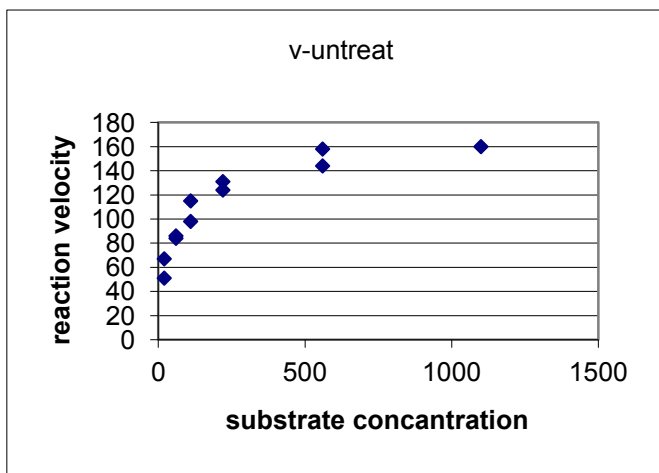
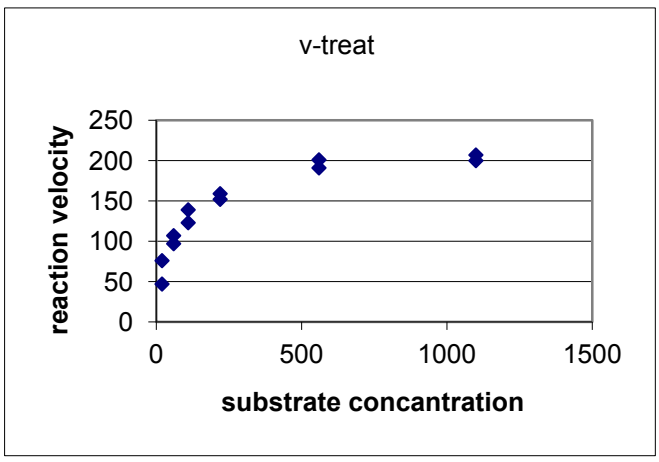


Popis

s	v-treat	v-untreat
20	76	67
20	47	51
60	97	84
60	107	86
110	123	98
110	139	115
220	159	131
220	152	124
560	191	144
560	201	158
1100	207	160
1100	200	

Kinetika enzymatické reakce: rovnice Michaelis-Menteno



vé

$$v = \frac{V_{\max} \times s}{K_m + s}$$

v reaction velocity
V_{max} maximal velocity
s substrate concentration
K_m Michaelis' constant

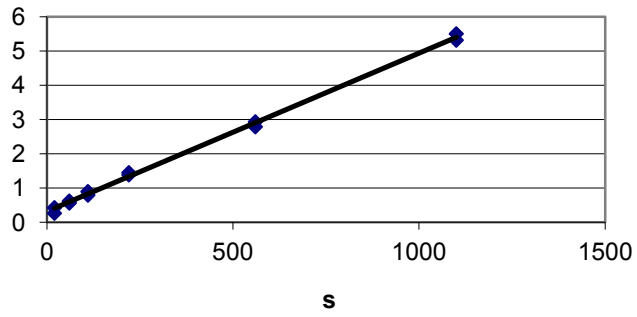
s	v-treat	v-untreat
20	76	67
20	47	51
60	97	84
60	107	86
110	123	98
110	139	115
220	159	131
220	152	124
560	191	144
560	201	158
1100	207	160
1100	200	

s	s/v (treat)	s/v (untreat)
20	0.263158	0.298507
20	0.425532	0.392157
60	0.618557	0.714286
60	0.560748	0.697674
110	0.894309	1.122449
110	0.791367	0.956522
220	1.383648	1.679389
220	1.447368	1.774194
560	2.931937	3.888889
560	2.78607	3.544304
1100	5.31401	6.875
1100	5.5	

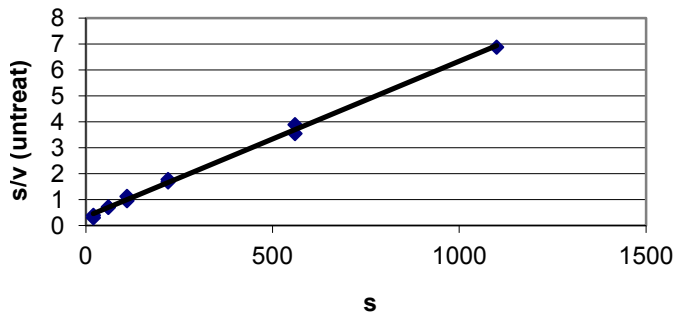
s/v (treat)

s/v (untreat)

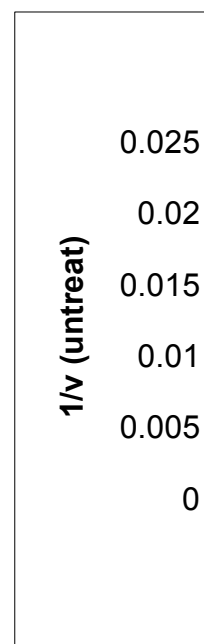
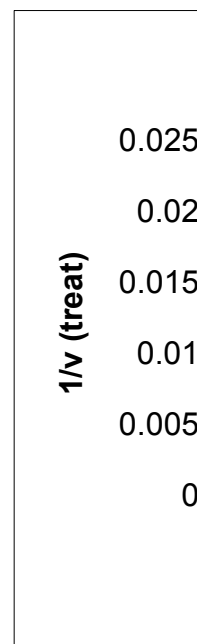
Hane's plot



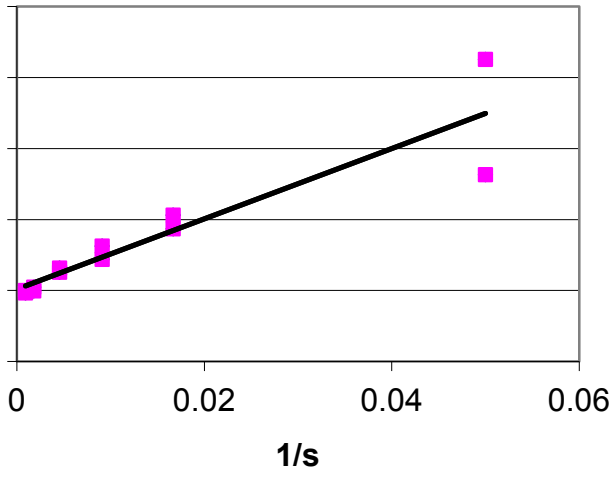
Hane's plot



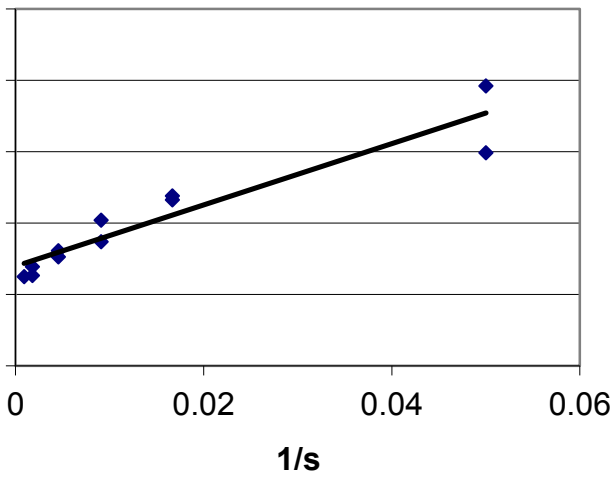
s	v-treat	v-untreat	1/s	1/v (treat)	1/v (untreat)
20	76	67	0.05	0.013158	0.014925
20	47	51	0.05	0.021277	0.019608
60	97	84	0.016667	0.010309	0.011905
60	107	86	0.016667	0.009346	0.011628
110	123	98	0.009091	0.00813	0.010204
110	139	115	0.009091	0.007194	0.008696
220	159	131	0.004545	0.006289	0.007634
220	152	124	0.004545	0.006579	0.008065
560	191	144	0.001786	0.005236	0.006944
560	201	158	0.001786	0.004975	0.006329
1100	207	160	0.000909	0.004831	0.00625
1100	200		0.000909	0.005	



Lineweaver-Burk



Lineweaver-Burk



inhibitor	konc. substrátu (s)	rychlost (v)	s/v
ano	20	76	0.263158
ano	20	47	0.425532
ano	60	97	0.618557
ano	60	107	0.560748
ano	110	123	0.894309
ano	110	139	0.791367
ano	220	159	1.383648
ano	220	152	1.447368
ano	560	191	2.931937
ano	560	201	2.78607
ano	1100	207	5.31401
ano	1100	200	5.5
ne	20	67	0.298507
ne	20	51	0.392157
ne	60	84	0.714286
ne	60	86	0.697674
ne	110	98	1.122449
ne	110	115	0.956522
ne	220	131	1.679389
ne	220	124	1.774194
ne	560	144	3.888889
ne	560	158	3.544304
ne	1100	160	6.875

