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Navigating the Privacy Paradox: Understanding Privacy Behaviour of Generation Z in Pakistan's E-commerce Landscape

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ABSTRACT

The proliferation of technology has made it easy for people to shop online using multiple platforms. Despite vulnerabilities related to privacy during online shopping, people still shop online which raises concern about inconsistency in their attitude towards privacy also known as the “Privacy paradox”. Drawing upon the theoretical perspectives of Privacy Calculus theory, Technology Acceptance Model (TAM) and Privacy Protection Motivation, this study aims to analyse the privacy concerns among Generation Z in Pakistan and explore the privacy paradox they depict. The purposive sampling is used to collect data for this cross-sectional study from 720 university students in the Generation Z age group studying in six universities in Punjab. The main inclusion criteria is choosing students who often shop online and are in the age bracket of 18-28. Findings showed that the more privacy concerns a person has the more careful he would be while doing online shopping. The relationship between privacy literacy and online shopping is a negative correlation which means that more the privacy literate a person is, the fewer online purchases they will make. This research stresses that people need to be more vigilant while sharing their information on online ecosystems. The findings of this study expand the theoretical understanding of the privacy paradox establishing two very opposite and non-aligned attitudes of shoppers. It also offers an opportunity for sales managers in the fashion industry to look at their digital models to reconsider privacy standards and also helps them investigate the dichotomy of behaviour.

Keywords: *privacy paradox, generation Z, online shopping, cookies, sponsored ads, university students.*

Introduction

In the contemporary era, marked by rapid technological advancements, Generation Z is notably more engaged with privacy concerns than any other generation (Alic & Sopić, 2023). This heightened awareness has only intensified with the onset of the COVID-19 pandemic, which catalysed significant shifts in consumer behaviour, particularly in how individuals shop and navigate privacy considerations (Koch et al., 2020). Despite the passage of three years since the peak of the pandemic, online shopping continues to surge, underscoring a persistent preference for digital commerce. However, this trend has given rise to a new form of e-commerce characterized by consumer apprehensions surrounding privacy (Ameen et al., 2021). This study explores this contradiction in young consumers by surveying 720 young shoppers studying at six Pakistani universities.

The internet has appeared as an interesting arena for privacy in recent years from data leaks to scams through emails. Online shopping sites and social media sites like Facebook, Instagram and Twitter are at the centre of some of the debates about background algorithms dictating our decisions (Weinberger et al., 2017). Researchers have cautioned people sharing personal information without understanding that it can be manipulated. Without their consent, individuals, service providers, government agencies, and other organisations may use this information in ways that users may not like if they have knowledge (Alic & Sopić, 2023).

Pakistan is facing fast digital change and a thriving e-commerce industry which make it even more important to understand how young shoppers in Pakistan feel about online privacy. Pakistani youth is a part of a global generation that has been influenced by influx of information coming from social media and have internet access, despite cultural and economic differences (Safder, 2021). That also means that both local and global trends in digital space impact their online privacy experiences and concerns.

This study analyses the complicated connection between young shopper's online buying habits and their privacy concerns about personal data. It examines the variables that impact how people perceive their privacy, the concerns of societal and cultural norms, and the influence of technological changes. This study aims to provide understanding of privacy paradox in specific circumstances of Pakistani e-commerce. To understand the factors influencing the youth's use of online shopping platforms and the privacy issues arising from that usage, this study uses quantitative data. As the study is focused exclusively on youth privacy, this is an attempt to close a gap in this demographic in Pakistan as the country has unique cultural and social elements affecting digital behaviour and only limited studies addressed the subject. The findings offer evidence for young users, policy makers and commerce companies about the imbalance in privacy of consumers and sprawling digital commerce landscape in Pakistan.

The main research problem this study addressed is the complex digital issues related to privacy and increasing online purchasing behaviour in young buyers. The study referred to the

computation of the risk-benefit ratio (privacy calculus, Dinev & Hart, 2006), where consumers have to weigh the anticipated benefits of online shopping against the potential risks arising from privacy breach and other digital threats. The choices they made are sometimes without any clear justification as digital platforms use their personal data to feed algorithms which make decisions for consumers in most cases (Yuniar & Fibrianto, 2019). We usually call it artificial intelligence working in the background. This raises the major question this study tried to address: How do Pakistani Generation Z shoppers handle their privacy concerns when they use e-commerce platforms?

Literature Review

Emerging digital shopping platforms such as Temu, Shein and Amazon etc are unstoppable, changing the world economies and sometimes threatening the local business (Ainsworth, 2024). Although, they have made goods more accessible and convenient for consumers, the change has also brought attention to the intricate balance between consumer behaviour and privacy concerns, especially for young shoppers. Generation Z, a generation which was born between the middle of the 1990s and the beginning of the 2010s (Dimock, 2019), has grown up in a technologically advanced and social media-rich environment, hence, they frequently shop online and are very conscious of privacy issues.

The change brought up by the internet has transformed it from a communication tool to an important shopping platform (Greenwood & Manning, 2017). Customers frequently have to divulge personal information when shopping online, which raises serious privacy concerns (Nazir et al., 2012). With 5.45 billion people online, Statista reports a rise in e-commerce sales and internet users worldwide, demonstrating the spread of digital platforms (Statista, 2024). Because of its convenience and time-saving benefits, online shopping is becoming more and more popular in Pakistan (Yousaf et al., 2012; Sattar & Ameer, 2014).

Although things have been evolved with a lot of information available online, privacy concerns are still very important to consumers. When people talk about privacy, one of the most important things to talk about is how customer data is collected, stored, and used after a transaction (Madden et al., 2017). Earlier studies have shown that people often put convenience ahead of privacy, which leads to a privacy paradox where users do things that go against what they say they care about (Samuel & Scher, 1999). This contradiction is especially relevant for Pakistan's Generation Z, who have to find a way to balance their love of digital platforms with their worries about data privacy.

Privacy Paradox: What Is It?

Privacy concern is the disconnect between people's inclination to share personal information online usually while shopping and their own concerns about their personal information being manipulated is known as the "Privacy Paradox" (Norberg et al., 2007). This means that even people are worried, they still frequently take actions that jeopardise their privacy, especially when they are transacting online (Kokolakis, 2017). Brown's in-depth interviews revealed a

inconsistency in people's attitudes towards privacy issues (Brown, 2001). Similarly, according to Wu et al. (2018), one of the most pressing problems we are currently facing is privacy. Hence, the privacy paradox is a major conundrum in which people care about their private data but frequently behave in ways that betray that concern or went against their care (Kokolakis, 2017; Barth & Jong, 2017). This behaviour still lacks a clear explanation even after extensive theoretical and practical research (Gerber et al., 2018).

Researchers have been trying to figure out for the past ten years why people share personal information on social media and e-commerce sites even though they want to keep their data safe (Gerber et al., 2018). People still do e-commerce even though they are worried about it, according to research (Yuniar & Fibrianto, 2019). Kokolakis (2017) says that the privacy paradox has big effects on social networking, e-government, and e-commerce. Many people don't know how service providers collect and use their personal data, which shows that they don't know enough about privacy (Mirza et al., 2021).

E-commerce and Privacy Issues

Concerns related to personal data are as important for companies to do well and last as they are to their consumers. Research has shown that privacy is an important factor for consumers' trust when they provide their personal information and data while shopping online (Malhotra et al., 2004) Multiple factors shaped privacy ideas of consumers and shoppers including the power imbalance between companies and person to have control on their personal data after providing it online and how open data practices are within the e-commerce sites (Dinev & Hart, 2006; Hoffmann et al., 2016). When someone care about their online privacy but still make a choice to go ahead and do things that put that privacy at risk, it is termed as "privacy paradox". This issue is especially relevant to digital shopping sites, where customers often give out personal information in exchange for rewards (Acquisti et al., 2016) and then later worry about data security and privacy violations.

A massive part of this privacy issue is sponsored ads, which are common for marketing purposes (Brettel et al., 2015), however, these ads appear on social media, search engines, and other websites whenever you search some relevant stuff online. For example, if someone searches Instagram for a specific clothing brand or pair of shoes, they might see sponsored ads related to clothes and shoes on other sites. This is an example of highly targeted advertising, which sometimes even consider the age and other demographics of the users (Barreto, 2013). This study looks into whether the Privacy Paradox exists in this area and looks at young shoppers' online shopping habits when it comes to privacy.

Internet Behaviour of Generation Z and Privacy Risks

Generation Z is usually referred to the people born between middle of the 1990s and the start of 2014. They are raised in the digital age where internet use becomes part of daily life and are known for wanting unique experiences, using social media extensively, and being good with

modern technology (Seemiller & Grace, 2016). Studies show that Generation Z acts differently online than other users, as they often use social media to look up products and get suggestions from friends (Global Web Index, 2019).

Literacy used to only mean being able to read and write but now it also includes digital literacy which means being able to use computers and the internet (Jang et al., 2021). Privacy literacy is the idea that as social media and data-tracking technologies have become more popular, it has become difficult for people to realise how their personal information is gathered and used online (Stoilova et al., 2021). Generation Z may unintentionally put themselves at risk of their information stolen or used without consent because they don't always understand these complex issues (McKee et al., 2024). Some people don't seem to care about privacy, even though it can be dangerous to their personal life and finances. They either believe that sharing information online is normal or that they have protections in place (Colnago et al., 2023; Barth & Jong, 2017). If they are not literate in data processes, they are less likely to trust businesses when they don't know that websites and marketers use their data in other ways (Phelps et al., 2000; Wang & Petrison, 1993). This lack of knowledge is troubling, even in countries like Pakistan where privacy literacy is still a fairly new idea (Javed et al., 2020).

People's concerns about their privacy change over time based on the situation as they usually care more about their health and money than about their shopping or media preferences (Weible, 1993). There is limited studies on privacy literacy in Pakistan and more research can help us understand how Generation Z feels and acts when it comes to the safety of their personal information. A lot of recent research does not look at privacy literacy, but it does look at privacy intentions instead of actual behaviours of online shoppers (Dienlin & Trepte, 2014). This study will look at how well young people understands privacy issues and safety parameters.

Privacy in Pakistani Context

Pakistan is a unique place due to its cultural and societal norms, where people treat privacy different from Western societies (Mustafa et al., 2023). Cultural factors influence how people perceive and care about their privacy, and this is also the case in Pakistan. Imtiaz et al. (2020) discovered that people's opinions on privacy in Pakistan are influenced by many societal factors such as collectivism and social harmony. Cultural factors that place a strong emphasis on social relationships may encourage young people to reveal personal information online despite fears about privacy violations.

There is limited research explicitly addressing Generation Z's privacy concerns in Pakistan's e-commerce landscape. However, Shabbir (2024) findings show that Pakistani experts and youth are growing more conscious of privacy concerns, particularly in the wake of cybersecurity threats and data breaches across the world. For Pakistani e-commerce companies, it is critical to understand the unique concerns and behaviours of this demographic as they made a major part of online buyers.

Previous studies have ignored the e-commerce as majority of research remained focused on social networking sites (Samuel & Abby, 1999). For Pakistani youth, whose online purchasing behaviours are impacted by both local cultural elements and global digital trends, this difference is important. As there isn't much research on the topic in Pakistan, this study aims to close this knowledge gap by investigating the privacy paradox among Pakistani youth and assessing their understanding of online privacy while shopping.

The following hypothesis are put forth considering the reviewed literature:

H1: Students who are more concerned about their privacy are more likely to shop carefully online.

H2: Students who have serious privacy concerns are more likely to divulge their personal information as the advantages of online shopping are perceived to grow.

H3: Students are less likely to regularly shop online if they are more privacy literate.

Theoretical Framework

The purpose of this study is to provide a comprehensive understanding of the privacy dilemma that Generation Z shoppers face in Pakistan's e-commerce environment. Three theoretical ideas including the Privacy Calculus theory, the Technology Acceptance Model, and the Privacy Protection theory are used to approach this understanding.

Privacy Calculus Theory

The first theoretical framework we used to understand the privacy paradox is the privacy calculus theory. It is defined by Dinev and Hart (2006) as a useful way to understand how people choose whether or not to share personal information. This theory says that people think about the benefits of sharing their information online and the risks they will get from sharing. This is relevant to understanding how young shoppers in Pakistan calculate the risks and benefits of sharing their personal information on e-commerce sites. Using this framework to look at Generation Z in Pakistan can help find the factors that affect their online shopping habits and privacy concerns. It will also provide us behind the scene window into the thinking process of Generation Z shoppers.

Technology Acceptance Model (TAM)

Another useful theory which help us understand the privacy paradox phenomenon is Technology Acceptance Model. TAM, which was put forth by Davis in 1986, is a popular framework for understanding how people accept and adopt technology. It suggests that people's attitudes towards using technology are significantly influenced by perceived usefulness (PU) and perceived ease of use (PEOU). Their intention to use it is then influenced by this. In context of this study it is particularly relevant as it shows how people make their choices of using different technology. It also help us understand if the perceived usefulness of any technology take precedent over the risk to user's privacy.

TAM help us understand the attitudes and behaviours of young shoppers with respect to Pakistani

e-commerce platforms. Many young people consider e-commerce platforms to be user-friendly and convenient for online transactions, as evidenced by perceived ease of use. Understanding these choices can help explain why young buyers are willing to shop online despite privacy concerns and accept e-commerce technology terms.

Privacy Protection Motivation Theory (PPMT)

Lastly, we used Privacy Protection Motivation Theory (PPMT) by Smith et al. (1996), which looks at how people react and make choices when they think their personal information is at risk. The theory propagates that people are more likely to do something to protect their privacy if they think they can defend themselves against a threat.

In this study, applying PPMT will clarify the motivation behind the reason why Generation Z wants to keep their personal information private when they use online shopping platforms. Privacy issues can have many forms including but not limited to personal data being stolen, information used without your permission and ambiguity about policies of some websites about usage of your personal data. Privacy Protection Motivation Theory explains two things: First, how the perception of privacy threats influences the choices made by Generation Z about their protection of very same privacy. Second, their ability and confidence to protect themselves from such threats. They can make different decisions to neutralise these threats including changing their privacy settings on digital platform, using safe methods of transactions or even sharing no or less personal information online (Rifon et al., 2007). By adding PPMT to our theoretical framework, we can provide a clearer look at Generation Z's fears about privacy, their reasons for wanting to protect their privacy, and their actions in the Pakistani e-commerce market, helping us better navigate the privacy paradox phenomenon (Lwin et al., 2007).

Methodology

The privacy concerns of Generation Z in Pakistan's e-commerce environment are investigated in this study using a cross-sectional survey research design. The method made it possible to gather data at a specific moment in time, providing a glimpse of the participants' opinions regarding privacy-related matters and their concerns.

Sampling

This study surveyed 750 participants using purposive and convenience sampling who were Generation Z students enrolled in undergraduate or graduate programmes at seven Pakistani universities. These universities were picked to reflect a range of academic fields and geographic locations. Participants had to be members of Generation Z age group (born 1995–2014) and actively participate in e-commerce in order to meet the inclusion criteria.

Due to improperly completed questionnaires, the final response size was 720 which includes 371 male and 349 female university students from both public and private institutions—the National University of Computer and Emerging Sciences, Information Technology University (ITU), University of the Punjab, University of Veterinary and Animal Sciences, University of Central

Punjab, and University of Education. The participants ranged in age from 18 to 28.

Research Design

Structured questionnaires were distributed to the chosen participants in order to collect data. The appropriate institutional review board's ethical approval was acquired before the survey was distributed. The questionnaires were distributed electronically through email and social media to get prompt responses.

The survey instrument was developed for this study after a thorough review of the body of research on privacy concerns in e-commerce, with a focus on Generation Z and modified to accommodate specific Pakistani e-commerce landscape. The survey assessed various aspects of demographic data, consumer patterns of young shoppers in Pakistan, and privacy concerns arising from such patterns.

Data Analysis

We analysed the quantitative data from the surveys using statistical software SPSS. The responses from the survey participants were analysed using descriptive statistics such as mean, standard deviations and frequencies. The study also used the inferential statistical methods, such as regression analysis, to investigate correlations between variables and test above hypotheses.

Limitations and Ethical Consideration

As the study involves human participants, we followed the strict ethical guidelines by obtaining informed consent before filling the survey and providing the participants with explanatory statements, detailing the purpose of study. The data will be stored for five years after the study and it will be published anonymously in research journals . By giving each participant, a unique identification number (from P1 to P750) and compiling the data anonymously for analysis, we were able to guarantee the participants' privacy and confidentiality. The results of this study might not be applicable to all members of Pakistan's Generation Z, despite our efforts to gather a varied sample from several universities. Additionally, response bias may be introduced by the survey's self-report measures. To prevent such bias in future, we can investigate Pakistani Generation Z's privacy concerns using additional research techniques like interviews, and focus groups. These methods enable us to explore the various viewpoints and experiences surrounding privacy in online transactions. In the future, experimental designs can also be used to study how different interventions or privacy-enhancing measures impact the behaviour of Generation Z.

This study is a component of the M.Phil. After passing the ethical data collection process, the thesis was submitted to Punjab University. Artificial intelligence software can only be used for editing and language.

Findings

Despite growing awareness of privacy issues, there is a dearth of empirical research on the privacy concerns of Generation Z in Pakistan's e-commerce landscape. Future studies

should aim to address this gap by employing rigorous methodologies to examine the factors influencing privacy perceptions and behaviours among Pakistani youth. Moreover, comparative research across different demographic groups and cultural contexts can deepen our understanding of privacy dynamics in e-commerce.

The data collected through survey questionnaire. The findings of the survey are calculated using SPSS ,presented in tables and detail description is also given.

Table 1

Education

Education of the participants.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Undergraduate	306	42.3	42.3	42.3
	Postgraduate	414	57.7	57.7	100.0
	Total	720	100.0	100.0	

In this research, the participants are from undergraduate and postgraduate programs. The results obtained show that out of 720 total participants, 414 participants are from the postgraduate program this makes 57.5% of them and 306 participants are form the undergraduate program and makes 42.3%. The results are in accordance with the table 1.

Table 2.**Online Payment***I prefer online payment system over Cash on delivery (COD)*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	221	30.1	30.1	30.1
	Agree	314	43.4	43.4	73.6
	Neutral	43	6.1	6.1	79.7
	Disagree	106	15.1	15.1	94.9
	Strongly Disagree	36	5.1	5.1	100.0
	Total	720	100.0	100.0	

About 30.1% selected Strongly Agree which means that they prefer the online payment method over COD and 43.4% that makes 314 respondents Agreed while 6.1% were Neutral, 15.1 Disagreed and 5.1% Strongly Disagreed with the statement which means that they prefer COD while the majority is with Online payment method . Most of the respondents (314/720) Agreed that they prefer Online Payment method making the highest percentage of 43.4% and only 5.1% prefer COD. For more convenience observe the table 2.

Table 3**Online Shopping Benefit***I do online shopping because it is more beneficial.*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	370	51.4	51.4	51.4
	Agree	257	35.3	35.3	86.7
	Neutral	59	8.4	8.4	95.1
	Disagree	26	3.7	3.7	98.9
	Strongly Disagree	8	1.1	1.1	100.0
	Total	720	100.0	100.0	

It shows that nearly 51.4% of people say that they consider online shopping more beneficial that is why they do and they Strongly agree with the statement while 35.3% Agree, 8.4% Neutral responses, 3.7% Disagreed and 1.1% Strongly Disagreed with the statement. This clearly shows that people strongly agree with the statement and accept the statement that they do online shopping because it is more beneficial to them.

Table 4**Transaction History Tracking***I know that transaction history can be tracked without user's consent.*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	221	30.1	30.1	30.1
	Agree	373	51.9	51.9	82.0
	Neutral	55	7.9	7.9	89.9
	Disagree	53	7.6	7.6	97.4
	Strongly Disagree	18	2.6	2.6	100.0
	Total	720	100.0	100.0	

The total of 700 participants who have participated in the research 30.1% Strongly agree, 51.9% Agree, 7.9% Neutral, 7.6 Disagree and 2.6% Strongly disagree. This shows that 51.9% people have knowledge that the transaction history can be tracked without the consent of the users and 30.1% Strongly agrees with the statement while only 2.6% and 7.6% Strongly disagreed and disagreed with the statement respectively.

Table 5**Privacy Breach***I have faced a situation in which my credit card and bank details were used by someone else.*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Yes	312	43.1	43.1	43.1
	No	408	56.9	56.9	100.0
	Total	720	100.0	100.0	

Out of 720 respondents 408 haven't faced a situation in which their credit card and bank details were used by someone else while 312 respondents have faced such a situation. So we can say that the situation in which personal credit card and bank details were leaked is at alarming levels as 43.1% have faced such mishaps.

Table 6**Sponsored ads and privacy breach***I believe Sponsored ads are clear evidence of privacy breach .*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	140	18.6	18.6	18.6
	Agree	477	66.7	66.7	85.3
	Neutral	52	7.4	7.4	92.7
	Disagree	40	5.7	5.7	98.4
	Strongly Disagree	11	1.6	1.6	100.0
	Total	720	100.0	100.0	

To the statement related to sponsored ads as evidence of privacy breach 18.6% have chosen Strongly Agree, 66.7% have chosen Agree, 7.4% are Neutral, 5.7% Disagree and 1.6% are of Strongly Disagree. The highest per cent is 66.7% of the 477 respondents who have agreed to the statement and they consider sponsored ads relevant to their search as evidence of privacy breach.

Table 7**Disclosure Benefit***I disclose my personal information as it helps me get more discounts and vouchers.*

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	136	18.0	18.0	18.0
	Agree	427	59.6	59.6	77.6
	Neutral	46	6.6	6.6	84.1
	Disagree	52	7.4	7.4	91.6
	Strongly Disagree	59	8.4	8.4	100.0
	Total	720	100.0	100.0	

In response to the above-mentioned questions 18% of respondents Strongly Agreed, 59.6% Agreed, 6.6% Neutral, 7.4% Disagreed and Strongly Disagreed is chosen by 8.4%. This depicts that Mostly participants 417 (59.6%) Agreed that they can get more discounts and vouchers (benefits) that's is why they disclose their personal data.

Table 8**Privacy Policy**

I always read the privacy policy before shopping online .

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Agree	59	7.0	7.0	7.0
	Agree	202	27.4	27.4	34.4
	Neutral	26	3.7	3.7	38.1
	Disagree	206	29.4	29.4	67.6
	Strongly Disagree	227	32.4	32.4	100.0
	Total	700	100.0	100.0	

About 59 out of the total 720 participants strongly agreed that they read the privacy policy before shopping online, 202 (27.4%) Agreed, 26 participants (3.7%), 206 participants (29.4%) disagreed and 227 participants (32.4%) strongly disagreed. So, Most of people don't read the privacy policy before online shopping as 227 (32.4%) strongly disagreed with the statement.

Hypothesis Tests Interpretation**HYPOTHESIS 1**

The first Hypothesis to be tested is as follows,

H1: Students with more privacy concerns are more careful while online shopping.

In this Hypothesis the relationship between privacy concerns and Online shopping is observed. The indicators for measuring Privacy concerns involve the fear of being tracked, Misuse of information, tracking of transaction history and also by the sponsored ads displayed to people related to their search history.

Correlations Relationship Between Privacy concerns and Online shopping

			online shopping	privacy concerns
Spearman's rho	online shopping	Correlation	1.000	.280**
		Coefficient		
		Sig. (2-tailed)	.	.000
		N	700	700
	privacy concerns	Correlation	.280**	1.000
		Coefficient		
		Sig. (2-tailed)	.000	.
		N	700	700

** . Correlation is significant at the 0.01 level (2-tailed).

The Relationship that existed between the 2 variables i.e. Privacy Concerns and Online Shopping is measured using the software SPSS and the test applied is Spearman’s rho Correlation Coefficient. The Table Shows the Positive Correlation between the selected variables as discussed in the Hypothesis 1 the r value is 0.280, p value is 0.000 whereas N = 700.

The results of Hypothesis 1 obtained through this test shows that the relationship between the two variable Privacy concerns and Online shopping is Positive correlation which is clear depiction that more the privacy concerns in a person the more they will be careful while online shopping. This proves the Hypothesis that ***‘People having more privacy concerns are more careful while online shopping’***

HYPOTHESIS 2

To understand the relation between Privacy concerns and privacy Paradox .The hypothesis is as follows

H2: The more benefits are offered, the more students disclose their personal information despite having massive privacy concerns.

In order to measure the relation between Privacy concerns and Privacy paradox the Spearman’s Correlation was utilized and the results are as shown in table. The relationship between Privacy Paradox and Privacy Concerns.

Correlations between Privacy Paradox and Privacy concerns

		Privacy paradox		privacy concerns
Spearman's rho	Privacy paradox	Correlation Coefficient	1.000	.571**
		Sig. (2-tailed)	.	.000
		N	700	700
	privacy concerns	Correlation Coefficient	.571**	1.000
		Sig. (2-tailed)	.000	.
		N	700	700

** . Correlation is significant at the 0.01 level (2-tailed).

The Correlation Coefficient obtained by measuring the relationship between Privacy Paradox and privacy concerns is done using Spearman’s rho Correlation Coefficient. The table shows that the relation is a positive correlation between the two said variables as discussed above. The r value is 0.571, the p value is 0.000 and the N= 700 N stands for the Number of Participants. The r value between .40 and 0.70 is considered Moderate.

The results researcher obtained show there are more chances that people are more likely to disclose their personal data to the platform if they are offered with more benefits. In other words, the Privacy paradox is linked with the benefits people are getting so despite having privacy concerns people are shopping online in order to get the benefits offered. The positive correlation that exists proves the Hypothesis that **‘The more benefits are offered, the more People disclose their personal information despite having massive privacy concerns’**.

HYPOTHESIS 3

Here, the test is to measure the relationship between Privacy Literacy and online shopping.

H3: Students having more privacy literacy make less purchases online

In order to measure the relationship between Privacy literacy and Online purchases the test applied is Spearman’s Correlation using SPSS. The test was done to measure the relationship between the variables Privacy Literacy and Privacy Paradox. The table shows the results obtained after applying the relevant test. The relationship between Online

Shopping and Privacy Literacy.

Correlations

			online shopping	privacy literacy
Spearman's rho	online shopping	Correlation Coefficient	1.000	-.229**
		Sig. (2-tailed)	.	.000
		N	700	700
	privacy literacy	Correlation Coefficient	-.229**	1.000
		Sig. (2-tailed)	.000	.
		N	700	700

** . Correlation is significant at the 0.01 level (2-tailed).

The results according to the Table shows that the relation between the variables Privacy Literacy and Privacy Paradox is Negative Correlation. The results obtained by applying the Spearman's rho Correlation Coefficient. The r value is -.229, while p-value is .000 and N=700. The negative correlation shows that the increase in value of one variable is resulting in the decrease of the second variable.

The results reveal an interesting fact that people have more knowledge related to the Privacy issue they can face in the future try to limit their online shopping. Hence it is proven that the Hypothesis **'People having more privacy literacy make fewer purchases online' is correct as an increase in one variable (privacy Literacy) results in a decrease of the other (Online Shopping).**

Discussion

This study examines the complex privacy behaviours of Generation Z in Pakistan's e-commerce industry, illuminating a phenomenon called the privacy paradox. The results provide fascinating new information about how people deal with privacy issues when they shop online. Notwithstanding its shortcomings, this study makes a substantial contribution to our knowledge of privacy-related behaviours across a range of fields.

The study finds a distinct trend among those who are more aware of data breaches and have higher privacy concerns. These people share personal information with greater caution. They prefer to consult with some trustworthy person first before choosing to provide their personal information online. The findings align with earlier research that shows a strong link between

privacy concerns, knowledge, and how people shop online (Stoilova et al., 2021).

The findings show the existence of conflicting behaviour among the young consumers. Even though they are worried about their privacy, people are still willing to share personal information online in exchange for affordances of e-commerce platforms. Barth and Jong (2017) highlighted this where they found that people choose short-term gains over long-term privacy protection when analysing the benefits and risk involving online shopping. However, the limitations of using just quantitative surveys restrict us from determining the motivations and reasons behind this behaviour. Qualitative methods, like focus groups and in-depth interviews with media professionals, social media analysts, and privacy experts, could help us learn more about decisions people made when preferring the ease over the privacy risks (Hoffmann et al., 2016). Another, limitation is absence of experimental research as inclusion of experiment can provide a clear view into the decision making by young shoppers when they are given different levels of discounts and benefits. Findings from such experiment can then be compared with the stated privacy concerns of Generation Z consumers and their motivations for immediate incentives (Acquisti et al., 2016).

Findings reveal the complicated link between Generation Z's online shopping habits and privacy issues in Pakistan, which are closely aligned with the Privacy Calculus Theory (Dinev & Hart, 2006). About 30.1 percent participants choosing online payment methods show a clear preference by them to choose the benefits over privacy. This choice shows a cost-benefit analysis among consumers where convenience weigh more than perceived risks. Even though 43.1% of respondents show their resistance to compromise their financial information, they are still willing to shop online if they see enough benefits including convenience and savings. The findings of positive link between being careful when shopping online and worried about their privacy backed up this theory. This shows that privacy concerns do exist, however, they do not completely stop people from buying things online when weighed against perks from online shopping.

As the Privacy Protection Motivation Theory (PPMT) helps us understand the reasons behind the motivations to protect personal information, findings from this study show that awareness play an important role in their decision making (Smith et al., 1996). For instance, people with more awareness about privacy issues are less likely to shop online or provide their personal information. However, many people (32.4%) do not bother to read privacy policies. This align with the PPMT's assumption that if people know that their privacy is at risk or there is any threat to their personal information, they will take steps to protect their privacy and their online purchases. As mentioned above, there are exceptions where some people share personal information for supposed benefits, however, there might be a factor of limited awareness which contribute to the disregard for digital risks . The conflicting results show how complicated the link is between taking part in e-commerce, privacy worries, and incentives to protect yourself. This complication helps us understand the privacy paradox, where people weigh the benefits and risks of shopping online against their privacy concerns, which then impact their decisions about online shopping. .

The study only looked at university students from Generation Z in Lahore, Pakistan and findings are only related to specific demographic limiting its generalisability. Further future research should try to include a wider range of people. This can include people from a variety of age groups and professions, people from different socioeconomic backgrounds and geographical regions would give us a better idea of how different groups of people view and react to risks to their privacy in the changing world of e-commerce. Inclusion of qualitative methods to understand the individual motivations and reasons of ignoring privacy issues may give us a comprehensive picture of subjective decisions individual made in e-commerce landscape. Additionally, a longitudinal study could track how privacy behaviours change over time, as the fast changing technologies and rising concerns about privacy collide in digital areana.

Conclusion

This study analyses how Generation Z shoppers in Pakistan shows their concerns about privacy risks while also providing their personal information to e-commerce sites. While this does not always result into something bad, there are examples of personal information being stolen or misused. The results show that there is a complicated relationship between the privacy concerns of Pakistani Generation Z and the way they shop online. This supports both the Privacy Protection Motivation Theory and the Privacy Calculus Theory. Even though 43.1% of those who took part said they had been the victim of a data breach, many still prefer to pay online because it is easier and cheaper. Findings indicate that the conflicting relationship between privacy awareness and how often people shop may be a motivation for more careful shopping for young buyers when they shop as it can keep them alert. Generation Z shoppers and in this case even the sellers have to think about the pros and cons of doing business online and worries about privacy. This is an example of the privacy paradox.

Results of this study can help make laws and rules that protect people's privacy and make people feel safe online. We need to use cultural, demographic, and behavioural factors mentioned to understand the privacy issues that Generation Z is having in Pakistan's e-commerce world. More research can help us understand the complicated nature of privacy issues and so we can come up with ways to improve privacy protection in online transactions by using sound methodologies and theoretical frameworks.

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