

# UPGRADING RADIATION PROTECTION INFRASTRUCTURE (RAW/9/006) II New

## MODEL PROJECT

### CORE FINANCING

YEAR	Experts		Group Activity	Equipment	Fellowships		Scientific Visits		Group Training	Sub-Contracts	Misc. Comp.	TOTAL
	m/d	US \$	US \$	US \$	m/d	US \$	m/d	US \$	US \$	US \$	US \$	US \$
1998	14/0	195,300	0	176,000	59/0	194,700	3/23	38,420	203,000	0	11,000	818,420
1999	14/0	205,800	0	211,000	49/0	169,050	2/24	30,240	225,000	0	12,000	853,090
2000	12/0	185,400	0	159,000	35/0	126,000	2/3	23,940	113,000	0	12,000	619,340

First Year Approved: 1998

**OBJECTIVES:** To strengthen the inadequate radiation safety infrastructure of a number of selected Member States in order to comply with the standards established by the Agency for protection against ionizing radiation and for the safety of radiation sources.

**BACKGROUND:** This is a continuation of the project INT-9-143 for the West Asia Region. Based on the Agency's updated assessment of radiation protection and radioactive waste management infrastructure in Member States, there are 9 Member States in West Asia Region in which the infrastructures fall significantly below the requirements of the Agency's Basic Safety Standards. In particular, in a number of these Member States there is no inventory of the number and types of radioactive sources in use or in storage; in others, there is a partial inventory which requires updating. This situation is due either to the absence of a radiation protection infrastructure or, where a basic infrastructure is in place, to the lack of an active and co-ordinated programme of enforcement of laws, regulations and codes of practice. Key causative factors which have been identified include the absence of an adequate legal framework and enforcing authority and a shortage of trained personnel and equipment. These findings are a matter of serious concern to the Agency, as it implies that the use of radiation is not being optimized in these Member States, in terms of achieving the maximum potential benefits of such use and at the same time keeping radiation exposure levels as low as reasonably achievable. There is also a risk that a serious radiation accident could occur in one of these Member States. Such an accident would not only have serious health implications but would also inevitably tax the already overstretched financial resources of the State. Furthermore, the lack of an adequate radiation protection infrastructure would militate against the implementation of an effective remedial programme following an accident. The Agency has, therefore decided that this situation must be addressed as a matter of urgency and to this end has established this Model Regional Project for simultaneous implementation in the 9 Member States. The aim of this Model Project is to ensure that all Member States have adequate radiation protection and waste management standards in place by the year 2000.

**PROJECT PLAN:** Previous projects on radiation protection involved the provision of Agency assistance in specific aspects as requested by the Member State, e.g. on personnel dosimetry. In contrast, this Model Project involves a comprehensive review by the Agency of all aspects of radiation protection in each of the 9 Member States and the preparation of a plan for the rectification of all the shortcomings which have been identified. In order to accelerate implementation and maintain momentum of the project, an expert in radiation protection has been appointed as regional manager with responsibility for the planning and implementation of the project in this region and is based in Beirut. Individual workplans for each of the 9 Member States, based on an assessment of their needs for upgrading radiation protection practices in accordance with the requirements of the Agency's Basic Safety Standards, have been prepared. The workplans include the establishment or the improvement, as appropriate, of a legal framework and enforcing authority, occupational, medical and environmental exposure control, a system of radioactive waste management and a plan for handling radiation emergencies involving radioactive materials located in the Member State or its neighbours. The workplan also makes provision for assistance in the development of technical support services. These include calibration laboratories as well as equipment maintenance and repair facilities. The need for maintenance and repair facilities is highlighted by the common finding that the effectiveness of regulatory bodies is being hampered by the lack of functioning radiation monitoring equipment. Time-scales for the implementation of the activities have been set out in the workplan and are intended to ensure that priority is given to addressing the most urgent needs in a particular Member State. These workplans, after finalization with the counterparts in the Member States, have been formally approved by the respective governments.

**NATIONAL COMMITMENT:** The governments of the participating Member States are required to give a firm commitment to the development of radiation protection infrastructure and to provide the necessary resources as agreed with the Agency and set out in the workplan.

**AGENCY INPUT:** Training through fellowships, scientific visits and the provision of national, regional and interregional courses and workshops in specific aspects of radiation protection; expert visits and the provision of essential equipment. Agency assistance will be conditional on the Member State honouring its own commitments to the development of radiation protection infrastructure.

**PROJECT IMPACT:** Successful implementation of the project will improve the radiation protection infrastructure to a level that meets the requirements of the Agency's Basic Safety Standards