Public Master File 006555 (submission A-0000)

PMF006555_Drouillard_2025_performance analysis output

Analysis Output Study 1U01FD006804-01: performance variables

Center for
Veterinary Medicine

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=1

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=1

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	556.89967044	.	9.59E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	556.90
AIC (smaller is better)	560.90
AICC (smaller is better)	561.10
BIC (smaller is better)	563.08
CAIC (smaller is better)	565.08
HQIC (smaller is better)	561.41
Generalized Chi-Square	3810.00
Gener. Chi-Square / DF	60.48

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	3848.68	1193.96
Residual	60.4762	13.1970

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=1

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.14	0.8699

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	831.15	13.3300	21.44	62.35	<.0001
Y	832.33	13.3300	21.44	62.44	<.0001
Z	832.06	13.3300	21.44	62.42	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-1.1818	2.3447	42	-0.50	0.6169
X	Z	-0.9156	2.3447	42	-0.39	0.6982
Y	Z	0.2662	2.3447	42	0.11	0.9101

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	832.33	A
		A
Z	832.06	A
		A
X	831.15	A

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=2

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=2

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	605.28900156	.	1.04E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	605.29
AIC (smaller is better)	609.29
AICC (smaller is better)	609.49
BIC (smaller is better)	611.47
CAIC (smaller is better)	613.47
HQIC (smaller is better)	609.80
Generalized Chi-Square	13401.72
Gener. Chi-Square / DF	212.73

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	3061.19	966.71
Residual	212.73	46.4206

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=2

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	4.87	0.0125

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	941.36	12.1989	22.92	77.17	<.0001
Y	953.90	12.1989	22.92	78.19	<.0001
Z	952.48	12.1989	22.92	78.08	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-12.5325	4.3976	42	-2.85	0.0067
X	Z	-11.1147	4.3976	42	-2.53	0.0153
Y	Z	1.4177	4.3976	42	0.32	0.7488

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	953.90	A
		A
Z	952.48	A
X	941.36	B

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=3

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=3

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	639.35478901	.	3.28E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	639.35
AIC (smaller is better)	643.35
AICC (smaller is better)	643.55
BIC (smaller is better)	645.54
CAIC (smaller is better)	647.54
HQIC (smaller is better)	643.87
Generalized Chi-Square	30982.35
Gener. Chi-Square / DF	491.78

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	2803.85	916.57
Residual	491.78	107.32

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=3

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	3.40	0.0428

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1081.46	12.2393	25.74	88.36	<.0001
Y	1098.83	12.2393	25.74	89.78	<.0001
Z	1091.46	12.2393	25.74	89.18	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-17.3701	6.6864	42	-2.60	0.0129
X	Z	-9.9946	6.6864	42	-1.49	0.1425
Y	Z	7.3755	6.6864	42	1.10	0.2763

T Grouping for Treatment Least Squares Means (Alpha=0.05)			
LS-means with the same letter are not significantly different.			
Treatment	**Estimate**		
Y	1098.83		A
			A
Z	1091.46	B	A
		B	
X	1081.46	B	

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=4

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=4

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	657.85432238	.	6.66E-16

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	657.85
AIC (smaller is better)	661.85
AICC (smaller is better)	662.05
BIC (smaller is better)	664.04
CAIC (smaller is better)	666.04
HQIC (smaller is better)	662.37
Generalized Chi-Square	48302.18
Gener. Chi-Square / DF	766.70

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	2690.95	911.02
Residual	766.70	167.31

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=4

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.30	0.7439

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1222.01	12.5366	28.49	97.48	<.0001
Y	1218.57	12.5366	28.49	97.20	<.0001
Z	1225.01	12.5366	28.49	97.71	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	3.4361	8.3487	42	0.41	0.6827
X	Z	-3.0032	8.3487	42	-0.36	0.7209
Y	Z	-6.4394	8.3487	42	-0.77	0.4448

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	1225.01	A
		A
X	1222.01	A
		A
Y	1218.57	A

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=5

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=5

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	663.31036288	.	6.22E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	663.31
AIC (smaller is better)	667.31
AICC (smaller is better)	667.51
BIC (smaller is better)	669.49
CAIC (smaller is better)	671.49
HQIC (smaller is better)	667.82
Generalized Chi-Square	64420.86
Gener. Chi-Square / DF	1022.55

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1807.10	667.03
Residual	1022.55	223.14

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=5

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.58	0.2184

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1314.11	11.3411	34.7	115.87	<.0001
Y	1329.54	11.3411	34.7	117.23	<.0001
Z	1328.26	11.3411	34.7	117.12	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-15.4329	9.6415	42	-1.60	0.1169
X	Z	-14.1504	9.6415	42	-1.47	0.1496
Y	Z	1.2825	9.6415	42	0.13	0.8948

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	1329.54	A
		A
Z	1328.26	A
		A
X	1314.11	A

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=6

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=6

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	686.3938832	.	4.22E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	686.39
AIC (smaller is better)	690.39
AICC (smaller is better)	690.59
BIC (smaller is better)	692.58
CAIC (smaller is better)	694.58
HQIC (smaller is better)	690.91
Generalized Chi-Square	103721.6
Gener. Chi-Square / DF	1646.38

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1938.47	776.87
Residual	1646.38	359.27

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=6

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.92	0.4073

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1432.93	12.7651	39.75	112.25	<.0001
Y	1448.72	12.7651	39.75	113.49	<.0001
Z	1445.19	12.7651	39.75	113.21	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-15.7900	12.2340	42	-1.29	0.2039
X	Z	-12.2565	12.2340	42	-1.00	0.3222
Y	Z	3.5335	12.2340	42	0.29	0.7741

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	1448.72	A
		A
Z	1445.19	A
		A
X	1432.93	A

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=7

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=7

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	686.804035	.	1.19E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	686.80
AIC (smaller is better)	690.80
AICC (smaller is better)	691.00
BIC (smaller is better)	692.99
CAIC (smaller is better)	694.99
HQIC (smaller is better)	691.32
Generalized Chi-Square	109468.0
Gener. Chi-Square / DF	1737.59

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1697.83	713.98
Residual	1737.59	379.17

The GLIMMIX Procedure

EP=BODYWEIGHT (LB) I=7

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.76	0.4738

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1465.03	12.4962	42.32	117.24	<.0001
Y	1477.61	12.4962	42.32	118.24	<.0001
Z	1479.16	12.4962	42.32	118.37	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-12.5790	12.5683	42	-1.00	0.3226
X	Z	-14.1310	12.5683	42	-1.12	0.2673
Y	Z	-1.5519	12.5683	42	-0.12	0.9023

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	1479.16	A
		A
Y	1477.61	A
		A
X	1465.03	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=1

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=1

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	116.37641681	.	1.33E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	116.38
AIC (smaller is better)	120.38
AICC (smaller is better)	120.58
BIC (smaller is better)	122.56
CAIC (smaller is better)	124.56
HQIC (smaller is better)	120.89
Generalized Chi-Square	14.71
Gener. Chi-Square / DF	0.23

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.1236	0.06444
Residual	0.2334	0.05094

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=1

Type III Tests of Fixed Effects				
Effect	Num DF	Den DF	F Value	Pr > F
Treatment	2	42	4.09	0.0239

Treatment Least Squares Means					
Treatment	Estimate	Standard Error	DF	t Value	Pr > |t|
X	3.6738	0.1274	50.82	28.84	<.0001
Y	4.0522	0.1274	50.82	31.81	<.0001
Z	4.0138	0.1274	50.82	31.51	<.0001

Differences of Treatment Least Squares Means						
Treatment	Treatment	Estimate	Standard Error	DF	t Value	Pr > |t|
X	Y	-0.3784	0.1457	42	-2.60	0.0129
X	Z	-0.3400	0.1457	42	-2.33	0.0245
Y	Z	0.03838	0.1457	42	0.26	0.7935

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	Estimate	
Y	4.0522	A
		A
Z	4.0138	A
X	3.6738	B

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=2

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=2

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	137.03013465	.	0

Convergence criterion (ABSGCONV=0.00001) satisfied.

Estimated G matrix is not positive definite.

Fit Statistics	
-2 Res Log Likelihood	137.03
AIC (smaller is better)	139.03
AICC (smaller is better)	139.10
BIC (smaller is better)	140.12
CAIC (smaller is better)	141.12
HQIC (smaller is better)	139.29
Generalized Chi-Square	28.03
Gener. Chi-Square / DF	0.44

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0	.
Residual	0.4449	0.07926

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=2

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	63	0.55	0.5792

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	4.6699	0.1422	63	32.84	<.0001
Y	4.8312	0.1422	63	33.97	<.0001
Z	4.6326	0.1422	63	32.58	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.1613	0.2011	63	-0.80	0.4256
X	Z	0.03734	0.2011	63	0.19	0.8533
Y	Z	0.1986	0.2011	63	0.99	0.3272

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	4.8312	A
		A
X	4.6699	A
		A
Z	4.6326	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=3

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=3

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	239.75570128	.	1.67E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	239.76
AIC (smaller is better)	243.76
AICC (smaller is better)	243.96
BIC (smaller is better)	245.94
CAIC (smaller is better)	247.94
HQIC (smaller is better)	244.27
Generalized Chi-Square	97.74
Gener. Chi-Square / DF	1.55

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1.1065	0.5136
Residual	1.5515	0.3386

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=3

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.77	0.1834

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	4.6849	0.3476	46.78	13.48	<.0001
Y	3.9913	0.3476	46.78	11.48	<.0001
Z	4.4518	0.3476	46.78	12.81	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.6935	0.3756	42	1.85	0.0718
X	Z	0.2330	0.3756	42	0.62	0.5383
Y	Z	-0.4605	0.3756	42	-1.23	0.2270

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	4.6849	A
		A
Z	4.4518	A
		A
Y	3.9913	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=4

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=4

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	262.49597208	.	3.33E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	262.50
AIC (smaller is better)	266.50
AICC (smaller is better)	266.70
BIC (smaller is better)	268.68
CAIC (smaller is better)	270.68
HQIC (smaller is better)	267.01
Generalized Chi-Square	143.11
Gener. Chi-Square / DF	2.27

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1.4797	0.7098
Residual	2.2715	0.4957

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=4

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.97	0.3880

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	3.0700	0.4129	48.05	7.43	<.0001
Y	3.6990	0.4129	48.05	8.96	<.0001
Z	3.4416	0.4129	48.05	8.33	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.6290	0.4544	42	-1.38	0.1736
X	Z	-0.3716	0.4544	42	-0.82	0.4182
Y	Z	0.2574	0.4544	42	0.57	0.5741

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	3.6990	A
		A
Z	3.4416	A
		A
X	3.0700	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=5

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=5

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	134.43308287	.	1.3E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	134.43
AIC (smaller is better)	138.43
AICC (smaller is better)	138.63
BIC (smaller is better)	140.62
CAIC (smaller is better)	142.62
HQIC (smaller is better)	138.95
Generalized Chi-Square	14.79
Gener. Chi-Square / DF	0.23

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.3925	0.1463
Residual	0.2347	0.05122

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=5

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.13	0.8750

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	3.7133	0.1689	35.33	21.99	<.0001
Y	3.7245	0.1689	35.33	22.06	<.0001
Z	3.6541	0.1689	35.33	21.64	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.01116	0.1461	42	-0.08	0.9395
X	Z	0.05919	0.1461	42	0.41	0.6874
Y	Z	0.07035	0.1461	42	0.48	0.6326

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	3.7245	A
		A
X	3.7133	A
		A
Z	3.6541	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=6

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=6

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	84.621462226	.	3E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	84.62
AIC (smaller is better)	88.62
AICC (smaller is better)	88.82
BIC (smaller is better)	90.80
CAIC (smaller is better)	92.80
HQIC (smaller is better)	89.14
Generalized Chi-Square	7.70
Gener. Chi-Square / DF	0.12

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.1212	0.05077
Residual	0.1222	0.02667

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=6

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.32	0.2772

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	1.0698	0.1052	42.11	10.17	<.0001
Y	0.9628	0.1052	42.11	9.15	<.0001
Z	1.1323	0.1052	42.11	10.76	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.1070	0.1054	42	1.02	0.3157
X	Z	-0.06248	0.1054	42	-0.59	0.5565
Y	Z	-0.1695	0.1054	42	-1.61	0.1153

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	1.1323	A
		A
X	1.0698	A
		A
Y	0.9628	A

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=7

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=7

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	45.418677461	.	7.77E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	45.42
AIC (smaller is better)	49.42
AICC (smaller is better)	49.62
BIC (smaller is better)	51.60
CAIC (smaller is better)	53.60
HQIC (smaller is better)	49.93
Generalized Chi-Square	4.26
Gener. Chi-Square / DF	0.07

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.05935	0.02574
Residual	0.06759	0.01475

The GLIMMIX Procedure

EP=ADG (LB/DAY/HD) I=7

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.64	0.5302

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	3.9371	0.07596	43.84	51.83	<.0001
Y	4.0079	0.07596	43.84	52.76	<.0001
Z	4.0192	0.07596	43.84	52.91	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.07079	0.07839	42	-0.90	0.3716
X	Z	-0.08208	0.07839	42	-1.05	0.3010
Y	Z	-0.01129	0.07839	42	-0.14	0.8861

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	4.0192	A
		A
Y	4.0079	A
		A
X	3.9371	A

The GLIMMIX Procedure

EP=DMI (LB) I=1

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=1

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	186.21497471	.	2.15E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	186.21
AIC (smaller is better)	190.21
AICC (smaller is better)	190.41
BIC (smaller is better)	192.40
CAIC (smaller is better)	194.40
HQIC (smaller is better)	190.73
Generalized Chi-Square	46.67
Gener. Chi-Square / DF	0.74

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.3094	0.1800
Residual	0.7408	0.1617

The GLIMMIX Procedure

EP=DMI (LB) I=1

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.25	0.2976

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	18.4299	0.2185	53.68	84.35	<.0001
Y	18.6711	0.2185	53.68	85.46	<.0001
Z	18.8376	0.2185	53.68	86.22	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.2412	0.2595	42	-0.93	0.3579
X	Z	-0.4077	0.2595	42	-1.57	0.1237
Y	Z	-0.1664	0.2595	42	-0.64	0.5248

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	18.8376	A
		A
Y	18.6711	A
		A
X	18.4299	A

The GLIMMIX Procedure

EP=DMI (LB) I=2

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=2

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	253.81923806	.	3.24E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	253.82
AIC (smaller is better)	257.82
AICC (smaller is better)	258.02
BIC (smaller is better)	260.00
CAIC (smaller is better)	262.00
HQIC (smaller is better)	258.33
Generalized Chi-Square	146.79
Gener. Chi-Square / DF	2.33

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.6297	0.4659
Residual	2.3300	0.5085

The GLIMMIX Procedure

EP=DMI (LB) I=2

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.00	0.9967

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	22.6924	0.3668	57.77	61.87	<.0001
Y	22.6652	0.3668	57.77	61.79	<.0001
Z	22.6563	0.3668	57.77	61.77	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.02716	0.4602	42	0.06	0.9532
X	Z	0.03603	0.4602	42	0.08	0.9380
Y	Z	0.008864	0.4602	42	0.02	0.9847

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	22.6924	A
		A
Y	22.6652	A
		A
Z	22.6563	A

The GLIMMIX Procedure

EP=DMI (LB) I=3

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=3

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	278.84965661	.	1.33E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	278.85
AIC (smaller is better)	282.85
AICC (smaller is better)	283.05
BIC (smaller is better)	285.03
CAIC (smaller is better)	287.03
HQIC (smaller is better)	283.36
Generalized Chi-Square	239.88
Gener. Chi-Square / DF	3.81

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.4653	0.6027
Residual	3.8076	0.8309

The GLIMMIX Procedure

EP=DMI (LB) I=3

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.39	0.6786

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	24.2284	0.4407	61.54	54.98	<.0001
Y	23.7943	0.4407	61.54	53.99	<.0001
Z	23.7626	0.4407	61.54	53.92	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.4342	0.5883	42	0.74	0.4647
X	Z	0.4658	0.5883	42	0.79	0.4330
Y	Z	0.03161	0.5883	42	0.05	0.9574

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	24.2284	A
		A
Y	23.7943	A
		A
Z	23.7626	A

The GLIMMIX Procedure

EP=DMI (LB) I=4

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=4

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	244.2164713	.	1.09E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	244.22
AIC (smaller is better)	248.22
AICC (smaller is better)	248.42
BIC (smaller is better)	250.40
CAIC (smaller is better)	252.40
HQIC (smaller is better)	248.73
Generalized Chi-Square	108.61
Gener. Chi-Square / DF	1.72

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1.0517	0.5173
Residual	1.7239	0.3762

The GLIMMIX Procedure

EP=DMI (LB) I=4

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	2.85	0.0692

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	21.4597	0.3552	48.95	60.42	<.0001
Y	22.2019	0.3552	48.95	62.51	<.0001
Z	22.3371	0.3552	48.95	62.89	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.7422	0.3959	42	-1.87	0.0678
X	Z	-0.8774	0.3959	42	-2.22	0.0321
Y	Z	-0.1352	0.3959	42	-0.34	0.7344

T Grouping for Treatment Least Squares Means (Alpha=0.05)			
LS-means with the same letter are not significantly different.			
Treatment	**Estimate**		
Z	22.3371		A
			A
Y	22.2019	B	A
		B	
X	21.4597	B	

The GLIMMIX Procedure

EP=DMI (LB) I=5

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=5

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	267.22676701	.	7.77E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	267.23
AIC (smaller is better)	271.23
AICC (smaller is better)	271.43
BIC (smaller is better)	273.41
CAIC (smaller is better)	275.41
HQIC (smaller is better)	271.74
Generalized Chi-Square	149.68
Gener. Chi-Square / DF	2.38

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	1.7695	0.8091
Residual	2.3758	0.5185

The GLIMMIX Procedure

EP=DMI (LB) I=5

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.75	0.4775

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	21.8128	0.4341	46.17	50.25	<.0001
Y	22.3819	0.4341	46.17	51.56	<.0001
Z	22.1265	0.4341	46.17	50.97	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.5691	0.4647	42	-1.22	0.2276
X	Z	-0.3137	0.4647	42	-0.67	0.5034
Y	Z	0.2554	0.4647	42	0.55	0.5855

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	22.3819	A
		A
Z	22.1265	A
		A
X	21.8128	A

The GLIMMIX Procedure

EP=DMI (LB) I=6

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=6

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	277.82676202	.	4E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	277.83
AIC (smaller is better)	281.83
AICC (smaller is better)	282.03
BIC (smaller is better)	284.01
CAIC (smaller is better)	286.01
HQIC (smaller is better)	282.34
Generalized Chi-Square	247.67
Gener. Chi-Square / DF	3.93

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.2394	0.5572
Residual	3.9312	0.8579

The GLIMMIX Procedure

EP=DMI (LB) I=6

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.79	0.4605

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	23.5083	0.4354	62.59	53.99	<.0001
Y	23.5436	0.4354	62.59	54.07	<.0001
Z	22.8758	0.4354	62.59	52.54	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.03531	0.5978	42	-0.06	0.9532
X	Z	0.6324	0.5978	42	1.06	0.2962
Y	Z	0.6677	0.5978	42	1.12	0.2704

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	23.5436	A
		A
X	23.5083	A
		A
Z	22.8758	A

The GLIMMIX Procedure

EP=DMI (LB) I=7

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=DMI (LB) I=7

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	234.07094554	.	1.73E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	234.07
AIC (smaller is better)	238.07
AICC (smaller is better)	238.27
BIC (smaller is better)	240.25
CAIC (smaller is better)	242.25
HQIC (smaller is better)	238.58
Generalized Chi-Square	122.24
Gener. Chi-Square / DF	1.94

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.1451	0.2822
Residual	1.9404	0.4234

The GLIMMIX Procedure

EP=DMI (LB) I=7

Type III Tests of Fixed Effects				
Effect	Num DF	Den DF	F Value	Pr > F
Treatment	2	42	0.82	0.4486

Treatment Least Squares Means					
Treatment	Estimate	Standard Error	DF	t Value	Pr > |t|
X	22.0630	0.3079	62.4	71.66	<.0001
Y	22.5779	0.3079	62.4	73.33	<.0001
Z	22.1889	0.3079	62.4	72.07	<.0001

Differences of Treatment Least Squares Means						
Treatment	Treatment	Estimate	Standard Error	DF	t Value	Pr > |t|
X	Y	-0.5149	0.4200	42	-1.23	0.2270
X	Z	-0.1259	0.4200	42	-0.30	0.7658
Y	Z	0.3890	0.4200	42	0.93	0.3596

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	Estimate	
Y	22.5779	A
		A
Z	22.1889	A
		A
X	22.0630	A

The GLIMMIX Procedure

EP=GAIN:FEED I=1

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=1

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-266.5966305	.	1.33E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-266.60
AIC (smaller is better)	-262.60
AICC (smaller is better)	-262.40
BIC (smaller is better)	-260.41
CAIC (smaller is better)	-258.41
HQIC (smaller is better)	-262.08
Generalized Chi-Square	0.03
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.000446	0.000189
Residual	0.000468	0.000102

The GLIMMIX Procedure

EP=GAIN:FEED I=1

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	4.12	0.0232

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.1991	0.006445	42.69	30.89	<.0001
Y	0.2167	0.006445	42.69	33.61	<.0001
Z	0.2136	0.006445	42.69	33.13	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.01755	0.006524	42	-2.69	0.0102
X	Z	-0.01445	0.006524	42	-2.22	0.0322
Y	Z	0.003098	0.006524	42	0.47	0.6373

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	0.2167	A
		A
Z	0.2136	A
X	0.1991	B

The GLIMMIX Procedure

EP=GAIN:FEED I=2

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=2

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-274.7700215	.	1.53E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-274.77
AIC (smaller is better)	-270.77
AICC (smaller is better)	-270.57
BIC (smaller is better)	-268.59
CAIC (smaller is better)	-266.59
HQIC (smaller is better)	-270.26
Generalized Chi-Square	0.03
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.000180	0.000114
Residual	0.000506	0.000110

The GLIMMIX Procedure

EP=GAIN:FEED I=2

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.03	0.3654

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.2054	0.005586	55.35	36.78	<.0001
Y	0.2136	0.005586	55.35	38.24	<.0001
Z	0.2049	0.005586	55.35	36.69	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.00818	0.006782	42	-1.21	0.2345
X	Z	0.000488	0.006782	42	0.07	0.9429
Y	Z	0.008669	0.006782	42	1.28	0.2082

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	0.2136	A
		A
X	0.2054	A
		A
Z	0.2049	A

The GLIMMIX Procedure

EP=GAIN:FEED I=3

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=3

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-151.7644955	.	2.71E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-151.76
AIC (smaller is better)	-147.76
AICC (smaller is better)	-147.56
BIC (smaller is better)	-145.58
CAIC (smaller is better)	-143.58
HQIC (smaller is better)	-147.25
Generalized Chi-Square	0.20
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.002082	0.000994
Residual	0.003158	0.000689

The GLIMMIX Procedure

EP=GAIN:FEED I=3

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.19	0.3154

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.1965	0.01543	47.88	12.73	<.0001
Y	0.1709	0.01543	47.88	11.07	<.0001
Z	0.1881	0.01543	47.88	12.19	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.02560	0.01694	42	1.51	0.1383
X	Z	0.008401	0.01694	42	0.50	0.6226
Y	Z	-0.01720	0.01694	42	-1.01	0.3159

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	0.1965	A
		A
Z	0.1881	A
		A
Y	0.1709	A

The GLIMMIX Procedure

EP=GAIN:FEED I=4

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=4

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-133.7737602	.	1.98E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-133.77
AIC (smaller is better)	-129.77
AICC (smaller is better)	-129.57
BIC (smaller is better)	-127.59
CAIC (smaller is better)	-125.59
HQIC (smaller is better)	-129.26
Generalized Chi-Square	0.27
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.002714	0.001309
Residual	0.004226	0.000922

The GLIMMIX Procedure

EP=GAIN:FEED I=4

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.68	0.5144

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.1402	0.01776	48.24	7.90	<.0001
Y	0.1630	0.01776	48.24	9.18	<.0001
Z	0.1515	0.01776	48.24	8.53	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.02278	0.01960	42	-1.16	0.2517
X	Z	-0.01128	0.01960	42	-0.58	0.5681
Y	Z	0.01150	0.01960	42	0.59	0.5605

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	0.1630	A
		A
Z	0.1515	A
		A
X	0.1402	A

The GLIMMIX Procedure

EP=GAIN:FEED I=5

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=5

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-287.1139098	.	2.42E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-287.11
AIC (smaller is better)	-283.11
AICC (smaller is better)	-282.91
BIC (smaller is better)	-280.93
CAIC (smaller is better)	-278.93
HQIC (smaller is better)	-282.60
Generalized Chi-Square	0.02
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.000406	0.000159
Residual	0.000312	0.000068

The GLIMMIX Procedure

EP=GAIN:FEED I=5

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.26	0.7713

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.1681	0.005712	38.45	29.42	<.0001
Y	0.1657	0.005712	38.45	29.01	<.0001
Z	0.1642	0.005712	38.45	28.76	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.002368	0.005327	42	0.44	0.6590
X	Z	0.003814	0.005327	42	0.72	0.4780
Y	Z	0.001446	0.005327	42	0.27	0.7874

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	0.1681	A
		A
Y	0.1657	A
		A
Z	0.1642	A

The GLIMMIX Procedure

EP=GAIN:FEED I=6

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=6

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-308.8173716	.	1.38E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-308.82
AIC (smaller is better)	-304.82
AICC (smaller is better)	-304.62
BIC (smaller is better)	-302.64
CAIC (smaller is better)	-300.64
HQIC (smaller is better)	-304.30
Generalized Chi-Square	0.01
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.000257	0.000104
Residual	0.000230	0.000050

The GLIMMIX Procedure

EP=GAIN:FEED I=6

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	1.75	0.1857

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.04595	0.004707	40.44	9.76	<.0001
Y	0.04134	0.004707	40.44	8.78	<.0001
Z	0.04989	0.004707	40.44	10.60	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.004605	0.004572	42	1.01	0.3197
X	Z	-0.00395	0.004572	42	-0.86	0.3928
Y	Z	-0.00855	0.004572	42	-1.87	0.0684

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	0.04989	A
		A
X	0.04595	A
		A
Y	0.04134	A

The GLIMMIX Procedure

EP=GAIN:FEED I=7

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=GAIN:FEED I=7

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	-352.1473403	.	8.66E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	-352.15
AIC (smaller is better)	-348.15
AICC (smaller is better)	-347.95
BIC (smaller is better)	-345.97
CAIC (smaller is better)	-343.97
HQIC (smaller is better)	-347.63
Generalized Chi-Square	0.01
Gener. Chi-Square / DF	0.00

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.000124	0.000051
Residual	0.000117	0.000026

The GLIMMIX Procedure

EP=GAIN:FEED I=7

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.74	0.4847

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	0.1785	0.003311	41.26	53.91	<.0001
Y	0.1779	0.003311	41.26	53.74	<.0001
Z	0.1816	0.003311	41.26	54.85	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.000558	0.003266	42	0.17	0.8653
X	Z	-0.00312	0.003266	42	-0.96	0.3448
Y	Z	-0.00368	0.003266	42	-1.13	0.2665

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Z	0.1816	A
		A
X	0.1785	A
		A
Y	0.1779	A

The GLIMMIX Procedure

EP=FEED:GAIN I=1

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=1

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	137.67808297	.	0

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	137.68
AIC (smaller is better)	141.68
AICC (smaller is better)	141.88
BIC (smaller is better)	143.86
CAIC (smaller is better)	145.86
HQIC (smaller is better)	142.19
Generalized Chi-Square	20.18
Gener. Chi-Square / DF	0.32

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.1881	0.09395
Residual	0.3204	0.06991

The GLIMMIX Procedure

EP=FEED:GAIN I=1

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	3.68	0.0337

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	5.1351	0.1520	49.46	33.78	<.0001
Y	4.7062	0.1520	49.46	30.96	<.0001
Z	4.7698	0.1520	49.46	31.37	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.4289	0.1707	42	2.51	0.0159
X	Z	0.3654	0.1707	42	2.14	0.0381
Y	Z	-0.06357	0.1707	42	-0.37	0.7114

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	5.1351	A
Z	4.7698	B
		B
Y	4.7062	B

The GLIMMIX Procedure

EP=FEED:GAIN I=2

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=2

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	129.13621399	.	1.64E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	129.14
AIC (smaller is better)	133.14
AICC (smaller is better)	133.34
BIC (smaller is better)	135.32
CAIC (smaller is better)	137.32
HQIC (smaller is better)	133.65
Generalized Chi-Square	20.42
Gener. Chi-Square / DF	0.32

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.08365	0.06369
Residual	0.3242	0.07075

The GLIMMIX Procedure

EP=FEED:GAIN I=2

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.50	0.6097

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	4.9397	0.1362	58.11	36.28	<.0001
Y	4.7861	0.1362	58.11	35.15	<.0001
Z	4.9296	0.1362	58.11	36.20	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	0.1536	0.1717	42	0.89	0.3761
X	Z	0.01016	0.1717	42	0.06	0.9531
Y	Z	-0.1434	0.1717	42	-0.84	0.4082

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	4.9397	A
		A
Z	4.9296	A
		A
Y	4.7861	A

The GLIMMIX Procedure

EP=FEED:GAIN I=3

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=3

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	360.62021341	.	1.33E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	360.62
AIC (smaller is better)	364.62
AICC (smaller is better)	364.82
BIC (smaller is better)	366.80
CAIC (smaller is better)	368.80
HQIC (smaller is better)	365.13
Generalized Chi-Square	772.29
Gener. Chi-Square / DF	12.26

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	4.1301	2.6878
Residual	12.2586	2.6750

The GLIMMIX Procedure

EP=FEED:GAIN I=3

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	2.65	0.0824

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	5.9254	0.8631	55.9	6.87	<.0001
Y	8.0388	0.8631	55.9	9.31	<.0001
Z	5.9426	0.8631	55.9	6.89	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-2.1134	1.0557	42	-2.00	0.0518
X	Z	-0.01723	1.0557	42	-0.02	0.9871
Y	Z	2.0962	1.0557	42	1.99	0.0536

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	8.0388	A
		A
Z	5.9426	A
		A
X	5.9254	A

The GLIMMIX Procedure

EP=FEED:GAIN I=4

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=4

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	572.80816158	.	0

Convergence criterion (ABSGCONV=0.00001) satisfied.

Estimated G matrix is not positive definite.

Fit Statistics	
-2 Res Log Likelihood	572.81
AIC (smaller is better)	574.81
AICC (smaller is better)	574.87
BIC (smaller is better)	575.90
CAIC (smaller is better)	576.90
HQIC (smaller is better)	575.07
Generalized Chi-Square	28289.85
Gener. Chi-Square / DF	449.05

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0	.
Residual	449.05	80.0082

The GLIMMIX Procedure

EP=FEED:GAIN I=4

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	63	1.06	0.3519

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	12.0781	4.5179	63	2.67	0.0096
Y	8.3704	4.5179	63	1.85	0.0686
Z	2.8269	4.5179	63	0.63	0.5338

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	3.7077	6.3892	63	0.58	0.5638
X	Z	9.2512	6.3892	63	1.45	0.1526
Y	Z	5.5435	6.3892	63	0.87	0.3889

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	12.0781	A
		A
Y	8.3704	A
		A
Z	2.8269	A

The GLIMMIX Procedure

EP=FEED:GAIN I=5

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=5

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	188.4743401	.	1.89E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	188.47
AIC (smaller is better)	192.47
AICC (smaller is better)	192.67
BIC (smaller is better)	194.66
CAIC (smaller is better)	196.66
HQIC (smaller is better)	192.99
Generalized Chi-Square	35.86
Gener. Chi-Square / DF	0.57

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.8599	0.3266
Residual	0.5691	0.1242

The GLIMMIX Procedure

EP=FEED:GAIN I=5

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.02	0.9819

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	6.1800	0.2549	36.54	24.25	<.0001
Y	6.2219	0.2549	36.54	24.41	<.0001
Z	6.2110	0.2549	36.54	24.37	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.04190	0.2275	42	-0.18	0.8548
X	Z	-0.03099	0.2275	42	-0.14	0.8923
Y	Z	0.01090	0.2275	42	0.05	0.9620

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	6.2219	A
		A
Z	6.2110	A
		A
X	6.1800	A

The GLIMMIX Procedure

EP=FEED:GAIN I=6

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=6

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	655.10767216	.	4.37E-14

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	655.11
AIC (smaller is better)	659.11
AICC (smaller is better)	659.31
BIC (smaller is better)	661.29
CAIC (smaller is better)	663.29
HQIC (smaller is better)	659.62
Generalized Chi-Square	87309.36
Gener. Chi-Square / DF	1385.86

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	329.31	264.18
Residual	1385.86	302.42

The GLIMMIX Procedure

EP=FEED:GAIN I=6

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.67	0.5148

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	31.6896	8.8296	58.67	3.59	0.0007
Y	19.0409	8.8296	58.67	2.16	0.0352
Z	28.1024	8.8296	58.67	3.18	0.0023

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	12.6487	11.2244	42	1.13	0.2662
X	Z	3.5872	11.2244	42	0.32	0.7509
Y	Z	-9.0615	11.2244	42	-0.81	0.4240

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
X	31.6896	A
		A
Z	28.1024	A
		A
Y	19.0409	A

The GLIMMIX Procedure

EP=FEED:GAIN I=7

Model Information	
Data Set	DAT.PF_LONG
Response Variable	RESP
Response Distribution	Gaussian
Link Function	Identity
Variance Function	Default
Variance Matrix	Not blocked
Estimation Technique	Restricted Maximum Likelihood
Degrees of Freedom Method	Kenward-Roger
Fixed Effects SE Adjustment	Kenward-Roger

Class Level Information		
Class	**Levels**	**Values**
Treatment	3	X Y Z
Block	22	1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22

Number of Observations Read	66
Number of Observations Used	66

Dimensions	
G-side Cov. Parameters	1
R-side Cov. Parameters	1
Columns in X	4
Columns in Z	22
Subjects (Blocks in V)	1
Max Obs per Subject	66

Optimization Information	
Optimization Technique	Dual Quasi-Newton
Parameters in Optimization	1
Lower Boundaries	1

The GLIMMIX Procedure

EP=FEED:GAIN I=7

Optimization Information	
Upper Boundaries	0
Fixed Effects	Profiled
Residual Variance	Profiled
Starting From	Data

Iteration History					
Iteration	**Restarts**	**Evaluations**	**Objective Function**	**Change**	**Max Gradient**
0	**0**	4	89.956825908	.	3.11E-15

Convergence criterion (ABSGCONV=0.00001) satisfied.

Fit Statistics	
-2 Res Log Likelihood	89.96
AIC (smaller is better)	93.96
AICC (smaller is better)	94.16
BIC (smaller is better)	96.14
CAIC (smaller is better)	98.14
HQIC (smaller is better)	94.47
Generalized Chi-Square	8.83
Gener. Chi-Square / DF	0.14

Covariance Parameter Estimates		
Cov Parm	**Estimate**	**Standard Error**
Block	0.1121	0.05006
Residual	0.1402	0.03058

The GLIMMIX Procedure

EP=FEED:GAIN I=7

Type III Tests of Fixed Effects				
Effect	**Num DF**	**Den DF**	**F Value**	**Pr > F**
Treatment	2	42	0.86	0.4294

Treatment Least Squares Means					
Treatment	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	5.6485	0.1071	45.16	52.75	<.0001
Y	5.6714	0.1071	45.16	52.97	<.0001
Z	5.5331	0.1071	45.16	51.67	<.0001

Differences of Treatment Least Squares Means						
Treatment	**Treatment**	**Estimate**	**Standard Error**	**DF**	**t Value**	**Pr > |t|**
X	Y	-0.02292	0.1129	42	-0.20	0.8401
X	Z	0.1154	0.1129	42	1.02	0.3125
Y	Z	0.1383	0.1129	42	1.23	0.2273

T Grouping for Treatment Least Squares Means (Alpha=0.05)		
LS-means with the same letter are not significantly different.		
Treatment	**Estimate**	
Y	5.6714	A
		A
X	5.6485	A
		A
Z	5.5331	A