Computer Science Ics Part 1 Chapter 3 Online Test

Sr	Questions	Answers Choice
1	What is the main advantage of Dynamic Programming.	A. Avoid redundant work B. Locally optmal results C. Sole independent problems D. Explore all options
2	What is outpout when checking if 8 is even.	A. Found at 2 B. Even C. Odd D. Yes
3	P vs NP asks if	A. Fast solutions are in NP B. Check complexity C. Debug rrors D. Improve hardware
4	What is role of algorithm in problem solving.	A. Gives steps B. Ignores logic C. Random process D. Blocks solutions
5	Which is solved by Dynaimc programming.	A. Coin Change B. Fibonacci sequence C. Merge sort D. Puzzle solving
6	A seenario where Dynaimic progrmming proves most useful	A. Problem withou overlapping sub problems B. Problems solved by making local choices C. Problems with overlapping sub problems and optimal sbstructure D. Problem divided into independent sub problems
7	The statement ghat applies to unsolvable problem	A. They can be solved in polynomial time B. They cannot be solved by any alogorithm C. They are always in NP class D. They require exponetial time to solve
8	Which is solved by Dynamic Programming.	A. Coin Change B. Fibonacci sequence C. Merge sort D. Puzzle solving
9	For which problems is Backtracing suitable.	A. Optimal substrcuture B. Explore all combinations C. ON optimal choice D. No overlapping problems
10	Easy to verify but hard to solve problem are in.	A. NP B. P C. NP hard D. Undecidable
11	NP Problems can be	A. Solved in polynomial time B. Verified in polynomial time C. Solved in exponeitial timeonly D. Not verified
12	The meanig of NP in computational complexity is.	A. Non deterministic polynomial time B. Negative polynomial time C. No trivial polynomial time D. Numerical polynomial time
13	What is the purpose of search algorithms	A. Arrange data B. Find secific data C. analyze nodes D. Save memory

14	How does Linear Search work.	A. Halve search interval B. Check each item one by oe C. Explore branch deeply D. Use queue for nodes
15	For which problems is Backtrackign suitable.	A. Optimal substructure B. Explore all combinations C. One optimal choice D. No overlapping problems
16	What does “input” mean in a computational problem.	A. Result after processing B. Steps to solve C. Data at start D. Type of problem
17	Why is tractability important.	A. Output color B. Language choice C. Solve efficiently D. Input type
18	How does Linear search work	A. Halve search interval B. Check each item one by one C. Explore branch deeply D. Use queue for nodes
19	Which is solved by dynamic programming.	A. Coin change B. Fibonacci sequence C. Merge sort D. Puzzle solving
20	How does Backtracking work.	A. Break in to parts B. Make local choices C. Build and backtrack D. Store subproblems