

Republic of the Philippines
Department of Science and Technology
PHILIPPINE NUCLEAR RESEARCH INSTITUTE
Commonwealth Avenue, Diliman, Quezon City

PNRI AS REGULATORY AUTHORITY FOR RADIOACTIVE MATERIALS IN THE PHILIPPINES

Code of PNRI Regulations
Part 0

I. CREATION AND AUTHORITY:

On January 30, 1987, President Corazon C. Aquino issued Executive Order No. 128, which re-organized the Department of Science and Technology (DOST). Under E.O. 128, the Philippine Atomic Energy Commission (PAEC) was transferred from the Office of the President to the DOST and re-organized to become the Philippine Nuclear Research Institute (PNRI). PNRI retains the regulatory powers and authorities of PAEC as mandated in R.A. 2067 (Science Act of 1958) and R.A. 5207 (Atomic Energy Regulatory and Liability Act of 1968), both as amended.

II. LOCATION AND PRINCIPAL OFFICE:

The principal office of PNRI is located at Commonwealth Avenue, Diliman, Quezon City 1101.

III. THE INSTITUTE.

- (a) The PNRI is headed by a Director, who shall be appointed by the President and assisted by one or more Deputy Directors, as may be necessary. The Director is the official spokesperson and has an ultimate authority for all PNRI functions.
- (b) The PNRI is presently composed of four Divisions namely; Nuclear Regulations, Licensing and Safeguards Division, Atomic Research Division, Nuclear Services and Training Division, and Finance and Administrative Division. The Institute has also a Technical Assistance Section and a Planning and Programming Section which are both under the direct supervision of the Director. The total number of plantilla positions in PNRI is 306.

IV. MANDATE:

The PNRI shall have the following functions as mandated in Executive Order No. 128:

- (a) Conduct research and development on the application of radiation and nuclear materials, processes and techniques in agriculture, food, health, nutrition and medicine and in industrial or commercial enterprises;
- (b) Undertake the transfer of research results to end-users including technical extension and training services;
- (c) Operate and maintain nuclear research reactors and other radiation facilities; and
- (d) License and regulate activities relative to production, transfer and utilization of nuclear and radioactive substances.

V. REGULATORY MANDATE:

- (a) PNRI shall undertake the licensing and regulation of the peaceful applications of nuclear facilities, nuclear and radioactive material in accordance with the provisions of R.A. 5207 and R.A. 2067, both as amended.

- (b) The Nuclear Regulations, Licensing and Safeguards Division (NRLSD) shall implement the regulatory and licensing program pursuant to R.A. 5207 and the Radiological Health and Safety Policy in accordance with PNRI Policy Instruction No. 02, Series of 2001, which established the Regulatory Control Program for PNRI Nuclear and Radiation Facilities and Laboratories (PNRI Office Order No. 002, Series of 2004).
- The Regulatory Control Program shall be implemented for the Philippine Research Reactor (PRR-1), Co-60 Multi-Purpose Irradiation Facility, Radioisotope Dispensing Laboratory, Radioactive Waste Management and Interim Storage Facility, Secondary Standard Dosimetry Laboratory, and other PNRI research laboratories where nuclear and radioactive materials are handled.
 - The NRLSD shall be responsible for the implementation of the Program. The NRLSD shall define the regulatory requirements and prepare documents that provide guidance for the compliance of the Program. It shall periodically review and update all pertinent regulatory requirements and documents essential to the effective implementation of the Program.
 - The NRLSD shall adopt and enforce the administrative and technical requirements of the applicable Parts and Sections of the Code of PNRI Regulations and the applicable IAEA Safety Standards and Requirements in the implementation of the Program. It shall provide the list of applicable Parts and Sections of the CPR and IAEA Safety Standards and periodically review and update this list.
- (c) The PNRI shall establish and maintain a system of regulatory policy and guidance documents reflective of current national and international standards, recommendations and practices.

VI. MISSION:

The PNRI contributes to the improvement of the quality of Filipino life through the highest standards of nuclear research and development, specialized nuclear services, nuclear technology transfer, and efficient and effective implementation of nuclear safety practices and regulations.

VISION:

The PNRI is an institution of excellence in nuclear science and technology propelled by a dynamic and committed workforce in the mainstream of national development.

VII. POLICY DIRECTIONS:

All resources of the Institute shall be utilized solely for activities that directly enhance its capability and lead towards the attainment of its mission and vision.

- (a) All programs and projects shall be in support of the PNRI mandate and the National Science and Technology Plan of the DOST.
- (b) Research and Development (R & D) technical extension activities shall be conducted according to the highest standards of quality as defined by appropriate national and international standards.
- (c) PNRI regulations shall be consistent with international standards of safety.
- (d) PNRI shall implement a nuclear regulatory control program effectively independent of its promotional functions.
- (e) PNRI employees shall be provided with a conducive environment and opportunities for professional advancement and growth.

VIII. STRATEGIES:

To implement the above policies, the PNRI shall adopt the following strategies:

- (a) Strengthen core competencies in nuclear S&T through the development of centers of excellence;
- (b) Strengthen regulatory effectiveness through an updated regulatory regime and a continuing process of consultations with stakeholders;
- (c) Establish/upgrade facilities for the efficient conduct of research and delivery of services;
- (d) Enhance public awareness of nuclear safety and peaceful applications of nuclear S&T;
- (e) Implement a comprehensive human resource development program in nuclear S&T and nuclear regulations;
- (f) Establish stronger collaboration with the academe, professional organizations, the private and public sectors through linkages, joint undertakings, and networking;
- (g) Enhance bilateral, regional and international/multilateral collaboration in nuclear S&T;
- (h) Optimize the application of Information and Communication Technology (ICT) for improved PNRI operations, more efficient data access/exchange and stronger national and international linkages;
- (i) Institutionalize an Integrated Management System (IMS) for PNRI operations; and
- (k) Increase self-reliance and achieve a high degree of sustainability for the PNRI through the intensification of efforts to market its products and services.

Subject to periodic modification and revision as events and conditions change internally within the Institute, externally as part of a larger science and technology community, and ultimately with changes in the Filipino society's needs, expectations and aspirations.

IX. GENERAL FUNCTIONAL STATEMENTS:

IX.1 OFFICE OF THE DIRECTOR:

IX.1.1 DIRECTOR: The Director shall:

- Formulate and adopt a comprehensive nuclear science and technology plan, including manpower training, infrastructure and institution building, and monitor its implementation;
- Provide executive direction over all functions of the PNRI;
- Exercise supervision and control over all units in the implementation of their work programs;
- Establish policies and guidelines for nuclear research and development, nuclear services and training activities;
- Direct implementation of the nuclear regulations and licensing responsibility of the Institute;
- Approve rules and regulations necessary to carry out all functions and objectives; and
- Represent the Institute in international nuclear conferences/meetings.

IX.1.2 DEPUTY DIRECTOR: The Deputy Director shall:

- Assist the Director in providing executive direction over all functions of the Institute;
- Assist in the formulation and adoption of a comprehensive science and technology plan, including manpower training, infrastructure and institution building, and in the monitoring of its implementation;
- Assist in providing executive direction over all functions of the PNRI;
- Assist in the supervision and control over all units in the implementation of their work programs;
- Assist in the establishment of policies and guidelines for nuclear research and development, nuclear services and training activities;
- Assist in directing the implementation of the nuclear regulations and licensing responsibility of the Institute;

- Assist in the approval of rules and regulations necessary to carry out all functions and objectives; and
- Represent the Director in international nuclear conferences/meetings in his/her absence.

IX.2 DIVISIONS:

IX.2.1 Nuclear Regulations, Licensing and Safeguards Division (NRLSD)

The NRLSD is primarily responsible for licensing and regulating the possession and use of nuclear and radioactive materials in accordance with R.A. 2067 and R.A. 5207 as duly amended, and for implementing nuclear safeguards in accordance with international commitments.

These responsibilities include protecting public health and safety, protecting the environment, protecting and safeguarding nuclear materials and radioactive materials in the interest of national security. PNRI functions as regulatory authority, nuclear and radiation safety standards setting and rulemaking; technical safety reviews and studies; issuance of radioactive material and permits licenses; regulatory compliance monitoring and inspection, investigation, and enforcement; evaluation of licensee's operating experience.

The NRLSD has the following Sections:

- (i) **Standards Development Section (SDS).** SDS plans, programs, coordinates and carries out the establishment, formulation/development of licensing criteria, standards, guides, rules and regulations.

SDS shall perform the specific functions and responsibilities:

- Develop/adopt licensing rules, regulations, standards, criteria and guides;
- Update/upgrade current licensing regulations, standards, criteria and guides;
- Review, evaluate foreign and international licensing regulations, standards, criteria and guides;
- Conduct studies/researches in the field of standards development; and
- Conduct studies/literature searches on the technical aspect of licensing and regulations.

- (ii) **Licensing Review and Evaluation Section (LRES).** LRES plans, programs, coordinates and carries out the review, evaluation and assessment of applications for radioactive material licenses and licensed atomic energy users/facilities to ensure conformance of established rules, regulations and criteria.

LRES shall perform the specific functions and responsibilities:

- Receive and process applications for new licenses, renewals and amendment;
- Interact with licensees/applicants and conducts pre-licensing visits to verify compliance of applicant with commitments made in the application;
- Evaluate applications and prepares evaluation reports;
- Conduct assessment and evaluation of regulatory functions based on inspections done by the Inspection and Enforcement Section;
- Follow-up status of licensees;
- Coordinate/follow-up activities of the Nuclear Medical Advisory Group;
- Evaluate design/approval of sealed sources and shipping containers; and
- Conduct liaison work with the PNRI services group.

- (iii) **Inspection and Enforcement Section (IES).** The IES plans, programs, coordinates and carries out inspection and enforcement activities on licensed atomic energy materials and facilities.

IES shall perform the specific functions and responsibilities:

- Conduct regular inspections and audits of license atomic energy materials and facilities;
- Establish regulatory inspection and enforcement program and procedures for the licensing of radioactive materials and facilities;
- Verify (through review and evaluation) licensee's programs and procedures to determine compliance to PNRI regulations and license conditions;
- Verify, through actual field verification and interfacing activities with cognizant license personnel, whether licensee's submitted programs, procedures, instructions are properly implemented and accomplished;
- Conduct regular refresher courses for inspectors to enhance and update inspector's knowledge and information; and
- Enforce PNRI regulations and requirements through the recommendations for the issuance of citations, notices of violations and other enforcement actions of the Institute.

- (iv) **Safeguards Section (SGS).** SGS plans, programs, conducts and carries out projects and inspections in support of international nuclear safeguards commitment and the physical security of nuclear materials and facilities.

SGS shall perform the specific functions and responsibilities:

- Maintain the state system of accounting for and control of nuclear materials;
- Conduct Physical Inventory Verification (PIV) of nuclear materials and Design Inventory Verification (DIV) of nuclear facilities;
- Formulate and implements the physical security regulations for nuclear and radioactive materials and facilities;
- Implement foreign assisted projects on security of nuclear and radioactive materials and facilities;
- Provide technical inputs to international agreements and conventions signed and entered into force related to International Atomic Energy Agency (IAEA) Safeguards and Security; and
- Develop the national strategy for improving control over radioactive sources.

- (v) **Radiological Impact Assessment Section (RIAS).** RIAS plans, manages and implements regulatory research and studies in support of the various regulatory functions of the NRLSD including planning and preparedness activities for response to radiological emergencies.

RIAS shall perform the specific functions and responsibilities:

- Perform radiological impact assessment of radiation emitting facilities and operations and recommends appropriate regulatory actions to resolve on going and potential safety issues;
- Collect and analyze data and evaluates its potential impact to human the radiological risks involved;
- Coordinate planning and preparedness activities for response to radiological emergencies;
- Conduct training programs in coordination with the nuclear training section, for response teams and personnel radiological emergencies;
- Maintain technical capability to perform computer modeling and software operationalization for safety and radiological impact assessment;
- Initiate and conduct research in radioecology, radioactive waste safety, and Health Physics; and
- Coordinate with other agencies in areas of regulations, training and administration of nuclear safety particularly in the field of radiological environmental impact assessment.

IX.2.2 Atomic Research Division (ARD)

The ARD shall perform the following functions:

- Participates in policy formulation and decision-making on atomic energy matters particularly in the Institute's nuclear research and development programme;

- Initiates and promotes research, development and demonstration activities in nuclear Science and Technology in the following areas:
 - Agriculture and natural resources;
 - Biomedicine including radiobiology, radiation-related biomedical technology and public health and safety;
 - Health physics and ecology;
 - Physics, chemistry, analytical measurements and geo-nuclear materials;
 - Industrial applications of radioisotopes and nuclear techniques;
 - Such other fields as may be directed in line with national development objectives; and
 - Initiates and promotes collaborative researches in nuclear energy with other government agencies, the universities and the private sector.

IX.2.3 Nuclear Services and Training Division (NSTD)

The NSTD shall perform the following functions:

- Provides specialized services in nuclear technology and related matters to researchers and technologists of the PNRI and other agencies in the government and the private sectors;
- Develops and fabricates equipment, tools, devices and support facilities for the handling and application of radiation in different fields of scientific research and/or technology development projects;
- Operates the research reactor and radiation facilities of the Institute to serve the needs of the researchers and technologists of PNRI and other government and private agencies; and
- Conducts training programs and maintain facilities and information centers for the development of local manpower and the transfer of nuclear technology to both government and private sectors.

IX.2.4 Finance and Administrative Division (FAD)

FAD shall develop and recommend policies on fiscal and administrative matters and undertakes the following fiscal activities of the Institute:

- Preparation of the annual budget;
- Judicious accounting of the Institute's resources;
- Responsible pre-auditing of financial expenditures;
- Provision of cashiering and collecting services;
- Generation of financial resources for PNRI;
- Provision of an efficient property procurement and supplies management; and
- Recommending economy measures for more efficient and effective operations.

Approved:



ALUMANDA M. DELA ROSA, Ph.D.

August 10, 2007

Date

Appendix A

History of PNRI:

- **1958** - Republic Act No. 2067 (Science Act of 1958) created the Philippine Atomic Energy Commission (PAEC). At the initiative of PAEC, the Congress enacted R.A. 3589 amending R.A. 2067.
- **1968** - Republic Act No. 5207 (Atomic Energy Regulatory and Liability Act of 1968) was enacted by the Congress to establish the comprehensive nuclear regulatory function of PAEC.
- **1974** - Presidential Decree No. 606 issued on December 13, 1974 constituted PAEC as an independent and autonomous body transferring the same from the National Science Development Board (NSDB) to the Office of the President (OP).
- **1977** - With the creation of the Ministry of Energy (MOE) under Presidential Decree 1206 dated October 6, 1977, PAEC was transferred to the control and supervision of the MOE from the Office of the President.
- **1980** - Executive Order No. 613 dated August 15, 1980 transferred PAEC from MOE back to the Office of the President.
- **1981** - Executive Order No. 708 which was promulgated on July 27, 1981 attached PAEC to the Office of the Prime Minister.
- **1984** - On March 17, 1984, Executive Order No. 784 reorganized NSDB to National Science and Technology Authority (NSTA) and placed PAEC under its administrative supervision. Executive Order No. 980 dated August 29, 1984 converted PAEC from a single-headed agency into a multi-headed agency composed of a Chairman and four Associate Commissioners forming the Board of Commissioners.
- **1987** - In Executive Order No. 128 dated January 30, 1987, the NSTA was reorganized to the Department of Science and Technology (DOST) and PAEC became the Philippine Nuclear Research Institute (PNRI) headed by a Director and assisted by a Deputy Director.