

**RFLP for the human erb-A1 gene**

S.H.Rider, C.J.Bailey, R.Voss, D.Sheer, L.R.Hiorns and E.Solomon

Imperial Cancer Research Fund, Lincoln's Inn Fields, London WC2A 3PX, UK

SOURCE / DESCRIPTION : 2.9 Kb. EcoRI / HindIII fragment subcloned from the original HE-A1 clone that was specific for V-erb-A sequences. (Jansson *et.al.* 1983).

POLYMORPHISM : PvuII identifies two alleles with bands at 2.0 Kb.(A1) and 1.2;0.8 Kb.(A2).

FREQUENCY : A1 2.0 Kb. 0.11  
 A2 1.2;0.8 Kb. 0.89

NOT POLYMORPHIC FOR : BamHI, EcoRI, HindIII, HinfI, KpnI, PstI, TaqI

CHROMOSOMAL LOCALIZATION : Human erb-A1 gene has been mapped to chromosome 17 (17q12 - q21). (Sheer *et.al.*, 1985).

MENDELIAN INHERITANCE : Allelic segregation was demonstrated for the PvuII polymorphism in two families. Somatic cell hybrids were also constructed between mouse cells and cells from an individual who was heterozygous (A1/A2) for the PvuII polymorphism. One hybrid containing a normal chromosome 17 as the only human component showed only the A1 allele.

PROBE AVAILABILITY : The probe was obtained on request from B.Vennstrom, EMBL, Heidelberg.

OTHER COMMENTS : An invariant band at 1.0 Kb. was also detected with this probe.

REFERENCE : Jansson, M., Philipson, L. and Vennstrom, B. (1983) *EMBO J.* 2 561-565. Sheer, D. *et.al.*, (1985) *Ann. Hum. Genet.* 49 167-171.

ACKNOWLEDGEMENTS : We thank B.Vennstrom for supplying the human erb-A1 probe.

