

Books

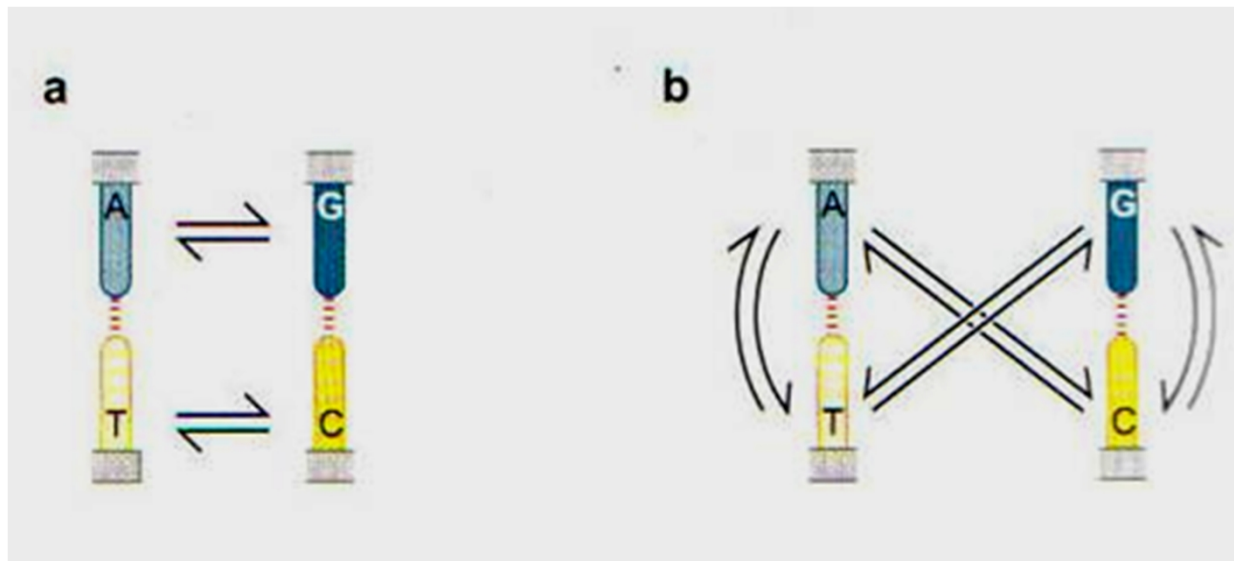
- Genes VII by B. Lewin, 7th edition.
- Molecular biology of the gene, J. Watson and others 3rd edition.
- General biochemistry books

How do mutations occur?

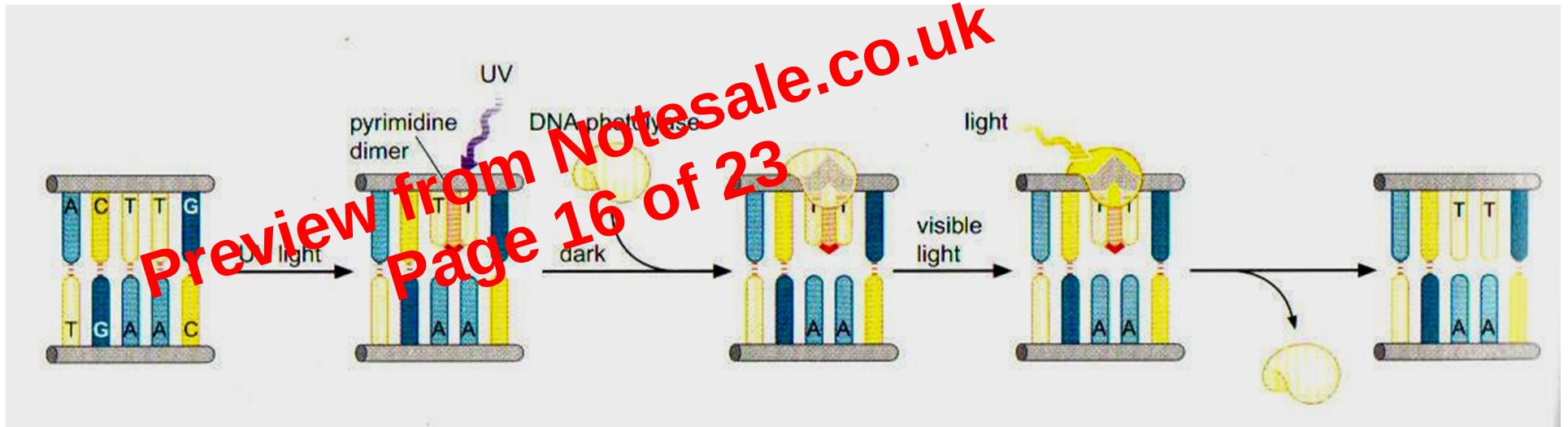
- Mis-incorporation of bases during DNA synthesis. Natural mutations at low rate.
 - a. Transitions – like with like, purine by purine, pyrimidine by pyrimidine
 - b. Transversions – purine by pyrimidine and vv

Purine

Pyrimidine



Using light to undo UV damage



- DNA photolyase harvests the energy in visible light
- Uses this energy to break the bonds in the cyclobutane ring