

**Results of Radioactive Material Monitoring of Aquatic Organisms (Location K off the mouth of the Abukuma River)**

<Location K off the mouth of the Abukuma River: Samples collected >

Items	General items			Radioactive materials			
	Water	Sediment	Water (Cs)	Water (Sr)	Sediment (Cs)	Sediment (Sr)	
K-1	-	○	-	-	○	○	
K-2	○	○	○	○	○	○	
K-3	-	○	-	-	○	-	

<Location K off the mouth of the Abukuma River: Site measurement item >

Items	Latitude and longitude of the location		Survey date and time			Water temperature (degrees C)	Sediment			Other		
	Scheduled latitude	Scheduled longitude	Date	Time (water)	Time (sediment)		Sediment temperature (degrees C)	Property	Color	Contaminants	Water depth (m)	Transparency (m)
K-1	38.0457°	140.9282°	2015/6/23	-	9:47	-	16.4	Sand	2.5Y3/3	None	-	-
K-2 (Surface layer)	38.0455°	140.9401°		9:05	9:12	20.9	12.0	Fine sand	5Y2/2	None	16.6	3.2
K-2 (Deep layer)	-	-		8:50	-	12.4	-	-	-	-	-	-
K-3	38.0458°	140.9518°	-	-	9:26	-	11.4	Silt with fine sand	10Y3/1	None	-	-

<Location K off the mouth of the Abukuma River: General survey items/Analysis of radioactive materials Water >

Items	Latitude and longitude of the location		Survey date and time		pH	BOD (mg/L)	COD (mg/L)	DO (mg/L)	Electrical conductivity (mS/m)	Salinity	TOC (mg/L)	SS (mg/L)	Turbidity (FNU)	Cs-134 (Bq/L)	Cs-137 (Bq/L)	Sr-90 (Bq/L)
	Scheduled latitude	Scheduled longitude	Date	Time (water)												
K-2 (Surface layer)	38.0455°	140.9401°	2015/6/23	9:05	8.2	1.3	3.2	10	4380	28.83	1.7	3	2.8	0.0024	0.0073	-
K-2 (Deep layer)	-	-		8:50	8	<0.5	1.6	8.7	5120	33.21	1.1	8	5.4	0.0065	0.029	0.0016

<Location K off the mouth of the Abukuma River: General survey items/Analysis of radioactive materials Sediment >

Items	Latitude and longitude of the location		Survey date and time			pH	Redox potential EN.H.E (mV)	Water content (%)	IL (%)	TOC (mg/g-dry)	Soil particle density (g/cm <sup>3</sup> )	Grain size distribution							Cs-134 (Bq/kg-dry)	Cs-137 (Bq/kg-dry)	Sr-90 (Bq/kg-dry)
	Scheduled latitude	Scheduled longitude	Date	Time (sediment)	Gravel (2-75mm) (%)							Coarse sand (0.85-2mm) (%)	Medium sand (0.25-0.85mm) (%)	Fine sand (0.075-0.25mm) (%)	Silt (0.005-0.0075mm) (%)	Clay (Less than 0.005mm) (%)	Median grain diameter	Maximum grain diameter			
K-1	38.0457°	140.9282°	2015/6/23	9:47	8	286	20.8	1.6	1.5	2.66	0	0.9	59.7	36.1	0.2	3.1	0.29	2	8.1	36	-
K-2	38.0455°	140.9401°		9:12	7.6	160	30.2	2.5	2	2.684	0	0	1.3	68.6	24.5	5.6	0.1	2	29	99	N.D. (0.13)
K-3	38.0458°	140.9518°		9:26	7.5	-7	35.4	5.4	7.3	2.628	0	0.2	0.2	22.4	63	14.2	0.051	2	90	360	-

<Location K off the mouth of the Abukuma River: Survey items Aquatic organisms >

Location	Sampling point	Latitude and longitude of the location		Sampling Date	Division	Class	Order	Family	Species name	English name	Population	Sample weight (kg-wet)	Note			Radioactive cesium (Bq/kg-wet)		Sr-90 (Bq/kg-wet)	
		Latitude	Longitude										Growth stage	Stomach contents	Measurement site	Cs-134	Cs-137		
Surrounding water area off the mouth of the Abukuma River	-	-	-	2015/6/23	Arthropod	Malacostraca	Decapoda	Portunidae	<i>Portunus trituberculatus</i>	Japanese blue crab	4	1.2	Imago	-	-	-	N.D. (0.3)	0.35	-
					Vertebrata	Osteichthyes	Scorpaeniformes	Scorpaenidae	<i>Sebastes cheni</i>	Rockfish	1	0.050	Mature fish (2-year-old)	Shrimp	Viscera removed	N.D. (1.7)	1.2	-	
					Vertebrata	Osteichthyes	Pleuronectiformes	Paralichthyidae	<i>Paralichthys olivaceus</i>	Bastard halibut	2	2.7	Mature fish (2-year-old)	Anchovy	Viscera removed	0.32	0.98	N.D. (0.016)	
					Vertebrata	Osteichthyes	Perciformes	Carangidae	<i>Seriola quinqueradiata</i>	Japanese amberjack	1	3.0	Mature fish	Anchovy	Viscera removed	N.D. (0.3)	0.68	N.D. (0.021)	
					Vertebrata	Osteichthyes	Perciformes	Sciaenidae	<i>Nibea mitsukurii</i>	Nibe croaker	9	2.7	Mature fish (5,6,8-year-old)	Obscure digesta	Viscera removed	0.33	1.0	0.077	
					Vertebrata	Osteichthyes	Tetraodontiformes	Tetraodontidae	<i>Takifugu pardalis</i>	Panther puffer	8	2.5	Mature fish	Empty stomach	Viscera removed	N.D. (0.3)	0.66	0.048	
					Vertebrata	Osteichthyes	Zeiformes	Zeidae	<i>Zeus faber</i>	John dory	4	2.6	Mature fish	Sardines	Viscera removed	N.D. (0.4)	0.41	N.D. (0.021)	

\*1: Organisms were collected in or around the targeted water areas.

\*2: When multiple types of aquatic organisms were collected, a sample was prepared by mixing them.

\*3: For a sample made of multiple types of aquatic organisms, the name of the dominant one largest in number is underlined.

\*4: Basically, measurement was conducted for all organism samples. Viscera (stomach and bowels) were removed for the measurement when possible so that undigested food and sediments, etc. in the digestive system would be excluded.

\*5: A statement in red in the "Growth stage" column shows the age assessed based on squama or otolith.

\*6: Plankton (suspended algae) is the residue remaining after the filtration of lake water or seawater with a plankton net (40µm-mesh).

\*7: River bottom materials (incl. algae) are algae, etc. that were scratched off stones with a brush, etc. and may include very fine particles such as inorganic silt and clay.

\*8: N.D. means to be below the detection limit and figures in parentheses show the detection limit.

\*9: Activity concentrations include counting errors, but the details are omitted here.