TABLE I

$KBrO_3$, 20.5; KI, 98.67; HCl. 95.15; Vol., 250 cc; Temp., 30° C.

t	Cr	x	x'	R_o	Ac/Cr	t	Cr	x	x'	R_o	Ac/Cr
5	0	0.19	0.19	0.038	—	10	0	0.38	0.385	0.038	—
5	2	0.35	0.354	0.071	0.017	10	2	0.70	0.71	0.071	0.016
5	4	0.50	0.505	0.10	0.015	10	4	0.95	0.97	0.097	0.015
5	6	0.65	0.659	0.13	0.015	10	6	1.25	1.28	0.13	0.015
5	10	0.97	0.98	0.20	0.016	10	10	1.92	1.99	0.20	0.016
5	12	1.17	1.20	0.24	0.017	10	12	2.30	2.40	0.24	0.017
5	14	1.29	1.33	0.27	0.016	10	14	2.55	2.67	0.27	0.018
5	16	1.48	1.52	0.30	0.016	10	16	2.90	3.14	0.31	0.017
5	18	1.64	1.70	0.34	0.017	10	18	3.22	3.39	0.34	0.016
5	20	1.83	1.89	0.38	0.017	10	20	3.55	3.77	0.38	0.017

values of x' for $t = 10$ are just double those for $t = 5$, therefore no perceptible diminution in the concentration of the bichromate (reduction) can have occurred in the interval. In the second, the rate of liberation of iodine (R_o) is not proportional to the concentration of bichromate, but the acceleration:

$$Ac = R_o - R_o(Cr = 0)$$

is; this is shown by the constancy of the quotient Ac/Cp, and graphically in Fig 1. The experiments of Table II, more-

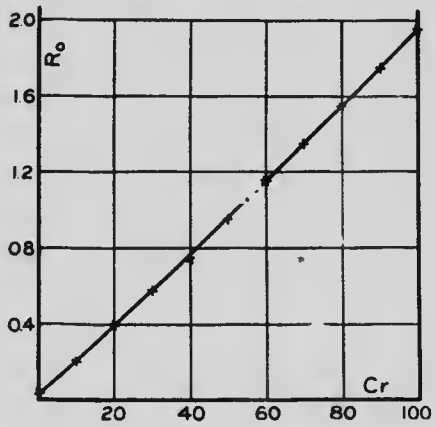

Fig. 1