

# INVESTIGATING PRIVACY PARADOX: DATA PRIVACY BEHAVIOURAL INTENTION AND DISCLOSURE BEHAVIOUR

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#### **ABSTRACT**

Data privacy has become a serious concern nowadays. Consumer thinks once or twice before sharing personal information with sellers because in recent years there are many cases have come regarding misuse of consumer data. Consumer personal data helps sellers to serve their customers in a better way and run personalised promotional schemes. In the context of privacy paradox, consumer actual claim regarding data privacy and actual disclosure behaviour has contradictory observation. The objective of this study is to find out the factors that form positive information disclosure behaviour in the mind of consumers. To study disclosure behaviour, we have considered risk-benefit, nature of data, trust in the brand, and behavioural intention as variables that play a role in framing a particular type of disclosure behaviour. Through a convenient sampling technique, a total of 376 respondents were selected and interviewed with the help of a structured questionnaire. The finding suggest that trust in the brand has a major role in forming positive behavioural intention and disclosure behaviour regarding personal information sharing to sellers. Whereas, risk-benefit has positive and nature of data hurts intention building and disclosure behaviour.

Keywords: Data Privacy, Privacy Paradox, Behavioural Intention, Disclosure Behaviour

# 1. INTRODUCTION

Maintaining privacy in today's Web 2.0 world is very difficult because of various complications. We all are connected to the internet and without this, we feel loneliness. Today, privacy is also a debatable issue because companies want more data of customers however, customers hesitate to provide more data, yet for several requirements, they easily provide their data to companies (Kim et al., 2008; Kelley et al., 2013). It is creating a blurred line among private and public data. People are easily sharing their pictures, videos, hobbies, education background, address, location, card details, etc. on various internet platforms, however, they still show that they are very much concern about their data and claim that it is an important element of online purchase decision process (Simon, 1982; Norberg et al., 2007; Hughes-Roberts, 2012). In reality, the concern relating to the privacy of data and actual online behaviour is contradictory (Acquisti, 2004; Barnes, 2006). Here, the situation of the privacy paradox arises.

The discrepancy among an intention toward data privacy and actual data disclosure behaviour during online shopping (Flender and Müller, 2012). Due to increasing advance technology and artificial intelligence algorithms,

the fashion to collect, store, and analyse the big amount of consumer data has increased (Culnan & Armstrong, 1999; Culnan & Bies, 2003). Results from these data analyses help marketers to target and tailor offerings that exactly needed and desired by consumer groups (Moon, 2000; Farahat & Bailey, 2012). However, asking personal data from customers has arisen serious concern on the potential erosion of personal data privacy (Williams, 2002; Zhou 2012). Though people express their compassion on personal information but observation of actual consumer behaviour at the marketplace suggests that people are less discerning and often offhand in their data profiles protection (Norberg, Horne & Horne, 2007). There are very limited studies have been conducted on what people say about their data privacy and what they do at the time of online shopping. The objective of this study is to investigate the discrepancy between people proclaimed behavior and actual behaviour regarding personal data privacy during online marketing exchange (Joinson et al., 2010; Pötzsch, 2009). For this investigation, we have taken three independent variables such as privacy risk, nature of data, and trust in the company to decide the behaviour intention of customers. The intention to share information backed by the trust in the company reflects the actual disclose behaviour of consumers regarding data privacy paradox.

## 2. REVIEW OF LITERATURE

The success of e-commerce and digital marketing depends on how much consumer data a company has and how effective it can analyse these data. Jenitzsch et al. (2012) have found 47% of the service providers companies treated customer data as a commercial asset whereas 48% said that they share data with third parties to identify business opportunities. These are the reason customers often think about their data privacy. Concerns of consumers regarding data privacy, government regulations, and cost to the data collection are marketing the e-commerce environment expensive and complex.

#### 2.1 Behavioural Intention

Behavioural intention of an individual or consumer is formed based on attitude, subjective norms, and perception bias (Ajzen, 1985). Previous findings have been showing a strong correlation between intention and behaviour whereas intention can be a predictor of behaviour (O,keefe, 2002). User usually states disclosure intention but do state their actual disclosure intention (Keith et al, 2013). Sutanto et al. (2013) cited in their study that users bother privacy concerns more than their willingness to share information even on trusted sites. There may be a possibility that an individual's indicated intentions are not reflective of their actual behaviour because of other factors that may influence both intention and behaviour independently. The constant and routine information requested by companies could be easily shared by an individual as such information has a low level of realized losses (FTC, 2003).

# 2.2 Risk-Benefit and Behavioural Intention

Risk analysis is an important aspect of information privacy. It is the process of deciding that to whom, how much, in what way, and to what extent personal data is good to share (Li et al., 2010). The risk-benefit calculation is a logical, rule-based, sequential, cause and effect, high effort, conscious process (Novak & Hoffman, 2008). Misuse of data and its consequences are rationally weighted during information exchange. The risk-benefit calculation is done aiming to increase benefits (Peter & Tarpey, 1975) and decrease the risk of information disclosure (Vroom, 1964; Keith et al., 2013). Hence, behavioural intention and disclosure behaviour are positively influenced by benefits and negatively influenced by risk (Deering & Jacoby, 1972; Culnan & Armstrong, 1999).

H1: Risk-Benefit has a significant impact on behavioural intention to share personal data.

# 2.3 Nature of Data and Behavioural Intention

The sensitivity of data that is asked by the company determines an intention to share personal information (Lwin et al., 2007). The requirement of data that is compulsorily needed for execution of the transaction, in such situation consumer may act normal to share required personal data whereas, in case of irrelevant data requirement, the consumer may act abnormal (White, 2004). The type of personal data and its quantity might be used by consumers to create intention regarding data sharing (Deering & Jacoby, 1972; Norgberg et al., 2007). The usual data such as address, contact number, postal code, name, etc. has less losses. Such nature of data is easily shared by consumers where the perceived risk is low (Milne, 1997).

H1: Nature of Data has a significant impact on behavioural intention to share personal data.

### 2.4 Trust in the Brand and Behavioural Intention

Consumer trust in the brand has a positive influence on the intention to share information (Garbarino & Lee, 2003; Norberg et al. 2007). It is the experience of customers and activities of companies, if data privacy is violated by the company then consumers trust the brand decrease, and in future consumers may hesitate to share their personal information with the company (Motiwala, et al., 2014). Moreover, the company claims the data privacy and protective nature of their service wherein consumers expect high data privacy which may inconsistent in real data privacy practice by the firm (Kehr et al., 2015). The dynamic nature of data privacy practices by companies suggests that the relative consumer perception toward data privacy is an important predictor of consumer intention to share personal information (Altman, 1975; Hoffman, Novak, and Peralta, 1999; Wakefield, 2013).

H3: Trust in the brand has a significant impact on behavioural intention to share personal data.

#### 2.5 Behavioural Intention and Disclosure Behaviour

Disclosure behaviour is decided upon the intention of consumers to share information. Consumers always evaluate the negative consequence of sharing personal information against the benefits they are going to received and then disclosure behaviour is shown (Keith et al., 2013). Perceived benefit outweighs the perceived risk which eventually neglects the privacy concern and often results in information disclosure (Culnan & Armstrong, 1999; Moon, 2000; Leon et al., 2013). The typical benefits of personal data sharing includes discounts, bonus, convenience, and socialization with the seller (Xie & Kang, 2015). The disclosure behaviours are not stable because the privacy preference of an individual may be malleable. The consumers' disclosure behaviour is the outcome of their interest (Brandimarte et al. 2013).

H4: behavioural Intention has a significant impact on disclosure behaviour to share personal data.

#### 2.6 Trust in the Brand and Disclosure Behaviour

According to Milne and Boza (1999) trust directly affects the behavioural intention and actual behaviour of a consumer while sharing personal information. Privacy risk may significantly impact information sharing whereas if an individual has trust in the company then the trust may play environmental cues to show positive disclosure behaviour (Norberg et al., 2007). Therefore, if the company has a positive trust image in the market regarding data privacy then consumers may show positive disclosure behaviour and vice versa.

H5: Trust in the brand has a significant impact on behavioural intention to share personal data.

Risk-Benefits

Nature of Data

Behavioural Intention

Trust in the Brand

Figure-1: Conceptual Model of Data Disclosure Behaviour

Source: Author's Observations

# 3. RESEARCH METHODOLOGY

This study has empirically attempted to explain the privacy paradox by considering eminent factors that help to predict privacy such as associated

risk-benefits, nature of data, trust in brand, behaviour intention, and disclosure behaviour. These factors have been taken from existing literature. The survey was conducted in two phases through a structure questionnaire. The respondents were the customers of shopping malls outlets. In the first phase, respondents were interviewed before entering to the malls. The first phase of inquiry consists of questions related to risk-benefits, nature of data, trust in the brand, and behavioural intention whereas the second round of inquiry consists of questions relating to disclosure behaviours. The sample size of this study was 376 which has chosen through a convenient sampling technique. The location of this study was the Mohali city of Punjab, India. The duration of data collection was December 2019 to March 2020. The Smart PLS-SEM statistical software was used to analyse and verify the relationship among variables under this study.

# 4. DATA ANALYSIS AND INTERPRETATION

# 4.1 Measurement Model: Reliability and Validity

Table 1: Measurement Model Assessment

Latent Variables	Manifest Variables (Measured Variables)	Codes	Standardize d Factor loading	Mea n	SD
	Too much Uncertainty about disclosed data	RB1	0.8957	3.57	1.14
Risk- Benefits	High potential for loss associated	RB2	0.9231	3.70	1.21
	Likely misused shared data	RB3	0.9254	3.78	1.29 6
	Monetary rewards	RB4	0.9432	3.67	1.31
Nature of Data	Demographic data	ND1	0.8749	4.00	1.08 7
	Economic data	ND2	0.8865	4.05	1.09
	Education data	ND3	0.8939	3.96	1.05
	Payment data	ND4	0.8915	3.94	1.05
	Address & Communication data	ND5	0.8419	3.78	1.19 7
	Family members details	ND6	0.8553	3.76	1.06
Trust in the Brand	Know and trust the data collector or website	TB1	0.7789	3.80	1.16 6
	Long relationship with company	TB2	0.7765	3.70	1.12
	Ethics are on top of company policy	TB3	0.7694	3.95	0.97

	Consumer data privacy is on utmost			3.89	1.14
	priority	TB4	0.8354		8
	Vulnerable to identity that			3.86	1.11
Behavioural	Vulnerable to identity theft	BI1	0.9247		7
Intention	Communication to instanting the communication of th			3.90	1.11
	Convenience to instantly access	BI2	0.9162		2
	Dattan samilaa ayna atati an			3.86	1.10
	Better service expectation	BI3	0.9365		9
	A coose batton muchyote and complete			3.81	1.09
	Access better products and services	BI4	0.9424		8
	My personal photos			3.58	1.22
	lviy personal photos	DB1	0.9186		8
Disclosure	Addresses and callabone numbers			3.64	1.11
Behaviour	Addresses and cellphone numbers	DB2	0.9309		7
	Disalas marinas maritmetis m			3.66	1.24
	Disclose my income situation	DB3	0.9204		0
	Disalese demonsulis dete			3.54	1.17
	Disclose demographic data	DB4	0.8995		9
	Disalasa payment dataila			3.86	1.11
	Disclose payment details	DB5	0.8079		7

Source: Author's Calculations

The table-1 contains standardised factor loading values, mean, and standard deviation of manifest variables. The standardized factor loading values are above 0.70 therefore all the manifest variables in the above table are reserved whereas two manifest variables under the Risk-Benefits variable were removed as their loading values were less than 0.70. Similarly, the mean values of all manifest variables are ranging from 3.54 to 4.00 and standard deviation results are ranging from 0.97 to 1.316 which are a good range and suitable for further analyses.

Table 2: Correlation Coefficients Matrix and Quality Criteria

	Behavioural	Disclosure	Nature of	Risk-	Trust in the
	Intention	Behaviour	Data	Benefit	Brand
Behavioural Intention	1	0	0	0	0
Disclosure Behaviour	0.8524	1	0	0	0
Nature of Data	0.4356	0.4997	1	0	0
Risk-Benefit	0.4657	0.455	0.4351	1	0
Trust in the Brand	0.7976	0.7383	0.3318	0.8043	1
Average Variance Extracted (AVE)	0.8649	0.8039	0.7643	0.8501	0.6249
Composite Reliability (CR)	0.9424	0.9334	0.9311	0.9378	0.8694
Cronbach's Alpha	0.9479	0.9387	0.9383	0.9411	0.8127

Source: Author's Calculations

The above table reflects the correlation matrix of all the variables under this study. The correlation values show moderate correlations among variables. Likewise, the values of the correlation are not so high therefore, the situation of multicollinearity may not occur. The average variance extracted (AVE) score of all variables under this study is more than 0.50. The variables explain more than 50% variance in its items thus, the convergent validity of variables is successfully established. Similarly, the shared variance of all variable among each others are greater than its AVE therefore, discriminants validity is also successfully proven. Composite reliability values of variables under this study are falling in the range from 0.86 to 0.94 which are more than 0.70 and less than 0.95 therefore internal consistency reliability is also successfully proven. Cronbach's Alpha values are greater than 0.70 for all variables therefore, this data passed the reliability test.

# **4.2 Structural Equation Model**

RB1 RB2 RB3 RB4

0.000

Bi1 Bi2 Bi3 Bi4

0.000

RIsk-Beneft 0.925 0.945

ND2 0.886

ND3 0.984

ND4 0.892

ND5 0.892

ND6 0.892

NB7 0.892

NB8 0.000

NB8 0.000

DB1 0.936 0.942

0.724

0.724

0.736 0.931

DB2 0.990

DB3 0.990

DB3 0.990

NB8 0.892

ND6 0.892

ND7 0.892

ND7 0.892

ND7 0.776 0.789 0.835

Figure 2: Path Relationship Diagram

Source: Author's Calculations

Table 3: Structural Model Assessments

Hypothes es				Beta Estima te	S.E.	t-values	Final Decisio n
H1		$\rightarrow$			0.015	33.00**	Accept
пі	Risk-Benefit			-0.5022	2	*	ed
H2		$\rightarrow$	Behaviour		0.009		Accept
П	Nature of Data		al	-0.0505	9	5.10***	ed

НЗ		$\rightarrow$	Intention		0.016	72.76**	Accept
	Trust in the			1.2183	7	*	ed
H4	Brand	$\rightarrow$			0.014	11.31**	Accept
			Disclosure	0.1605	2	*	ed
Н5	Behavioural	$\rightarrow$	Behaviour		0.014	50.97**	Accept
	Intention			0.7245	2	*	ed

Source: Author's Calculations

\*\*\*p≤0.01;

\*\*p\le 0.05; \*p\le 0.10

The above table-3 indicates the results of the bootstrapping procedure with (5376 cases, 5000 subsamples, and no sign change option). As a result, all hypotheses of this study have been accepted at p≤0.001. This means all independent variables have a significant impact on dependent variables. Risk-benefits, nature of data, and trust in the brand have a significant impact on behavioural intention to share personal information with the sellers. Similarly, the trust in the brand and behavioural intention have a significant impact on the information disclosure behaviour of customers.

# 5. DISCUSSION ON FINDINGS

This study aims to provide sufficient evidence that how customers react when they are asked to share their personal information during sales transactions. The findings suggest that customers first calculated the risk associated with information sharing against the benefits they are going to get after that they decided where information should be shared or not. The nature of data demanded by the sellers also decided whether such data should be shared with the company to not. Simple data that have low losses then the customer may not hesitate much to reveal and share such data but when a loss is huge that time customers may hesitate to show a negative attitude in sharing such data. Many a time they avoid to share such information. Again trust in the brand or company that has also greater roles in behavioural intention to share information with the sellers. If a company is very authentic and reliable to which customers also trust that this company does not misuse my information. For such a company or seller customer attitude and intention to disclose information is positive.

# 6. IMPLICATIONS OF THIS STUDY

This study is very much useful for policymakers of the company. Today, data has various roles in the productivity and success of the company. With this regard, how much data and what type of information the company should ask consumers so that consumer would not hesitate to share information. Many a time, we ask some information from our customer and customer may not willing to share such information with the company. As a result, customers may hesitate to visit the store or website. So, this study will assist policymakers to what extent we can force customers to share personal data and how customers will feel comfortable sharing these data. This study is also helpful to provide the elements that could be considered by the customer before revealing personal information to the company. It is useful for digital marketers also where it has become very common to ask

basic customer information before allowing them to move the next page of the company's website.

# 7. CONCLUSION

Though data has a very important role in satisfying customers and retaining them with the business but many times customers feel irritated to share their personal information. Customers may not feel comfortable all the time with the company's communication. Various calls from the company's executives, SMS, emails, promotions, etc. may annoy customers. Nevertheless, the amount of information and the role of such information in business transactions also play a vital role in disclosure behaviour. The company should ask minimum information in a single transaction so that customers could feel easy to share. The relevancy of such information in the business transaction should also be justified to achieve positive disclosure behaviour.

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