

Codingal

Codingal curriculum is tailored for K-12 children and complements their learnings at school by allowing them to use coding to develop a deeper understanding various subjects and concepts. This makes coding a learning-aid and makes the learning process fun and interactive.

Our curriculum is designed to inspire children to create through code. A practice that has been proven to develop a child's creativity, logical thinking and problem-solving skills.

Our curriculum combines the power of code with STEAM (Science, Technology, Engineering, Arts and Maths) education. This unique pedagogic approach encourages children to apply their learnings at school and their coding skills to solve real-world problems.

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Kids and parents love us



Codingal's demo class helped me develop a keen interest in coding. So I decided to learn app and web development. Coding is now super fun for me, and it has improved my thinking and logical skills.

Dishita Karkare

Grade 5 | Bengaluru, India



My journey with Codingal started a few weeks ago. My teacher is very nice and understanding. She even gives me assignments to help me understand the concepts. I'm really excited about learning more about coding with Codingal.

Abdul Hannan

Grade 3 | Nigeria



The teachers are friendly and my son is able to understand the concepts easily. In just three classes, he was able to create basic steps in a program used to make animations. I think Codingal can help him grow and understand how to progress in a field which is much-needed nowadays and will be even more so in the future.

Mr. Samar Shareef

Abuja Nigeria



What your kid will learn

Grade 4-5

20 classes

Rising Coding Star

An ideal course to help kids quicky grasp the basics of coding and start writing code using blocks.

60+ Activities
3 Quizzes

₹800 per class

- ✓ Block-based coding
- Sequencing, algorithms, flowcharts
- Run-time inputs
- Time and direction
- Coordinates and cardinal points
- Scratch programming
- Application development
- Sprite Lab, App Lab, Minecraft

- Prising Coding Star Certificate
- ♣ Lifetime community access

44 classes

Coding Champion

A course to advance your coding skills and build a deeper understanding of complex coding concepts.

100+ Activities
7 Quizzes

₹750 per class

- All Rising Coding Star learnings +
- ✓ Basic and advanced loops
- Conditional statements
- Animation effects
- Variables and data types
- ✓ Interlinking and duplicacy
- Arithmetic operators
- Scratch game development

- Coding Champion Certificate
- Game development certificate
- ♀ Lifetime community access

92 classes

Coding Prodigy

A perfect course for kids who want to excel at coding and build complex games and applications.

184+ Activities
15 Quizzes

₹ **700** per class

- All Coding Champion learnings +
- Ul designing
- Advanced game development
- Andriod application development
- Artificial intelligence
- Nested loops
- Debugging
- Functions, parameters
- ♥ Coding Prodigy Certificate
- Scholarships for top five performers
- ♀ Lifetime community access

152 classes

Coding Grandmaster

A course for those who want to master the art of coding and create a better future through code.

450+ Activities
25 Quizzes

₹**650** per class

- ✓ All Coding Prodigy learnings +
- Advanced Andriod app development
- Website development
- Bootstrap
- Wordpress
- Advanced JavaScript
- Python Development
- Game development using Python
- Coding Grandmaster Certificate
- Python development certificate
- ♀ Al game developer certificate
- Scholarships for top five performers
- ♀ Lifetime community access



Rising Coding Star

3+

ClassesSkill levelPrice20Intermediate₹ 800ActivitiesAge groupper class60+Grade 4-5



Key learnings

- Sprite Lab (code.org)
- Play Lab (code.org)
- Minecraft (code.org)
- App Lab (code.org)



Benefits

- Foundation of coding
- Game development
- Logic building
- Code flow and methodology



- Rising Coding Star Certificate
- Lifetime community access

Module	Theme	Topics Covered	Outcome
M1 (8 Classes)	Block-based programming	Drag and drop function, block coding, commands, sequencing, algorithms, events, time and direction sense, and logic building	Students will learn basic programming constructs and get comfortable with commands, sequencing, drag-and-drop functions. They will also use the concept of time and direction and will improve their logical thinking by working on various Scratch projects. They will be building a 'Save the World' project at the end of the module.
M2 (6 Classes)	App Lab - I	Build a fully-functioning app with buttons, understand functions and random numbers, build a basic clicking app, understand basics of Javascript	Students will learn how to design and build applications with user interface and interaction. They will develop a deeper understanding of how apps are made and how they work. They'll learn basics of Javascript and learn to build basic clicking apps.
M3 (6 Classes)	App Lab - II	Functions, canvas, turtle and advanced concepts of Javascript in App lab	Students will continue their journey as an app developer with hands-on experience building apps. Students will be introduced to functions, canvas, turtle and some advance concepts of JavaScript. They will develop apps that can be shared and used on a smartphone. They will understand the role of programmers in understanding the requirements and programming a solution.



Coding Champion

ClassesSkill levelPrice44Intermediate₹ 750ActivitiesAge groupper class100+Grade 4-5Quizzes7+



Key learnings

- Game Lab (code.org)
- Scratch
- JavaScript



Benefits

- Improved aptitude
- Critical thinking
- Advanced concepts
- App development
- Capstone project
- Student project



- Coding Champion Certificate
- Lifetime community access
- Internship opportunity
- Publish your app to the Playstore*

Modules	Themes	Topics Covered	Outcome	
All Rising Coding Star modules +				
M4 (6 Classes)	Game Lab	Introduction to Game Lab, sprite interactions, drawing shapes and randomization, and introduction to JavaScript	In this module, students will be introduced to Game Lab and become familiar with JavaScript programming while creating animations and games. They will learn how to control sprites along with conceptualizing and developing themes.	
M5 (6 Classes)	Game Lab	Draw loop, pattern creation, sprite movements, conditionals and predictionals	In this module, students will learn functional programming in games and discover complex modules such as velocity detection, collision detection, sprite interactions, etc.	
M6 (6 Classes)	Scratch	Platform introduction to Scratch, events, coordinates, creating sprites	Students will be introduced to the Scratch platform and develop an understanding of the different functions of blocks in Scratch.	
M7 (6 Classes)	Scratch	Co-ordinates, pen feature, broadcasting	In this module, students will learn how to code with help of blocks and will develop and create different types of projects including a 'Who Wants to Be a Millionaire' type of game.	



Coding Prodigy

Quizzes

15+

ClassesSkill levelPrice92Intermediate₹ 700ActivitiesAge groupper class184+Grade 4-5



Key learnings

- Scratch
- Machine Learning for Kids
- Thunkable basics
- Artificial intelligence



Benefits

- Conceptual clarity
- Analytical skills
- Creativity
- Capstone project
- Student project



- Coding Prodigy Certificate
- Lifetime community access
- Scholarship opportunities
- Goodies

Modules	Themes	Topics Covered	Outcome
		All Coding Champion modu	les +
M8 (6 Classes)	Scratch - I	Broadcast, cloning, If/Else commands, number systems	Students will understand the concept of interlinking with the help of broadcasts, cloning, and conditional statements
M9 (6 Classes)	Scratch - II	Custom block making, science-based activities, text-to-speech conversion, advanced games, animation effects	Students will create amazing Al-based projects. They will learn how they can use Al to improve day-to-day life using mathematical concepts. They will develop problem solving skill and work on projects that require them to think creatively.
M10 (6 Classes)	Artificial Intelligence - I	Basic of AI, difference between ML and deep learning, API, image classification, text, image and sound training.	Students will be introduced to artificial intelligence (AI), a technology that is in high demand and is being used in all technologies. They will learn the basics of AI and will learn how to implement AI in various projects.
M11 (6 Classes)	Artificial Intelligence - II	Text and vision training, deep learning, neural networks, speech recognition.	Students will be introduced to the concept of training an Al module. They will be working on a trained module and make various projects involving text and vision.



Coding Prodigy

Themes	Topics Covered	Outcome
Thunkable - Basics	User interfaces, buttons, webviewer, canvas, labels, basic components of the palette, layout, sensors, PDF reader, translator	Students will develop a deeper understanding of the apps they will be creating in this module. They will be introduced to basic components of palette and how to use those components. They will be making simple apps like color switch, mood counter, touch me not, etc. They will also learn how to upload PDF documents in an application.
Thunkable - Basics	Canvas, sprites, procedures, media, multiscreens, translator, text to speech, gyroscope, share component	Students will learn how to add multiple screens in an app and will be introduced to concepts including canvas, sensors. They will be making apps like calculator, sensor app, etc. They will also learn how to use the share feature and create an app that can be used to share images.
Thunkable - Intermediate	List viewer, local storage, locations, sensors, maps, speech recognition, drawer, navigator	Students will learn Android and iOS game development. They will learn how to use local storage, location sensors, and maps. They will create their own app which can make calls, send texts, emails, and much more.
Thunkable - Intermediate	Audio recording, video recording, local storage, barcode scanner, web API, MediaDb	Students will learn how to record audio and video, how to use a barcode scanner. They will also be introduced to advanced concepts in Thunkable including web API and MediaDb. They will create an app that can store their photos.
	Thunkable - Basics Thunkable - Basics Thunkable - Intermediate	Thunkable - Basics User interfaces, buttons, webviewer, canvas, labels, basic components of the palette, layout, sensors, PDF reader, translator Canvas, sprites, procedures, media, multiscreens, translator, text to speech, gyroscope, share component List viewer, local storage, locations, sensors, maps, speech recognition, drawer, navigator Audio recording, video recording, local storage, barcode scanner, web API,



Coding Grandmaster

Classes

Skill level
Intermediate

Grade 4-5

₹**650** per class

<u>Price</u>

<u>Activities</u> <u>Age group</u>

Quizzes

450+

25+

152

Key learnings

- Thunkable
- HTML, CSS
- Wordpress
- Repl
- Python



Benefits

- Conceptual clarity
- Analytical skills
- Confidence boost
- Capstone project
- Student project



- Coding Grandmaster Certificate
- Lifetime community access
- Scholarship opportunities
- Goodies

Modules	Themes	Topics Covered	Outcome
All Coding Prodigy modules +			
M16 (6 Classes)	Thunkable - Advanced	Application programming interface (API), local databases, animations	Students will learn how to make use of APIs and create quiz applications. They will also learn about local databases in smartphones and how to use them in various applications.
M17 (6 Classes)	Thunkable - Advanced	Sign-in features, media databases, Google Firebase setup, and more	Students will learn about AdMob and sign-in features, and create an application with log-in functionality using Thunkable. They will learn how to setup Google's Firebase and use it in Thunkable.
M18 (6 Classes)	Web Development	HTML, CSS, web pages, static websites, and more	Student will be introduced to the basic construction and creation of a website. They will learn about headers, footers, and body segments of a website. They will create webpages in HTML, add CSS to them, create a website that combines the two.
M19 (6 Classes)	Web Development	Wordpress, website hosting	Students will learn how to host their own website on the internet using the Wordpress platform. They will create a website with images, tables, videos, feedback forms, etc.



Coding Grandmaster

Modules	Themes	Topics Covered	Outcome
M20 (6 Classes)	Bootstrap	Get started with Bootstrap, Containers, Grids, Typography, Colors, Badges, Progress Bars, Spinners, Pagination, Carousel, Scrollspy, Bootstrap 4 Grid, Grid System, Stacked/Horizontal, Grid XSmall, Grid Small, Grid Medium, Grid Large, Grid XLarge, Grid Examples	In this module, students will learn about Bootstrap—the world's most popular framework for building responsive, mobile-first sites. This framework will help them to make their websites responsive.
M21 (6 Classes)	JavaScript	Syntax guide and commenting, variables, value and type, operators, objects and properties, array properties and method, Call stack, methods, loops and switch, functions, parameters and scope of functions.	In this module, students will be introduced to JavaScript programming. JavaScript will help them create animations on their websites and make their websites more interactive.
M22 (6 Classes)	Capstone Project on Website Development	Hands-on experience with HTML, CSS and JavaScript	For this Capstone Project, students will develop a major, complex website using HTML, CSS and JavaScript
M23 (6 Classes)	Python - I	Turtles in Python	Students will be learn inter-relation between block-based coding and text code. They will work with turtles to create various projects.
M24 (6 Classes)	Python - II	Loops, conditional statements, data types	Students will learn how to write using syntax in Python language. They will learn how to use loops and conditional statements in Python using different data types.
M25 (6 Classes)	Advanced Python	Advanced-level games using functions, modules, and libraries	In this module, students work with advanced python programming. They will make an advanced-level game using functions, different modules, and libraries in Python.

