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ศูนย์ศึกษาศรีพยาบาล
จุฬาลงกรณ์มหาวิทยาลัย

ภาคผนวก ก

ANALYSIS OF VARIANCE TABLE

1. Ar - Pog by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	1891.537	2	945.769	28.234	0.000
SEX	1277.269	1	1277.269	38.142	0.000
ERUPTION	614.269	1	614.269	18.343	0.000
2-WAY INTERACTIONS	84.169	1	84.169	2.513	0.116
SEX ERUPTION	84.169	1	84.169	2.513	0.116
RESIDUAL	3884.493	116	33.487		
TOTAL	5860.199	119	49.245		

* $\alpha = .01$

2. Postp - Pog by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	975.787	2	487.894	20.336	0.000
SEX	548.269	1	548.269	22.853	0.000
ERUPTION	427.519	1	427.519	17.820	0.000
2-WAY INTERACTIONS	21.252	1	21.252	0.886	0.349
SEX ERUPTION	21.252	1	21.252	0.886	0.349
RESIDUAL	2782.978	116	23.991		
TOTAL	3780.018	119	31.765		

* $\alpha = .01$

3. Go - Pog by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	994.567	2	497.283	22.931	0.000
SEX	598.533	1	598.533	27.600	0.000
ERUPTION	396.033	1	396.033	18.262	0.000
2-WAY INTERACTIONS	14.700	1	14.700	0.678	0.412
SEX ERUPTION	14.700	1	14.700	0.678	0.412
RESIDUAL	2515.588	116	21.686		
TOTAL	3524.854	119	29.621		

* $\alpha = .01$

4. Go - Me by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	854.504	2	427.252	20.230	0.000
SEX	583.002	1	583.002	27.605	0.000
ERUPTION	271.502	1	271.502	12.855	0.000
2-WAY INTERACTIONS	26.602	1	26.602	1.260	0.264
SEX ERUPTION	26.602	1	26.602	1.260	0.264
RESIDUAL	2449.879	116	21.120		
TOTAL	3330.985	119	27.991		

* $\alpha = .01$

5. $X_i - D_7$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	364.537	2	182.269	19.377	0.000
SEX	2.269	1	2.269	0.241	0.624
ERUPTION	362.269	1	362.269	38.513	0.000
2-WAY INTERACTIONS	0.469	1	0.469	0.050	0.824
SEX ERUPTION	0.469	1	0.469	0.050	0.824
RESIDUAL	1091.130	116	9.406		
TOTAL	1456.136	119	12.236		

* $\alpha = .01$ 6. $Abr - D_7$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	861.121	2	430.560	166.161	0.0
SEX	15.769	1	15.769	6.085	0.015
ERUPTION	845.352	1	845.352	326.237	0.0
2-WAY INTERACTIONS	6.769	1	6.769	2.612	0.109
SEX ERUPTION	6.769	1	6.769	2.612	0.109
RESIDUAL	300.581	116	2.591		
TOTAL	1168.471	119	9.819		

* $\alpha = .01$

7. MD₇ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	0.333	2	0.167	0.708	0.495
SEX	0.300	1	0.300	1.275	0.261
ERUPTION	0.033	1	0.033	0.142	0.707
2-WAY INTERACTIONS	0.833	1	0.833	1.652	0.181
SEX ERUPTION	0.833	1	0.833	1.652	0.181
RESIDUAL	27.300	116	0.235		
TOTAL	28.466	119	0.239		

* $\alpha = .01$ 8. MD₈ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	0.771	2	0.385	1.392	0.253
SEX	0.019	1	0.019	0.068	0.795
ERUPTION	0.752	1	0.752	2.717	0.102
2-WAY INTERACTIONS	3.852	1	3.852	13.917	0.000
SEX ERUPTION	3.852	1	3.852	13.917	0.000
RESIDUAL	32.108	116	0.277		
TOTAL	36.731	119	0.309		

* $\alpha = .01$

9. MP - LA₈ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	34489.270	2	17244.633	104.223	0.0
SEX	63.802	1	63.802	0.386	0.536
ERUPTION	34425.465	1	34425.465	208.061	0.0
2-WAY INTERACTIONS	6.770	1	6.770	0.041	0.840
SEX ERUPTION	6.769	1	6.769	0.041	0.840
RESIDUAL	19193.191	116	165.459		
TOTAL	53689.230	119	451.170		

* $\alpha = .01$

10. MP - IiPog by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	145.500	2	72.750	2.388	0.098
SEX	86.700	1	86.700	2.846	0.094
ERUPTION	58.800	1	58.800	1.930	0.167
2-WAY INTERACTIONS	75.208	1	75.208	2.469	0.119
SEX ERUPTION	75.208	1	75.208	2.469	0.119
RESIDUAL	3533.903	116	30.465		
TOTAL	2754.612	119	31.551		

* $\alpha = .01$

11. MP - ArGn by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	33.037	2	16.519	1.380	0.256
SEX	31.519	1	31.519	2.633	0.107
ERUPTION	1.519	1	1.519	0.127	0.722
2-WAY INTERACTIONS	42.602	1	42.602	3.559	0.062
SEX ERUPTION	42.602	1	42.602	3.559	0.062
RESIDUAL	1388.380	116	11.969		
TOTAL	1464.020	119	12.303		

* $\alpha = .01$

12. MP - OP by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	63.104	2	31.552	1.933	0.149
SEX	5.002	1	5.002	0.306	0.581
ERUPTION	58.102	1	58.102	3.560	0.062
2-WAY INTERACTIONS	84.169	1	84.169	5.156	0.025
SEX ERUPTION	84.169	1	84.169	5.156	0.025
RESIDUAL	1893.461	116	16.323		
TOTAL	2040.734	119	17.149		

* $\alpha = .01$

13. MP - LA₇ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	117.142	2	58.571	1.528	0.221
SEX	48.133	1	48.133	1.256	0.265
ERUPTION	69.008	1	69.008	1.801	0.182
2-WAY INTERACTIONS	44.408	1	44.408	1.159	0.284
SEX ERUPTION	44.408	1	44.408	1.159	0.284
RESIDUAL	4445.109	116	38.320		
TOTAL	4606.660	119	38.711		

* $\alpha = .01$ 14. MP - LA₁ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	588.767	2	294.483	6.278	0.003
SEX	163.333	1	163.333	3.482	0.065
ERUPTION	425.633	1	425.633	9.074	0.003
2-WAY INTERACTIONS	288.300	1	288.300	6.146	0.015
SEX ERUPTION	288.300	1	288.300	6.146	0.015
RESIDUAL	5441.402	116	46.909		
TOTAL	6318.672	119	53.098		

* $\alpha = .01$

15. MP - OS₈ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	37438.836	2	18719.418	111.741	0.0
SEX	3.169	1	3.169	0.019	0.891
ERUPTION	37435.668	1	37435.668	223.463	0.0
2-WAY INTERACTIONS	2.270	1	2.270	0.014	0.908
SEX ERUPTION	2.269	1	2.269	0.014	0.908
RESIDUAL	19432.883	116	167.525		
TOTAL	56873.988	119	477.933		

* $\alpha = .01$ 16. LA₈ - L by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	40393.348	2	20196.672	122.560	0.0
SEX	213.867	1	213.867	1.298	0.257
ERUPTION	40179.480	1	40179.480	243.822	0.0
2-WAY INTERACTIONS	21.508	1	21.508	0.131	0.719
SEX ERUPTION	21.505	1	21.505	0.131	0.719
RESIDUAL	19115.652	116	164.790		
TOTAL	59530.508	119	500.256		

* $\alpha = .01$

17. $\frac{Abr - D_7}{MD_8} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	73330.875	2	36665.438	170.469	0.0
SEX	1085.212	1	1085.212	5.045	0.027
ERUPTION	72245.625	1	72245.625	335.893	0.0
2-WAY INTERACTIONS	6.250	1	6.250	0.029	0.865
SEX ERUPTION	6.274	1	6.274	0.029	0.865
RESIDUAL	24949.875	116	215.085		
TOTAL	98287.000	119	825.941		

* $\alpha = .01$

18. $\frac{Xi - D_7}{Ar - Pog} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	163.558	2	81.779	16.586	0.000
SEX	35.196	1	35.196	7.138	0.009
ERUPTION	128.362	1	128.362	26.034	0.000
2-WAY INTERACTIONS	0.723	1	0.723	0.147	0.702
SEX ERUPTION	0.723	1	0.723	0.147	0.702
RESIDUAL	571.948	116	4.931		
TOTAL	736.229	119	6.187		

* $\alpha = .01$



19. $\frac{Xi - D_7}{Postp - Pog} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	241.762	2	120.881	14.066	0.000
SEX	44.664	1	44.664	5.197	0.024
ERUPTION	197.098	1	197.098	22.935	0.000
2-WAY INTERACTIONS	0.322	1	0.322	0.037	0.847
SEX ERUPTION	0.322	1	0.322	0.037	0.847
RESIDUAL	996.886	116	8.594		
TOTAL	1238.969	119	10.412		

* $\alpha = .01$

20. $\frac{Xi - D_7}{Go - Pog} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	295.622	2	147.811	15.129	0.000
SEX	73.505	1	73.505	7.523	0.007
ERUPTION	222.117	1	222.117	22.734	0.000
2-WAY INTERACTIONS	0.263	1	0.263	0.027	0.870
SEX ERUPTION	0.263	1	0.263	0.027	0.870
RESIDUAL	1133.358	116	9.770		
TOTAL	1429.243	119	12.010		

* $\alpha = .01$

21. $\frac{X_i - D_7}{G_o - M_e} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	385.361	2	192.680	15.614	0.000
SEX	80.391	1	80.391	6.514	0.012
ERUPTION	304.969	1	304.969	24.713	0.000
2-WAY INTERACTIONS	0.376	1	0.376	0.031	0.862
SEX ERUPTION	0.377	1	0.377	0.031	0.862
RESIDUAL	1431.488	116	12.340		
TOTAL	1817.225	119	15.271		

* $\alpha = .01$

22. $\frac{MD_8}{G_o - M_e} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	42.626	2	21.313	24.464	0.000
SEX	23.745	1	23.745	27.255	0.000
ERUPTION	18.881	1	18.881	21.672	0.000
2-WAY INTERACTIONS	1.945	1	1.945	2.232	0.138
SEX	1.945	1	1.945	2.232	0.138
RESIDUAL	101.059	116	0.871		
TOTAL	145.630	119	1.224		

* $\alpha = .01$

23. $\frac{MD_8}{Postp - Pog} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	28.107	2	14.053	28.689	0.000
SEX	12.468	1	12.468	25.453	0.000
ERUPTION	15.639	1	15.639	31.925	0.000
2-WAY INTERACTIONS	1.929	1	1.929	3.939	0.050
SEX ERUPTION	1.929	1	1.929	3.939	0.050
RESIDUAL	56.823	116	0.490		
TOTAL	86.859	119	0.730		

* $\alpha = .01$

24. $\frac{MD_8}{Go - Pog} \times 100$ by Sex, Eruption

SOURCE OF VARIATION	SUM OF SQUARES	DF	MEAN SQUARE	F	SIGNIFICANCE OF F*
MAIN EFFECTS	39.225	2	19.613	28.858	0.000
SEX	19.233	1	19.233	28.299	0.000
ERUPTION	19.993	1	19.993	29.418	0.000
2-WAY INTERACTIONS	2.419	1	2.419	3.560	0.062
SEX ERUPTION	2.419	1	2.419	3.560	0.062
RESIDUAL	78.836	116	0.680		
TOTAL	120.481	119	1.012		

* $\alpha = .01$

ประวัติผู้เขียน

นางสาว พัฒนทรี ตรีเพชร เกิดเมื่อวันที่ 23 พฤศจิกายน 2497 ที่ กรุงเทพมหานคร สำเร็จการศึกษาระดับปริญญาตรี พ.ศ. 2519 และทันตแพทยศาสตรบัณฑิต เกียรตินิยมอันดับ 2 พ.ศ. 2521 จากคณะทันตแพทยศาสตร์ จุฬาลงกรณ์มหาวิทยาลัย เข้ารับราชการกองทันตกรรม โรงพยาบาลสมเด็จพระปิ่นเกล้า กรมแพทยทหารเรือ พ.ศ. 2521 เข้าศึกษาต่อในสาขาวิชาทันตกรรมจัดฟัน ภาควิชาทันตกรรมจัดฟัน บัณฑิตวิทยาลัย จุฬาลงกรณ์มหาวิทยาลัย ในปีการศึกษา 2524 ปัจจุบันยศเรือเอก ตำแหน่งทันตแพทย์ กรมแพทยทหารเรือ



ศูนย์วิทยทรัพยากร
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