interactions and that these changes in *p*H sensitivity can occur even in the absence of cooperative oxygen binding. In *Amphiuma* haemoglobin the separation of heterotropic and homotropic interactions is much more evident than in most other haemoglobins. Further study along these lines should contribute to our understanding of the flexibility of haemoglobin function in response to environmental pressures.

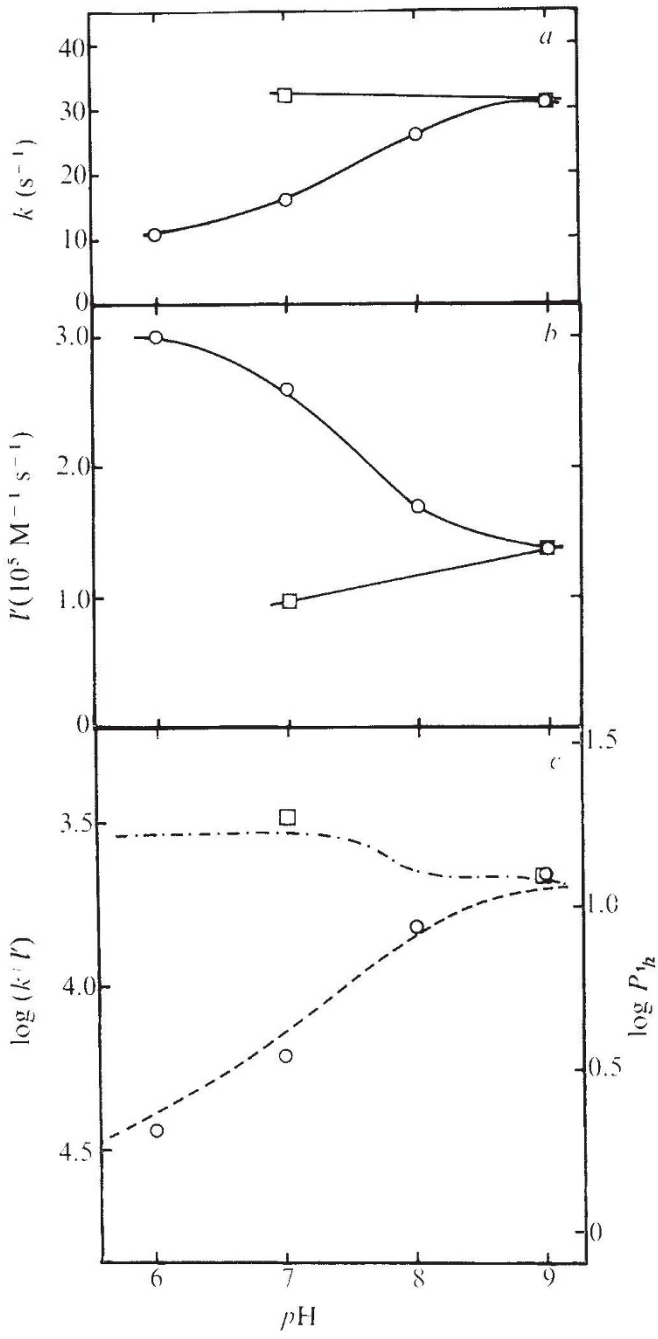

Fig. 3 Effect of *p*H on the apparent velocity constants at 20 C for oxygen dissociation (*a*) and CO combination (*b*) for stripped *Amphiuma* haemoglobin (○) and for the haemoglobin in the presence of 1 mM ATP (□). *c*, The log of the ratio of the kinetic constants (symbols) is compared to the equilibrium data of Fig. 1 (dashed lines).

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1 Antonini, E., and Brunori, M., *Haemoglobin and Myoglobin in their Reactions with Ligands* (North-Holland, Amsterdam and London, 1971).
2 Riggs, A. F., and Wolback, R. A., *J. gen. Physiol.*, **39**, 585–605 (1956).
3 Bonaventura, C., Sullivan, B., and Bonaventura, J., *J. biol. Chem.*, **249**, 3768–3775 (1974).
4 Perutz, M. F., *Nature*, **228**, 726–739 (1970).
5 Kilmartin, J. V., and Hewitt, J. A., *Cold Spring Harbor Symp. quant. Biol.*, **36**, 311–314 (1971).
6 Bonaventura, J., Bonaventura, C., Brunori, M., Giardina, B., Antonini, E., Bossa, F., and Wyman, J., *J. molec. Biol.*, **82**, 499–511 (1974).
7 Antonini, E., Wyman, J., Zito, R., Rossi-Fanelli, A., and Caputo, A., *J. biol. Chem.*, **236**, 60–63 (1961).
8 Sullivan, B., *Chemical Zool.*, **9**, ch. 5, 77–122 (1974).
9 Watt, K. W. K., and Riggs, A., *J. biol. Chem.*, **250**, 5934–5944 (1975).

Errata

In 'Release of substance P from isolated nerve endings' by Christina Schenker, Edmund A. Mroz and Susan E. Leeman (*Nature*, **264**, 791, 1976), line 9 should read . . . not be released by high K^+ in the presence of Ca^{2+} . . .

In 'Significant journals of science' by E. Garfield (*Nature*, **264**, 609–15), on page 610, in Fig. 1*a*, the headings of the three columns to the right of the column of journal titles should read D, E and F. On page 612, in Fig. 2*a*, the column headings A, B and C should appear above the three columns on the left. On page 614, in the legend for Fig. 3, the definition of column D shown read "number of 1974 articles".