

## Generation Y Students' Product Colour Preferences

**Re-an Müller**

North-West University  
Email: Peet.Viljoen@nwu.ac.za

**Ayesha Lian Bevan-Dye**

North-West University  
Email: ayeshabevandye@gmail.com

**Willem Peet Viljoen**

North-West University  
Email: Peet.Viljoen@nwu.ac.za

Doi:10.5901/mjss.2014.v5n21p69

### **Abstract**

*This study reports on the colour preferences of 409 Generation Y students from two higher education institution campuses located in South Africa's Gauteng province for certain consumer products. The preferences were indicated using a self-administered questionnaire. These respondents aged 18 - 24 years claimed that blue as their favourite colour. In addition, the respondents indicated having a strong preference for consumer products coloured black. These findings, the first of their kind to be reported on in South Africa, offer important insights for marketers targeting this cohort and may be used as a guideline to incorporate colour into the design of products in such a way as to appeal to Generation Y students.*

**Keywords:** Colour preferences; marketing; consumer behaviour; product; Generation Y students

### **1. Introduction**

"Red, blue and yellow are not just colours. These are emotions, feelings, memories, reflections, associations" (Dmitrieva, 2002). Colour influences the human mind and body through physical as well as psychological reactions to specific colours. Aslam (2006) argues that colour is a primary component of corporate and marketing communications. The effective use of colour within the marketing mix of an organisation is essential for its success. Gatti, Bordegoni, and Spence (2014) emphasised the importance of colour as a driving force for consumer purchasing decisions. Consumer preferences for product design and packaging colour have been intensively studied in marketing research. Most contemporary marketers understand the importance of colour in advertisements (Sable & Akcay, 2010). Colour affects customer perception for corporate brand identity (Chang & Lin, 2010). Colour holds different meanings to different people in the marketplace. In the promotion of a product or service, the marketer must select the appropriate colours in order to maximise attention, provide a more realistic and appealing portrayal of the product or service, and arouse appropriate feelings (Wells, Burnett & Moriarty 2000). Madden, Hewitt and Roth (2000) consider that it is essential to understand the colour preference of targeted consumers.

Markert (2004) identifies the Generation Y market as comprising individuals born between 1986 and 2005. In 2013, approximately 38 percent of the South African population were categorised as forming part of the Generation Y cohort (Statistics South Africa, 2013). The study reported on here focused on the student segment of the Generation Y market (age: 18–24). The number of students is constantly growing and their buying power is increasing. More importantly, a tertiary qualification is typically associated with a higher earning potential and a greater social standing within a community (Bevan-Dye, 2013). It is therefore sensible to investigate the consumer behaviour of the Generation Y students, as they are not only likely to represent a lucrative marketing opportunity but also tend to have a significant influence on their contemporaries of the same age cohort.

The aim of this study was to examine the product colour preferences of Generation Y students. These findings will enable marketers to market their products to this cohort more effectively. There is a dearth of published research on this

topic in South Africa, one reason for which, as noted by Bellizzi, Crawley and Hasty (1983), being that the commercial organisations that conduct colour research do not publish their findings to avoid giving competitors an advantage.

## **2. Literature Review**

Individuals categorised as Generation Y are very active in the marketplace (Noble, Haytko & Phillips, 2009). According to a study conducted by the Student Village (2013), South African students spend over R39,5 billion per year, which amounts to about R 3 510 per student per month. Generation Y students spend more money than organisations realise and Shim, Serido and Barber (2010) report that marketers are striving to discover ways of appealing to this prominent group in today's economy.

It is clear that Generation Y consumers are significant role-players in the marketplace and that understanding the consumer behaviour of the student portion of this cohort may be especially valuable given their likely future income and social standing (Bevan-Dye, 2013). Marketers therefore require an understanding of the factors that influence their buying habits.

Funk and Ndubisi (2006) indicate that colour is one of the key determinants that influence consumer behaviour. In this regard, knowledge of how individuals in this cohort perceive and interpret colour is important in aiding marketers' ability to appeal to this segment successfully, given the role that colour plays in the design of the marketing mix.

Not all people respond in the same manner to particular colours or make the same psychological associations with colours. Marketers should be aware of the perceived importance of colours and people's interpretation of colour in particular countries and particular cultures. Colour may be used as a marketing tool to influence an individual's attitude towards a brand (Lichtle, 2007). Colour plays an important role when it comes to products, services, packaging, logos and displays. Colour is also helpful in creating a differentiated position in highly competitive market places and it may aid in highlighting a product's attributes if used strategically (Aslam, 2006).

Colour is an influential factor that must be considered in all aspects of a business's marketing mix. Colour should play a vital role in the advertising and marketing strategy of a firm (Elliot & Maier, 2014). According to Funk and Ndubisi (2006), colour may be used as a marketing weapon if managed strategically. Tangkijiwat, Rattanakasamsuk and Shinod (2008) indicate that colour may be used to attract attention and generate the desire to consume. O'Connor (2011) notes colour to be a salient element used to create visual equity and differentiation within the marketplace.

A more pleasing and stylish product image may be obtained by using different colour combinations and visual effects (Ma, Chen & Wu, 2007). Packaging and store wall colours can drastically affect an organisation's sales (Singh 2006). Consumers develop a preference for particular colours for certain products because they learn, through association, that certain colours are appropriate for certain product categories (Grossman & Wisenblit 1999). Organisations should be attentive to these developed preferences and associations.

Colour preferences are influenced by several factors such as age, gender, geographical region and circumstances (Tangkijiwat et al., 2008). Fehrman and Fehrman (2000), and Ou, Ronnier Luo, Sun, Hu, Chen, Guan, Woodcock, Caivano, Huertas, Tremeau, Billger, Izadan and Richter (2011) all conclude that colours are preferred in the order of blue, red, green, purple, orange and then yellow. Several researchers (Kamaruzzaman & Zawawi 2010; Manav 2006; Madden et al., 2000; Singh 2006) agree that blue is the most liked colour across nations. Ling and Hurlbert (2007) state that the colour blue is also the colour most favoured by both males and females.

Product colour is an important influencing factor in the purchase of certain product categories. For example, Madden et al. (2000) state that colour is one of the top three factors that influence consumers when buying an automobile. Consumers prefer certain products in specific colours. Blue, red, black and white are consumers' most preferred colours when buying motorcars and clothing (Fehrman & Fehrman 2000; Grossman & Wisenblit 1999).

He et al. (2011) concluded that male and female colour preferences tend to differ. Ellis and Ficek (2001) observed that males are more tolerant of blue and green while females are more tolerant of red and yellow. The reason for these differences may be, as Moss and Colman (2001) indicate, that baby boys are often dressed in blue and baby girls in pink. This may lead to a preference of blue shades amongst males and a preference of red shades amongst females. These preference differences will be useful for organisations targeting a specific gender.

## **3. Methodology**

### *3.1 Target population, sampling frame and sampling method*

The target population comprised of Generation Y students between 18 and 24 years, registered at South Africa's public

higher education institutions (HEIs) in 2013. The sampling frame consisted of a list of South Africa's public HEIs, as stipulated by the Department of Higher Education and Training.

This study made use of a non-probability convenience sample of two HEI campuses located in South Africa's Gauteng province that was drawn from the sampling frame. Thereafter, a convenience sample of 500 under-graduate students were drawn from these HEI campuses - 250 students per campus. A structured self-administered questionnaire was distributed to the 500 respondents that comprised the sample.

### 3.2 Research instrument

In order to collect the required data, a self-administered questionnaire was utilised. The questionnaire consisted of three sections. The first section sought demographic information from participants. The second section listed eight colours (yellow, red, green, blue, purple, orange, white and black) that the respondents were requested to rate on a scale from 1 to 8 (1 the favourite colour and 8 the least favourite colour). The last section of the questionnaire was designed to test the students' product colour preferences for specific product categories using a four-point Likert scale.

## 4. Results

All of the 500 questionnaires that were distributed were returned. Of these 500 questionnaires returned, 416 were completed, which included seven respondents aged 25 years and older. As this study's target population was defined as Generation Y students aged between 18 and 24 years of age, these seven responses were excluded from the study, resulting in 409 usable questionnaires.

The sample group consisted of 61 percent female respondents and 38 percent male respondents, with 1 percent of the sample failing to indicate their gender. This gender distribution is sufficiently representative for comparisons to be drawn between male and female participants. The majority of the respondents (77%) indicated their designated group as being African, 19 percent were white, 2 percent Indian and 1 percent were Coloured. A Cronbach coefficient alpha of .82 was computed on this scale, which indicates good internal reliability.

The overall colour preference was determined by calculating the mean for each of the colour's ranking results (Table 1).

**Table 1.** Overall colour rankings (N= 409)

	Mean	Standard deviation
Blue	2.28	2.17
Purple	2.95	2.45
Red	3.06	2.12
Black	3.14	2.43
White	3.40	2.16
Green	3.56	2.18
Yellow	4.29	2.32
Orange	4.65	2.21

Table 1 shows that blue was the students' favourite colour — followed by purple, red and black — whereas orange and yellow were the least preferred.

Figure 1 shows that respondents had a high preference for the colour black for all items examined. All products in orange and yellow were least popular.

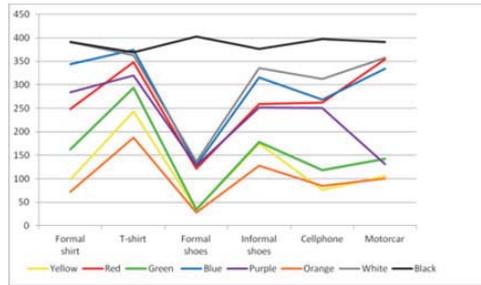


Figure 1. Relative preference for different products by colour

In order to determine whether there were significant differences between the male and female respondents' colour preference ranking and product colour preferences, a t-test was conducted. Where a statistically significant difference ( $p < .05$ ) existed, the Cohen's D statistic was computed in order to determine whether the difference was practically significant.

Two significant statistical differences were evident between the male and female respondents regarding colour preference ranking. These differences were statistically significant at  $p < .05$  and they are presented in Table 2.

Table 2. Significant differences between male (N= 157) and female (N= 250) respondents regarding colour preference ranking

Colour	Male		Female		t	P	D
	$\bar{x}$	s	$\bar{x}$	S			
Red	5.41	2.07	4.63	2.09	3.65	.000	0.37x
Purple	3.84	2.35	5.80	2.19	-8.54	.000	0.83xx

x Small effect, practically non-significant  
xx Large effect, practically significant

Table 2 indicate that the colour red showed a small effect, practically non-significant towards male respondents' preference of red while the colour purple exhibit a large effect, practically significant towards female respondents preference of purple.

Several significant differences were computed between the male and female respondents regarding product colour preferences. These differences were significant ( $p < .05$ ) and they are presented in Table 3.

Table 3. Significant differences between male (N= 159) and female (N = 254) respondents regarding product colour preferences

	Male		Female		t	P	D
	$\bar{x}$	s	$\bar{x}$	S			
<b>Formal shirt</b>							
Purple	2.54	1.11	3.11	1.02	-5.30	.000	.51**
<b>T-shirt</b>							
Yellow	2.36	1.07	2.84	1.10	-4.33	.000	.44*
Purple	2.81	1.08	3.43	.83	-6.68	.000	.58**
<b>Formal shoes</b>							
Red	1.52	.88	2.13	1.17	-5.75	.000	.52**
Purple	1.58	.94	2.20	1.19	-5.57	.000	.52**
<b>Informal shoes shoesshoesshoes</b>							
Yellow	1.86	.93	2.41	1.14	-5.10	.000	.48*
Red	2.48	1.04	2.83	1.04	-3.26	.001	.34*
Purple	2.22	1.15	3.02	.97	-7.56	.000	.70**
Orange	1.79	.94	2.12	1.07	-3.19	.002	.31*
<b>Cell phone</b>							
Purple	2.12	1.12	3.15	1.04	-9.51	.000	.92**
<b>Motorcar</b>							
Purple	1.79	.97	2.18	1.13	-3.65	.000	.35*

\* Small effect, practically non-significant

\*\* Large effect, practically significant

Table 3 signify several significant differences between male and female students. The females had a higher tendency to prefer a purple formal shirt, a t-shirt coloured yellow or purple, formal shoes in red or purple, informal shoes in yellow, red, purple or orange. The female participants also indicated preferring a purple cell phone and a purple motorcar more so than the males.

## 5. Discussion

Blue, purple, red and black were the most preferred colours amongst Generation Y students, and orange and yellow the least preferred. The most significant difference from these results compared to the literature (Fehrman & Fehrman, 2000; Ou et al., 2011) is that purple was ranked as the second favourite colour by this study's respondents, while the literature suggested purple to be ranked fourth. The findings of this study are consistent with the literature (Kamaruzzaman & Zawawi 2010; Manav, 2006; Madden et al., 2000; Singh 2006) in terms of blue being the most preferred colour, and yellow and orange being the least preferred.

The student participants indicated having a high preference for all mentioned products in the colour black, together with the lack of preference for orange and yellow products. The product colour preference for white, blue and red were notably high for all products except formal shoes. This high preference for products' coloured black might be due to the association of black with power, wealth, elegance and high quality or expensive products as noted by Sasidharan, 2010, Jacobs, Keown, Worthley and Ghymn (1991). The lack of preference for orange and yellow coloured products is consisted with the students' overall aversion of the two colours as determined in this study. Another explanation for this might be that orange and yellow is often associated with warning or danger signs (Begum, 2008).

Significant differences were recorded for the male and female respondents concerning the ranking of red and purple. The literature (Ellis & Ficek 2001) indicates that females tend to be more tolerant of red while our male students indicated a higher preference for red than the females. The female participants ranked purple higher than the males. The female students also depicted a higher preference for products coloured purple.

## 6. Limitations and Future Research

As with any study, this study has certain limitations that need to be considered when interpreting the results. This research study only focussed on the hue of colour. Future research should consider investigating the influence of the other two aspects of colour, namely 'value' (lightness or darkness of the colour) and 'chroma' (saturation of the colour) on marketing efforts. Providing a colour card and using a wider variety of colours in future research studies may increase the accuracy of the respondents' replies. The number of product categories can be broadened. In addition, this study made use of a cross-sectional research design, which only provides a snapshot in time. Future research studies should consider embarking on a longitudinal study as this might provide greater insight into Generation Y students' colour perceptions and associations.

## 7. Conclusion

These findings can help organisations targeting this specific cohort to design their products to maximise exposure to Generation Y students. We therefore recommend that blue, red, purple and black be used for branding purposes when targeting this cohort, while avoiding the use of orange and yellow. Marketers of the selected products targeted at Generation Y students should consider the colours preferred by the target market in their product design decisions.

## References

- Aslam, M.M. (2006). Are You Selling the Right Colour? A Cross-cultural Review of Colour as a Marketing Cue. *Journal of Marketing Communications*, 12(1):15–30.
- Bellizzi, J. A., Crawley, A. E. & Hasty, R. W. (1983). The effects of colour in store design. *Journal of Retailing*, 59(1), pp. 21–45.
- Begum, R. (2008). *Depths of color psychology*. Bloomington, Ind.: Author House: 38-40 p.
- Bevan-Dye, A. L. (2013). Black Generation Y students' attitudes towards Web advertising value. *Mediterranean Journal of Social Sciences*, 4(2):155-164.
- Chang, W-L. & Lin, H-L. (2010). The impact of colour traits on corporate branding, *African Journal of Business Management*, 4(15):3344-3355, Nov.
- Elliot, A. J., & Maier, M. A. (2014). Color psychology: Effects of perceiving color on psychological functioning in humans. *Annual review of psychology*, 65, 95-120.

- Ellis, L. & Fieck, C. (2001). Colour preferences according to gender and sexual orientation. *Journal of Personality and individual differences*, 31:1375-1379.
- Fehrman, K.R. & Fehrman, C. (2000). Color the secret influence. Upper Saddle River N.J.: Prentice Hall: 47-53 p.
- Funk, D. & Ndubisi, N. O. (2006). Colour and product choice: a study of gender roles. *Management Research News*, 29(1/2):41-52.
- Gatti, E., Bordegoni, M., & Spence, C. (2014). Investigating the influence of colour, weight, and fragrance intensity on the perception of liquid bath soap: An experimental study. *Food Quality and Preference*, 31, 56-64.
- Grossman, R. P. & Wisenblit, J. Z. (1999). What we know about consumers' color choices. *Journal of Marketing practice: applied marketing science*, 5(3): 78-88.
- He, W., Zhang, Y., Zhu, J., Xu, Y., Yu, W., Chen, W., Liu, Y. & Wang, W. (2011). Could sex difference in color preference and its personality correlates fit into social theories? Let Chinese university students tell you. *Personality and Individual Differences*, 51(2), 154-159.
- Jacobs, L., Keown, C., Worthley, R. & Ghymn, K. (1991). Cross-cultural colour comparisons: Global Marketers beware, *International marketing review*, 8(3): 21-33.
- Kamaruzzaman, S. N., & Zawawi E. M. A. (2010). Influence of Employees' Perceptions of Colour Preferences on Productivity in Malaysian Office Buildings. *Journal of Sustainable Development*, 3(3):283-293. Sept.
- Lichtle, M. (2007). The effect of an advertisement's colour on emotions evoked by an ad and attitude towards the ad. *International Journal of Advertising*, 26(1): 37-62.
- Ling, Y., & Hurlbert, A. C. (2007). A new model for color preference: Universality and individuality. In *Color and Imaging Conference (Vol. 2007, No. 1, pp. 8-11)*. Society for Imaging Science and Technology
- Ma, M. Y., Chen, C. Y., & Wu, F. G. (2007). A design decision-making support model for customized product colour combination. *Computers in Industry*, 58(6), 504-518.
- Madden, T. J., Hewett, K. & Roth, M. S. (2000). Managing images in different cultures: a cross-national study of color meanings and preferences. *Journal of International Marketing*, 8(4):90-107.
- Markert, J. (2004). Demographics of Age: Generational and Cohort Confusion, *Journal of Current Issues and Research in Advertising*, 26(2):11-25.
- Manav, B. (2006). Color-emotion associations and color preferences: a case study for residences. *Journal of Color research and application*, 32(2):144-151. Apr.
- Moss, G. & Colman, A. M. (2001). Choices and preferences: experiments on gender differences. *Journal of Brand Management*, 9(2):89-99. Nov.
- Noble, S.M., Haytko D.L. & Phillips J. (2009). What drives college-age Generation Y consumers? *Journal of Business Research* 62(6):617-628, Jun.
- O'Connor, Z. (2011). Logo Colour and differentiation: a new application of environmental colour mapping. *Journal of Color research and application*, 36(1):55-60. Febr.
- Ou, L.-C., Ronnier Luo, M., Sun, P.-L., Hu, N.-C., Chen, H.-S., Guan, S.-S., Woodcock, A., Caivano, J. L., Huertas, R., Treméau, A., Billger, M., Izadan, H. And Richter, K. (2011). A cross-cultural comparison of colour emotion for two-colour combinations. *Color Research & Application*. doi: 10.1002/col.20648
- Sasidharan, S. (2010). The impact of color and product congruency on user trust in B2C E-Commerce, *ABD Journal*, 2.
- Sable, P. & Akcay, O. (2010). Color: Cross cultural Marketing perspectives as to what governs our response to it. (Proceedings of ASBBS Annual Conference: Las Vegas. 17(1):950-954, Feb.)
- Shim, S. Serido, J. & Barber, B.L. (2010). A Consumer Way of Thinking: Linking Consumer Socialization and Consumption Motivation Perspectives to Adolescent Development. *Journal Of Research On Adolescence*, 21(1), 290-299.
- Singh, S. (2006). Impact of colour on marketing. *Journal of Management Decision*, 44(6), 783-789.
- Statistics South Africa. (2013). Mid-year population estimates: 2013 key indicators, statistical estimates: 2013 key indicators, statistical release PO302. <http://www.statssa.gov.za> Date of access: 3 May. 2014.
- Student Village. (2013). SA Student spend report. <http://www.slideshare.net/lyallsv/sa-student-spend-report-2013> Date of access: 25 August 2013.
- Tangkijwiat, U., Rattanakasamsuk, K. & Shinod, H. (2008). *Color preference affected by mode of color appearance*, *Journal of Color research and application*, 35(1):50-63.
- Wells, W., Burnett, J. & Moriarty, S. (2000). *Advertising Principles and Practice*. 5th ed. Upper Saddle River: Prentice-Hall.