

**TECHNICAL SPECIFICATIONS**  
**(Civil Works)**  
**SPECIFICATION FOR WORK, QUALITY AND WORKMANSHIP**

**Name of the work: - Construction of 05 nos. Security Watch Towers at 765/400/220 KV Indore substation.**

The specifications are intended for the general descriptions of the work, quality, and workmanship. The specifications are not, however, intended to cover the minute details and the works shall be executed according to the best practices of Central Public Works Department or as per the recommendations of relevant Indian Standard Codes and according to the instructions of the Engineer-in-Charge.

All the materials required for successful completion of the project shall be brought from the approved sources/brands/ and POWERGRID's approved compendium of vendors available on its web site. Materials for which approved makes are not available in above, the same shall be decided by the Engineer-in-charge.

The procurement of various materials shall be done either directly from the main manufacturer or their authorized dealers whose traceability can be established to ensure that no duplicate/spurious makes are used in the works. The Contractors are required to submit manufacturer's test certificates for the lots supplied at site with due endorsements by the actual dealers/vendors/sellers. Notwithstanding all the above, the contractor shall be held responsible for the execution of works and use of proper materials as per the tender specifications. All materials shall be approved by the Engineer-in-charge before putting them to use.

The Contractor shall arrange all labour, equipment and materials required for complete performance of the work in accordance with the BOQ, specification, SFQP and directions of the Engineer In-Charge.

The work to be performed under these specifications consists of providing all labor, supervision, materials, planking and strutting, power, fuel, construction equipments, tools and plants, supplies, transportation, blasting materials if required, storage, insurance, royalty and all incidental items not shown or specified by reasonably implied or necessary for successful completion of work including contractor's supervision and in strict accordance with drawing and specifications.

**GENERAL CIVIL WORKS: -**

1. All scheduled items civil are based on DSR'2023 & scheduled electrical items are DSR'2022, any discrepancy in the item description shall be corrected accordingly.
2. All non-schedule items shall be strictly as per item description of respective BOQ, technical specifications (if any) and instruction of Engineer-in-Charge. CPWD specifications of nearest item shall also be applicable for all non-schedule items.
3. The order of precedence shall be Item description in BOQ, CPWD specification of nearest item and relevant IS specification.
4. All concrete work shall be carried out as per the latest CPWD specifications and relevant IS code.
5. No materials will be supplied by POWERGRID. Item rates are inclusive of material cost.
6. The contractor shall arrange all labour, tools, equipment, materials, temporary works, constructional plant & machinery, fuel supply, transportation and all other incidental items not shown or specified but as may be required for complete performance of the works in accordance with drawings, specifications and direction of Employer. Item rates are inclusive of the cost of labour, equipment, material, tools & plants etc. No materials will be supplied by POWERGRID.
7. The material specification, workmanship and acceptance criteria shall be as per approved standard Field Quality Plan. Standard FQP document code No.: **C/FQA/SFQP/SITE-M-CIVIL-2012 Rev 05 Dated: 10-07-2024, Civil works for Site Packages** is proposed to be adopted for the work. In case certain item is not covered in FQP, it shall be constructed as per CPWD specifications / relevant BIS. All tests on materials and finished products as required in the field quality plan shall be arranged by the contractor without any extra cost to POWERGRID. Apart from these all-mandatory tests shall be carried out as required in the CPWD specifications and IS codes. Test mentioned in individual items/specifications shall also be carried out. All tests required for all materials shall be at the Contractor's cost. In case of items not covered in the CPWD specifications and IS code, contractor shall arrange testing as per practice of the industry without any additional cost. The manufacturer's test certificate for the relevant batch of material procured shall also be submitted by the contractor.
8. All bought out items shall be approved by Engineer in charge prior to its procurement. All material

should be of best quality confirming to relevant Indian Standards and codes. Any item for which specification is not provided herein and is not covered under CPWD specification / BIS Standards, the same shall be executed as per manufacturer guidelines with the approval of employer.

9. The bidder shall fully apprise himself of the prevailing conditions at the proposed site, climatic conditions and site-specific parameters, soil parameters, availability of construction material and shall include for all such conditions and contingent measures in the bid, including those which may not have been specifically brought out in the specifications.
10. The Contractor shall undertake all reasonable precautions for the protection and preservation of Trees, shrubs, any other plants, pole lines, fences, signs, monuments, buildings, pipelines, sewers or other subsurface drains, pipes, conduits, and any other structures under or above ground, which may be affected by construction operations and which in the opinion of the Engineer-in-Charge shall be continued in use without any change.