

Chapter 7

Applying Artificial Intelligence to Explore Online Harassment and Cyberbullying Prevention

Anushka Aggarwal

Asian Business School, India

Shubhika Gaur

Asian Business School, India

ABSTRACT

The advent of technological advancements has propelled global progress to unprecedented levels; nevertheless, it has also emerged as a potent instrument that can be wielded to compromise the safety of women. These issues have a detrimental effect on the overall welfare and online encounters of individuals. The field of artificial intelligence (AI) has experienced significant growth and has become a formidable resource for tackling the urgent challenges related to women's harassment and cyberbullying. In order to address these challenges, scholars and experts have resorted to employing AI techniques as proactive strategies for both prevention and intervention. This chapter explores the utilization of artificial intelligence technology in mitigating instances of women's harassment and cyberbullying by the automated identification and response to harmful information, hence promoting the establishment of more secure online spaces.

1. INTRODUCTION

Artificial intelligence (AI) is an emerging technology that holds significant potential for enhancing worker productivity, improving corporate efficiency, and fostering innovation in the development of novel products and services. Rendering to the Organization for Economic Co-operation and Development (OECD), an artificial intelligence (AI) system is categorized as a mechanism -based system that possesses the skill to impact the surrounding environment by generating an output, such as forecasts, suggestions, or judgments, in alignment with a specified set of objectives. In order to (i) perceive real-

DOI: 10.4018/979-8-3693-2679-4.ch007

Applying AI to Explore Online Harassment and Cyberbullying Prevention

world and/or simulated environments, (ii) extract these perceptions into models using automated analysis (e.g., using machine learning), (iii) or manual methods, and (iv) use model inference to generate potential outcomes, the system uses both machine- and human-generated data and inputs. Systems using AI are designed with varied levels of autonomy in mind. The issue at hand has garnered increasing attention throughout society, leading to the emergence of various technological innovations like as smartwatches, GPS trackers, SOS devices, and vibration-producing jackets. The introduction of physical items like as flashlights and tear gas has had a significant impact on the market, fulfilling a necessary demand. The incidence of harassment and cyberbullying has significantly increased alongside the introduction and utilization of new technological advancements. Social virtual reality (VR) is an emerging platform for social interaction that is now grappling with the increasingly prevalent issue of harassment, along with a lack of consensus on effective moderation strategies to address such abusive behavior. The phenomenon of cyberbullying is increasingly prevalent and can be characterized as the deliberate act of engaging in online commentary with the purpose of ridiculing, engaging in body shaming, or subjecting an individual to persistent harassment. Given the observed occurrence, it is imperative to thoroughly investigate and offer a inclusive understanding of the mechanisms underlying cyberbullying directed at women. The proliferation of internet communication capabilities has given rise to a significant societal issue known as cyberbullying. In the most severe instances, cyberbullying can potentially lead to victims engaging in self-harm or experiencing suicidal ideation. In addition to its detrimental effects on health, cyberbullying adversely impacts the online reputation of all parties involved, encompassing not only the targeted individual but also those who engage in the act of bullying. In latest years, there has been momentous progress in the development of novel digital technologies, coinciding with the emergence of innovative strategies aimed at addressing the issue of cyberbullying. One notable development that has arisen is the creation of Artificial Intelligence (AI), which can be perceived as a prospective solution capable of efficiently addressing the issue of Internet safety. Artificial intelligence (AI) serves as an effective tool in mitigating the proliferation of cyberbullying. Algorithms play a crucial role in identifying the individuals involved in instances of bullying, including the bully, the victim, and the onlookers. This information is then utilized by a “human moderator” to effectively mitigate the dissemination of poisonous language and hate speech. Artificial intelligence (AI) enables the development of tailored interventions for those who have experienced cyberbullying. Algorithms possess the capability to discern the specific origin of the issue and suggest a tailored course of action that is attuned to the unique requirements of those affected by cyberbullying, as well as their families.

In conclusion, the proliferation of technology-based methods for combating cyberbullying is an unavoidable development. Nevertheless, it is imperative for the European community to undergo a comprehensive and significant digital transition. The European Union is today confronted with significant digital disruption across several domains, as evidenced by the substantial number of over 4 million distinct Internet users and a high Internet penetration rate of 89%. In contrast to competency in information technology (IT), which pertains to one’s knowledge of computer systems, digital literacy encompasses a comprehension of the requisite behavioral norms and patterns that are anticipated in online environments, as well as an awareness of the prevalent social challenges that arise from the use of digital technologies.

15 more pages are available in the full version of this document, which may be purchased using the "Add to Cart" button on the publisher's webpage:
www.igi-global.com/chapter/applying-artificial-intelligence-to-explore-online-harassment-and-cyberbullying-prevention/339653

Related Content

Perspectives on Equity, Inclusion, and Social Justice in Education in Four Nordic Countries

Hanna Ragnarsdóttir (2018). *International Journal of Bias, Identity and Diversities in Education* (pp. 1-14).

www.irma-international.org/article/perspectives-on-equity-inclusion-and-social-justice-in-education-in-four-nordic-countries/204611

Conceptualizing Gender Mainstreaming and Women Empowerment in the 21st Century

Irene Georgeand Moly Kuruvilla (2020). *Handbook of Research on New Dimensions of Gender Mainstreaming and Women Empowerment* (pp. 1-21).

www.irma-international.org/chapter/conceptualizing-gender-mainstreaming-and-women-empowerment-in-the-21st-century/255599

Hybrid Working in the Canadian Federal Public Service

Gulcin Eroksal Ulger (2026). *Developing Diversity, Equity, and Inclusion Policies for Talent Acquisition and Retention* (pp. 265-300).

www.irma-international.org/chapter/hybrid-working-in-the-canadian-federal-public-service/402793

Voices in the Desert: Black Women Faculty in the American Southwest

Xeturah M. Woodley (2019). *International Journal of Bias, Identity and Diversities in Education* (pp. 1-13).

www.irma-international.org/article/voices-in-the-desert/231470

Plurilingual STEAM and School Lunches for Learning?: Beyond Folklorization in Language Education

Daniel Roy Pearce, Mayo Oyama, Danièle Moore, Yuki Kitanoand Emiko Fujita (2021). *International Journal of Bias, Identity and Diversities in Education* (pp. 1-25).

www.irma-international.org/article/plurilingual-steam-and-school-lunches-for-learning/282070