



**RAILWAY RECRUITMENT CELL,
NORTH WESTERN RAILWAY, JAIPUR-302006**

General Departmental Competitive Examination (GDCE)

GDCE Notification No. : 04/2023 Dated : 02.08.2023

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Online applications are invited from Serving Regular Railway Employees of North Western Railway who have successfully completed period of probation as on last date of online application excluding RPF/RPSF employees for filling up the following posts (Assistant Loco Pilot/Technicians, Junior Engineer and Train Manager) against General Departmental Competitive Examination (GDCE) quota as per instructions issued vide Railway Board's letter no. E(NG)I-92/PM2/16 dated 20.08.1993 (RBE NO. 129/1993) & E(NG)I/2023/PM1/12 dated 20.06.2023 (RBE NO. 80/2023) and other instructions issued from time to time. **The employee must read all the instructions of this notification before filling the online application.**

1. DETAILS OF VACANCIES, MEDICAL FITNESS CLASSIFICATION :-

A. ALP/Technician Posts:-

Cat. No.	Name of the post	GP (Pay Level)	No. of vacancies					Medical standard
			UR	SC	ST	OBC	Total	
1.	Asstt. Loco Pilot	G.Pay 1900/- (Level-2)	105	32	14	55	206	A-1
2.	Technician-III (Track Machine)	G.Pay 1900/- (Level-2)	5	2	0	2	9	A-3
3.	Technician Grade-III (C&W)	G.Pay 1900/- (Level-2)	2	0	0	0	2	B-1
4.	Technician Grade-III (Signal)	G.Pay 1900/- (Level-2)	2	0	0	1	3	B-1
5.	Technician Grade-III (Telecommunication)	G.Pay 1900/- (Level-2)	1	0	0	1	2	B-1

B. Junior Engineer Posts :-

Cat. No.	Name of the post	GP (Pay Level)	No. of vacancies					Medical standard
			UR	SC	ST	OBC	Total	
6.	Junior Engineer (P. Way)	G.Pay 4200/- (Level-6)	5	2	2	2	11	A-3
7.	Junior Engineer (Works)	G.Pay 4200/- (Level-6)	5	1	1	1	8	B-1
8.	Junior Engineer (TMC)	G.Pay 4200/- (Level-6)	7	3	2	1	13	A-3
9.	Junior Engineer (C & W)	G.Pay 4200/- (Level-6)	1	0	0	0	1	B-1
10.	Junior Engineer (Diesel Mechanical)	G.Pay 4200/- (Level-6)	1	0	0	0	1	B-1

Cat. No.	Name of the post	GP (Pay Level)	No. of vacancies					Medical standard
			UR	SC	ST	OBC	Total	
11.	Junior Engineer (Diesel Electrical)	G.Pay 4200/- (Level-6)	1	0	0	0	1	B-1
12.	Junior Engineer/ Electrical/TRD	G.Pay 4200/- (Level-6)	3	2	1	1	7	A-3
13.	Junior Engineer/ Electrical/General Services	G.Pay 4200/- (Level-6)	2	0	0	0	2	B-1

C. Guard/Train Manager Posts:-

Cat. No.	Name of the post	GP (Pay Level)	No. of vacancies					Medical standard
			UR	SC	ST	OBC	Total	
14.	Guard/Train Manager	G.Pay 2800/- (Level-5)	24	7	3	12	46	A-2

Note:

1. The detailed Post Parameters (Qualification, Medical Standard etc.) of various posts are included in this Notification at **Annexure- A.**
2. The above medical standards are indicative and not exhaustive and applicable to employees in general. Employees are advised to read Chapter 5 of Indian Railway Medical Manual (IRMM) Volume I which can also be accessed at www.indianrailways.gov.in.

2. ELIGIBILITY CRITERIA :

Minimum Educational/Technical Qualification against each postis indicated in **Annexure-A.**

3. AGE LIMIT :

The upper age limit will be 42 years for UR employees, 45 years for OBC employees and 47 years for SC/ST employees.

The lower and upper age limit indicated for the post(s) in the Vacancy Table will be reckoned as on **01.01.2024.**

Cut-off date of Birth is indicated below:

Age Group	Lower Date of Birth	Upper Date of Birth		
		UR	OBC	SC/ST
	01.01.2006	18 to 42	18 to 45	18 to 47
		02.01.1982	02.01.1979	02.01.1977

Note:-

No age relaxation is allowed to SC/ST/OBC-NCL (Non Creamy Layer) applying against unreserved vacancies.

4. APPLICATION FEE : Nil

5. VERTICAL RESERVATION :

For availing reservation, SC/ST/OBC-NCL employees should furnish Caste Certificate from competent authorities as per the format given at Annexure-II (for SC/ST Employees) and at Annexure -III (for OBC-NCL Employees) at the time of Documents Verification. Further, in case of OBC-NCL employees, the certificates should specifically indicate that they do not belong to the Persons/Sections (Creamy Layer) mentioned in Column 3 of the Schedule of the Government of India, Department of Personnel and Training O.M.No.36012/22/93- Estt. (SCT) dated 08.09.93 & its subsequent revision through O.M.No.36033/3/2004-Estt. (Res) dated 09.03.2004, 27.05.2013, 13.09.2017 and further revision, if any, received till the closing date of applications submission. The employees should ensure that they belong to the OBC- Non Creamy Layer (NCL) category while applying for the posts against this Notification. Such employees should produce a valid OBC certificate in the prescribed format during Documents Verification. Further, in addition to the community certificate (OBC), a declaration in the prescribed format as per Annexure-III A has to be furnished by the employees during Documents Verification that he/she does not belong to the creamy layer. The certificate produce shall not be older than one year at the time of Documents Verification. In case of not complying to these stipulations, their claim for reserved status (OBC-NCL) will not be entertained and the candidature/application of such employees, if fulfilling all the eligibility conditions for General (Unreserved) category, will be considered under General (UR) vacancies only. **There is no separate reservation of posts for Economically Weaker Sections (EWS).**

6. MEDICAL FITNESS :-

The employees empanelled in GDCE for the post of Asstt. Loco Pilot, Technicians, Junior Engineers and Train Managers will have to pass the requisite medical fitness test(s) conducted by the Railway Administration to ensure that the employees are medically fit to carry out the duties connected with the post. Employees must ensure his/her medical fitness since in case of unfitness, he/she will not be given an alternate post.

7. RECRUITMENT PROCESS:-

- (a) Serving Regular Railway Employees of North Western Railway who have successfully completed period of probation and fulfills the eligibility criteria may submit Only single ONLINE application, through the link provided on the official website of RRC/NWR www.rrcjaipur.in
- (b) The recruitment process shall involve Computer Based Test (CBT) followed by Computer Based Aptitude Test (wherever applicable) and Documents Verification/Medical Examination.
- (c) The date, time and venue for all the activities viz. CBT, Aptitude Test, Documents Verification, Medical Examination or any other additional activities as applicable shall be fixed by the RRC and shall be intimated to the eligible employees in due course.
- (d) RRC reserves the right to conduct the examination in batches on various dates and locations as decided by the RRC.
- (e) Request for postponement of any of the above activities or for change of venue, date and shift will not be entertained under any circumstances.
- (f) Employee to please note that there will be no supplementary exam (CBT, CBAT etc.)for the absentee employees under any circumstances.
- (g) The CBT shall have questions and answer options only in English and Hindi language.

- (h) CBT/Written Examination will have multiple choice type questions. There shall be negative marking in written examination and 1/3 of the allotted marks for each question shall be deducted for every wrong answer.
- (i) The number of Vacancies shown in the notification are provisional and the same may increase or decrease depending upon the actual needs of the administration at the time of appointment.

8. **IMPORTANT INSTRUCTIONS :-**

- a) Only Serving Regular Railway Employees of North Western Railway who have successfully completed period of probation working in following Grade Pay/Pay Level are eligible:-
 - (i) Lower than the Grade Pay/Pay Level for which GDCE is being held.
 - (ii) Same Grade Pay/Pay Level scale for which GDCE is being held are permitted to appear in selection for **Non Safety to safety category posts as well as safety to safety category posts.**
 - (iii) Employees are not allowed to apply for the same post on which presently working.
- b) Employees who resigned or transferred to any other railway from NWR will not be considered eligible.
- c) The employees should possess the requisite educational qualification on the closing date of the application. Those employees who are appearing in and/or awaiting results of final examination of minimum qualification as on **closing date (02.09.2023)** are not eligible. Academic/Technical qualification must be from recognized Educational/Technical Institution/Board, otherwise candidature will be rejected at any stage of selection.
- d) Eligible employees should submit their applications through online mode only. **Application sent through offline mode/manually/Hard copy in RRC, Jaipur office will not be entertained.**
- e) Employees are required to go to the link provided for filling ONLINE application and fill up the personal details/BIO-DATA duly following the steps and instructions as mentioned at Para 11 of this Notification carefully. Employees should enter all the required details in the online application form. Incomplete application shall not be accepted.
- f) Employees must indicate their preferences for different categories (Name of Post) in the online application form.
- g) Please note that post preference once opted shall be treated as final and no change is permissible at any stage.
- h) Employees with partial option of posts will be considered only for the specific posts opted by them since non-option of certain posts would indicate their unwillingness for the same.
- i) The list of eligible/ineligible employees will be published on the website of the RRC. The eligible employees can download their admit cards from the RRC website in due course. Employees are advised to be in touch with RRC website for various information of the stages of selection.
- j) In case the application is rejected by RRC for any reason, employees will be able to view their status **ONLINE** on the website of RRC/JP, along with the reasons for rejection(s). SMS and e-mail alerts will also be sent to the employees on their registered mobile number and email ID, as indicated while registering their application **ONLINE**. Employees whose application/candidature is rejected will **NOT** be intimated by post. RRC/JP accepts no responsibility for non-receipt of any communication.
- k) Employees who wish to be considered against vacancies reserved for SC/ST/OBC and/or seek age relaxation must submit requisite certificate from the competent authority in the prescribed format at the time of Document verification. Otherwise, their claim for reserved status will not be entertained and the candidature/applications of such employees fulfilling

all eligibility conditions for General (UR) category will be considered under General (UR) category only.

- l) Allotment of post shall be on the basis of merit cum option. Allotment of post shall be final and binding on the employee and no appeal will be entertained.
- m) Employees are required to indicate their personal mobile no. and personal e-mail ID in the online application form and keep them active during the entire recruitment process.
- n) Employees are advised in their own interest to register their applications **ONLINE** well before the closing date and time to avoid hassles like inability/failure to log on the website on account of heavy load on the internet or website jam during the last days.
- o) RRC/JP will not bear any responsibility if the employees are not able to register applications **ONLINE** within the last date/time, for any reason whatsoever.
- p) Selected employees are liable to be posted anywhere on North Western Railway.
- q) Decision of the Railway Recruitment Cell, Jaipur in the matter of selection will be final.
- r) Railway Administration reserves the right to alter the mode of examinations or re-conduct CBT/CBAT or to cancel part or whole of any process of recruitment at any stage.

9. SCHEME OF EXAMINATION :-

I. ALP/Technicians Posts

Only single online application (common to all the notified posts- ALP & Technicians) has to be submitted by the employee through the link provided on the official website of RRC, Jaipur www.rrcjaipur.in. The entire recruitment process shall involve CBT, Computer Based Aptitude Test, Document Verification and Medical Examination as applicable.

The CBT shall have two parts viz. Part A and Part B as detailed below.

PART-A

Duration: 90 Min.

No of Questions: 100

The marks scored in Part A alone shall be used for short listing of employees for further stages of recruitment process subject to the condition that the employee is securing qualifying mark in Part B.

The syllabus for Part A shall be as below:

- a. Mathematics: Number system, BODMAS, Decimals, Fractions, LCM, HCF, Ratio and Proportion, Percentages, Mensuration, Time and Work; Time and Distance, Simple and Compound Interest, Profit and Loss, Algebra, Geometry and Trigonometry, Elementary Statistics, Square Root, Age Calculations, Calendar & Clock, Pipes & Cistern etc.
- b. General Intelligence and Reasoning: Analogies, Alphabetical and Number Series, Coding and Decoding, Mathematical operations, Relationships, Syllogism, Jumbling, Venn Diagram, Data Interpretation and Sufficiency, Conclusions and decision making, Similarities and differences, Analytical reasoning, Classification, Directions, Statement – Arguments and Assumptions etc.
- c. Basic Science and Engineering: The broad topics that are covered under this shall be Engineering Drawing (Projections, Views, Drawing Instruments, Lines, Geometric figures, Symbolic Representation), Units, Measurements, Mass Weight and Density, Work Power

and Energy, Speed and Velocity, Heat and Temperature, Basic Electricity, Levers and Simple Machines, Occupational Safety and Health, Environment Education, IT Literacy etc.

- d. General Awareness on Current Affairs in Science & Technology, Sports, Culture, Personalities, Economics, Politics and any other subjects of importance.

PART-B

Duration: 60 Min.

No of Questions: 75

Qualifying Mark: 35% (This is applicable to all employees and no relaxation is permissible) This part is qualifying in nature and shall have questions from the trade syllabus prescribed by Director General of Employment & Training (DGET). Employees with ITI/Trade Apprenticeship qualification will be required to appear in the section having questions from the relevant trade. Employees holding Degree, Diploma having eligibility for the posts of ALP have to select relevant trade from the list of trades listed against their engineering discipline.

Employees who do not have ITI/Act Apprentice/Diploma qualifications and have qualified 10+2 with Physics and Mathematics will be eligible for the posts of Tech- III/Tele and Tech-III/Sig only. They should choose a special trade "Physics & Maths". If, they choose any other trade, they will not be considered for any of the posts. The Physics & Maths trade shall have questions on Physics and Mathematics of 10+2 standard.

Employees who do not have ITI/Act Apprentice qualifications but have Diploma/Degree in various specified streams will be considered for the post of ALP only. Such employees should choose their trades for Part-B of the CBT.

The trade syllabus can be obtained from the DGET website. The relevant trades for various 10+2/diploma/engineering discipline for appearing in the qualifying test is as below:

Sl. No.	Engineering Discipline(Diploma/Degree)	Relevant trade for PART B Qualifying Test to be selected from
1	Electrical Engineering and combination of various streams of Electrical Engineering	Electrician/Instrument Mechanic/Wiremen/Winder(Armature)/Refrigeration and Air Conditioning Mechanic
2	Electronics Engineering and combination of various streams of Electronics Engineering	Electronics Mechanic/Mechanic Radio & TV
3	Mechanical Engineering and combination of various streams of Mechanical Engineering	Fitter/Mechanic Motor Vehicle/Tractor Mechanic/ Mechanic Diesel/ Turner/ Machinist/ Refrigeration and Air Conditioning Mechanic/ Heat Engine/ Millwright Maintenance Mechanic
4	Automobile Engineering and combination of various streams of Automobile Engineering	Mechanic Motor Vehicle/ Tractor Mechanic/ Mechanic Diesel/ Heat Engine/ Refrigeration and Air Conditioning Mechanic
5	HSC (10+2) with Physics and Maths	Physics and Mathematics

Computer Based Aptitude Test (Only for employees who have opted for ALP)

Qualifying marks: The employee needs to secure a minimum score of 42 marks in each of the test batteries to qualify. This is applicable to all employees and no relaxation is permissible.

Employees equal to 8 times number of ALP vacancies for each of the communities i.e. UR, OBC-NCL, SC and ST shall be short listed for Computer Based AT (based on their performance in CBT).

Employees will have to qualify in each of the test battery of Computer Based AT for considering them for the post of ALP. The Computer Based Aptitude Test shall have questions and answer options only in English and Hindi. There shall be no negative marking in Computer Based AT.

The ALP merit list will be drawn only from amongst the employees qualifying in the Aptitude Test, with 70% weightage for the marks obtained in the CBT and 30% weightage for the marks obtained in Computer Based AT.

Employees are advised to visit websites of RDSO (www.rdsso.indianrailways.gov.in -> Directorates -> Psycho Technical Directorate -> Employees Corner) for question patterns and other details of AT.

Based on the options and performance of employees in part-A of the CBT subject to their qualifying the part-B of CBT (for Technician posts) and based on the performance of employees in both part A of the CBT and Computer Based AT subject to their qualifying the part-B of CBT (for ALP), employees equal to the number of vacancies will be called for Document verification.

Employees to be asked for their category preference, and exam group in which they will appear in the following format:

1. Post Preference Details

Category No	Designation	Department	Priority
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2. Trade Details (Technicians/Act Appr./Diploma/Engg. to specify the trade in which they are appearing)

Exam Group	
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Employees who are shortlisted for Aptitude Test should bring a Vision Certificate in the Prescribed format (**Annexure B**) from an Ophthalmologist at the time of Aptitude Test, failing which they will not be permitted to appear in Computer Based Aptitude Test.

(II) Junior Engineer Posts of various departments:

Only single online application common to all the notified posts in opted RRC - Junior Engineer (JE) has to be submitted by the employee through the link provided on the official website of RRC, Jaipur www.rrcjaipur.in. The entire recruitment process shall involve Computer Based Test (CBT), and Document Verification/Medical Examination as applicable. Selection is made strictly as per merit, on the basis of CBT.

CBT:

Duration : 120 minutes.

No of Questions : 150

Syllabus: The Questions will be of objective type with multiple choices and are likely to include questions pertaining to General Awareness, Physics and Chemistry, Basics of Computers and Applications, Basics of Environment and Pollution Control and Technical abilities for the post. The syllabus for General Awareness, Physics and Chemistry, Basics of Computers and Applications, Basics of Environment and Pollution Control is common for all notified posts under this CEN as detailed below:

- a) **General Awareness :** Knowledge of Current affairs, Indian geography, culture and history of India including freedom struggle, Indian Polity and constitution, Indian Economy, Environmental issues concerning India and the World, Sports, General scientific and technological developments etc.
- b) **Physics and Chemistry:** Up to 10th standard CBSE syllabus.
- c) **Basics of Computers and Applications:** Architecture of Computers; input and Output devices; Storage devices, Networking, Operating System like Windows, Unix, Linux; MS Office; Various data representation; Internet and Email; Websites & Web Browsers; Computer Virus.
- d) **Basics of Environment and Pollution Control:** Basics of Environment; Adverse effect of environmental pollution and control strategies; Air, water and Noise pollution, their effect and control; Waste Management, Global warming; Acid rain; Ozone depletion.
- e) **Technical Abilities:** For technical abilities, refer to Annexure-C to F of this notification. The section wise Number of questions and marks are as below:

Subjects	No. of Questions	Marks for each Section
General Awareness	15	15
Physics & Chemistry	15	15
Basic of Computers and Applications	10	10
Basics of Environment and Pollution Control	10	10
Technical Abilities	100	100
Total	150	150
Time in Minutes	120	

The section wise distribution given in the above table is only indicative and there may be some variations in the actual question papers.

Discipline Mapping Tables:

Sl. No.	Three years Diploma in Engineering or Bachelor's Degree in Engineering/Technology	Exam Group
1.	Mechanical Engineering	Mechanical and Allied Engineering
	Production Engineering	
	Automobile Engineering	
	Manufacturing Engineering	
	Mechatronics Engineering	
	Industrial Engineering	
	Machining Engineering	
	Tools and Machining Engineering	
	Tools and Die Making Engineering	
	Combination of any sub stream of basic streams of above disciplines	
2.	Electrical Engineering	Electrical and Allied Engineering
	Combination of any sub stream of basic streams of Electrical Engineering	
3.	Electronic Engineering	Electronics and Allied Engineering
	Instrumentation and Control Engineering	
	Communication Engineering	
	Computer Science and Engineering	
	Computer Engineering	
	Computer Science	
	Information Technology	
	Combination of sub streams of basic streams of above disciplines.	
4.	Civil Engineering	Civil and Allied Engineering
	Combination of any sub streams of basic streams of Civil Engineering	
	B.Sc. in Civil Engineering of 3 years duration	

All the employees with the above qualification shall be tested in the Exam Group mapped as per the above chart.

A employee possessing more than one minimum educational qualification, mapped to different Exam Groups, can choose any one Exam Group. These employees would be eligible for all the posts for which they possess minimum educational qualifications.

NORMALISATION OF THE MARKS:

The raw marks for single session paper and normalized marks for multi session paper will be used for computing Merit Index, which is a common benchmark for generating merit for employees from different Exam Groups.

CALCULATION OF MERIT INDEX FOR ALL PAPERS

In order to generate a common merit list comprising of employees who gave examination from different exam groups, but eligible for a common post, merit index will be computed. For all papers for which there is only one session, actual marks obtained by the employees will be used for calculating merit index, while for papers in multi-sessions; normalized marks will be calculated corresponding to the raw marks obtained by a employee and the merit index will be calculated based on the normalized marks.

The Merit Index will be computed using the formula given below:

$$\text{Merit Index} = \frac{Sq+(St-Sq) \frac{M - Mq}{Mt - Mq}}$$

(Merit Index is the relative score of a employee within the discipline.)

M : Marks obtained by the employee (actual/raw marks for single session exam and normalized marks for multi session exam. *Mq* : The qualifying marks for general category employee in the paper (40).

Mt : The mean marks of top 0.1% or top 10 whichever is larger of the employees who appeared in the paper (in case of multi session exam including all sessions)

Sq : 350 is the score assigned to *Mq*.

St: 900 is the score assigned to *Mt*.

The qualifying marks (*Mq*) for general category employee is 40.

The Merit Index will be calculated for UR, OBC, SC, ST employees whose actual marks for single session exam and normalizedmarksformultisessionexamareequalorabove the community qualifying marks prescribed in Para II of general instructions. Based on the Merit Index generated, a combined merit list of the employees of different disciplines/Exam Group will be prepared in the descending order of merit and the allotment of the preference will be done on the basis of this merit list.

Employees to be asked for their category preference, and exam group in which they will appear in the following format:

1. **Post Preference Details**

Category No	Designation	Department	Priority
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2. **Exam Group Details**

Exam Group

(III) Guards/Train Manager Post

Only single online application has to be submitted by the employee through the link provided on the official websites of RRC, Jaipur www.rrcjaipur.in. The recruitment process shall involve Computer Based Test (CBT) and Document Verification/Medical

Examination. Selection is made strictly as per merit, on the basis of above mentioned recruitment stages.

Computer Based Test (CBT)

Exam Duration in Minutes	No. of Questions (each of 1 mark) from			Total No. of Questions
	General Awareness	Mathematics	General Intelligence and Reasoning	
90	40	30	30	100

The section wise distribution given in the above table is only indicative and there may be some variations in the actual question papers.

The standard of questions for the CBT will be generally in conformity with the educational standards prescribed for the posts.

The Questions will be of objective type with multiple choices and are likely to include questions pertaining to:

- a **Mathematics:** Number System, Decimals, Fractions, LCM, HCF, Ratio and Proportions, Percentage, Mensuration, Time and Work, Time and Distance, Simple and Compound Interest, Profit and Loss, Elementary Algebra, Geometry and Trigonometry, Elementary Statistics etc.
- b **General Intelligence and Reasoning:** Analogies, Completion of Number and Alphabetical Series, Coding and Decoding, Mathematical Operations, Similarities and Differences, Relationships, Analytical Reasoning, Syllogism, Jumbling, Venn Diagrams, Puzzle, Data Sufficiency, Statement- Conclusion, Statement- Courses of Action, Decision Making, Maps, Interpretation of Graphs etc.
- c **General Awareness:** Current Events of National and International Importance, Games and Sports, Art and Culture of India, Indian Literature, Monuments and Places of India, General Science and Life Science (up to 10th CBSE), History of India and Freedom Struggle, Physical, Social and Economic Geography of India and World, Indian Polity and Governance- constitution and political system, General Scientific and Technological Developments including Space and Nuclear Program of India, UN and Other important World Organizations, Environmental Issues Concerning India and World at Large, Basics of Computers and Computer Applications, Common Abbreviations, Transport Systems in India, Indian Economy, Famous Personalities of India and World, Flagship Government Programs, Flora and Fauna of India, Important Government and Public Sector Organizations of India etc.

10. GENERAL INSTRUCTIONS:

- I. The trade/exam group is to be specified by employees having ITI/Act Apprentice/Diploma/Engg. qualification.
- II. Minimum percentage of marks for eligibility in various categories: UR-40%, OBC (Non Creamy Layer) - 30%, SC-30%, ST-25%.
- III. There will be negative marking and 1/3 mark shall be deducted for each wrong answer.
- IV. In case of two or more employees securing same marks, their merit position shall be determined by age criteria i.e., older person shall be placed at higher merit and in case age

being same, then alphabetical order (a to z) of the name shall be taken into account to break the tie.

- V. Employees equal to the number of vacancies will be called for DV based on their merit in CBT and options.
- VI. Appointment of selected employees is subject to their passing requisite Medical Fitness Test to be conducted by the Railway Administration, final verification of educational and community certificates and verification of antecedents/character of the employees.
- VII. Admission to all stages of recruitment process shall be purely provisional, subject to the employee satisfying the prescribed eligibility conditions.
- VIII. Mere issue of e-Call letter to the employees will NOT imply that their candidature has been finally accepted by the RRC.
- IX. RRC conducts Documents Verification of eligibility conditions with reference to original documents only after the employees have qualified in all the stages of examinations and are shortlisted for Document Verification. RRC may reject the candidature of any applicant at any stage of recruitment process. In case the employee is found not fulfilling the requisite criteria and if appointed, such a employee is liable to be removed from service summarily.
- X. Before applying for the post(s) against this notification, employees should satisfy themselves that they fulfill all the eligibility norms including age, educational qualification(s) and medical standard(s). Employees should ensure that they have requisite educational/technical qualifications from recognized Board/University/Institute as on the closing date for online application submission.
- XI. Employees should enter their Name, Father's Name and Date of Birth as recorded in the SSLC/Matriculation/High School Examination Certificate or an equivalent Certificate as well as in their service record. No subsequent request for its change will be considered.
- XII. In cases of name change, employees should indicate their changed name only in the ONLINE application. However, the details should match with the Matriculation or Equivalent certificate as well as Service Record. Date of such change should be prior to the date of submission of ONLINE application.
- XIII. Gazette Notification or any other legal document as applicable for such cases should be submitted at the time of Document Verification (DV) along with the acceptance letter of employer.
- XIV. Signatures of the employees on all documents should be identical in all stages of recruitment process and must be in running hand and not in block/capital or disjointed letters. Signatures in different style at the time of CBT, CBAT, Document Verification; Medical examination etc. may result in cancellation of candidature.
- XV. Dates of examinations will be published on the website. The e-call letters for CBT, CBAT should be downloaded only from website. No call letter will be sent by post. The CBT Centre, date and shift indicated in the e-call letter shall be final. RRC reserve the right to conduct additional CBT/CBAT, and/or additional document verification etc., without assigning any reason. Request for postponement of any of the above activity or for change of venue, date and shift will not be entertained under any circumstances.
- XVI. Vacancies indicated in this Notification are provisional and may undergo any change (increase/decrease) or even become NIL in total or in specific Units/Communities/Posts at a

later stage depending upon the actual needs of the Railway Administration. Also, additional posts if required by the Railway may also be included at later stage.

- XVII.** The Railway Administration also reserves the right to cancel the notified vacancies at any stage at its discretion and such decision will be final and binding on all.
- XVIII.** The function of the RRC is to recommend names of suitable employees to the concerned authorities of the Railway Division who in turn will issue the offer of appointment letter subject to availability of vacancies and employees satisfying all eligibility criteria.
- XIX.** Selected employees will have to undergo training, wherever prescribed, and during training period payment will be regulated as per extant rules.
- XX.** RRC reserves the right to incorporate any subsequent change/modifications/additions in the terms & conditions of recruitment under this Notification as necessitated and applicable.

11. STEPS TO SUBMIT ONLINE APPLICATION :-

Before filling up ONLINE application, employees are advised to keep scanned copy in JPEG format of following documents ready with them:

1. Passport size colour photograph (Not older than three months)
 2. Left Thumb Impression
 3. Signature
 4. Employee Certificate.
- a) Visit the Website of RRC-NWR i.e. www.rrcjaipur.in and Click on the “GDCE **ONLINE/E-Application**” Link.
 - b) Click on the "**New Registration**" link.
 - c) Fill up **HRMS ID along with** Employee ID number (11 digits), basic details i.e. Employee's Name, Community (UR/SC/ST/OBC), Date of Birth, Mobile No., Email ID.
 - d) On submission of required details Employee will get Registration Number and a message of the same will also be sent on registered mobile no. and email id. **EMPLOYEE SHOULD SAVE THE REGISTRATION NUMBER FOR ANY FUTURE REFERENCE OR TO LOGIN AGAIN.**
 - e) Login using the Registration number & password (i.e. DOB) sent in the e-mail/SMS.
 - f) Employee Dashboard will appear for filling up personal details.
 - g) Fill up the Personal details – Father's Name of employee, Gender (Male/Female/Transgender), Aadhaar number, Two visible marks of identification. Save & continue.
 - h) Fill up the Employment details :- I-PAS No., Joining Date, Designation, Place of posting, Controlling Officer, Division/Workshop/Unit, Railway, Present Pay Level. Save & continue.
 - i) Fill up the Educational/Technical Qualification details. Save & continue.
 - j) Fill up the Permanent and correspondence Address. Save & continue.
 - k) Upload the scanned copy of photograph, signature, Left Hand Thumb Impression & Employee Certificate. Save & continue.
 - l) Fill up the priority for group preference, post preference within group and exam group. Save & continue. (For ALP/Technicians post employees with ITI/Trade Apprenticeship should choose relevant trade and employees having degree or diploma in various eligible stream should choose relevant trade as conveyed in para 9.I of this notification. As regard

Junior Engineer post employees may choose their exam group as per engineering discipline as conveyed in para 9.II of this notification.)

- m) Save & Continue for Preview & submission of application. Once application is submitted, no data can be changed.
- n) A printout of the application should be taken for future reference.
- o) In case of any difficulty or technical problem employees may contact between 10:00 to 17:00 hrs on all working days (Monday to Saturday) at Helpline Contact Number provided on the website. However, it may be noted that RRC will not be held responsible if, a employee is unable to fill application form because of lack of understanding of the procedure or technical problem of website.
- p) **ONLY ONE APPLICATION** Eligible employee has to submit only one application against this Notification and employees submitting more than one application shall be disqualified from the selection process. Even if, such a employee gets selected inadvertently, he/she will be disqualified and they will not be offered any appointment under this Notification for GDCE.

12. DOCUMENTS TO BE UPLOADED :

The employee should upload following documents :-

- a) **Photograph:-** A **colour photograph** in JPG format (Photograph having size 15 to 40 KB not older than three months, with clear front view of the employee, **without cap and sunglasses**, should be uploaded. Employee may note that RRC may, at any stage, reject the applications for uploading old/unclear photo or for any significant variations between uploaded photograph and the actual physical appearance of the employee. **The photo affixed on the employee service certificate, uploaded in the online application and produced at the various stages of the exam must be the same.** Employees are advised to keep extra copies of the same photograph for Aptitude/skill/speed/Document verification etc. Application without photograph is liable to be rejected.
- b) **Signature:-** **Running signature** having size 10 to 20 KB **should be uploaded. Unsigned applications, signed in capital letters/Disjointed letters/spaced out letters will be rejected.**
- c) **Left Hand Thumb Impression:-** Clear thumb impression having size 10 to 20 KB should be uploaded. Application without clear thumb impressions is liable to be rejected.
- d) **Employee Certificate (Annexure-I) :-** Employee Certificate (Format given in Annexure-I) having size 100 KB to 300 KB should be uploaded with the online application. Annexure-I should be filled by the applicant with his signature and thumb impression (which must be the same as uploaded in the application) and verified by the applicants immediate supervisor duly signed with seal and mobile No.

13. DOCUMENT VERIFICATION AND MEDICAL EXAMINATION :-After the results of the CBT, Aptitude test (**wherever applicable**) is declared, shortlisted employees on the basis of merit of written examination will be called for Document Verification. At the time of Document verification the shortlisted employees will have to produce original certificates of education/**technical** qualification, caste, DOB, Employee Certificate (Annexure-1), relieving letter etc.

14. INVALID APPLICATIONS:-Applications with following deficiencies(one or more than one) will be summarily rejected :-

- i. Applications **sent through offline mode/manually and** not registered **ONLINE.**
- ii. Applications which are incomplete in any manner.

- iii. Employees not possessing the prescribed Educational/Technical qualifications at the time of submitting application.
- iv. Over age or date of birth not filled or wrongly filled.
- v. If more than one application registered by the same employee, all such applications will be rejected.
- vi. Photograph not uploaded, Black and white photo, photo with cap or sunglasses, disfigured, small size, full body, only one side view of the face or unrecognizable photo.
- vii. Signature not uploaded or uploaded in capital letters.
- viii. Left Hand Thumb impression is not uploaded or upload is blurred/smudged.
- ix. Any other irregularities which are considered by RRC
 - x. Employee Certificate (Annexure-I) not uploaded or uploaded incomplete or without verification of Supervisor/Officer.
- xi. The candidature of the employee is liable to be rejected in case details furnished in the online application are wrong/mismatch with the original document at the time of document verification.
- xii. The employee, who wants to avail the benefit of reservation of SC/ST, must produce his/her Caste Certificate issued by appropriate authority as per sample Annexure-II at the time of Document Verification. Similarly the employee who wants to avail the benefit of reservation of OBC, must produce OBC Certificate (in Central Government format by appropriate authority as per sample Annexure-III) with Non- Creamy Layer Certificate for the financial year in which they applied online as well as the financial year in which they appear for the Document verification.

Note:- The list is only illustrative and not exhaustive. The applications will be rejected on any other irregularity/deficiency noticed by the RRC at any stage.

15. MISCONDUCT

- (a) Employees/Employees are warned that they should not furnish any particulars that are false or suppress any material information while submitting the Application. In case wrong declaration/particulars are given by the employees, he/she is liable to be taken up under Disciplinary Rules including rejection of candidature.
- (b) Employees shall not bring or attempt to bring any political or other influence to further his/her interest in respect of selection process.
- (c) Any malpractices/misconduct on the part of the employee/employee at any part of the recruitment process is strictly prohibited and such malpractices/misconduct will lead to disqualification of the candidature and also appropriate disciplinary/criminal proceedings will be initiated.
- (d) Any employee found using unfair means in the examination or sending someone else in his/her place to appear in the examination will be debarred from appearing in all the examination of all the RRB/RRC for lifetime. Action will also be taken against him/her under Railway D&A Rules. In addition such employees are also liable for prosecution under criminal law.
- (e) RRC reserves the right to reject the candidature of any applicant at any stage of the process of recruitment, if any irregularity/deficiency is noticed in the application.

16. MISCELLANEOUS :

- a) Before applying, the Employees should carefully read the instructions and ensure that he/she fulfills all the prescribed eligibility criteria at the time of submission of application as per the Notification.

- b) The scheme of GDCE will be implemented according to the guidelines issued by Railway Board and will be binding on all.
- c) Candidature of the Employee is provisional at all stages of selection subject to fulfillment of all eligibility condition and RRC reserves the right to cancel the candidature at any stage if found ineligible under the Rules/Instructions issued by the Railway Board from time to time.
- d) The decision of RRC in all matters relating to eligibility, acceptance or rejection of application, issue of free Rail Passes, penalty for false information, mode of selection, conduct of written examination, allotment of examination centers, selection etc. will be final and binding on the employees and no enquiry or correspondence will be entertained by the Railway Recruitment Cell in this regard.
- e) Railway Recruitment Cell will not be responsible for any inadvertent errors.
- f) For any legal dispute, the Jurisdiction will be Hon'ble Central Administrative Tribunal, Jaipur only.
- g) In the event of any dispute about interpretation or any mistake, the English version will be treated as final.

Chairman
Railway Recruitment Cell,
North Western Railway, Jaipur

WARNING :

Beware of Touts and job racketeers trying to deceive by false promises of securing job in Railways either through influence or by use of unfair and unethical means. RRC has not appointed any agent(s) or coaching centre(s) for action on its behalf. Employees are warned against any such claims being made by persons/agencies. Employees are selected purely as per merit. Please beware of unscrupulous elements and do not fall in their trap. Employees attempting to influence RRC directly or indirectly shall be disqualified and legal action may be initiated against them.

NOTIFICATION NO. 04/2023 Dated : 02.08.2023 - POST PARAMETERS

Cat. No.	Name of the post	GP (Pay Level)	Deptt.	Medical standard	Minimum Educational Qualification
1.	Asstt. Loco Pilot	G.Pay1900/- (Level-2)	Electric al/Mechanical	A-1	<p>A) Matriculation/SSLC plus ITI from recognized institutions of NCVT/SCVT in the trades of Armature and Coil Winder/ Electrician/Electronics Mechanic/Fitter/ Heat Engine/Instrument Mechanic/ Machinist/Mechanic Diesel/Mechanic Motor Vehicle/Millwright Maintenance Mechanic/Mechanic Radio & TV/ Refrigeration and Air-conditioning Mechanic/Tractor Mechanic/Turner/Wireman.</p> <p>(OR)</p> <p>B) Matriculation/SSLC plus Course Completed Act Apprenticeship in the trades mentioned above.</p> <p>(OR)</p> <p>C) 3 years Diploma in Mechanical/Electrical/Electronics/Automobile Engineering (OR) Combination of various streams of these Engineering disciplines from a recognized Institution in lieu of ITI.</p> <p>Note : Degree in the Engineering disciplines as above will also be acceptable in lieu of Diploma in Engineering.</p>
2.	Technician.-III (Track Machine)	G.Pay 1900/- (Level-2)	Engineering	A-3	<p>Matriculation/SSLC plus ITI from recognized institutions of NCVT/SCVT in the trade of Fitter/Electrician/Electronics Mechanic/Instrument Mechanic/Mechanic Mechatronics/Mechanic Diesel/Mechanic Motor Vehicle/Welder/Machinist.</p> <p>(OR)</p> <p>Matriculation/SSLC plus Course Completed Act Apprenticeship in the trades mentioned above.</p>
3.	Technician Grade-III (C&W)	G.Pay 1900/- (Level-2)	Mechanical	B-1	<p>Matriculation/ SSLC plus ITI from recognized institutions of NCVT/SCVT in the trades of Fitter/Carpenter/ Welder/Plumber/Pipe Fitter</p> <p>(OR)</p> <p>Matriculation/SSLC plus Course Completed Act Apprenticeship in the trades mentioned above.</p>
4.	Technician Grade- III (Signal)	G.Pay 1900/- (Level-2)	S & T	B-1	<p>A) Matriculation/SSLC plus ITI from recognized institutions of NCVT/SCVT in the trades of Electrician/ Electronics Mechanic/Wireman/Electrical Fitter.</p> <p>(OR)</p> <p>Matriculation/SSLC plus Course Completed Act Apprenticeship in the trades mentioned above.</p> <p>(OR)</p> <p>B) 10+2 with Physics and Maths.</p>
5.	Technician Grade-III (Telecommunication)	G.Pay 1900/- (Level-2)	S & T	B-1	<p>A) Matriculation/SSLC plus ITI from recognized institutions of NCVT/SCVT in the trades of Electrician/Electronics Mechanic/Wireman/Electrical Fitter.</p> <p>(OR)</p> <p>Matriculation/SSLC plus Course Completed Act Apprenticeship in the trades mentioned above.</p> <p>(OR)</p> <p>B) 10+2 with Physics and Maths.</p>
6.	Junior Engineer (P.Way)	G.Pay 4200/- (Level-6)	Engineering	A-3	<p>(a) Three years Diploma in Civil Engineering or B.Sc. in Civil Engineering of three years duration</p> <p>(OR)</p> <p>(b) A combination of any sub stream of basic streams of Civil Engineering from a recognized University/Institute.</p>

Cat. No.	Name of the post	GP (Pay Level)	Deptt.	Medical standard	Minimum Educational Qualification
7.	Junior Engineer (Works)	G.Pay 4200/- (Level-6)	Engineering	B-1	(a) Three years Diploma in Civil Engineering or B.Sc. in Civil Engineering of three years duration (OR) (b) a combination of any sub stream of basic streams of Civil Engineering from a recognized University/Institute.
8.	Junior Engineer (TMC)	G.Pay 4200/- (Level-6)	Engineering	A-3	Three years Diploma in (a) Mechanical/Production/Automobile/Electrical/Electronics/Instrumentation & Control Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Production/Automobile/ Electrical/Electronics/Instrumentation & Control Engineering from a recognized University/Institute.
9.	Junior Engineer (C&W)	G.Pay 4200/- (Level-6)	Mechanical	B-1	Three years Diploma in (a) Mechanical/Electrical/Electronics/Manufacturing/Mechatronic/Industrial/Machining/Instrumentation & Control/Tools & Machining/Tools & Die Making/Automobile/Production Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Electrical/Electronics/Manufacturing/Mechatronics/Industrial/Machining/Instrumentation & Control/Tools & Machining/Tools & Die Making/Automobile/Production Engineering from a recognized University/Institute.
10.	Junior Engineer (Diesel Mechanical)	G.Pay 4200/- (Level-6)	Mechanical	B-1	Three years Diploma in (a) Mechanical/Electrical/Electronics/Manufacturing/Mechatronic/Industrial/Machining/Instrumentation & Control/Tools & Machining/Tools & Die Making/Automobile/Production Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Electrical/Electronics/Manufacturing/Mechatronics/Industrial/Machining/Instrumentation & Control/Tools & Machining/Tools & Die Making/Automobile/Production Engineering from a recognized University/Institute.
11.	Junior Engineer (Diesel Electrical)	G.Pay 4200/- (Level-6)	Mechanical	B-1	Three years Diploma in (a) Mechanical/Electrical/Electronics Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Electrical/Electronics Engineering from a recognized University/Institute.
12.	Junior Engineer/ Electrical/TRD	G.Pay 4200/- (Level-6)	Electrical	A-3	Three years Diploma in (a) Mechanical/Electrical/Electronics Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Electrical/Electronics Engineering from a recognized University/Institute.
13.	Junior Engineer/ Electrical/ General Services	G.Pay 4200/- (Level-6)	Electrical	B-1	Three years Diploma in (a) Mechanical/Electrical/Electronics Engineering (OR) (b) a combination of any sub stream of basic streams of Mechanical/Electrical/Electronics Engineering from a recognized University/Institute.
14.	Train Manager	G.Pay 2800/- (Level-5)	Operating	A-2	Degree from a recognized University or its equivalent.

Proforma for Medical Certificate to be obtained by employees applying for the Posts of Assistant Loco Pilot from an Eye Specialist

I have examined Shri/Smt/Kum
.....who has applied for the post of Assistant Loco Pilot in Indian Railways. His/her vision has been tested with reference to the required standard and the results are as below:

Paste here your recent colour passport size photograph of size 3.5 cm x 4.5cm (The colour photograph should be the same as used in the registration) The photograph should be attested by the eye specialist

Signature of employee

Distant Vision		Near Vision		Colour Vision Ishihara		Binocular Vision, Field of Vision & Night vision	
Required Standard	Actual Observation/Value	Required Standard	Actual Observation/Value	Required Standard	Actual Observation/Value	Required Standard	Actual Observation/Value
6/6, 6/6 without glasses with fogging test (must not accept + 2D)		Sn. 0.6, 0.6 without glasses		Normal		Normal	

Shri/Smt/Kum.....fully conforms/does not conform (**Strike out either 'fully conforms' or 'does not conform' as the case may be**) to the above vision standards.

It is also certified that he/she did not undergo any surgery to correct refractive error.

Name of the Eye Specialist.....

Registration No.of the Eye Specialist.....

Place :

Date: (Signature & Seal of the Eye Specialist)

Part B Syllabus of JE Exam Group**Syllabus for Civil & Allied Engineering Exam Group – JE**

Sl. No.	Subject
1.	Engineering Mechanics- Force (resolution of force, moment of force, force system, composition of forces), Equilibrium, Friction, Centroid and Center of gravity, Simple machines.
2.	Building Construction- Building components (substructure, superstructure), type of structure (load bearing, framed and composite structures).
3.	Building materials- Masonry materials (stones, bricks, and mortars), Timber and miscellaneous materials (glass, plastic, fiber, aluminum steel, galvanized iron, bitumen, PVC, CPVC, and PPF).
4.	Construction of substructure- job layout, earthwork, foundation (types, dewatering, coffer dams, bearing capacity).
5.	Construction of superstructure- stone masonry, brick masonry, Hollow concrete block masonry, composite masonry, cavity wall, doors and windows, vertical communication (stairs, lifts, escalators), scaffolding and shoring.
6.	Building finishes- Floors (finishes, process of laying), walls (plastering, pointing, painting) and roofs (roofing materials including RCC).
7.	Building maintenance- Cracks (causes, type, repairs- grouting, guniting, epoxy etc.), settlement (causes and remedial measures), and re-baring techniques.
8.	Building drawing- Conventions (type of lines, symbols), planning of building (principles of planning for residential and public buildings, rules and byelaws), drawings (plan, elevation, section, site plan, location plan, foundation plan, working drawing), perspective drawing.
9.	Concrete Technology- Properties of various types/grades of cement, properties of coarse and fine aggregates, properties of concrete (water cement ratio, properties of fresh and hardened concrete), Concrete mix design, testing of concrete, quality control of concrete (batching, formwork, transportation, placing, compaction, curing, waterproofing), extreme weather concreting and chemical admixtures, properties of special concrete (ready mix, RCC, prestressed, fiber reinforced, precast, high performance).
10.	Surveying- Types of survey, chain and cross staff survey (principle, ranging, triangulation, chaining, errors, finding area), compass survey (principle, bearing of line, prismatic compass, traversing, local attraction, calculation of bearings, angles and local attraction) leveling (dumpy level, recording in level book, temporary adjustment, methods of reduction of levels, classification of leveling, tilting level, auto level, sources of errors, precautions and difficulties in leveling), contouring (contour interval, characteristics, method of locating, interpolation, establishing grade contours, uses of contour maps), area and volume measurements, plane table survey (principles, setting, method), theodolite survey (components, adjustments, measurements, traversing), Tacheometric survey, curves (types, setting out), advanced survey equipment, aerial survey and remote sensing.
11.	Computer Aided Design- CAD Software (AutoCAD, Auto Civil, 3D Max etc.), CAD commands, generation of plan, elevation, section, site plan, area statement, 3D view.
12.	Geo Technical Engineering- Application of Geo Technical Engineering in design of foundation, pavement, earth retaining structures, earthen dams etc., physical properties of soil, permeability of soil and seepage analysis, shear strength of soil, bearing capacity of soil, compaction and stabilization of soil, site investigation and sub soil exploration.
13.	Hydraulics- properties of fluid, hydrostatic pressure, measurement of liquid pressure in pipes, fundamentals of fluid flow, flow of liquid through pipes, flow through open channel, flow measuring devices, hydraulic machines.
14.	Irrigation Engineering- Hydrology, investigation and reservoir planning, percolation tanks, diversion head works.
15.	Mechanics of Structures- Stress and strain, shear force and bending moment, moment of inertia, stresses in beams, analysis of trusses, strain energy.

16.	Theory of structures- Direct and bending stresses, slope and deflection, fixed beam, continuous beam, moment distribution method, columns.
17.	Design of Concrete Structures- Working Stress method, Limit State method, analysis and design of singly reinforced and doubly reinforced sections, shear, bond and development length, analysis and design of T Beam, slab, axially loaded column and footings.
18.	Design of Steel Structures- Types of sections, grades of steel, strength characteristics, IS Code, Connections, Design of tension and compression members, steel roof truss, beams, column bases.
19.	Transportation Engineering- Railway Engineering (alignment and gauges, permanent way, railway track geometrics, branching of tracks, stations and yards, track maintenance), Bridge engineering (site selection, investigation, component parts of bridge, permanent and temporary bridges, inspection and maintenance), Tunnel engineering (classification, shape and sizes, tunnel investigation and surveying, method of tunneling in various strata, precautions, equipment, explosives, lining and ventilation).
20.	Highway Engineering- Road Engineering, investigation for road project, geometric design of highways, construction of road pavements and materials, traffic engineering, hill roads, drainage of roads, maintenance and repair of roads.
21.	21 Environmental Engineering- Environmental pollution and control, public water supply, domestic sewage, solid wastemanagement, environmental sanitation, and plumbing.
22.	Advanced Construction Techniques and Equipment- Fibers and plastics, artificial timber, advanced concreting methods (under water concreting, ready mix concrete, tremix concreting, special concretes), formwork, pre-fabricated construction, soil reinforcing techniques, hoisting and conveying equipment, earth moving machinery (exaction and compaction equipment), concrete mixers, stone crushers, pile driving equipment, working of hot mix bitumen plant, bitumen paver, floor polishing machines.
23.	Estimating and Costing- Types of estimates (approximate, detailed), mode of measurements and rate analysis.
24.	Contracts and Accounts- Types of engineering contracts, Tender and tender documents, payment, specifications.

Syllabus for Electrical & Allied Engineering Exam Group – JE

Sl.No.	Subject
1.	Basic concepts: Concepts of resistance, inductance, capacitance, and various factors affecting them. Concepts of current, voltage, power, energy and their units.
2.	Circuit law: Kirchoff's law, Simple Circuit solution using network theorems.
3.	Magnetic Circuit: Concepts of flux, mmf, reluctance, Different kinds of magnetic materials, Magnetic calculations for conductors of different configuration e.g. straight, circular, solenoidal, etc. Electromagnetic induction, self and mutual induction.
4.	AC Fundamentals: Instantaneous, peak, R.M.S. and average values of alternating waves, Representation of sinusoidal wave form, simple series and parallel AC Circuits consisting of R.L. and C, Resonance, Tank Circuit. Poly Phase system – star and delta connection, 3 phase power, DC and sinusoidal response of R-L and R-C circuit.
5.	Measurement and measuring instruments: Measurement of power (1 phase and 3 phase, both active and re-active) and energy, 2 wattmeter method of 3 phase power measurement. Measurement of frequency and phase angle. Ammeter and voltmeter (both moving coil and moving iron type), extension of range wattmeter, Multimeters, Megger, Energy meter AC Bridges. Use of CRO, Signal Generator, CT, PT and their uses. Earth Fault detection.
6.	Electrical Machines: (a) D.C. Machine – Construction, Basic Principles of D.C. motors and generators, their characteristics, speed control and starting of D.C. Motors. Method of braking motor, Losses and efficiency of D.C. Machines. (b) 1 phase and 3 phase transformers – Construction, Principles of operation, equivalent circuit, voltage regulation, O.C. and S.C. Tests, Losses and efficiency. Effect of voltage, frequency and wave form on losses. Parallel operation of 1 phase / 3 phase transformers. Auto transformers. (c) 3 phase induction motors, rotating magnetic field, principle of operation, equivalent circuit, torque-speed characteristics, starting and speed control of 3 phase induction motors. Methods of braking, effect of voltage and frequency variation on torque speed characteristics, Fractional Kilowatt Motors and Single Phase Induction Motors: Characteristics and applications.
7.	Synchronous Machines: Generation of 3-phase e.m.f. armature reaction, voltage regulation, parallel operation of two alternators, synchronizing, control of active and reactive power. Starting and applications of synchronous motors.
8.	Generation, Transmission and Distribution: Different types of power stations, Load factor, diversity factor, demand factor, cost of generation, inter-connection of power stations. Power factor improvement, various types of tariffs, types of faults, short circuit current for symmetrical faults. Switchgears and Protection: Rating of circuit breakers, Principles of arc extinction by oil and air, H.R.C. Fuses, Protection against earth leakage / over current, etc. Buchholz relay, Merz Price system of protection of generators & transformers, protection of feeders and bus bars. Lightning arresters, various transmission and distribution system, comparison of conductor materials, efficiency of different system. Cable – Different type of cables, cable rating and derating factor.
9.	Estimation and costing: Estimation of lighting scheme, electric installation of machines and relevant IE rules. Earthing practices and IE Rules.
10.	Utilization of Electrical Energy: Illumination, Electric heating, Electric welding, Electroplating, Electric drives and motors.
11.	Basic Electronics: Working of various electronic devices e.g. P N Junction diodes, Transistors (NPN and PNP type), BJT and JFET. Simple circuits using these devices.

Syllabus for Electronics & Allied Engineering Exam Group – JE

Sl.No.	Subject
1.	Electronic Components & Materials Conductors, Semi conductor& Insulators; Magnetic materials; Jointing & Cleaning materials for U/G copper cable & OFC; Cells and Batteries (chargeable and non chargeable); Relays, Switches, MCB & Connectors.
2.	Electronic Devices and circuits PN Junction diodes, thyristor; Diode and triode circuits; Junction Transistors; Amplifiers; Oscillator; M u l t i v i b r a t o r ,counters; Rectifiers; Inverter and UPS.
3.	Digital Electronics Number System & Binary codes; Boolean Algebra & Logic gates; Combinational & Sequential logic circuits; A/D & D/A converter, counters; Memories
4.	Linear Integrated Circuit Introduction to operational Amplifier; Linear applications; Non Linear applications; Voltage regulators; Timers; Phase lock loop.
5.	Microprocessor and Microcontroller Introduction to microprocessor, 8085 microprocessor working; Assembly Language programming; Peripherals & other micro processors; Microcontrollers
6.	Electronic Measurements Measuring systems; Basic principles of measurement; Range Extension methods; Cathode ray oscilloscope, LCD, LEDpanel; Transducers
7.	Communication Engineering Introduction to communication; Modulation techniques; Multiplexing Techniques; Wave Propagation, Transmission line characteristics, OFC; Fundamentals of Public Address systems, Electronic exchange, Radar, Cellular and Satellite Communication.
8.	Data communication and Network Introduction to data communication; Hardware and interface; Introduction to Networks and Networking devices; Local Area Network and Wide area network; Internet working.
9.	Computer Programming Programming concepts; Fundamentals of 'C' and C ++; Operators in 'C' and C ++; Control Statements; Functions, ArrayString & Pointers, File Structure; Data Structure and DBMS
10.	Basic Electrical Engg. DC Circuits; AC fundamentals; Magnetic, Thermal and Chemical effects of Electric current; Earthing - Installation, Maintenance, Testing,

Syllabus for Mechanical & Allied Engineering Exam Group – JE

Sl.No.	Subject
1.	<p>Engineering Mechanics :</p> <p>Resolution of forces, Equilibrium and Equilibrant, parallelogram law of forces, triangle law of forces, polygon law of forces and Lami's theorem, couple and moment of a couple, condition for equilibrium of rigid body subjected to number of coplanar non-concurrent forces, definition of static friction, dynamic friction, derivation of limiting angle of friction and angle of repose, resolution of forces considering friction when a body moves on horizontal plane and inclined plane, calculation of moment of inertia and radius of gyration of : (a) I-Section (b) channel section (c) T-Section (d) LSection (Equal & unequal lengths) (e) Z-Section (f) Built up sections (simple cases only), Newton's laws of motion (without derivation), motion of projectile, D'Alembert's principle, definition law of conservation of energy, law of conservation of momentum.</p>
2.	<p>Material Science :</p> <p>Mechanical properties of engineering materials – tensile strength, compressive strength, ductility, malleability, hardness, toughness, brittleness, impact strength, fatigue, creep resistance. Classification of steels, mild steel and alloy steels. Importance of heat treatment. Heat treatment processes – annealing, normalizing, hardening, tempering, carburizing, nitriding and cyaniding.</p>
3.	<p>Strength of Materials :</p> <p>Stress, strain, stress strain diagram, factor of safety, thermal stresses, strain energy, proof resilience and modules of resilience. Shear force and bending moment diagram – cant lever beam, simply supported beam, continuous beam, fixed beam. Torsion in shafts and springs, thin cylinder shells.</p>
4.	<p>Machining :</p> <p>Working principle of lathe. Types of lathes – Engine lathe – construction details and specifications. Nomenclature of single point cutting tool, geometry, tool signature, functions of tool angles. General and special operations – (Turning, facing, taper turning thread cutting, knurling, forming, drilling, boring, reaming, key way cutting), cutting fluids, coolants and lubricants. Introduction to shaper, slotter, plainer, broaching, milling and manufacture of gears, heat treatment process applied to gears.</p>
5.	<p>Welding :</p> <p>Welding – Introduction, classification of welding processes, advantages and limitations of welding, principles of arc welding, arc welding equipment, choice of electrodes for different metals, principle of gas (oxy-acetylene) welding, equipment of gas welding, welding procedures (arc & gas), soldering and brazing techniques, types and applications of solders and fluxes, various flame cutting processes, advantages and limitations of flame cutting, defects in welding, testing and inspection modern welding methods, (submerged, CO₂, atomic – hydrogen, ultrasonic welding), brief description of MIG & TIG welding.</p>
6.	<p>Grinding & Finishing Process :</p> <p>Principles of metal removal by grinding, abrasives, natural and artificial, bonds and binding processes, vitrified, silicate, shellac rubber, grinding machines, classification: cylindrical, surface, tool & cutter grinding machine, construction details, relative merits, principles of centreless grinding, advantages & limitations of centreless grinding work, holding devices, wheel maintenance, balancing of wheels, coolants used, finishing by grinding, honing, lapping, super finishing, electroplating, basic principles – plating metals, applications, hot dipping, galvanizing tin coating, parkerising, anodizing, metal spraying, wire process, powder process and applications, organic coatings, oil base paint, lacquer base enamels, bituminous paints, rubber base coating.</p>

7.	<p>Metrology: Linear measurement – Slip gauges and dial indicators, angle measurements, bevel protractor, sine bar, angle slip gauges, comparators (a) mechanical (b) electrical (c) optical (d) pneumatic. Measurement of surface roughness; methods of measurements by comparison, tracer instruments and by interferometry, collimators, measuring microscope, interferometer, inspection of machine parts using the concepts of shadow projection and profile projection.</p>
8.	<p>Fluid Mechanics & Hydraulic Machinery : Properties of fluid, density, specific weight, specific gravity, viscosity, surface tension, compressibility capillarity, Pascal's law, measurement of pressures, concept of buoyancy. Concept of Reynold's number, pressure, potential and kinetic energy of liquids, total energy, laws of conservation, mass, energy and momentum, velocity of liquids and discharge, Bernoulli's equation and assumptions, venture meters, pitot- tube, current meters. Working principle & constructional details of centrifugal pump, efficiencies – manometric efficiency, volumetric efficiency, mechanical efficiency and overall efficiency, cavitation and its effect, working principle of jet & submersible pumps with line diagrams.</p>
9.	<p>Industrial Management : Job analysis, motivation, different theories, satisfaction, performance reward systems, production, planning and control, relation with other departments, routing, scheduling, dispatching, PERT and CPM, simple problems. Materials in industry, inventory control model, ABC Analysis, Safety stock, re-order, level, economic ordering quantity, break even analysis, stores layout, stores equipment, stores records, purchasing procedures, purchase records, Bin card, Cardex, Material handling, Manual lifting, hoist, cranes, conveyors, trucks, fork trucks.</p>
10.	<p>Thermal Engineering : Laws of thermo dynamics, conversion of heat into work vice versa , laws of perfect gases, thermo dynamic processes – isochoric, isobaric, isothermal hyperbolic, isentropic, polytropic and throttling, modes of heat transfer, thermal conductivity, convective heat transfer coefficient, Stefan Boltzman law by radiation and overall heat transfer coefficient. Air standards cycles – Carnot cycle, Otto cycle, Diesel cycle, construction and working of internal combustion engines, comparison of diesel engine and petrol engine. Systems of internal combustion engine, performance of internal combustion engines. Air compressors their cycles refrigeration cycles, principle of a refrigeration plant.</p>

Employee Service Certificate for GDCE
Notification No. 04/2023

Regular Serving Railway Employee Certificate for applying against the GDCE Notification
No. 04/2023, on North Western Railway excluding RPF/RPSF employees

I Son/Daughter/wife of shri
date of birth (DD/MM/YYYY)/...../.....community.....
designation Pay Level (without MACP)
.....working under.....

I hereby declare that all the statements made by me in the online application are true, complete and correct to the best of my knowledge. In the event of any information being found false or incorrect or being not eligible in terms of eligibility criteria, my candidature is liable to be cancelled/terminated without any notice at any stage and I shall be liable to be taken up under D&AR also.

Left Thumb impression

Certified Photo



Signature of employee

Name:-

Desig:-

Employee ID

(as per salary slip)

Date

Posting Place :-

Division/unit:-

It is certified that the above employee is a regular employee and working under me on North Western Railway. All the details filled above are correct and have been verified by undersigned.

Date

Office seal

Signature of immediate officer/Supervisor

Name of officer/ Supervisor.....

Designation & seal

Mobile No.

Date

FORMAT OF CASTE CERTIFICATE FOR SC/ST EMPLOYEES

(Form of certificate to be produced by Employee applying for appointment to Post under the Govt. of India SC/ST)

1. This is to certify that Shri/Smt./Kum* _____ Son/Daughter* of _____ Of
village/town* _____ District/Division* _____ Of State/Union
Territory* _____ belongs to the _____ Caste/Tribe* which is
recognized as a Scheduled Caste/Scheduled Tribe* under:

1. The Constitution (Scheduled Caste) order, 1950
2. The Constitution (Scheduled Tribes) order, 1950
3. The Constitution (Scheduled Caste) (Union Territories) order, 1951
4. The Constitution (Scheduled Tribes) (Union Territories) order, 1951(as amended by the Scheduled Caste and Scheduled Tribes Lists Modification), Order, 1956 the Bombay Reorganisation Act 1960, the Punjab Reorganisation Act, 1966, the State of Himachal Pradesh Act, 1970, the North Eastern Areas Re-organisation Act, 1971, and the Scheduled Tribes Order (Amendment) Act, 1976.
5. The Constitution (Jammu and Kashmir) Scheduled Caste Order, 1956.
6. The constitution (Jammu and Kashmir) Scheduled Tribe Order 1956
7. The Constitution (Andaman and Nicobar Islands) Scheduled Tribes Order, 1959 as amendment by the scheduled tribes caste and scheduled amendment act 1976.
8. The Constitution (Dadra and Nagar Haveli) Scheduled Castes Order, 1962
9. The Constitution (Dadra and Nagar Haveli) Scheduled Tribes Order, 1962
10. The Constitution (Pondicherry) Scheduled Castes Order, 1964
11. The Constitution Scheoduled Tribes (Utttar Pradesh) order, 1967
12. The Constitution (Goa, Daman and Diu) Scheduled Castes Order, 1968
13. The Constitution (Goa, Daman and Diu) Scheduled Tribes Order, 1968
14. The Constitution (Nagaland) Scheduled Tribes Order, 1970
15. The Constitution (Sikkim) Scheduled Caste Order, 1978
16. The Constitution (Sikkim) Scheduled Tribes Order, 1978
17. The Constitution (Jammu and Kashmir) Scheduled Tribes Order, 1989
18. The Constitution (Scheduled Castes) Order(Amendment) Act, 1990
19. The Constitution (Scheduled Tribes) Order(Amendment) Ordinance, 1991
20. The Constitution (Scheduled Castes) Order(Second Amendment) Act, 1991
21. The Constitution (Scheduled Tribes) Order(Amendment) Ordinance, 1996

2. Shri/Smt/Kum.*----- and of his/her* family ordinarily reside(s) in
village/town* -----of-----District/Division of State/Union Territory of-
-----Place----- Signature-----
date----- Designation(with seal of office) -----

(*) Please delete the words which are not applicable (*)

Please quote specific presidential order (*). Delete the Paragraph which is not applicable.

Note: The term * **Ordinarily resides*** used will have the same meaning as in Section 20 of the Representation of the Peoples Act, 1950.

List of Authorities empowered to issue certificate

1. District Magistrate/Additional District Magistrate/Collector/Deputy Commissioner/Additional Deputy Commissioner/Deputy Collector/Ist Class Stipendiary Magistrate/City Magistrate/Sub Divisional Magistrate/Taluka Magistrate/Executive Magistrate/Extra Assistant Commissioner (Not below the rank of Ist Class Stipendiary Magistrate)
2. Chief Presidency Magistrate/Additional Chief Presidency Magistrate/Presidency Magistrate
3. Revenue Officers not below the rank of Tehsildar.
4. Sub Divisional Officer of the area where the employee and/or his family ordinarily resides.
5. Administrator/Secretary to Administrator/Development Officer (Lakshadweep islands).

OBC CERTIFICATE

Form of Certificate to be produced by Other Backward Classes applying for appointment to posts under the Government of India.

This is to certify that Shri/Smt./ Kumari son/daughter of of village/town..... District/Divisionin the State/ Union Territory..... belongs to thecommunity which is recognized as a backward class under the Government of India, Ministry of Social Justice and Empowerment's Resolution No..... dated *Shri/Smt/Kumari and/or his/her family ordinarily reside(s) in the District/Division of the State/ Union Territory. This is also to certify that he/she does not belong to the persons/sections (**Creamy Layer**) mentioned in column 3 of the Schedule to the Government of India, Department of Personnel & Training OM NO.36012/22/93 -Estt (SCT), dated 8.9.1993**

Dated:

**District Magistrate/
Dy. Commissioner etc.
(with Seal of Office)**

Seal

* The authority issuing the certificate may have to mention the details of Resolution of Government of India, in which the caste of the employee is mentioned as OBC.

** -As amended from time to time.

Note : The term 'ordinarily' used here will have the same meaning as in section 20 of the Representation of Peoples Act., 1950.

List of Authorities empowered to issue certificate

1. District Magistrate/Additional District Magistrate/Collector/Deputy Commissioner/Additional Deputy Commissioner/Deputy Collector/Ist Class Stipendiary Magistrate/City Magistrate/Sub Divisional Magistrate/Taluka Magistrate/Executive Magistrate/Extra Assistant Commissioner (Not below the rank of Ist Class Stipendiary Magistrate)
2. Chief Presidency Magistrate/Additional Chief Presidency Magistrate/Presidency Magistrate
3. Revenue Officers not below the rank of Tehsildar.
4. Sub Divisional Officer of the area where the employee and/or his family ordinarily resides.
5. Administrator/Secretary to Administrator/Development Officer (Lakshadweep islands).

DECLARATION

Proforma for declaration to be submitted by Other Backward Class Employees at the time of document verification, who had applied for the posts against GDCE Notification No. : 04/2023

“I, son/daughter of Shri
..... resident of Village/Town/City
..... district State
..... hereby declare that I belong to the (indicate
your sub caste) community which is recognized as a backward class by the Government of India
for the purpose of reservation in services as per orders contained in Department of Personnel and
Training Office Memorandum No. 36012/22/93-Estt.(SCT) dated 08.09.1993. It is also declared
that I do not belong to persons/sections (Creamy Layer) mentioned in column 3 of the Schedule
to the above referred Office Memorandum dated 08.03.1993 and its subsequent revision through
O.M.No.36033/1/2013-Estt. (Res) dated 27.05.2013and 13.09.2017.

Place:

Signature of the Employee

Date:

Name of the employee