

Appendix - 5 : Individual data on changes in protein and CNP with age.

rat no.	body weight (g)	brain weight (g)	protein (mg/g)		CNP (μ moles/min/mg protein)	
			GM	WM	GM	WM
1	2	3	4	5	6	7
<u>14 days old</u>						
1	36	1.405	78	81	3.1	20.6
2	34	1.352				
3	33	1.295				
4	35	1.341				
5	36	1.367	85	78	3.2	20.6
6	36	1.385				
7	34	1.955				
8	36	1.360	82	76	2.8	20.3
9	34	1.384				
10	34	1.415				
11	37	1.445	86	79	2.8	19.8
<u>16 days old</u>						
12	42	1.511				
13	37	1.442	93	77	2.7	23.0
14	38	1.425				

contd...

Appendix - 5 : contd.

1	2	3	4	5	6	7
15	39	1.442				
16	41	1.462	93	76	2.8	18.6
17	36	1.385				
18	41	1.443				
19	37	1.447	93	88	2.9	18.6
20	39	1.488				
21	38	1.483				
22	41	1.504	92	83	3.1	17.6
<u>18 days old</u>						
23	51	1.480				
24	46	1.425	95	91	3.0	20.5
25	47	1.450				
26	46	1.435				
27	51	1.482	94	90	2.8	20.3
28	50	1.473				
29	52	1.500				
30	30	1.500	90	82	2.5	21.0
31	53	1.490				
32	57	1.535	89	76	2.6	19.0
						contd...

Appendix - 5 : contd.

1	2	3	4	5	6	7
<u>21 days old</u>						
33	53	1.482	105	101	2.7	19.9
34	51	1.476				
35	52	1.460				
36	62	1.520				
37	60	1.496	101	108	2.5	21.0
38	64	1.525				
39	64	1.562				
40	65	1.570	92	101	2.7	21.3
41	60	1.548				
42	68	1.575	90	103	2.8	21.3
<u>30 days old</u>						
43	135	1.810				
44	115	1.505	96	102	3.3	19.2
45	118	1.652				
46	132	1.785	93	94	3.3	18.9
47	130	1.740				
48	131	1.745	102	103	2.9	21.1

contd...

Appendix - 5 : contd.

1	2	3	4	5	6	7
49	135	1.810	106	96	3.0	19.1
50	116	1.662				
51	245	1.852	99	95	3.5	20.9
52	253	1.932				
53	242	1.837	100	97	3.6	20.4
54	247	1.871				
55	240	1.860	101	93	3.5	20.8
56	267	1.975				
57	260	1.955	98	93	3.1	20.4
58	250	1.888				
<u>90 days old</u>						
59	315	1.900	105	96	3.7	18.6
60	319	1.907				
61	296	1.789	102	94	3.5	17.6
62	327	1.995				
63	334	2.118	103	94	3.4	19.6
64	306	1.860				
65	324	2.013	105	96	3.1	19.4
66	323	1.952				

Appendix - 5(a) : Individual data on protein and CNP with undernutrition.

rat no.	body weight (g)	brain weight (g)	protein (mg/g) total homogenate		CNP (μ moles/min/mg protein total homogenate)	
			GM	WM	GM	WM
1	2	3	4	5	6	7
CONTROL (C) GROUP						
67	42	1.420				
68	41	1.410	111	95	3.6	21.5
69	43	1.440				
70	46	1.465				
71	42	1.460				
72	43	1.523	113	93	5.8	24.8
73	43	1.510				
74	42	1.450				
75	43	1.442				
76	47	1.514	102	85	4.8	24.5
77	44	1.411				
78	41	1.430				
79	42	1.491				
80	44	1.468	107	97	3.7	20.5
81	42	1.443				

contd...

Appendix - 5(a) : contd.

1	2	3	4	5	6	7
82	15.0	1.067				
83	14.0	1.132	103	99	2.91	10.3
84	14.0	1.185				
85	14.0	1.001				
86	12.5	1.103	106	94	2.70	11.9
87	13.0	1.022				
88	10.5	1.140				
89	11.0	1.133	103	88	2.98	13.6
90	13.0	1.102				

Appendix - 5(b) : Individual data on protein and CNP with thiamine deficiency.

rat no.	body weight (g)	tissue weight		protein (mg/g)		CNP (umoles/min/mg protein)		transketolase (umoles/g/h)	
		brain (g)	sp.cord (mg)	brain (g)	sp.cord	brain	sp.cord	brain	sp.cord
1	2	3	4	5	6	7	8	9	10
CONTROL (C) GROUP									
91	50	1.454	185	110	101	-	6.14	25.5	25.3
92	45	1.480	155	123	121	7.44	4.64	27.0	23.4
93	46	1.370	176	130	124	7.30	4.40	24.0	28.0
94	57	1.460	170	128	113	7.58	5.50	33.0	20.9
95	40	1.400	150	112	113	7.86	5.13	30.7	23.2
96	49	1.460	155	124	110	7.64	5.39	27.0	21.5
97	53	1.470	165	131	119	7.04	5.19	-	22.5
98	53	1.480	175	-	113	-	5.43	30.4	24.1
PAIR FED CONTROL (PFC) GROUP									
99	20.0	1.165	125	126	109	7.00	5.62	26.1	22.5
100	19.0	1.225	125	115	94	6.66	6.26	31.1	21.9
101	18.5	1.180	121	118	121	7.52	5.02	24.8	23.0
102	18.5	1.170	120	110	116	7.38	5.36	25.2	20.3

contd...

Appendix - 5(b) : contd.

1	2	3	4	5	6	7	8	9	10
THIAMINE DEFICIENT (TD) GROUP									
103	13.0	1.000	100	120	111	7.46	-	17.7	12.4
104	13.0	1.010	104	128	108	6.78	4.72	10.2	16.2
105	16.0	1.045	113	128	110	6.52	5.80	5.89	12.7
106	15.0	1.065	110	123	101	7.54	5.26	10.4	16.4
107	18.0	1.115	113	115	98	7.64	6.24	17.7	15.6
108	17.5	1.050	105	118	96	7.94	6.04	11.7	14.2
109	12.0	0.960	85	121	103	7.50	5.74	17.7	12.0
110	16.0	1.108	100	-	112	-	5.14	6.74	15.8
rat no.	body weight (g)	brain weight (g)	protein (mg/g)		GNP (µmoles/min/mg protein)		transketolase (µmoles/g/h)		
			GM	WM	GM	WM	GM	WM	WM
1	2	3	4	5	6	7	8	9	9
CONTROL (C) GROUP									
111	46	1.452	107	106	3.40	22.3	19.0	22.5	
112	44	1.415							

contd...

Appendix - 5(b) : contd.

1	2	3	4	5	6	7	8	9
113	46	1.470	118	116	3.00	20.0	-	-
114	50	1.430						22.8
115	52	1.429	122	116	3.40	20.4	15.2	22.8
116	51	1.435						
117	45	1.397	121	120	-	20.6	19.8	21.3
118	42	1.355						
PAIR FED CONTROL (PFC) GROUP								
119	18	1.210	110	109	3.51	19.4	15.5	17.0
120	20	1.205						
121	17	1.183	124	114	2.86	20.4	19.0	16.6
122	20	1.210						
THIAMINE DEFICIENT (TD) GROUP								
123	13	1.095	120	111	2.92	20.9	7.05	7.06
124	17	1.175						
125	15	1.087	123	117	2.88	20.7	5.30	10.8
126	14	1.075						
127	16	1.115	118	111	3.52	22.4	7.05	8.03
128	19	1.205						