## *ADDENDUM*

The recent publication of much-needed data on the exchange of hemes between hemoglobin molecules (Bunn, H. F., and J. H. Jandl, these PROCEEDINGS, **56,** 974 (1966)) clearly shows that this reaction cannot play a role in the type of hemoglobin exchange reactions with which we have been concerned (Benesch, R. E., R. Benesch, and G. Macduff, these PROCEEDINGS, **54,** 535–542 (1965), and Benesch, R., R. E. Benesch, and I. Tyuma, these PROCEEDINGS, **56,** 1268–1274 (1966)). The most clear-cut difference between the two phenomena is that heme exchange is entirely prevented by cyanide, whereas subunit exchange between ferri- and ferrohemoglobin proceeds at least as well in the presence of cyanide as in its absence. Furthermore, the rates of the two reactions are of a different order of magnitude, since subunit exchange is complete in a matter of a few minutes whereas several hours are required for heme exchange. Finally, again in sharp contrast to the subunit exchange, heme exchange is unaffected by the ionic strength of the medium.