

```

DATASET ACTIVATE DataSet6.
GLM HA_faces SA_faces BY Groups
  /WSFACTOR=Emotion 2 Polynomial
  /METHOD=SSTYPE(3)
  /EMMEANS=TABLES(Groups) COMPARE ADJ(BONFERRONI)
  /EMMEANS=TABLES(Emotion) COMPARE ADJ(BONFERRONI)
  /PRINT=DESCRIPTIVE HOMOGENEITY
  /CRITERIA=ALPHA(.05)
  /WSDSIGN=Emotion
  /DESIGN=Groups.

```

## General Linear Model

### Notes

Output Created		31-DEC-2018 22:34:48
Comments		
Input	Data	D:\Documents\fix_time.sav
	Active Dataset	DataSet6
	Filter	<none>
	Weight	<none>
	Split File	<none>
	N of Rows in Working Data File	32
Missing Value Handling	Definition of Missing	User-defined missing values are treated as missing.
	Cases Used	Statistics are based on all cases with valid data for all variables in the model.
Syntax		GLM HA_faces SA_faces BY Groups /WSFACTOR=Emotion 2 Polynomial /METHOD=SSTYPE(3) /EMMEANS=TABLES (Groups) COMPARE ADJ (BONFERRONI) /EMMEANS=TABLES (Emotion) COMPARE ADJ (BONFERRONI) /PRINT=DESCRIPTIVE HOMOGENEITY /CRITERIA=ALPHA(.05) /WSDSIGN=Emotion /DESIGN=Groups.

## Notes

Resources	Processor Time	00:00:00.02
	Elapsed Time	00:00:00.03

[DataSet6] D:\Documents\fix\_time.sav

## Within-Subjects Factors

Measure: MEASURE\_1

Emotion	Dependent Variable
1	HA_faces
2	SA_faces

## Between-Subjects Factors

		Value Label	N
Groups	.00	Neutral Primer	16
	1.00	Sad Primer	16

## Descriptive Statistics

		Groups	Mean	Std. Deviation	N
HA_faces	Neutral Primer		1346.5106	168.28202	16
	Sad Primer		1387.3756	284.65503	16
	Total		1366.9431	230.95660	32
SA_faces	Neutral Primer		1320.7706	179.45676	16
	Sad Primer		1346.5819	313.07261	16
	Total		1333.6763	251.35873	32

### Box's Test of Equality of Covariance Matrices<sup>a</sup>

Box's M	15.482
F	4.788
df1	3
df2	162000.000
Sig.	.002

Tests the null hypothesis that the observed covariance matrices of the dependent variables are equal across groups.

a. Design: Intercept + Groups  
Within Subjects Design: Emotion

### Multivariate Tests<sup>a</sup>

Effect		Value	F	Hypothesis df	Error df
Emotion	Pillai's Trace	.047	1.472 <sup>b</sup>	1.000	30.000
	Wilks' Lambda	.953	1.472 <sup>b</sup>	1.000	30.000
	Hotelling's Trace	.049	1.472 <sup>b</sup>	1.000	30.000
	Roy's Largest Root	.049	1.472 <sup>b</sup>	1.000	30.000
Emotion * Groups	Pillai's Trace	.003	.075 <sup>b</sup>	1.000	30.000
	Wilks' Lambda	.997	.075 <sup>b</sup>	1.000	30.000
	Hotelling's Trace	.003	.075 <sup>b</sup>	1.000	30.000
	Roy's Largest Root	.003	.075 <sup>b</sup>	1.000	30.000

### Multivariate Tests<sup>a</sup>

Effect		Sig.
Emotion	Pillai's Trace	.234
	Wilks' Lambda	.234
	Hotelling's Trace	.234
	Roy's Largest Root	.234
Emotion * Groups	Pillai's Trace	.786
	Wilks' Lambda	.786
	Hotelling's Trace	.786
	Roy's Largest Root	.786

a. Design: Intercept + Groups  
Within Subjects Design: Emotion

b. Exact statistic

### Mauchly's Test of Sphericity<sup>a</sup>

Measure: MEASURE\_1

Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Epsilon <sup>b</sup> Greenhouse-Geisser
Emotion	1.000	.000	0	.	1.000

### Mauchly's Test of Sphericity<sup>a</sup>

Measure: MEASURE\_1

Within Subjects Effect	Epsilon <sup>b</sup>	
	Huynh-Feldt	Lower-bound
Emotion	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.

a. Design: Intercept + Groups  
Within Subjects Design: Emotion

b. May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.

### Tests of Within-Subjects Effects

Measure: MEASURE\_1

Source		Type III Sum of Squares	df	Mean Square	F
Emotion	Sphericity Assumed	17706.960	1	17706.960	1.472
	Greenhouse-Geisser	17706.960	1.000	17706.960	1.472
	Huynh-Feldt	17706.960	1.000	17706.960	1.472
	Lower-bound	17706.960	1.000	17706.960	1.472
Emotion * Groups	Sphericity Assumed	906.462	1	906.462	.075
	Greenhouse-Geisser	906.462	1.000	906.462	.075
	Huynh-Feldt	906.462	1.000	906.462	.075
	Lower-bound	906.462	1.000	906.462	.075
Error(Emotion)	Sphericity Assumed	360800.532	30	12026.684	
	Greenhouse-Geisser	360800.532	30.000	12026.684	
	Huynh-Feldt	360800.532	30.000	12026.684	
	Lower-bound	360800.532	30.000	12026.684	

### Tests of Within-Subjects Effects

Measure: MEASURE\_1

Source		Sig.
Emotion	Sphericity Assumed	.234
	Greenhouse-Geisser	.234
	Huynh-Feldt	.234
	Lower-bound	.234
Emotion * Groups	Sphericity Assumed	.786
	Greenhouse-Geisser	.786
	Huynh-Feldt	.786
	Lower-bound	.786
Error(Emotion)	Sphericity Assumed	
	Greenhouse-Geisser	
	Huynh-Feldt	
	Lower-bound	

### Tests of Within-Subjects Contrasts

Measure: MEASURE\_1

Source	Emotion	Type III Sum of Squares	df	Mean Square	F	Sig.
Emotion	Linear	17706.960	1	17706.960	1.472	.234
Emotion * Groups	Linear	906.462	1	906.462	.075	.786
Error(Emotion)	Linear	360800.532	30	12026.684		

### Levene's Test of Equality of Error Variances<sup>a</sup>

		Levene Statistic	df1	df2	Sig.
HA_faces	Based on Mean	2.402	1	30	.132
	Based on Median	1.871	1	30	.182
	Based on Median and with adjusted df	1.871	1	22.375	.185
	Based on trimmed mean	1.912	1	30	.177
SA_faces	Based on Mean	2.294	1	30	.140
	Based on Median	1.528	1	30	.226
	Based on Median and with adjusted df	1.528	1	19.475	.231
	Based on trimmed mean	2.004	1	30	.167

Tests the null hypothesis that the error variance of the dependent variable is equal across groups.

a. Design: Intercept + Groups  
Within Subjects Design: Emotion

### Tests of Between-Subjects Effects

Measure: MEASURE\_1

Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Intercept	116693520.1	1	116693520.1	1082.936	.000
Groups	17782.889	1	17782.889	.165	.687
Error	3232697.135	30	107756.571		

### Estimated Marginal Means

#### 1. Groups

#### Estimates

Measure: MEASURE\_1

Groups	Mean	Std. Error	95% Confidence Interval	
			Lower Bound	Upper Bound
Neutral Primer	1333.641	58.029	1215.129	1452.152
Sad Primer	1366.979	58.029	1248.467	1485.490

### Pairwise Comparisons

Measure: MEASURE\_1

(I) Groups	(J) Groups	Mean Difference (I-J)	Std. Error	Sig. <sup>a</sup>	95% Confidence <sup>a</sup> ...
					Lower Bound
Neutral Primer	Sad Primer	-33.338	82.066	.687	-200.939
Sad Primer	Neutral Primer	33.338	82.066	.687	-134.262

### Pairwise Comparisons

Measure: MEASURE\_1

(I) Groups	(J) Groups	95% Confidence Interval for <sup>a</sup> ...
		Upper Bound
Neutral Primer	Sad Primer	134.262
Sad Primer	Neutral Primer	200.939

Based on estimated marginal means

a. Adjustment for multiple comparisons: Bonferroni.

### Univariate Tests

Measure: MEASURE\_1

	Sum of Squares	df	Mean Square	F	Sig.
Contrast	8891.445	1	8891.445	.165	.687
Error	1616348.567	30	53878.286		

The F tests the effect of Groups. This test is based on the linearly independent pairwise comparisons among the estimated marginal means.

## 2. Emotion

### Estimates

Measure: MEASURE\_1

Emotion	Mean	Std. Error	95% Confidence Interval	
			Lower Bound	Upper Bound
1	1366.943	41.335	1282.527	1451.360
2	1333.676	45.107	1241.555	1425.798

## Pairwise Comparisons

Measure: MEASURE\_1

(I) Emotion	(J) Emotion	Mean Difference (I-J)	Std. Error	Sig. <sup>a</sup>	95% Confidence Interval for Difference <sup>a</sup>	
					Lower Bound	Upper Bound
1	2	33.267	27.417	.234	-22.725	89.259
2	1	-33.267	27.417	.234	-89.259	22.725

Based on estimated marginal means

a. Adjustment for multiple comparisons: Bonferroni.

## Multivariate Tests

	Value	F	Hypothesis df	Error df	Sig.
Pillai's trace	.047	1.472 <sup>a</sup>	1.000	30.000	.234
Wilks' lambda	.953	1.472 <sup>a</sup>	1.000	30.000	.234
Hotelling's trace	.049	1.472 <sup>a</sup>	1.000	30.000	.234
Roy's largest root	.049	1.472 <sup>a</sup>	1.000	30.000	.234

Each F tests the multivariate effect of Emotion. These tests are based on the linearly independent pairwise comparisons among the estimated marginal means.

a. Exact statistic