

DYNAMIC PROGRAMMING - SET 2 QUESTIONS

Question 1:

- ❖ Problem link: <https://leetcode.com/problems/counting-bits/>
- ❖ Difficulty level: Easy
- ❖ Expected Complexity:
 - Time: $O(n)$
 - Extra space: $O(n)$

Question 2:

- ❖ Problem link: <https://leetcode.com/problems/best-time-to-buy-and-sell-stock/>
- ❖ Difficulty level: Easy
- ❖ Expected Complexity:
 - Time: $O(n)$
 - Extra space: $O(1)$

Question 3:

- ❖ Problem link: <https://leetcode.com/problems/divisor-game/>
- ❖ Difficulty level: Easy
- ❖ Expected Complexity:
 - Time: $O(n)$
 - Extra space: $O(n)$

Question 4:

- ❖ Problem link: <https://leetcode.com/problems/word-break/>
- ❖ Difficulty level: Medium
- ❖ Expected Complexity:
 - Time: $O(s^2)$
 - Extra space: $O(s^2)$

Question 5:

- ❖ Problem link: <https://leetcode.com/problems/maximum-product-subarray/>
- ❖ Difficulty level: Medium
- ❖ Expected Complexity:
 - Time: $O(n)$
 - Extra space: $O(1)$

Question 6:

- ❖ Problem link: [leetcode: House Robber](https://leetcode.com/problems/house-robber/)
- ❖ Difficulty level: Medium
- ❖ Expected Complexity:
 - Time: $O(n)$
 - Extra space: $O(1)$

Question 7:

- ❖ Problem link: <https://leetcode.com/problems/interleaving-string/>
- ❖ Difficulty level: Medium
- ❖ Expected Complexity:
 - Time: $O(m*n)$
 - Extra space: $O(n)$ where $n=s2.length$

Question 8:

- ❖ **Problem link:** <https://leetcode.com/problems/maximum-profit-in-job-scheduling/>
- ❖ **Difficulty level:** Hard
- ❖ **Expected Complexity:**
 - Time: $O(n \log n)$
 - Extra space: $O(n)$

Question 9:

- ❖ **Problem link:** <https://leetcode.com/problems/frog-jump/>
- ❖ **Difficulty level:** Hard
- ❖ **Expected Complexity:**
 - Time: $O(n^2)$
 - Extra space: $O(n)$