

9

Nuclear safety

Over 20 years have passed since the explosion at Chernobyl's nuclear reactor. During this time, major work has been undertaken on making the site safe. Much of this has been funded by the Chernobyl Shelter Fund, one of six nuclear safety funds managed by the EBRD on behalf of 29 donor countries and the European Union, which have contributed over €2 billion.

Chernobyl

In December 2006, work was completed on stabilising the structure – the so called “shelter” – built around Unit 4 of Chernobyl Nuclear Power Plant following the accident in 1986. The programme, comprising a number of measures both inside and outside the shelter, is the largest international project to be completed at the site so far. It has also been the most challenging, in view of the technical difficulties and the high radiation levels that are still present.

The programme was financed by the Chernobyl Shelter Fund (CSF), which is administered by the EBRD on behalf of 29 donor governments and the European Union. By keeping the cost to roughly €50 million, the Bank ensured that the programme remained within the original cost estimate.

A major element of the project was to erect large metal structures to stabilise the shelter’s western wall and to absorb part of the roof’s load. Due to the high radiation in some workplaces and in line with strict radiation protection requirements, more than 2,500 workers were employed during the project which lasted for 18 months. These stabilisation measures will help to reduce the risk of collapse for the existing structure for at least 15 years.

This will allow sufficient time for the destroyed unit to be enclosed by a new “safe confinement” – a large arch-shaped construction that will enclose the shelter and its radioactive contents – to be financed by the CSF. The procurement process for the design and construction of this new confinement is almost complete. The project is likely to cost around €430 million and a contract is expected to be awarded in 2007.

Two projects related to the safe decommissioning of Chernobyl are being financed by the donor-funded Nuclear Safety Account (NSA), which is also

administered by the EBRD. In 2006 the NSA Assembly approved the proposed way forward for completing the interim spent fuel storage facility at the site. It also approved the strategy for making the liquid waste storage facility operational.

International Decommissioning Support

In Bulgaria, Lithuania and the Slovak Republic, the International Decommissioning Support Funds (IDSFs) managed by the EBRD are assisting with decommissioning and energy sector projects related to the early closure of Chernobyl-type reactors and first-generation, Soviet-designed nuclear power units. Projects are being implemented in line with the work programmes approved by donors to these three Funds.

In Bulgaria the IDSF has co-financed energy efficiency projects, which are serving as a model for similar schemes elsewhere. In the Slovak Republic, grant funding has been requested from the IDSF for credit lines to support energy efficiency measures in public and residential buildings. In Lithuania the major energy sector project to be co-financed by the IDSF concerns the environmental upgrade of the largest conventional power plant in the country.

Assistance with developing the energy sector was one of the prerequisites for the closure of Units 3 and 4 at Kozloduy Nuclear Power Plant in Bulgaria and Bohunice 1 (V1) in the Slovak Republic at the end of 2006 in line with EU accession agreements and respective Framework Agreements with the EBRD. This leaves only Bohunice 2 (V1) and Ignalina 2 in Lithuania, which are due to be closed in 2008 and 2009 respectively. The three Funds have so far received contributions in excess of €1 billion, the vast majority of which have been provided by the European Union.

Northern Dimension Environmental Partnership

Donors to the Northern Dimension Environmental Partnership (NDEP) Fund, which is also administered by the EBRD, approved funding of two large nuclear projects in 2006. These involve the decommissioning of a derelict and heavily contaminated former storage facility for spent nuclear fuel at the coastal base of Andreeva Bay and the decommissioning of the service ship *Lepse*, which contains spent nuclear fuel from nuclear submarines and other ships. The costs of these operations are likely to exceed €60 million.

The two projects will reduce serious security and environmental hazards and the levels of highly radioactive waste in north-west Russia. Both projects were identified as top priorities in the Strategic Master Plan for the region, which is now being finalised by Russian specialist institutes with the support of Western experts.

Once completed, the Master Plan will provide a comprehensive overview of the measures that need to be undertaken by Russia to reduce nuclear, radiological and environmental risks posed by the legacy of the Soviet Northern Fleet. Substantial assistance will continue to be provided by the international community through bilateral programmes and NDEP.