

Component/Directive Lifecycle Hooks





Types of Directives

Component

Directives with a template.

Structural directives

Change the DOM layout by adding and removing DOM elements.

Attribute directives

Change the appearance or behavior of an element, component, or another directive.



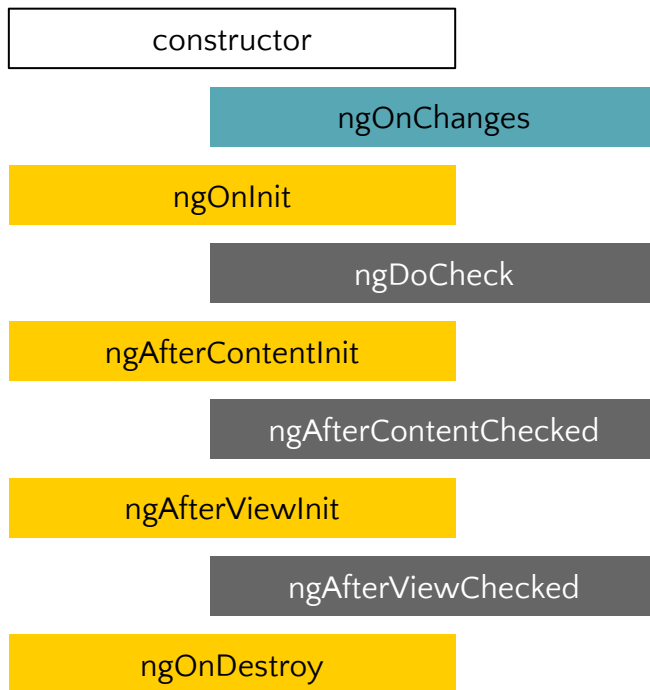
Interfaces for Lifecycle Hooks

LifeCycleHookInterface

ngLifeCycleHookInterface







Sequence of execution





When are they called?

Lifecycle Hook Method	When
 ngOnChanges	Everytime data-bound @Input properties change
ngOnInit	Once after the first ngOnChanges
 ngDoCheck	Everytime after change detection runs
ngAfterContentInit	Once after first ngDoCheck
 ngAfterContentChecked	Right after ngAfterContentInit & everytime after ngDoCheck
ngAfterViewInit	Once after first ngAfterContentChecked
 ngAfterViewChecked	Right after ngAfterViewInit & everytime after ngAfterContentChecked
ngOnDestroy	Immediately before Angular destroys the directive or component



When Angular runs Change Detection?

Timeouts/Intervals

When there's a call to
setTimeout or
setInterval methods

DOM Events

Button Clicks
Select Value Changes
Input Keyboard
Events
etc. etc. etc.

AJAX Requests

REST API Calls etc.



What is Content Projection?

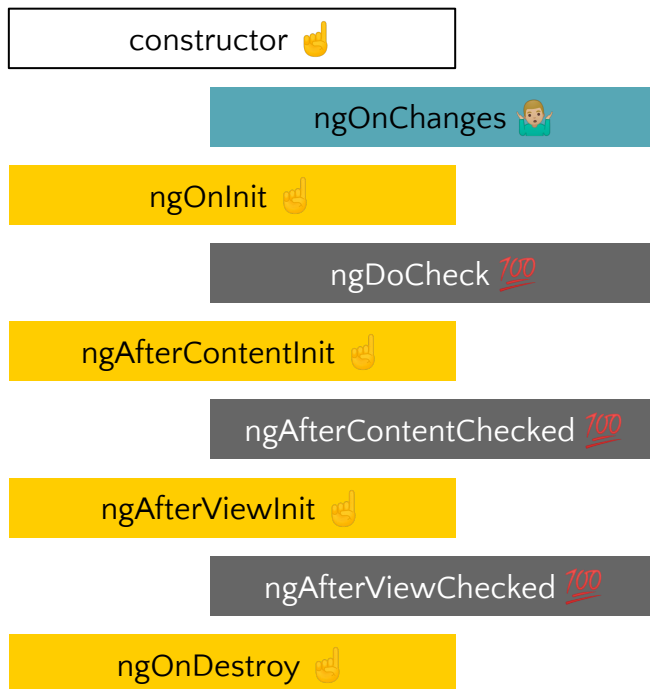
Child Component's Template has

```
<ng-content></ng-content>
```

And you pass some HTML Markup in the Opening and Closing Tags of the Child Component.










Frequency of calls





Use Cases

Lifecycle Hook Method	Use Case
 ngOnChanges	Act upon changes to data-bound @Input properties
 ngOnInit	Initialize the Component/Directive's properties
 ngDoCheck	Handle changes that Angular can't or won't detect
ngAfterContentInit	Logic to access the projected content can be written here
 ngAfterContentChecked	Respond after Angular checks the projected content
 ngAfterViewInit	Logic to access the component's view or child's view
 ngAfterViewChecked	Respond after Angular checks the component's or child's views
 ngOnDestroy	Unsubscribe Observables, detach event handles, clear timeouts/intervals



Component Interaction Techniques using View Queries

Next Video



Credits

Special thanks to all the people who made and released these awesome resources for free:

- Presentation template by SlidesCarnival
- Photographs by Unsplash