# Data Structures Resources

## Complexity Analysis

### Detailed Resources

1. [Big O Notation](https://www.educative.io/answers/what-is-big-o-notation)
2. [Time Complexity](https://www.educative.io/answers/what-is-the-time-complexity-of-an-algorithm)
3. [Time vs. Space Complexity](https://www.educative.io/answers/time-complexity-vs-space-complexity)
4. [Asymptotic Notations](https://www.educative.io/answers/what-are-the-common-asymptotic-notations)

### Quick Refreshers

1. [Data Structures](https://www.codecademy.com/learn/cspath-cs-102/modules/nodes/cheatsheet)
2. [Common Data Structures & their Big O](https://www.bigocheatsheet.com/)
3. [Calculating Big O](https://www.codecademy.com/learn/cspath-asymptotic-notation/modules/cspath-asymptotic-notation/cheatsheet)

## Data Structures

### Linked Lists

[Singly Linked Lists](https://www.thedshandbook.com/linked-lists/)

[Doubly Linked Lists](https://www.thedshandbook.com/doubly-linked-list/)

### Stacks

[Stacks (using arrays)](https://www.thedshandbook.com/stacks/)

[Stacks (using linked lists)](https://www.thedshandbook.com/stacks-using-linked-lists/)

### Queues

[Queues (using arrays)](https://www.thedshandbook.com/queues/)

[Queues (using linked lists)](https://www.thedshandbook.com/queues-using-linked-list/)

### Deques

[Deques](https://www.thedshandbook.com/double-ended-queue-deque/)

### Trees

[General Trees](https://www.thedshandbook.com/trees/)

[Binary Trees](https://www.thedshandbook.com/binary-trees/)

[Tree Traversals](https://www.thedshandbook.com/tree-traversals/)

[Binary Search Trees](https://www.thedshandbook.com/binary-search-trees/)

### Graphs

[Graph Representations](https://www.thedshandbook.com/graphs/)

[Breadth First Search](https://www.thedshandbook.com/breadth-first-search/)

[Depth First Search](https://www.thedshandbook.com/depth-first-search/)

### Hash Data Structures

[Sets](https://www.geeksforgeeks.org/introduction-to-set-data-structure-and-algorithm-tutorials/?ref=ghm)

[Maps](https://www.geeksforgeeks.org/introduction-to-map-data-structure-and-algorithm-tutorials/?ref=ghm)

[Hashing and Maps](https://www.thedshandbook.com/hash-tables/)

### Heaps & Priority Queues

[Heaps](https://www.thedshandbook.com/heaps/)

[Priority Queues](https://www.geeksforgeeks.org/priority-queue-using-binary-heap/)