

Republic of the Philippines
HOUSE OF REPRESENTATIVES
Quezon City

Seventeenth Congress
First Regular Session

House Bill No. **4319**



Introduced by: **Hon. Celso L. Lobregat**

EXPLANATORY NOTE

This is a re-filed bill, which seeks to create the "**Environmental Engineering Law of the Philippines**," filed during the 15th and 16th Congress and referred to the Committee on Civil Service and Professional Regulation.

The Philippines is known to be blessed with abundant natural resources. The country has fertile, arable lands, diverse flora and fauna, extensive coastlines, and rich mineral deposits.

The advent of modern technology affects the environment by compromising human health and safety, endangering natural ecosystems and biodiversity. Greenhouse gases affect atmosphere and weather systems, causing global warming. These negative consequences on our environment have drawn a lot of attention on a global scale.

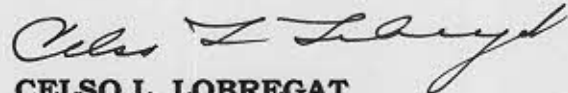
Considering the worldwide threat of climate change due to human-induced activities and the country's need to strive towards economic growth while sustaining the environment, there is the growing concern to adopt policies that give the right balance on both.

Environmental Engineering is the application of science and engineering principles to improve the environment to provide healthy water, air, and land for human habitation and for other organisms, and to remediate polluted sites. Environmental engineers are actively involved in the design of systems and processes used for pollution control and mitigation. Physical, chemical and biological aspects of treatment processes are investigated and developed.

Environmental Engineering is not new in the field of engineering and it has been practiced in the Philippines for more than four decades. Despite this, Philippines is yet to embrace the promise of professionalizing the practice of Environmental Engineering.

Thus, this bill seeks to professionalize and regulate the practice of environmental engineering in the Philippines to advance the cause of a balanced and healthful environment in the midst of industrial and economic growth.

In view of the foregoing, approval of this bill is earnestly sought.



CELSO L. LOBREGAT

Representative

Zamboanga City, 1st District

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ENVIRONMENTAL ENGINEERING ACT OF THE PHILIPPINES

Be it enacted by the Senate and House of Representatives of the Philippines in Congress assembled:

ARTICLE I

TITLE OF THE ACT AND DEFINITION OF TERMS

Section 1. Title of the Act.- This Act shall be known as the "Environmental Engineering Law of the Philippines."

Section 2. Definition of Terms.

- a. Environmental Engineering- It is the application of science and engineering principles to protect and improve the environment including but not limited to air, water, and/or land resources, to provide safe water, air, and land for human habitation and for other organisms, and to remediate polluted sites.
- b. "Environmental Engineer"- a person duly registered with the Board of Environmental Engineering under this Act and is authorized to practice environmental engineering in the Philippines.

Section 3. Scope of Practice.- The scope of practice of environmental engineering, within the meaning and intent of this Act, shall embrace, inter alia, professional services in the form of:

- a. Planning, designing, supervising, modifying or improving waste collection, treatment and disposal facilities; water supply, source evaluation, conveyance, treatment and distribution systems; solid waste, toxic, hazardous and radioactive waste collection, treatment and disposal systems;

- b. Supervising the operation of environmental engineering facilities or programs such as solid, toxic, hazardous and/or radioactive treatment facilities, wastewater treatment plants, air pollution control facilities and/or water works;
- c. Conducting and preparing technical reports and other related documents required for works listed in subsection 3.a;
- d. Investigating and studying physical phenomena to develop programs and methods to conserve natural resources and prevent, abate, or control pollution of the environment;
- e. Planning comprehensive programs to enhance the environment, developing and managing programs for the use or protection of such resources in order to attain sustainable development;
- f. Carrying out relevant research, development, planning, design, advisory, consultancy and other related engineering activities in order to achieve sustainable development;
- g. Conduct and prepare environmental impact assessment of projects and undertakings, and other environmental compliance reports as may be required by law;
- h. Teaching Environmental Engineering subjects in schools, institutions, colleges and universities of learning;
- i. Employment with government, provided such item or position requires the knowledge and experience of an Environmental Engineer.

Section 4. Employment of Environmental Engineers.- Firms, companies, partnerships or associations who are engaged in the installation, construction, manufacture or sale of environmental equipments, facilities and other environmental processes, shall hire or engage the services of at least one (1) registered environmental engineer. Furthermore, industries, establishments, institutions, waterworks, and facilities which generate, treat, discharge and/or dispose waste shall also be required to hire or engage the services of at least one (1) registered environmental engineer who shall at the same time perform functions of a Pollution Control/ Environmental Officer.

The proprietor or manager of a firm, partnership or association which employs a licensed environmental engineer shall post or cause to be posted in a conspicuous place within the place of business of the firm, partnership or association, the certificate of registration of the environmental engineer.

ARTICLE 2

BOARD OF ENVIRONMENTAL ENGINEERING

Section 5. Creation of a Board of Environmental Engineering.- Within 30 days after the approval of this Act, there shall be created a Board of Environmental Engineers, hereinafter referred to as the Board, which shall be composed of a chairperson and two (2) members. They shall be appointed by the President of the Philippines from among those recommended by the Society of Environmental Engineers of the Philippines (SEEP), which shall be the accredited professional organization for environmental engineers.

Section 6. Tenure of the Board Member.- The members of the Board shall hold office for a term of three (3) years after their appointment until their successors shall have been appointed and shall have duly qualified; Provided, however, That the members of the Board first appointed under this act shall hold office for the following terms: one member for one (1) year; one member for two (2) years; and one member for three (3) years. Each member of the Board shall qualify by taking the proper oath of office before assumption of his duties.

Section 7. Qualification Board Members.- Each member of the Board shall, at the time of his appointment, possess the following qualifications:

- a. A citizen of the Philippines;
- b. At least 30 years old and of good moral character;
- c. A holder of a Bachelor's degree in Environmental Engineering or its equivalent from a recognized and legally constituted institution of higher learning and with at least five (5) years of practical experience in environmental engineering prior to his/her appointment; or a degree holder of any field of engineering with Masters and/or Doctorate degree in Environmental Engineering and with at least three (3) years of practical experience in environmental engineering prior to his/her appointment.
- d. A registered environmental engineer duly qualified to practice environmental engineering in the Philippines. The members of the first Board shall be deemed automatically registered as environmental engineers upon assumption of their duties as members of the Board.
- e. Not a member of the faculty of any school, college or university where a regular course in environmental engineering is taught, nor have pecuniary interest in such institution. No former member of the faculty of any school, institute or university where environmental engineering is

taught can become a member of the Board unless she/ he has stopped teaching for at least three consecutive years.

Section 8. Causes for Removal from Office.- Any member of the Board may be deemed removed from office for neglect of duty, incompetence, malpractice, unprofessional, unethical, immoral or dishonorable conduct after having been given the opportunity to defend himself in a proper administrative investigation; Provided, That during the process of investigation, the President of the Philippines shall suspend such member under investigation and shall appoint a temporary member in his place. Vacancies in the Board shall be filled for the unexpired term only.

Section 9. Powers and Functions of the Board.- The Board shall have the following powers and functions:

- a. Issue certificates of registration for the practice of environmental engineering and suspend or revoke the same for causes provided herein;
- b. Issue certificates of recognition to environmental engineers already registered under this Act for specialized training undertaken in solid waste management, toxic, hazardous and radioactive wastes, water and wastewater treatment, air pollution, climate change, and sustainable development, or in any branch of environmental engineering, subject to the approval of the Professional Regulations Commissions, hereinafter referred to as Commission;
- c. Approve registration without examination and the issuance of corresponding certificates of registration in accordance with Section 13 of Article III of this Act;
- d. Determine and prepare contents of licensure examinations; score and rate the examination papers and submit the results thereof to the Commission within twenty (20) days after the last examination day;
- e. Adopt a Code of Ethics in the practice of environmental engineering;
- f. Adopt an official seal to authenticate its official documents;
- g. Inspect, in coordination with the Commission on Higher Education, at least once a year, educational institutions offering courses in environmental engineering in the Philippines to ensure that these institutions maintain a high standard of environmental engineering education;
- h. Prepare syllabus for environmental engineering licensure examination;
- i. To look into, from time to time, the conditions affecting the practice of environmental engineering profession and adopt measures necessary for the enhancement of the environmental engineering profession including, but not limited to, the preparation of materials necessary for the mandatory continuing education of environmental engineers;

- j. Investigate violations of this act and the rules and regulations hereunder as may come to its knowledge and, for this purpose issue subpoena and subpoena *duces tecum* to secure the appearance of witnesses and exhibition of the documents and other evidence necessary in connection with the performance of its functions;
- k. Delegate the conduct of hearing or investigation of administrative cases filed before the Board;
- l. Promulgate decisions on such administrative cases subject to the review by the Commission;
- m. Issue, with the approval of the Commission, such rules and regulations as may be deemed necessary to carry out the provisions of this Act; and
- n. Discharge such other powers and duties as may affect professional, ethical and technological standards of the environmental engineering profession in the Philippines.

Section 10. Compensation of the Board.- The Chairperson and members of the Board shall receive compensation and allowances comparable to the compensation and allowances received by existing regulatory boards with Professional Regulations Commission (PRC), hereinafter referred to as the Commission, as provided for in the General Appropriations Act.

Section 11. Supervision of the Board, Custodian of its Records, Secretarial and Support Services.- The Board shall be under the administrative supervision of the Commission. All records of the Board, including the application for the examination, examinations papers and results, minutes of deliberation, administrative cases and other investigations involving Environmental engineers shall be kept by the Commission. The Commission shall designate the Secretary of the Board and shall provide the secretariat and other support services to implement the provisions of this Act.

Section 12. Annual Report.- The Board shall, at the end of each calendar year, submit to the Commission a detailed report of its activities and proceedings during the year embodying also such recommendations as it may deem proper to promote the policies and objectives of this Act.

ARTICLE III

EXAMINATION AND REGISTRATION

Section 13. Registration Required.- Upon the effectivity of this Act, no person shall practice or offer to practice environmental engineering in the Philippines without having obtained the proper certificate of registration from the Board.

Section 14. Examination Requirements.- Except as otherwise permitted under Section 15 of this Title, all applicants for registration for the practice of environmental engineering shall be required to pass the examinations herein provided.

Section 15. Registration without Examination.- A certificate of registration for environmental engineers shall be issued to any applicant by the Board first constituted, without requiring the passing of the examination herein prescribed; Provided, That he/she registers within three (3) years after the constitution of the said Board and that he/she possesses the following qualifications:

- a. He/She must be at least twenty-one (21) years old;
- b. He/She must be a Filipino citizen;
- c. He/She must have practiced environmental engineering; and
- d. He/She must have any of the following academic and/or training background or experience:
 1. A degree in environmental engineering or its equivalent from a recognized and legally constituted school, college or university, plus at least two (2) years of environmental engineering experience;
 2. A degree in any field of engineering plus a masters and/or doctorate degree in environmental engineering from a recognized and legally constituted school. College or university, plus at least three (3) years of environmental engineering experience;

In lieu of the two (2) year experience required under this section, the applicant for registration without examination must complete a modular refresher course covering the five (5) major subjects in Environmental Engineering as prepared by SEEP and approved by the Board and the Commission.

Section 16. Holding of Examination.- Examination for candidates desiring to practice environmental engineering in the Philippines shall be given once a year in Metro Manila, and at such other regions with a minimum of fifty (50) examinees, at such dates to be determined by the Commission.

Section 17. Subjects of Examination.- Applicants for certificates of registration as environmental engineers shall be examined on the following subjects and shall be given the respective weighted percentage:

1. Engineering Mathematics (20%)- algebra, trigonometry, differential and integral calculus, differential equations, statistics, solid mensuration and fluid mechanics;
2. Environmental Engineering Sciences (20%) – Environmental chemistry and microbiology, environmental resources, environmental science, ecology, environmental geology, environmental engineering hydrology;

3. Environmental Engineering Theory, Design and Practice (40%)- including but not limited to: Air and Noise pollution Control Engineering; Water and Wastewater Engineering Design; Solid & Hazardous Waste Management ; and
4. Environmental Impact Assessment and Environmental Laws (20%)

The said subjects and their syllabi may be amended by the Board so as to conform to technological changes brought about by continuing trends in the profession.

Section 18. Rating in the Board of Examination.- To be qualified as having passed the Board examination for environmental engineers, a candidate must obtain a weighted general average of seventy percent (70%), with no grades lower than fifty percent (50%) at any subject, provided, however, that the weighted average in Environmental Engineering Theory, Design and Practice shall not be lower than seventy percent (70%). However, an examinee who obtains a weighted general average rating of seventy percent (70%) or higher but obtains a rating below fifty percent (50%) in any given subject, or seventy percent (70%) in the case of Environmental Engineering Theory, Design and Practice, s/he must take the examination in the subject or subjects where she obtained a grade below fifty percent (50%), or seventy percent (70%) in the case of Environmental Engineering Theory, design and Practice.

Section 19. Conditional Examination.- An applicant for examination who fails to pass the examination for the third time shall be allowed to take another examination only after the lapse of one (1) year from the last examination taken and having completed a refresher course; Provided, that the first examination and the removal examination, if s/he fails, shall be considered as one failure.

Section 20. Qualifications for Examination.- Any person applying for admission to the environmental engineering examination as herein provided shall, prior to the dates of the examination, establish to the satisfaction of the Board that s/he has the following qualification:

- a. A citizen of the Philippines;
- b. At least twenty-one (21) years old; and
- c. A holder of any of the following:
 1. Bachelor's degree in environmental engineering or its equivalent acceptable to the Board;
 2. Bachelor's degree in any other field of engineering with masters and/or doctorate degree in environmental engineering with three (3) years environmental engineering experience.

Section 21. Oath of Environmental Engineers.- All successful candidates in the examination shall take the prescribed oath before the Board or before any other government official authorized to administer such oath prior to entering the practice of the profession.

Section 22. Issuance of Certificates of Registration and Professional License.- The Board shall issue a certificate of registration and professional license to the successful examinees after having undertaken the professional oath as prescribed in the preceding section, and upon payment of the registration fee as required by the Commission.

Section 23. Exception from Registration.- Registration shall not be required of foreign environmental engineers or experts called in by the Philippine Government for consultation for specific environmental engineering services as defined under this Act; Provided, that this practice shall be limited to such work; and Provided, further, That they do not engage in private practice at their own account as environmental engineers.

Section 24. Refusal to Issue Certificate of Registration.- The Board shall not issue a certificate of registration to any person who suffers from the following disqualifications:

- a. Conviction by final judgement by a court of competent jurisdiction of any criminal offense involving moral turpitude;
- b. Conviction by final judgement in administrative case of any offense involving immorality or notoriously undesirable conduct; and
- c. Has an unsound mind. In case of refusal to issue a certificate, the Board shall issue to the applicant a written statement setting forth the reasons for such refusal.

Section 25. Suspension and Revocation.- The Board shall have the power, after due notice and hearing, to suspend and/or revoke the certificate of registration previously issued for any cause/s mentioned in the preceding section.

Section 26. Engineering Services of a Registered Environmental Engineer.- All plans and documents and/or alterations thereof relating to projects and undertakings which shall pose or threatens to pose significant environmental impacts to environment shall not be considered valid without the signature and seal of a registered environmental engineer.

Section 27. Roster of Environmental Engineers.- A roster showing the names and places of business of all registered

environmental engineers shall be prepared and kept by the Board and by the Secretary of the Commission. Copies of this roster shall be furnished to all building officials and government agencies involved in the protection and conservation of the environment and shall be made available to the public upon request.

Section 28. Re-issuance and Replacement Certificate.- The Board may, after the expiration of one (1) year from the date a certificate of registration is revoked and for valid reasons, entertain an application for the issuance of a new certificate of registration.

Section 29. Use of Seal.- All registered environmental engineers shall obtain a seal of such design as the Board shall authorize and direct; Provided, however, that the serial number of the certificate issued by the Board shall be included in the design of the seal. Plans and specifications prepared by, and under the direct supervision of a registered environmental engineer shall be stamped with said seal during the life of the registrant's certificate, and it shall be unlawful for any person to stamp or seal any documents with the said seal after the certificate of registrant named thereon has expired or has been revoked, unless said certificates shall have been renewed or re-issued.

Section 30. Firms and Corporations engaged in Environmental Engineering practice.- A firm, partnership, corporation or association may engage in the practice of environmental engineering in the Philippines: *Provided*, That such practice is carried out under the supervision of an environmental engineer or environmental engineers holding valid certificates issued by the Board.

ARTICLE IV

ENFORCEMENT OF ACT AND PENAL PROVISION

Section 31. Enforcement by Government Officials and Officers of the Law.- It shall be the duty of all government officials and duly constituted law officers of the national, provincial, city and municipal governments, to assist the Board and the Commission in enforcing the provisions of this Act and to prosecute any person violating the same. In this connection, head of government offices, departments, bureaus, government-owned or controlled corporations, provincial governors, and city and municipal mayors shall appoint qualified and/or registered environmental engineers to positions requiring the knowledge, skill, and competence of environmental engineers.

Section 32. Penal Provision.- Any person committing any of the following acts shall, upon conviction, be sentenced by imprisonment of not less than six (6) months, nor more than five (5) years, or a fine of not less than ten thousand (Php 10,000.00) nor more than fifty thousand (Php 50,000.00) or both, in the discretion of the Court:

- a. Engaging in the practice of environmental engineering in the Philippines without having been registered or without having conformed to the provisions of the Decree;
- b. Presenting or attempting to use as his own the certificate of registration of a registered environmental engineer;
- c. Giving any false or forged evidence of any kind to the Board, or impersonating any registered environmental engineer;
- d. Attempting to use a revoked or suspended certificate of registration;
- e. Using in connection with his name or otherwise assuming, using or advertising any title or description tending to convey the impression that he is an environmental planner without holding a valid certificate of registration; or
- f. Violating any of the provisions of this Act. In case the offender is a corporation, partnership or juridical person, the penalty of imprisonment shall be imposed on the officer or officers responsible for permitting or causing the violation.

ARTICLE V

MISCELLANEOUS PROVISIONS

Section 33. Reciprocity Requirements.- No person who is not a citizen of the Philippines at the time he/she applies to take the examination shall be allowed to take it unless he can prove in the manner provided by the Rules of Court that, by specific provision of law, the country of which he is a citizen, subject, or national either admits citizens of the Philippines to the practice of the same profession without restriction or allows them to practice it after an examination on terms of strict and absolute equality with citizens, subjects, or nationals of the country concerned, including the unconditional recognition of degrees issued by institutions of learning duly recognized for the purpose by the Government of the Philippines; *Provided*, That if he is not a citizen of the Philippines, and was admitted to the practice of a profession in the Philippines before the enactment of this law, his active practice in that profession, either in the Philippines or in the state or country where he was practicing his profession, shall not have been interrupted for a period of two years or more prior to this enactment, and that the country or state from which he comes allows citizens of the Philippines by specific provision of law, to practice the same profession without restriction or on terms

of strict and absolute equality with citizens, subjects or nationals of the country or state concerned.

Section 34. Appropriations.- The Chairperson of the Professional Regulation Commission shall immediately include in the Commission's programs the implementation of this Act, the funding of which shall be included in the annual General Appropriations Act.

The amount necessary to carry out the initial implementation of this Act shall be charged against the current year's appropriations of the Professional Regulations Commission. Thereafter, such sums as may be necessary for the continued implementation of this Act shall be included in the succeeding General Appropriations Act (GAA).

Section 35. Repealing Clause.- All laws, parts of laws, decrees, orders, letters of instructions and ordinances, or regulations in conflict with the provisions hereof, are hereby repealed or modified accordingly.

Section 36. Separability Clause.- If any part or section of this Act shall be declared unconstitutional, such declaration shall not invalidate the other provisions hereof.

Section 37. Effectivity. This Act shall take effect upon its approval.

Approved.