HackerRank Online Judge

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HackerRank Online Judge – Phase 3 Algorithms Dynamic Programming

Lecture Agenda

We will discuss in this lecture the following topics

1- Bit Manipulation   [25 problems]

2- Dynamic Programming   [100 problems]

3- Constructive Algorithms   [10 problems]

Let's
STARTUP

Lecture Agenda

Section 1: Bit Manipulation

Section 2: Dynamic Programming

Section 3: Constructive Algorithms

HackerRank – Bit Manipulation

[01] https://www.hackerrank.com/challenges/lonely-integer/problem

[02] https://www.hackerrank.com/challenges/maximizing-xor/problem

[03] https://www.hackerrank.com/challenges/sum-vs-xor/problem

[04] https://www.hackerrank.com/challenges/flipping-bits/problem

[05] https://www.hackerrank.com/challenges/counter-game/problem

[06] https://www.hackerrank.com/challenges/xor-se/problem

[07] https://www.hackerrank.com/challenges/the-great-xor/problem

[08] https://www.hackerrank.com/challenges/yet-another-minimax-problem/problem

[09] https://www.hackerrank.com/challenges/sansa-and-xor/problem

[10] https://www.hackerrank.com/challenges/and-product/problem

[11] https://www.hackerrank.com/challenges/winning-lottery-ticket/problem

[12] https://www.hackerrank.com/challenges/cipher/problem

[13] https://www.hackerrank.com/challenges/whats-next/problem

[14] https://www.hackerrank.com/challenges/aorb/problem

[15] https://www.hackerrank.com/challenges/xoring-ninja/problem

[16] https://www.hackerrank.com/challenges/xor-matrix/problem

HackerRank - Bit Manipulation

[17] https://www.hackerrank.com/challenges/string-transmission/problem

[18] https://www.hackerrank.com/challenges/manipulative-numbers/problem

[19] https://www.hackerrank.com/challenges/stonegame/problem

[20] https://www.hackerrank.com/challenges/maximizing-the-function/problem

[21] https://www.hackerrank.com/challenges/pmix/problem

[22] https://www.hackerrank.com/challenges/2s-complement/problem

[23] https://www.hackerrank.com/challenges/changing-bits/problem

[24] https://www.hackerrank.com/challenges/xor-key/problem

[25] https://www.hackerrank.com/challenges/xor-subsequence/problem

[26] https://www.hackerrank.com/challenges/iterate-it/problem

[27] https://www.hackerrank.com/challenges/hamming-distance/problem

Lecture Agenda

✓ Section 1: Bit Manipulation

Section 2: Dynamic Programming

Section 3: Constructive Algorithms

HackerRank - Dynamic Programming

[01] https://www.hackerrank.com/challenges/coin-change/problem

[02] https://www.hackerrank.com/challenges/equal/problem

[03] https://www.hackerrank.com/challenges/sherlock-and-cost/problem

[04] https://www.hackerrank.com/challenges/construct-the-array/problem

[05] https://www.hackerrank.com/challenges/kingdom-division/problem

[06] https://www.hackerrank.com/challenges/sam-and-substrings/problem

[07] https://www.hackerrank.com/challenges/fibonacci-modified/problem

[08] https://www.hackerrank.com/challenges/abbr/problem

[09] https://www.hackerrank.com/challenges/prime-xor/problem

[10] https://www.hackerrank.com/challenges/fair-cut/problem

[11] https://www.hackerrank.com/challenges/maxsubarray/problem

[12] https://www.hackerrank.com/challenges/prime-digit-sums/problem

[13] https://www.hackerrank.com/challenges/hr-city/problem

[14] https://www.hackerrank.com/challenges/summing-pieces/problem

[15] https://www.hackerrank.com/challenges/mr-k-marsh/problem

[16] https://www.hackerrank.com/challenges/substring-diff/problem

[17] https://www.hackerrank.com/challenges/xor-and-sum/problem

HackerRank – Dynamic Programming

[18] https://www.hackerrank.com/challenges/lego-blocks/problem

[19] https://www.hackerrank.com/challenges/stockmax/problem

[20] https://www.hackerrank.com/challenges/two-robots/problem

[21] https://www.hackerrank.com/challenges/cuttree/problem

[22] https://www.hackerrank.com/challenges/wet-shark-and-two-subsequences/problem

[23] https://www.hackerrank.com/challenges/array-splitting/problem

[24] https://www.hackerrank.com/challenges/mandragora/problem

[25] https://www.hackerrank.com/challenges/red-john-is-back/problem

[26] https://www.hackerrank.com/challenges/tutzki-and-lcs/problem

[27] https://www.hackerrank.com/challenges/grid-walking/problem

[28] https://www.hackerrank.com/challenges/unbounded-knapsack/problem

[29] https://www.hackerrank.com/challenges/play-game/problem

[30] https://www.hackerrank.com/challenges/coin-on-the-table/problem

[31] https://www.hackerrank.com/challenges/dynamic-programming-classics-the-longest-common-subsequence/problem

[32] https://www.hackerrank.com/challenges/strplay/problem

[33] https://www.hackerrank.com/challenges/counting-special-sub-cubes/problem

[34] https://www.hackerrank.com/challenges/interval-selection/problem

HackerRank – Dynamic Programming

[35] https://www.hackerrank.com/challenges/the-indian-job/problem

[36] https://www.hackerrank.com/challenges/travel-around-the-world/problem

[37] https://www.hackerrank.com/challenges/candles-2/problem

[38] https://www.hackerrank.com/challenges/swappermutation/problem

[39] https://www.hackerrank.com/challenges/extremum-permutations/problem

[40] https://www.hackerrank.com/challenges/decibinary-numbers/problem

[41] https://www.hackerrank.com/challenges/angry-children-2/problem

[42] https://www.hackerrank.com/challenges/sherlocks-array-merging-algorithm/problem

[43] https://www.hackerrank.com/challenges/brick-tiling/problem

[44] https://www.hackerrank.com/challenges/alien-languages/problem

[45] https://www.hackerrank.com/challenges/taras-beautiful-permutations/problem

[46] https://www.hackerrank.com/challenges/choosing-white-balls/problem

[47] https://www.hackerrank.com/challenges/matrix-land/problem

[48] https://www.hackerrank.com/challenges/black-n-white-tree-1/problem

[49] https://www.hackerrank.com/challenges/string-reduction/problem

[50] https://www.hackerrank.com/challenges/far-vertices/problem

[51] https://www.hackerrank.com/challenges/superman-celebrates-diwali/problem

[52] https://www.hackerrank.com/challenges/hexagonal-grid/problem

[53] https://www.hackerrank.com/challenges/queens-on-board/problem

[54] https://www.hackerrank.com/challenges/turn-off-the-lights/problem

[55] https://www.hackerrank.com/challenges/animal-transport/problem

[56] https://www.hackerrank.com/challenges/a-super-hero/problem

[57] https://www.hackerrank.com/challenges/clues-on-a-binary-path/problem

[58] https://www.hackerrank.com/challenges/road-maintenance/problem

[59] https://www.hackerrank.com/challenges/beautiful-string/problem

[60] https://www.hackerrank.com/challenges/covering-the-stains/problem

[61] https://www.hackerrank.com/challenges/gcd-matrix/problem

[62] https://www.hackerrank.com/challenges/newyear-present/problem

[63] https://www.hackerrank.com/challenges/longest-palindromic-subsequence/problem

[64] https://www.hackerrank.com/challenges/square-subsequences/problem

[65] https://www.hackerrank.com/challenges/police-operation/problem

[66] https://www.hackerrank.com/challenges/zurikela/problem

[67] https://www.hackerrank.com/challenges/longest-mod-path/problem

[68] https://www.hackerrank.com/challenges/p-sequences/problem

HackerRank – Dynamic Programming

[69] https://www.hackerrank.com/challenges/oil-well/problem

[70] https://www.hackerrank.com/challenges/ones-and-twos/problem

[71] https://www.hackerrank.com/challenges/hard-drive-disks/problem

[72] https://www.hackerrank.com/challenges/longest-increasing-subsequent/problem

[73] https://www.hackerrank.com/challenges/shashank-and-palindromic-strings/problem

[74] https://www.hackerrank.com/challenges/points-in-a-plane/problem

[75] https://www.hackerrank.com/challenges/requirement/problem

[76] https://www.hackerrank.com/challenges/billboards/problem

[77] https://www.hackerrank.com/challenges/fairy-chess/problem

[78] https://www.hackerrank.com/challenges/hyper-strings/problem

[79] https://www.hackerrank.com/challenges/dorsey-thief/problem

[80] https://www.hackerrank.com/challenges/mining/problem

[81] https://www.hackerrank.com/challenges/modify-the-sequence/problem

[82] https://www.hackerrank.com/challenges/robot/problem

[83] https://www.hackerrank.com/challenges/unfair-game/problem

[84] https://www.hackerrank.com/challenges/find-the-seed/problem

[85] https://www.hackerrank.com/challenges/the-blacklist/problem

[86] https://www.hackerrank.com/challenges/tree-pruning/problem

[87] https://www.hackerrank.com/challenges/vim-war/problem

[88] https://www.hackerrank.com/challenges/best-spot/problem

[89] https://www.hackerrank.com/challenges/unique-divide-and-conquer

[90] https://www.hackerrank.com/challenges/dortmund-dilemma

[91] https://www.hackerrank.com/challenges/super-kth-lis

[92] https://www.hackerrank.com/challenges/counting-road-networks/problem

[93] https://www.hackerrank.com/challenges/suffix-rotation/problem

[94] https://www.hackerrank.com/challenges/lucky-numbers/problem

[95] https://www.hackerrank.com/challenges/count-scorecards/problem

[96] https://www.hackerrank.com/challenges/divisible-numbers/problem

[97] https://www.hackerrank.com/challenges/happy-king/problem

[98] https://www.hackerrank.com/challenges/count-ways-1/problem

[99] https://www.hackerrank.com/challenges/hard-drive-disks/problem

[100] https://www.hackerrank.com/challenges/separate-the-chocolate/problem

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[02] https://www.hackerrank.com/challenges/flipping-the-matrix/problem

[03] https://www.hackerrank.com/challenges/an-interesting-game-1/problem

[04] https://www.hackerrank.com/challenges/new-year-chaos/problem

[05] https://www.hackerrank.com/challenges/bonetrousle/problem

[06] https://www.hackerrank.com/challenges/kmp-problem/problem

[07] https://www.hackerrank.com/challenges/beautiful-3-set/problem

[08] https://www.hackerrank.com/challenges/inverse-rmq/problem

[09] https://www.hackerrank.com/challenges/lovely-triplets/problem

[10] https://www.hackerrank.com/challenges/array-construction/problem

[11] https://www.hackerrank.com/challenges/two-subarrays/problem

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