

Microbial and Enzyme Kinetics Tutorial 1A

1. An enzymatic assay was carried under two different sets of conditions out using a pure substrate S. The results are tabulated below.

[S]/ 10 ⁻⁵ M	V _o	
	Condition A	Condition B
1.5	0.21	0.08
2.0	0.25	0.1
3.0	0.28	0.12
4.0	0.33	0.13
8.0	0.44	0.16
16.0	0.40	0.18

- Plot the data using the Lineweaver-Burke plot
- Calculate the values of V_{max} and K_m for both sets of conditions
- Suggest possible reasons why the two sets of results might be different.