DP FOR BEGINNERS

[Problems | Patterns]



https://www.linkedin.com/in/himanshukumarmahuri

Longest Increasing Subsequence variants:

- https://leetcode.com/problems/longest-increasing-subsequence/
- https://leetcode.com/problems/largest-divisible-subset/
- https://leetcode.com/problems/russian-doll-envelopes/
- https://leetcode.com/problems/maximum-length-of-pair-chain/
- https://leetcode.com/problems/number-of-longest-increasing-subsequence/
- https://leetcode.com/problems/delete-and-earn/
- https://leetcode.com/problems/longest-string-chain/

Partition Subset:

- https://leetcode.com/problems/partition-equal-subset-sum/
- https://leetcode.com/problems/last-stone-weight-ii/

BitMasking:

https://leetcode.com/problems/partition-to-k-equal-sum-subsets/

Longest Common Subsequence Variant:

- https://leetcode.com/problems/longest-common-subsequence/
- https://leetcode.com/problems/edit-distance/
- https://leetcode.com/problems/distinct-subsequences/
- https://leetcode.com/problems/minimum-ascii-delete-sum-for-two-strings/

Palindrome:

- https://leetcode.com/problems/palindrome-partitioning-ii/
- https://leetcode.com/problems/palindromic-substrings/

Coin Change variant:

- https://leetcode.com/problems/coin-change/
- https://leetcode.com/problems/coin-change-2/
- https://leetcode.com/problems/combination-sum-iv/
- https://leetcode.com/problems/perfect-squares/
- https://leetcode.com/problems/minimum-cost-for-tickets/

Matrix multiplication variant:

- https://leetcode.com/problems/minimum-score-triangulation-of-polygon/
- https://leetcode.com/problems/minimum-cost-tree-from-leaf-values/
- https://leetcode.com/problems/burst-balloons/

Matrix/2D Array:

- https://leetcode.com/problems/matrix-block-sum/
- https://leetcode.com/problems/range-sum-query-2d-immutable/
- https://leetcode.com/problems/dungeon-game/
- https://leetcode.com/problems/triangle/
- https://leetcode.com/problems/maximal-square/
- https://leetcode.com/problems/minimum-falling-path-sum/

Hash + DP:

- https://leetcode.com/problems/target-sum/
- https://leetcode.com/problems/longest-arithmetic-sequence/
- https://leetcode.com/problems/longest-arithmetic-subsequence-of-given-difference/
- https://leetcode.com/problems/maximum-product-of-splitted-binary-tree/

State machine:

- https://leetcode.com/problems/best-time-to-buy-and-sell-stock/
- https://leetcode.com/problems/best-time-to-buy-and-sell-stock-ii/
- https://leetcode.com/problems/best-time-to-buy-and-sell-stock-iii/
- https://leetcode.com/problems/best-time-to-buy-and-sell-stock-iv/
- https://leetcode.com/problems/best-time-to-buy-and-sell-stock-with-cooldown/
- https://leetcode.com/problems/best-time-to-buy-and-sell-stock-with-transaction-fee/

Depth First Search + DP:

- https://leetcode.com/problems/out-of-boundary-paths/
- https://leetcode.com/problems/knight-probability-in-chessboard/

Minimax DP:

- https://leetcode.com/problems/predict-the-winner/
- https://leetcode.com/problems/stone-game/

Misc:

- https://leetcode.com/problems/greatest-sum-divisible-by-three/
- https://leetcode.com/problems/decode-ways/
- https://leetcode.com/problems/perfect-squares/
- https://leetcode.com/problems/count-numbers-with-unique-digits/
- https://leetcode.com/problems/longest-turbulent-subarray/
- https://leetcode.com/problems/number-of-dice-rolls-with-target-sum/

Full problem list: https://leetcode.com/list/x1k8lxi5

SOURCE- LEETCODE



https://www.linkedin.com/in/himanshukumarmahuri