**JPED\_2018\_546\_Supplementary Material**

**Supplemental File**

**Table S1 - Results from polynomial regression models relating blood pressure to age and height Z-score among non-overweight children in the ERICA database.**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | **Systolic blood pressure** | | | | **Diastolic blood pressure** | | | |
|  | **Girls** | | **Boys** | | **Girls** | | **Boys** | |
| **Parameter** | **β regression coefficient** | **p-**  **value** | **β regression coefficient** | **p-**  **value** | **β regression coefficient** | **p-**  **value** | **β regression coefficient** | **p-value** |
| **Intercept** | 106.963 | < 0.001 | 113.265 | < 0.001 | 65.983 | < 0.001 | 64.722 | < 0.001 |
| **Age - 15** | 0.914 | 0.004 | 3.630 | < 0.001 | 0.959 | < 0.001 | 1.448 | < 0.001 |
| **(Age - 15)2** | -0.213 | 0.335 | -0.942 | < 0.001 | -0.242 | 0.091 | -0.099 | 0.486 |
| **(Age - 15)3** | 0.041 | 0.342 | -0.046 | 0.229 | -0.020 | 0.589 | -0.051 | 0.094 |
| **(Age - 15)4** | -0.009 | 0.755 | 0.086 | 0.001 | 0.018 | 0.339 | 0.008 | 0.665 |
| **Zht** | 1.632 | < 0.001 | 3.073 | 0.000 | 1.094 | < 0.001 | 1.206 | < 0.001 |
| **Zht2** | 0.124 | 0.665 | -0.026 | 0.884 | 0.206 | 0.282 | -0.015 | 0.910 |
| **Zht3** | 0.037 | 0.646 | -0.039 | 0.448 | 0.006 | 0.936 | -0.017 | 0.660 |
| **Zht4** | -0.001 | 0.982 | 0.006 | 0.773 | -0.013 | 0.517 | 0.010 | 0.531 |
| **Residual standard deviation** | 9.378 |  | 10.220 |  | 7.408 |  | 7.810 |  |

Zht, height Z-score.

**Table S2 - ERICA sample distribution by selected variables.**

|  |  |  |  |
| --- | --- | --- | --- |
| **Variable** | **Overall** | **Non-overweight** | **Overweight** |
| **Sample distribution** | 100 | 74.5 (73.3-75.6) | 25.5 (24.4-26.6) |
| **Female sex** | 49.8 | 50.0 (49.3-50.6) | 49.1 (47.2-51.0) |
| **Age distribution** |  |  |  |
| **12 years** | 17.6 (17.6-17.7) | 16.4 (16.0-16.9) | 21.1 (19.9-22.3) |
| **13** **years** | 17.5 (17.4-17.5) | 16.8 (16.4-17.3) | 19.4 (18.2-20.6) |
| **14** **years** | 17.6 (17.6-17.6) | 17.7 (17.3-18.0) | 17.4 (16.5-18.3) |
| **15** **years** | 17.4 (17.4-17.4) | 18.0 (17.7-18.3) | 15.6 (14.7-16.5) |
| **16** **years** | 16.1 (16.1-16.2) | 17.0 (16.5-17.4) | 13.8 (12.6-15.0) |
| **17** **years** | 13.7 (13.7-13.8) | 14.1 (13.8-14.4) | 12.8 (12.0-13.7) |
| **Skin color** |  |  |  |
| **White** | 39.1 (37.5-40.8) | 37.8 (36.1-39.5) | 42.4 (40.2-44.7) |
| **Black** | 7.8 (7.2-8.5) | 8.0 (7.4-8.8) | 7.6 (6.6-8.8) |
| **Brown** | 47.7 (46.3-49.1) | 48.8 (47.4-50.1) | 44.5 (42.2-46.7) |
| **Asian** | 2.0 (1.8-2.3) | 2.2 (1.9-2.5) | 1.7 (1.3-2.1) |
| **Indigenous** | 0.7 (0.5-0.8) | 0.7 (0.5-0.8) | 0.7 (0.4-0.9) |
| **Not declared** | 2.6 (2.3-2.9) | 2.5 (2.2-2.8) | 3.1 (2.3-4.2) |
| **Public school** | 82.3 (77.6-86.2) | 84.2 (79.9-87.7) | 77.6 (71.8-82.4) |
| **Alcohol consumption** | 22.2 (21.1-23.2) | 22.2 (21.1-23.3) | 22.1 (20.5-23.9) |
| **Physically inactive** | 54.3 (53.3-55.3) | 54.8 (53.7-55.8) | 52.8 (51.3-54.4) |
| **Smoking** | 2.4 (2.1-2.8) | 2.6 (2.2-2.9) | 2.2 (1.8-2.7) |
| **Height (m)** | 1.63 (1.62-1.63) | 1.62 (1.62-1.63) | 1.64 (1.63-1.64) |
| **Weight (kg)** | 56.2 (55.9-56.5) | 51.1 (50.9-51.3) | 71.2 (70.7-71.6) |
| **BMI (kg/m2)** | 21.1 (21.0-21.2) | 19.3 (19.2-19.3) | 26.4 (26.3-26.5) |
| **WC (cm)** | 71.5 (71.2-71.7) | 67.4 (67.3-67.6) | 83.3 (82.9-83.7) |
| **SBPa (mmHg)** | 11.8 (110.5-111.1) | 108.6 (108.3-109.0) | 117.1 (116.7-117.6) |
| **DBPb (mmHg)** | 65.9 (65.6-66.1) | 64.9 (64.6-65.2) | 68.7 (68.3-69.0) |
| **Heart rate (bpm)** | 81.4 (80.9-81.8) | 81.3 (80.8-81.8) | 81.5 (81.0-82.1) |

Values given as proportion (95% CI) or mean (95% CI).

BMI, body mass index; WC, waist circumference.

c Mean of second and third systolic blood pressure measurements.

d Mean of second and third diastolic blood pressure measurements.