

Ahenkora, Kwaku; Adarkwa, Fosu

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Kontakt/Contact

ZBW – Leibniz-Informationszentrum Wirtschaft/Leibniz Information Centre for Economics
Düsternbrooker Weg 120
24105 Kiel (Germany)
E-Mail: [rights\[at\]zbw.eu](mailto:rights[at]zbw.eu)
<https://www.zbw.eu/>

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Local Consumers' Purchase Intention toward Ghanaian Chocolate Brand

Kwaku AHENKORA* and Fosu ADARKWA

Christian Service University College, Ghana

This study applied the theory of planned behaviour to predict intentions to purchase locally manufactured Ghanaian Golden Tree chocolate brand, as very little research attention has been paid to consumption of chocolate in cocoa producing countries. A random sample of 257 working and non-working University students responded to self-administered questionnaires. A structural model was developed based on intention, attitude, subjective norm and perceived behavioural control, and multiple regression analysis carried out to test the model's ability to predict purchasing intention. There was low consumer intention to purchase the local chocolate brand. Attitude, subjective norm and perceived behavioural control collectively explained 55.5 percent of the variance in intention to purchase chocolate, and attitude was the strongest and significant predictor of intention to purchase. The study fills a gap in our understanding of chocolate purchasing behaviour of local consumers in a cocoa producing country and highlights the role of attitude in purchasing intentions. Future explanatory models based on an extended theory of planned behaviour may include factors such as self-identity, affective and moral attitudes to provide further insights. The study has implications for the purchase and consumption of local chocolate brands and the subsequent retention of value in the cocoa producing country. An attitudinal change would be critical to a market-oriented strategy and policy intervention to increase the purchase of Ghanaian chocolate brands at home.

Keywords: *theory of planned behaviour, purchase intentions, Ghana chocolates, market-oriented strategy, chocolate consumption, Golden Tree chocolate*

JEL Classification: *M31, M38*

1. Introduction

Ghana is among the Alliance of Cocoa Producing Countries (COPA) countries that produce and export 75% of the world's cocoa (ICCO, 2013). Raw cocoa beans dominate Africa's export market with very little value addition. Cocoa is the most important economic crop in Ghana, and the sector is a source of employment for about two million people who are engaged in different activities in the cocoa value chain (Oppong, 2016). The history of the crop in the political economy of Ghana dates back to 1815, and Tetteh Quarshie harnessed its economic potential when he brought the Amelonado cocoa bean from Fernando Po into the country in 1876

* Corresponding Author:

Kwaku Ahenkora, Christian Service University College, Kumasi, Ghana

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and established a plantation. Subsequently, Ghana made great strides in producing the crop and was previously the leading world producer of cocoa. Ghana exports 67.6% of its cocoa mainly to Western Europe (Netherlands, UK, Belgium and Germany), 7.2% to Japan and 3.3% to the US. Small farmers are the key players in cocoa production, and the crop contributes significantly to their income. However, they bear the brunt of the costs of production due to falling prices in the world market. In addition to price volatility which also affects small and medium size companies and their ability to secure long-term contracts, there are other challenges in the industry such as poor infrastructure, limited access for processed exports due to trade barriers and low consumption in cocoa producing countries.

Cocoa consumption in Africa in 2014 accounted for 4% of global consumption but is expected to benefit from increase in average household income and a rising middle class (Pipitone, 2015). Africa's cocoa economy must have a fair share of the value of the global value chain by increasing upstream activities such as processing, manufacturing, and consumption of cocoa products. The share of value for leading cocoa producing countries in West Africa through downstream raw cocoa bean exports has declined in real terms, but the value of manufacturing and retail activities in the global market continues to increase (Abdulsamad, 2015). Efforts to increase cocoa products consumption in Africa are of extreme importance.

Chocolate is one of the most important manufactured products from cocoa and is the mainstay of the industry as it is popular and widely consumed around the world. The global chocolate market was worth 98.3 billion USD in 2016, and the total world consumption of retail chocolate confectionery is forecasted to increase 2.0% annually with the average European and US-American consuming 5.2 kilograms of chocolate each year (Sommeregger and Wildenberg, 2016). Within the last half-decade Africa's consumption of cocoa products increased by 1% but the millions of farmers who produce the raw cocoa beans account for only 6.6% of the share in the global cocoa-chocolate value chain while chocolate manufacturers and retailers, most of whom are companies from North America and Europe, have captured 87% of the value (ICCO, 2015). Although chocolate consumption is increasing across the globe and the value of the industry is growing, little attention is paid to consumption and value retained by producer countries. Ghana produces cocoa and also manufactures chocolate that is sold both in the domestic and the international market.

The effort to process cocoa dates back to the 1960s when the West Africa Mills Company (WAMCO) was established and it processed cocoa beans into paste, butter and other cocoa products. The major companies that currently process cocoa into primary or secondary products include the Cocoa Processing Company (CPC), Barry Callebaut, Cargill and Archer Daniels Midland (ADM). The primary products from cocoa are cocoa beans, butter and nibs while secondary products include chocolate and cocoa-based confectioneries. Until quite recently when Niche Chocolate brand entered the market, Golden Tree by Cocoa Processing Company Ltd was the only locally manufactured chocolate brand. The country captures 20 % of the \$9 billion global cocoa bean market, and 5 % of the \$28 billion global intermediate cocoa processing industry market (Mulangu et al., 2015). It captures very little of the \$98.3 billion chocolate manufacturing and retail market where several of the global chocolate brands generate over US\$1 billion annual revenue (Abdulsamad, 2015). Market success is important for value chain efficiencies. Cocoa-producing countries in West Africa have been urged to move up the value chain when it is economically advantageous (Ehui, 2015). Ghana's cocoa policy, therefore, aims at ensuring local processing of at least 50% of the cocoa beans produced.

A market-oriented strategy is required to enhance the country's ability to capture upstream value, starting with local consumers. Ghana's per capita chocolate consumption, estimated at just over 0.5 kg per annum, is very low (Akalaare, 2017). Essegbey and Ofori-Gyamfi (2012) suggested the need for a strong policy intervention to promote local consumption of cocoa products, including the distribution of chocolate to school children, to develop consumption intentions and habits in the next generation of Ghanaians. Local consumption is as important as local production as this will make a vital contribution to the local retail market, where there is need to realize more value.

Consumption intention is the personal action towards a brand, and the perceived likelihood of consuming a product which is influenced by demographic factors (gender, age, profession and education), country of origin, product features and perception of consumers (Daneshvary and Schwer, 2000; Park, 2002; Lu, 2007; Wang et al., 2012). In view of this, the obvious question then is: What factors influence local consumers when making purchasing decisions with regards to local chocolate brands? There is no empirical evidence on local consumers' purchase intentions toward chocolate (confectionary) brands from cocoa producing countries. This study fills the gap. Specifically, it applies the theory of planned behaviour to predict intentions to purchase locally manufactured Ghanaian Golden Tree chocolate brand. Knowledge from this study will inform the retail, marketing and policy intervention processes as consumer beliefs, attitudes and intentions affect marketing strategies.

2. Literature and Theoretical Review

A theoretical perspective to understanding the behaviour of consumers provides a means of testing propositions and causal models of the behaviour, thus ultimately facilitating the design of effective interventions to modify the behaviour. In this regard, expectancy-value models such as the theory of planned behaviour (TPB) have been developed to understand and successfully predict human behaviour in different settings (Arvola et al., 2008). It has been used extensively in studies on consumer behaviour, food choice, food consumption, and intentions to purchase food products (Beale and Manstead, 1991; Sparks and Shepherd, 1992; Lloyd et al. 1993; Conner and Sparks, 1995; Arvola et al., 2008; Alam, 2011; Kothe et al., 2012; Yazdanpanah and Forouzanni, 2015; Gakobo and Jere, 2016). Meta-analysis studies have substantiated its ability to predict purchase intentions, and it explains between 37-50 percent of the variance in intentions and accounts for 19-38 percent of the variance in behaviour (Thompson et al., 1994).

The ability to predict purchasing intentions is necessary to understand chocolate confectionery consumption in cocoa producing countries and the use of the TPB was very appropriate for this study. A person shows his or her intention through commitment, plan or decision to undertake an activity (Eagly and Chaiken, 1993). When applied to a specific behaviour the TPB states that motivational intention considerably determines motivational behaviour, and the antecedents of intention are attitude, subjective norm and perceived behavioural control (Ajzen, 1991). Attitude refers to an individual's beliefs about whether the outcome of the behaviour is favourable or not (Ajzen, 1991, Fishbein and Ajzen, 2010).

The people who are part of an individual's cycle of influence contribute to behavioural intentions. Subjective norm is the extent to which an individual's beliefs accommodate the approval or disapproval of significant others (Ajzen, 1991, Fishbein and Ajzen, 2010). Also, people do things which they believe are under their control and therefore, perceived behavioural control influences intention. It shows that an individual has the opportunity and the resources required to engage in that behaviour.

2.1. Research Premises

The use of the TPB in food purchasing has shown that the predictor variables attitude, subjective norm and perceived behavioural control have different but considerable shares of variances in intentions ((Arvola et al., 2008; Alam, 2011; Yazdanpanah and Forouzanni, 2015). In applying the TPB to chocolate purchasing, a good model is expected and, therefore, the implicit postulation is that attitude, perceived behavioural control and subjective norm will have positive relationships with intention to purchase chocolate. Chocolate purchasing attitude refers to the favourable or unfavourable disposition towards purchasing local Ghanaian chocolate brands. Giving the low per capita consumption of chocolate we expect attitude to play an influential role in chocolate purchasing intentions, and it was hypothesized that chocolate purchasing attitude has a positive influence on intentions to purchase local chocolate brands. Chocolate purchasing subjective norm refers to the expectations of important others on purchasing chocolate. Chocolate is a confectionary, and the socio-cultural context provides the basis for affirmation or disaffirmation of purchase intentions. Therefore, it was hypothesized that chocolate purchasing subjective norm has a positive influence on intentions to purchase local chocolate brands. In relation to chocolate purchasing behaviour, perceived behavioural control refers to the ease, controllability, and capability of purchasing local chocolate brands. Whether people buy local chocolate brands or not would depend on the perceived power of purchasing. It was hypothesized that perceived behavioural control over purchasing would positively influence chocolate purchasing intentions. The relative importance of the three independent variables attitude, subjective norm and perceived behavioural control in predicting chocolate purchasing intentions is expected to vary. The hypotheses are provided below:

H1. Purchasing attitude has a positive influence on intentions to purchase local chocolate brand

H2. Subjective norm positively affects intentions to purchase local chocolate brand

H3. Perceived behavioural control has a positive influence on intentions to purchase local chocolate brand

3. Method

The theory of planned behaviour provided the constructs for chocolate purchasing intention and, therefore, the survey statements contained in the questionnaire were adapted from previous scales in the literature (Ajzen, 2002; Arvola et al., 2008; Yazdanpanah and Forouzani, 2015). A five-point Likert scale was employed where 1= strongly disagree, 2= disagree, 3= neutral, 4= agree, 5= strongly agree. The validity of the questionnaires was tested with lecturers of the departments and then with students. Students who are typical consumers of chocolate took part in the study. Primary data were obtained from students from the nursing and

business departments of the Christian Service University College. The nursing students attend lectures on weekdays (morning and evening) while the business students attend lectures either on weekdays or weekends. Both departments had some students who were in full-time work. The weekend session includes mostly full-time workers. Final year students studying for a 4-year degree programme in the departments were chosen (a population of 500), and 270 questionnaires were administered during five class sessions in the first week of February, 2016. Although the questions had sought views on chocolate purchasing behaviour within the month, and when Valentine's Day is celebrated on the 14th of the month chocolate is a popular 'treat,' no attempt was made to link the study to the day. Participants were informed that the study was seeking information on buying behaviour with regards to Ghanaian Golden Tree chocolates. Participants filled in the questionnaires which were collected upon completion. Two hundred and fifty-seven questionnaires were used for the study after discarding those that were not properly filled in. The details of the final sample are provided in the results section. Structural equation modelling and multiple regressions were employed to test the hypotheses concerning the relationship between chocolate purchasing intention and attitude, subjective norm and perceived behavioural control.

4. Analysis and Results

4.1. Descriptive Statistics

The Cronbach alpha coefficients (Table 1) were all greater than 0.80 and showed the reliability of the measurement scales (Nunnally, 1978). Descriptive statistics were used to assess the normality of the data and the presence of outliers, measures of skewness and kurtosis. Collinearity statistics were used to diagnose the collinearity of the data. Tolerance values for all three variables (TV >0.700) were greater than 0.1 and, therefore, were acceptable. The VIF values for the three variables (VIF ≤ 1.42) were less than 10 and further indicated that the relationships among the three predictor variables do not raise concerns (Myers, 1990).

Table 1. Measuring statements and construct reliability

Construct/ variables	Statements	α Cronbach coefficient
Intention	I intend to buy chocolate within the month	0.882
	I plan to buy chocolate within the month	
	I am ready to buy chocolate within the month	
	I will try to buy chocolate within the month	
Attitude	For me, buying chocolate within the month is a good thing	0.847
	For me, buying chocolate within the month is desirable	
	For me, buying chocolate within the month will be satisfying	
	Among various options, I will buy chocolate within the month	
Subjective Norm	My family and friends think it is all right if I buy chocolate within the month	0.865
	Most of my family and friends would buy chocolate within the month	
	A family member or friend will buy chocolate for me within the month	
Perceived Behavioural Control	For me, buying chocolate within the month will be easy	0.886
	I have money to buy chocolate within the month	
	Buying more chocolate within the month is under my control	
	If I wanted to, I could buy chocolate within the month	

The characteristics of participants regarding gender, age and employment status are shown in Table 2. There were more females than males. Forty-five percent of participants were under 25 years old, and 12% were 35 years and above. There were more participants in full-time employment than the unemployed.

Tables 3 and 4 summarise the mean values obtained for the 4 variables of the TPB and additional values based on gender and employment. Out of 5, the mean values of attitude, perceived behavioural control (PBC), subjective norm and intention are relatively low (Table 3). The mean value for PBC, however, was higher than the values for the other variables. Differences were observed in the mean values of the TPB variables for male and female and for the employed and unemployed, but they were not significant.

The low values obtained suggest that chocolate purchasing intention and its antecedents may be contributing to the low consumption of chocolate among Ghanaian consumers. However, chocolate purchasing intention is not affected by gender or employment status.

Table 2. Demographic profile of respondents

Item	Frequency	Percent
<i>Gender</i>		
Male	122	48
Female	134	52
<i>Age</i>		
18-24	115	45
25-34	111	43
35-44	22	9
45 years and above	8	3
<i>Employment Status</i>		
Employed	146	57
Unemployed	110	43

Table 3. Gender and comparison of means of attitude, subjective norm, PBC and intention to purchase chocolate

Variables	Mean	Sd.	Male		Female	
			Mean	Sd.	Mean	Sd.
Attitude	2.66	1.01	2.63	0.96	2.70	1.06
Subjective norm	2.73	0.96	2.74	0.99	2.74	0.94
PBC	3.22	1.02	3.19	1.01	3.26	1.03
Intention to purchase	2.53	1.07	2.51	1.06	2.55	1.09

Table 4. Employment and comparison of means of attitude, subjective norm, PBC and intention to purchase chocolate

Variables	Mean	Sd.	Employed		Unemployed	
			Mean	Sd.	Mean	Sd.
Attitude	2.66	1.01	2.72	1.01	2.58	1.01
Subjective norm	2.73	0.96	2.68	0.95	2.80	0.98
PBC	3.22	1.02	3.27	1.00	3.16	1.05
Intention to purchase	2.53	1.07	2.60	1.02	2.40	1.13

Note: Sd. = standard deviation

4.2. Structural Equation Modelling and Intention to Purchase Chocolate

The underlying construct and hypothesis of the theory of planned behaviour were tested using structural equation modelling (Lisrel 8.5). The components of the measurement model were initially assessed to ensure they were unidimensional. The assessment of the measurement model, therefore, included confirmatory factor analysis, reliability and validity tests. Model fit statistics were used to test the structural model, and the values obtained are within the accepted thresholds. The Chi-square test is significant ($\chi^2=146.54$, $p = 0.0000$). The ratio of chi-square/degrees of freedom (λ/df) is 1.74, and normally a value above 2 is indicative of an acceptable fit (Coate et al., 2001). The root mean square error of approximation (RMSEA = 0.062), adjusted goodness-of-fit index (AGFI = 0.90), normed fit index (NFI = 0.94), comparative fit index (CFI = 0.97) indicate acceptable goodness of fit (Bagozzi and Yi, 2012; Diamantopoulos and Siguaw, 2000). The fit statistics support criterion validity and the explanatory power of the TPB.

Table 5. Model Fit Indices

Model fit indices	Results	Recommended value
Chi-square/degrees of freedom	$\lambda/df = 1.74$	$\lambda/df \geq 2$
Goodness-of-fit index	GFI= 0.93	GFI ≥ 0.8
Adjusted goodness of fit index	AGFI= 0.90	AGFI ≥ 0.8
Comparative fit index	CFI=0.97	CFI ≥ 0.8
Root mean square error of approximation	RMSEA=0.062	0.05-0.08

4.3. Relationship between Variables

The relationship between the variables showed statistically significant positive relationships between the predictor variables attitude, subjective norm and perceived behavioural control, and purchasing intention, indicating that the constructs correlated in the expected direction (Table 6). However, purchasing intention showed a strong correlation with attitude ($r=0.745$, $p < 0.01$) but had moderate correlation with subjective norm ($r=0.323$, $p < 0.01$) and perceived behavioural control ($r=0.372$, $p < 0.01$), when interpreted within Cohen's (1988) suggestion that correlation or effect size may be weak ($r=0.10$), moderate ($r=0.30$) or strong

($r=0.50$). The results support the study's hypotheses. The total variance explained by the TPB model as a whole was 55.6%, $F(3,253) = 105.45$, $p < 0.001$. Attitude ($\beta 0.735$, $p < 0.001$) had a significant positive relationship with intention to purchase local chocolate but paths from subjective norm ($\beta 0.004$ $p < 0.938$) and perceived behavioural control ($\beta 0.019$, $p < 0.706$) to purchasing intention were not significant (Table 7).

Table 6. Pearson correlation matrix of the constructs

Variable	1	2	3	4
Attitude	1			
Subjective Norm	0.424**	1		
PBC	0.479**	0.429**	1	
Purchasing Intention	0.745**	0.323**	0.372**	1

Note: **Correlation is significant at the 0.01 level (two-tailed)

Table 7. Regression coefficients for the TPB predictor constructs

TPB Construct	β estimate	SE	t-statistic	P
Attitude	0.735	0.053	14.79	0.001
Subjective norm	0.004	0.054	0.078	0.938
Perceived behavioural control	0.019	0.052	0.378	0.706

5. Discussion and Conclusion

The study assessed the application of the theory of planned behaviour in predicting the intention to purchase local chocolate brands. The results showed the lack of predictive power of subjective norm and perceived behavioural control in the construct, but attitude is the most influential factor in consumers' intention to purchase local chocolate brands. The low mean values for both attitude and intention support the evidence. It is surprising, however, that subjective norm and perceived behavioural control showed very little influence as the local perception is that affordability is a major factor contributing to the low consumption of locally manufactured Ghanaian chocolate brands (Akalaare, 2017). Previous findings suggest that people demonstrate purchasing behaviours that are usually under attitudinal or normative control (Petra, 2001; Lee et al., 1997). The use of structural equation modelling to understand food purchasing behaviour has also provided evidence in some instances of the inability of subjective norm and perceived behavioural control in predicting intention to purchase some foods (Bamberg and Moser, 2007; Yazdanpanah and Forouzani, 2015; Dean et al., 2008).

The results have implication for value addition in the cocoa industry as local consumption of chocolate is a vital component of the value chain. It reinforces the need for interventions in promoting the purchase and consumption of chocolates as Ghana embarks on a strategy to increase its value addition and widen market access (Essegbey and Ofori-Gyamfi, 2012). The socio-psychological perspective provided by the TPB indicates that social attitudes that contribute to low purchase intentions should be part of the strategic framework for addressing market challenges in the cocoa- chocolate value chain. Considering the purchasing behaviour of local consumers, a market-oriented approach by local manufacturers would provide them with the means to implement the marketing concept in the local chocolate market (Kohli and Jaworski, 1990). Market orientation requires firms to have a proactive orientation towards customers, competitors and other external factors, thus enabling firms to generate and respond to market information and contributing to strategic direction and firm performance (Kohli and Jaworski, 1990; Cano et al., 2004; Kirca et al., 2005; Al-Ansaari et al., 2015). Knowledge of the role of attitude and behavioural intention of consumers in the local chocolate market, provided by this study, should inform the branding and marketing strategies of local manufacturers when competing for a share of the two-thirds of the value in the cocoa-chocolate global value chain.

By using the TPB and modelling chocolate purchasing behaviour as a function of the internal characteristics of the individual's attitudes, values and norms, the study provides answer to the critical question: what factors influence the intentions of local consumers to purchase local chocolate brands? The results revealed that attitude is the major internal factor that influences the low intention to purchase or consume chocolate products. It lends support to the need for policy intervention and the promotion of consumption among school children and young people who are the chocolate consumers of the future, and offers the possibility of reversing the attitudinal trend. When young people are at the end stage of developing their personal identities, beliefs and value systems, they are likely to take their habits with them into adulthood, and this should provide policymakers the opportunity to facilitate changes in intentions to purchase and /or consume chocolates (Yazdanpanah and Forouzani, 2015). Another potential advantage with this targeted

intervention is that among the young people are the 'middle-class' of the future who will wield consumer spending power, and who are likely to influence the purchasing habits of their families.

5.1 Limitations and Recommendations

A possible drawback to the study may be the use of students as respondents. In this case, however, there were both young adults and adult working-students whose views are typical of the rising middle class who are contributing to the rise in chocolate consumption in other emerging economies. The lack of the predictive power of subjective norm and perceived behavioural control of the TPB, suggests the need to look for further variables that can improve the predictive power. In addition to attitude, self-identity and moral norms are known to improve the predictive power of the TPB when the contributions of subjective norm and perceived behavioural control are insignificant (Yazdapannah and Forouzani, 2015). Self-concept is also known to influence brand choice and consumption behaviour (Lau and Phau, 2007; Kumar et al., 2008). Future studies should explore the effects of these additional variables on chocolate purchasing intention. Although the TPB helped to explain the influence of attitude in chocolate purchasing intention, as a general theory, it is successful in predicting behaviour (Watson et al., 2014); but it does not specify the beliefs underlying any particular behaviour and leaves that responsibility for the researcher (George, 2004). What drives the attitudinal beliefs of consumers toward the purchase of local chocolate brands should be examined, and a mixed method approach may be useful in such a study. The qualitative perspective would provide the antecedents of the attitudinal beliefs that must be explored in the TPB model.

The challenge for policy and programme design in the area of chocolate consumption is the development of effective interventions informed by theory. As has been done with fruit and vegetable consumption, the TPB may be used as the framework for experimental test to address the issue of low consumption and to model behavioural change with determinants that are likely to change with psychosocial interventions (Kothe et al., 2012).

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