# C: AMOS\_Convergent\_Validity.amw

## Analysis Summary

## Date and Time

Date: Friday, March 29, 2024

Time: 11:23:27 AM

## Title

Amos\_convergent\_validity: Friday, March 29, 2024 11:23 AM

## Groups

## Group number 1 (Group number 1)

## Notes for Group (Group number 1)

The model is recursive.

Sample size = 834

## Variable Summary (Group number 1)

## Your model contains the following variables (Group number 1)

Observed, endogenous variables

accurate

fair

trustworthy

reputable

correct

errorfree

objective

authentic

balanced

credible

reliable

honest

relevanttome

relevanttoothers

meaningful

easytoread

easytoexplain

Unobserved, exogenous variables

u7

u8

u9

u10

u11

u12

u13

u14

u15

u17

u18

u19

u20

u21

u22

u23

u24

Relevance

readability

mapTrust

## Variable counts (Group number 1)

|  |  |
| --- | --- |
| **Number of variables in your model:** | 37 |
| **Number of observed variables:** | 17 |
| **Number of unobserved variables:** | 20 |
| **Number of exogenous variables:** | 20 |
| **Number of endogenous variables:** | 17 |

## Parameter Summary (Group number 1)

|  | **Weights** | **Covariances** | **Variances** | **Means** | **Intercepts** | **Total** |
| --- | --- | --- | --- | --- | --- | --- |
| **Fixed** | 20 | 0 | 0 | 0 | 0 | 20 |
| **Labeled** | 0 | 0 | 0 | 0 | 0 | 0 |
| **Unlabeled** | 14 | 3 | 20 | 0 | 0 | 37 |
| **Total** | 34 | 3 | 20 | 0 | 0 | 57 |

## Models

## Default model (Default model)

## Notes for Model (Default model)

## Computation of degrees of freedom (Default model)

|  |  |
| --- | --- |
| **Number of distinct sample moments:** | 153 |
| **Number of distinct parameters to be estimated:** | 37 |
| **Degrees of freedom (153 - 37):** | 116 |

## Result (Default model)

Minimum was achieved

Chi-square = 860.504

Degrees of freedom = 116

Probability level = .000

## Group number 1 (Group number 1 - Default model)

## Estimates (Group number 1 - Default model)

## Scalar Estimates (Group number 1 - Default model)

## Maximum Likelihood Estimates

## Regression Weights: (Group number 1 - Default model)

|  |  |  | **Estimate** | **S.E.** | **C.R.** | **P** | **Label** |
| --- | --- | --- | --- | --- | --- | --- | --- |
| relevanttome | <--- | Relevance | 1.000 |  |  |  |  |
| relevanttoothers | <--- | Relevance | 1.027 | .044 | 23.465 | \*\*\* |  |
| meaningful | <--- | Relevance | .425 | .033 | 12.809 | \*\*\* |  |
| easytoread | <--- | readability | 1.000 |  |  |  |  |
| easytoexplain | <--- | readability | .979 | .043 | 22.778 | \*\*\* |  |
| accurate | <--- | mapTrust | 1.000 |  |  |  |  |
| fair | <--- | mapTrust | .980 | .027 | 35.683 | \*\*\* |  |
| trustworthy | <--- | mapTrust | 1.038 | .026 | 39.572 | \*\*\* |  |
| reputable | <--- | mapTrust | 1.011 | .028 | 36.730 | \*\*\* |  |
| correct | <--- | mapTrust | .946 | .025 | 37.234 | \*\*\* |  |
| errorfree | <--- | mapTrust | .928 | .030 | 30.497 | \*\*\* |  |
| objective | <--- | mapTrust | .817 | .034 | 23.858 | \*\*\* |  |
| authentic | <--- | mapTrust | .971 | .027 | 35.806 | \*\*\* |  |
| balanced | <--- | mapTrust | .942 | .033 | 28.670 | \*\*\* |  |
| credible | <--- | mapTrust | 1.009 | .027 | 37.026 | \*\*\* |  |
| reliable | <--- | mapTrust | 1.047 | .027 | 38.667 | \*\*\* |  |
| honest | <--- | mapTrust | .988 | .025 | 39.274 | \*\*\* |  |

## Standardized Regression Weights: (Group number 1 - Default model)

|  |  |  | **Estimate** |
| --- | --- | --- | --- |
| relevanttome | <--- | Relevance | .902 |
| relevanttoothers | <--- | Relevance | .878 |
| meaningful | <--- | Relevance | .448 |
| easytoread | <--- | readability | .893 |
| easytoexplain | <--- | readability | .881 |
| accurate | <--- | mapTrust | .896 |
| fair | <--- | mapTrust | .850 |
| trustworthy | <--- | mapTrust | .889 |
| reputable | <--- | mapTrust | .861 |
| correct | <--- | mapTrust | .866 |
| errorfree | <--- | mapTrust | .786 |
| objective | <--- | mapTrust | .679 |
| authentic | <--- | mapTrust | .851 |
| balanced | <--- | mapTrust | .759 |
| credible | <--- | mapTrust | .864 |
| reliable | <--- | mapTrust | .880 |
| honest | <--- | mapTrust | .886 |

## Covariances: (Group number 1 - Default model)

|  |  |  | **Estimate** | **S.E.** | **C.R.** | **P** | **Label** |
| --- | --- | --- | --- | --- | --- | --- | --- |
| Relevance | <--> | mapTrust | .815 | .084 | 9.750 | \*\*\* |  |
| readability | <--> | mapTrust | 1.187 | .097 | 12.212 | \*\*\* |  |
| Relevance | <--> | readability | 1.334 | .132 | 10.073 | \*\*\* |  |
|  |  |  |  |  |  |  |  |

## Correlations: (Group number 1 - Default model)

|  |  |  | **Estimate** |
| --- | --- | --- | --- |
| Relevance | <--> | mapTrust | .400 |
| readability | <--> | mapTrust | .540 |
| Relevance | <--> | readability | .441 |

## Variances: (Group number 1 - Default model)

|  |  |  | **Estimate** | **S.E.** | **C.R.** | **P** | **Label** |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Relevance** |  |  | 2.805 | .194 | 14.485 | \*\*\* |  |
| **readability** |  |  | 3.262 | .230 | 14.164 | \*\*\* |  |
| **mapTrust** |  |  | 1.480 | .089 | 16.609 | \*\*\* |  |
| **u7** |  |  | .364 | .020 | 17.894 | \*\*\* |  |
| **u8** |  |  | .547 | .029 | 18.805 | \*\*\* |  |
| **u9** |  |  | .424 | .023 | 18.085 | \*\*\* |  |
| **u10** |  |  | .528 | .028 | 18.640 | \*\*\* |  |
| **u11** |  |  | .441 | .024 | 18.554 | \*\*\* |  |
| **u12** |  |  | .790 | .041 | 19.414 | \*\*\* |  |
| **u13** |  |  | 1.158 | .058 | 19.883 | \*\*\* |  |
| **u14** |  |  | .530 | .028 | 18.787 | \*\*\* |  |
| **u15** |  |  | .963 | .049 | 19.569 | \*\*\* |  |
| **u17** |  |  | .512 | .028 | 18.590 | \*\*\* |  |
| **u18** |  |  | .472 | .026 | 18.282 | \*\*\* |  |
| **u19** |  |  | .396 | .022 | 18.152 | \*\*\* |  |
| **u20** |  |  | .642 | .105 | 6.135 | \*\*\* |  |
| **u21** |  |  | .875 | .114 | 7.693 | \*\*\* |  |
| **u22** |  |  | 2.012 | .102 | 19.776 | \*\*\* |  |
| **u23** |  |  | .829 | .127 | 6.521 | \*\*\* |  |
| **u24** |  |  | .904 | .124 | 7.309 | \*\*\* |  |

## Minimization History (Default model)

| **Iteration** |  | **Negative eigenvalues** | **Condition #** | **Smallest eigenvalue** | **Diameter** | **F** | **NTries** | **Ratio** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **0** | e | 11 |  | -1.943 | 9999.000 | 12304.003 | 0 | 9999.000 |
| **1** | e\* | 6 |  | -.225 | 6.833 | 4972.996 | 20 | .075 |
| **2** | e\* | 3 |  | -.097 | 1.987 | 3312.307 | 5 | .595 |
| **3** | e | 2 |  | -.084 | 1.228 | 2279.142 | 5 | .875 |
| **4** | e | 1 |  | -.026 | 1.552 | 1197.392 | 5 | .888 |
| **5** | e | 0 | 54.405 |  | 1.054 | 892.254 | 5 | .779 |
| **6** | e | 0 | 51.391 |  | .085 | 863.078 | 1 | 1.139 |
| **7** | e | 0 | 53.481 |  | .042 | 860.560 | 1 | 1.091 |
| **8** | e | 0 | 53.405 |  | .008 | 860.504 | 1 | 1.017 |
| **9** | e | 0 | 53.286 |  | .000 | 860.504 | 1 | 1.000 |

## Model Fit Summary

## CMIN

| **Model** | **NPAR** | **CMIN** | **DF** | **P** | **CMIN/DF** |
| --- | --- | --- | --- | --- | --- |
| **Default model** | 37 | 860.504 | 116 | .000 | 7.418 |
| **Saturated model** | 153 | .000 | 0 |  |  |
| **Independence model** | 17 | 12906.946 | 136 | .000 | 94.904 |

## RMR, GFI

| **Model** | **RMR** | **GFI** | **AGFI** | **PGFI** |
| --- | --- | --- | --- | --- |
| **Default model** | .308 | .900 | .868 | .682 |
| **Saturated model** | .000 | 1.000 |  |  |
| **Independence model** | 1.226 | .157 | .052 | .140 |

## Baseline Comparisons

| **Model** | **NFI Delta1** | **RFI rho1** | **IFI Delta2** | **TLI rho2** | **CFI** |
| --- | --- | --- | --- | --- | --- |
| **Default model** | .933 | .922 | .942 | .932 | .942 |
| **Saturated model** | 1.000 |  | 1.000 |  | 1.000 |
| **Independence model** | .000 | .000 | .000 | .000 | .000 |

## Parsimony-Adjusted Measures

| **Model** | **PRATIO** | **PNFI** | **PCFI** |
| --- | --- | --- | --- |
| **Default model** | .853 | .796 | .803 |
| **Saturated model** | .000 | .000 | .000 |
| **Independence model** | 1.000 | .000 | .000 |

## NCP

| **Model** | **NCP** | **LO 90** | **HI 90** |
| --- | --- | --- | --- |
| **Default model** | 744.504 | 655.007 | 841.469 |
| **Saturated model** | .000 | .000 | .000 |
| **Independence model** | 12770.946 | 12401.349 | 13146.841 |

## FMIN

| **Model** | **FMIN** | **F0** | **LO 90** | **HI 90** |
| --- | --- | --- | --- | --- |
| **Default model** | 1.033 | .894 | .786 | 1.010 |
| **Saturated model** | .000 | .000 | .000 | .000 |
| **Independence model** | 15.495 | 15.331 | 14.888 | 15.783 |

## RMSEA

| **Model** | **RMSEA** | **LO 90** | **HI 90** | **PCLOSE** |
| --- | --- | --- | --- | --- |
| **Default model** | .088 | .082 | .093 | .000 |
| **Independence model** | .336 | .331 | .341 | .000 |

## AIC

| **Model** | **AIC** | **BCC** | **BIC** | **CAIC** |
| --- | --- | --- | --- | --- |
| **Default model** | 934.504 | 936.138 | 1109.375 | 1146.375 |
| **Saturated model** | 306.000 | 312.758 | 1029.114 | 1182.114 |
| **Independence model** | 12940.946 | 12941.697 | 13021.292 | 13038.292 |

## ECVI

| **Model** | **ECVI** | **LO 90** | **HI 90** | **MECVI** |
| --- | --- | --- | --- | --- |
| **Default model** | 1.122 | 1.014 | 1.238 | 1.124 |
| **Saturated model** | .367 | .367 | .367 | .375 |
| **Independence model** | 15.535 | 15.092 | 15.987 | 15.536 |

## HOELTER

| **Model** | **HOELTER .05** | **HOELTER .01** |
| --- | --- | --- |
| **Default model** | 138 | 150 |
| **Independence model** | 11 | 12 |

## Execution time summary

|  |  |
| --- | --- |
| **Minimization:** | .020 |
| **Miscellaneous:** | .202 |
| **Bootstrap:** | .000 |
| **Total:** | .222 |