



Division of the History of Chemistry
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Citation for Chemical Breakthrough



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We wish to put forward a radically different structure for the salt of deoxyribose nucleic acid. This structure has two helical chains each coiled round the same axis (see diagram).

The novel feature of the structure is the manner in which the two chains are held together by the purine and pyrimidine bases.

..... it is found that only specific pairs of bases can bond together. These pairs are: adenine (purine) with thymine (pyrimidine), and guanine (purine) with cytosine (pyrimidine).

It has not escaped our notice that the specific pairing we have postulated immediately suggests a possible copying mechanism for the genetic material.

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