

Studying Intersections in Conducting Research with Minors from Lower Socioeconomic Background in India

Abstract

Conducting research with children and teenagers is a challenging task. In our study, we interacted with school-going population between the age range of 10 to 15 years belonging to the lower socioeconomic class in urban India and performed semi-structured interviews in order to gauge their insights about selfies and what may be considered as dangerous selfies or “KillFies” [2,3]. Through this position paper, we elucidate our experience of working with this under-aged stigmatized population in India and use that to inform new, integrated questions and guidelines for conducting research with such populations. I express my positionality with respect to studying intersections in the practices and strategies that can be used to overcome various challenges in data collection, privacy and confidentiality, and ethics.

Author Keywords

Lower socioeconomic class, Selfie, KillFie, India, Minors, Teenagers, Intersectionality, Intersections

Introduction

Selfies have become a medium of self-portrayal, and their craze has burgeoned in recent times - so much so that it became the Oxford Dictionary’s word of the year for 2013 [1]. But in the past four years, there have been numerous cases of selfie-deaths - 216 from March 2014 to January 2018 - and injuries around the world [2]. These deaths or injuries happen when people click selfies in dangerous locations only to end up harming themselves. Causes of deaths include falling from a height, drowning, vehicle accident, and animal-related dangers among others. A "KillFie" is a selfie which has resulted in death (or injuries) of the person taking it or the people around him/her. Studies have been performed to analyze selfies on social media websites, such as Twitter and Instagram, and predictive

models have been built to identify KillFies [2,3]. We attempt to study the perception of 10 to 15-year olds coming from economically weaker sections of the Indian society, on selfies and KillFies.

In this position paper, we elucidate the challenges, practices, and strategies followed while conducting research with this segment of the population. We further propose using the lens of intersectionality to inform a new, integrated research direction and better practices for working with similar populations.

Our Work

We conducted qualitative research to study the selfie-taking behavior of 10 to 15 year-olds, coming from the lower socioeconomic background in India. This study is based on social media research conducted on "KillFies" or selfies that lead to death(s) [2,3].

Data Collection

We conducted one-on-one semi-structured interviews with students of a Delhi-based government school; this school consists primarily of students belonging to the lower socioeconomic class. We received formal consent and approbation from our institution and the principal of the school for this study. The interviews were conducted in our institution campus, over a three month period, where a selected number of students came to attend summer classes. Seventeen students were interviewed. During the interviews, they could speak in Hindi and/or English, whichever they were comfortable with. The interviews were audio recorded, after receiving verbal consent from the student who agreed to participate in the study, and later transcribed for analysis. The participants were made aware about the study and its intent, and the process of ensuring anonymity. Moreover, they were given the freedom to leave during the process in case of any discomfort. The students were initially hesitant but most of them soon opened up and became comfortable with the process. A few students felt uncomfortable when asked about gadgets owned by them or their family members as they lacked such resources at home. Others, who had access to them, revealed particular details of their mobile devices rather enthusiastically. Some participants claimed to own mobile devices which actually belonged to their family members. Most of the participants confessed to have taken or been a part of selfies, while only a few had knowledge about or experienced (mostly indirectly) the dangers of KillFies. Most

students were canny with their answers. While a few students were taciturn and gave binary answers, others openly discussed their sentiments, experiences, viewpoints, and reasons.

Privacy

One-on-one interviews were conducted with the participants in empty classrooms or quiet outdoors. Pseudonyms were used to refer to the participants and no other personal information, except the age and grade/standard of study, was collected. We were also aware that the participants belonged to the lower socioeconomic class as the government school they belonged to primarily consisted of such students. The data, including audio recordings and respective transcriptions, were anonymized.

Challenges

We faced numerous roadblocks during the study; from approval of the research to receiving formal consent from the school authorities to conducting interviews with taciturn students. In India, ethics committees, other than for medical research, are a rarity. People have a misunderstanding about ethics forms and there is a stigma associated with signing anything of the sort. This makes collecting data more difficult. We had a tough time figuring out what questions to ask, how much information to ask for, and how to analyze and report our findings. Since we were working with minors, at times they revealed sensitive information which we were unsure about how to report. For example, a participant revealed information about his younger brother, who too was a minor, about how he used social media to share photographs with his friends. While such information might seem benign, we were left in an ethical dilemma whether to analyze and report it or not, given that the other individual involved, too, was a minor. Moreover, we were unsure whether to have a parent/teacher/guardian present during the interviews as their presence might suppress the expressiveness of the participants.

Power distance between the researcher and the participants was another important factor that came up. According to Bourdieu's theory of distinction [4], there is a certain idea of "privilege" that the participants belonging to the lower socioeconomic class might associate with the researcher. This can influence the responses provided by the participants. They might not speak the truth or be taciturn and not respond. The reverse may be true as well; the participants may exaggerate their positions. There

might be further issues due to class distinction and the idea of social mobility. Moreover, since the participants are minors, they can often be easily influenced. Thus, it can become rather difficult to validate the responses provided by the participants.

Another challenge in working with children and teenagers is that they might want to just give the “right answer” to the question asked or be “morally correct” with their responses. They may treat the interview as a quiz or competition. This, too, makes validating the responses challenging.

Other obstacles such as the (1) lack of a clear class distinction between the lower socioeconomic and lower-middle classes, (2) inability to conduct follow-up interviews to check the validity of the responses, (3) language issues, and (4) presence of bias due to peer influence, may persist. The root challenge is to truly empathize with the participants, not judge them, and make their interaction with the researchers a comfortable one.

In the next section, we list out practices and strategies we followed to counter the above challenges.

Practices and Strategies

Inspired by the Parenting for a Digital Future [\[5\]](#) project at the London School of Economics (LSE), we created an ethics form since it is rare to find a good ethics form in India for social research. The study was approved by the institute with which the researchers are associated. Written consent was taken from the principal of the school and verbal consent (also audio-recorded) was taken from the participant prior to the interview. While parent(s)/teacher(s)/guardian(s) were absent during the interviews, the participants were given an overview of the study, informed about consent and maintaining anonymity, and informed that they could leave at any point in time. They were given the freedom to ask questions and raise any concerns about the research.

We took care to use sensitive language and not make the participants feel uncomfortable or provoked/incited at any point in time. The researcher attempted to validate the information by asking for examples or framing the questions differently. In case the participant was unwilling to disclose family information, we did not coerce further. These measures limited the information we received but ensured that we did not cross any boundaries beyond which it could be an uncomfortable or precarious

situation for the participant. We are also refraining from directly quoting responses by the participants in academic publications.

Further, we changed the proposed direction of our study. We plan on reporting our findings in the form of guidelines that can be followed while conducting research with pre-teen and teen populations coming from the lower socioeconomic class in urban areas in India. Thus, we can say that our study turned out to be an unforeseen head-fake.

Intersectionality

As mentioned, due to the lack of proper ethical guidelines for conducting research with minors and stigmatized communities in India, various challenges arise in working with sensitive populations. It would be interesting to study the intersections in practices and strategies used for conducting such research and further propose guidelines to be used by others. Applying the lens of intersectionality may bring out visible patterns among different segments of populations spread around the world, separated by contexts, yet possessing commonalities.

Self-Disclosure

Being a woman of Indian origin, my background and personal experiences of being raised in India have shaped my motivation to work in the field of HCI4D and ICT for Development (ICTD). I have conducted research in HCI and social science across multiple domains including health and social awareness. Also familiar with ICT and social media usage in India, I have an understanding of the "attention seeking", "social status", and "thrill" driven behavior of users in light of selfies. Born and brought up in New Delhi, I also have experience with the Indian education system.

Benefit from HCIxB

Attending this symposium would be a rather unmissable opportunity for me; it will help me develop a deeper understanding of intersectionality and using the same while conducting research with diverse populations on varied topics. I look forward to participating in a healthy discussion, sharing strategies with other researchers in the domain, and hearing out their experience of addressing similar challenges. Moving forward with the learnings from this symposium, I would be able to broaden my horizons and explore intersections in my multiple projects with improved strategies and study design techniques.

Author

Shaan Chopra is a computer science and engineering fourth-year undergraduate student at IIIT Delhi. Though still exploring, her research interests lie in HCI for Health and Education, ICT for Development, and Social Computing. She is currently working on multiple projects ranging from designing for menstrual health education in India to analyzing the social media spread of the Blue Whale Challenge.

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- [5] Parenting for a Digital Future. <https://blogs.lse.ac.uk/parenting4digitalfuture/>

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Research Interests

HCI, Social Computing, Computational Social Science, ICTD, Health and Education Technology.

Education

Indraprastha Institute of Information Technology, Delhi (IIIT-Delhi)

- *Bachelors of Technology in Computer Science, CGPA (till 7th semester): 8.74/10* 2015–2019

Publications

Accepted Papers.....

- A. Tuli, **S. Chopra**, N. Kumar, and P. Singh. 2018. Learning from and with Menstrupedia: Towards Menstrual Health Education in India. *In Proceedings of the ACM on Human-Computer Interaction*. CSCW'18. [PDF](#)
- A. Malhotra, **S. Chopra**, M. Vatsa, R. Singh. User Authentication via Finger-selfies. Book Chapter in *Selfie Biometrics: Methods and Challenges* (1st edition). In series *Advances in Computer Vision and Pattern Recognition*. Springer. *Accepted for publication*.
- **S. Chopra**, A. Malhotra, M. Vatsa, R. Singh. 2018. Unconstrained Fingerphoto Database. *In Proceedings of the IEEE Conference on Computer Vision and Pattern Recognition Workshops*. CVPR'18. [PDF](#)
- **S. Chopra**. 2018. Solidarity in Social Media Based Epidemic: Case Study of the Blue Whale Challenge. Position paper. Solidarity Across Borders (CSCW'18 Workshop). [PDF](#)
- **S. Chopra**. 2018. Working with Stigmatized Communities in India: Minors from Lower Socioeconomic Background. Position paper. Conducting Research with Stigmatized Populations: Practices, Challenges, and Lessons Learned (CSCW'18 Workshop). [PDF](#)
- I. Paul, A. Khattar, **S. Chopra**, P. Kumaraguru, and M. Gupta. Elites Tweet? Characterizing the Twitter Verified User Network. Full paper. Accepted at *LSGDA 2019 in conjunction with ICDE*.

Under-Review Papers.....

- R. Agarwal, **S. Chopra**, V. Christophides, N. Georgantas, and V. Issarny. Detecting Mobile Crowdsensing Context in the Wild. Short paper. Submitted to the *IEEE International Conference on Mobile Data Management (MDM) 2019*.
- R. Agarwal, **S. Chopra**, V. Christophides, N. Georgantas, and V. Issarny. Detecting Mobile Crowdsensing Contexts in the wild using Ambiciti case study. Abstract. Submitted to *NetMob 2019*.

Experience

- **Institut National de Recherche en Informatique et en Automatique (INRIA)** Paris, France
Research Intern May 2018–July 2018
Worked under the supervision of Nikolaos Georgantas and Valérie Issarny with the MiMove Team. Work focused on data and network analysis on crowdsourced data using by applied machine learning.
- **Delhi eGovernance Society, Dept. of Information Technology** Delhi Govt., India
Intern June 2017–July 2017
Developed an android app for the Online Application Registration System of the DSSSB and made an app to manage tweets made to the Public Grievance Management System.
- **Computing and Design for Social Good Lab** IIIT Delhi, India
Independent Project August 2017–present
Advisor: Dr. Pushpendra Singh
Description: Identifying design and socio-cultural barriers in imparting menstrual health education in India.

- Image Analysis and Biometrics Lab**

 - *Undergraduate Thesis*
 - Advisor(s): Dr. Mayank Vatsa, Dr. Richa Singh
 - Description: Work on fingerphoto recognition in an unconstrained environment.

IIIT Delhi, India

August 2017–present
- Precog Lab**

 - *Independent Projects*
 - Advisor: Dr. Ponnurangam Kumaraguru
 - Description: Social media analysis of the Blue Whale Challenge. Involves social media and network analysis.
 - Description: Analysis of Twitter Verified Account data.

IIIT Delhi, India

January 2018–present

Skills

- **Programming:** Proficient in: Python (Numpy, Pandas, Matplotlib, Scikit-learn), Flask, Java, C, SQL, L^AT_EX, Mongo; Familiar with: Keras, MATLAB, Git, Android, HTML, CSS, JavaScript, AngularJS, Swift, C++.
- **Design:** Proficient in: Adobe Photoshop, Marvel; Familiar with: Adobe Illustrator.

Awards and Achievements

ACM-W Scholarship to attend CSCW'18	2018
Dean's list for Excellence in Academics	2018
Dean's List for Excellent Contribution in Sports	2018, 2017
Dean's list for Overall Excellent contribution to Student Activities	2018, 2016
Fully-funded invitation to WTM's International Women's Day Event at Google	2018
Discus Throw Gold Medalist - Sangram IIT Roorkee, Udghosh IIT Kanpur	2018
Teaching Assistant (Visual Design & Communication)	2018
Teaching Assistant (Introduction to Digital Ethnography)	2017
Discus Throw Gold Medalist - Spardha IIT BHU	2015-2017
Discus Throw U-20 Girls State Gold Medalist and National Participation	2016