



INDIAN SCHOOL NIZWA - WORKSHEET

BIOLOGY

CH-13 PHOTOSYNTHESIS

Name: _____

Date: _____

Class: XI-A

- 1 Define the following: photolysis of water, LHC, photosystems
2. Draw the structure of chloroplast and label all parts
3. What is the difference between action spectrum and absorption spectrum?
- 4 What is cyclic photophosphorylation ? explain with a diagram
- 5 What is noncyclic photophosphorylation(Zscheme) ? explain with a diagram
- 6 Draw LHC .
- 7 What is chemiosmosis? What is proton gradient ? how is it formed? Write 3 reasons for the accumulation of H⁺ions more inside the lumen of the thylakoid membrane .
- 8 What is C₃ and C₄ pathway of photosynthesis?
- 9 What is RuBp ?
- 10 Explain Calvin cycle with a diagram
- 11 Explain Kranz anatomy . Why are C₄ plants more productive than C₃ plants?
- 12 Explain Hatch and Slack pathway with diagram
- 13 Photorespiration is a wasteful process. Explain.
- 14 State Blackman's law of limiting factors
- 15 Where is NADPH reductase located in the chloroplast ?what is the role of this enzyme ?
- 16 Six turns of Calvin cycle are required to generate one molecule of glucose . explain
- 17 What is RuBisCO enzyme ? why is RuBisCO enzyme the most abundant enzyme in the world?
- 18 Does the plant photosynthesise in moon light ? Why?



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