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APPENDIX

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
A	Sham II	7	23	80.7609	1.2155	1.5051
A	Sham II	7	25	76.0181	0.3784	0.4978
A	Sham II	14	19	77.9960	0.3848	0.4934
A	Sham II	14	21	82.7433	0.6423	0.7763
A	Sham II	21	24	100.3259	0.6872	0.6816
A	Sham II	21	18	92.4581	0.7327	0.7925
A	P 0.01	7	34	137.7055	1.0474	0.7606
A	P 0.01	7	31	96.0575	0.9565	0.9958
A	P 0.01	14	30	90.4642	0.4427	0.4894
A	P 0.01	14	35	110.5685	0.6269	0.5670
A	P 0.01	21	32	94.0686	0.9586	1.0190
A	P 0.01	21	29	138.4550	0.8082	0.5837
A	Es 0.01	7	37	124.7135	0.9262	0.7427
A	Es 0.01	7	39	129.9572	0.5185	0.3990
A	Es 0.01	14	36	94.4165	0.6892	0.7300
A	Es 0.01	14	40	74.5099	0.0707	0.0949
A	Es 0.01	21	38	107.8637	1.0086	0.9351
A	Es 0.01	21	43	92.1679	0.0869	0.0943
A	P 0.1	7	44	77.9202	0.3321	0.4262
A	P 0.1	7	48	101.4785	2.5242	2.4874
A	P 0.1	14	50	98.8493	0.8972	0.9076
A	P 0.1	14	46	128.9533	0.7778	0.6032
A	P 0.1	21	47	114.6901	0.6812	0.5939
A	P 0.1	21	51	134.7183	0.7624	0.5660

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
A	Es 0.1	7	54	90.1833	0.3155	0.3498
A	Es 0.1	7	57	93.9109	0.1966	0.2093
A	Es 0.1	14	59	84.1413	0.3720	0.4421
A	Es 0.1	14	52	124.8113	1.3810	1.1065
A	Es 0.1	21	55	127.0137	0.8516	0.6705
A	Es 0.1	21	53	90.3249	0.5965	0.6604
A	PII 0.1	7	63	110.7551	0.3828	0.3456
A	PII 0.1	7	66	75.2882	0.4533	0.6021
A	PII 0.1	14	61	73.9130	0.1686	0.2281
A	PII 0.1	14	67	82.4856	0.3107	0.3767
A	PII 0.1	21	64	75.1764	0.5034	0.6696
A	PII 0.1	21	65	68.9732	0.1427	0.2069
A	EsII0.1	7	74	86.6211	0.4854	0.5604
A	EsII0.1	7	71	112.9642	0.6157	0.5450
A	EsII0.1	14	68	89.1671	0.7671	0.8603
A	EsII0.1	14	75	96.1172	0.4132	0.4299
A	EsII0.1	21	69	101.4772	0.4623	0.4556
A	EsII0.1	21	72	155.0738	1.1591	0.7475
A	P 0.2	7	79	97.3472	0.6019	0.6183
A	P 0.2	7	85	99.0259	0.4568	0.4613
A	P 0.2	14	77	86.9744	0.5231	0.6014
A	P 0.2	14	81	79.8453	0.7233	0.9059
A	P 0.2	21	80	144.6107	1.2415	0.8585
A	P 0.2	21	82	82.5003	0.2917	0.3536

Group	TRT		Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
A	Es 0.2	7	89	90.8137	0.5777	0.6361
A	Es 0.2	7	87	85.7466	0.2840	0.3312
A	Es 0.2	14	95	100.9001	0.2840	0.7832
A	Es 0.2	14	94	99.4979	0.8039	0.8080
A	Es 0.2	21	93	137.9264	1.3466	0.9763
A	Es 0.2	21	92	96.1563	0.6769	0.7040
A	P 0.4	7	96	77.7692	0.5023	0.6459
A	P 0.4	7	99	73.0382	0.4693	0.6425
A	P 0.4	14	103	92.4605	2.6712	2.8890
A	P 0.4	14	104	95.3378	0.4772	0.5005
A	P 0.4	21	97	98.9422	0.6489	0.6558
A	P 0.4	21	102	86.8314	0.6118	0.7046
A	Es 0.4	7	112	137.3389	0.6019	0.4383
A	Es 0.4	7	113	107.4321	1.1182	1.0484
A	Es 0.4	14	108	74.5016	0.6299	0.8455
A	Es 0.4	14	111	71.8651	0.3062	0.4261
A	Es 0.4	21	110	136.2856	3.2730	2.4016
A	Es 0.4	21	107	102.6522	1.1145	1.0857
B	Initial	0	g	58.2373	0.2172	0.3730
B	Initial	0	h	56.8167	0.1615	0.2842
B	Control	7	116	79.6215	0.2271	0.2852
B	Control	7	119	76.3616	0.2947	0.3859
B	Control	14	114	60.7954	0.1048	0.1724
B	Control	14	117	70.9405	0.1475	0.2079
B	Control	21	115	46.2381	0.2489	0.5383
B	Control	21	118	62.7429	0.1918	0.3057

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
B	Sham I	7	128	72.3986	0.2768	0.3823
B	Sham I	7	129	82.0729	0.2509	0.3057
B	Sham I	14	123	91.7119	0.7274	0.7931
B	Sham I	14	127	58.1065	0.1792	0.3084
B	Sham I	21	122	80.7496	0.8205	1.0161
B	Sham I	21	124	71.1132	0.3377	0.4749
B	P 0.1	7	139	62.5436	0.5968	0.9542
B	P 0.1	7	143	81.4155	0.6476	0.7954
B	P 0.1	14	138	77.4697	0.3051	0.3938
B	P 0.1	14	145	53.9636	0.2757	0.5190
B	P 0.1	21	140	85.4597	0.4591	0.5372
B	P 0.1	21	144	81.1104	1.2120	1.4943
B	Es 0.1	7	158	89.9162	0.3228	0.3590
B	Es 0.1	7	159	82.6212	0.9469	1.1461
B	Es 0.1	14	157	90.4585	0.4132	0.4568
B	Es 0.1	14	156	83.5542	0.4700	0.5625
B	Es 0.1	21	154	82.9674	0.7671	0.9246
B	Es 0.1	21	160	80.5944	0.4831	0.5994
B	PII 0.1	7	131	62.9356	0.2425	0.3853
B	PII 0.1	7	133	66.1913	0.1782	0.2692
B	PII 0.1	14	130	82.4282	0.4279	0.5191
B	PII 0.1	14	134	68.7192	0.2486	0.3618
B	PII 0.1	21	136	75.5467	0.8257	1.0930
B	PII 0.1	21	137	71.9555	0.3001	0.4171

Appendix 1 Data of the effect of hormones on the ovarian development of Penaeus monodon.

Group A from Khlong Cone, extensive reared prawns

Group B from Samut Sakorn, extensive reared prawns

Group C from Chon Buri, wild coastal prawns.

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
A	Initial	0	a	144.3219	1.1416	0.7910
A	Initial	0	b	103.1343	0.7218	0.6999
A	Initial	0	c	148.1477	1.0416	0.7031
A	Initial	0	d	106.4379	1.0705	1.0058
A	Initial	0	e	123.6016	1.3092	1.0592
A	Initial	0	f	104.0062	0.7221	0.6943
A	Control	7	2	110.7961	0.6143	0.5544
A	Control	7	3	102.9458	0.3594	0.3491
A	Control	14	1	105.7536	0.3540	0.3347
A	Control	14	4	82.2649	0.1813	0.2204
A	Control	21	5	82.4336	0.4820	0.5847
A	Control	21	8	110.9846	4.7871	4.3133
A	Sham I	7	9	77.8899	0.1423	0.1827
A	Sham I	7	10	115.3607	0.4151	0.3598
A	Sham I	14	14	120.8721	0.4313	0.3568
A	Sham I	14	16	96.3770	0.5930	0.6153
A	Sham I	21	11	157.5241	1.0382	0.6591
A	Sham I	21	12	91.0140	0.4538	0.4986

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
B	EsIIO.1	7	148	80.0023	0.2610	0.3262
B	EsIIO.1	7	153	67.5613	0.1636	0.2422
B	EsIIO.1	14	146	63.3841	0.2597	0.4097
B	EsIIO.1	14	149	59.3130	0.3143	0.5299
B	EsIIO.1	21	150	71.9840	0.5796	0.8052
B	EsIIO.1	21	151	100.8622	0.7591	0.7526
C	Initial	0	i	85.1000	0.4690	0.5511
C	Initial	0	j	80.0000	0.2921	0.3651
C	Initial	0	k	75.9000	0.4238	0.5511
C	Initial	0	l	102.0000	0.5753	0.5607
C	Control	7	162	98.0000	0.3007	0.3068
C	Control	7	163	80.0000	0.2539	0.3174
C	Control	7	164	120.0000	0.3606	0.3005
C	Control	7	165	80.0000	0.2881	0.3601
C	Sham I	7	166	83.0000	0.4007	0.4828
C	Sham I	7	167	105.0000	0.7087	0.6750
C	Sham I	7	168	90.0000	0.2754	0.3060
C	Sham I	7	169	84.0000	0.2360	0.2810
C	P 0.01	7	170	64.0000	0.2901	0.4533
C	P 0.01	7	171	100.0000	0.2902	0.2902
C	P 0.01	7	172	85.0000	0.4519	0.5316
C	P 0.01	7	173	70.0000	0.4064	0.5806
C	Es 0.01	7	174	93.0000	0.9525	1.0242

Group	TRT	Day	Num	Body Weight (g)	Gonad Weight (g)	G.I. (%)
C	Es 0.01	7	175	73.0000	0.3606	0.4940
C	Es 0.01	7	176	69.0000	0.4344	0.6296
C	Es 0.01	7	177	105.0000	0.5238	0.4989
C	P 0.1	7	178	120.0000	0.7195	0.5996
C	P 0.1	7	179	75.0000	0.2699	0.3599
C	P 0.1	7	180	129.0000	0.9464	0.7336
C	P 0.1	7	181	135.0000	0.9074	0.6721
C	Es 0.1	7	182	71.0000	0.1471	0.2072
C	Es 0.1	7	183	98.0000	0.5354	0.5463
C	Es 0.1	7	184	68.0000	0.2788	0.4100
C	Es 0.1	7	185	94.0000	0.2540	0.2702



BIODATA

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