

## XVI-3 Report on Environmental Radiation Management involved in Reprocessing Facilities

### XVI-3-1 Report on Environmental Radiation Management in the First Quarter

We received the report on environmental radiation management involved in reprocessing facilities in the first quarter of FY2007, and we hereby release it according to the prescription in Section 2 of Article 72-3 of the “Law for the Regulation of Nuclear Source Material, Nuclear Fuel Material and Reactors.”

- At the reprocessing plant of Japan Atomic Energy Agency, Tokai Research and Development Center, Nuclear Fuel Cycle Engineering Laboratories, concentration by kind of radioactive material or density of radioactive material on the surface involved in seawater, sea-bottom soil, marine organisms, fishing equipment, and other objects specified in the Safety Regulations in the sea area around the sea discharge outlet in the first quarter of FY2007 (from April to June 2007) is shown in Appendix 1. There was no data over normal fluctuation range.
- At the reprocessing plant of Japan Nuclear Fuel Limited, Reprocessing Plant, concentration by kind of radioactive material or density of radioactive material on the surface involved in seawater, sea-bottom soil, marine organisms, fishing equipment, and other objects specified in the Safety Regulations in the sea area around the sea discharge outlet in the first quarter of FY2007 (from April to June 2007) is shown in Appendix 2. Maximum  $2 \text{ kBq/m}^3$  (mean value for one hour: once) of gaseous beta radioactivity concentration in air (Kr-85) due to the influence of the reprocessing plant was measured for comparison with the normal fluctuation range (ND: minimum determination limit to lower than [ $2 \text{ kBq/m}^3$ ]). The release of Kr-85 in this quarter in gaseous radioactive waste released from the reprocessing plant is quite low compared with the target annual release control value of the same nuclei specified in the Safety Regulations. It was verified, therefore, that there was no problem.  $0.010 \text{ Bq/Kg}$  raw of Pu(alpha) concentration in marine organisms (shellfish) was measured for comparison with the normal fluctuation range (ND to  $0.007 \text{ Bq/kg}$  raw). This is considered to be due to natural fluctuation since no alpha ray nuclei were detected in radioactive waste released from the reprocessing plant. As for other items, there were no data over normal fluctuation ranges.