Table 1: Test for variance among families and populations

Model: (LDMC)^(1/3) ~ (1 | Population/Family) + Block

| Variable | Group | χ2 | Variance | PVE | p |
| --- | --- | --- | --- | --- | --- |
| LDMC | Family:Population | 0.000 | 0.000 | 0.000 | 0.5 |
| Population | 0.093 | 0.000 | 0.407 | 0.3805 |
| Residual |  | 0.002 | 99.593 |  |

Table 2: Assess how much variance is explained by urbanization

Urbanization = Distance to the City Center

Model: (LDMC)^(1/3) ~ (1 | Population/Family) + Block + City\_dist

| Variable | Group | χ2 | Variance | PVE | p |
| --- | --- | --- | --- | --- | --- |
| LDMC | Family:Population | 0.000 | 0.000 | 0.000 | 0.5 |
| Population | 0.037 | 0.000 | 0.254 | 0.424 |
| Residual |  | 0.002 | 99.746 |  |

Table 3: Quantify variance explained by urbanization

| Variable | Predictor | χ2 | p |
| --- | --- | --- | --- |
| LDMC | Block | 58.087 | **<0.001\*\*\*** |
| Distance to City Center | 2.091 | 0.148 |

Table 4: Assess how much variance is explained by urbanization

Urbanization = Urbanization Score

Model: (LDMC)^(1/3) ~ (1 | Population/Family) + Block + Urb\_score

| Variable | Group | χ2 | Variance | PVE | p |
| --- | --- | --- | --- | --- | --- |
| LDMC | Family:Population | 0.000 | 0.000 | 0.000 | 0.5 |
| Population | 0.157 | 0.000 | 0.537 | 0.346 |
| Residual |  | 0.002 | 99.463 |  |

Table 5: Quantify variance explained by urbanization

| Variable | Predictor | χ2 | p |
| --- | --- | --- | --- |
| LDMC | Block | 58.118 | **<0.001\*\*\*** |
| Urbanization Score | 0.140 | 0.708 |