

#### National Institute of Electronics & Information Technology Gorakhpur



(Under Ministry of Electronics and Information Technology, Govt. of India) MMMUT Campus, Deoria Road, Gorakhpur-273010 http://www.nielit.gov.in/gorakhpur/

# Full stack development using MERN



#### Full stack development using MERN

08 Weeks (2 Hrs. per day)

Online Course

Timing: - 03:00 PM to 05:00 PM

Medium of Instruction: Bilingual (English & Hindi)

**Objective** 

In this course, students will learn about the most advanced web-app development environments with immense exposure on practicality. The course is designed for an aspiring developer to enrich the knowledge of different JavaScript libraries and frameworks. Today and ever since the JavaScript has been developed as a language, it has deeply impacted the web app development process. In this curriculum, we have covered Express JS, React JS and Node.js which are all very advanced JavaScript libraries used extensively across the world to handle both the Front-end and Back-end development processes. MongoDB is also covered which is a revolutionary NoSQL kind of database package.

10+2/ Graduate (Passed/Appearing) with basic knowledge of Computer Programming or NIELIT O/A Level Courses

**Eligibility** 

**Prerequisite** 

- ✓ Candidate must have latest computer/laptop with preferably 4 GB RAM or higher and Graphics Card (2 GB)
- ✓ Software: Windows OS (7 or above), Google Chrome (can be downloaded from respective websites)
- ✓ Internet connection with good speed (preferably 2Mbps or higher)

Rs. 3400/- incl. GST & all other charges.

**Course Fees** 

Certificate

Certificate will be provided to the participants, based on minimum 75% attendance and on performance (minimum 50% marks) in the online test, conducted at the end of the course.

- ✓ Instructor-led live classes
- ✓ Instructor-led hands-on lab sessions.
- ✓ Content Access through e-learning portal
- ✓ Assessment and Certification

Methodology

How to Apply?

**Step-1:** Read the course structure & course requirements carefully.

**Step-2:** Visit the Registration portal and click on apply button.

**Step-3:** Create your login credentials and fill up all the details, see the preview and submit the form.

**Step-4:** Login with your credentials to verify the mobile number, email ID and then upload the documents, Lock the profile and Pay the Fees online, using ATM-Debit Card / Credit Card / Internet Banking / UPI etc.



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#### **Course Content**

Day	Topic	Day	Topic	Day	Topic
Day #01	Fundamentals of Web Design, Webpage and Website, Web application, Client- server architecture	Day #02	HTML	Day #03	CSS
Day #04	JavaScript	Day #05	ES5 Grammar and types, Control flow and error handling	Day #06	Loops, Function
Day #07	Objects, Arrays, Promises	Day #08	ES6 Let and const, Template literals	Day #09	Arrow Function
Day #10	Default parameter, Async Await	Day #11	Node.js overview, Node.js - basics and setup	Day #12	Node.js console, Node.js command utilities
Day #13	Node.js modules	Day #14	Node.js concepts	Day #15	Node.js events
Day #16	Node.js database access	Day #17	Node.js with Express.js, Express.js Request	Day #18	Express.js Response, Express.js Get, Express.js Post
Day #19	Express.js Routing, Express.js Cookies	Day #20	Express.js File Upload	Day #21	Express.js Middleware
Day #22	Express.js Scaffolding	Day #23	Express.js Template	Day #24	ReactJS introduction and overview
Day #25	ReactJS installation and environment setup	Day #26	Introducing JSX, Rendering Elements	Day #27	Components and Props
Day #28	State and Lifecycle	Day #29	Handling Events	Day #30	Conditional Rendering
Day #31	Lists and Keys	Day #32	Forms	Day #33	Lifting State Up
Day #34	Composition vs Inheritance	Day #35	Thinking In React	Day #36	MySQL, Create, Read, Update, Delete Operation
Day #37	SQL and NoSql concepts, Create and manage MongoDB	Day #38	Migration of data into MongoDB	Day #39	MongoDB with NodeJS, Services offered by MongoDB
Day #40	Project Discussion and Interview questions				

## **Course Coordinator**

Sh. A.K. Shukla (S.T.O) NIELIT Gorakhpur

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**CLICK HERE TO REGISTER**