow	Earth	Loamy	<11	290	450	0.12	Very dark reddish yellow	Earth	Loamy	<13	800	1,300	0.15				
18	Karasugawa River	Karasugawabashi Bridge	Takasaki City	2012/12/04	Sunny	6.3	Very dark yellow red	Earth	Loamy	<12	420	740	0.12	Very dark yellow red	Earth	Loamy	<7.1	290	500	0.14				
				2013/01/23	Sunny	4.8	Very dark yellow red	Earth	Loamy	<6.2	130	240	0.10	-	-	-	-	-	-	-	Right bank's banks to collect samples due to rain on the ground.			
				2012/06/06	Rain	18.5	Very dark yellow red	Earth	Loamy	<8.5	200	310	0.15	Very dark yellow red	Earth	Loamy	<12	330	510	0.18				
				2012/09/06	Cloudy	29.4	Very dark yellow red	Earth	Loamy	<9.7	430	700	0.17	Very dark yellow red	Earth	Loamy/skeletal	<8.8	280	460	0.16				
				2012/12/09	Cloudy	4.1	Very dark yellow red	Earth	Loamy	<11	340	610	0.14	Very dark yellow red	Earth	Loamy	<11	330	570	0.15				
19	Usuigawa River	Nakasebashi Bridge	Annakashi City	2013/01/31	Sunny	3.8	Very dark reddish yellow	Earth	Loamy	<7.2	110	210	0.17	Very dark reddish yellow	Earth	Loamy	<8.5	230	400	0.14				

Table 4.6.1.3 Gunma Pref. River (Surrounding Environment)

Sampling point				Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)													Remarks		
No.	Water body	Point	Municipality				Left bank						Right bank									
							Soil			Radioactive material concentrations (Bq/kg (dry))			Air dose μSv/h	Soil			Radioactive material concentrations (Bq/kg (dry))					
							Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium			Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium			Air dose μSv/h	
				Cs-134	Cs-137					Cs-134	Cs-137											
20	Usugawa River	Hanatakabashi Bridge	Takasaki City	2012/06/06	Cloudy	21.8	Dark reddish yellow	Earth	Loamy	<-7.3	210	320	0.08	Very dark reddish yellow	Earth	Loamy	<-9.0	200	300	0.09		
				2012/09/19	Cloudy	24.0	Very dark yellow	Earth	Loamy	<-6.5	91	160	0.08	Very dark reddish yellow	Earth	Loamy	<-8.6	180	290	0.06		
				2012/12/05	Sunny	6.3	Very dark yellow red	Earth	Loamy	<-6.5	69	140	0.07	Dark yellow red	Earth	Loamy	<-8.1	180	300	0.09		
				2013/01/23	Sunny	7.7	Very dark yellow red	Earth	Loamy	<-6.1	93	180	0.06	Very dark reddish yellow	None	Loamy	<-9.2	150	270	0.08		
	21	Kabaragawa River	Yadakwabashi Bridge	Shimontama Town	2012/06/04	Sunny	27.5	Very dark reddish yellow	Earth	Sandy/loamy	<-6.1	140	220	0.11	Very dark yellow	Earth	Clayish/sandy	<-7.5	180	270	0.16	
					2012/09/19	Cloudy	24.3	Very dark reddish yellow	Earth	Loamy	<-6.1	130	190	0.10	Dark yellow	Earth	Loamy/sandy	<-7.1	240	430	0.14	
					2012/12/13	Sunny	5.8	Very dark reddish yellow	Earth	Loamy	<-6.9	190	350	0.10	Dark reddish yellow	Earth	Loamy/sandy	<-7.9	180	300	0.14	
					2013/01/31	Sunny	5.9	Very dark reddish yellow	Faint earth	Loamy	<-5.3	88	140	0.11	Very dark yellow	None	Loamy	<-8.8	310	570	0.15	
	22	Kabaragawa River	Kabaragawabashi Bridge	Takasaki City/ Fujikashi City	2012/06/05	Cloudy	23.0	Very dark yellow red	Earth	Loamy	<-8.0	48	85	0.06	Very dark reddish yellow	Earth	Loamy	<-7.2	28	48	0.05	
					2012/09/26	Sunny	27.1	Dark reddish yellow	Faint earth	Loamy	<-7.8	92	140	0.06	Dark reddish yellow	Earth	Loamy	<-5.8	56	110	0.06	
					2012/12/05	Sunny	9.4	Very dark reddish yellow	Earth	Loamy	<-4.3	32	49	0.07	Very dark yellow red	Earth	Loamy	<-6.2	33	63	0.06	
					2013/01/23	Cloudy	5.8	Dark reddish yellow	Earth	Loamy	<-4.7	12	67	0.05	Dark reddish yellow	Earth	Loamy	<-5.4	28	43	0.05	
	23	Ogawa River	Kinzanbashi Bridge	Kamamachi Town	2012/06/13	Cloudy	20.5	Very dark reddish yellow	None	Slightly loamy	<-6.3	71	110	0.07	Very dark yellow	None	Loamy	<-6.9	110	150	0.09	
					2012/09/12	Sunny	23.9	Very dark yellowish red	Earth	Loamy	<-7.6	150	250	0.08	Very dark yellowish red	Earth	Loamy	<-8.4	190	310	0.08	
					2012/12/13	Sunny	3.6	Very dark yellow red	Earth	Loamy	<-8.1	180	310	0.08	Very dark yellow red	Earth	Loamy	<-7.3	140	270	0.08	
					2013/01/31	Sunny	7.5	Very dark reddish yellow	Faint earth	Loamy	<-6.6	58	120	0.08	Very dark yellow red	Faint earth	Loamy	<-8.6	200	330	0.09	
	24	Nannokogawa River	Ozawabashi Bridge	Nannokumura Village	2012/06/13	Cloudy	20.5	Very dark reddish yellow	None	Loamy	<-7.0	240	370	0.09	Very dark yellow	None	Loamy	<-8.5	220	340	0.12	
					2012/09/12	Sunny	28.1	Dark reddish yellow	Earth	Loamy	<-6.9	240	400	0.09	Very dark reddish yellow	Earth	Loamy	<-9.2	350	550	0.12	
					2012/12/13	Sunny	6.4	Very dark reddish yellow	Earth	Loamy	<-6.8	220	390	0.08	Very dark yellow red	Earth	Loamy	<-8.8	310	530	0.11	
					2013/01/31	Sunny	5.9	Dark reddish yellow	Earth	Loamy	<-6.9	170	310	0.09	Very dark yellow	Earth	Loamy	<-10	330	600	0.11	
25	Soneyagawa River	Yakushibashi Bridge	Shimomura Village	2012/06/08	Sunny	28.0	Very dark yellow red	Earth	Loamy	<-9.7	260	370	0.07	Very dark yellow red	Earth	Loamy	<-9.6	310	470	0.06		
				2012/09/13	Sunny	31.1	Very dark reddish yellow	Earth	Loamy	<-11	350	530	0.06	Very dark reddish yellow	Earth	Loamy	<-8.0	130	210	0.06		
				2012/12/09	Cloudy, partly snow	5.8	Yellow reddish black	Earth	Loamy	<-10	130	260	0.06	Very dark yellow red	Earth	Loamy	<-6.9	140	220	0.06		
				2013/01/30	Sunny	7.7	Very dark yellow red	Earth	Loamy	<-21	290	570	0.07	Very dark yellow red	Earth	Loamy	<-8.3	140	260	0.06		
26	Inogawa River	Kamakubashi Bridge	Takasaki City	2012/06/06	Cloudy	24.0	Very dark reddish yellow	Earth	Loamy	<-4.9	80	76	0.05	Very dark yellow	Earth	Loamy	<-7.4	120	180	0.06		
				2012/09/11	Sunny	31.9	Dark reddish yellow	Earth	Loamy	<-5.7	39	64	0.05	Very dark reddish yellow	Earth	Loamy	<-5.4	43	82	0.07		
				2012/12/05	Cloudy	11.1	Very dark yellow red	Faint earth	Sandy	<-5.0	36	66	0.05	Very dark reddish yellow	Earth	Loamy/skeletal	<-7.0	83	140	0.07		
				2013/01/23	Cloudy	7.4	Very dark yellow red	Faint earth	Loamy	<-5.2	44	90	0.05	Very dark yellow red	Earth	Loamy	<-6.6	51	93	0.06		
27	Karasugawa River	Iwakurabashi Bridge	Takasaki City/ Tamamura Town	2012/06/07	Sunny	29.0	Very dark greenish yellow	Earth	Loamy	<-6.3	76	110	0.06	Very dark yellow green	Earth	Loamy	<-7.2	100	160	0.06		
				2012/09/12	Sunny	31.2	Very dark reddish yellow	Earth	Loamy	<-6.5	73	120	0.06	Dark reddish yellow	Earth	Loamy	<-7.2	74	120	0.06		
				2012/12/05	Sunny	12.7	Very dark yellow red	Earth	Loamy/skeletal	<-6.7	52	90	0.07	Very dark yellow red	Earth	Loamy/skeletal	<-5.4	68	120	0.06		
				2013/01/23	Cloudy	9.7	Very dark reddish yellow	Earth	Loamy/skeletal	<-5.9	61	120	0.06	Very dark reddish yellow	Earth	Loamy	<-4.8	37	71	0.06		
28	Shinkanamebashi Bridge	Uenomura Village		2012/06/13	Cloudy	21.0	Dark yellow red	None	Slightly loamy	<-8.1	180	270	0.09	Very dark yellow red	None	Loamy	<-6.6	120	160	0.10		
				2012/09/12	Sunny	27.5	Dark yellow red	Earth	Loamy	<-7.3	190	290	0.10	Very dark yellow red	Earth	Loamy	<-8.1	140	200	0.09		
				2012/12/13	Sunny	6.1	Dark yellow red	Earth	Loamy	<-9.9	220	400	0.09	Very dark yellow red	Earth	Loamy	<-5.1	97	180	0.09		
				2013/01/31	Sunny	2.5	Very dark yellow red	Earth	Sandy	<-11	240	450	0.10	Very dark yellow red	Earth	Loamy	<-6.7	140	240	0.10		
29	Moritobashi Bridge	Kamamachi Town		2012/06/04	Sunny	28.9	Very dark yellow	Earth	Loamy	<-7.4	94	130	0.07	Very dark greenish yellow	Earth	Sandy/loamy	<-3.8	9.8	17	0.06		
				2012/09/04	Sunny	28.2	Very dark yellow red	Earth	Loamy	<-6.4	130	220	0.09	Very dark reddish yellow	Earth	Sandy/skeletal	<-4.3	39	70	0.08		
				2012/12/13	Sunny	5.2	Very dark reddish yellow	Earth	Loamy	<-5.1	77	130	0.07	Reddish yellowish dark gray	Earth	Sandy/skeletal	<-5.4	23	44	0.07		
				2013/01/31	Sunny	0.3	Very dark yellow red	Earth	Loamy	<-7.3	120	220	0.08	-	-	-	-	-	-	-	Sign level/Under no detect sample due to error on the ground	
30	Tobukyo Bridge	Fujikashi City/ Kamistomachi Town		2012/06/05	Cloudy	23.0	Dark yellow green	Earth	Loamy	<-6.4	58	95	0.08	Dark yellow green	Earth	Loamy	<-5.7	45	71	0.09		
				2012/09/03	Sunny	27.8	Very dark yellow red	Earth	Loamy/skeletal	<-6.6	94	150	0.08	Very dark yellow red	Faint earth	Loamy/skeletal	<-7.4	150	250	0.09		
				2012/12/18	Sunny	12.6	Very dark yellow red	None	Loamy	<-6.4	75	130	0.08	Very dark yellow red	None	Loamy	<-7.9	100	170	0.08		
				2013/01/30	Sunny	6.9	Very dark reddish yellow	Earth	Loamy/skeletal	<-5.1	64	120	0.08	Very dark reddish yellow	Earth	Loamy	<-5.7	110	230	0.09		
31	Kannagawabashi Bridge	Kamistomachi Town		2012/06/13	Cloudy	23.0	Very dark reddish yellow	None	Loamy	<-4.1	26	43	0.05	Very dark yellow red	None	Loamy	<-5.4	31	53	0.07		
				2012/09/12	Sunny	24.8	Very dark yellow red	Earth	Loamy	<-6.6	85	140	0.06	Very dark reddish yellow	Earth	Loamy	<-4.6	37	68	0.06		
				2012/12/18	Sunny	8.4	Dark yellow	Earth	Loamy/skeletal	<-7.1	81	140	0.07	Very dark reddish yellow	Earth	Loamy	<-5.0	40	79	0.08		
				2013/01/30	Sunny	6.0	Very dark yellow red	Earth	Loamy	<-6.2	110	200	0.08	Very dark reddish yellow	Earth	Loamy	<-4.8	23	43	0.07		

Table 4.6.1.3 Gunma Pref. River (Surrounding Environment)

Sampling point				Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)													Remarks			
No.	Water body	Point	Municipality				Left bank						Right bank										
							Soil			Air dose μ Sv/h			Soil			Air dose μ Sv/h							
							General items		Radioactive material concentrations (Bq/kg (dry))	General items		Radioactive iodine I-131	Radioactive cesium		General items		Radioactive iodine I-131	Radioactive cesium			Air dose μ Sv/h		
Color	Odor	Property	Radioactive iodine I-131	Cs-134	Cs-137	Color	Odor	Property	Radioactive iodine I-131	Cs-134	Cs-137	Air dose μ Sv/h											
32	Tonegawa River	Bandobashi Bridge	Hongoishi City	2012/06/05	Cloudy	25.0	Very dark reddish yellow	Earth	Loamy	<-7.9	120	200	0.09	Very dark reddish yellow	Earth	Loamy	<-4.8	47	73	0.07			
				2012/09/13	Sunny	30.5	Very dark reddish yellow	Earth	Loamy	<-5.1	63	120	0.08	Dark reddish yellow	Earth	Loamy	<-5.1	43	65	0.06			
				2012/12/18	Sunny	9.2	Dark reddish yellow	Earth	Loamy	<-6.2	59	95	0.07	Very dark reddish yellow	Earth	Loamy	<-6.0	22	45	0.07			
				2013/01/31	Sunny	7.4	Very dark reddish yellow	Earth	Loamy	<-5.8	66	130	0.07	Very dark reddish yellow	Earth	Loamy	<-6.3	43	87	0.06			
	33	Akagishirakawa River	In Shimehozomachi Town	Maebashishi City	2012/06/08	Sunny	26.1	Very dark reddish yellow	Earth	Loamy	<-6.4	76	120	0.07	Deep reddish yellow	Earth	Loamy	<-8.5	88	130	0.06		
					2012/09/11	Rain	22.8	Dark yellow red	Faint earth	Loamy	<-8.0	160	280	0.07	Dark yellow red	Faint earth	Loamy	<-6.5	44	87	0.07		
					2012/12/17	Cloudy	6.9	Very dark reddish yellow	None	Loamy	<-6.4	61	110	0.07	Very dark reddish yellow	None	Loamy	<-7.5	110	170	0.07		
					2013/01/30	Sunny	10.0	Very dark reddish yellow	Earth	Loamy	<-5.4	45	95	0.07	Very dark reddish yellow	Earth	Loamy	<-6.5	49	81	0.06		
	34	Momonokigawa River	Utsuobashi Bridge	Maebashishi City	2012/06/07	Sunny	28.0	Very dark yellow	Earth	Loamy	<-7.5	100	150	0.07	Very dark yellow	Earth	Loamy	<-8.6	170	270	0.07		
					2012/09/13	Sunny	29.1	Very dark reddish yellow	Earth	Loamy	<-7.2	100	170	0.07	Very dark reddish yellow	Earth	Loamy	<-6.5	61	120	0.07		
					2012/12/17	Cloudy	7.1	Dark yellow red	Earth	Loamy	<-5.1	52	85	0.07	Very dark yellow red	Earth	Loamy	<-8.3	44	74	0.07		
					2013/01/30	Sunny	10.2	Dark reddish yellow	Earth	Loamy/sandy	<-4.9	37	77	0.06	Very dark reddish yellow	Earth	Loamy	<-8.4	130	220	0.07		
35	Aratogawa River	Okaharabashi Bridge	Maebashishi City	2012/06/07	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to construction.		
				2012/09/13	Sunny	33.0	Very dark reddish yellow	Earth	Loamy	<-7.5	27	62	0.05	Very dark yellow red	Earth	Loamy	<-5.9	38	82	0.05			
				2012/12/17	Cloudy	5.2	Very dark yellow red	Faint earth	Loamy	<-5.0	25	39	0.04	Very dark yellow red	None	Loamy	<-4.8	20	52	0.03			
				2013/01/30	Sunny	9.4	Dark reddish yellow	Earth	Loamy/skeletal	<-4.3	11	14	0.05	Very dark reddish yellow	Earth	Loamy	<-4.6	27	48	0.05			
36	Kasukawa River	Hosumibashi Bridge	Isesakishi City	2012/06/05	Cloudy	26.0	Very dark reddish yellow	Earth	Loamy	<-4.6	35	51	0.06	Very dark reddish yellow	Earth	Loamy	<-8.5	71	100	0.06			
				2012/09/13	Sunny	28.5	Dark reddish yellow	Earth	Loamy	<-4.9	68	100	0.06	Dark reddish yellow	Earth	Loamy	<-6.5	94	170	0.06			
				2012/12/17	Rain	5.4	Very dark reddish yellow	Faint earth	Loamy	<-6.0	48	100	0.06	Very dark reddish yellow	None	Loamy	<-7.7	120	230	0.07			
				2013/01/31	Sunny	5.9	Very dark reddish yellow	Earth	Loamy	<-5.8	46	76	0.06	Very dark reddish yellow	Earth	Loamy	<-6.8	83	160	0.06			
37	Hirasegawa River	Nakajimbashi Bridge	Isesakishi City	2012/06/05	Cloudy	25.0	Dull reddish yellow	Earth	Loamy	<-6.2	62	98	0.06	Dark reddish yellow	Earth	Loamy	<-7.1	36	55	0.06			
				2012/09/13	Sunny	30.6	Dark yellow red	Earth	Loamy	<-5.4	61	110	0.07	Dark yellow red	Earth	Loamy	<-7.2	130	200	0.07			
				2012/12/18	Sunny	8.4	Dark yellow red	Earth	Loamy	<-5.6	76	130	0.07	Very dark yellow red	Earth	Loamy	<-6.5	49	74	0.06			
				2013/01/31	Sunny	8.8	Very dark reddish yellow	Earth	Loamy	<-5.6	70	140	0.06	Very dark reddish yellow	Earth	Loamy	<-5.9	81	160	0.07			
38	Hayakawa River	Hayakawabashi Bridge	Isesakishi City	2012/06/12	Cloudy	23.0	Very dark yellow	None	Loamy	<-7.5	120	180	0.06	Very dark yellow	None	Loamy	<-5.9	85	150	0.07			
				2012/12/14	Sunny	2.1	Dark reddish yellow	Faint earth	Loamy	<-7.2	55	94	0.06	Very dark yellow red	Faint earth	Loamy	<-6.7	100	190	0.06			
39		Maajimbashi Bridge	Osashi City	2012/06/12	Light rain	23.0	Very dark yellow	None	Loamy	<-4.6	62	83	0.07	Very dark reddish yellow	None	Loamy	<-6.0	55	78	0.09			
40	Tonegawa River	Tomozeki Weir	Chiyodamachi Town/Toyohashi City	2012/12/18	Sunny	12.1	Very dark reddish yellow	Earth	Loamy	<-4.7	35	61	0.07	Very dark reddish yellow	Earth	Loamy	<-5.9	42	85	0.08			
				2012/05/28	Sunny	25.5	Dark grayish yellow	Earth	Loamy	<-6.9	57	80	0.08	Dark grayish reddish yellow	Earth	Loamy	<-8.0	260	370	0.12			
				2012/07/11	Sunny	29.0	Very dark reddish yellow	Faint earth	Loamy	<-7.7	180	280	0.08	Very dark reddish yellow	Faint earth	Loamy	<-6.6	130	210	0.11			
				2012/08/09	Sunny	30.7	Light grayish reddish yellow	Faint earth	Loamy	<-7.0	140	230	0.08	Soft reddish yellow	Faint earth	Loamy	<-5.6	100	170	0.08			
				2012/10/08	Sunny	23.6	Very dark yellow red	Grass	Loamy	<-7.4	69	100	0.09	Very dark reddish yellow	Earth	Loamy	<-7.3	100	180	0.10			
				2012/10/30	Cloudy	17.7	Very dark reddish yellow	Grass	Loamy	<-7.3	100	190	0.07	Very dark reddish yellow	Grass	Loamy	<-5.4	43	87	0.08			
				2012/12/18	Cloudy	10.1	Very dark yellow red	Earth	Loamy	<-5.6	69	120	0.07	Dark reddish yellow	Earth	Loamy	<-5.6	37	71	0.09			
				2013/01/31	Sunny	8.5	Very dark yellow red	Earth	Loamy	<-7.1	91	170	0.08	Very dark reddish yellow	Earth	Loamy	<-8.7	190	310	0.10			
				2012/05/29	Sunny	18.0	Very dark yellow green	Earth	Loamy	<-7.3	130	190	0.26	Very dark yellow	Earth	Loamy	<-25	1,300	2,000	0.26			
				2012/07/11	Sunny	17.8	Very dark yellow red	Earth	Loamy	<-15	560	930	0.25	Very dark yellow red	Earth	Loamy	<-38	1,700	2,600	0.23			
41	Kogurogawa River	Kayanobashi Bridge	Kiriyushi City	2012/08/08	Cloudy	19.0	Very dark reddish yellow	Faint earth	Loamy	<-14	570	950	0.28	Dark reddish yellow	Faint earth	Loamy	<-38	2,000	3,200	0.26			
				2012/10/08	Sunny	18.0	Very dark yellow red	Earth	Loamy	<-29	2,000	3,500	0.24	Very dark yellow red	Earth	Loamy	<-40	2,200	3,500	0.25			
				2012/10/29	Sunny	12.6	Very dark reddish yellow	Faint earth	Loamy	<-22	1,500	2,500	0.24	Very dark reddish yellow	Faint grass	Loamy	<-51	3,500	5,800	0.23			
				2012/12/12	Sunny	0.3	Very dark yellow red	Earth	Loamy	<-16	700	1,300	0.23	Very dark yellow red	Faint earth	Loamy	<-33	1,600	2,800	0.22			
				2013/02/05	Sunny	-1.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Left bank/Unable to collect samples due to snow on the ground.
				2012/06/12	Cloudy	26.0	Very dark yellow	None	Loamy	<-6.8	41	68	0.09	Very dark yellow	Faint earth	Loamy	<-5.7	110	180	0.10			
42	Watarasegawa River	Takatado	Kiriyushi City	2012/09/20	Sunny	28.5	Very dark yellow	Earth	Loamy	<-6.1	77	120	0.09	Dark reddish yellow	Earth	Loamy	<-6.5	83	130	0.08			
				2012/12/12	Sunny	8.0	Very dark yellow red	Earth	Loamy	<-7.1	100	190	0.08	Very dark reddish yellow	Earth	Loamy	<-7.3	96	160	0.09			
				2013/02/04	Sunny, then cloudy	8.5	Very dark reddish yellow	Faint earth	Loamy	<-5.7	52	120	0.08	Very dark reddish yellow	Faint earth	Loamy	<-7.5	83	150	0.09			

Table 4.6.1.3 Gunma Pref. River (Surrounding Environment)

Sampling point				Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)													Remarks	
							Left bank						Right bank								
No.	Water body	Point	Municipality	Soil			Radioactive material concentrations (Bq/kg (dry))			Air dose μ Sv/h	Soil			Radioactive material concentrations (Bq/kg (dry))			Air dose μ Sv/h				
				General items			Radioactive iodine I-131	Radioactive cesium			Color	Odor	Property	Radioactive iodine I-131	Radioactive cesium						
				Color	Odor	Property		Cs-134	Cs-137						Cs-134	Cs-137					
R i v e r s	43	Watarasegawa River	Intake for Akaiwayosui water channel	Kiriyoshi City	2012/05/28	Cloudy	23.0	Very dark yellow red	Earth	Loamy	<15	320	460	0.11	Dark grayish reddish yellow	Earth	Sandy	<5.5	57	81	0.10
					2012/07/11	Sunny	32.0	Very dark reddish yellow	Faint earth	Loamy	<7.5	98	140	0.09	Very dark reddish yellow	Faint earth	Loamy	<5.0	70	120	0.08
					2012/08/08	Sunny	31.2	Very dark yellow red	Faint earth	Loamy	<16	540	810	0.14	Dull reddish yellow	Faint earth	Loamy	<5.5	86	130	0.11
					2012/10/10	Sunny	22.0	Very dark yellow red	Earth	Loamy	<9.7	140	240	0.10	Very dark yellow red	Earth	Loamy	<5.5	66	110	0.09
					2012/10/30	Cloudy	13.1	Very dark yellow red	Grass	Loamy	<8.5	140	230	0.11	Very dark reddish yellow	Earth	Sandy	<5.4	51	85	0.09
					2012/12/12	Sunny	8.8	Dark reddish yellow	Earth	Loamy	<6.8	120	220	0.10	Dark reddish yellow	Earth	Sandy	<6.1	44	71	0.08
					2013/02/07	Cloudy	3.5	Dark reddish yellow	Earth	Loamy	<8.4	120	220	0.09	Very dark reddish yellow	None	Sandy	<8.0	34	67	0.08
	44	Tataragawa River	Ejiribashi Bridge	Ouramachi Town	2012/06/14	Cloudy	26.0	Dark yellow red	None	Loamy	<11	230	350	0.07	Dull yellow red	None	Loamy	<8.7	70	110	0.06
					2012/12/19	Sunny	5.5	Very dark yellow red	Earth	Loamy	<7.7	81	150	0.06	Very dark reddish yellow	Earth	Loamy	<8.8	150	250	0.06
					2013/01/31	Sunny	11.0	Very dark yellow red	Earth	Loamy	<8.2	140	260	0.08	Very dark reddish yellow	Earth	Loamy	<8.2	120	200	0.07
	45	Kamonobashi Bridge	Kiriyoshi City	2012/06/12	Cloudy	23.5	Very dark yellow	Earth	Loamy	<9.7	120	200	0.09	Very dark yellow	Earth	Loamy	<7.5	140	210	0.08	
				2012/09/20	Sunny	25.3	Very dark reddish yellow	Earth	Loamy	<8.4	140	260	0.09	Very dark yellow	Earth	Loamy	<7.6	76	140	0.06	
				2012/12/12	Sunny	4.8	Very dark reddish yellow	Earth	Loamy	<7.8	96	180	0.09	Very dark yellow red	Earth	Loamy	<8.0	170	300	0.07	
				2013/02/05	Sunny	10.3	Very dark reddish yellow	Earth	Loamy	<6.0	110	190	0.09	Very dark yellow	Earth	Loamy	<7.5	94	160	0.08	
				2012/05/28	Rain	20.0	Very dark yellow	Earth	Loamy	<6.1	59	99	0.08	Dark yellow red	Earth	Loamy	<9.0	85	110	0.08	
	46	Kiriyugawa River	Sakaibashi Bridge	Kiriyoshi City/ Ashikagashi City	2012/07/11	Sunny	32.0	Very dark reddish yellow	Faint earth	Loamy	<7.8	100	140	0.07	Very dark reddish yellow	Faint earth	Loamy	<6.6	190	300	0.08
					2012/08/08	Sunny	28.5	Dull reddish yellow	Faint earth	Loamy	<8.2	110	170	0.07	Dark reddish yellow	Faint earth	Loamy	<6.3	130	200	0.10
					2012/10/10	Sunny	23.2	Very dark reddish yellow	Earth	Loamy	<7.5	120	180	0.08	Very dark reddish yellow	Earth	Loamy	<8.4	120	200	0.09
					2012/10/30	Sunny	13.2	Very dark reddish yellow	Faint earth	Loamy	<7.8	73	120	0.07	Very dark reddish yellow	Grass	Loamy	<6.4	77	130	0.09
					2012/12/14	Sunny	2.7	Dark reddish yellow	Earth	Loamy	<6.5	62	130	0.08	Dark yellow red	Earth	Loamy	<11	83	140	0.06
					2013/02/07	Sunny	4.9	Very dark reddish yellow	Earth	Loamy	<6.1	43	87	0.08	Very dark reddish yellow	Earth	Loamy	<5.6	48	92	0.09
					2012/06/14	Cloudy	23.5	Very dark yellow red	None	Slightly loamy	<8.1	82	120	0.07	Very dark reddish yellow	None	Loamy	<6.1	100	160	0.07
	47	Fuarudagawa River	Jonuma Lake	Tatebayashi City	2012/12/10	Sunny	7.6	Very dark yellow red	Earth	Loamy	<7.7	100	170	0.07	Very dark reddish yellow	Earth	Loamy/skeletal	<5.1	73	100	0.09
					2013/01/31	Sunny	3.6	Very dark reddish yellow	None	Loamy	<6.9	51	96	0.08	Dark reddish yellow	None	Loamy/skeletal	<6.2	100	190	0.07
					2012/06/14	Cloudy	28.0	Deep yellow red	None	Slightly loamy	<6.4	82	120	0.08	Dull yellow red	None	Loamy	<7.3	130	210	0.08
	48	Yatagawa River	Togodabashi Bridge	Meiwamachi Town/ Iwakuramachi Town	2012/12/19	Sunny	3.0	Dark yellow red	Earth	Loamy	<6.4	100	170	0.08	Very dark yellow red	Earth	Loamy	<5.6	70	110	0.08
					2013/01/31	Sunny	4.6	Very dark reddish yellow	Faint earth	Loamy/skeletal	<6.7	110	190	0.08	Very dark reddish yellow	Earth	Loamy/skeletal	<6.5	73	130	0.07

Table 4.6.2.2 Gunma Pref. Lake and Headwater (Sediment)

No.	Sampling point			Sampling date	Weather	Air temperature °C	Full depth m	Sediment														Remarks			
	Point	Municipality	General items							Mechanical composition %						Radioactive material concentrations (Bq/kg dried mud)									
			Mad temperature °C					Mad sampling depth cm	Color	Odor	Medium grave	Fine gravel	Coarse sand	Medium sand	Fine sand	Silt	Clay	Mud content %	Density g/cm ³	Property	Radioactive iodine I-131		Radioactive cesium Cs-134	Cs-137	
L a k e s a n d h e a d w a t e r s	49	Okutomeko Lake (Yagisawa Dam)	Center	2012/07/18	Sunny	28.1	76.4	5.9	3	Grayish reddish yellow	None	0.0	0.0	0.0	0.3	16.7	76.8	6.3	50.5	2,530	Silt	<15	480	770	
				2012/09/10	Sunny	28.5	54.8	9.1	5	Grayish yellow	Faint mud	0.0	0.0	0.0	4.5	10.1	77.9	7.5	53.5	2,552	Silt/clay	<19	810	1,400	
				2012/11/12	Rain	11.3	68.6	10.8	3	Grayish reddish yellow	Faint mud	0.0	0.0	0.0	1.5	12.3	80.4	5.8	52.4	2,547	Silt	<14	440	770	
				2013/01/09	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	50	Naramatako Lake (Naramata Dam)	Center	Minakamimachi Town	2012/07/18	Cloudy	34.0	96.4	4.5	3	Dark grayish greenish yellow	Faint sludge	0.0	0.1	0.0	0.0	3.6	95.1	1.2	47.2	2,438	Silt	<15	440	690
					2012/09/11	Sunny	26.8	13.3	4.3	3	Grayish reddish yellow	Faint sludge	0.0	0.0	0.0	3.3	11.5	78.9	6.3	45.2	2,479	Silt	<22	1,200	2,290
					2012/11/12	Cloudy	11.7	64.4	4.6	10	Dark grayish reddish yellow	None	0.0	0.0	0.0	10.1	28.6	55.6	5.7	41.4	2,459	Silt	<21	820	1,600
					2013/01/09	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	51	Dogonko Lake (Sudagai Dam)	Center	Center	2012/07/17	Sunny	29.0	45.0	8.5	10	Dark grayish reddish yellow	None	0.0	0.0	0.0	0.0	1.2	95.4	3.5	52.1	2,547	Silt	<13	360	610
					2012/09/12	Light rain	23.1	43.4	6.2	3	Grayish reddish yellow	None	0.0	2.3	0.0	4.3	3.9	78.2	11.3	52.3	2,561	Silt	<9.7	230	410
					2012/11/06	Rain	12.1	36.3	7.1	5	Grayish yellow	None	0.0	0.0	0.0	6.8	17.2	72.7	3.3	53.3	2,577	Silt	<11	200	360
					2013/01/29	Snow	-2.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
52	Marunuma Lake (Marunuma Dam)	Center	Katsushinamura Village	2012/08/27	Cloudy, then sunny	23.2	41.4	7.0	15	Greenish yellowish black	Sludge	0.0	0.0	0.0	0.2	19.9	75.4	4.5	39.2	2,352	Silt	<13	210	330	
				2012/10/02	Light rain	15.1	44.0	5.2	10	Reddish yellowish black	Faint sludge	0.0	0.0	0.5	13.9	24.0	56.8	4.9	44.8	2,434	Silt	<11	32	66	
				2012/12/03	Cloudy	0.1	44.7	6.1	10	Reddish yellowish black	Sludge	0.0	0.0	7.3	17.1	25.9	47.1	2.5	36.1	2,318	Silt	<4.9	<7.7	16	
				2013/01/29	Sunny	-1.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
53	Fujiswarako Lake (Fujiswara Dam)	Center	Minakamimachi Town	2012/07/19	Sunny	27.8	48.7	8.1	5	Dark grayish greenish yellow	Sludge	0.0	0.0	0.8	10.4	11.4	76.1	1.3	44.4	2,491	Silt	<19	570	860	
				2012/09/12	Sunny	21.4	51.0	5.0	5	Grayish reddish yellow	None	0.0	0.0	0.0	3.5	5.8	75.1	15.6	56.8	2,561	Silt	<17	1,100	1,800	
				2012/11/06	Light rain	11.5	54.6	5.5	5	Soft reddish yellow	None	0.0	0.0	0.0	0.5	11.9	59.0	28.6	53.5	2,587	Silt	<17	680	1,200	
				2013/01/29	Snow	-1.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
54	Tanbarako Lake (Tanbara Dam)	Center	Numata City	2012/07/17	Sunny	23.8	39.6	11.4	10	Dark grayish reddish yellow	None	0.0	0.2	0.0	0.4	15.0	74.5	9.9	68.9	2,675	Silt	<5.2	83.3	33	
				2012/09/11	Cloudy	22.9	39.5	12.6	5	Grayish reddish yellow	Faint mud	0.0	0.4	0.0	1.4	22.1	62.6	13.5	52.2	2,597	Silt	<12	320	540	
				2012/11/05	Sunny	10.7	40.5	12.1	12	Grayish reddish yellow	None	0.0	0.0	0.0	1.3	20.9	72.2	5.6	47.1	2,546	Silt	<9.1	130	250	
				2013/01/28	Snow	-5.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
55	Akayoko Lake (Ainata Dam)	Center	Minakamimachi Town	2012/07/19	Sunny	27.3	29.6	11.1	5	Dark grayish yellow	None	0.0	40.4	0.0	0.1	7.9	47.4	4.1	55.9	2,586	Silt	<17	960	1,600	
				2012/09/13	Sunny	28.3	22.7	6.2	5	Grayish reddish yellow	None	0.0	0.0	0.0	0.9	3.7	82.8	12.6	53.7	2,575	Silt	<21	1,500	2,300	
				2012/11/07	Sunny	14.1	44.9	10.0	5	Dark grayish reddish yellow	Mud	0.0	0.0	0.0	0.5	9.6	79.0	10.9	53.3	2,581	Silt	<16	820	1,500	
				2013/01/30	Cloudy	2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
56	Sonoharako Lake (Sonohara Dam)	Center	Tsumagoinura Village	2012/08/07	Sunny	28.0	25.0	17.2	5	Dark grayish yellow	Sewage	0.0	0.0	0.9	9.1	11.3	77.7	1.0	56.2	2,536	Silt	<9.4	140	310	
				2012/09/14	Sunny	24.6	26.1	18.2	5	Dark grayish greenish yellow	Faint mud	0.0	0.0	0.0	1.5	18.2	74.1	6.2	56.3	2,581	Silt	<8.9	180	310	
				2012/11/07	Sunny	11.8	23.8	9.0	4	Dark grayish greenish yellow	Sludge	0.0	0.0	0.0	11.6	15.5	71.2	1.7	52.6	2,562	Silt	<9.5	180	320	
				2013/01/30	Sunny	1.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
57	Akagoinuma Lake	Center	Machibishi City	2012/07/20	Cloudy	24.0	14.9	14.6	5	Dark grayish yellow red	Faint sludge	2.0	2.8	1.4	26.7	16.8	50.4	0.0	51.9	2,506	Sand	<6.7	40	64	
				2012/09/18	Cloudy	18.5	15.1	10.5	15	Greenish yellowish black	Mud	0.0	0.0	0.0	30.3	24.9	44.9	0.0	27.8	2,154	Mud	<23	540	860	
				2012/11/08	Sunny	5.3	15.9	7.9	4	Reddish yellowish black	Sludge	0.0	0.0	0.0	13.7	38.9	47.3	0.0	35.7	2,377	Mud	<18	550	930	
				2013/01/30	Sunny	-2.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
58	Okushimako Lake (Shimagawa Dam)	Center	Nakanojomachi Town	2012/08/30	Sunny	31.0	29.0	5.6	8	Reddish yellowish dark gray	Sludge	0.0	0.0	0.0	0.0	2.6	94.0	3.3	56.9	2,577	Mud	<8.7	200	330	
				2012/10/12	Sunny	14.4	28.3	5.6	10	Soft reddish yellow	None	0.0	0.0	0.0	5.0	14.3	77.9	2.8	64.4	2,655	Silt	<14	660	1,100	
				2012/11/15	Cloudy	4.6	41.7	5.3	17	Grayish reddish yellow	None	0.0	0.0	0.0	0.5	12.3	81.8	5.3	61.0	2,637	Silt	<7.1	130	250	
				2013/01/21	Cloudy	4.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
59	Shirako Lake (Nakanojo Dam)	Center	Nakanojomachi Town	2012/08/30	Sunny	32.6	8.8	22.8	2	Dark grayish yellow	None	0.0	0.0	13.5	53.3	26.4	6.8	0.0	82.9	2,749	Sand	<4.9	36	58	
				2012/10/11	Sunny	18.7	8.1	14.6	3	Reddish yellowish black	Faint sludge	0.0	0.0	0.0	29.3	44.0	26.8	0.0	61.0	2,532	Sand/silt	<11	420	700	
				2012/11/14	Sunny	10.1	8.5	10.1	10	Yellow greenish dark gray	Faint mud	1.4	0.2	0.0	43.5	35.6	19.3	0.0	70.4	2,653	Sand	<8.2	190	320	
				2013/01/21	Cloudy	4.2	7.9	5.9	3	Yellowish dark gray	Faint sludge	0.0	0.0	0.4	29.8	42.0	27.8	0.0	53.5	2,558	Sand/silt	<13	460	890	
60	Tashiroko Lake (Kazawa Dam)	Center	Tsumagoinura Village	2012/06/29	Sunny	28.5	6.3	10.5	15	Yellowish dark gray	Sludge	0.0	0.0	0.0	0.0	8.2	91.4	0.4	36.6	2,219	Mud	<16	230	310	
				2012/09/06	Light rain	20.8	3.4	23.0	15	Yellowish black	None	0.0	0.0	0.0	2.9	15.3	81.6	0.2	35.5	2,223	Silt	<15	290	490	
				2012/12/04	Cloudy, partly sunny	4.3	3.8	4.6	8	Yellowish black	Faint mud	0.0	0.0	0.0	3.7	37.4	59.0	0.0	34.3	2,244	Silt	<18	290	510	
				2013/03/03	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table 4.6.2.2 Gunma Pref. Lake and Headwater (Sediment)

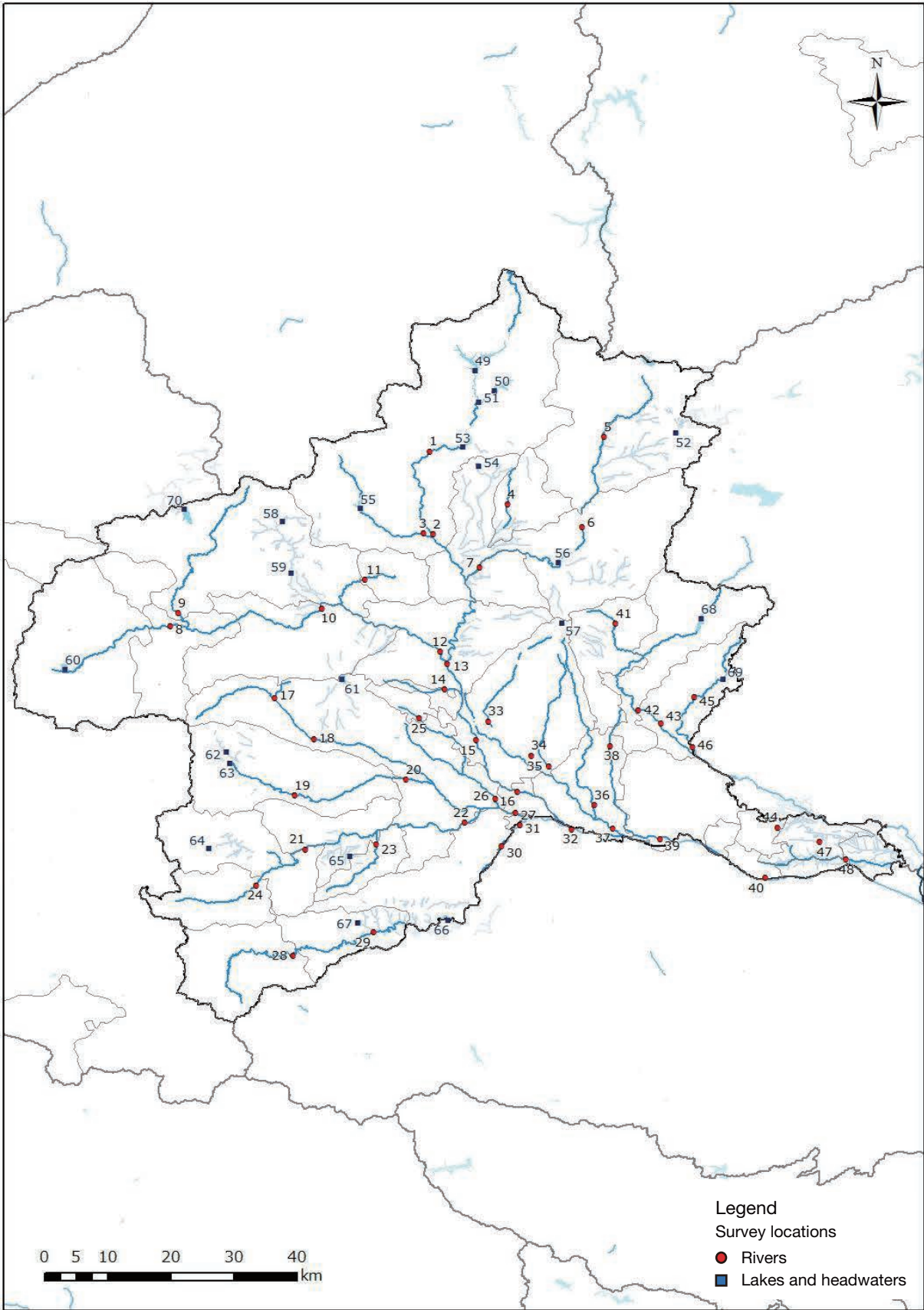
No.	Sampling point			Sampling date	Weather	Air temperature °C	Full depth m	Sediment													Radioactive material concentrations (Bq/kg dried mud)			Remarks		
	Point	Municipality	General items										Mechanical composition %			Mud content %	Density g/cm ³	Property	Radioactive iodine I-131	Radioactive cesium						
			Mud temperature °C					Mud sampling depth cm	Color	Odor	Medium gravel	Fine gravel	Coarse sand	Medium sand	Fine sand					Silt	Clay	Cs-134	Cs-137			
61	Haramako Lake	Center	Takasakishi City	2012/06/28	Sunny	22.0	14.5	6.1	15	Greenish yellowish black	Mud	0.0	0.2	0.0	0.0	12.3	87.5	0.0	17.3	2.144	Mud	<25	46	88		
				2012/09/07	Sunny	21.2	14.3	5.3	5	Greenish black	Faint mud	0.0	0.0	0.0	13.5	30.6	55.9	0.0	22.0	2.168	Silt	<18	27	49		
				2012/11/08	Sunny	11.5	15.0	6.3	15	Yellowish black	Faint sludge	0.0	0.0	12.7	35.3	21.9	30.1	0.0	19.6	2.16	Silt	<5.1	<7.9	30		
				2013/01/22	Snow	-0.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	62	Kirizumiko Lake (Kirizumi Dam)	Center	Annakashi City	2012/06/28	Cloudy	25.0	10.5	14.6	10	Greenish yellowish dark gray	Mud	0.0	0.3	1.3	9.9	19.3	69.1	0.2	46.1	2.455	Mud	<13	310	480	
					2012/09/19	Rain	20.9	12.7	12.2	15	Yellow reddish dark gray	Mud	0.0	0.0	0.0	2.5	31.5	66.1	0.0	44.1	2.408	Mud	<28	1,400	2,390	
					2012/11/13	Sunny	14.8	3.8	9.7	2	Reddish yellowish black	Faint mud	0.0	2.2	0.0	4.1	39.2	54.5	0.0	46.5	2.475	Silt	<16	700	1,200	
					2013/01/22	Cloudy	3.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	63	Usaiko Lake (Sakamoto Dam)	Center	Annakashi City	2012/06/27	Sunny	27.0	13.0	6.8	10	Reddish black	Mud	0.0	0.0	0.0	0.2	12.1	86.9	0.9	40.1	2.305	Mud	<20	730	1,200	
					2012/09/19	Cloudy	22.3	12.7	10.8	10	Reddish yellowish black	Mud	0.0	0.0	0.7	9.9	38.3	51.2	0.0	38.8	2.331	Mud	<31	1,600	2,500	
					2012/11/13	Sunny	14.8	13.1	8.3	10	Yellow reddish dark gray	None	0.0	0.0	0.0	4.4	41.7	53.8	0.0	40.5	2.298	Silt	<29	1,200	2,200	
					2013/01/22	Sunny	7.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
64	Arafuneko Lake (Dodairagawa Dam)	Center	Shimonitama City	2012/06/27	Sunny	27.0	26.5	5.1	20	Yellowish dark gray	Mud	0.0	0.0	0.0	0.0	0.6	88.2	11.2	51.8	2.545	Mud	<8.5	130	180		
				2012/09/04	Sunny	25.9	25.8	5.3	20	Grayish yellow green	Faint sludge	0.0	0.0	0.0	0.3	12.2	81.5	6.1	45.3	2.479	Silt	<11	150	240		
				2012/12/11	Sunny	6.9	33.3	6.1	7	Yellow greenish dark gray	Faint sulfur	0.0	0.0	0.0	1.2	25.8	68.8	4.3	42.8	2.596	Silt	<10	170	280		
				2013/01/24	Sunny	4.6	34.8	4.5	5	Greenish yellowish dark gray	Faint sludge	0.0	0.0	0.0	1.2	25.8	69.9	3.1	50.5	2.536	Silt	<9.4	89	150		
65	Obioko Lake (Ohio Dam)	Center	Tomikashi City	2012/08/31	Sunny	31.0	12.0	23.6	10	Dark grayish yellow	Sludge	0.0	0.0	0.0	0.3	17.4	73.1	9.2	46.1	2.52	Silt	<14	210	330		
				2012/10/11	Sunny	24.2	13.9	20.9	10	Yellow greenish dark gray	Faint sludge	0.0	0.0	0.0	1.2	18.8	71.4	8.6	43.5	2.55	Sand/silt	<12	250	430		
				2012/11/15	Sunny	10.2	13.1	13.8	10	Yellow greenish gray	Faint sludge	0.0	0.2	0.0	1.4	18.0	69.3	11.2	43.4	2.562	Silt	<9.8	66	130		
				2013/01/24	Sunny	6.5	11.5	4.1	10	Dark grayish reddish yellow	None	0.0	0.0	0.0	1.8	23.6	67.7	6.9	43.2	2.529	Silt	<12	110	200		
66	Kanzaki Lake (Shimokubo Dam)	Center	Fujikashi City	2012/06/26	Sunny	27.0	78.0	11.8	15	Yellow greenish gray	Mud	0.0	0.0	0.0	0.0	4.5	76.4	19.1	56.4	2.736	Mud	<7.8	48	80		
				2012/09/03	Sunny	26.9	66.0	9.4	10	Yellow greenish gray	Faint earth	0.0	0.0	2.1	9.3	15.4	38.2	34.9	57.6	2.74	Silt	<8.1	83	130		
				2012/12/03	Cloudy	5.9	74.1	6.0	8	Yellow greenish gray	Faint mud	0.0	0.0	0.0	1.4	16.1	48.4	34.1	56.1	2.738	Silt	<7.8	78	150		
				2013/01/25	Sunny	5.0	73.5	5.9	5	Greenish yellowish dark gray	Faint sulfur	0.0	0.0	2.2	9.6	19.1	44.6	24.5	56.9	2.724	Silt	<7.4	82	160		
67	Hobikamiko Lake (Shiozawa Dam)	Center	Kannamachi Town	2012/06/26	Sunny	25.0	6.7	13.2	4	Yellowish dark gray	Mud	0.0	0.1	0.0	3.8	32.6	63.2	0.4	62.0	2.655	Mud	<8.6	260	430		
				2012/09/04	Sunny	28.5	6.2	13.8	5	Greenish yellowish black	Faint sulfur	0.7	1.1	25.3	15.2	28.1	29.5	0.1	68.7	2.655	Silt/sand	<6.7	100	170		
				2012/12/10	Cloudy	2.1	12.9	5.7	7	Greenish yellowish dark gray	None	0.0	0.1	0.0	1.5	26.0	62.4	10.0	40.5	2.516	Silt	<16	340	650		
				2013/01/25	Cloudy	4.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to freezing.
68	Kusakiko Lake (Kusaki Dam)	Center	Midorishi City	2012/07/31	Sunny	32.5	18.3	15.9	15	Reddish yellowish dark gray	None	0.0	0.0	0.0	0.0	9.4	88.0	2.7	52.8	2.526	Silt	<17	900	1,590		
				2012/09/20	Rain	24.0	9.8	19.6	5	Dark grayish greenish yellow	Faint mud	0.0	0.0	5.4	10.6	44.9	39.1	0.0	50.9	2.527	Mud	<9.5	77	130		
				2012/12/07	Sunny	5.9	38.5	8.9	2	Dark grayish yellow	None	0.0	1.4	0.0	13.8	37.2	47.7	0.0	67.2	2.608	Silt	<8.3	170	270		
				2013/02/12	Sunny	-2.3	41.7	3.7	5	Reddish yellowish dark gray	Faint mud	0.0	0.0	0.0	2.6	39.3	58.2	0.0	50.3	2.518	Silt	<13	280	480		
69	Umedoko Lake (Kiryugawa Dam)	Center	Kiryushi City	2012/06/25	Rain	19.0	27.0	7.3	10	Yellowish dark gray	Mud	0.0	0.0	0.0	0.0	2.0	95.6	2.4	41.3	2.484	Mud	<11	52	71		
				2012/09/21	Rain	21.5	22.5	6.3	15	Dark grayish yellow	Sludge	0.0	0.0	0.0	2.6	24.8	71.4	1.2	43.9	2.513	Mud	<7.4	60	79		
				2012/12/11	Cloudy	9.8	27.5	6.5	5	Dark grayish yellow	Faint sulfur	0.0	0.0	0.0	2.0	30.6	67.3	0.1	55.3	2.568	Silt	<12	270	440		
				2013/02/04	Rain, then cloudy	7.9	29.0	4.7	10	Yellowish dark gray	Faint sludge	0.0	0.0	0.0	1.4	23.6	72.1	2.8	41.1	2.542	Silt	<11	100	180		
70	Nakatsugawa River (Nozori Lake (Nozori Dam))	Center	Nakanojomachi Town	2012/09/05	Cloudy	21.3	15.3	20.8	3	Dark grayish reddish yellow	Faint sulfur	0.7	1.1	0.0	0.0	10.7	85.6	1.9	43.3	2.437	Sand/silt	<12	210	340		
				2012/10/10	Cloudy	9.0	19.1	14.7	15	Yellow reddish dark gray	None	0.0	0.0	0.0	2.7	37.7	58.5	1.2	45.1	2.474	Silt	<9.9	110	190		
				2012/11/14	Cloudy	2.7	22.4	6.5	15	Dark grayish reddish yellow	Faint mud	0.0	0.2	0.0	4.7	42.5	51.4	1.3	41.8	2.416	Silt	<13	230	470		
				2013/03/03	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Unable to collect mud due to snow on the ground.

Table 4.6.2.3 Gunma Pref. Lake and Headwater (Surrounding Environment)

Sampling point			Sampling date	Weather	Air temperature ℃	Surrounding Environment (Soil and Air Dose)							Air dose μSv/h	Remarks
No.	Point	Municipality				Soil			Radioactive material concentrations (Bq/kg (dry))					
						General items			Radioactive iodine I-131	Radioactive cesium				
			Color	Odor	Property		Cs-134	Cs-137						
49	Okutoneko Lake (Yagisawa Dam)	Center	2012/07/18	Sunny	28.1	Dark reddish yellow	Faint earth	Loamy	<7.9	250	390	0.21		
			2012/09/10	Sunny	28.5	Soft reddish yellow	Earth	Skeletal/loamy	<6.8	120	220	0.25		
			2012/11/12	Rain	11.3	Dark yellow red	Faint earth	Sandy	<5.3	42	78	0.22		
			2013/01/09	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to freezing
50	Naramatako Lake (Naramata Dam)	Center	2012/07/18	Cloudy	34.0	Grayish reddish yellow	Faint earth	Sandy	<7.0	220	360	0.27		
			2012/09/11	Sunny	26.8	Soft reddish yellow	Faint earth	Loamy/skeletal	<8.3	250	440	0.34		
			2012/11/12	Cloudy	11.7	Dull yellow red	Faint earth	Loamy/skeletal	<7.5	170	300	0.26		
			2013/01/09	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to freezing
51	Dogenko Lake (Sudagai Dam)	Center	2012/07/17	Sunny	29.0	Dark grayish reddish yellow	None	Loamy	<7.4	110	180	0.20		
			2012/09/12	Light rain	23.1	Very dark yellow red	Earth	Loamy/skeletal	<7.7	160	280	0.25		
			2012/11/06	Rain	12.1	Very dark yellow red	Earth	Loamy/skeletal	<6.6	110	180	0.23		
			2013/01/29	Snow	-2.3	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
52	Maruuma Lake (Maruuma Dam)	Center	2012/08/27	Cloudy then sunny	23.2	Very dark yellow red	Earth	Loamy	<12	460	780	0.12		
			2012/10/02	Light rain	15.1	Dark reddish yellow	Earth	Loamy	<8.4	25	61	0.14		
			2012/12/03	Cloudy	0.1	Very dark reddish yellow	None	Loamy	<4.6	44	91	0.11		
			2013/01/29	Sunny	-1.1	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
53	Fujiwarako Lake (Fujiwara Dam)	Center	2012/07/19	Sunny	27.8	Very dark yellow red	Faint earth	Loamy	<9.3	330	520	0.11		
			2012/09/12	Sunny	21.4	Very dark yellow red	Earth	Loamy/skeletal	<17	980	1,700	0.13		
			2012/11/06	Light rain	11.5	Very dark reddish yellow	Earth	Loamy/skeletal	<11	470	810	0.12		
			2013/01/29	Snow	-1.8	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
54	Tanbarako Lake (Tanbara Dam)	Center	2012/07/17	Sunny	23.8	Dark grayish yellow red	Earth	Clayish	<23	2,500	4,100	0.24		
			2012/09/11	Cloudy	22.9	Soft reddish yellow	Faint earth	Skeletal/loamy	<8.7	360	620	0.32		
			2012/11/05	Sunny	10.7	Very dark yellow red	Earth	Loamy/skeletal	<17	1,200	2,100	0.24		
			2013/01/28	Snow	-5.8	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
55	Akayako Lake (Aimata Dam)	Center	2012/07/19	Sunny	27.3	Very dark reddish yellow	Faint earth	Loamy	<9.0	150	270	0.14		
			2012/09/13	Sunny	28.3	Very dark reddish yellow	Earth	Loamy	<12	300	480	0.15		
			2012/11/07	Sunny	14.1	Very dark yellowish red	Earth	Loamy	<13	440	760	0.13		
			2013/01/30	Cloudy	2.0	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
56	Sonoharako Lake (Sonohara Dam)	Center	2012/08/07	Sunny	28.9	Very dark yellow red	Earth	Loamy	<8.5	350	540	0.11		
			2012/09/14	Sunny	24.6	Very dark yellow red	Earth	Loamy	<8.4	320	490	0.13		
			2012/11/07	Sunny	11.8	Very dark yellow red	Earth	Loamy/skeletal	<8.8	170	300	0.12		
			2013/01/30	Sunny	1.7	-	-	-	-	-	-	-	-	Unable to collect samples due to freezing
57	Akagionuma Lake	Center	2012/07/20	Cloudy	24.0	Very dark reddish yellow	Faint earth	Loamy	<13	460	760	0.11		
			2012/09/18	Cloudy	18.5	Very dark yellow	Earth	Loamy	<8.4	100	170	0.10		
			2012/11/08	Sunny	5.3	Very dark reddish yellow	Earth	Loamy	<6.9	110	180	0.11		
			2013/01/30	Sunny	-2.9	-	-	-	-	-	-	-	-	Unable to collect samples due to freezing
58	Okushimako Lake (Shimagawa Dam)	Center	2012/08/30	Sunny	31.0	Soft reddish yellow	Earth	Loamy	<15	1,300	2,100	0.25		
			2012/10/12	Sunny	14.4	Very dark reddish yellow	Earth	Loamy	<15	790	1,300	0.28		
			2012/11/15	Cloudy	4.6	Very dark reddish yellow	Earth	Loamy/skeletal	<8.7	420	720	0.26		
			2013/01/21	Cloudy	4.1	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
59	Shimako Lake (Nakanojo Dam)	Center	2012/08/30	Sunny	32.6	Dark yellow red	Earth	Loamy	<8.5	240	380	0.12		
			2012/10/11	Sunny	18.7	Very dark yellow red	Earth	Loamy	<15	560	980	0.13		
			2012/11/14	Sunny	10.1	Very dark yellow red	Earth	Loamy	<17	630	1,100	0.16		
			2013/01/21	Cloudy	4.2	Very dark reddish yellow	Earth	Loamy	<12	400	730	0.12		
60	Tashiroko Lake (Kazawa Dam)	Center	2012/06/29	Sunny	28.5	Very dark reddish yellow	Earth	Loamy	<12	370	590	0.12		
			2012/09/06	Light rain	20.8	Very dark yellow red	Earth	Loamy	<9.4	200	330	0.13		
			2012/12/04	Cloudy, partly sunny	4.3	Very dark yellow red	Earth	Loamy	<9.3	160	300	0.12		
			2013/03/03	-	-	-	-	-	-	-	-	-	-	Unable to collect samples due to freezing

Table 4.6.2.3 Gunma Pref. Lake and Headwater (Surrounding Environment)

Sampling point			Sampling date	Weather	Air temperature °C	Surrounding Environment (Soil and Air Dose)						Air dose μSv/h	Remarks		
No.	Point					Soil			Radioactive material concentrations (Bq/kg (dry))						
	Municipality	General items				Radioactive iodine I-131		Radioactive cesium							
			Color	Odor	Property		Cs-134	Cs-137							
L a k e s a n d h e a d w a t e r s	61	Harunako Lake	Center	Takasaki City	2012/06/28	Sunny	22.0	Very dark yellow red	Earth	Loamy	<14	780	1,200	0.34	
					2012/09/07	Sunny	21.2	Very dark yellow red	Earth	Loamy	<13	560	860	0.35	
					2012/11/08	Sunny	11.5	Very dark yellow red	Earth	Loamy	<13	630	1,000	0.32	
					2013/01/22	Snow	-0.8	-	-	-	-	-	-	-	Unable to collect samples due to freezing
	62	Kirizumiko Lake (Kirizumi Dam)	Center	Annakashi City	2012/06/28	Cloudy	25.0	Dark reddish yellow	Earth	Loamy	<13	380	580	0.13	
					2012/09/19	Rain	20.9	Dark reddish yellow	Earth	Loamy	<12	340	570	0.13	
					2012/11/13	Sunny	14.8	Dark yellow red	Earth	Loamy	<9.3	230	390	0.13	
					2013/01/22	Cloudy	3.9	-	-	-	-	-	-	-	Unable to collect samples due to freezing
	63	Usaiko Lake (Sakamoto Dam)	Center	Annakashi City	2012/06/27	Sunny	27.0	Very dark reddish yellow	Earth	Loamy	<9.2	360	550	0.14	
					2012/09/19	Cloudy	22.3	Very dark greenish yellow	Earth	Loamy	<9.8	340	520	0.11	
					2012/11/13	Sunny	14.8	Very dark yellow red	Earth	Loamy/skeletal	<11	330	600	0.12	
					2013/01/22	Sunny	7.5	-	-	-	-	-	-	-	Unable to collect samples due to freezing
	64	Arafune Lake (Dodairagawa Dam)	Center	Shimotamachi Town	2012/06/27	Sunny	27.0	Dark reddish yellow	Earth	Loamy	<9.0	280	410	0.12	
					2012/09/04	Sunny	25.9	Very dark yellow red	Faint earth	Loamy	<7.6	140	210	0.11	
					2012/12/11	Sunny	6.9	Very dark yellow red	Earth	Loamy	<7.7	70	120	0.10	
					2013/01/24	Sunny	4.6	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground
	65	Oshioke Lake (Oshio Dam)	Center	Tomiokashi City	2012/08/31	Sunny	31.0	Soft reddish yellow	Earth	Loamy	<8.2	180	300	0.12	
					2012/10/11	Sunny	24.2	Very dark reddish yellow	Earth	Loamy	<9.0	190	340	0.11	
					2012/11/15	Sunny	10.2	Very dark yellow red	Faint earth	Loamy	<8.8	230	420	0.14	
					2013/01/24	Sunny	6.5	Very dark yellow red	Earth	Loamy	<10	280	550	0.12	
66	Kamako Lake (Shimokubo Dam)	Center	Fujikashi City	2012/06/26	Sunny	27.0	Very dark yellow red	Earth	Loamy	<5.6	84	120	0.04		
				2012/09/03	Sunny	26.9	Very dark yellow red	Earth	Loamy/skeletal	<5.6	62	85	0.05		
				2012/12/03	Cloudy	5.9	Very dark yellow red	Earth	Loamy/skeletal	<6.6	93	180	0.06		
				2013/01/25	Sunny	5.0	Very dark yellow red	Earth	Loamy/skeletal	<5.5	69	130	0.06		
67	Hebikamiko Lake (Shiozawa Dam)	Center	Kannamachi Town	2012/06/26	Sunny	25.0	Dark yellow	Earth	Loamy	<6.2	100	160	0.09		
				2012/09/04	Sunny	28.5	Very dark reddish yellow	Earth	Loamy/skeletal	<6.5	84	150	0.10		
				2012/12/10	Cloudy	2.1	Very dark reddish yellow	Earth	Loamy/skeletal	<6.3	120	210	0.09		
				2013/01/25	Cloudy	4.4	-	-	-	-	-	-	-	Unable to collect samples due to freezing	
68	Kusakiko Lake (Kusaki Dam)	Center	Midoriishi City	2012/07/31	Sunny	32.5	Reddish yellowish black	Earth	Loamy	<9.7	230	370	0.15		
				2012/09/20	Rain	24.0	Very dark yellow	Earth	Loamy	<11	330	570	0.17		
				2012/12/07	Sunny	5.9	Very dark yellow red	Earth	Loamy	<12	310	540	0.17		
				2013/02/12	Sunny	-2.3	Very dark yellow red	None	Loamy	<9.3	250	480	0.15		
69	Umedako Lake (Kiryugawa Dam)	Center	Kiryushi City	2012/06/25	Rain	19.0	Dark reddish yellow	Earth	Loamy	<11	190	300	0.09		
				2012/09/21	Rain	21.5	Dark yellow	Earth	Clayish/loamy	<6.5	120	200	0.09		
				2012/12/11	Cloudy	9.8	Dark reddish yellow	Earth	Loamy/clayish	<7.3	130	210	0.08		
				2013/02/04	Rain, then cloudy	7.9	Dark reddish yellow	Faint earth	Loamy	<5.9	55	95	0.08		
70	Nakatsugawa River	Center	Nakanomachi Town	2012/09/05	Cloudy	21.3	Very dark yellow red	Faint earth	Loamy/skeletal	<11	180	320	0.11		
				2012/10/10	Cloudy	9.0	Very dark yellow red	Grass	Loamy	<12	320	560	0.10		
				2012/11/14	Cloudy	2.7	Very dark yellow red	Earth	Loamy	<11	220	400	0.11		
				2013/03/03	-	-	-	-	-	-	-	-	-	Unable to collect samples due to snow on the ground	



Survey Locations (Gunma Prefecture)