Table 1 (12-point Times New Roman)

*Interclass reliability analysis for the force flexion and extension assessment of strength. (12- point Times New Roman, Italic)*

Flexion Extension

Elbow .693 .683

Shoulder .764 .764

Hip .692 .692

Knee .662 .669

(11-point Times New Roman, normal, plain font for text within the table)

Table 2

*Maximum isometric voluntary strength of the sample of Force flexion (N).*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | Gymnasts | | Non Gymnasts | |
|  | Measurement 1 | Measurement  2 | Measurement  1 | Measurement  2 |
| F flexion right elbow | 13.76 ± 4.85 | 14.64 ± 6.01 | 10.89 ± 3.83 | 14.92 ± 6.78 |
| F flexion right shoulder | 17.73 ± 5.98 | 18.17 ± 7.36 | 12.39 ± 4.49 | 16.34 ± 7.55 |
| F flexion right hip | 18.69 ± 5.54 | 22.33 ± 8.64 | 14.15 ± 4.03 | 15.51 ± 5.90 |
| F flexion right knee | 10.80 ± 4.14 | 13.67 ± 6.07 | 9.53 ± 2.86 | 13.00 ± 5.34 |
| F flexion Left elbow | 13.97 ± 3.54 | 13.89 ± 4.61 | 10.99 ± 3.39 | 14.08 ± 5.22 |
| F flexion left shoulder | 17.69 ± 4.71 | 17.80 ± 6.73 | 12.19 ± 3.97 | 15.97 ± 5.65 |
| F flexion left hip | 17.40 ± 5.07 | 21.93 ± 7.63 | 13.69 ± 3.25 | 16.19 ± 6.49 |
| F flexion left knee | 10.05 ± 2.44 | 11.53 ± 4.81 | 9.09 ± 3.11 | 11.12 ± 5.03 |
| F flexion body | 30.11 ± 9.63 | 38.31 ± 11.65 | 18.00±4.27 | 30.18 ± 12.82 |

Table 3

*Mean values and standard deviations of morphological characteristic of gymnasts (G) and non-gymnasts (NG) aged 8-10 years, 12-14 years, 18-25 years.*

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  |  | Non-gymnasts | Gymnasts | p |  |
| Height | 8 – 10 years | 135.6 ± 6.1 | 132.1 ± 6.9 | 0.153 |  |
| (cm) | 12 – 14 years | 158.3 ± 8.6 | 154.9 ± 9.8 | 0.314 |  |
|  | 18 – 25 years | 175.2 ± 6.1 | 172.5 ± 4.0 | 0.193 |  |
| Body mass | 8 – 10 years | 32.4 ± 6.4 | 30.1 ± 3.8 | 0.177 |  |
| (kg) | 12 – 14 years | 45.8 ± 8.6 | 42.6 ± 7.6 | 0.283 |  |
|  | 18 – 25 years | 75.5 ± 14.2 | 72.0 ± 5.1 | 0.414 |  |
| BMI | 8 – 10 years | 17.9 ± 3.0 | 16.7 ± 1.2 | 0.121 |  |
|  | 12 – 14 years | 17.9 ± 1.8 | 18.6 ± 1.2 | 0.208 |  |
|  | 18 – 25 years | 24.9 ± 4.7 | 24.1 ± 0.9 | 0.560 |  |

Table 4

*Criteria for acrobatic elements knowledge evaluation.*

|  |  |
| --- | --- |
| Measurement  scale (points) | Description of standards - Acrobatics |
| Points  10 | The exercise (element) is performed optimally in such a way that there were no mistakes in the initial position, body position, leg and/or hand positions. There were no mistakes in the aesthetic part of the exercise, in the coordination of performance, technical performance, range of motion, in the speed and pace and lastly no mistakes in the final position. |
| Points  9 | The exercise (element) was performed optimally with minor errors found in certain technical requirements of the initial position, body position, and position of the legs and/or hands. Possible minor errors found in the aesthetic part of the exercise, range of motion, speed and pace and final position. Total maximum number of minor faults 1 to 2. |
| Points  8 | The exercise (element) is still well-performed with a small number of errors noticed in certain technical requirements of the initial position, body position, and position of the legs and/or hands. Possible errors found in the aesthetic part of the exercise, coordination of performance, range of motion, speed and pace and final position. However these errors did not impair the whole structure of the movement. The total maximum number of minor errors 3 to 4. |
| Points  7 | The performance of the exercise (element) was flawed. There were errors in almost all the above mentioned technical requirements. There was also a noticeable distortion in the structure of the movement. |
| Points  6 | The exercise (element) is poorly performed with a large number of errors. There are major deficiencies in all of the abovementioned technical requirements. The structure of the movement was significantly impaired. |