



EXERGIC

India's leading institute for
online GATE prep

**GATE 2021
Test Series**

Tests Overview

Topicwise Tests

30 Tests | 15 questions per test | 45 minutes

Subject Tests

25 Tests | 25 questions per test | 75 minutes

Full Length Tests

15 Tests | 65 questions per test | 180 minutes

**“Either you bear
the pain of
discipline or you
bear the pain of
consequences”**





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GATE 2021 Test Series

Tests Topics

Topicwise Tests

Strength of Materials

SOM 1

Stress and Strain, Elastic Constants, Poisson's Ratio, Mohr's Circle, SFD BMD, Bending and shear stresses, Thermal stress, Strain measurement

SOM 2

Thin cylinders, deflection of beams, torsion, Columns, Energy methods, Testing of material with UTM, Testing of hardness and impact strength

Thermodynamics

ET 1

1st law for Closed & Open system, 2nd law, Entropy and Availability, Thermodynamic relations

ET 2

2nd law, Entropy and Availability, Properties of Pure Substances

Fluid mechanics

FM 1

Fluid properties, Fluid statics, manometry, Buoyancy and Floatation, forces on Submerged bodies, momentum and energy, fluid acceleration, differential equation of continuity and momentum, Bernoulli's equation

FM 2

Flow through pipes, Boundary Layer, Dimensional Analysis, Impact of jets, Hydraulic Machines



Theory of machines

TOM 1

Displacement, velocity and acceleration analysis of plane mechanism, gear and gear train, balancing of reciprocating and rotating masses

TOM 2

Cam, Dynamic analysis of linkage, Governor, flywheel, gyroscope and vibration

Heat Transfer

HT 1

Steady Conduction, Internal heat generation, Unsteady conduction

HT 2

Convection, Radiation, Heat Exchangers

Applied Thermo

ETA 1

Rankine cycle, Otto, Diesel and dual cycle, Brayton cycle and Gas turbine, Carnot engine. Combined refrigeration cycle

ETA 2

Pyschrometry , VCRS, steam turbine, Air-conditioning, refrigerator, Bell-coleman cycle, compressor, SI engines

Machine Design

MD 1

Design for Static & Fluctuating loads, Sliding contact and Rolling contact bearings

MD 2

Welded, riveted and threaded joints, Friction clutches, Brakes

Engg Mechanics

EM 1

Vector basics, FBD and Equilibrium of forces, Centroid, COG, COM and MOI, Truss Analysis

EM 2

Friction, Kinematics, Dynamics

Industrial Engg

IEOR 1

Linear Programming, Transportation and Assignment, CPM, PERT

IEOR 2

Queuing Theory, Sequencing, Line Balancing, Inventory Control, Forecasting, MRP



Manufacturing & Production

MP 1

Metal Casting, Metal Forming

MP 2

Metal Cutting

MP 3Metal Joining, Non Traditional Machining,
Computer Integrated Manufacturing

NEW SYLLABUS ADDITION

NS 1

New Syllabus Addition questions WITH MSQS

NS 2

New Syllabus Addition questions WITH MSQS

NS 3

New Syllabus Addition questions WITH MSQS

General Aptitude

GA 1

Verbal Ability

GA 2

Quantitative Aptitude

GA 3

Reasoning

Engg Mathematics

MA 1Linear algebra, differential calculus integral calculus and
vector calculus**MA 2**Functions and differentiability, complex functions, and
probability and statistics**MA 3**

Laplace transformation, fourier series, numerical methods



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Full Subject Tests

Strength of Materials	Engg Thermodynamics	Fluid Mechanics	Theory of Machines
SOM F1	ET F1	FM F1	TOM F1
SOM F2	ET F2	FM F2	TOM F2
Heat Transfer	Applied Thermodynamics	Machine Design	Engg Mechanics
HT F1	ETA F1	MD F1	EM F1
HT F2	ETA F2	MD F2	EM F2
Manufacturing & Production	Industrial Engg & Op. Reseach	Engg Mathematics	General Aptitude
MP F1	IEOR F1	MA F1	GA F1
MP F2	IEOR F2	MA F2	GA F2
		MA F3	

Full Length Tests

FLT -1 to FLT -15



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GATE 2021 Test Series Tests Timeline

*All **Topic** and **Subject** tests are
uploaded already.*

*Full Length Tests uploading schedule
is given below.*

Oct 2020	FLT - 1	Dec 2020	FLT - 7	
	FLT - 2		FLT - 8	
			FLT - 9	
			FLT - 10	
			FLT - 11	
			FLT - 12	
			FLT - 13	
Nov 2020	FLT - 3		Jan 2020	FLT - 14
	FLT - 4			FLT - 15
	FLT - 5			
	FLT - 6			