

## Validitas Empiris (*Empirical Validity*)

### Correlations

|                         |                     | Soal 1 | Soal 2 | Soal 3 | Soal 4 | Soal 5 | Soal 6 | hasil<br>Matem<br>atika |
|-------------------------|---------------------|--------|--------|--------|--------|--------|--------|-------------------------|
| Soal 1                  | Pearson Correlation | 1      | .709*  | .336*  | .597*  | .538*  | .191*  | .774**                  |
|                         | Sig. (2-tailed)     |        | .000   | .000   | .000   | .000   | .049   | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| Soal 2                  | Pearson Correlation | .709** | 1      | .321*  | .637*  | .601*  | .366** | .855**                  |
|                         | Sig. (2-tailed)     | .000   |        | .001   | .000   | .000   | .000   | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| Soal 3                  | Pearson Correlation | .336** | .321*  | 1      | .057   | .484*  | .483** | .603**                  |
|                         | Sig. (2-tailed)     | .000   | .001   |        | .558   | .000   | .000   | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| Soal 4                  | Pearson Correlation | .597** | .637*  | .057   | 1      | .369*  | .224*  | .679**                  |
|                         | Sig. (2-tailed)     | .000   | .000   | .558   |        | .000   | .021   | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| Soal 5                  | Pearson Correlation | .538** | .601*  | .484*  | .369*  | 1      | .332** | .784**                  |
|                         | Sig. (2-tailed)     | .000   | .000   | .000   | .000   |        | .001   | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| Soal 6                  | Pearson Correlation | .191*  | .366*  | .483*  | .224*  | .332*  | 1      | .602**                  |
|                         | Sig. (2-tailed)     | .049   | .000   | .000   | .021   | .001   |        | .000                    |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |
| hasil<br>Matemat<br>ika | Pearson Correlation | .774** | .855*  | .603*  | .679*  | .784*  | .602** | 1                       |
|                         | Sig. (2-tailed)     | .000   | .000   | .000   | .000   | .000   | .000   |                         |
|                         | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106                     |

\*\* . Correlation is significant at the 0.01 level (2-tailed).

\* . Correlation is significant at the 0.05 level (2-tailed).

### Correlations

|        |                        | Soal 1 | Soal 2 | Soal 3 | Soal 4 | Soal 5 | Soal 6 | Hasil<br>B.<br>Indo<br>nesia |
|--------|------------------------|--------|--------|--------|--------|--------|--------|------------------------------|
| Soal 1 | Pearson<br>Correlation | 1      | .138   | .145   | .354*  | .372*  | .124   | .535*                        |
|        | Sig. (2-tailed)        |        | .159   | .138   | .000   | .000   | .205   | .000                         |
|        | N                      | 106    | 106    | 106    | 106    | 106    | 106    | 106                          |
| Soal 2 | Pearson<br>Correlation | .138   | 1      | .316*  | .204*  | .267*  | .490*  | .678*                        |
|        | Sig. (2-tailed)        | .159   |        | .001   | .036   | .006   | .000   | .000                         |
|        | N                      | 106    | 106    | 106    | 106    | 106    | 106    | 106                          |

|                    |                     |       |       |        |        |       |       |       |
|--------------------|---------------------|-------|-------|--------|--------|-------|-------|-------|
| Soal 3             | Pearson Correlation | .145  | .316* | 1      | -.270* | .426* | .546* | .650* |
|                    | Sig. (2-tailed)     | .138  | .001  |        | .005   | .000  | .000  | .000  |
|                    | N                   | 106   | 106   | 106    | 106    | 106   | 106   | 106   |
| Soal 4             | Pearson Correlation | .354* | .204* | -.270* | 1      | -.143 | .079  | .303* |
|                    | Sig. (2-tailed)     | .000  | .036  | .005   |        | .144  | .418  | .002  |
|                    | N                   | 106   | 106   | 106    | 106    | 106   | 106   | 106   |
| Soal 5             | Pearson Correlation | .372* | .267* | .426*  | -.143  | 1     | .216* | .606* |
|                    | Sig. (2-tailed)     | .000  | .006  | .000   | .144   |       | .026  | .000  |
|                    | N                   | 106   | 106   | 106    | 106    | 106   | 106   | 106   |
| Soal 6             | Pearson Correlation | .124  | .490* | .546*  | .079   | .216* | 1     | .749* |
|                    | Sig. (2-tailed)     | .205  | .000  | .000   | .418   | .026  |       | .000  |
|                    | N                   | 106   | 106   | 106    | 106    | 106   | 106   | 106   |
| Hasil B. Indonesia | Pearson Correlation | .535* | .678* | .650*  | .303*  | .606* | .749* | 1     |
|                    | Sig. (2-tailed)     | .000  | .000  | .000   | .002   | .000  | .000  |       |
|                    | N                   | 106   | 106   | 106    | 106    | 106   | 106   | 106   |

\*\*. Correlation is significant at the 0.01 level (2-tailed).

\*. Correlation is significant at the 0.05 level (2-tailed).



### Correlations

|        |                     | Soal 1 | Soal 2 | Soal 3 | Soal 4 | Soal 5 | Soal 6 | Hasil PAK |
|--------|---------------------|--------|--------|--------|--------|--------|--------|-----------|
| Soal 1 | Pearson Correlation | 1      | .597** | .174   | .502*  | .552*  | .124   | .718**    |
|        | Sig. (2-tailed)     |        | .000   | .074   | .000   | .000   | .206   | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |
| Soal 2 | Pearson Correlation | .597** | 1      | .188   | .471*  | .562*  | .274*  | .767**    |
|        | Sig. (2-tailed)     | .000   |        | .054   | .000   | .000   | .004   | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |
| Soal 3 | Pearson Correlation | .174   | .188   | 1      | -.073  | .462*  | .386*  | .522**    |
|        | Sig. (2-tailed)     | .074   | .054   |        | .454   | .000   | .000   | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |
| Soal 4 | Pearson Correlation | .502** | .471** | -.073  | 1      | .308*  | .178   | .629**    |
|        | Sig. (2-tailed)     | .000   | .000   | .454   |        | .001   | .069   | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |
| Soal 5 | Pearson Correlation | .552** | .562** | .462*  | .308*  | 1      | .187   | .782**    |
|        | Sig. (2-tailed)     | .000   | .000   | .000   | .001   |        | .055   | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |
| Soal 6 | Pearson Correlation | .124   | .274** | .386*  | .178   | .187   | 1      | .547**    |
|        | Sig. (2-tailed)     | .206   | .004   | .000   | .069   | .055   |        | .000      |
|        | N                   | 106    | 106    | 106    | 106    | 106    | 106    | 106       |

|           |                     |        |        |       |       |       |       |     |
|-----------|---------------------|--------|--------|-------|-------|-------|-------|-----|
| Hasil PAK | Pearson Correlation | .718** | .767** | .522* | .629* | .782* | .547* | 1   |
|           | Sig. (2-tailed)     | .000   | .000   | .000  | .000  | .000  | .000  |     |
|           | N                   | 106    | 106    | 106   | 106   | 106   | 106   | 106 |

\*\* . Correlation is significant at the 0.01 level (2-tailed).

Nilai r table uji 1 arah  
= jumlah responden – 2  
= 106-2 = 104...

Nilai r table berada pada baris ke 104 yaitu = 0,2257

| df = (N-2) | Tingkat signifikansi untuk uji satu arah |        |        |        |        |
|------------|------------------------------------------|--------|--------|--------|--------|
|            | 0.05                                     | 0.025  | 0.01   | 0.005  | 0.0005 |
|            | Tingkat signifikansi untuk uji dua arah  |        |        |        |        |
|            | 0.1                                      | 0.05   | 0.02   | 0.01   | 0.001  |
| 101        | 0.1630                                   | 0.1937 | 0.2290 | 0.2528 | 0.3196 |
| 102        | 0.1622                                   | 0.1927 | 0.2279 | 0.2515 | 0.3181 |
| 103        | 0.1614                                   | 0.1918 | 0.2268 | 0.2504 | 0.3166 |
| 104        | 0.1606                                   | 0.1909 | 0.2257 | 0.2492 | 0.3152 |
| 105        | 0.1599                                   | 0.1900 | 0.2247 | 0.2480 | 0.3137 |
| 106        | 0.1591                                   | 0.1891 | 0.2236 | 0.2469 | 0.3123 |
| 107        | 0.1584                                   | 0.1882 | 0.2226 | 0.2458 | 0.3109 |
| 108        | 0.1576                                   | 0.1874 | 0.2216 | 0.2446 | 0.3095 |
| 109        | 0.1569                                   | 0.1865 | 0.2206 | 0.2436 | 0.3082 |

Semua nilai valid . nilai berada lebih tinggi dari nilai r tabel

## Reliability

Scale: matematika

### Case Processing Summary

|       |                       | N   | %     |
|-------|-----------------------|-----|-------|
| Cases | Valid                 | 106 | 100.0 |
|       | Excluded <sup>a</sup> | 0   | .0    |
|       | Total                 | 106 | 100.0 |

a. Listwise deletion based on all variables in the procedure.

### Reliability Statistics

| Cronbach's Alpha | N of Items |
|------------------|------------|
| .811             | 6          |

## Scale: Bahasa Indonesia

### Case Processing Summary

|       |                       | N   | %     |
|-------|-----------------------|-----|-------|
| Cases | Valid                 | 106 | 100.0 |
|       | Excluded <sup>a</sup> | 0   | .0    |
|       | Total                 | 106 | 100.0 |

a. Listwise deletion based on all variables in the procedure.

### Reliability Statistics

| Cronbach's Alpha | N of Items |
|------------------|------------|
| .622             | 6          |

## Scale: PAK

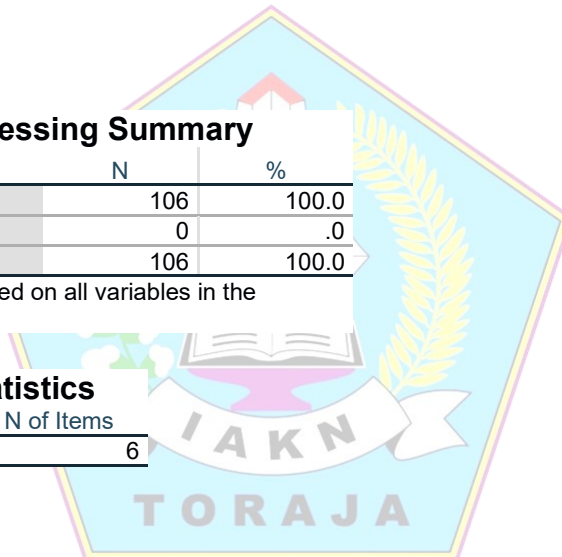
### Case Processing Summary

|       |                       | N   | %     |
|-------|-----------------------|-----|-------|
| Cases | Valid                 | 106 | 100.0 |
|       | Excluded <sup>a</sup> | 0   | .0    |
|       | Total                 | 106 | 100.0 |

a. Listwise deletion based on all variables in the procedure.

### Reliability Statistics

| Cronbach's Alpha | N of Items |
|------------------|------------|
| .730             | 6          |



## Frequencies

### Statistics

Golongan Darah

| N | Valid   | 106 |
|---|---------|-----|
|   | Missing | 0   |

### Golongan Darah

|       |   | Frequency | Percent | Valid Percent | Cumulative Percent |
|-------|---|-----------|---------|---------------|--------------------|
| Valid | O | 41        | 38.7    | 38.7          | 38.7               |
|       | A | 33        | 31.1    | 31.1          | 69.8               |
|       | B | 27        | 25.5    | 25.5          | 95.3               |

|       |     |       |       |       |
|-------|-----|-------|-------|-------|
| AB    | 5   | 4.7   | 4.7   | 100.0 |
| Total | 106 | 100.0 | 100.0 |       |

Nilai di atas menunjukkan jumlah siswa keseluruhan dan jumlah siswa berdasarkan golongan darah

## UJI Oneway ANNOVA

### Descriptives

Nilai Kognitif

|       | N   | Mean   | Std. Deviation | Std. Error | 95% Confidence Interval for Mean<br>Lower Bound | Upper Bound | M |
|-------|-----|--------|----------------|------------|-------------------------------------------------|-------------|---|
| O     | 41  | 3.3360 | .36429         | .05689     | 3.2211                                          | 3.4510      |   |
| A     | 33  | 3.1313 | .28390         | .04942     | 3.0306                                          | 3.2320      |   |
| B     | 27  | 3.0741 | .45212         | .08701     | 2.8952                                          | 3.2529      |   |
| AB    | 5   | 3.6111 | .05556         | .02485     | 3.5421                                          | 3.6801      |   |
| Total | 106 | 3.2186 | .38255         | .03716     | 3.1449                                          | 3.2922      |   |

Hasil memperlihatkan bahwa nilai rata-rata tertinggi berada pada golongan darah AB dan terendah pada golongan darah B

### Test of Homogeneity of Variances

|                |                                      | Levene Statistic | df1 | df2    | Sig. |
|----------------|--------------------------------------|------------------|-----|--------|------|
| Nilai Kognitif | Based on Mean                        | 2.337            | 3   | 102    | .140 |
|                | Based on Median                      | 1.734            | 3   | 102    | .142 |
|                | Based on Median and with adjusted df | 1.734            | 3   | 93.860 | .143 |
|                | Based on trimmed mean                | 2.359            | 3   | 102    | .183 |

- Dari tabel **Test of Homogeneity of Variances** terlihat bahwa hasil uji menunjukkan bahwa varian ketiga kelompok tersebut sama ( $P\text{-value} = 0,160$ ), sehingga uji Anova valid untuk menguji hubungan ini.

### ANOVA

Nilai Kognitif

|                | Sum of Squares | df  | Mean Square | F     | Sig. |
|----------------|----------------|-----|-------------|-------|------|
| Between Groups | 2.151          | 3   | .717        | 5.535 | .001 |
| Within Groups  | 13.215         | 102 | .130        |       |      |
| Total          | 15.366         | 105 |             |       |      |

Hasil uji anova nilai signifikansi 0,001 yang berarti terdapat pengaruh /perbedaan golongan darah siswa terhadap nilai kognitif

## Dokumentasi Penelitian







