



The Impact of Parenting Stress on Parent Psychological Wellbeing: Examining the Moderating Role of Children's Physical Activity

Courtney Goldenberg & Adam T. Schmidt
Department of Psychological Sciences, Texas Tech University
Contact: cgoldenb@ttu.edu



Introduction

- Physical activity (PA) has been linked to psychological wellbeing and stress reduction (de Sá & Padovan-Neto, 2025; Heaney et al., 2025; Wiklund et al., 2025).
- Preliminary evidence has negatively linked children's PA and parental stress (Kobayashi et al., 2019).
- Parental stress has been associated with childhood obesity (Isasi et al., 2017; Parks et al., 2016).
- Few studies have investigated how children's PA may influence parental stress and wellbeing.

Participants & Procedure

- A subsample from 125 parent-child dyads completed ActiGraph data collection for one week ($N = 49$). One dyad was excluded from data analysis due to missing data, leading to a final sample of 48 participants.
- Participants were recruited from a local Head Start agency and various in-person recruitment events in Western Texas.
- Eligibility criteria required participation of preschool aged children (ages 3 years, 0 months to 5 years, 11 months) and their parent ($M_{age_p} = 33.87$, $SD_p = 6.76$; $M_{age_c} = 4.10$, $SD_c = 0.75$).
- There were no formal exclusion criteria for the study.
- Participants were compensated with up to \$100 in gift cards as thanks for study participation.

Measures

Primary Predictor

- Parental stress** (ESI; Hall, Williams, & Greenberg, 1985). Participants rated various daily stressors across 20 items on a scale ranging from *not at all bothered* (1) to *bothered a great deal* (4).

Moderator

- Children's physical activity level** was objectively measured using wrist-worn ActiGraph accelerometers. The current study explored the influence of moderate to vigorous physical activity (MVPA).

Primary Outcome

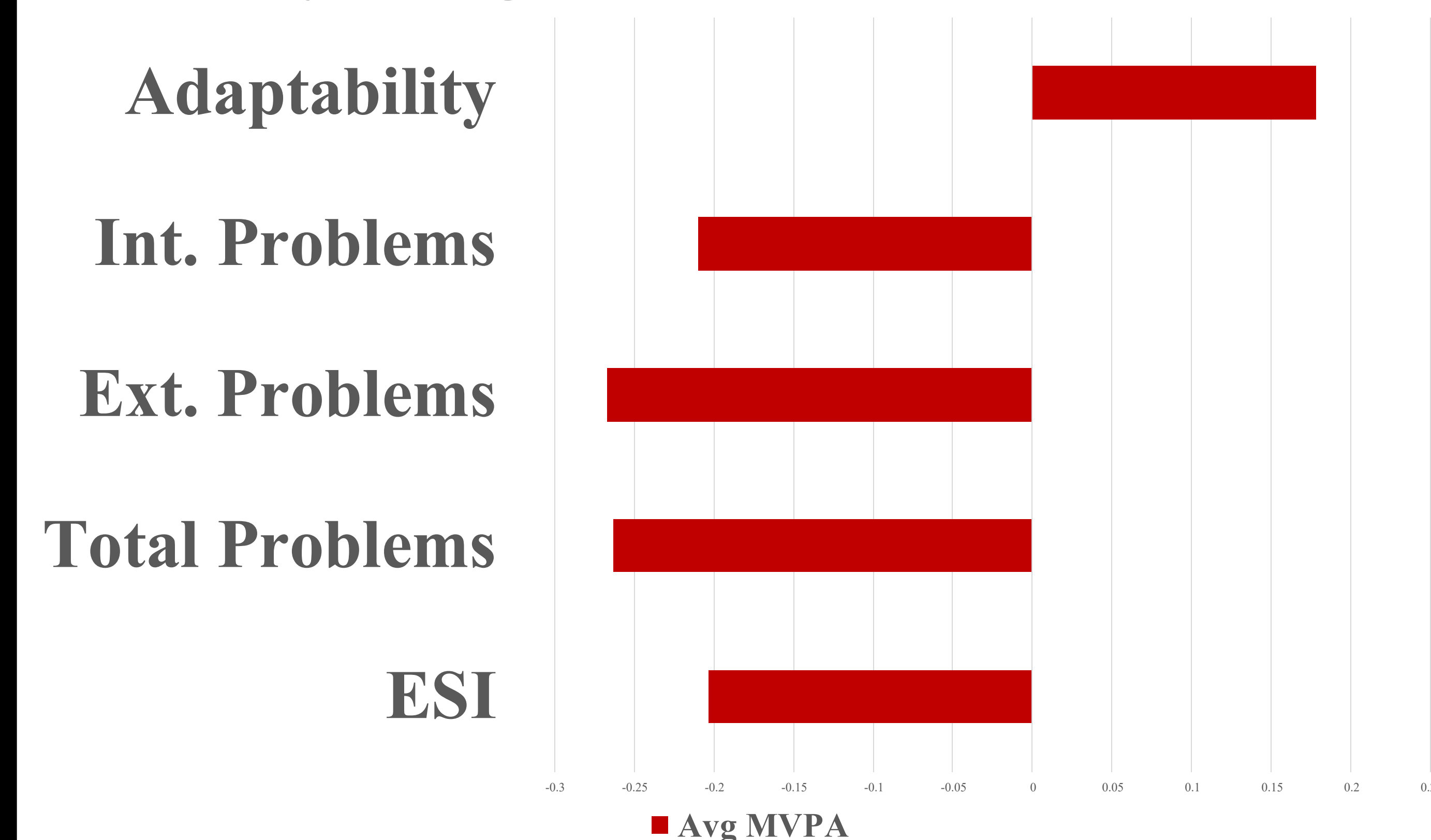
- Parent wellbeing** was assessed using the adult self report (ASR; Achenbach & Rescorla, 2003). Participants rated 123 items ranging from *not true* (0) to *very true or often true* (3).

Results

- No significant moderation effects were found
- MVPA was not a significant moderator for the relationship between parent psychological wellbeing (i.e., total problems, externalizing or internalizing problems, and adaptability) endorsed on the ASR and self-reported ESI

Results (cont'd)

Correlations between MVPA, Psychological Variables, and Stress



- Analyses failed to indicate significant correlations between average MVPA per day and key study variables

Summary & Conclusion

- Preliminary data of preschool aged children and their parents did not indicate that child's MVPA levels significantly moderate the relationship between parents' stress and parental psychological wellbeing.
- The modest sample size of this study may relate to these analyses being underpowered, thus further exploration is needed.
- Conclusion:** There is insufficient evidence from the current sample to suggest children's physical activity significantly moderates the link between parental stress and parental psychological wellbeing.