Can schoolyard improvements increase physical activity for the least active students - or just provide better opportunities for the most active?

CIAPSE, Liege, October 18th
Lars B. Christiansen, Postdoc
Space – for physical activity

7 intervention schools (n = 623)

Interventions

Spring 2010
5th & 6th grade

Spring 2012
7th & 8th grade

7 comparison schools (n = 725)
Intervention Effects on Adolescent Physical Activity in the Multicomponent SPACE Study: A Cluster Randomized Controlled Trial
... good outdoor opportunities

- Intervention 5th-6th grade: 71%
- Intervention 7th-8th grade: 75%
- Comparison 5th-6th grade: 87%
- Comparison 7th-8th grade: 68%
Are physical active at least daily during recess.

- Comparison (n=555)
  - 5th-6th grade: 83%
  - 7th-8th grade: 49%

- Intervention (n=520)
  - 5th-6th grade: 88%
  - 7th-8th grade: 62%

Sports active: 73%
Sports inactive: 27%
Institute of Sport Science and Clinical Biomechanics, University of Southern Denmark

Competitive sports active 51%
Sports active 22%
Active 20%
Sedentary 7%

Odds ratio for being physical active daily during recess
- adjusted for age, gender and baseline recess PA
Institute of Sport Science and Clinical Biomechanics, University of Southern Denmark

Innovative

Traditional

Playfull

Sportified

Modified after model by Stinne Ballegaard

Swings  Asphalt markings

Asphalt markings  Table soccer

Table soccer  Table tennis

Table tennis  Soccer area

Soccer area  Loudspeaker

Loudspeaker  Eel trap

Eel trap  Climbing cubes

Climbing cubes  Frisbee golf

Frisbee golf  Parkour

Parkour
# Activating adults

# Equipment

# Music

# Places indoors and outdoors
...are daily active.