Angular:
Angular is a popular open-source JavaScript framework that is widely used for building complex, dynamic, and responsive web applications. It was developed and is maintained by Google.
Here are some key features of Angular:
1. Component-Based Architecture: Angular uses a component-based architecture that allows developers to build complex web applications by dividing them into small, reusable components.
2. Two-Way Data Binding: Angular supports two-way data binding, which means that changes in the data model are automatically reflected in the view and vice versa.
3. Directives: Angular provides a set of built-in directives that allow developers to extend HTML syntax and create dynamic templates.
4. Dependency Injection: Angular has a built-in dependency injection system that makes it easy to manage dependencies between different components.
5. Reactive Programming: Angular supports reactive programming using the RxJS library, which allows developers to build scalable and responsive applications.
Some advantages of using Angular for web development include:
1. Improved Productivity: Angular provides a lot of built-in features and tools that help developers to build complex applications quickly and efficiently.
2. Enhanced Performance: Angular is designed to optimize the performance of web applications, and it provides features like lazy loading and AOT compilation that can

significantly improve performance.

- 3. Better Code Maintainability: Angular uses a modular and component-based architecture, which makes it easier to maintain and update code.
- 4. Large and Active Community: Angular has a large and active community of developers, which means that there are a lot of resources and support available for developers.

## Some key terminology used in Angular includes:

- 1. Modules: Modules are a way to organize code in Angular, and they group related components, services, and directives together.
- 2. Components: Components are the building blocks of an Angular application, and they represent different parts of the UI.
- 3. Services: Services are used to share data and functionality between different components in an Angular application.
- 4. Directives: Directives are used to add behavior to the DOM, and they allow developers to create custom HTML elements and attributes.

## Some of the major versions of Angular include:

- 1. AngularJS: The first version of Angular, released in 2010.
- 2. Angular 2: The second version of Angular, released in 2016, which introduced a complete rewrite of the framework.
- 3. Angular 4-7: These versions of Angular were released in quick succession between 2017 and 2018, and they introduced several new features and improvements.

- 4. Angular 8-11: These versions of Angular were released between 2019 and 2020, and they introduced significant improvements in areas like performance, testing, and accessibility.
- 5. Angular 12: The latest version of Angular, released in 2021, which introduced several new features and improvements, including improved tree shaking, improved build times, and stricter type checking.

## **Differences between Angular and ReactJS**

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Angular	ReactJS	
Language	TypeScript, a superset of JavaScript with static typing	JavaScript
Architecture	Full-featured MVC framework with built-in router and services	Library for building UI components
Learning Curve	Steep learning curve with a lot of concepts to learn	Easy to learn, especially for those with experience in JavaScript
Data Binding	Two-way data binding using [(ngModel)] directive	One-way data binding using props and state
Templating	Uses HTML templates with directives and pipes for dynamic rendering	Uses JSX syntax for dynamic rendering

Angular	ReactJS	
Dependency Injection	Built-in dependency injection system	No built-in dependency injection system
Performance	Large file size and slower performance compared to ReactJS	Smaller file size and faster performance compared to Angular
Testing	Built-in testing tools and support	Requires additional libraries and tools for testing
Community Support	Large and established community with extensive documentation and support	Large and growing community with extensive documentation and support