

**GUIDELINES FOR CAPITAL EXPENDITURE BY DISTRIBUTION LICENSEES IN
MADHYA PRADESH 2025**

1. General

- 1.1 In exercise of the powers conferred under Section 86(1)(i) read with Section 181(1) of the Electricity Act, 2003, the Commission hereby revises the Guidelines for Capital Expenditure by Distribution Licensees in Madhya Pradesh, 2005, specified under Regulation 10.3 of the MPERC (Conditions of Distribution License for Distribution Licensees (including Deemed Licensees)), 2004, as amended. These Guidelines shall be called the Guidelines for Capital Expenditure by Distribution Licensees in Madhya Pradesh, 2025.
- 1.2 These Guidelines aim to establish the framework to be followed by Distribution Licensees for obtaining the Commission's in-principle approval for proposed capital investments

Section 1 : Categorisation of Capital investment Schemes

- 1.3 The Distribution Licensee shall submit Capital Investment Schemes for the approval of the Commission under the following broad categories:-
- (a) Capital Schemes funded fully or partially by the Central or State Government Grants;
 - (b) Infrastructure required for releasing new connections;
 - (c) System strengthening by enhancing capacity of inter-alia, Sub-station, lines, cables, capacitor banks and providing sectionaliser/ Circuit Breaker, to mitigate overloading or to provide redundancy or to improve voltage profile or reduce losses;
 - (d) Agricultural connections related schemes;
 - (e) Installation of new Sub-station, distribution lines and transformers to cater to demand in a particular area;
 - (f) Improvement in quality of supply and reliability of distribution system;
 - (g) Installation or upgradation of Supervisory Control Data Acquisition (SCADA), Distribution Control Centre(s),
 - (h) Installation or upgradation of communication and/or control equipment;
 - (i) Metering and Protection schemes;
 - (j) Improvement in consumer services;
 - (k) Replacement of assets due to obsolescence and/ or in absence of support from Original Equipment Manufacturer;
 - (l) Demand Side Management / Renewable Power integration/Energy Conservation measures;

- (m) Smart Grid schemes;
- (n) Reactive Power management ;
- (o) Civil work such as office building, approach road, etc.;
- (p) Storage Schemes;
- (q) EV charging Stations;
- (r) Microgrid
- (s) Pilot projects demonstrating emerging technologies, strategies, and solutions aimed at improving system efficiency, reliability, and sustainability such as Demand Response programs, Renewable Energy integration, AI based predictive maintenance and Virtual power plant etc.;
- (t) Any other schemes

1.4 The Distribution Licensee shall submit Detailed Project Report (DPR) for each scheme separately in hard and soft copy. The petition will, inter alia, cover the following key parameters for the evaluation of schemes:-

No Parameters

- 1 Cost (Overall expenditure related to the scheme) ;
- 2 Time (Duration for project implementation);
- 3 IRR and Payback (Internal rate of return (IRR) and payback period for recovering the investment made);
- 4 Distribution Loss reduction (Estimated reduction in technical and commercial losses in Distribution system)
- 5 Improvement in voltage profile (Enhancement of voltage regulation, stability and reduction in voltage fluctuations across the Network);
- 6 Improvement in Reliability parameters viz. System Average Interruption Frequency Index (SAIFI) and System Average Interruption Duration Index(SAIDI) vis-a-viz the target specified by the Commission;
- 7 Improvement in Power Quality (Expected improvement in power quality parameters by minimizing Harmonic distortions , voltage variation, voltage unbalance, voltage sag/swells to ensure high power quality for consumers);
- 8 Improvement in billing and collection efficiency;
- 9 Likely impact on Annual Revenue Requirement (ARR)/ Annual Revenue Realization;
- 10 Likely reduction in Equipment/PTR/DTR failure rate;

No Parameters

- 11 Likely reduction in reactive power flow in 33 KV/11 KV/LT network;
- 12 Increase in automation and resulting reduction in operational expenditures (OPEX);
- 13 Increase in number of parameters that can be directly provided to Commission online for monitoring purpose;
- 14 Numbers of consumers directly benefiting from the scheme;
- 15 Any other parameters which is important in the opinion of Distribution Licensee

Note : All the above parameters should be submitted in terms of numbers, which can be monitored for the Company and/or for the ring fenced area within the Company, in which works of scheme are being undertaken.

2. Section 2 : Framework for approval of Capital Investment Scheme

- 2.1 Capital Investment Schemes of a value exceeding Rupees Ten Crore (Rs 10 Crore) for Distribution Licensee or such other amount as may be stipulated by the Commission from time to time shall be required approval from the Commission. Scheme of Rs 10 Crore or below shall require competent approval as per Delegation of Powers (DoP) of Distribution Licensee. Asset put to use/capitalised shall be booked into Audited account of Distribution Licensee under appropriate heads.
- 2.2 The Commission shall approve the Capital Investment Scheme in the following two stages:
 - (a) In-principle approval prior to undertaking works under the Capital Investment Scheme;
 - (b) Final approval of cost after asset is put to use
- 2.3 Prior in-principle approval shall not be required for hundred (100) percent Grant funded Schemes or Schemes that fall under emergency works. Emergency works shall include all such works necessary to be undertaken by Licensee promptly to prevent, mitigate, or respond to imminent threats or incidents that could lead to imminent threats, disasters, accidents, or significant incidents. Such works which are critical to restoring or maintaining system functionality after any such event implemented without waiting for prior in principle approval subject to approval from competent authority as per delegation of power within the Company. Such works shall require final approval as per these Guidelines at time of final approval.

3. Section 3: Petition for in-principle approval of Capital Investment scheme

3.1 The petition for in principle approval of Capital investment scheme shall necessarily comprise the following particulars:

(1) **Overview of Scheme**

- a. Name of the Scheme;
- b. Objective of the capital investment;
- c. Brief scope of work;
- d. Categorisation of Scheme as per these Guidelines;
- e. Date of approval by competent authority duly authorised by the Company's Board of Directors, along with documentary evidence;
- f. Final or tentative location of the project including GPS co-ordinates;
- g. Technical specifications of the scope of work;
- h. Reference of Study Report or Recommendations of well-reputed Government Institute or Expert agency, wherever applicable;
- i. Estimated cost and basis of the same;
- j. Completion Schedule of the capital investment with Program Evaluation and Review Technique (PERT) Chart or Gantt Chart or any other suitable Project Monitoring mechanism;
- k. Year-wise capital investment and proposed capitalisation;
- l. Funding arrangement with break-up of grants, consumer contribution, debt, equity, as applicable;
- m. Quantifiable, verifiable and monitorable tangible and intangible benefits of the capital investment as per Clause 1.4 of these Guidelines.
- n. Overall cost-benefit analysis showing physical and financial benefits;
- o. Checklist of the supporting documents appended;
- p. Any other relevant documents required based on the nature of the scheme.

(2) **Justification for Scheme**

- a. The need for capital investment must be substantiated with adequate supporting documentation, including but not limited to load flow studies, projected load growth, new connection applications (where available), and recommendations from the Original Equipment Manufacturer or relevant expert bodies;
- b. For existing areas, distribution schemes should focus on overall system needs, addressing critical gaps, future growth, and system reliability. This holistic approach prevents over-investment in specific areas and aligns infrastructure

upgrades with broader operational and sustainability goals across the service area

- c. The urgency of capital investment should be assessed in terms of its scope, the potential impact of phasing or deferment, and the implications of not proceeding with the investment
- d. Technical justification
 - i. Basis for consideration as a Capital Investment Scheme ;
 - ii. Obsolescence of existing equipments/technology, if any;
 - iii. Statutory requirement, if any
 - iv. Expected benefits of Capital Investment in terms of inter-alia development of the new infrastructure, augmentation of existing infrastructure, improvement in operational parameters/efficiency; improvement in quality of supply, improved load management, increased redundancy, adoption of latest technology, and release of new connections;
 - v. Past trends and projections of concerned operational performance for next five years, with and without proposed capital investment, in case the Scheme is for improvement of operational performance;
 - vi. Basis/test report/diagnostic test report, etc., if the Scheme is for replacement of the existing assets;
 - vii. Details of loading of asset, future load projections, and basis for load projections;
 - viii. Available Technology options and reasons for opting proposed technology;
 - ix. Whether open source protocol, commination etc. are used and modification thereof.
- e. Financial justification/Cost analysis:
 - i. Phasing of capital investment and capitalisation;
 - ii. Cost assessment with break-up of equipment cost, installation cost, Project Management expenses or turnkey cost, as applicable, contingencies, interest during construction;
 - iii. Reasonability/comparison of rates considered for estimation;
 - iv. least cost analysis
 - v. funding arrangements;
 - vi. projected revenue addition;

- vii. projected reduction in operating costs;
 - viii. Cost-Benefit analysis in terms of comparison of the investment Cost with technical and financial benefits, quantified objective of the Scheme, overall benefit to the entity, year-wise realisation of target objectives, impact on ARR for the first five years after commissioning of proposed capital investment, financial investment criteria such as inter-alia Payback Period, and Internal Rate of Return (IRR).
- f. Methodology by which the Scheme's progress can be monitored and timely corrective action be taken in case of any deviation from the schedule including geo-tagging, etc.;
 - g. List and Status of Statutory Clearances/Approvals required to execute the project;
 - h. Physical and financial constraints, if any, in execution of the Scheme, and identification of possible delays, causes thereof and proposed mitigation measures.
- 3.2 Requisite information /data of petition for in-principle approval of Capital Investment Scheme shall be submitted in accordance with the Format specified in **Appendix 1**:

Provided that the Format may be modified by the Commission from time to time, as required:

Provided further that the Commission may ask the Distribution Licensee at any stage of the approval process to submit any other relevant information for undertaking the Prudence Check of the proposed capital investment.

- 3.3 The Distribution Licensee may file for cancellation of in-principle approval for any Scheme at any point of time, in case such Scheme is no longer relevant.

4. Section 4. : Check list for in-principle approval of Schemes

- 4.1 The Commission shall undertake prudence check of the petition submitted for in-principle approval of Schemes based on the submissions made by the DISCOM in accordance with these Guidelines. A check list for filing the submission by Discom is annexed as **Annexure 3**.

5. Section 5 : Filing of Rolling Plan

- 5.1 The Distribution Licensee shall file a petition for all schemes to be undertaken within the 5-year Rolling Capital Investment Plan by 1st October each year. The Rolling Plan should provide a comparison of each scheme's cost, including the in-principle approved cost by the Commission for that year, the revised cost of any ongoing scheme, revised cost of any previous in-principle approved scheme and the proposed cost of any new scheme requiring in-principle approval. This Rolling Plan will be submitted to the Commission for its in principal approval.

- 5.2 DISCOMs shall submit the costs of all schemes that were completed and for which assets were put into use during the previous year (i.e. N-1) for which final cost approval is required from the Commission, along with the rolling plan. DISCOMs shall demonstrate the achievements of each scheme by comparing the in-principle approved cost with the actual cost incurred, as part of their submission for final approval from the Commission. A check list for filing the submission by Discom in this regard is annexed as **Annexure 4**.
- 5.3 The Commission may return Rolling Capital Investment Plan of Schemes to Distribution Licensee, if the necessary particulars are not furnished along with the Plan, unless specific relaxation is sought and granted by the Commission.

6. Repeal and Saving

6.1: The Guidelines for Capital Expenditure by Licensees in Madhya Pradesh, 2005, so far as these are applicable to Distribution Licensees stand repealed with effect from the date of notification of these Guidelines.

6.2: Notwithstanding such repeal,-

- a) For Transmission Licensees, the Guidelines for Capital Expenditure by Licensees in Madhya Pradesh, 2005, shall continue to apply till such time separate guidelines for Capital expenditure by Transmission Licensees, are made.
- b) Any actions taken under the repealed Guidelines for Distribution Licensees shall be deemed valid and considered as actions taken under these new Guidelines.

Annexure 1:

Format for Filing of Capital Investment Scheme for In-Principle Approval

1. Index	Index with the documents Page No.
2. Name of DISCOM	
3. Name of the Capital Expenditure Scheme and category of scheme as per clause 1.3 of Guidelines	
4. Type of capex Scheme	(New/ revised / completed)
5. Details of the Location	<ul style="list-style-type: none"> Name of Zone, Circle/Area/Location along with GPS Co-ordinates and any other relevant information.
6. Date of Approval by Competent Authority designated by the Board of Directors of the Company	<ul style="list-style-type: none"> Copy of relevant provisions of delegation of powers and approved documents
7. List of Identical/similar schemes previously approved by the Commission and their progress report (5 years data) in terms of parameters given in clause 1.4 of these guidelines	
8. Brief Scope and Specifications of Work	Major line items shall be mentioned
9. Any Reference of Study Report / Recommendations of OEM/Expert body etc.	<ul style="list-style-type: none"> Example.- Load Growth Report, EPS Report, STU Plan, Load Flow Study, Recommendations Report of Expert body , Report of OEM/Third Party/ Recommending Committee/Any report by competent authority based on which works is proposed to be undertaken)

10. Estimated cost	Rs. ____ (Hard Cost-Supporting details) Rs. ____ (Total Cost with IDC)
11. Time Frame of the expenditure	Completion Period ___ months
12. Funding arrangement	_____(Name of Source (i.e. State Govt. Bank/FI etc. from which loan is expected with estimated Interest rate) _____(In case of fully/partially grant funded scheme, same may be mentioned along with the agency providing the grant and documentary proof of grant provided) _____(Proof of infusion of Equity if any)/(In case of funding through Internal accruals, the same is to be mentioned)
13. Overall cost benefit analysis including financial viability of scheme.	<ul style="list-style-type: none">• Please refer to clause 1.4 of Guidelines• Cost benefit analysis showing estimated physical and financial benefits as per provisions of Guidelines.
14. Check list of the documents appended	Check list with appended documents (All documents to be numbered.)

Annexure 2 : FORMAT FOR ROLLING CAPITAL INVESTMENT PLAN

Sr. No.	Particulars	Previous Year	Current Year	1st Year (FY ..)	2nd Year(FY.....)	3rd Year (FY.....)	4th Year (FY.....)	5th Year (FY.....)
		(N-1)	N	N+1	N+2	N+3	N+4	N+5
1	Name of Scheme							
2								
3...								

Check list for In principle approval of scheme (Annexure 3)

Technical evaluation criteria

- a. Background, necessity, objectives, and overall suitability of proposed Capex;
- b. Whether the Scheme will result in quantifiable and verifiable benefits;
- c. Approval of authorised representative of the Company;
- d. The Single Line Diagram (SLD) for the proposed Schemes and Grid maps of relevant areas, duly differentiating with the existing Schemes;
- e. The Bill of Quantity estimated by the DISCOM;
- f. Quality Assurance Plan (QAP);
- g. PERT Chart/Gantt Chart/ Project Monitoring mechanism showing completion stages and alternative plan for delays;
- h. Efforts taken by the DISCOM to optimise the project cost;
- i. In case proposed scheme is for asset replacement after completion of regulatory Useful Life, following aspects be furnished :-
 - i. Whether the assets are beyond repair;
 - ii. Whether performance of the asset cannot be brought to the desired level through repairs or Renovation and Modernisation;
 - iii. Residual Life Test to assess the real residual life of the asset parameters;
 - iv. Interruptions/faults/issues that have occurred in the last five years on the asset;
 - v. Past major R&M of the asset;
 - vi. Obsolescence to be demonstrated
 - vii. OEM recommendation, if any.
- j. Load flow study report with analysis and recommendations in case of setting up of Sub-stations and Distribution network;
- k. Whether all possible constraints are realistically envisaged and mitigation measures proposed;
- l. Impact if the proposed Capex is either not carried out or is deferred for some period;
- m. Proposed framework for implementation and periodic monitoring of the Scheme;

Financial Evaluation criteria

- n. Proposed funding for the Scheme;

- o. Cost estimates derived based on rates of components available in the Schedule of Rate (SOR) maintained by the respective Distribution Licensees and justification provided by Distribution Licensee in case of variation with respect to the SOR ;
- p. Other costs considered by the Distribution Licensee;
- q. For new works of Distribution Licensees, which are not present in the SOR , estimated cost based on least of the quotations received from vendors;
- r. In case of works funded by Grants, whether the approval of respective Government for the same has been submitted;
- s. Cost Benefit Analysis of proposed scheme along with that of all other possible alternatives;

Check list for Completed Works (Annexure 4)

Technical Parameters

- a. Whether the asset has been ‘put to use’ and is benefiting the consumers/system;
- b. Bills of Quantity actually used vis-à-vis quantity claimed in the application for in-principle approval, with break-up of number of units and per unit cost, and justification for the variation in quantity, if any;
- c. Justification for change in scope of work, if any, with respect to the original scope of work approved in-principle by the Commission, including changes in specification of assets, if any, and cost implication due to the change if higher than 10% of the approved cost;
- d. Variation with respect to scheduled completion date, reasons and justification for the delay, if any, inter-alia, technical parameters, constraints, mitigation measures adopted by the Distribution Licensee.
- e. A detailed comparison of the scope and cost approved by the Commission with the actual expenses incurred by the Distribution Licensee, along with justifications for any deviations
- f. PERT Chart/Gantt Chart showing completion stages and delays;
- g. Distribution Licensee to submit the details of milestone activity wise scheduled and actual dates along with delay and reasons for such delay as per the following format given below: -

Sr. No.	Milestone activity	Scheduled Start date	Scheduled End date	Actual Start date	Actual End date	Delay in days	Reasons for delay	Delay attributable to (DISCOMs/ Contractor/ factors beyond control/etc. (please specify))
1.								
2.								
3.								

Financial Parameters

- h. Item-wise justification for variation between approved equipment cost and completed cost, if any, in case of cost increase higher than 10% of the approved cost;
- i. Difference between approved and actual year-wise phasing of capital investment and capitalisation;
- j. Confirmation that the asset has been capitalised in the annual accounts of the entity, along with the date of asset capitalisation, Serial number and excel sheet name, as reflected in the Fixed Asset Register;
- k. Justification for any variation in funding through debt, equity, or grants compared to what was proposed in the petition for in-principle approval
- l. Financial Completion Certificate (FCC) issued by competent officer of DISCOM,

- duly authorised by the competent authority;
- m. Comparison of actual cost benefit analysis with respect to cost benefit analysis proposed at the time of in-principle approval and justification for variation, if any;
 - n. The Capital Expenditure (Capex) scheme will be planned with a maximum time horizon of 5 years. In cases where there is a time overrun or cost overrun in the approved scheme, the Distribution Licensee must provide a justification or reasons for the delay or additional costs. These justifications should clearly attribute the causes of the time overrun or cost overrun to specific factors that impacted the execution of the scheme. Details of liquated damages etc. be provided. The explanation should include details such as unforeseen challenges, delays in approvals, or changes in project scope that led to the variations from the original plan.