GOVERNMENT OF NAGALAND
POWER DEPARMENT

NOTIFICATION

Dated Kohima, the ____ th November 2024

No. PWR/ In pursuance of Regulation 31 of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023 and in supersession of all notifications in this regard, the Governor of Nagaland is pleased to order that the grant of Licenses, Certificates and Permits to Electrical Contractors, Electrical Supervisors and Electrical Workmen respectively shall be governed by following regulations, namely –

The Nagaland Electrical Licensing Regulations, 2024.

1. **Short title, extent and commencement. –** (1) These regulations shall be called the Nagaland Electrical Licensing Regulations, 2024.

   (2) They shall extend to the whole of Nagaland.

   (3) They shall come to force from the date of publication in the official Gazette.

   (4) The words used in these regulations shall have the same meaning as defined and assigned to them in the Electricity Act, 2003 and the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023.

2. **Constitution of Licensing Board.** – (1) For carrying out the purposes of these regulations, a licensing Board namely, "The Nagaland Electrical Licensing Board" hereinafter referred to as "the Board", shall be constituted by the Government of Nagaland.

   (2) There shall be a Member Secretary to the Board, hereinafter referred to as "the Secretary".

3. **Members of the Licensing Board. -** The Board shall consist of the following members:

(a)	The Chief Electrical Inspector, Government of Nagaland.	-	Chairman (ex-officio)
(b)	The Senior Electrical Inspector/ Electrical Inspector, Government of Nagaland.	-	Member Secretary (ex-officio)
(c)	The Principal, Industrial Training Institute, Kohima.	-	Member (ex-officio)
(d)	Works & Housing Department, to be nominated by the Department.	-	Member
(e)	Power Department, to be nominated by the Department.	-	Member
(f)	Nagaland Electrical Contractors Union, (NECU), one representative.	-	Member

4. Place and term of Office. – (1) The office of the Board shall be situated in the State capital.

(2) The term of members other than ex-officio members of the Board shall be three years or such shorter period as the State Government may direct. The Board shall have powers to act not withstanding any vacancy in its membership.

5. Functions of the Board. - The functions of the Board shall be;

(a) To grant Licenses to Electrical Contractors;

(b) To conduct examination for Electrical Supervisors and Electrical Workmen;

(c) To grant Certificates to Electrical Supervisors and Permits to Electrical Workmen;

(d) To enquire into allegations of incompetence, negligence, violations of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023 or malpractice on the part of Workmen/ Supervisors/ Contractors holding Permits/ Certificates/ Licenses granted by the Board or breach of conditions as may be considered necessary;

(e) To maintain registers of licensed Electrical Contractors, Electrical Supervisors, and Electrical Workmen; and

(f) Generally, to carry out the provisions of these regulations.

6. Meeting of the Board and Quorum. – (1) The Board shall meet once in three months or at such other times as maybe in the opinion of the Secretary, necessary for transaction of business.

(2) The Chairman and the Secretary together with two other members shall form a quorum at any meeting of the Board.

(3) The Chairman or in his absence, one of the members present who may be elected at the meeting (other than the Secretary), shall be the Chairman of the meeting.

7. Duties of the Chairman. - The Duties of the Chairman shall be;

(a) To preside over meetings of the Board;

(b) To take necessary actions to implement decisions of the Board;

(c) To keep liaison between the Board and the Government; and

(d) To sign and issue jointly with the Secretary - Contractor's License, Supervisor's Certificates and Workmen's Permits.

8. Duties of the Secretary. - The duties of the Secretary shall be;

(a) To receive applications for Contractor's Licenses, Supervisor's Certificates, Workmen's Permit and process them;

(b) To maintain registers of Contractor's Licenses, Supervisor's Certificates and Workmen's Permits;

(c) To make all correspondences on behalf of the Board regarding issue/ renewal/ allegation etc. in respect of Licenses, Certificates and Permits;

(d) To place before the Board/ Chairman any matter regarding violation of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023 or conditions of Licenses/ Certificates/ Permits by Contractors/ Supervisors/ Workmen.

9. **Electrical Contractor's License. –** (1) Definition: A person or firm who contracts with owner of Electrical Installation or any agent on its behalf, to carry out electrical and other related work and possesses license issued by the Board.

No Electrical Installation work shall be undertaken except by an Electrical Contractor licensed under these regulations read with Regulation 31 of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023.

(2) General requirements for application of an Electrical Contractor's License; A person or a firm who satisfies the following requirements;

(a) Himself holds an Electrical Supervisor's Certificate or who has in his employ atleast 1 (one) Electrical Supervisor holding a valid Certificate of granted by the board and who is not in employ of a Government or any other agency.

(b) Has in his employ atleast 2 (two) Electrical Workman holding a valid Permit granted by the Board and who is not in employ of a Government or any other agency.

(c) Is an Indigenous Inhabitant of Nagaland and not below 18 years of age. In case of company/ partnership firm, all the partners shall also be Indigenous Inhabitant of Nagaland and not below 18 years of age.

(d) Has in his possession the instruments prescribed for the class of contractor which he proposes to apply, as given is Annexure IV;

(e) Has a library containing Electricity Act 2003, Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023, Terms and Conditions of Supply of Electrical Energy, Nagaland Electrical Licensing Regulations, and any other book/ document prescribed by the Board from time to time;

(f) Pays in advance the prescribed fees and fulfil the conditions laid down in the application form;

(g) Satisfies other requirements that the Board may prescribe from time to time such as proof of address of the Contractor's establishment, Financial capability, production of trade license, etc.

(h) Has a registered office within the state, for which GST registration for State of Nagaland shall be produced along with Turn Over/ Balance Sheet for last 3 (three) years. Production of Turn Over/ Balance Sheet may be waived by the Board in case of applications for new Class-II Contractors.

Provided that the Class of the Electrical License that may be granted to the person or firm shall be as specified in Regulation 10 and 11 of these regulations.

Provided further that the Board may refuse to grant such license to any person (or a firm) who (or which) in the opinion of the Board is not fit to hold such license. The Electrical Contractor's License is not transferable.

10. Classes of Electrical Contractors. – There shall be two classes of licensed Electrical Contractors namely: Class-I and Class-II.

(1) A Class-I Electrical Contractor shall be eligible to carry out electrical installation works of the following voltage levels which shall be specifically mentioned in the Licence;

(a) Exceeding 33 kV
(b) Not Exceeding 33 kV
(c) Not Exceeding 650 Volts

Provided that atleast 1 (one) Electrical Supervisor and atleast 1 (one) Workman employed by a Class-I Electrical Contractor shall be a holder of a Certificate or Permit respectively of appropriate voltage level (ie. Exceeding 33 kV/ Not Exceeding 33 kV/ Not Exceeding 650 Volts, as the case may be, as mentioned above).

Provided further that if the applicant himself is a holder of a Supervisor Certificate of appropriate voltage level, he need not employ another Supervisor.

(2) A Class-II Electrical Contractor shall be eligible to carry out electrical installation works up to voltage level not exceeding 250 volts which shall be specifically mentioned in the Licence.

Provided that if the applicant himself is a holder of a Supervisor Certificate of appropriate voltage level, he need not employ another Supervisor.

11. Grant of Electrical Contractor's License. – A person or a firm who satisfies the requirements given in Regulation 9 shall be granted an Electrical Contractor's License in the following manner.

(1) A Class I Electrical Contractor's License eligible to carry out electrical installation works of voltage level "Exceeding 33 kV" shall be granted only to a holder of Class 1 Electrical Contractor's License eligible to carry out installation works of voltage level "Not Exceeding 33 kV" and having 2 years experience and completed electrical installation works as considered satisfactory by the Board.

(2) A Class I Electrical Contractor's License eligible to carry out electrical installation works of voltage level "Not Exceeding 33 kV" shall be granted only to a holder of Class 1 Electrical Contractor's License eligible to carry out installation works of voltage level "Not Exceeding 650 Volts" and having 2 years experience and completed electrical installation works as considered satisfactory by the Board.

(3) A Class I Electrical Contractor's License eligible to carry out electrical installation works of voltage level "Not Exceeding 650 Volts" shall be granted only to a holder of Class II Electrical Contractor's License and having 3 years experience and completed electrical installation works as considered satisfactory by the Board.

(4) A Class I Electrical Contractor's License eligible to carry out electrical installation works of voltage level "Not Exceeding 650 Volts" may also be granted to a person who holds a Degree or Diploma in Electrical Engineering from a recognised Institution and who is not in full time employ of a Government or any other agency.

(5) A Class II Electrical Contractor's License shall be granted only to a person or a firm who, in the opinion of the Board, is fit to hold such license.

12. When Electrical Contractor's License shall not be granted. - (1) An Electrical Contractor's License shall not be granted to any holder of an Electrical Supervisor's Certificate or any holder of an Electrical Workman's Permit while he is in the employ of another Electrical Contractor.

(2) An Electrical Contractor's License shall not be granted to a person who is already a holder of an Electrical Contractor's License granted by this Board.

13. Endorsement of License of other States. – An Electrical Contractor who possesses a licence from another State's Licensing Board shall be allowed to take up electrical installation works in Nagaland in the following manner;

(a) Application for working in the state of Nagaland shall be submitted stating the purpose or project for which it is applied for.
(b) Authenticity of the Electrical Contractor License, Supervisor's Certificate and the Workman's Permit shall be verified to the satisfaction of the Board.
(c) Fees shall be same as that for fresh registration of Electrical Contractors as prescribed from time to time and the Endorsement, if granted, shall be for a period of 1 (one) year only, subject to extension if required for the completion of the purpose or project for which the endorsement was applied for.
(d) All procedures and conditions as applicable in these regulations including matters of misconduct or negligence shall be applicable to the Electrical Contractor license holder of other States, if granted endorsement, and the decision of the Board shall be conclusive and obligatory.
(e) An Endorsement/ Certificate mentioning the appropriate voltage class and the purpose for which granted shall be issued in 'Form D1' by the Board after full satisfaction of the verification process.

14. Applications and Forms for Electrical Contractor's License. – (1) Application for new Electrical Contractor's License shall be made to the Secretary in 'Form A' by paying the "Initial Fees" specified in the schedule of fees in Annexure-I.

(2) Applications for new Electrical Contractor's License shall normally be approved by the Board two times in a year.

(3) On approval of the application by the Board, the Electrical Contractor's License shall be issued in 'Form D' on payment of "Registration Fees" by the applicant as specified in the schedule of fees in Annexure-I.

15. Cancellation or suspension of Electrical Contractor's License. – (1) If Electrical Supervisor/ Electrical Workman, on the strength of which an Electrical Contractor's License has been granted leaves the service of such Electrical Contractor, such Contractor's License shall be deemed to have been suspended. If such Electrical Contractor fails to employ an Electrical Supervisor/ Electrical Workman within one month from the date on which the Electrical Supervisor/ Electrical Workman has left such Electrical Contractor's service, such Electrical Contractor's License shall be cancelled.

(2) If an Electrical Supervisor/ Workman to whom an Electrical Contractor's License has been granted accepts employment under any other Electrical Contractor, the Contractor's License granted to such Electrical Supervisor/ Workman shall be automatically cancelled.

(3) The Board may, at any time cancel an Electrical Contractor's License if the person or firm to whom the license has been granted is in the opinion of the Board, not fit to hold such license. For this purpose, the Board may take into consideration, amongst others, the provisions contained in Regulation 32 of these regulations.

16. Renewal of Electrical Contractor's License. – (1) Every Electrical Contractor's License granted under these regulations shall be renewed annually. A license which is not renewed after expiry will become invalid from the date of expiry. Application for renewal in 'Form K' together with the Electrical License in original and non-refundable prescribed fees shall be submitted to the Secretary before the date of expiry of the license

Provided that if the application for renewal as aforesaid is received within twelve months from the date of expiry of the license, it may be renewed on payment of the prescribed annual renewal fee and prescribed fee for late renewal of the license. The date of renewal after expiry will be twelve months from the date of last expiry.

(2) Electrical Contractor's License which has not renewed within twelve months from the date of expiry shall be automatically suspended. License not renewed up to three years shall be deemed cancelled. Fresh initial fee with an application in 'Form A' must be furnished as in case of fresh application before a new license will be granted.

(3) The license shall automatically become invalid after its expiry till renewal and no electrical work shall be done by the contractor while the license is invalid.

17. Forms to be maintained. – All licensed Electrical Contractors are required to maintain the following Forms and submit to the Secretary along with applications of renewal of licenses.

(a) Form H- 'Details of Supervisors, Workmen and Apprentices';

(b) Form I- 'Yearly return of work done';

(c) Form J- 'Notice before commencement of work' - should be submitted regularly whenever new works are to be taken up.

18. Register of Contractors. - A register of all Electrical Contractors Licensed under these regulations shall be maintained by the Secretary and published from time to time.

19. Electrical Contractor to keep instruments in good order. – (1) All Electrical Contractors to whom licenses have been granted shall keep all the prescribed instruments in good order.

(2) The instruments in the possession of every licensed Electrical Contractor may be inspected from time to time by the Secretary or his representatives.

20. Notice of termination of services. - If an Electrical Supervisor/ Workman in the employment of a licensed Electrical Contractor leaves his service, the termination of the service shall be notified in writing to the Secretary both by the Electrical Contractor and the Electrical Supervisor/ Workman.

21. Test reports. – (1) For all Electrical Installation works carried out under Regulation 31 of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023, a Test Report shall be submitted by the Electrical Contractor to the Electrical Supplier concerned.

(2) After carrying out all necessary tests of all electrical installation works, the Test Reports shall be filled up and signed by the Electrical Supervisor under whose supervision the works have been carried out. All the test results should be satisfactory and within permissible limits. The Test Reports shall be countersigned by the licensed Electrical Contractor.

(3) The licensed Electrical Contractors and Electrical Supervisor shall be jointly responsible for the due execution of all the electrical installation works and the materials used. The Electrical Supervisor shall be present at the time of testing by the Electrical supplier.

22. Electrical Supervisor's Certificate. – (1) Definition: A person, who is in charge of supervising the execution of electrical and other related works and is competent enough to carry out such works and possesses the Electrical Supervisor's Certificate issued by the Board.

All electrical installation work is to be carried under the direct supervision of an Electrical Supervisor holding a valid Certificate granted under these regulations read with Regulation 31 of the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023.

(2) Candidates for examination of Electrical Supervisor's Certificate shall be a person who satisfies the following requirements;

(a) Is an Indigenous Inhabitant of Nagaland and not below 18 years of age, and
(b) Have passed two years Trade Certificate in Electrician or Wireman trade from the National or State Council for Vocational Training or equivalent,
OR Have passed the examination for Electrical Workman and have atleast ten years practical experience.

23. Examination for Electrical Supervisor's Certificate. – (1) A candidate for examination must apply to the Secretary in the prescribed 'Form B' with all necessary documents and the examination fee.

(2) Candidate for examination of Electrical Supervisor's Certificate shall be examined by a written paper and by oral and practical tests. Candidates will normally be examined through the medium of English language but the Board may permit a candidate to be examined through any other medium as may be possible for the Board to arrange.

(3) For the purpose of these regulations, all electrical installation works shall be divided in classes as shown in sub-regulation (4) below.

(4) The syllabi of the different parts of the examinations are set out in Annexure-II. Candidates may appear in examinations for any Voltage Class of Certificate; existing Supervisor Certificate holders may appear for a higher class of Certificate. The parts to be passed for different classes of Certificate are as below;

Voltage Class of Certificate	Parts Compulsory
Not exceeding 250 volts	Part 1
Not exceeding 650 volts	Part 1 + Part 2
Not exceeding 33,000 volts	Part 1 + Part 2 + Part 3
Exceeding 33,000 volts	Part 1 + Part 2 + Part 3+ Part 4

24. Grant of Electrical Supervisor's Certificate. – (1) Every candidate who passes the examination for Electrical Supervisor will be granted a Certificate for installation works of different class as set out in 'Form E', which the board decides that they are competent to supervise, after paying the initial prescribed fee.

(2) The Board may also grant Electrical Supervisor's Certificate in any class commensurate with practical knowledge and experience to a candidate without requiring him to sit for written examinations, based on viva-voce, after paying the prescribed initial fee in following cases;

(a) A holder of Degree or Diploma in Electrical Engineering from a recognised Institution.

(b) A retired employee of Power Department in the rank of Supervisor and above.

(3) A Certificate issued by the Board shall be liable to further renewal until he attains the age of 65 years. Any further extension of a licentiate beyond the age of 65 years shall be subject to production of fitness certificate by the licentiate.

25. Renewal of Electrical Supervisor's Certificate. – (1) Every Electrical Supervisor's Certificate granted under these regulations shall be shall be renewed every year or three years at a time after paying prescribed fees shown in Annexure–I. Any Certificate which is not renewed after expiry will become invalid from the date of expiry. Application for renewal in 'Form L' together with the Supervisor's Certificate and non-refundable prescribed fees shall be submitted to the Secretary within one month before the date of expiry of the Certificate.

Provided that if the application for renewal as aforesaid is received within twelve months from the date of the expiry of the Certificate, it may be renewed on payment of the prescribed renewal fee and the prescribed fee for the late renewal of the Certificate. The date of renewal after the expiry will be the date on which the certificate is renewed. The date of next expiry will be one year or three years of from the date of last expiry.

(2) Electrical Supervisor's Certificate which has not been renewed within twelve months from the date of expiry shall be automatically suspended. Electrical Supervisor's Certificate not renewed up to three years shall be deemed cancelled. Fresh initial fee with an application in 'Form-B' shall be furnished as in case of fresh application before a new Supervisor's Certificate is granted.

(3) The Board may, at any time cancel an Electrical Supervisor's Certificate if the person to whom the Certificate has been granted is in the opinion of the Board, not fit to hold such

Certificate. For this purpose, Board may take into consideration amongst others, the provision contained in Regulation 32 of these regulations.

26. Electrical Workman's Permits. – (1) Definition: A person, who carries out electrical and other related works under direct supervision of a supervisor and possesses the Electrical Workman Permit issued by the Board.

Every Electrical Installation work is to be carried out by person(s) holding valid Electrical Workman's Permit issued by the Board.

(2) Candidate for examination of Electrical Workman's permit shall be a person who satisfies the following conditions;

(a) Is an Indigenous Inhabitant of Nagaland and not below 18 years of age;

(b) Have worked on wiring and electrical installations work as an apprentice for at least two years under licensed Electrical Contractors, OR

Have completed other electrical training or practical experience in electrical installation works which is regarded satisfactory by the Board.

27. Examination for Electrical Workman's Permit. – (1) A candidate for Electrical Workman's Permit examination must apply to the Secretary in a prescribed 'Form C' with all necessary documents and pay the examination fee.

(2) Candidate for examination of Electrical Workman's Permit shall be examined by a written paper and by oral and practical test. Candidates will normally be examined through the medium of English language but the Board may permit a candidate to be examined through the medium as may be possible for the Board to arrange.

(3) For the purpose of these regulations, all electrical installation works shall be divided in classes as shown in sub-regulation (4) below.

(4) The syllabi of the several parts of the examinations are set out in Annexure-III. Candidates may appear in examination for any Voltage Class of Permit; existing Workman Permit holders may appear for a higher class of Permit. The parts to be passed for different classes of Permit are as below;

Voltage Class of Permit	**Parts Compulsory**
Not exceeding 250 volts	Part 1
Not exceeding 650 volts	Part 1 + Part 2
Not exceeding 33,000 volts	Part 1 + Part 2 + Part 3
Above 33,000 volts	Part 1 + Part 2 + Part 3+ Part 4

28. Grant of Electrical Workman's Permit. – (1) Every candidate who passed the examination for Electrical Workman's permit shall be granted a permit as set out in 'Form F' after paying the initial prescribed fee.

(2) The Board may also grant Electrical Workman's Permit in any class commensurate with practical knowledge and experience to a candidate without requiring him to sit for

written examination, based on viva-voce, after paying the prescribed initial fee in following cases;

(a) A holder of two years Trade Certificate in Electrician or Wireman trade from the National or State Council for Vocational Training or equivalent.

(b) A retired employee of Power Department in the rank of Assistant Lineman/ Assistant Electrician and above.

(3) A Permit issued by the Board shall be liable to further renewal until he attains the age of 65 years. Any further extension of a licentiate beyond the age of 65 years shall be subject to production of fitness certificate by the licentiate.

29. Renewal of Electrical Workman's Permit. – (1) Every Electrical Workman's Permit granted under these Regulation shall be renewed every year or up to five years at a time after paying prescribed fees shown in Annexure – 1. Any Permit which is not renewed after expiry will become invalid from the date of expiry. Application for renewal in 'Form L' together with the Workman's permit and non – refundable prescribed fees shall be submitted to the Secretary within one month before the date of expiry of Permit.

Provided that if the application for renewal as aforesaid is received within twelve months from the date of the expiry of the permit, it may be renewed on payment of the prescribed renewal fee and the prescribed fee for the late renewal of the Permit.

(2) Electrical workman's Permit which has not been renewed within twelve months from the date of expiry shall be automatically suspended. Electrical Workman's Permit not renewed up to three years shall be deemed cancelled. Fresh initial fee with an application on 'Form B' shall be furnished as in case of fresh application before a new Workman's Permit shall be granted.

(3) The Board may, at any time cancel an Electrical Workman's Permit if the person to whom the Permit has been granted is in the opinion of the Board, not fit to hold such Permit. For this purpose, Board may take into consideration amongst others, the provision contained in Regulation 32 of these regulations.

30. Grant of duplicate License, Certificate or Permit and Change of Name, Address and change in Supervisor. – (1) On being that an original License, Certificate or Permit granted under these regulations has been lost or destroyed, the Secretary may, on request by the applicant in 'Form M', grant a duplicate. A duplicate of License, Certificate or Permit granted under these regulations shall be issued on payment of the prescribed fee.

(2) On payment of prescribed fees, a change in the name or address of the Contractor's License granted may be made, provided that such change does not involve a transfer or an assignment of the license to another person, firm or body.

(3) On payment of prescribed fees, a change of Supervisor or Workman of the Contractor's License granted may be made.

31. Restriction of employment for Electrical Supervisors and Electrical Workman. – (1) A person holding Electrical Supervisor's Certificate should not be an employee of more than two Electrical Licensed Contractors within the same period of time.

(2) A person holding Electrical Workman's Permit should not be an employee of more than one Electrical Licensed Contractor.

(3) An Electrical Supervisor/ Workman employed by Licensed Electrical Contractor should not be a regular/ work-charged/ officiating/ contract/ muster roll employee of a Central or State Government undertaking or a regular/ full time employee of any other company or Firm or Agency.

32. Report of negligence. – (1) When in the opinion of Licensee or a person for whom any electrical installation work is being or has been carried out by an Electrical Contractor licensed under these regulations is not in accordance with the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023 and desire to bring the facts to the notice of the Board, he shall make a report in writing describing the facts and circumstances in details to the Secretary.

(2) A report made to the Secretary under these regulations by a person other than a Licensee shall be accompanied by a deposit of Rs.10.00 or such larger amount as the Board may fix by special order in any case. If in the opinion of the Board, the charge contained in the report is not substantiated, the Board may direct that the deposit shall be forfeited.

(3) If any person holding an Electrical Workman's Permit or an Electrical Supervisor's Certificate or an Electrical Contractor's License is found by the board to be guilty of negligence, misrepresentation, or deliberate suppression of facts, incompetence or breach of these regulations or of the conditions of his Permit/ Certificate/ License, the Board may suspend or cancel his Permit, Certificate or License. The decision of the Board in this regard shall be final.

(4) Any mutilation or defacement, or any unauthorized entry in any Electrical Workman's Permit or Electrical Supervisor's Certificates or Contractor's License, shall make the Permit, Certificate or License, as the case may be liable to cancellation by the Board. The decision of the Board in this regard shall be final.

33. Electrical Licensee to obtain Contractor's License. - No electrical installation work shall be carried out by a person licensed under Part-IV of the Electricity Act 2003 or an Electrical Board or a State Government Department responsible for distribution of energy, in a premise beyond the point of commencement of supply unless he has obtained an Electrical Contractor's License and employs staff of Electrical Supervisors and Electrical Workman in conformity with these regulations.

34. Cancellation of Contractor's License granted to Electrical Licensees. - An Electrical license granted under these regulations to a person licensed under Part-IV of the Electricity Act 2003 shall be liable to be withdrawn or cancelled if in the opinion of the Board preferential treatment in unfair competition with local contractors is given to prospective consumers.

35. Examinations. – (1) Examination shall be held by the Board at such place and on such date as may be notified by the Secretary from time to time in Local Newspapers.

(2) Every examination shall be of such nature as to test the practical knowledge of the candidate and to ascertain his competency and the adequacy of his practical experience to the satisfaction of the /board for the purpose of granting Permit and Certificate under these regulations.

(3) Every examination shall be conducted in place where the candidate's knowledge can be practically tested and each candidate shall be tested viva-voce.

36. Application for Workman's permit or Supervisor's Certificate Examinations. – (1) Every candidate for admission to an examination shall make as application in the 'Form B' for Supervisor's Certificate or 'Form C' for Workman's Permit. The candidate shall forward the application duly filled in to the Secretary not less than 10 days before the date fixed for examination together with:-

(a) Testimonial of good character.

(b) Certificate from Contractor in 'Form G' appended to these regulations,

(c) Electrical Workman's Permit, if any

(d) Certificate(s) of technical qualification

(e) The prescribed fee for each examination

(f) Two copies of recent passport sized photographs, all of which shall bear the applicant's signature on the back.

(2) The fee paid by a candidate whose application for admission to an examination has been accepted, shall not be refunded on any account. If the candidate fails to appear in the examination, the fees paid will be forfeited.

37. Pass Marks. - Electrical Supervisor's Certificate and Electrical Workman's Permit will not be granted unless a candidate secures 50% of total marks each in written examination also have to secure at least 50% marks in viva-voce.

38. Amendment of Annexure. Schedule of fees contained in Annexure-I, Syllabus for Electrical Supervisor's Certificate examination contained in Annexure–II, Syllabus for Electrical Workman's Permit examination contained in Annexure-III, List of Instruments contained in Annexure-IV and forms contained herein may be amended by the Board from time to time.

39. General provisions for Appeals. – (1) An appeal against an order made under these regulations shall lie to the State Government.

(2) Every appeal made under sub-regulation (1) shall be in writing, shall be accompanied by a copy of the order appealed against and shall be presented within 3 months of the date on which such order has been made.

40. Repeal and saving. – (1) The Nagaland Electrical Licensing Board Regulations, 2005 is hereby repealed. Notwithstanding such repeal, any License, Certificate or Permit or any other order issued, action taken or anything whatsoever done under the regulations so repealed, shall be deemed to have been issued, made, taken or done under the corresponding provisions of these regulations.

(2) The Board shall replace the Licenses, Certificates and Permits issued under the repealed regulations immediately before or at the time of the first renewal thereof after the commencement of these regulations by fresh Licenses, Certificates and Permits of the appropriate class as the case may be, in the form prescribed under these regulations.

(ASANGLA IMTI, IAS)

Secretary to the Government of Nagaland

ANNEXURE-1

[See Regulation 14(1)]

SCHEDULED OF FEES

Fees on the scale prescribed below shall be charged for issuing of licenses to electrical contractors, certificates to Supervisors and permits to Wiremen.

A. Electrical Contractors Licence;

		Class-I	**Class-II**
1	Initial fee	Rs. 4,000/-	Rs 2,000/-
2	Registration Fee	Rs 20,000/-	Rs 10,000/-
3	Annual Renewal fee	Rs. 4,000/-	Rs 2,000/-
4	Late Renewal fee (per month)	Rs. 400/-	Rs 200/-
5	Duplicate License fees	Rs. 1000/-	Rs 1000/-
6	Fee for increase in scope; change of address, name of supervisor/ workman employed etc.	Rs. 500/-	Rs 500/-

B. Electrical Supervisor's Certificate;

1	Examination Fee	Rs 300/-
2	Initial Fee	Rs 1,000/-
3	Registration Fee	Rs 5,000/-
4	Annual Renewal fee	Rs. 1,000/-
5	Late Renewal fee (per month)	Rs. 100/-
6	Duplicate Certificate fees	Rs. 500/-

C. Electrical Wireman's Permit;

1	Examination Fee	Rs 150/-
2	Initial Fee	Rs 500/-
3	Registration Fee	Rs 2,500/-
4	Annual Renewal fee	Rs. 500/-
5	Late Renewal fee (per month)	Rs. 50/-
6	Duplicate Permit fees	Rs. 250/-

Note :

1. Initial fees are to be paid along with the application for license, certificate etc.
2. Registration fees shall be paid after approval of the application.
3. These rates would further be increased by 15% after every three years from the date of its applicability.
4. All fees shall be paid to the Secretary, NELB through treasury under Head of Account **0043 - Taxes and Duties on Electricity**.

ANNEXURE-II

[See Regulation 23(4)]

SYLLABUS FOR ELECTRICAL SUPERVISOR'S CERTIFICATE EXAMINATION

PART – 1

(Electrical Installations not exceeding 250 Volts)

A. Elementary Principles.

1. **Principles of Electricity**

   Electric Pressure, current and resistance; Ohm's Law; Kirchhoff's Law; Calculation of voltage drop; Series and parallel circuits, Units of voltage, current, resistance, power and energy; Relation between Electrical power unit (KW) and mechanical power unit (HP); Induction, capacitance, reactance and impedance.

2. **Electromagnetism**

   Flux, Flux density, Magnetic field strength, Permeability; Magnetic circuits, Reluctance, calculation of MMF; Effect of air gap, Hysteresis loop of magnetic materials; Electromagnetic Inductance, production EMF; Fleming's Hand Rule, Faraday's Law's, Lenz's Law; Self and mutual Inductance, coupling coefficient; Magnetic properties of materials, Electro magnets and their application.

3. **Materials**

   Conductor's, Non-conductors and insulators; Insulating materials and their utilities; Transformers oil, effect of heat and moisture on insulation; Dielectrics, dielectric strength, permittivity; Different types if wires, cables, switches, circuit breakers, fuses.

4. **Generation of Electricity**

   Methods of generation of electric power; Block schematic layout of generation stations; Hydro-electric, Thermal and Nuclear stations; Non-conventional Energy sources, Solar, Wind power.

5. **Rules and standards:**

   Working knowledge of :- Electricity Act, 2003; the Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023; Nagaland Electrical Licensing Regulations; Terms & Conditions of supply of electrical energy.

B. WIRING FOR SYSTEM NOT EXCEEDING 250 VOLTS

1. Domestic Installation

Various types of LT wiring- Cleat, Casing and Capping, Metal sheathed, conduit; Types of wires, cables and their standard sizes with current carrying capacities; Estimates of materials and cost of different types of installations; Load survey, connected load, maximum demand; Main switch, distribution broads, Location of switch boards; Distribution layout and circuit diagram; Selection of fuses, M.C.C.B, P.M.C.C.B, P.C.C.B.

2. Illumination

Characteristics of different types of lamps; Incandescent lamps, fluorescent lamps; Vapour lamps, HPSV, LPSV, Energy efficient lamps; Photometric units and their measurements.

3. Earthing

Resistivity of soil and their measurements; Computation of Earth resistance; Different materials used for earthing conductor; Corrosion factors, determination of sizes of earth bus; Plate, pipe and strip earthing.

4. Installation testing and measurements

Insulation tester, Earth tester, Ammeter, Voltmeter, Wattmeter; Recommended values of insulation resistance, earth resistance; Polarity test, Continuity test, Insulation test, Earth resistance test; Detection and location of faults.

PART – 2

(Electrical Installations not exceeding 650 Volts)

A. WIRING FOR SYSTEM NOT EXCEEDING 650 VOLTS

1. A.C. Circuits

Alternating current fundamentals; Generation of alternating currents; Different waves forms, frequency period, average value, rms value and forms factor; Phasor representation of alternating quantities, rectangular, polar and exponential forms;
Analysis of simple AC circuits with resistance, inductance and capacitance; Concept of impedance and admittance, phasor representation; Power and power factor in AC circuits; Active and reactive components; Solution of RL, RC and RLC circuits, Series, Parallel and Series- parallel circuits.

2. Three phase system

Star and Delta connection; Relationship between phase and line values of voltage and current; Phasor representation, solution of balanced and unbalanced three phase circuits.

3. **Symbols**

   List of symbols; Preparation of electrical wiring diagrams and electrical circuits diagrams; Reading of electrical circuits diagrams.

4. **Tariffs**

   Prevailing schedule of tariff; Different types for LT consumers; Calculations relating to cost of energy.

5. **Special Type of Equipments**

   X-Ray, Neon sign, Lift, Cinema Installations; Relevant Rules, Circuitry, Safety Precautions, Earthing, Fire Precaution measures for the above installations; IS 4878/91 - Code of practice for Cinema Installations.

B. AC & DC APPARATUS NOT EXCEEDING 650 V

1. **AC Generators (Alternators)**

   Basic principles, details construction and essential components; Voltage regulation, methods of voltage control and frequency control; Syncronising of alternators, Syncroscope, bright lamp and dark lamp method; Associated switch board and its accessories.

2. **DC Generators**

   Basic principle, detail construction and essential components; Shunt, series and compound generators and their characteristics; Commutators and their maintenance; Carbon brushes- their adjustments and care; Voltage regulation, Parallel operation; Associated switch board and its accessories.

3. **Batteries**

   Primary cell, dry cell, Lead and Nickel- Cadmium batteries; Construction, Characteristics, charging and discharging; Specification, maintenance, storage of batteries, use of hydrometers; Battery charging equipments and their operations.

4. **AC Motors**

   Three phase induction motors, construction, principle of operation: Speed, Frequency, Slip, star-delta starting; Single phase induction motors, construction, different methods of starting; Squirrel cage induction motors, slip ring induction motors; Synchronous motors, general principle of operation, uses, installation, methods of starting and speed control and reversal of direction. Commutator motors.

5. **DC Motors**

   Motor principles, series, shunt and compound wound type motors, their uses, installations, methods of starting, speed control, reversal of directions.

6. **Control Gears**

   Various types of switches, fuses, starters, controllers, regulators- their uses and installations; Earthing of Motors and Generators.

7. Conversion

Principle of Operation of motors and Generators; Rotary or Synchronous converters, Mercury- Arc rectifiers; Inverters, Thyristors and other static device; Filtering –Half Wave, Full Wave, Bridge rectifiers.

C. OVERHEAD LINES NOT EXCEEDING 650 VOLTS.

1. Construction of Lines

Construction of low and medium Voltage lines; Size of conductor, length of span, sags, strength of poles, different types of poles; Spacing of Conductors, cross arms, effects of temperature, wind pressure, ice and snow, Tension wire, insulators, brackets, stays, struts, guard wires, protective devises; Earthing, lighting arrestors and lightning conductors and their testing.

2. Operation

Testing and fault location; Methods of working on overhead lines; Inspection of distribution lines; Three wire and four wire systems; Power in three phase systems. Phase sequence; Measurement of active and reactive power in single phased and three systems.

3. Clearances

Statutory clearance of live parts from ground and buildings; Sectional clearance, equipment clearance; Clearances of switch boards; Oil containing equipments; Indoor and outdoor equipment clearances.

D. UNDERGROUND CABLES FOR VOLTAGE UPTO 650 VOLTS

Basic knowledge of different types of cables – PVC, APVC. General practical knowledge of lying Cables direct in ground, in trough and pipes. Handling, bending, jointing, plumbing.

Underground and above ground junction boxes; Distribution boxes and pillars; Joint box compounds, melting of compounds, filling boxes with compounds.

PART – 3

(Electrical Installations not exceeding 33,000 Volts)

A. OVERHEAD LINES NOT EXCEEDING 33,000 VOLTS

1. Construction of Lines

Construction of High Voltage lines; Size of conductor with current capacity; Length of span, sags, strength of poles, different types of poles; Design of different types of towers and their construction, erecting and stringing of conductor; Spacing of conductors, cross arms, effects of temperature, wind pressure, ice and snow. Tension of wire, insulators,

vibration dampers, brackets, stays, struts, guard wires, protective devises; Earthing, lighting arrestors and lighting conductors and their testing

2. **Clearances**

   Statutory clearances of live parts from ground and buildings; Sectional clearances, equipments clearances; Oil containing equipments; Indoor and outdoor equipment clearances.

3. **Operation**

   Methods of working on overhead lines; Equipments used for replacement of insulators, their ratings; Methods of replacement of Insulators; Inspection of Transmission lines.

   Line constants, determination of voltage drop; Voltage Regulations; Effect of power factor and their improvements.

4. **Transmission**

   Bulk Transmission of electric power; Typical power transmission scheme; Need for high transmission voltage; Primary and secondary transmission systems.

B. UNDERGROUND CABLES FOR VOLTAGE UPTO 33,000 VOLTS

Basic knowledge of different types of cables- AYFY, XLPE, oil filled, gas filled and any other types; Testing and fault location, Murray Varley loop tests; Current ratings- short time ratings and continuous rating; Derating factors of cables; Calculation of voltage drop; Aluminum and copper cable jointing- types, precautions, termination; I.S Regulations regarding cables.

C. INSTALLATIONS NOT EXCEEDING 33,000 VOLTS

1. **Switch Gear and Protection**

   Knowledge of various types of switches, proactive fuses; Circuits breakers- OCB, VCB, ACB, MCCB, MCB, SF6 Breakers; Thermal and magnetic release Relays, Buchholz Relays, IDMT, Instantaneous types; Over current, earth fault and earth leakage relays – time and current settings; HRC fuses, paper barrel and HV fuse- use and construction; Lighting Arresters, Isolators, Bus bar, D.O. cum Gang Switch, Hook sticks; Earthing of Sub- Stations.

2. **Transformers**

   Transformers- construction, use and maintenance; Voltage and current relations; Losses and efficiency. Parallel operation of three phase transformers; Three phase transformer connections- star/Star, Delta/ Delta, Star/Delta, Delta/Star; Auto transformer, Transformer tapping's.

3. **Instrument Transformers**

   Current transformers, CT specifications and error factors; Potential Transformer, CVTs.

4. **Selection of Equipments**

   Different types of breakers- OCB, VCB, ACB, MCCB, MCB, SF6 Breakers; Contactors; Breaking capacity, Making Capacity, Selection of Breakers; Selection of

Switches, Short tine and continuous ratings; Power factor correction by capacitors. Shunt Reactors.

5. Connection

Methods of connection of special type transformers, Furnace transformers; Welding transformers, Rectifier transformers; Determination of capacity, Load segregation, Double bus system, Change over arrangements, Preparation of schematic diagram of Sub- Station.

6. Energy measurements

Measurement of power, Watt meters, Energy meters, Trivector meters; Computation of energy.

7. Clearance

Statutory clearance of live parts from ground; Sectional clearance, equipment clearances; Clearance of Oil containing equipments.

PART – 4

(Electrical Installations above 33,000 Volts)

A. INSTALLATIONS EXCEEDING 33,000 VOLTS

1. SUB-STATIONS

(i) Layout & Location of Sub-Station i.e. 400/220/132/33 KV.

(ii) Main equipments & specification of equipments.

(iii) TRANSFORMER : Basic principles of transformers & working principles of its accessories like coolers, on load/off load Tap changer, breathers, conservator, bushing of different types, Buchholz Relay, Indicators & Alarms. Transformer routine & type tests, maintenance and repair, failure and its causes. Transformer oil, testing, filtration and its values to ascertain its condition. Parallel operation of transformers, regulation & voltage control by tap-changing, commissioning tests, routine maintenance.

(iv) BREAKERS : Function of different types of breakers i.e. indoor, outdoor, MOCB, SF_6 etc. Normal current rating, rupturing capacity. Commissioning procedure, operation & maintenance, failure and its causes.

(v) BUS BAR : Indoor & Outdoor capacity forces on them during short circuit, mounting & bus bar mounting and clearances. Outdoor-Strung / Tubular type supports bus bars, their current rating, jumpers & clearances. Bus bar fitting / connectors.

(vi) CURRENT AND POTENTIAL TRANSFORMERS : types, Working principle, Rating and Accuracy class and testing.

(vii) ISOLATORS : Types (Tilting, rotating, horizontal, vertical tandem etc.) with and without arching horns, current rating, breaking of circuits, interlock with circuit breaker, maintenance of Isolators.

(viii) LIGHTING ARRESTOR : Types, Principle of working, rating, earthing, location and testing of lighting arrestors & its maintenance. PDCC, Carrier Communication, PLCC and protection through PLCC and Carrier inter tripping.

(ix) REACTOR : Types, Principle of working, rating, installation and commissioning, repair and maintenance.

(x) CAPACITOR BANK : Types, Principle of working, rating, installation, commissioning, repair & maintenance.

(xi) PROTECTIVE RELAYS : Types of relays, principle of working, rating, installation and commissioning, repair and maintenance. The basic principle of protection of equipments/ lines i.e. Local & back up protection, Transformer Protection, Line Protection & New generation Relays, their testing and maintenance.

(xii) CONTROL ROOM : Necessity and function of control boards & panels, types of control panels, instruments on control boards and panels. Mimic diagram, indicators, semaphore annunciation system including alarm & bell testing of relays and setting principle. Remote control of breakers, isolators, tap changers, indicators in control boards and panels. Control cables & power cables.

(xiii) AUXILIARY SUPPLY & BATTERY : Battery ratings, capacitors, charging and discharging and trickle charger. Rectifiers. Importance of DC supply & its function, Auxiliary DC supply maintenance of Battery system.

(xiv) EARTHING System Earthing, Safety earthing, method of earthing, solid, resistance, impedance, Peterson coil earthing, earthing of lighting arrestors, importance & advantages of each type. Different types of earth electrodes, earth mats, recommended values of earth resistance and its measurement. Design of earth mats. Knowledge about step & touch potential.

(xv) GAS INSULATED SWITCHGEAR : Construction of GIS, Metal enclosures, insulators, conductors and connectors, circuit breaker, CT, PT, surge arresters, bay connections, indoor & outdoor installations under GIS category.

2. TRANSMISSION LINES

(i) Detailed survey and alignment of lines.

(ii) Types of Tower, Template & Tower spotting, stub setting, concreting, back filling.

(iii) Erection of towers, tighting, punching of bolts, electrical clearances.

(iv) Type of Insulators, electrical/Mechanical characteristics, hardwares and fittings.

(v) Type of conductors, current carrying capacities, earth wires and sizes.

(vi) Stringing equipments & use, Tension & Sagging of conductors, stringing procedure, statutory phase to phase & earth clearances, jumpering, use

stringing chant.

(vii) Earthing of Towers, types of Tower earthing.

(viii) Testing conductor continuity, Insulators resistance.

(ix) Charging / discharging of EHV Lines, Live Line testing.

(x) Safety procedure, procedure for line clearance.

(xi) Identification marks, phase plates, circuit plates, anti climbing devices, step bolts, bird guards, number plates, danger plates, anti-vibration dampers.

(xii) Maintenance, tests and measurements, use of construction/maintenance tools & equipments – Theodolite, Dumpy level, measuring tapes, conductor jointing tools, bolted come-alongs, winches, Aerial trolleys, Aerial rollers, Thermometers, Dynamometers, Lineman's rachat, pull-lift devices, wire ropes, spanners, twin buckles etc & testing equipments.

(xiii) Tower foundation, investigation of foundations of Towers, repairs of foundation of a Tower line in service, foundation defects & repairs.

(xiv) Manpower, Tools and plants.

(xv) Hot line stringing of HV lines.

3. CABLES

HV & EHV category cables, criteria for the selection of cables, short time loading of power cables. EHV tests on cables, guidelines for cable laying, cable joints, cable terminations, crimp connections, fault locating in underground cables, sheath fault, sheath fault locating equipment and methodology.

4. HVDC

DC transmission, HVDC structures, busbars, clearances, earthing system, circuit breaker, tests on HVDC CB, instrument transformers, standard layout in sub-station, different protective devices.

5. FIRE PROTECTION & FIRE FIGHTING

Classification of fire, various types of fire extinguisher, fire protection for power transformer, multityre system of protection, CO_2 installation, Fire hydrant system, General safety precautions and practices in operation & maintenance.

6. CLEARANCE & COMPLIANCE OF CEA SAFETY REGULATION

Minimum clearance between phases and phase to ground and sectional clearance of equipments at different voltages level. • Provision of CEA Safety Regulation relating to sub-stations and lines.

ANNEXURE – III

[See Regulation 27(4)]

SYLLABUS FOR ELECTRICAL WORKMAN'S PERMIT EXAMINATION

PART – 1

(Electrical Installations not exceeding 250 Volts)

A. Elementary Principles

1. **Principles or Electricity**

   Concept of electric voltage, current, resistance, inductance, capacitance, reaction, impedance, power, energy and power- factor; Comparison between series and parallel connection of loads; Simple calculation of current, power, energy and voltage drop; Units of voltage, current, resistance, power and energy.

2. **Materials**

   Properties of Conductors, Non- conductors and insulators; Properties of copper and aluminum conductors; Insulating materials and their utilities such as PVC, rubber and porcelain; Different types of wires, cables, switches, circuits breakers, fuses.

3. **Drawings and circuits**

   Reading of schematic drawing for internal wiring, power wiring and control circuits; Standards symbols of various types of electrical equipments; Wireman tools and accessories.

4. **Safety measures**

   Safety measures to be observed while working; Device used for wireman safety; Actions to be taken in case of electrical accidents.

5. **Rules and Standards**

   Knowledge of prevailing electric tariffs; Procedure for availing electric supply to consumers; Submission of test reports/completion reports; CEA (Measures relating to Safety and Electric Supply) Regulations, 2023, Regulations 21 to 32, 42 to 44, 54 and 56; Knowledge of Nagaland Electrical Licensing Regulations; Knowledge of Terms & Conditions of supply of electrical energy.

B. WIRING FOR SYSTEM NOT EXCEEDING 250 VOLTS

1. **Domestic Installations**

Various types of LT wiring- Cleat, Casing and Capping, metal sheathed, conduit; Types of wires, cables and their standard sizes with current carrying capacities; Main switch board, distribution boards, Location and clearance of switch boards; Distribution layout and circuit diagram; Different types of fittings, and switches: use to test lamp; Connections and diagram of distribution board, ceiling roses, plugs and sockets, Lamp holders- incandescent and fluorescent lamps, Fans with regulators, two way switches.

2. **Protection**

Overload protection, Earth leakage protection; Permissible load; Selection of fuses, Rewirable and HRC types; Circuits Breakers, M.C.C.B, P.M.C.C.B, P.C.C.B.

3. **Illumination**

Characteristic of different types of lamps; Incandescent lamps, Fluorescent lamps; Compact Fluorescent lamps.

4. **Earthing**

Earthing of system; Necessity of earthing; Types of earthing; Selection and location of earthing; Type and size of earthing conductor.

5. **Installation testing and measurements**

Insulation tester, Earth tester; Recommended values of insulation resistance, earth resistance; Polarity test, continuity test, Earth resistance test.

PART – 2

(Electrical Installations not exceeding 650 Volts)

C. WIRING FOR SYSTEM NOT EXCEEDING 650 VOLTS

1. **Three phase systems**

Relationship between phase and line values of voltage and current; Wiring of three phase system. Star and Delta Connection; Selection and identification of different cables and conductor; Protective system used in internal wiring; Use of bell and battery for sorting out circuits; Methods of testing polarity and phasing out circuits.

2. **Jointing and Soldering**

Making straight and T joints in solid and stranded conductors and soldering them; Soldering plugs and sockets, wires and cables and insulating them.

3. **Symbols**

List of symbols; Preparation of simple electrical wiring diagrams and electrical circuit diagrams; Reading of simple electrical circuit diagrams.

4. **Tariffs**

Knowledge of prevailing electric tariffs; Different types for LT consumers; Simple calculations relating to coast of energy.

5. **Special type of Equipments**

   X-Ray, Neon- Sign, lift, Cinema Installation; -Circuitry, Safety Precautions Earthing, Fire Precaution measures for the above installations; Wiring of special equipments like UPS, Invertors, Stand by for computers, etc.; Essential factor for wiring High Rise Buildings.

D. AC& DC APPARATUS NOT EXCEEDING 650 V

1. **AC& DC generators**

   Basic principle, construction and components; Commutators and their maintenance; Carbon brushes-their adjustment and care.

2. **Batteries**

   Primary cell, Dry cell, Lead acid and Nickel- Cadmium batteries; Construction, charging and discharging; Maintenance, storage of batteries, Use of hydrometers.

3. **AC Motors**

   Three phase induction motors, construction principle of operation; Starters- Direct on line and star- delta starting; Single phase induction motors, construction; Different types of Fan regulators- resistant and electronic types; Principle of operation of fractional Horse Power motors used in appliances such as Mixies, Washing Machine, etc.

4. **DC Motors**

   Motor principle, their uses, installation, methods of starting, reversal of directions.

E. OVERHEAD LINES NOT EXCEEDING 650 VOLTS

1. **Construction of Lines**

   Construction of low and medium Voltage lines. Use of safety and protective device; Size of conductor, length of span, sags; Different types of poles, Pole concreting and erection of poles; Spacing of conductors, fixing of cross arms, jointing and binding of conductors.

   Fitting of different types of insulators, brackets, stays, struts, guard wires; Earthing of overhead lines, fitting of lighting arrestors and lighting conductors and their importance. Service connections.

2. **Operation**

   Methods of working on overhead lines; Inspection of distribution lines; Three wire and four wire systems.

3. **Clearances**

   Statutory clearance of live parts from ground and buildings; Sectional clearance, equipment clearances; Clearances of switch boards.

F. UNDERGROUND CABLE FOR VOLTAGES UPTO 650 VOLTS.

Basic knowledge of different types of cables- PVC, APVC; General practical knowledge of laying Cables direct in ground, in troughs and pipes; Handling, bending, jointing, plumbing; Underground and above ground junction; Distribution boxes and pillars; Joint box compounds, melting of compounds, filling boxes with compounds.

PART – 3

(Electrical Installations not exceeding 33,000 Volts)

A. OVERHEAD LINES NOT EXCEEDING 33,000 VOLTS.

1. Construction of Lines

Construction of high Voltage Line. Use of safety and protective devices; Sizes of conductor, length of span, sags; Different types of poles, strength of poles, pole concreting and erection of poles; Spacing of conductors, Tension of wire; Fitting of cross arms, fitting of insulators, vibration dampers, brackets; Fitting of stays, struts, guard wires.

Earthing, fitting of lighting arrestors and lighting conductors and their testing.

2. Clearances

Statutory clearance of live parts from ground and buildings; Sectional clearance of Oil containing equipments; Clearance of Oil containing equipments.

3. Operation

Methods of working on overhead lines; Equipment used for replacement of insulators, their ratings; Methods of replacement of Insulator.

4. Transmission

Bulk Transmission of electric power; Typical power transmission scheme; Need for high transmission voltage.

B. UNDERGROUND CABLES FOR VOLTAGE UPTO 33,000 VOLTS

Basic knowledge of different types of cables – AYFY, XLPE, oil filled, gas filled and any other types; Current ratings- short time rating and continuous rating; Calculation of voltage drop; Aluminum and copper cable jointing- types, precautions, termination; I.S. Regulation regarding cables.

C. INSTALLATION NOT EXCEEDING 33,000 VOLTS

1. Switch Gear and Protection

Knowledge of various types of switches, protective fuses; Circuit breakers- OCB, VCB, ACB, MCCB, SF6 Breakers; Over current, earth fault and earth leakage relays and their settings; HRC fuses, paper barrel and fuse- use and construction; Lightning Arresters Isolators Bus bar, D.O cum Gang Switch, Hook Sticks; Earthing of Sub- Stations.

2. Transformers

Transformers- construction, use and maintenance; Voltage and current relations; Three phase transformer connections - Star/Star, Delta/Delta, Star/Delta/Star; Transformer tappings.

3. Instrument Transformers

Current transformers, CT specifications; Potential Transformers, CVTs.

4. Energy Measurements

Measurement of Power; Watt meters, Energy meters, Trivector meters; Computation of energy.

5. Clearances

Statutory clearances of live parts from ground; Sectional clearances, equipment clearances; Clearances of Oil containing equipments.

PART – 4

(Electrical Installations above 33,000 Volts)

1. General knowledge about power Generation, Transmission and Distribution system in India.
2. Advantage of High Voltage & Extra Voltage Systems.
3. High Voltage & E.H. Voltage A.C. & D.C System.
4. Knowledge in Extra High Voltage transmission system.
5. Types of Tower, shapes & geometry:-
   (a) Self-supporting towers, conventional guyed towers, Chainette Guyed Towers.
   (b) Tower designation-: Suspension Tower, Tension Tower, Transposition Towers, Special Towers.
   (c) Tower Height, Width, Tower anatomy, foundation.
6. Safe electrical clearance of E.H.V. Lines, Spacing between conductors.
7. Simple knowledge about Tower members, member selection & redundant members, Bolts & nuts etc.
8. Testing of towers -: Testing requirements.
9. Conductors used in EHV, Earth wire, Earth insulator, stringing span, jumper, Hot line stringing of EHV lines.
10. Tools used in EHV lines: Theodolite, Dumpy level, Gin pole / Deric pole, polypropylene rope, single shane pulley Hydraulic compressor, Earth Tester, winch etc.

11. EHV underground cable, cable laying, permissible bending of cables, Depth of layings. Maintenance, Inspection of Cables, Cable Joints, Cable Termination Crimp Connections, Fault locating in U/G cables, Methods of fault location, Pre-locating the fault distance, pinpointing of cable fault.

12. SUB-STATION –

(i) Standard layout of Sub-station, bay size, equipment position.

(ii) Types of bus bar materials, clearance of equipments and rigid conductors spacing for phase strung bus, standard bus, equipment elevation.

(iii) Earthing practice, earth mat.

(iv) Earth measurement 3 point & 4 point method.

(v) Surge / lightning arrester.

(vi) Transformer, Isolators, Breakers, earth switch, CT, PT, CVT, Post Insulators, wave trap, capacitor bank etc.

(vii) Transformer's testing & maintenance of transformers.

Checks: Silica gel, oil test, Insulation test, PI value check, oil & winding temperature calibration, BDV test, gas analyzing, Buchholz relay, oil level check, Tap changer, moisture content test, cooling fan operation, ratio check. Bushing CT Check, oil filtration etc.

(viii) Maintenance schedule of breakers, transformers, CT, PT, CVT, PIs, lightning arrester, earth pit.

(ix) Duties of operation persons in Sub-station.

(i) Line Permit.

(ii) Isolation & restoration of system to work on permit.

(x) Station batteries, maintenance batteries, battery charger.

(xi) Protective relays used for EHV systems. Energy Meters, Ammeter, Voltmeter, Power Factor Meters, Metering.

(xii) Control equipments.

ANNEXURE-IV

[See Regulation 9 (2)(d)]

LIST OF INSTRUMENTS

Following instruments are to be procured and they should be ISI marked/ equivalent quality and test certificates along with invoice to be furnished.

Class-II Contractor	**Class-I Contractor**
Insulation Tester, 500 V	Insulation Tester, 1000 V Insulation Tester, 2500 V
Earth tester with accessories (0-5 Ohms)	Earth tester with accessories (0-5 Ohms)
Voltmeter, 0-600 V	Voltmeter, 0-600 V
Tong Tester with Ammeter, 1000 A	Tong Tester with Ammeter 1000 A
Portable Drilling Machine	Portable Drilling Machine
	Crimping Tool with dye set
	Rubber Hand Gloves for each Workman
	Phase Sequence Indicator

FORM A

[See Regulation 14(1)]

Application for Electrical Contractor's License

1	Name of firm in which an Electrical Contractor's License is applied	
2	Business address (as specified in GST Registration)	
	Phone No.	
	Email ID	
3	Whether the license is sought for a proprietary/ company/ partnership firm	
4	In case of company/ partnership firm, whether authorisation letter for Authorised Signatory is enclosed in Form A3. (Yes/ No)	
5	Full name of the Proprietor/ Authorised Signatory. (in capital letters)	
6	Father's Name (in capital letters)	
7	Home address (leave blank, if same as business address)	
	Phone No.	
	Email ID	
8	Date of Birth (DD/MM/YYYY)	
9	Indigenous Inhabitant of Nagaland/ ST Certificate issued after 2.02.2016 enclosed. (Yes/ No)	
10	Class of License applied for; Class- I (Exceeding 33 kV) Class-I (Not Exceeding 33 kV) Class-I (Not Exceeding 650 V0 Class-II (Not Exceeding 250 V)	
11	Previous License No., if any (Please enclose copy of License)	
12	No. of Supervisors employed. (Undertaking in Form A2 to be enclosed)	
13	No. of Workmen employed. (Undertaking in Form A2 to be enclosed)	
14	Initial Fee payment (Rs _____) (Challan No. / date)	
15	List of instruments maintained by the applicant furnished in Form A1. (Yes/ No)	

DECLARATION & SPECIMEN SIGNATURE

I …… hereby declare that the particulars stated above are correct to the best of my knowledge. I fully understand the Terms and Conditions under which an Electrical Contractor's License is granted, a breach of which will render the License liable to cancellation.

Further, I hereby also declare the I have in my possession the latest copy of the Electricity Act 2003; Central Electricity Authority (Measures relating to Safety and Electric Supply) Regulations, 2023; Terms and Conditions of Supply of Electrical Energy and Nagaland Electrical Licensing Regulations.

Date :

Specimen Signature

Information for Applicants

1. Following self- attested documents shall be submitted along with this application;
   i. GST Registration in the name of the Firm (in case of new firms - may be submitted within 6 months of issue of the license).
   ii. Proof of Home address of applicant : Electricity Bill, Telephone Bill, Bank Pass Book or Ration Card.
   iii. Aadhar Card and PAN Card of the applicant.

2. Two copies of recent passport size photographs of the applicant should accompany the application.
3. Copy of Previous License (if applicable) is to be enclosed.
4. Fees for the purpose to be paid to the Secretary, NELB through Treasury Challan under **Head of Account : 0043 - Taxes and Duties on Electricity**.
   Fees for issue of Electrical License;

Class	**Initial Fee**	**Registration Fee**
Class-I	Rs 4,000/-	Rs 20,000/-
Class-II	Rs 2,000/-	Rs 10,000/-

(Note:- Initial fees are to be paid along with the application for license; Registration fees shall be paid after approval of the application by the Board)

FORM – A1

[See Regulation 9(2)(d) and Annexure-IV]

List of Instruments in the possession of the Applicant

Sl.	Description	Make	
		Name	Sl. Number

Date :

Signature of the Applicant

Name:

(To be verified by an officer of the Electrical Inspectorate not below the rank of Assistant Electrical Inspector)

FORM – A2

DECLARATION BY ELECTRICAL SUPERVISOR/ WORKMAN

This is to declare that I (name in capital letters) ……... holding valid Electrical Supervisor's Certificate No./ Electrical Workman's Permit No. ..... am not a regular/ work-charge/ officiating/ contract/ muster roll employee of any Government Department/ Undertaking or a regular or full time employee of any company or firm.

I am willing to work under (name of firm) M/s …….……. ……..…….. as an Electrical Supervisor/ Electrical Workman.

Date .....

Signature

Full Name: .....

(Signature of Supervisor/Workman to be attested by Electrical Inspector/ Asst. Electrical Inspector)

FORM – A3

AFFIDAVIT OF PARTNERSHIP FIRM/ COMPANY

(To be Typed on Rs 100 Stamp Paper)

We, the undersigned

1)

2)

3)

4)

Indian inhabitants, Solemnly state as under :-

We state that, We are the sole partners of the firm M/s. *(name & full address of the firm)* and We state that, Mr *(name of authorized signatory)* shall act as the Authorized Signatory for all dealing with the matters relating to the Electrical Contractors License issued/ to be issued by the Nagaland Electrical Licensing Board to this firm.

Further, We state that, for any reason, if We do not need his services, or We want to relieve the said Signatory, We will give one month's advance notice to each other with intimation to the Secretary, Nagaland Electrical Licensing Board which is binding on us.

Whatever stated herein above is True and correct. We are well aware of the fact that if the above information is found incorrect, We shall be liable for prosecution and punishment under Indian Penal Code and / or any other law applicable thereto.

This affidavit is made to submit to the Secretary, Nagaland Electrical Licensing Board.

Solemnly affirmed at .....

This ..... Day of .....

Name of Partners	Signature
(1)	
(2)	
(3)	
(4)	

FORM B

[See Regulation 23(1)]

Application For Electrical Supervisor's Certificate

Application For Electrical Supervisor's Certificate

1. Full name of the applicant (in capital letters): .....
2. Father's name : .....
3. Date of birth Dte..... .. Mnth ..... Year .....
4. Permanent address in full with phone no. : .....
   : .....
5. Present address in full with phone no. : .....
   : .....
6. Details of technical qualifications : .....

   (attested copy of certificate to be enclosed)
7. Examination fee : Rs 300/- for each Part

(Initial fees Rs 1000/- and Registration fees Rs 5,000/- may be paid after declaration of results)

DECLARATION & SPECIMEN SIGNATURE

I hereby declare that the particulars stated above are correct and true to the best of my knowledge and believe.

Date : .....

Specimen Signature

Note :

1) Attested copy of certificate to be submitted with the application.

2) Original copy of the certificate should be produced at the time of interview.

3) Two copies of recent passport size photograph of the applicant with name and signature of the applicant on the back should accompany the application.

4) Any person making false statement shall render himself liable for prosecution.

INCOMPLETE APPLICATION WILL BE REJECTED

FORM C

[see Regulation 27(1)]

Application For Electrical Workman's Permit

Application For Electrical Workman's Permit

1. Full name of the applicant (in capital letters): .....
2. Father's name : .....
3. Date of birth Dte..... Mnth ..... Year .....
4. Permanent address in full with phone no. : .....
   : .....
5. Present address in full with phone no. : .....
   : .....
6. Details of technical qualifications : .....
   (attested copy of certificate to be enclosed)
7. Examination fee : Rs 150/- for each Part

(Initial fees Rs 500/- and Registration fees Rs 2,500/- may be paid after declaration of results)

DECLARATION & SPECIMEN SIGNATURE

I hereby declare that the particulars stated above are correct and true to the best of my knowledge and believe.

Date : .....

Specimen Signature

Note :

1) Attested copy of certificate to be submitted with the application.

2) Original copy of the certificate should be produced at the time of interview.

3) Two copies of recent passport size photograph of the applicant with name and signature of the applicant on the back should accompany the application.

4) Any person making false statement shall render himself liable for prosecution.

INCOMPLETE APPLICATION WILL BE REJECTED

FORM D
[See Regulation 14(3)]

Proprietor Recent passport size Colour photograph
Signature

GOVERNMENT OF NAGALAND
NAGALAND ELECTRICAL LICENSING BOARD

ELECTRICAL CONTRACTOR'S LICENSE

Mr./ Ms. _____ *(Name of the Firm)* _____ having their premises at _____ *(Address of the Firm)* _____ is/are hereby authorised to carry out electrical installation work in the state of Nagaland subject to the conditions mentioned in the Nagaland Electrical Licensing Regulations, 2024.

Class of License : I (a)
Authorised working voltage class : Exceeding 33,000 Volts

Registration No. : XXXXX
Date of Issue : XX/XX/XXXX
Name of Proprietor : XXXXX XXXXXXXXXXX

Seal of the Board

Secretary Chairman

Year	Date of Renewal	Date of Expiry

Sl.	Name of Supervisor	Certificate No./ Date of Issue	Signature of Supervisor
1			
2			
3			
4			

FORM D (Booklet) (page-1)

- -

Name of Proprietor

Address of Proprietor

Proprietor Recent passport size Colour photograph

Phone No. of Proprietor

Signature of Proprietor

(Name of the Firm)

FORM D (Booklet) (page-2)

[See Regulation 14(3)]

GOVERNMENT OF NAGALAND
NAGALAND ELECTRICAL LICENSING BOARD

ELECTRICAL CONTRACTOR'S LICENSE

Mr./ Ms. *(Name of the Firm)* .
having their premises at *(Address of the Firm)*
.
_____ is/are hereby authorised to carry out electrical installation work in the state of Nagaland subject to the conditions mentioned in the Nagaland Electrical Licensing Regulations, 2024.

Secretary

Seal of the Board

Chairman

Class of License : I (a)
Authorised working voltage class : Exceeding 33,000 Volts

Registration No. : XXXX
Date of Issue : XX/XX/XXXX
Name of Proprietor : XXXXX XXXXXXXXXX

Year	Date of Renewal	Date of Expiry	Signature

(Page 3)

Year	Date of Renewal	Date of Expiry	Signature

(Page 4)

List of Electrical Supervisors

Name	Certificate No.	Employment	
		From	To

(Page 5)

List of Electrical Workmen

Name	Permit No.	Employment	
		From	To

FORM D1
[See Regulation 13(c)]

Proprietor Recent passport size Colour photograph
Signature

GOVERNMENT OF NAGALAND
NAGALAND ELECTRICAL LICENSING BOARD

ELECTRICAL CONTRACTOR'S LICENSE
(AUTHORISATION OF LICENSE OF OTHER STATES)

After verification of authenticity of their electrical license from the Licensing Board of _____ state and on being satisfied, Mr./ Ms. _____. *(Name of the Firm)* _____ bearing license registration no. _____ is/are hereby authorised to carry out electrical installation work in the state of Nagaland subject to the conditions mentioned in the Nagaland Electrical Licensing Regulations, 2024.

Class of License : I (a)
Authorised working voltage class : Exceeding 33,000 Volts

Purpose for which issued : AAA AAA
Endorsement No. : XXXXX
Date of Issue : XX/XX/XXXX

Secretary

Seal of the Board

Chairman

Year	Date of Renewal	Date of Expiry

Sl.	Name of Supervisor	Certificate No./ Date of Issue	Signature of Supervisor
1			
2			
3			
4			

Supervisor Recent passport size Colour photograph
Signature

FORM E
[See Regulation 24(1)]

GOVERNMENT OF NAGALAND
NAGALAND ELECTRICAL LICENSING BOARD

ELECTRICAL SUPERVISOR'S CERTIFICATE

This Certificate allows the holder to supervise and carry out electrical installation work in the state of Nagaland subject to the conditions mentioned in the Nagaland Electrical Licensing Regulations, 2024 but does not allow him to undertake electrical contracting work unless he himself holds a valid contractor's License.

Authorised working voltage class : Not Exceeding 250 Volts

Registration No. : XXXXX
Date of Issue : XX/XX/XXXX

Name of Supervisor : XXXXXX XXXXXXXX
Date of Birth : DD/MM/YYY
Address : XXXXX
XX/XX/XXXX

Year	Date of Renewal	Date of Expiry

Secretary

Seal of the Board

Chairman

(This Certificate is to be carried with the holder in person at all times)

Workman Recent passport size Colour photograph
Signature

FORM F
[See Regulation 28(1)]

GOVERNMENT OF NAGALAND
NAGALAND ELECTRICAL LICENSING BOARD

ELECTRICAL WORKMAN'S PERMIT

This Permit allows the holder to carry out electrical installation work in the state of Nagaland under direct supervision of a supervisor and possesses the electrical workman permit issued by the Board and subject to the conditions mentioned in the Nagaland Electrical Licensing Regulations, 2024.

Authorised working voltage class : Not Exceeding 250 Volts

Registration No. : XXXXX
Date of Issue : XX/XX/XXXX

Name of Workman : XXXXXX XXXXXXXX
Date of Birth : DD/MM/YYY
Address : XXXXX
XX/XX/XXXX

Year	Date of Renewal	Date of Expiry

Secretary

Seal of the Board

Chairman

(This permit is to be carried with the holder in person at all times)

FORM G

[See Regulation 36(1)(b)]

Certificate to be granted to electrical staff for admission to Electrical Supervisor's and Electrical Workman's examination.

1. Name of employee (in capital letters) :

2. Date of employment :

3. Date of discharge, if discharged :

4. Nature of work in which engaged :

5. Skill in the work in which engaged :

6. Conduct :

7. General Remarks :

I hereby declare that the particulars stated above are correct and true to the best of my knowledge.

Date: ..... Signature of Employer/ Licensed Electrical Contractor

SEAL

Note:

1) This certificate should be granted only to persons who are or have been actually employed on electrical wiring and installation works and whose names are entered in the register of wiring staff in form 'H' maintained by every Licensed Electrical Contractor.

2) Issue of false certificate will render the Licensed Electrical Contractor and the person concerned liable for action against them.

3) The employer or the Licensed Electrical Contractor shall, if required by the Secretary, be responsible for producing documentary evidence regarding the applicant's employment.

FORM H

[See Regulation 17(a)]

Details of Electrical Supervisors, Electrical Workmen and Apprentices

Name of Contractor :

Licence no. :

Period from dt ...../...../..... to dt ...../...../.....

Sl No.	Name of employee	Permit/Certificate Number if any	Date of Employment	Date of discharge	Remarks
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					

Place : .....

Date : ...../...../..... Signature of contractor with seal

FORM I

[See Regulation 17(b)]

RETURN OF WORKS DONE

Name of Contractor :

License No. :

Period from dt ...../ …...…/……..…. to dt ...../ ……/……

Sl. No.	Name of work with Address/location	Name of supervisor with certificate no	Name of workman with permit no.	Date of completion	Total Load	Test Report submitted to
1	2	3	4	5	6	7

Place : ……

Date : ……/……./…….

Signature of contractor with seal

FORM J

[See Regulation 17(c)]

NOTICE BEFORE COMMENCEMENT OF WORK

Work Sl. No. ..... Date: .....

1. Name of Contractor : .....
2. License Number : .....
3. Details of work to be done : .....
   (Attach electrical drawing) .....
   .....
   .....
4. Full address where work is to be done : .....
   .....
   .....
   .....
5. Tentative date of starting the work : .....
6. Expected date of completion of the work : .....
7. Name of Supervisor with Certificate no. : .....
8. Name of Workman with Permit no. : .....

Date : ...../ ...../ ..... Signature of contractor with seal

Note : A copy of this form for each work shall be submitted to the following :

1) Concerned Sub-Divisional Officer
2) Concerned Electrical Inspector
3) Secretary, NELB

FORM K

[See Regulation 16(1)]

APPLICATION FOR RENEWAL OF ELECTRICAL CONTRACTOR'S LICENCE

1. Name of the Applicant (in capital letters) : .....

2. Detail Address with phone number : .....

.....

3. Name of Firm : .....

4. Licence Number : .....

5. Date of Expiry : Dt...../...../.....

6. No. of Supervisors employed : .....
(Undertaking(s) in Form A2 to be enclosed)

7. No. of Workmen employed : .....
(Undertaking(s) in Form A2 to be enclosed)

8. Annual Renewal fee : Rs. 4,000/- for Class – I
Rs. 2,000/- for Class – II

9. Late Renewal fee, if any : Rs. .....

a) @Rs. 400/- per month for Class - I.

b) @Rs. 200/- per month for Class – II.

10. Enclosures :

1) GST Registration, if not submitted earlier

2) Latest Balance Sheet/ Turn over Statement

3) Form H-List of employees

4) Form I- Return of work done

5) List of Form J submitted

Date : ...../...../.....

Specimen Signature

FORM L

[See Regulation 25(1) and 29(1)]

APPLICATION FOR RENEWAL OF SUPERVISOR'S CERTIFICATE

&

WORKMAN'S PERMIT

1. Name of Applicant (in capital letters) : .....
.....

2. Detail Address with phone number : .....
.....

3. Certificate/Permit number : .....

4. Date of Expiry : Dt ...../...../.....

5. Present occupation with address : .....
.....
.....

6. Annual Renewal fee : Rs. 1,000/- for Supervisor
Rs. 500/- for Workman

7. Late Renewal fee, if any : Rs. .....
   a) @Rs. 100/- per month for Supervisor.
   b) @Rs. 50/- per month for Workman.

Date : ...../...../.....

Specimen Signature

FORM M

[See Regulation 30(1)]

APPLICATION FOR DUPLICATE ELECTRICAL CONTRACTOR LICENSE/ SUPERVISOR'S CERTIFICATE/ WORKMAN's PERMIT

1	Name of the applicant, as in the License /Certificate / Permit	
2	Document of which duplicate is required ie. License / Certificate / Permit (No. & date should be specified)	
3	Date of expiry for License/ Certificate/ Permit	
4	Whether the document is lost, defaced, mutilated, destroyed or damaged	
5	Fees payment Original Challan enclosed. (Yes/ No)	
6	Copy of FIR enclosed. (Yes/ No)	
7	2 Nos. recent passport size photos enclosed. (Yes/ No)	

DECLARATION

I ……..……..…..…… solemnly declare that the above particulars are correct. My Contractor License/ Supervisor's Certificate / Workman's Permit is lost irrecoverable/ destroyed/ defaced/ damaged /mutilated. I further declare that in case the original of the document is received or traced out later, I shall return it to the Chief Electrical Inspector, Nagaland.

Place:

Date: **Signature of the Applicant**

Information for Applicants

1. Fees for the purpose to be paid to the Secretary, NELB through Treasury Challan under **Head of Account : 0043 - Taxes and Duties on Electricity**.
2. Fees for issue of Duplicate copy ;

License	Certificate	Permit
Rs 1000/-	Rs 500/-	Rs 250/-