Correspondence

Aqueous humour lactic dehydrogenase isoenzymes in retinoblastoma

TO THE EDITOR, British Journal of Ophthalmology

SIR, Since submitting our paper for publication, we have become aware of additional relevant information we wish to bring to your attention.

We have had the opportunity to study two patients whose aqueous humour assays are at variance with our previously-reported findings. One patient, with histologically proved retinoblastoma had a total aqueous humour LDH of 2303 iu/l and a ratio LDH4: LDH3 of only 1.9. The other patient, with bilateral congenital/non-rhegmatogenous retinal detachment and no retinoblastoma, had total aqueous humour LDH levels of 194 and 19, and ratios LDH4: LDH3 of 24 and 30.

A recent paper (Swartz, Herbst, and Goldberg, 1974) supported the original hypothesis of Dias, Senthe Shanmuganathan, and Rajaratnam (1971) that retinoblastoma is associated with an elevated total aqueous humour LDH, and referred to a paper by Kaneko and Suzuki (1972) who found (as we did) that, although the total aqueous humour LDH was inconsistently raised in retinoblastoma, in seven cases all were associated with an elevated LDH4 isoenzyme (and to a lesser extent LDH2 and LDH3 fractions).

We believe that the aqueous humour LDH assay is currently a valuable diagnostic adjunct in the diagnosis of retinoblastoma, in that both an absolute elevation of the total aqueous humour LDH and a relative elevation of the slow isoenzyme fractions—that is, a shift to the right—appear to be suggestive but not diagnostic of retinoblastoma. We wish to encourage further experience with this test to resolve the inconsistencies in the literature, and to define more accurately the limits of reliability and scope of application of this biochemical assay.

Yours faithfully,

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References

KABAK, J., and ROMANO, P. E. (1975) Ibid., 59, 268

Notes

VII International Course in Ophthalmology

Barcelona, 15 to 20 May 1977

The VII International Course in Ophthalmology at the Barraquer Institute will be held in Barcelona at the Palacio de Congreso de Barcelona.

XI Congreso Argentino de Oftalmologia

Mar del Plata, Argentina, 2 to 8 November 1979

Further information may be obtained from Dr Hugo D. Nano, Secretario General, XI Congreso Argentino de Oftalmologia, Casilla de Correo 73617600 Mar del Plata, Argentina.