# 1 Summaries of Parametric Statistics Analysis for the scores of Perceived Competence

Table 1: Summary of one-way ANOVA results for the scores of Perceived Competence

|  | Sum Sq | Df | F value | Pr(>F) | Sig |
|---|---|---|---|---|---|
| Age.(Intercept) | 624.023 | 1 | 273.048 | 0.000 | |
| Age.Age | 2.510 | 2 | 0.549 | 0.581 | |
| Age.Residuals | 105.128 | 46 | | | |
| Sex.(Intercept) | 770.208 | 1 | 336.406 | 0.000 | |
| Sex.Sex | 0.031 | 1 | 0.014 | 0.908 | |
| Sex.Residuals | 107.607 | 47 | | | |
| AcademicDegree.(Intercept) | 394.742 | 1 | 278.601 | 0.000 | |
| AcademicDegree.AcademicDegree | 19.625 | 2 | 6.925 | 0.003 | ** |
| AcademicDegree.Residuals | 59.509 | 42 | | | |
| KnownDomainContent.KnownDomainContent | 7.848 | 1 | 4.297 | 0.044 | |
| KnownDomainContent.Residuals | 80.365 | 44 | | | |
| LikeDomainContent.(Intercept) | 1013.055 | 1 | 535.132 | 0.000 | |
| LikeDomainContent.LikeDomainContent | 0.365 | 1 | 0.193 | 0.663 | |
| LikeDomainContent.Residuals | 85.189 | 45 | | | |
| LikeActionGames.(Intercept) | 992.878 | 1 | 434.051 | 0.000 | |
| LikeActionGames.LikeActionGames | 0.127 | 1 | 0.056 | 0.815 | |
| LikeActionGames.Residuals | 107.511 | 47 | | | |
| LikeAdventureGames.(Intercept) | 848.691 | 1 | 401.252 | 0.000 | |
| LikeAdventureGames.LikeAdventureGames | 8.228 | 1 | 3.890 | 0.054 | |
| LikeAdventureGames.Residuals | 99.410 | 47 | | | |
| LikeFightingGames.(Intercept) | 896.857 | 1 | 396.066 | 0.000 | |
| LikeFightingGames.LikeFightingGames | 1.211 | 1 | 0.535 | 0.468 | |
| LikeFightingGames.Residuals | 106.427 | 47 | | | |
| LikeFictionGames.(Intercept) | 956.256 | 1 | 420.780 | 0.000 | |
| LikeFictionGames.LikeFictionGames | 0.827 | 1 | 0.364 | 0.549 | |
| LikeFictionGames.Residuals | 106.811 | 47 | | | |
| LikePlatformerGames.LikePlatformerGames | 9.136 | 1 | 5.683 | 0.022 | |
| LikePlatformerGames.Residuals | 70.737 | 44 | | | |
| LikePuzzleGames.(Intercept) | 981.123 | 1 | 428.911 | 0.000 | |
| LikePuzzleGames.LikePuzzleGames | 0.127 | 1 | 0.056 | 0.815 | |
| LikePuzzleGames.Residuals | 107.511 | 47 | | | |
| LikeRacingGames.(Intercept) | 858.004 | 1 | 375.920 | 0.000 | |
| LikeRacingGames.LikeRacingGames | 0.365 | 1 | 0.160 | 0.691 | |
| LikeRacingGames.Residuals | 107.273 | 47 | | | |
| LikeMusicalGames.(Intercept) | 809.571 | 1 | 353.512 | 0.000 | |
| LikeMusicalGames.LikeMusicalGames | 0.005 | 1 | 0.002 | 0.964 | |
| LikeMusicalGames.Residuals | 107.634 | 47 | | | |
| LikeMMORPGGames.(Intercept) | 981.319 | 1 | 449.929 | 0.000 | |
| LikeMMORPGGames.LikeMMORPGGames | 5.129 | 1 | 2.352 | 0.132 | |
| LikeMMORPGGames.Residuals | 102.509 | 47 | | | |

Table 1: *(continued)*

|  | Sum Sq | Df | F value | Pr(>F) | Sig |
|---|---|---|---|---|---|
| LikeShooterGames.(Intercept) | 985.166 | 1 | 436.639 | 0.000 | |
| LikeShooterGames.LikeShooterGames | 1.595 | 1 | 0.707 | 0.405 | |
| LikeShooterGames.Residuals | 106.044 | 47 | | | |
| LikeSimulationGames.(Intercept) | 880.056 | 1 | 384.571 | 0.000 | |
| LikeSimulationGames.LikeSimulationGames | 0.083 | 1 | 0.036 | 0.850 | |
| LikeSimulationGames.Residuals | 107.555 | 47 | | | |
| LikeSportsGames.(Intercept) | 417.840 | 1 | 182.601 | 0.000 | |
| LikeSportsGames.LikeSportsGames | 0.090 | 1 | 0.039 | 0.844 | |
| LikeSportsGames.Residuals | 107.549 | 47 | | | |
| LikeStrategyGames.(Intercept) | 665.939 | 1 | 309.640 | 0.000 | |
| LikeStrategyGames.LikeStrategyGames | 6.556 | 1 | 3.048 | 0.087 | |
| LikeStrategyGames.Residuals | 101.082 | 47 | | | |
| LikeNovelGames.(Intercept) | 688.241 | 1 | 325.585 | 0.000 | |
| LikeNovelGames.LikeNovelGames | 8.287 | 1 | 3.920 | 0.054 | |
| LikeNovelGames.Residuals | 99.352 | 47 | | | |

Signif. codes: 0 "**" 0.01 "*" 0.05

Table 2: Descriptive statistics and Tukey post-hoc test results for the scores of Perceived Competence

| | N | mean | lsmean | SE | df | lwr.CI | upr.CI | t.ratio | p.value | p.ajd | g | sig | mag |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Age.adolescence | 10 | 4.150 | 4.150 | 0.478 | 46 | 3.188 | 5.112 | | | | | | |
| Age.adulthood | 7 | 4.262 | 4.262 | 0.571 | 46 | 3.112 | 5.412 | | | | | | |
| Age.adolescence - adulthood | 17 | −0.112 | −0.112 | 0.745 | 46 | −1.916 | 1.692 | −0.150 | 0.988 | 0.988 | −0.058 | | |
| Age.adolescence1 | 10 | 4.150 | 4.150 | 0.478 | 46 | 3.188 | 5.112 | | | | | | |
| Age.emerging-adulthood | 32 | 4.667 | 4.667 | 0.267 | 46 | 4.129 | 5.205 | | | | | | |
| Age.adolescence - emerging-adulthood | 42 | −0.517 | −0.517 | 0.548 | 46 | −1.843 | 0.810 | −0.943 | 0.616 | 0.616 | −0.355 | | |
| Age.adulthood1 | 7 | 4.262 | 4.262 | 0.571 | 46 | 3.112 | 5.412 | | | | | | |
| Age.emerging-adulthood1 | 32 | 4.667 | 4.667 | 0.267 | 46 | 4.129 | 5.205 | | | | | | |
| Age.adulthood - emerging-adulthood | 39 | −0.405 | −0.405 | 0.631 | 46 | −1.932 | 1.123 | −0.642 | 0.798 | 0.798 | −0.273 | | |
| Sex.female | 13 | 4.462 | 4.462 | 0.420 | 47 | 3.617 | 5.306 | | | | | | |
| Sex.male | 36 | 4.519 | 4.519 | 0.252 | 47 | 4.011 | 5.026 | | | | | | |
| Sex.female - male | 49 | −0.057 | −0.057 | 0.490 | 47 | −1.042 | 0.928 | −0.116 | 0.908 | 0.908 | −0.037 | | |
| AcademicDegree.basic-school | 10 | 3.467 | 3.467 | 0.376 | 42 | 2.707 | 4.226 | | | | | | |
| AcademicDegree.postgraduate | 4 | 3.833 | 3.833 | 0.595 | 42 | 2.632 | 5.034 | | | | | | |
| AcademicDegree.basic-school - postgraduate | 14 | −0.367 | −0.367 | 0.704 | 42 | −2.078 | 1.344 | −0.521 | 0.862 | 0.862 | −0.268 | | |
| AcademicDegree.basic-school1 | 10 | 3.467 | 3.467 | 0.376 | 42 | 2.707 | 4.226 | | | | | | |
| AcademicDegree.undergraduate | 31 | 4.984 | 4.984 | 0.214 | 42 | 4.552 | 5.415 | | | | | | |
| AcademicDegree.basic-school - undergraduate | 41 | −1.517 | −1.517 | 0.433 | 42 | −2.569 | −0.466 | −3.505 | 0.003 | 0.003 | −1.220 | ** | large |
| AcademicDegree.postgraduate1 | 4 | 3.833 | 3.833 | 0.595 | 42 | 2.632 | 5.034 | | | | | | |
| AcademicDegree.undergraduate1 | 31 | 4.984 | 4.984 | 0.214 | 42 | 4.552 | 5.415 | | | | | | |
| AcademicDegree.postgraduate - undergraduate | 35 | −1.151 | −1.151 | 0.632 | 42 | −2.687 | 0.386 | −1.819 | 0.176 | 0.176 | −1.005 | | |
| KnownDomainContent.no | 23 | 4.239 | 4.239 | 0.282 | 44 | 3.671 | 4.807 | | | | | | |
| KnownDomainContent.yes | 23 | 5.065 | 5.065 | 0.282 | 44 | 4.497 | 5.633 | | | | | | |
| KnownDomainContent.no - yes | 46 | −0.826 | −0.826 | 0.399 | 44 | −1.629 | −0.023 | −2.073 | 0.044 | 0.044 | −0.601 | * | medium |
| LikeDomainContent.no | 24 | 4.556 | 4.556 | 0.281 | 45 | 3.990 | 5.121 | | | | | | |
| LikeDomainContent.yes | 23 | 4.732 | 4.732 | 0.287 | 45 | 4.154 | 5.310 | | | | | | |
| LikeDomainContent.no - yes | 47 | −0.176 | −0.176 | 0.401 | 45 | −0.985 | 0.632 | −0.439 | 0.663 | 0.663 | −0.126 | | |

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Table 2: *(continued)*

| | N | mean | lsmean | SE | df | lwr.CI | upr.CI | t.ratio | p.value | p.ajd | g | sig | mag |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| LikeActionGames.no | 24 | 4.451 | 4.451 | 0.309 | 47 | 3.830 | 5.072 | | | | | | |
| LikeActionGames.yes | 25 | 4.553 | 4.553 | 0.302 | 47 | 3.945 | 5.162 | | | | | | |
| LikeActionGames.no - yes | 49 | −0.102 | −0.102 | 0.432 | | −0.971 | 0.768 | −0.236 | 0.815 | 0.815 | −0.066 | | |
| LikeAdventureGames.no | 17 | 3.941 | 3.941 | 0.353 | 47 | 3.232 | 4.651 | | | | | | |
| LikeAdventureGames.yes | 32 | 4.802 | 4.802 | 0.257 | 47 | 4.285 | 5.319 | | | | | | |
| LikeAdventureGames.no - yes | 49 | −0.861 | −0.861 | 0.436 | | −1.739 | 0.017 | −1.972 | 0.054 | 0.054 | −0.582 | | |
| LikeFightingGames.no | 33 | 4.394 | 4.394 | 0.262 | 47 | 3.867 | 4.921 | | | | | | |
| LikeFightingGames.yes | 16 | 4.729 | 4.729 | 0.376 | 47 | 3.972 | 5.486 | | | | | | |
| LikeFightingGames.no - yes | 49 | −0.335 | −0.335 | 0.458 | | −1.257 | 0.587 | −0.731 | 0.468 | 0.468 | −0.219 | | |
| LikeFictionGames.no | 30 | 4.400 | 4.400 | 0.275 | 47 | 3.846 | 4.954 | | | | | | |
| LikeFictionGames.yes | 19 | 4.667 | 4.667 | 0.346 | 47 | 3.971 | 5.362 | | | | | | |
| LikeFictionGames.no - yes | 49 | −0.267 | −0.267 | 0.442 | | −1.156 | 0.623 | −0.603 | 0.549 | 0.549 | −0.174 | | |
| LikePlatformerGames.no | 23 | 4.145 | 4.145 | 0.264 | 44 | 3.612 | 4.678 | | | | | | |

Table 2: *(continued)*

| | N | mean | lsmean | SE | df | lwr.CI | upr.CI | t.ratio | p.value | p.ajd | g | sig | mag |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| LikePlatformerGames.yes | 23 | 5.036 | 5.036 | 0.264 | 44 | 4.503 | 5.569 | | | | | | |
| LikePlatformerGames.no - yes | 46 | −0.891 | −0.891 | 0.374 | | −1.645 | −0.138 | −2.384 | 0.022 | 0.022 | −0.691 | * | medium |
| LikePuzzleGames.no | 22 | 4.447 | 4.447 | 0.322 | 47 | 3.798 | 5.096 | | | | | | |
| LikePuzzleGames.yes | 27 | 4.549 | 4.549 | 0.291 | 47 | 3.964 | 5.135 | | | | | | |
| LikePuzzleGames.no - yes | 49 | −0.102 | −0.102 | 0.434 | | −0.976 | 0.771 | −0.236 | 0.815 | 0.815 | −0.067 | | |
| LikeRacingGames.no | 34 | 4.446 | 4.446 | 0.259 | 47 | 3.925 | 4.967 | | | | | | |
| LikeRacingGames.yes | 15 | 4.633 | 4.633 | 0.390 | 47 | 3.849 | 5.418 | | | | | | |
| LikeRacingGames.no - yes | 49 | −0.187 | −0.187 | 0.468 | | −1.129 | 0.755 | −0.400 | 0.691 | 0.691 | −0.122 | | |
| LikeMusicalGames.no | 35 | 4.510 | 4.510 | 0.256 | 47 | 3.995 | 5.024 | | | | | | |
| LikeMusicalGames.yes | 14 | 4.488 | 4.488 | 0.404 | 47 | 3.674 | 5.302 | | | | | | |
| LikeMusicalGames.no - yes | 49 | 0.021 | 0.021 | 0.479 | | −0.941 | 0.984 | 0.045 | 0.964 | 0.964 | 0.014 | | |
| LikeMMORPGGames.no | 23 | 4.159 | 4.159 | 0.308 | 47 | 3.540 | 4.779 | | | | | | |
| LikeMMORPGGames.yes | 26 | 4.808 | 4.808 | 0.290 | 47 | 4.225 | 5.390 | | | | | | |
| LikeMMORPGGames.no - yes | 49 | −0.648 | −0.648 | 0.423 | | −1.499 | 0.202 | −1.533 | 0.132 | 0.132 | −0.432 | | |
| LikeShooterGames.no | 26 | 4.673 | 4.673 | 0.295 | 47 | 4.080 | 5.266 | | | | | | |
| LikeShooterGames.yes | 23 | 4.312 | 4.312 | 0.313 | 47 | 3.682 | 4.942 | | | | | | |
| LikeShooterGames.no - yes | 49 | 0.361 | 0.361 | 0.430 | | −0.504 | 1.226 | 0.841 | 0.405 | 0.405 | 0.237 | | |
| LikeSimulationGames.no | 33 | 4.475 | 4.475 | 0.263 | 47 | 3.945 | 5.005 | | | | | | |
| LikeSimulationGames.yes | 16 | 4.562 | 4.563 | 0.378 | 47 | 3.802 | 5.323 | | | | | | |
| LikeSimulationGames.no - yes | 49 | −0.088 | −0.088 | 0.461 | | −1.015 | 0.839 | −0.190 | 0.850 | 0.850 | −0.057 | | |
| LikeSportsGames.no | 43 | 4.519 | 4.519 | 0.231 | 47 | 4.055 | 4.983 | | | | | | |
| LikeSportsGames.yes | 6 | 4.389 | 4.389 | 0.618 | 47 | 3.147 | 5.631 | | | | | | |
| LikeSportsGames.no - yes | 49 | 0.130 | 0.130 | 0.659 | | −1.196 | 1.457 | 0.198 | 0.844 | 0.844 | 0.085 | | |
| LikeStrategyGames.no | 12 | 3.861 | 3.861 | 0.423 | 47 | 3.009 | 4.713 | | | | | | |
| LikeStrategyGames.yes | 37 | 4.712 | 4.712 | 0.241 | 47 | 4.227 | 5.197 | | | | | | |
| LikeStrategyGames.no - yes | 49 | −0.851 | −0.851 | 0.487 | | −1.831 | 0.129 | −1.746 | 0.087 | 0.087 | −0.571 | | |
| LikeNovelGames.no | 40 | 4.308 | 4.308 | 0.230 | 47 | 3.846 | 4.771 | | | | | | |
| LikeNovelGames.yes | 9 | 5.370 | 5.370 | 0.485 | 47 | 4.395 | 6.345 | | | | | | |

Table 2: *(continued)*

| | N | mean | lsmean | SE | df | lwr.CI | upr.CI | t.ratio | p.value | p.ajd | g | sig | mag |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| LikeNovelGames.no - yes | 49 | −1.062 | −1.062 | 0.536 | | −2.141 | 0.017 | −1.980 | 0.054 | 0.054 | −0.719 | | |

Signif. codes: 0 "**" 0.01 "*" 0.05