Table 27-9 Friedman Two-Way Analysis of Variance by Ranks: Blood Pressure in Three Positions

*Nonparametric Tests: Related Samples. $\ensuremath{\mathtt{NPTESTS}}$

/RELATED TEST(Level Elevated Down) FRIEDMAN(COMPARE=STEPWISE)

/MISSING SCOPE=ANALYSIS USERMISSING=EXCLUDE

/CRITERIA ALPHA=0.05 CILEVEL=95.

Nonparametric Tests

This test was run using Nonparametric Tests > Related Samples (Settings: Choose Tests: Customize > Friedman) --- In SPSS, double clicking on the Hypothesis Test Summary box will run results, which are shown below.

Hypothesis Test Summary

	Null Hypothesis	Test	Sig.	Decision
1	The distributions of Level, Elevated and Down are the same.	Related- Samples Friedman's Two-Way Analysis of Variance by Ranks	.008	Reject the null hypothesis.

Asymptotic significances are displayed. The significance level is .05.

Total N	6
Test Statistic	9.652
Degrees of Freedom	2
Asymptotic Sig. (2-sided test)	.008

Homogeneous Subsets

	Subset		set
		1	2
	Level	1.083	
Sample ¹	Elevated		2.083
	Down		2.833
Test Statistic		.2	2.667
Sig. (2-sided test)			.102
Adjusted Sig. (2-sided test)			.102

Homogeneous subsets are based on asymptotic significances. The significance level is .05.

¹Each cell shows the sample average rank.

 $^{^2\}mbox{Unable}$ to compute because the subset contains only one sample.

NPAR TESTS

/FRIEDMAN=Level Elevated Down
/STATISTICS DESCRIPTIVES
/MISSING LISTWISE.

NPar Tests

This test was run using Nonparametric Tests > Legacy Dialogs > k Related Samples. This procedure does not perform multiple comparisons.

Descriptive Statistics

	N	Mean	Std. Deviation	Minimum	Maximum
Level	6	115.0000	10.48809	100.00	130.00
Elevated	6	134.1667	19.60017	100.00	155.00
Down	6	148.3333	24.01388	110.00	175.00

Friedman Test

Ranks

	Mean Rank
Level	1.08
Elevated	2.08
Down	2.83

Test Statistics^a

N	6
Chi-Square	9.652
df	2
Asymp. Sig.	.008

a. Friedman Test