ONE-WAY

**General Linear Model: Logged Health Expenditure versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 8.554 | 22.36% | 8.554 | 1.7108 | 10.42 | 0.000 |
| Error | 181 | 29.707 | 77.64% | 29.707 | 0.1641 |  |  |
| Total | 186 | 38.261 | 100.00% |  |  |  |  |

**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.405124 | 22.36% | 20.21% | 31.9823 | 16.41% | 201.28 | 223.27 |

**Coefficients**

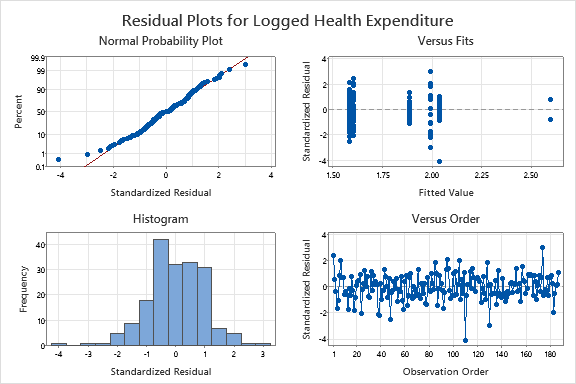
|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Term** | **Coef** | **SE Coef** | **95% CI** | **T-Value** | **P-Value** | **VIF** |
| Constant | 1.9506 | 0.0549 | (1.8423, 2.0588) | 35.56 | 0.000 |  |
| Continent |  |  |  |  |  |  |
| Africa | -0.3692 | 0.0715 | (-0.5103, -0.2281) | -5.16 | 0.000 | 1.90 |
| Asia | -0.3451 | 0.0741 | (-0.4913, -0.1988) | -4.65 | 0.000 | 1.87 |
| Europe | 0.0884 | 0.0754 | (-0.0603, 0.2371) | 1.17 | 0.242 | 1.86 |
| Latin America and the Caribbean | -0.0665 | 0.0802 | (-0.2247, 0.0917) | -0.83 | 0.408 | 1.83 |
| Northern America | 0.650 | 0.240 | (0.176, 1.124) | 2.71 | 0.007 | 5.96 |

**Regression Equation**

|  |  |  |
| --- | --- | --- |
| Logged Health Expenditure | = | 1.9506 - 0.3692 Continent\_Africa - 0.3451 Continent\_Asia + 0.0884 Continent\_Europe - 0.0665 Continent\_Latin America and the Caribbean + 0.650 Continent\_Northern America + 0.0425 Continent\_Oceania |

**Means**

|  |  |  |
| --- | --- | --- |
| **Term** | **Fitted Mean** | **SE Mean** |
| Continent |  |  |
| Africa | 1.5814 | 0.0562 |
| Asia | 1.6055 | 0.0611 |
| Europe | 2.0390 | 0.0633 |
| Latin America and the Caribbean | 1.8841 | 0.0716 |
| Northern America | 2.600 | 0.286 |
| Oceania | 1.993 | 0.101 |



ONE-WAY

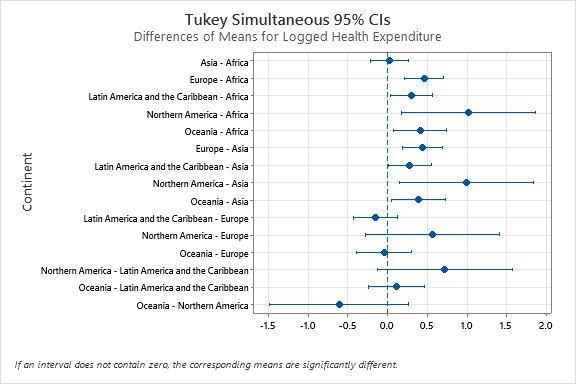
**Comparisons for Logged Health Expenditure**

**Tukey Pairwise Comparisons: Continent**

**Grouping Information Using the Tukey Method and 95% Confidence**

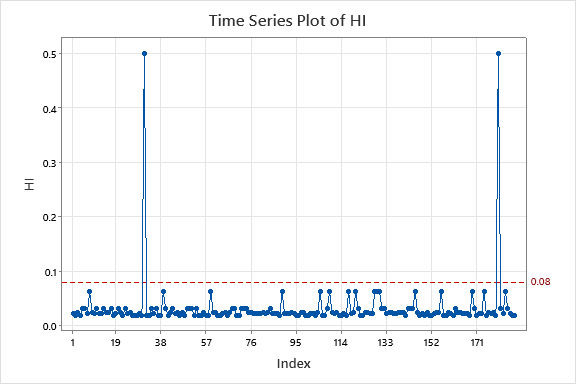
|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Continent** | **N** | **Mean** | **Grouping** | |
| Northern America | 2 | 2.60046 | A |  |
| Europe | 41 | 2.03899 | A |  |
| Oceania | 16 | 1.99306 | A |  |
| Latin America and the Caribbean | 32 | 1.88410 | A |  |
| Asia | 44 | 1.60553 |  | B |
| Africa | 52 | 1.58142 |  | B |

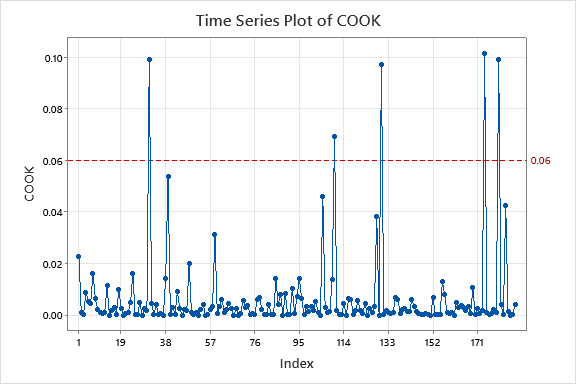
*Means that do not share a letter are significantly different.*



ONE-WAY

**Time Series Plot of HI, COOK**





ONE-WAY

**General Linear Model: absres versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 10.10 | 14.11% | 10.10 | 2.0205 | 5.95 | 0.000 |
| Error | 181 | 61.51 | 85.89% | 61.51 | 0.3398 |  |  |
| Total | 186 | 71.61 | 100.00% |  |  |  |  |

**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.582958 | 14.11% | 11.73% | 65.4386 | 8.62% | 337.38 | 359.38 |

ONE-WAY OMITTING 3 OUTLIERS

**General Linear Model: Logged Health Expenditure versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 9.284 | 27.71% | 9.284 | 1.8568 | 13.65 | 0.000 |
| Error | 178 | 24.221 | 72.29% | 24.221 | 0.1361 |  |  |
| Total | 183 | 33.505 | 100.00% |  |  |  |  |

**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.368883 | 27.71% | 25.68% | 26.0665 | 22.20% | 163.71 | 185.58 |

**Coefficients**

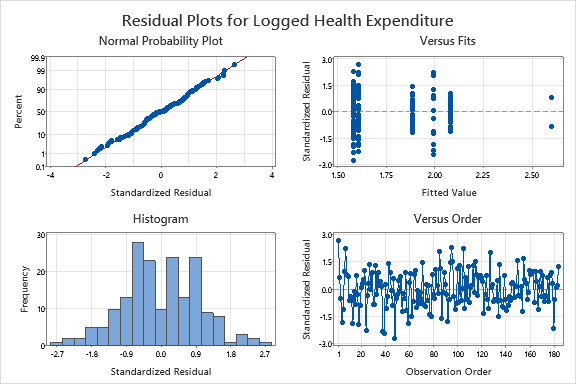
|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Term** | **Coef** | **SE Coef** | **95% CI** | **T-Value** | **P-Value** | **VIF** |
| Constant | 1.9571 | 0.0503 | (1.8578, 2.0564) | 38.90 | 0.000 |  |
| Continent |  |  |  |  |  |  |
| Africa | -0.3757 | 0.0654 | (-0.5047, -0.2466) | -5.75 | 0.000 | 1.83 |
| Asia | -0.3516 | 0.0678 | (-0.4853, -0.2178) | -5.19 | 0.000 | 1.79 |
| Europe | 0.1227 | 0.0693 | (-0.0140, 0.2594) | 1.77 | 0.078 | 1.77 |
| Latin America and the Caribbean | -0.0730 | 0.0733 | (-0.2176, 0.0716) | -1.00 | 0.320 | 1.74 |
| Northern America | 0.643 | 0.219 | (0.212, 1.075) | 2.94 | 0.004 | 5.36 |

**Regression Equation**

|  |  |  |
| --- | --- | --- |
| Logged Health Expenditure | = | 1.9571 - 0.3757 Continent\_Africa - 0.3516 Continent\_Asia + 0.1227 Continent\_Europe - 0.0730 Continent\_Latin America and the Caribbean + 0.643 Continent\_Northern America + 0.0342 Continent\_Oceania |

**Means**

|  |  |  |
| --- | --- | --- |
| **Term** | **Fitted Mean** | **SE Mean** |
| Continent |  |  |
| Africa | 1.5814 | 0.0512 |
| Asia | 1.6055 | 0.0556 |
| Europe | 2.0798 | 0.0583 |
| Latin America and the Caribbean | 1.8841 | 0.0652 |
| Northern America | 2.600 | 0.261 |
| Oceania | 1.9913 | 0.0986 |



ONE-WAY OMITTING 3 OUTLIERS

**General Linear Model: absres versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 9.434 | 15.44% | 9.434 | 1.8867 | 6.50 | 0.000 |
| Error | 178 | 51.658 | 84.56% | 51.658 | 0.2902 |  |  |
| Total | 183 | 61.092 | 100.00% |  |  |  |  |

**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.538716 | 15.44% | 13.07% | 54.8076 | 10.29% | 303.07 | 324.94 |

ONE-WAY OMITTING 3 OUTLIERS

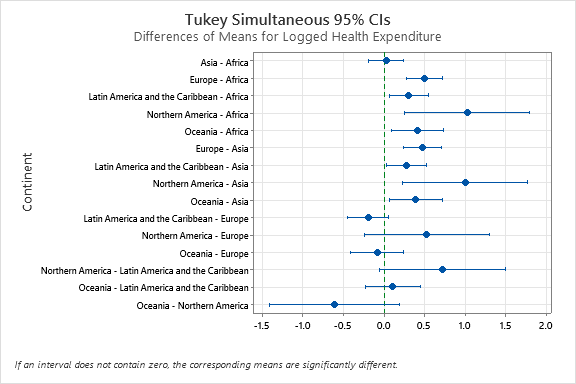
**Comparisons for Logged Health Expenditure**

**Tukey Pairwise Comparisons: Continent**

**Grouping Information Using the Tukey Method and 95% Confidence**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Continent** | **N** | **Mean** | **Grouping** | |
| Northern America | 2 | 2.60046 | A |  |
| Europe | 40 | 2.07983 | A |  |
| Oceania | 14 | 1.99128 | A |  |
| Latin America and the Caribbean | 32 | 1.88410 | A |  |
| Asia | 44 | 1.60553 |  | B |
| Africa | 52 | 1.58142 |  | B |

*Means that do not share a letter are significantly different.*



ONE-WAY OMITTING 3 OUTLIERS

**Descriptive Statistics: SRES**

**Statistics**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **Variable** | **Continent** | **N** | **N\*** | **Mean** | | **SE Mean** | | **StDev** | | **Minimum** | **Q1** |
| SRES | Africa | 52 | 0 | 0.000 | | 0.156 | | 1.127 | | -2.720 | -0.804 |
|  | Asia | 44 | 0 | 0.000 | | 0.174 | | 1.156 | | -2.241 | -0.742 |
|  | Europe | 40 | 0 | 0.0000 | | 0.0951 | | 0.6017 | | -1.0801 | -0.4879 |
|  | Latin America and the Caribbean | 32 | 0 | 0.000 | | 0.128 | | 0.722 | | -1.172 | -0.545 |
|  | Northern America | 2 | 0 | 0.000 | | 0.847 | | 1.198 | | -0.847 | \* |
|  | Oceania | 14 | 0 | 0.000 | | 0.409 | | 1.529 | | -2.419 | -1.353 |
| **Variable** | **Continent** | **Median** | | | **Q3** | | **Maximum** | |
| SRES | Africa | 0.103 | | | 0.877 | | 2.309 | |
|  | Asia | -0.278 | | | 0.933 | | 2.673 | |
|  | Europe | -0.0019 | | | 0.5764 | | 1.0426 | |
|  | Latin America and the Caribbean | -0.142 | | | 0.621 | | 1.440 | |
|  | Northern America | 0.000 | | | \* | | 0.847 | |
|  | Oceania | 0.447 | | | 1.030 | | 2.250 | |

ONE-WAY OMITTING 3 OUTLIERS

**General Linear Model: Logged Health Expenditure versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |
| Weights | wt |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 11.31 | 32.50% | 11.31 | 2.2622 | 17.14 | 0.000 |
| Error | 178 | 23.49 | 67.50% | 23.49 | 0.1320 |  |  |
| Total | 183 | 34.80 | 100.00% |  |  |  |  |

**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.363274 | 32.50% | 30.61% | 25.0319 | 28.07% | 134.39 | 156.25 |

**Coefficients**

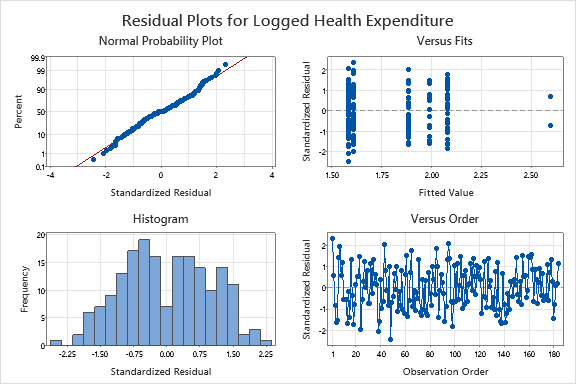
|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Term** | **Coef** | **SE Coef** | **95% CI** | **T-Value** | **P-Value** | **VIF** |
| Constant | 1.9571 | 0.0595 | (1.8398, 2.0745) | 32.91 | 0.000 |  |
| Continent |  |  |  |  |  |  |
| Africa | -0.3757 | 0.0754 | (-0.5245, -0.2269) | -4.98 | 0.000 | 1.81 |
| Asia | -0.3516 | 0.0788 | (-0.5071, -0.1961) | -4.46 | 0.000 | 1.70 |
| Europe | 0.1227 | 0.0658 | (-0.0072, 0.2526) | 1.86 | 0.064 | 2.41 |
| Latin America and the Caribbean | -0.0730 | 0.0705 | (-0.2121, 0.0661) | -1.04 | 0.302 | 2.08 |
| Northern America | 0.643 | 0.258 | (0.134, 1.153) | 2.49 | 0.014 | 3.69 |

**Regression Equation**

|  |  |  |
| --- | --- | --- |
| Logged Health Expenditure | = | 1.9571 - 0.3757 Continent\_Africa - 0.3516 Continent\_Asia + 0.1227 Continent\_Europe - 0.0730 Continent\_Latin America and the Caribbean + 0.643 Continent\_Northern America + 0.034 Continent\_Oceania |

**Means**

|  |  |  |
| --- | --- | --- |
| **Term** | **Fitted Mean** | **SE Mean** |
| Continent |  |  |
| Africa | 1.5814 | 0.0568 |
| Asia | 1.6055 | 0.0633 |
| Europe | 2.0798 | 0.0346 |
| Latin America and the Caribbean | 1.8841 | 0.0464 |
| Northern America | 2.600 | 0.308 |
| Oceania | 1.991 | 0.148 |



ONE-WAY OMITTING 3 OUTLIERS

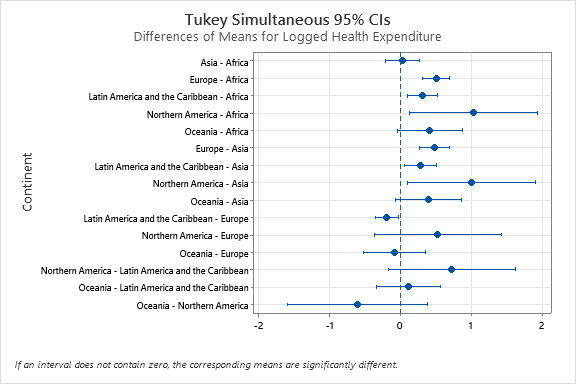
**Comparisons for Logged Health Expenditure**

**Tukey Pairwise Comparisons: Continent**

**Grouping Information Using the Tukey Method and 95% Confidence**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Continent** | **N** | **Mean** | **Grouping** | | |
| Northern America | 2 | 2.60046 | A | B |  |
| Europe | 40 | 2.07983 | A |  |  |
| Oceania | 14 | 1.99128 | A | B | C |
| Latin America and the Caribbean | 32 | 1.88410 |  | B |  |
| Asia | 44 | 1.60553 |  |  | C |
| Africa | 52 | 1.58142 |  |  | C |

*Means that do not share a letter are significantly different.*



ONE-WAY OMITTING 3 OUTLIERS

**General Linear Model: absres\_1 versus Continent**

**Method**

|  |  |
| --- | --- |
| Factor coding | (-1, 0, +1) |
| Weights | wt |

**Factor Information**

|  |  |  |  |
| --- | --- | --- | --- |
| **Factor** | **Type** | **Levels** | **Values** |
| Continent | Fixed | 6 | Africa, Asia, Europe, Latin America and the Caribbean, Northern America, Oceania |

**Analysis of Variance**

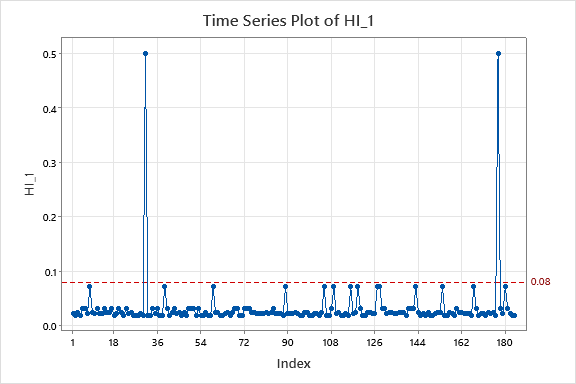
|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Source** | **DF** | **Seq SS** | **Contribution** | **Adj SS** | **Adj MS** | **F-Value** | **P-Value** |
| Continent | 5 | 0.1169 | 0.18% | 0.1169 | 0.02338 | 0.06 | 0.997 |
| Error | 178 | 64.8568 | 99.82% | 64.8568 | 0.36436 |  |  |
| Total | 183 | 64.9737 | 100.00% |  |  |  |  |

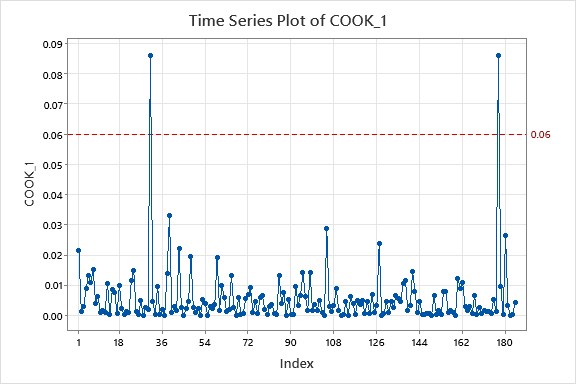
**Model Summary**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **S** | **R-sq** | **R-sq(adj)** | **PRESS** | **R-sq(pred)** | **AICc** | **BIC** |
| 0.603626 | 0.18% | 0.00% | 68.3645 | 0.00% | 321.26 | 343.12 |

ONE-WAY OMITTING 3 OUTLIERS

**Time Series Plot of HI\_1, COOK\_1**





ONE-WAY OMITTING 3 OUTLIERS

**Boxplot of SRES\_1**

