

Assignment

1. Reverse of a LinkedList – <https://leetcode.com/problems/reverse-linked-list/?envType=problem-list-v2&envId=n73pvuvr>
2. Loop detection (using the index or value based on what we discussed in class we can give other one)
3. Segregation of even and odd nodes based on index's and also odd and even seg
4. Middle of a linkedlist - <https://leetcode.com/problems/middle-of-the-linked-list/description/?envType=problem-list-v2&envId=n73pvuvr>
5. Remove the linkedlist elements - <https://leetcode.com/problems/remove-linked-list-elements/description/?envType=problem-list-v2&envId=n73pvuvr>
6. Swapping nodes in a linkedlist - <https://leetcode.com/problems/swapping-nodes-in-a-linked-list/?envType=problem-list-v2&envId=n73pvuvr>
7. Remove nth node from the end in a LL -
<https://leetcode.com/problems/remove-nth-node-from-end-of-list/?envType=problem-list-v2&envId=n73pvuvr>
8. Insert the GCD in a LL - <https://leetcode.com/problems/insert-greatest-common-divisors-in-linked-list/description/?envType=problem-list-v2&envId=n73pvuvr>
9. Stack Implementation using array and SLL
10. Queue Implementation using array and SLL

Theoretical Question

1. What is a Stack? Explain its operations and real-time applications.
2. Explain the procedure of the Tower of Hanoi problem with an example.
3. What is a Queue? Explain its types and real-time applications.
4. What is a Priority Queue? Explain its working with suitable examples.