

## Factors Affecting Consumers' Complicity Towards Counterfeit Mobile Phones in Pakistan

*Raja Irfan Sabir, Wasim Ahmad and Al Saud Razzaq*

Department of Management Sciences,  
COMSATS Institute of Information Technology, Sahiwal, Pakistan

**Abstract:** Counterfeiting has become an international issue destroying the real industry. The counterfeit market has expanded due to increasing demand of replica products. Companies and government develop laws i.e. intellectual property rights, against counterfeit products to shield the original brands. This study aimed to examine the influence of factors i.e. collectivism, hedonic shopping behavior, perceived quality and economic factor; on consumers' complicity regarding counterfeit mobile phones. Self-administered questionnaire based on 5-point likert scale was used to collect data from users of counterfeit mobile phones (N=226). Descriptive statistics, reliability statistics, correlation, One-way ANOVA and regression analysis have been used to analyze the collected data. Findings of study revealed that collectivism, perceived quality and economic factors significantly determine consumers' complicity. Whereas, the hedonic shopping behavior did not prove to have any effect on consumers' complicity. The cultural and social norms of young Pakistanis have been changed; provide wider inferences for these markets. The findings provide manufacturing implications for companies and regulatory implications to the government.

**Key word:**Collectivism • Consumers' complicity • Counterfeiting • Hedonic shopping behavior • Perceived quality

### INTRODUCTION

Counterfeiting has become an international dilemma and also an important issue that needs to be dealt with a diversity of countermeasures based on political, legal, managerial and business techniques [1]. The exact market and trade of counterfeit products is difficult to calculate because it is an illegal trade. It has been reported that counterfeit products' market is continually growing around the world. According to the International Anti-counterfeiting Coalition (IACC) and the International Intellectual Property Institute (IIPi), almost 5% of total products are counterfeit products [2, 3]. Counterfeit products are not only destroying the actual industry but also affects the consumers' health e.g. counterfeit baby food and counterfeit pharmaceutical products damage the health of consumers [4]. Anti-counterfeit group, IACC and IIPi defined counterfeit as a planned strategy to deceive customers by copying well known brands and then marketing these imitation products. Counterfeit

products are those products that are similar to original; but, in real they are fake products and these products are also called replica or copied products [5].

The most popular market of counterfeit products is clothing, watches, shoes, mobile phones and leather goods. Counterfeit market comprises of fashionable and luxury products' replicas and these products are very popular among the community [6]. One-third of people purchase counterfeit products intentionally and , consumer demand is the driver of market that encourages the suppliers to manufacture and supply counterfeit products [7]. Marketers have to struggle to protect their firms' products from counterfeiters and to prevent consumer complicity with fake products. Companies have developed many laws with the help of government institutions against counterfeit products like intellectual property rights and also specify punishments for this illegal practice. It has been argued that consumers are willing to buy counterfeit products despite of its being an illegal act [8].

Most of studies have been conducted relevant to comparability between counterfeit and genuine products, consumer behavior with counterfeit products and on increasing demand of counterfeit products. The studies have been done to determine the measures to control this practice. Most of studies have done on supply of these products; while, few studies discussed the demand aspect of counterfeit products [9]. A limited research has been done on consumer complicity. This study is the replication of an American study “consumer complicity with counterfeit products” conducted by Chaudhry and Stumpf. Previous studies explored consumer complicity with a single product. This study chose counterfeit mobile phones to determine the influence of factors of Chaudhry and Zimmerman’s (2005) [1] study on consumer complicity. No research has been found on consumer complicity regarding mobile phones in general and in Pakistan specifically. This research can help marketers to find out consumer complicity with counterfeit products and what are the reasons behind increasing demands of counterfeit products?

**Research Objectives:** This study aims to examine the impact of factors i.e. hedonic shopping behavior, cultural values of collectivism, perceived quality of product and economic; on consumer behavior, which force consumers to purchase counterfeit products. The increasing demand of counterfeit mobile phones provides the reasons to conduct this research. The objectives of this study are too;

- Find out the factors that create consumers’ complicity during purchase of counterfeit products.
- To know the motives and causes behind purchase of counterfeit products.
- To know the relative impact of factors on consumers’ complicity towards counterfeit products.
- Provide implications to marketers to remove consumers’ complicity about counterfeiter mobile phones which consumers’ have in their minds.

**Literature Review:** Counterfeit is an illegal act and the study is criminological in nature. The Intellectual Property Rights (IPR) and anti-counterfeiting laws exist to curb the manufacturing and sale of counterfeit products. Consumer complicity is the consumer involvement during purchasing of counterfeit products [10]. Companies have

installed latest technologies like Radio Frequency Identification (RFID) to control counterfeit products [11]. The major concern is that counterfeit products are now being sold with original labels and through the proper distribution channels [12]. Moreover, it was argued that the good image of a brand breeds the counterfeit actions [13].

The fashion and luxury products are at a risk of destruction by counterfeit products and consumers’ complicity augment bases for liking of these products [14]. The human psychology of social recognition, materialism and vanity are determinants behind using luxury products [15]. Counterfeit products also affect the health of people in case of fake pharmaceutical products [16]. The consumers’ buying behavior is the reason to purchase counterfeit products [17].

The affect of collectivism on consumer behavior regarding counterfeit products due to shared culture and norms [18]. The concept of “sharing culture” enhances the willingness of consumer to purchase the counterfeit products [19]. People share their products with one another in a shared culture that enhances the willingness and liking of counterfeit products among the society [20]. It is described that collectivism affects consumer behavior of Chinese consumers regarding counterfeit products [21]. And further described that collectivism influences the demand for counterfeit products: countries with high degree of individualism do not violate intellectual property laws instead of collectivism. Collectivistic cultures squeeze the perception of sharing that can favorably influence the consumer complicity.

Consumers are motivated to purchase counterfeit products by engaging with the traders of both types i.e. virtual and physical market [17]. The engagement with retailers influences the consumers’ mood to purchase counterfeit products [22]. The adventurous consumers try different counterfeit products in different moods. Thus, the mood proved to be a favorable determinant that influences the consumers’ complicity [23]. Counterfeit products are the work of fiction and represent sightseer experiences [24]. Consumers purchase in hedonic manners rather than their utilitarian need [25]. The hedonic behavior exhibits that consumers like brand names, logos, tags, color and their self-style i.e. physical vanity and achievement vanity, which impress other people by physical appearance irrespective of low quality [26]. The mood is a favorable determinant that can influence

the consumer behavior and mold the decision making process towards counterfeit products like adventurism, legal or illegal consideration [27].

The good perception regarding counterfeit products reflects the level of consumer agreement with these products. Consumers are ready to purchase counterfeit products, if their prior experience with these products was good [28]. The good quality of fake products and the reasonable prices affect consumers' past experience and perception; which influences their purchase of counterfeit products [29]. Some consumers believe that fake and genuine products are alike in quality, but word-of-mouth marketing of counterfeit products also influences the consumer perception [30]. The good perception regarding counterfeit mobile phones favorably influences the consumer complicity towards counterfeiting [31].

Counterfeit products are available at cheap price in market but they look like original. Fashion and status conscious people can be influenced from this price and affordability factor [32]. Counterfeit products have low prices as compared to original products because of low quality and minimum recurring costs. People with low purchasing power use counterfeit products to show their high social status [33]. Consumers change their intentions towards counterfeit products that are economically affordable and consumers purchase counterfeit products to enhance their social image. Consequently, counterfeit products are economically beneficial for both groups i.e. customers and suppliers [34]. Similarly, some middle-class people cannot afford to purchase original products, but they want a greater social image in society which influences them to purchase counterfeit products. On the other hand, suppliers trade counterfeit products because these products have greater profit margins than original products [35].

### Theoretical Framework

**Research Model:** The concentration of this study is to measure the impact of collectivism, consumer hedonic behavior, product perceived quality and economic factors on buying of counterfeit products. The theoretical model has been adopted from the work of Chaudhry (2011) [17] titled "consumer complicity with counterfeit products". The theoretical model has four independent variables i.e. collectivism, hedonic shopping behavior, perceived quality and economic factor. This study has replaced the variable "*ethics*" [17] with "*economic factor*" adopted from Stumpf (2011) [17].

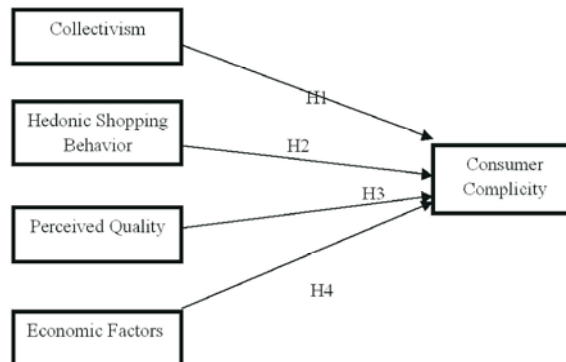


Fig. 1: Research Model

### Research Hypotheses

**H1:** Collectivism is positively related to consumer complicity towards counterfeit mobile phones.

**H2:** Hedonic shopping experience is positively related to consumer complicity regarding counterfeit mobile phones.

**H3:** Perceived quality is positively related to consumer complicity towards counterfeit mobile phones.

**H4:** Economic benefits create a significant positive relationship with consumer complicity towards counterfeit mobile phones.

### Research Methodology

**Data Collection and Analyses:** The study was quantitative in nature and consumers of counterfeit mobile phones were the unit of analysis. The study has used cluster sampling technique to collect data in two cities of Central Punjab, Pakistan i.e. Sahiwal and Okara. Study implied self-administered questionnaire comprised of all constructs, based on five-point likert scale to collect data. The questionnaire also included questions regarding demographics of respondents i.e. age, income, qualification and occupation. Three hundred respondents were targeted on random basis, out of which 226 (75%) respondents returned the completed questionnaires. Data were collected from the people who were using replica products or they had any past experience regarding counterfeit products. For analyses purposes, descriptive statistics, reliability statistics (Cronbach Alpha), correlation and regression analyses were used.

## Findings

**Demographics of Respondents:** The age of respondents was segregated into 4 categories i.e. 21-30 years, 31-40 years, 41-50 and above 50 years. The major groups which represent the respondents were students, businessmen and job holders of the two cities. Respondents of first category (21-30) had 67% representation in overall responses and respondents of second category (31-40) represented 25% of respondents. Five percent questionnaires were filled by 41-50 years old people and only 3% were filled by people of above 50 years. Male respondents were dominant (72%) as compared to female respondents (28%). Fifty nine percent respondents were undergraduates, while 21% had a master's degree. The remaining part of respondents fell in other categories of qualification i.e. matriculation and intermediate, while, some respondents were illiterate. The job holders represented a percentage of 55%, businessmen 20% and students were 25% in total respondents.

Students with high qualifications did not demonstrate attention towards counterfeit mobiles. They also expressed their disliking towards other counterfeit products as well. On the other hand, low qualification holders and illiterate young people showed their positive attitude and intention towards purchase of replica mobiles. Job holders also had indulgent views for counterfeit mobile phones. The respondents with low income chose imitated products for their consumption.

The respondents believed that the laws should be developed and initiated by government to protect the original products and stop the trade of counterfeit mobile phones.

**Reliability Analysis:** The reliability analysis showed consistency in the data collected and reliability of the instrument. Constructs of collectivism and hedonic shopping behavior determinants had cronbach's alpha value of " $\alpha=0.71$ " and " $\alpha=.82$ " respectively. The construct of perceived quality had value of 0.92, economic benefits 0.86 and 0.61 for consumer complicity. As all reliability values are acceptable values, therefore the instrument is also deemed to be reliable.

**Correlation Analysis:** Results revealed that the constructs have a strong correlation with significant relationships with each other. Collectivism has positive and significant relationship with other variables i.e. hedonic shopping with " $r=.614^{**}$ ", perceived quality " $r=.604^{***}$ ", economic factors/benefits " $r=.646^{***}$ " and consumer complicity with " $r=.687^{***}$ ". Hedonic shopping also has positive and significant relationship with collectivism ( $r=.614^{**}$ ), perceived quality ( $r=.616^{**}$ ), economic benefits ( $r=.651^{**}$ ) and consumer complicity ( $r=.568^{**}$ ). Perceived quality has a moderate and positive relationship with collectivism ( $r=.604^{**}$ ), hedonic shopping ( $r=.616^{**}$ ), economic benefits/factors ( $r=.761^{**}$ )

Table 1: Correlations Matrix

		Correlations				
		Collectivism	Hedonic Shopping	Perceived Quality	Economic Benefit	Consumer Complicity
Collectivism	Pearson Correlation	1	.614**	.604**	.646**	.687**
	Sig. (2-tailed)		.000	.000	.000	.000
	N	226	226	226	226	226
Hedonic shopping	Pearson Correlation	.614**	1	.616**	.651**	.568**
	Sig. (2-tailed)	.000		.000	.000	.000
	N	226	226	226	226	226
Perceived Quality	Pearson Correlation	.604**	.616**	1	.761**	.679**
	Sig. (2-tailed)	.000	.000		.000	.000
	N	226	226	226	226	226
Economic Benefit	Pearson Correlation	.646**	.651**	.761**	1	.682**
	Sig. (2-tailed)	.000	.000	.000		.000
	N	226	226	226	226	226
Consumer Complicity	Pearson Correlation	.687**	.568**	.679**	.682**	1
	Sig. (2-tailed)	.000	.000	.000	.000	
	N	226	226	226	226	226

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

Table 2: Model Summary

Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.783 <sup>a</sup>	.614	.608	.40660

a. Predictors: (Constant), Economic benefit, Collectivism, Hedonic shopping, Perceived quality

Table 3: ANOVA Statistics

ANOVA <sup>b</sup>						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	70.339	4	17.585	106.365	.000 <sup>a</sup>
	Residual	44.307	268	.165		
	Total	114.647	272			

a. Predictors: (Constant), Economic benefit, Collectivism, Hedonic shopping, Perceived quality

b. Dependent Variable: consumer complicity

Table 4: Coefficients of Correlation

Coefficients <sup>a</sup>						
		Unstandardized Coefficients		Standardized Coefficients		
Model		β	Std. Error	Beta	t	Sig.
1	(Constant)	.724	.166		4.368	.000
	Collectivism	.396	.051	.396	7.381	.000
	Hedonic shopping	.004	.054	.004	.080	.936
	Perceived quality	.273	.050	.273	4.580	.000
	economic benefit	.244	.071	.220	3.413	.001

a. Dependent Variable: consumer complicity

and consumer complicity ( $r=.679^{**}$ ). Economic factors and collectivism are moderately correlated ( $r=.646^{**}$ ). Similarly, economic factors have positive effect on hedonic shopping ( $r=.651^{**}$ ), perceived quality ( $r=.761^{**}$ ) and consumer complicity ( $r=.682^{**}$ ). Consumer complicity showed a significant and positive relationship with collectivism ( $r=.687^{**}$ ), hedonic shopping ( $r=.568^{**}$ ), perceived quality ( $r=.679^{**}$ ) and economic benefits ( $r=.682^{**}$ ).

**Regression Analysis:** The study has used regression analysis to determine the predictive power of the four factors i.e. collectivism, hedonic shopping behavior, perceived quality and economic benefits on consumer complicity. Table 2 shows that the value of adjusted R-square explained the .608 variation in consumer complicity because of collectivism, hedonic shopping, perceived quality and economic benefits. These figures strongly support the relationship of variables. The ANOVA Statistics ( $F=106.365$ ,  $p=.000$ ) designate the fitness of model.

The obtained results confirm all of hypotheses except that of hedonic shopping. The results indicate that collectivism has a positive significance relationship ( $\beta=.396$ ,  $t=7.381$ ,  $p<.01$ ) with consumer complicity, which facilitates the acceptance of H1. While, hedonic shopping did not show any impact on consumer complicity ( $\beta=.004$ ,  $t=.080$ ,  $p=.936$ ) and H2 therefore is rejected. Perceived quality showed a positive relationship with consumer complicity ( $r=.679^{**}$ ,  $p=.000$ ). Perceived quality has a moderate positive impact ( $\beta=.273$ ,  $t=4.580$ ,  $p<.01$ ) therefore H3 is accepted; and, consumer complicity has been affected positively by economic factors ( $\beta=.220$ ,  $t=3.413$ ,  $p<.01$ ) which also confirms H4.

## DISCUSSION

It can be concluded that Pakistani consumers are interested in the purchase of counterfeit products, especially mobile phones. The shared culture of collectivism and perceived quality of phones has been proved important for Pakistani people.

Pakistani consumers have not been influenced by hedonic shopping patterns. They think themselves as achievers in case of internal satisfaction (achievement vanity) and outer appearance (physical vanity) and , emphasized on the possession of goods and materialistic values. The cultural and social values of Pakistanis have been changed. The study showed the two diverse views of people i.e. they preferred to purchase counterfeit mobile phones, but they also support the formation of laws to impede the business of duplicate products.

The country's economic situation is feeding the trade of these products. The low purchasing power of Pakistanis and high inflation rates encourage them to consume the replica products. It has also been observed that teenagers with low pocket money attempted to buy imitation mobile phones and they act as a big market for these products. Some youngsters intentionally demand copies of branded mobile phones to just show off to other people. People also suffered from a fraudulent activity of sale of counterfeit products instead of original ones. Companies should develop some measures and codes to recognize the difference between replica and original products.

## CONCLUSION

The confined area and small sample size can impose limitations on the generalizability of the results of this study. Furthermore, this study has focused on mobile phones; while, there were other major products which have been ignored which could be targeted for future studies. The research model used in this research was taken from a previous study, but, future studies may explore and test new determinants / factors.

## REFERENCES

1. Chaudhry, P., V. Cordell and A. Zimmerman, 2005. Modeling anti-counterfeiting strategies in response to protecting intellectual property rights in a global environment. *Marketing Review*, 5(1): 59-72.
2. International Anti-counterfeiting Coalition, 2005. Facts on fakes. Online Available at: <[www.iacc.org/Facts.html](http://www.iacc.org/Facts.html)> Accessed June 30 2013.
3. International Intellectual Property Institute, 2003. Counterfeit goods and the public's health and safety. Online Available at: <[www.iacc.org/IIPi.pdf](http://www.iacc.org/IIPi.pdf)> Accessed June 30 2013].
4. Gentry, J.W., S. Putrevu and C. Shultz, 2006. The Effects of Counterfeiting on Consumer Search. *Journal of Consumer Behaviour*, 5: 1-12.
5. Moez, L., M. Khalifa and W. Chin, 2004. Factors affecting software piracy: A longitudinal study. *IEEE Transaction on Engineering Management*, 51(4): 414-425.
6. Peattie, K. and S. Peattie, 2009. Social marketing aathway to consumption reduction. *Journal of Business Research*, 62(2): 260-8.
7. Yoo, B. and S.H. Lee, 2006. Buy Genuine Luxury Fashion Products or Counterfeits? *Advances in Consumer Research*, 36: 280-286.
8. Paul, R.P., 1999. Trademark Counterfeiting, Product Piracy and the Billion Dollar Threat to the US Economy, 1, US: Greenwood Publishing Group.
9. Penz, E. and B. Stöttinger, 2008. Corporate image and product similarity-assessing major demand drivers for counterfeits in multi-country study. *Psychology and Marketing*, 25(4): 352-81.
10. Bloch, P.H., R.F. Bush and L. Campbell, 1993. Consumer Accomplices in Product Counterfeiting: A Demand side Investigation. *Journal of Consumer Marketing*, 10(4): 27-36.
11. Commur, I.S., 2009. The impact of counterfeiting on genuine-item consumer s' brand relationships. *Journal of marketing*, 73: 86-98.
12. Cronan, T.P. and S. Al-Rafee, 2008. Factors that Influence the Intention to Pirate Software and Media. *Journal of Business Ethics*, 78: 527-45.
13. Maldonado, C. and E.C. Hume, 2005. Attitudes toward Counterfeit Products. *Journal of Legal, Ethical and Regulatory Issues*, 8: 105-115.
14. Hoe, L., G. Hogg and S. Hart, 2003. Fakin' it: Counterfeiting and Consumer Contradictions. *European Advances in Consumer Research*, 6: 60-67.
15. Park, H.J., N.J. Rabolt and K.S. Jeon, 2008. Purchasing foreign luxury brands among young Korean consumers. *Journal of Fashion Marketing and Management*, 12(2): 244-259.
16. Vida, D.R., 2006. Determinants of Consumer Willingness. Slovenia: University of Ljubljana, pp: 253-270.
17. Chaudhry, P.E. and S.A. Stumpf, 2011. Consumer complicity with counterfeit products. *Journal of Consumer Marketing*, 28: 139-151.
18. Holbrook, M.B. and E.C. Hirschman, 1982b. Hedonic consumptions: Emerging concepts, methods and propositions. *Journal of Marketing*, 46: 92-101.
19. Hofstede, G., 1984. Culture's Consequences: International Differences in work-related Values. Beverly Hills. CA: Sage Publications.

20. Gupta, P.B., J.G. Stephen and B. Pola, 2004. To Pirate or Not to Pirate: A Comparative Study of the Ethical Versus Other Influences on the Consumer's Software Acquisition-Mode Decision. *Journal of Business Ethics*, 55: 255-274.
21. Husted, B.W., 2000. The Impact of National Culture on Software Piracy. *Journal of Business Ethics*, 26: 197-211.
22. Cui, C., V. Mitchell, B. Schlegelmilch and B. Cornwell, 2005. Measuring consumers' ethical position in Austria, Britain, Brunei, Hong Kong and USA. *Journal of Business Ethics*, 62(1): 57-71.
23. Faria, A.A., 2013. Consumer Attitudes Towards Counterfeit Goods: The Case of Canadian and Chinese Consumers. Master of Science in Marketing and Consumer Studies. The University of Guelph.
24. Shoham, A., A. Ruvio and M. Davidow, 2008. Unethical consumer behavior: Robin Hoods or plain hoods? *Journal of Consumer Marketing*, 24(4): 200-10.
25. Sarkar, A., 2011. Impact of Utilitarian and Hedonic Shopping Values on Individual's Perceived Benefits and Risks in Online Shopping. *International Management Review*, 7(1): 58-65.
26. Goles, T., B. Jayatilaka, B. George, L. Parsons, V. Chambers, D. Taylor and R. Brune, 2008. Exploring determinants of attitude. *Journal of Business Ethics*, 77: 481-99.
27. Matos, C.A., C.T. Ituassu and C.A.V. Rossi, 2007. Consumer attitudes toward counterfeits: a review and extension. *Journal of Consumer Marketing*, 24(1): 36-47.
28. Staake, T., F.D. Thiesse and F. Elgar, 2009. The emergence of counterfeit. *European Journal of Marketing*, 43(3): 320-349.
29. Singh, J.J., S.J. Vitell, J. Al-Khatib and I. Clark, 2007. The role of moral intensity and personal moral philosophies in the ethical decision making of marketers: a cross-cultural comparison of China and United States. *Journal of International Marketing*, 15(2): 86-112.
30. Steenhaut, S. and P. Van Kenhove, 2006. An empirical investigation of the relationships among a consumer's personal values, ethical ideology and ethical beliefs. *Journal of Business Ethics*, 64(2): 137-55.
31. Babin, B.J., W.R. Darden and M. Griffin, 1994. Work and/or fun: Measuring hedonic and utilitarian shopping value. *Journal of Consumer Research*, 20(4): 644-656.
32. Cheung, W.L. and G. Prendergast, 2006. Buyers' Perceptions of Pirated Products in China. *Marketing Intelligence and Planning*, 24(5): 446-62.
33. Xu, Y., 2008. The influence of public self-consciousness and materialism on young consumers' compulsive buying. *Young Consumers*, 9(1): 37-48.
34. Vitell, S.J., A. Singhapakdi and J. Thomas, 2001. Consumer ethics: an application and empirical testing of the Hunt-Vitell theory of ethics. *Journal of Consumer marketing*, 18(2): 153-78.
35. Tan, B., 2002. Understanding consumer ethical decision making with respect to purchase of pirated software. *Journal of Consumer Marketing*, 19(2/3): 96-110.