alt

Curriculum

Methodology

- Our learning curriculum is divided into sprints. Each sprint is a week long.
- Agenda for the week is set on the first day of the week and the week ends with a demo.
- Everyday you learn concepts in our mentor sessions or using curated quality resources.
- Everyday you write code, build something. It usually builds up into a meaningful project.
- You teach and discuss the concepts in group for concept clarity.
- There are review hours every week, where the concepts of the week are recapped.
- We screen a live coding sessions or an interaction with industry expert every week.
- Students are required to build a good online presence. You write a blogpost every week, sharing your learning/experience.

Week 1 - 4

HTML, CSS, CLI Git, Developer Tools

Projects

- Build your personal website
- Responsive admin dashboard
- Full website of event/org/ product

- Basic Unix Commands, Tools setup
- UI, Tags, Elements, Attributes, Box model,
- Positioning, Typography, Layout, Lists,
- Media, Forms, Tables, Organization,
- Complex Selectors, Responsive, Grid, Flex
- Preprocessor (SCSS), Transforms, Transitions
- Animations, Advanced CSS Techniques
- Why Git, How Git Works, Basic Git Commands
- Branching, Developer tool features

AltCampus curriculum and methodology aims to help you learn 'how to learn'. Making you a developer who can adapt to the industry needs.

JavaScript, jQuery, Web Architecture

Projects

- 25+ small JS projects
- Chrome extension for personalizing newtabs
- Mashup Github API and charts
- Browser based game (Paint/StarWars/ Chess/Simple Mario)
- Write an open-source JS library

- How web works, Client Server model
- Variables, Types, Operators, Conditional
- Objects, Arrays, Variables, Functions, Scope
- Closure, Hoisting, Regex, This, Constructor
- Higher Order Functions, Arrow Functions
- Object Prototypes, Prototypal Inheritance
- Async, Callbacks, Promise, Ajax, Modules
- ES6, Block-Scoped Declarations, Spread
- jQuery, DOM, Event Handling, Canvas, NPM

Preparing you for the future

Apart from software development, We do 101s and workshops on

- Personal finance, Marketing, Sales
- Critical thinking, Product Management, Public speaking and other topics.

Week 8 - 12

React, Redux, Algorithms

Projects

- Tic-Tac-Toe, Pomodoro clock
- React Quiz app using firebase
- Use APIs to fetch data and vizualize with D3.js
- Practice algorithms

- JSX, Components, Props, State, Refs
- State Management, Lifecycle Methods, Events
- Conditional Rendering, Lists, Routing, Forms
- Thinking in React, Containers, Why Redux
- Actions, Reducers, Store
- Async Flow, Async Actions, Middlewares
- Linked List, Queue, Stack, Hash table

Week 12 - 16

NodeJS, REST, SQL, NoSQL, Auth, GraphQL, Redis, More Algorithms

Projects

- Simple CRUD app (Blog)
- Complex CRUD app (BookRecommendation)
- A Real Time chat application

- NodeJS, Event model, File system
- Routing, MVC, Templating, Middleware
- Error Handling, REST API, GraphQL
- Schema, Tables, Collection, CRUD, Indexing
- Joins, Relationships, Transactions,
- Aggregation framework, Authentication
- Oauth, Caching, Real-time using sockets
- Deployment
- Sorting, Heap, Tree, Graph, Time Complexity

Week 16 - 20

Design Patterns, Capstone Project

Projects

- Build your capstone project
- Practice Design patterns
- Prepare for Interviews

- Constructor, Module, Singleton Pattern
- Observer, Mediator, Prototype, Command
- Facade, Factory, Mixin, Decorator Pattern
- Work in teams on real-world applications

Week 20 - 24

Finding Job



- Build resume, portfolio, How to Look for jobs
- Preparing for interview, mock interviews
- Negotiating an offer