

Gamification of sleep in children

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Gamification is defined as using game thinking and game mechanics to solve problems and engage users.¹ Gamification uses mechanisms and elements of the game as non-game contexts to motivate people to a specified aim.² For sleep disruption in children and students in the SARS-CoV-2 pandemic, it seems that Gamification can regulate their sleep.³ SARS-CoV-2 has affected all daily activities from 25 March 2020 in which it has resulted in physical distancing for all people, and most of the relationships are virtual using electronic tools such as tablets and smartphones. It has also changed some routine habits, mostly eating, working, arranging tasks, and sleep-wake circadian. Extensive use of these devices has been a part of students' schedule every day and sometimes long hours every night. Therefore, the critical biological process of sleep-wake circadian is disrupted.^{4,5}

Quality of sleep can affect emotional, psychological, and social well-being. Moreover, sleep-wake circadian has an essential role in pleasure and long-term well-being. A reduction of sleep problems can improve both emotional and psychological capacities.^{6,7} Sleep duration as one of the sleep parameters influences psychological and mental health. In contrast, insufficient sleep has many side effects, namely, depression, stress, physical and cognitive fatigue during the day. These effects specifically result in declining learning performance of children.⁸ The recommended sleep duration is 9-11 h for school-aged children,⁹ and sleep is considered a crucial component of a health growth.¹⁰ However, sleep and immunity are interrelated and sufficient sleep can improve immunity too.¹¹

Concerning this condition's consistency, it is essential to return to a healthy state, especially in children. Hence, it seems that Gamification can be considered as an innovative solution to get out of this crisis. Accordingly, regulating sleep using Gamification can affect daily activities, physical and cognitive fatigue reduction and more importantly increasing learning in students and children. Furthermore, immunity will increase following sleep regulation.

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Conflicts of interest

The authors declare that there are no conflicts of interest.

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