

them. DNA measurements which would support this hypothesis have been reported (Hayman *et al.* 1982).

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References

- Bloom, S. E., and Goodpasture, C. (1976). An improved technique for the selective silver staining of nucleolar organiser regions in human chromosomes. *Hum. Genet.* **34**, 199–206.
- Britten, R. J., and Kohne, D. (1968). Repeated sequences in DNA. *Science (Wash. D.C.)* **161**, 529–40.
- Grunstein, M., and Hogness, D. S. (1975). Colony hybridisation: A method for the isolation of cloned DNAs that contain a specific gene. *Proc. Natl Acad. Sci. (USA)* **72**, 3961–5.
- Hayman, D. L., Ashworth, L. K., and Carrano, A. V. (1982). The relative DNA contents of the eutherian and marsupial X chromosomes. *Cytogenet. Cell Genet.* **34**, 265–70.
- Hayman, D. L., and Rofe, R. H. (1977). Marsupial sex chromosomes. In 'Reproduction and Evolution'. (Eds J. H. Calaby and C. H. Tyndale-Biscoe.) pp. 69–79. 4th Int. Symp. Comp. Biol. Reprod. (Australian Academy of Science: Canberra.)
- Hayman, D. L., and Sharp, P. J. (1982). The chromosomes of *Tarsipes spencerae* Gray (Marsupialia). *Aust. J. Zool.* **30**, 799–803.
- Prensky, W. (1976). The radio-iodination of RNA and DNA to high specific activities. In 'Methods in Cell Biology'. (Ed. D. M. Prescott.) Ch. XIII. pp. 121–52. (Academic Press: New York.)
- Ross, J. (1976). A precursor of globin messenger RNA. *J. Mol. Biol.* **106**, 403.
- Vogelstein, B., and Gillespie, D. (1977). RNA-DNA hybridisation in solution without DNA reannealing. *Biochem. Biophys. Res. Comm.* **74**(4), 1127–32.

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