Physical Literacy in the Early Years (PLEY) Project

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Collaborators: Jane Cawley, Dr. Sara Kirk, Dr. Angie Kolen, Dr. Daniel Rainham, Dr. Laurene Rehman, Dr. Joan Turner

To evaluate the efficacy of a loose parts intervention to:

• Improve children's physical literacy
• Increase time in active outdoor play
• Improve educators’ attitudes, beliefs, perceived competency and intentions towards incorporating the intervention into practice
• Increase educators’ understanding of play in child health and development

Randomized control trial
(8 intervention and 8 control sites)

• Sample:
  • Children aged 3 to 5 years
  • Early childhood educators
  • Parents of participating children
1. Recruitment of sites: November 2016

What we learned from initial site visits

- Large variation in outdoor space and the associated opportunities available for loose parts (LP) play
- Range in LP use, accessibility to LP by children, and educator buy-in on LP use
- Good understanding of the importance of LP in indoor but not outdoor environments
- Desire for more training on supporting quality outdoor play
2. Completion of Go NAP SACC survey

Survey Sections:
- Quality of outdoor play
- Outdoor play environment
- Education and professional development on outdoor play
- Policy on outdoor play

3. Recruiting parents of participating children: February to March 2017

4. Sourcing of loose parts
Assemblage:

- Facebook: https://www.facebook.com/assemblagehfx/
- Twitter: @assemblage_halifax

5. Baseline data collection (April-June 2017)
1. Children's height and weight
2. Fundamental movement skills (TGMD-3)
3. Balance (PGMQ)
4. Physical activity (wGT3X+ accelerometer)

6. Educator training (June 24, 2017)
7. Documentation of play with loose parts: Photovoice

Observing and documenting FMS during outdoor play with LP
• Date, time of day, children, setting
• What caught your attention? Brief account of play experience.
• How did children use the LP? Were they doing specific movements/actions?
• What teaching strategies (questions/resources) were used to extend the play?
• What teaching strategies were used to support PL?
• Opportunities for risk (scale: low to medium to high)

8. Evaluation
These 2 children made a "plan" and then collaboratively began building with the LP.

Children using a plank to access the roof of the shed.

The lead child asked other children to hold the board "steady" for him indicating that he was doing his own risk assessment.

Educators were unsure about what to allow children to do and eventually stopped the play.

Next steps
- Continue collecting parent survey data
- Ongoing photovoice

3 month data collection (Sept – Oct 2017):
- Height, weight, FMS, PA
- Educator focus groups

6 month data collection (Jan-Mar 2018)
- Height, weight, FMS, PA
- Educator focus groups
- Parent interview

Potential of PLEY Project (long term goals)

- Evidence from study would support educational curricula for educators on outdoor play programming and incorporation of loose parts in outdoor settings
- Policies could support on-site professional development on encouraging risky outdoor play in all seasons and weather
- Could provide evidence that engagement with loose parts in an outdoor setting improves FMS/PL and PA of children – EYC’s seen as a new “setting” for improving PL (novel)
Project Team

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Co-I's: Dr. Angie Kolen (Human Kinetics, St. Francis Xavier University); Dr. Laurene Rehman (Health and Human Performance, Dalhousie University); Dr. Daniel Rainham (Environmental Science, Dalhousie University); Dr. Joan Turner (Child and Youth Studies, Mount St. Vincent University)

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