Table 4. Summary of Statistical Models Used in the Generation of Seasonally Adjusted CPI (2012=100)

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
All Items – PHILS	Multiplicative Model: (2,1,2)(0,1,1) With transformation - none F-value: 3.514 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.91 Check: M4, M7, M8, M9, M10, M11
All Items – NCR	Additive Model: (2,1,2)(0,1,1) With transformation - none F-value: 1.518 MAVS: 3x5 MA MAVTC: 9-term MA	Conditionally rejected at level 1.11 Check: M7, M8, M9, M10, M11
All Items – AONCR	Multiplicative Model: (2,1,2)(0,1,1) With transformation - none F-value: 3.432 MAVS: 3x5 MA MAVTC: 9-term MA	Conditionally rejected at level 0.93 Check: M4, M7, M8, M9, M10, M11
Food and Non- alcoholic Beverages – PHILS	Multiplicative Model: (2,1,0)(0,1,1) With transformation - none F-value: 8.073 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.74 Check: M8, M9, M10, M11
Food and Non- alcoholic Beverages – NCR	Multiplicative Model: (2,1,2)(0,1,1) With transformation - none F-value: 7.765 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.80 Check: M4, M7, M8, M9, M10, M11

January 2012 - October 2021

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
Food and Non- alcoholic Beverages – AONCR	Multiplicative Model: (2,1,2)(0,1,1) With transformation - none F-value: 7.603 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.73 Check: M4, M8, M9, M10, M11
Alcoholic Beverages and Tobacco – PHILS	Additive Model: (0,2,2)(0,1,1) With transformation - none F-value: 12.568 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.48 Check: M4, M10, M11
Alcoholic Beverages and Tobacco – NCR	Multiplicative Model: (0,1,2)(0,1,1) With transformation - none F-value: 15.583 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.48 Check: M4, M10, M11
Alcoholic Beverages and Tobacco – AONCR	Additive Model: (0,2,2)(0,1,1) With transformation - none F-value: 13.884 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.44 Check: M4, M10, M11
Non-Food – PHILS	Additive Model: (2,1,2)(0,1,1) With transformation - none F-Value: 1.767 MAVS: 3x5 MA MAVTC: 9-term MA	Accepted at level 0.88 Check: M7, M8, M9, M10, M11
Non-Food – NCR	Additive Model: (2,1,2)(0,1,1) With transformation - none F-Value: 2.101 MAVS: 3x9 MA MAVTC: 9-term MA	Accepted at level 0.69 Check: M7

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
Non-Food – AONCR	Additive Model: (2,1,2)(0,1,1) With transformation - none F-Value: 1.276 MAVS: 3x5 MA MAVTC: 9-term MA	Conditionally accepted at level 1.01 Check: M7, M8, M9, M10, M11
Clothing and Footwear - PHILS	Multiplicative Model: (2,1,0)(0,1,1) With transformation - none F-value: 4.448 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.78 Check: M7, M8, M9, M10, M11
Clothing and Footwear - NCR	Additive Model: None With transformation - none F-value: 2.557 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.80 Check: M7, M8, M9, M10, M11
Clothing and Footwear - AONCR	Additive Model: (0,1,2)(0,1,1) With transformation - none F-value: 3.886 MAVS: 3X3 MA MAVTC: 9-term MA	Conditionally accepted at level 0.85 Check: M7, M8, M9, M10, M11
Housing, Water, Electricity, Gas and Other Fuels - PHILS	Additive Model: (2,1,2)(0,1,1) With transformation - none F-value: 6.061 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.60 Check: M8, M10, M11
Housing, Water, Electricity, Gas and Other Fuels - NCR	Additive Model: (2,1,0)(0,1,1) With transformation - none F-value: 4.648 MAVS: 3X9 MA MAVTC: 13-term MA	Accepted at level 0.96 Check: M1, M4, M7

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
Housing, Water, Electricity, Gas and Other Fuels - AONCR	Additive Model: (2,1,0)(0,1,1) With transformation - none F-value: 5.373 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.73 Check: M4, M8, M9, M10, M11
Furnishing, Household Equipment and Routine Maintenance of the House -PHILS	Additive Model: (2,1,0)(0,1,1) With transformation - none F-value: 7.924 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.53 Check: M7, M8, M9, M10, M11
Furnishing, Household Equipment and Routine Maintenance of the House -NCR	Additive Model: (0,1,1)(0,1,1) With transformation – none F-value: 5.505 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.83 Check: M7, M8, M9, M10, M11
Furnishing, Household Equipment and Routine Maintenance of the House -AONCR	Additive Model: (2,1,0)(0,1,1) With transformation - none F-value: 5.048 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.57 Check: M7, M8, M10, M11
Health – PHILS	Multiplicative Model: (2,1,0)(0,1,1) With transformation – none F-value: 9.294 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.56 Check: M8, M9, M10, M11

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
Health –NCR	Multiplicative Model: (0,1,2)(0,1,1) With transformation - none F-value: 14.528 MAVS: 3X3 MA MAVTC: 9-term MA	Accepted at level 0.54 Check: M8, M10, M11
Health – AONCR	Additive Model: (2,1,0)(0,1,1) With transformation - none F-value: 4.418 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.69 Check: M7, M8, M9, M10, M11
Transport – NCR	Multiplicative Model: (2,1,2)(0,1,1) With transformation - none F-value: 2.888 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.92 Check: M4, M7, M8, M10, M11
Recreation and Culture - PHILS	Multiplicative Model: (0,1,1)(0,1,1) With transformation – none F-value: 3.736 MAVS: 3X3 MA MAVTC: 9-term MA	Conditionally accepted at level 0.93 Check: M4, M7, M8, M9, M10
Recreation and Culture - NCR	Additive Model: (2,1,2)(0,1,1) With transformation – none F-value: 7.133 MAVS: 3X3 MA MAVTC: 9-term MA	Accepted at level 0.75 Check: M7, M8, M9, M10, M11
Recreation and Culture - AONCR	Additive Model: (0,1,2)(0,1,1) With transformation –none F-value: 3.304 MAVS: 3X3 MA MAVTC: 9-term MA	Conditionally accepted at level 0.95 Check: M7, M8, M9, M10

Series Name/ Geographic Area Covered	Statistical Models/Options	Summary Measures
Education – PHILS	Additive Model: (0,1,1)(0,1,1) With transformation - none F-value: 11.300 MAVS: 3X3 MA MAVTC: 9-term MA	Accepted at level 0.62 Check: M4, M8, M10, M11
Education –NCR	Multiplicative Model: (0,1,2)(0,1,1) With transformation - none F-value: 33.763 MAVS: 3X3 MA MAVTC: 9-term MA	Accepted at level 0.45 Check: M4
Education - AONCR	Additive Model: (2,1,2)(0,1,1) With transformation - none F-value: 7.204 MAVS: 3X3 MA MAVTC: 9-term MA	Conditionally accepted at level 0.70 Check: M4, M7, M8, M9, M10, M11
Restaurant and Miscellaneous Goods and Services - PHILS	Additive Model: (2,1,2)(0,1,1) With transformation - none F-value: 2.616 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.70 Check: M7, M8, M9, M10, M11
Restaurant and Miscellaneous Goods and Services – NCR	Multiplicative Model: (2,1,0)(0,1,1) With transformation - none F-value: 3.315 MAVS: 3X5 MA MAVTC: 9-term MA	Accepted at level 0.74 Check: M7, M8, M9, M10, M11
Restaurant and Miscellaneous Goods and Services – AONCR	Additive Model: (2,1,2)(0,1,1) With transformation - none F-value: 2.168 MAVS: 3X5 MA MAVTC: 9-term MA	Conditionally accepted at level 0.88 Check: M7, M8, M9, M10, M11

Source: Philippine Statistics Authority