Results from Poland's 2018 Report Card on Physical Activity for Children and Youth

Paweł Zembura, Agata Korcz, Elżbieta Cieśla, Aleksandra Gołdys, and Hanna Nałęcz

Introduction

Recent nationwide studies regarding physical activity (PA) in Poland suggest that a small proportion of children and youth are meeting the recommended level of ≥ 60 minutes of moderate-to-vigorous intensity PA (MVPA) per day.^{1,2} Further, additional evidence regarding health-related behaviors linked with PA, such as screen time and environmental factors determining PA of children and youth, were assessed to be far from satisfactory.³ In this paper, we reviewed the best available evidence regarding PA in Polish children and youth to grade indicators describing the complex PA environment.

Methods

The 2018 Polish Report Card (Figure 1) included 10 core PA indicators used in the Global Matrix 3.0 (Overall Physical Activity, Organized Sport Participation, Active Play, Active Transportation, Sedentary Behavior, Physical Fitness, Family and Peers, School, Community and Environment, Government). Each indicator was accompanied by at least one assessment benchmark. Changes to the grading process have been made since the Global Matrix 2.0; therefore, differences in grades in reference to Poland's 2016 Report Card do not represent actual trends.

In the 2018 Polish Report Card, we combined data from the multiple sources. First, the Research Team (RT) conducted systematic reviews to identify data sources pertaining to each of the indicators, which were later assessed using the modified Downs and Black checklist.⁴ The separate cut-off points have been established in reference to each indicator based on the amount and quality of the available data. All data sources were published within the last 5 years (since 2013), with the exception of the Physical Fitness indicator. The most informative sources of data were two cross-national surveys conducted in 2013/2014: Health Behaviour of School Youth in Poland¹ and the Physical Activity of School Children Aged 9–17.²

Results and Discussion

The 2018 Polish Report Card is the second assessment of children and youth PA in the Active Healthy Kids Global Alliance project, following the Global Matrix 2.0 in 2016. The grades for each core PA indicator are summarized in Table 1, with a brief discussion and rationale provided.

The majority of the grades remain the same in 2018 when compared to the Poland's Report Card in 2016 and little has changed in terms of informative data sources regarding PA since this time. The current Report Card presents the Physical Fitness indicator for the very first time. The RT was able to grade each indicator except for the Active Play, although several other research gaps were revealed in the process. First, in this analysis we based our grades on self-reported data, what applied even to the core indicators such as overall PA and sedentary behaviour. Another important limitation was that RT was not able to identify nearly any data sources regarding children younger than 10 years old. For that reason this Report Card refers mainly to youth and does not present a general picture of children and youth PA in Poland.

Figure 1 — Poland's 2018 Report Card cover.

Table 1 Grades and Rationales for Poland's 2018 Report Card

Indicator	Grade	Rationale
Overall Physical Activity	D-	24.2% of 11- to 15-year-olds met 1 hour of MVPA per day in the cross-sectional study ¹ 21.5% of 10- to 17-year-olds met the recommendation in the other cross-sectional study ²
Organized Sport Participation	D	18.9% of children and youth aged 10–17 participated in organized club sport outside of school at least once a week 27.2% took part in private lessons related to PA (such as tennis, karate or judo), at least once per week 30.6% participated in “other” unorganized or organized activities related to PA, at least once per week ² 50.4% of adolescents attending lower-secondary schools participated in some kind of organized sport-for-all activities ⁵
Active Play	INC	53.9% of lower-secondary school adolescents (between the ages of 12/13 and 15/16) participated in unorganized PA such as cycling, football and swimming at least once per week ⁵
Active Transportation	C	47.4% of 10- to 17-year-olds in Poland reported walking to school and 52.3% walking from school 5.5% and 5.2% travel to and from school by bicycle, respectively ² 41% and 36% of lower-secondary and upper-secondary school students (between the ages of 15/16 and 18/19) mainly walk to school while, 5% and 3% of the groups commute by bicycle ⁶
Physical Fitness	C-	Average tests scores were counted for each fitness test results (sit-and-reach, handgrip strength, standing broad jump, sit-ups, relative peak oxygen uptake, 10 × 5 m agility shuttle run, 20 m shuttle run test (laps) and plate tapping test) separately for each age group of boys and girls using means or medians reported in the available data. The obtained average results were referred to the centile values provided in the summary paper (for each age group and gender). ⁷ We averaged those centile values for each physical fitness test to obtain a mean score for the respective test. The overall score was made up by averaging the mean scores of the eight fitness tests. Dobosz et al, ⁸ study was the main source of data.
Sedentary Behaviours	D	40% of 11- to 15-year-olds reported watching TV and films, 65.9% playing computer games, and 45.2% reported performing other computer-based activities ¹ 49% of lower-secondary and 44% of upper-secondary school students declared spending ≤2 hours watching TV or on computer, daily ⁶ 36% of 10- to 15-year-olds met the recommendation of ≤2 hours of recreational screen time per day ⁹
Family and Peers	C-	51.6% of 12- to 18-year-olds reported that parents always or almost always give support to their participation in PA materially (by providing resources), 64.5% consider themselves enabled to participate in PA, 41.4% get emotional support, 17.3% receive support in planning activities ¹⁰ 15.1% of mothers and 24% of fathers regularly participate in sport or are physically active at least once per week according to 10- to 17-year-olds ² 21.2% of 13- to 16-year-olds declared being regularly physically active with their father, 17.9% with their mother, and 42.8% with their siblings ² 20% of 12- to 18-year-olds declared being physically active with their father and 18.5% with their mothers ¹⁰
School	B	73.8% of 10- to 17-year-olds reported participating in all or nearly all physical education (PE) lessons ² 87% of primary, 96% of lower-secondary and 89% of upper-secondary schools students participate in PE lessons The amount of compulsory PE in Poland equals three 45 minutes lessons per week in grades 1–3 of primary school, 4 such lessons in grades 4–8 of primary school and 3 lessons in secondary school
Community and Environment	C	29% of 10- to 17-year-olds perceive their neighbourhood environment encourages PA while 48.3% consider it to be neutral ² 19% of respondents from Poland totally agree and 49% tend to agree that their local area offers them many opportunities to be physically active 16% totally agree and 47% tend to agree that clubs and local providers offer many opportunities to be physically active 11% totally disagree and 22% tend to disagree with a statement that their local authority does not make enough in relation to PA ¹¹
Government	C+	In the last two years, two large-scale sport-for-all programs named Club and School Sports Club (both are investments in small and medium local sports clubs) have been implemented A primary governmental funding initiative for sport development in children and adolescents (Physical Culture Development Fund) increased by 28% in 2018 in comparison to an annual increase of 9.4% in 2017, 6% in 2016 and 14.1% in 2015 Through Good Management Codex the Ministry of Sport pressured national sports federations to get involved in sport-for-all

Note: The principal sources of data were italicized.

Conclusion

Despite the promising PA climate in Poland, as suggested by strong grades allocated to the School and Government indicators, the proportion of children and youth who meet the recommended levels of PA and screen time remains low. Promotional efforts need to extend beyond school sports in Poland and multicomponent strategies that engage family, peers and the community should be

encouraged in order to maximize participation in PA for Polish children and youth.

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