11TH EUROPEAN COMMUNICATION CONFERENCE
8–11 SEPTEMBER 2026
BRNO, CZECH REPUBLIC

ECC
SHIFTING GROUNDS
2026

PATHS, CONNECTIONS, AND FUTURES

Does social media time matter for adolescents?

Exploring reciprocal relationships between time on social media and social well-being and ill-being

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1. Introduction

- Time Spent on Social Media (TSSM):
  - SM platforms like Instagram and TikTok have become integral to adolescents' daily social lives

- Social Well-being and Ill-being:
  - Peer support:
    - During adolescence contributes to higher self-esteem, better emotional adjustment, and greater overall psychological well-being
  - Loneliness:
    - Increases risk of depression and anxiety, and reduces overall psychological well-being, with potential consequences that can extend into young adulthood

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1. Introduction

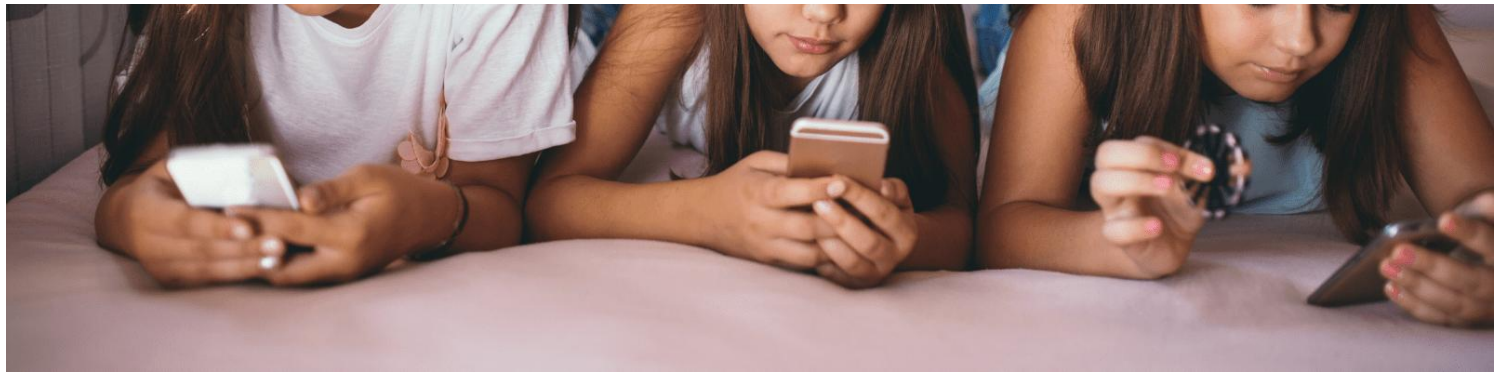
- There is a lot of research on SM and social well-being and ill-being
  - Loneliness
    - Existing studies offer mixed insights into the relationship between SM and loneliness
  - Peer support
    - Meta-analyses of the general population consistently indicate that SM is positively related to social support

- But empirical evidence **remains inconclusive**

1. Introduction

- Measurement of SM
  - Level of analysis: time spent, usage, content, etc.
  - While TSSM has been extensively criticized in relation to psychological well-being, to date it remains the primary measures

- Well-being/ill-being confound :
  - Two-Continua Model of Mental Health (Keyes, 2002, 2005), mental health consists of two distinct but interrelated continua.
    - Studies that measure only one construct and infer the state of its counterpart risk oversimplifying



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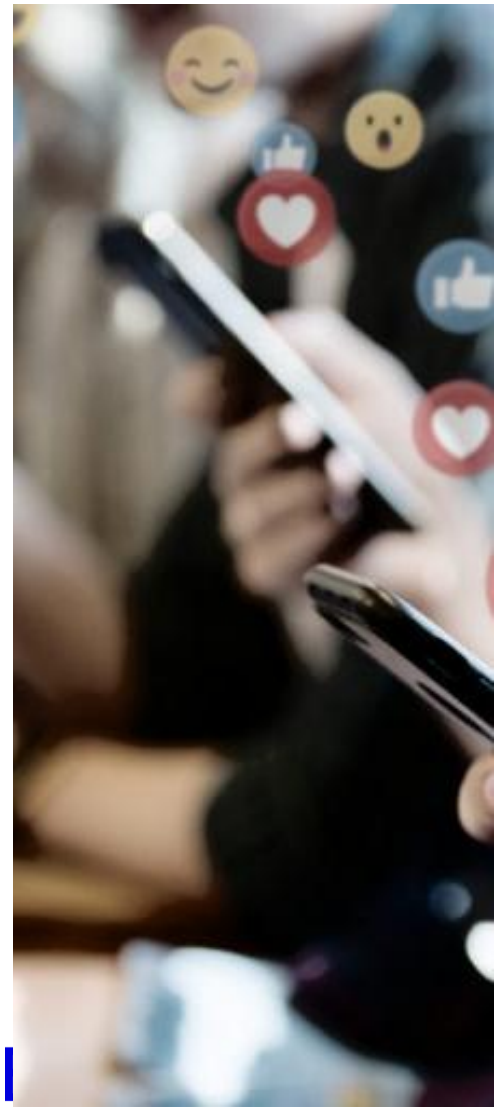
1. Introduction

- Between-person and within-person effects
  - Between-person
    - Capture stable, time-invariant differences among individuals over time (baseline)
  - Within-person
    - Capture temporary deviations from an individual's own average baseline at one time point and its influence at a later time point

- Directionality:
  - TSSM → Well-being and ill-being
    - Displacement Hypothesis
    - Stimulation Hypothesis
  - Well-being and ill-being →TSSM
    - The Social Compensation Hypothesis
    - Social Enhancement Hypothesis
  - The few longitudinal evidence among adolescents remains mixed



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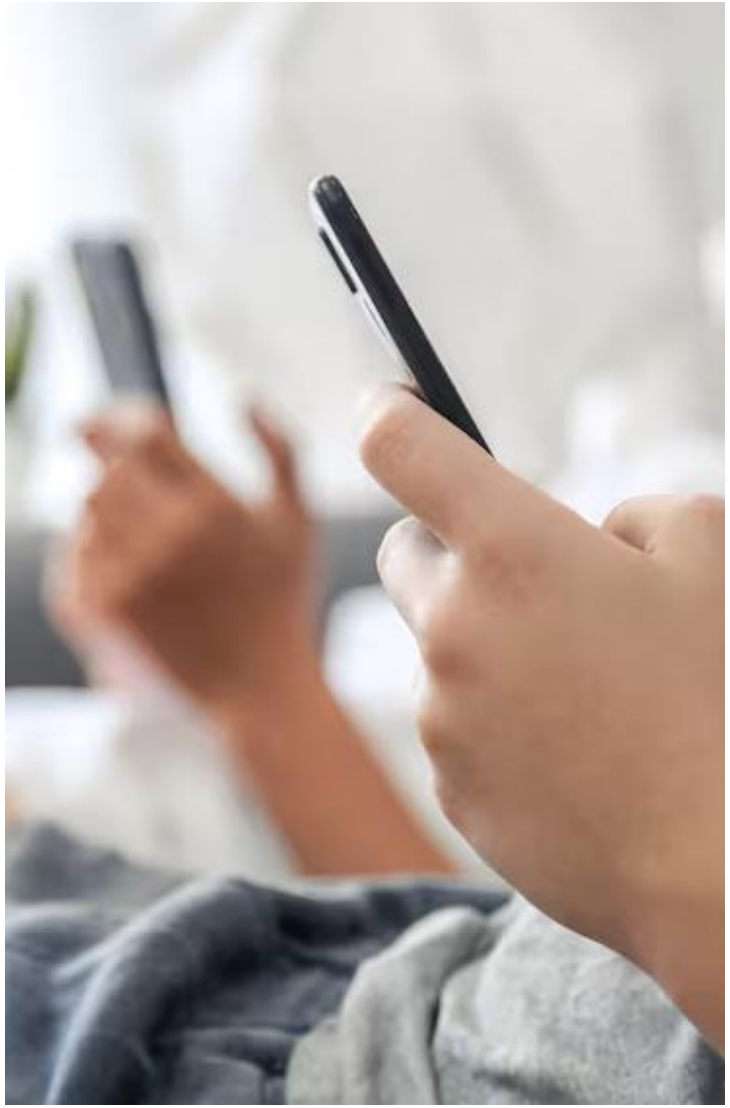

- Other effects
  - Mediation
    - TSSM → Peer Support → Loneliness
  - Moderation
    - Age: Developmental changes, empirical findings are inconclusive
    - Gender: Societal norms shape gender roles. However, empirical studies have not reached a consensus

- Gaps:
  1. Most research is cross-sectional
     1. It makes imposible to determine directionality
     2. No distinction of between-person differences from within person ones
  2. Among the few longitudinal studies
     1. Rarely are considered indicators of social well-being and ill-being in the same analytical framework
     2. It allows also to test mediation effects

2. Objetive and research questions

- Objetive:
  - To investigate the reciprocal long-term relationship of time spent on social media (TSSM) with peer support and loneliness as indicators of social well-being and ill-being, respectively, during adolescence
- Research questions:
  - RQ1. Does TSSM predicts peer support (RQ1.1) and loneliness (RQ1.2) six months later?
  - RQ2. Do peer support (RQ2.1) and loneliness (RQ2.2) predicts TSSM six months later?
  - RQ3. Does peer support mediate the relationship between TSSM and loneliness during adolescence?
  - RQ4. Are there age differences in the within-person relationships among TSSM, loneliness, and peer support during adolescence?
  - RQ5. Are there gender differences in the within-person relationships among TSSM, loneliness, and peer support during adolescence?

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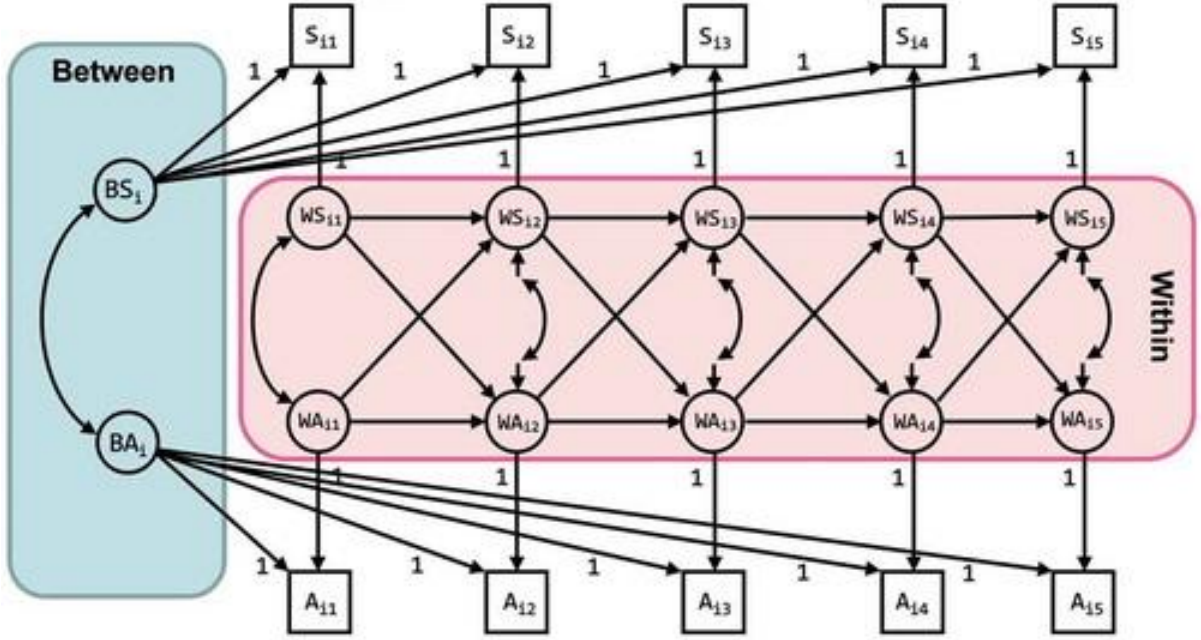
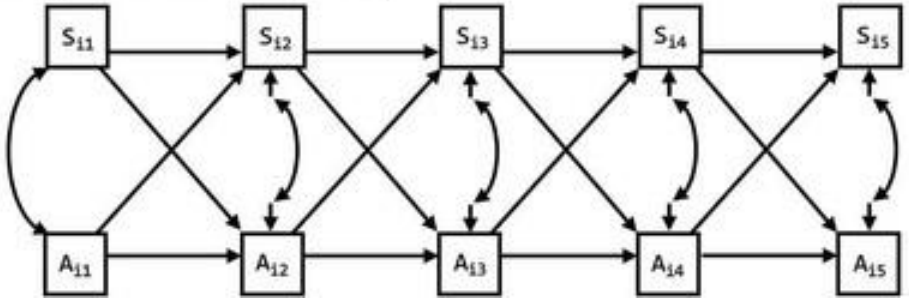
3. Method

- Sample
  - 2,500 Czech adolescents (age range 11–16, Mage = 13.43, SD = 1.69 years; 50% female, 50% male)
  - Six months intervals.
  - 55.9% dropped out across the three waves (T1 = 2,500, T2 = 1,654, T3 = 1,102).
  - Logistic regression did not find any significant attrition bias
- Measures
  - Time Spent on Social Media: 1 item
  - Peer Support: 4 items from Peer Acceptance subscale of the Inventory of Parent and Peer Attachment (IPPA; Armsden & Greenberg, 1987)
  - Loneliness: 4 items adapted from Roberts et al. (1993)
  - Gender: 1 item
  - Age: 1 item
- Data analysis
  - RI-CLPM

Random Intercept Cross-Lagged Panel Model (RI-CLPM)



Traditional Cross-Lagged Panel Model (CLPM)



4. Results

- Between-person
  - The random intercept of TSSM was not significantly correlated with either Peer Support ($\beta = 0.035$, $p = .458$) or Loneliness ($\beta = 0.071$, $p = .116$)
  - In contrast, Peer Support and Loneliness were negatively correlated ($\beta = -0.433$, $p < .001$)
  - Girls and older adolescents tend to spend more time on SM and report higher levels of Loneliness

- Within-person
  - Only Loneliness exhibited a significant **autoregressive** path from T2 to T3 (ß = 0.290, $SE = 0.077$, $p < .001$)
  - **No significant cross-lagged** effects were observed
  - **Gender moderation**: Constraining all within-person regressions did not significantly worsen the multigroup model fit: $\Delta\chi^2 = 17.39$, $\Delta df = 18$, $p = 0.496$ and $\Delta\chi^2 = 14.27$
  - **Age group moderation**: Constraining all within-person regressions did not significantly worsen the multigroup model fit: $\Delta\chi^2 = 14.27$, $\Delta df = 18$, $p = 0.711$

4. Results

- Research questions:
  - RQ1. Does TSSM predicts peer support (RQ1.1) and loneliness (RQ1.2) six months later? → No
  - RQ2. Do peer support (RQ2.1) and loneliness (RQ2.2) predicts TSSM six months later? → No
  - RQ3. Does peer support mediate the relationship between TSSM and loneliness during adolescence? → No
  - RQ4. Are there age differences in the within-person relationships among TSSM, loneliness, and peer support during adolescence? → No
  - RQ5. Are there gender differences in the within-person relationships among TSSM, loneliness, and peer support during adolescence? → No

5. Discussion

- No stable or longitudinal associations between TSSM and Peer Support and Loneliness
  - Possible explanations:
    - **Normalization of Social Media Use**: Because SM is now fully integrated into daily life, teenagers view TSSM as a routine activity rather than an extraordinary event that significantly impacts their well-being either positively or negatively.
    - **Methodological Separation of Well-Being and Ill-Being**: By isolating the unique variance between well-being and ill-being to prevent confounding them, individual variations in these constructs had a minimal and statistically insignificant within-person effect on TSSM.
    - **Measurement Limitations**: Total time spent on social media reflects only a single broad aspect of usage; significant effects may only appear when analyzing specific behaviors or types of interactions instead of overall time.
- Limitations
  - TSSM captures only one aspect of SM engagement
  - The data were collected during the COVID-19 pandemic

Conclusions

- These findings suggest that overall time spent on social media may be largely unrelated to adolescents' social well-being and ill-being over a six-month period

- Initiatives focused solely on reducing TSSM among adolescents are unlikely to enhance social well-being and reduce loneliness among young people over extended periods

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