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Other Reviews - - Other Review

# The Effects of Telerehabilitation Versus Home-based Exercise on Muscle Function, Physical Activity, and Sleep in Children with Cystic Fibrosis: A Randomized Controlled Trial.

Code: PM40028780

Year: 2025 Date: 2016

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## Study design (if review, criteria of inclusion for studies)

Systematic review

## Participants

Studies aimed to assess the literature describing whether video games generate a physiological response similar to the exercise intensity needed for training in CF.

## Interventions

Physiological response similar to the exercise intensity

## Outcome measures

In four, out of five studies, the heart rate achieved during video games was within the standards recommended for training (60-80%). Two studies assessed VO<sub>2</sub> and showed higher levels compared to the six-minute walk test. No desaturation was reported. Most games were classified as moderate intensity. Only one study used a maximum exercise test as comparator.

## Main results

In four, out of five studies, the heart rate achieved during video games was within the standards recommended for training (60-80%). Two studies assessed VO<sub>2</sub> and showed higher levels compared to the six-minute walk test. No desaturation was reported. Most games were classified as moderate intensity. Only one study used a maximum exercise test as comparator.

## Authors' conclusions

Interactive video games generate a heart rate response similar to the intensity required for training in CF patients.

<http://dx.doi.org/10.1080/01942638.2025.2469567>

## See also

Phys Occup Ther Pediatr. 2025 Mar 3:1-16. doi: 10.1080/01942638.2025.2469567.

## Keywords

Games- Experimental; non pharmacological intervention - psycosoceduorg; Respiratory Tract Diseases; Chest physiotherapy; non pharmacological intervention - devices OR physiotherapy;