

## No evidence linking Facebook adoption and negative well-being

August 9 2023



Credit: AI-generated image (disclaimer)

The largest independent scientific study ever conducted, investigating the spread of Facebook across the globe found no evidence that the social media platform's worldwide penetration is linked to widespread psychological harm, according to research today from leading Oxford internet researchers.



The independent Oxford study, published in the *Royal Society Open Science*, used well-being data from nearly a million people across 72 countries over 12 years and harnessed actual individual usage data from millions of Facebook users worldwide to investigate the impact of Facebook on well-being.

Despite popular claims about the impact of social media on well-being, the Oxford Internet Institute research, led by Professor Andrew Przybylski and Professor Matti Vuorre, found "no evidence" Facebook's spread was consistently linked negatively to well-being—quite the opposite.

The research paper states, "Although reports of negative psychological outcomes associated with social media are common in academic and popular writing, evidence for harms is, on balance, more speculative than conclusive."

Professor Przybylski explains, "We examined the best available data carefully—and found they did not support the idea that Facebook membership is related to harm, quite the opposite. In fact, our analysis indicates Facebook is possibly related to positive well-being."

Working with massive amounts of information, the Oxford team did not find evidence to support popular misconceptions about Facebook. But, says Professor Przybylski, "This is not to say this is evidence that Facebook is good for the well-being of users. Rather, the best global data does not support the idea that the expansion of social media has a negative global association with well-being across nations and different demographics."

Co-author Professor Vuorre observes, "Much of the past research into social media use and well-being has been hampered by an exclusive focus on well-being data in the Global North and a reliance on inaccurate



self-reports of social media engagement.

"In our new study, we cover the broadest possible geography for the first-time, analyzing Facebook usage data overlaid with robust well-being data, giving a truly global perspective of the impact of Facebook use on well-being for the first time."

Facebook was involved in the research, but only to provide data and did not commission or fund the study. Researchers from Facebook helped ensure the data was accurate, but did not influence the design of the study or know the findings before the Oxford team made the results public.

The Oxford research project started before the COVID pandemic, and the team worked for more than two years to secure critically needed data from Facebook. The researchers combined existing well-being data from Gallup, covering nearly 1 million people from 2008 to 2019, with Facebook data relating to global platform engagement. For the first time, the team was able to see how the spread of Facebook engagement related to the high-quality country-wide well-being data.

"It was a monumental ask for the Facebook data scientists," says Professor Przybylski. "Once they shared it with us, we were able to combine two types of data: the best well-being data we could put our hands on, with Facebook data tracking the uptake of their platform in the same countries at the same times."

Facebook currently reports nearly 3 billion users worldwide, but this research looks at the earlier days of the platform's international penetration from 2008 to 2019. This period was critical because popular commentators have claimed, that trends in social media use and well-being during this period are linked.



Professors Przybylski and Vuorre tackled this idea head-on, "To understand better the plausible range of associations, we linked data tracking Facebook's global adoption with three indicators of well-being: life satisfaction, negative and positive psychological experiences. We examined 72 countries' per capita active Facebook users in males and females in two age brackets (13–34yrs and 35+years)."

They found no evidence for negative associations and in many cases, there were positive correlations between Facebook and well-being indicators.

The researchers also investigated differences relating to age and gender. Their analysis showed that the association between Facebook adoption and well-being was slightly more positive for males than females, across all well-being measures but these trends were not significant. Furthermore, Facebook adoption and well-being was generally more positive for younger individuals across countries. These effects were small but significant.

This latest study aligns with previous research from the Oxford experts exploring the link between <u>digital technology</u> and mental health, which found technology use has not become increasingly associated with negative psychological outcomes over time.

Dr. Vuorre concludes, "Our findings should help guide the debate surrounding social media towards more empirical research foundations. We need more transparent collaborative research between independent scientists and the technology industry to better determine how, when and why modern online platforms might be affecting their users."

**More information:** Matti Vuorre et al, Estimating the association between Facebook adoption and well-being in 72 countries, *Royal Society Open Science* (2023). DOI: 10.1098/rsos.221451



## Provided by University of Oxford

Citation: No evidence linking Facebook adoption and negative well-being (2023, August 9) retrieved 28 April 2024 from

https://phys.org/news/2023-08-evidence-linking-facebook-negative-well-being.html

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.