HOW CONSUMPTION OCCASIONS SHAPE CONSUMER PREFERENCES: A DISCRETE CHOICE EXPERIMENT APPROACH

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Abstract

Purpose: Extant literature has shown that consumption occasions shape consumer preferences. However, this conclusion has been reached with techniques, which are not truly reflective of the way in which consumers make their choices. The purpose of this paper is, therefore, to test this literature's findings through a discrete choice experiment, a technique, which captures better the way in which consumers choose.

Methodology: A discrete choice experiment, which manipulates 13 product attributes. The respondents were asked to think about buying wine for one of three consumption occasions in the store where they normally purchase their wines. The data were collected online in November 2015 generating a total of 1,295 completed questionnaires. The sample was socio-demographically representative in terms of age, gender and income of the cohort of the upper-middle class urban population aged 18-49 living in Beijing, Shanghai, Guangzhou, Chengdu, Shenyang, and Wuhan who drink imported wine at least twice a year.

Findings: Only some of the results are in line with previous research. Origin is not always the most important choice driver, and the importance of prices varies between occasions. In addition, consumers do not seem to care much about medals, awards, or labels, but they somewhat rely on store or expert ratings when purchasing wines for more refined occasions.

Implications: Researchers need to think carefully about the methodology adopted to conduct a study, as different techniques can lead to very different results. Replications can strengthen previous findings, and reduce the risk of false positives.

Key words: consumption occasions; retail; discrete choice experiment; China

. Introduction and literature review

The effect that consumption occasion has on consumers' choice has been a topic of interest for more than forty years (Belk, 1974; Fountain & Lamb, 2011). Quester and Smart (1998) were among the first to investigate this in the wine marketing literature. They studied the effect of consumption situation and product involvement on the importance consumers give to various product attributes and their levels through a conjoint analysis of 303 Australian consumers. The results showed that the importance of region does not differ between consumption occasions, however the importance of price, grape variety and wine style varied between occasions. This study, while novel at the time, has several limitations. First, from a methodological perspective, conjoint analysis relies on rating scales, thus assuming that respondents always evaluate one option at the time. This creates biases in the valence of the options being evaluated making the results unreliable (Hofmans et al., 2007). Secondly, the alternatives were displayed as words instead of visual stimuli, an approach, which is now known to lead to bias results (Mueller & Lockshin, 2008). Third, although the authors mention that the options presented to respondents are the results of a combinatory design of product attributes and their relative levels, only the results relative to the attributes have been presented, thus leaving aside a question about the importance the specific levels have on wine choices.

Hall and Lockshin (2000) and Hall, Lockshin, & O'Mahoney (2001) also looked at the effect of consumption occasion on the importance Australian consumers attach to product attributes and personal values using a means-end chain approach with up to eight different occasions. The results show some differences in the importance consumers give to the various product attributes, but these differences cannot be statistically evaluated due to the methodology adopted. The importance given to these attributes does not derive from a trade-off between attributes and does not reflect in reality the way consumers actually make choices. It is also not possible to measure the importance given to the attributes' levels.

Other studies in this area have adopted a more descriptive approach, showing if and when consumptions occasions change the way in consumers purchase. Liu and Murphy (2007) provided a description of the way Chinese people consume wines. They showed that Chinese purchase red wines only for special occasions, prefer inexpensive wines for private consumption and more expensive wines for public occasions, mostly due to 'face'. Thach (2011) focused on Generation Y (Gen Y) in the US showing they generally consume wines in traditional situations, such as special occasions and fancy restaurants, but they have also found a few more occasions revolving around social situations with friends and family. Furthermore, Gen Y consumers are willing to spend more money on a bottle of wine by occasion than the average American. These results are similar to those of Fountain and Lamb (2011), who suggested that Gen Y New Zealanders are more likely than older consumers to consume wines during special occasions. In addition, their study revealed that the wine type and grape variety are important across all consumption occasions and age groups, while the importance given to wine quality and price varies with the consumption occasion. During highly involved situations (i.e. special occasions), the first increases, while the second decreases. This accords with Hall & Lockshin (2000).

Despite the merit these studies have in showing the basic effects consumption occasions have on wine choices, the results do not allow trade-offs between bundles of competing options and do not reflect a realistic choice process. Further research in this area is necessary to provide better guidance to wine marketers. The purpose of this study is to reduce the limitations in the extant literature using a discrete choice experiment (DCE), a technique, which is more reflective of the way in which consumers actually make their choices. The context of this research is the China wine market, as the growth recorded in this market for the last few years and estimated future growth (Euromonitor International, 2016) makes the results of this study appropriate from an academic and a managerial perspective.

. Method and sample

DCEs make it possible to measure trade-offs across bundles of competing options – in this case bottles of wine. The product attributes and levels, as well as the combinatory design to generate the stimuli (i.e. wine bottles) were taken from Williamson, Lockshin, Francis, and Loose (2016). The decision to adopt an experimental design, which has already been used in another study, stems from a well-established principle in scientific research: replication (Lindsay & Ehrenberg, 1993).

The opportunity to test whether the results obtained in a previous study hold despite a change in context reinforces the confidence in the findings (Nenycz-Thiel & Romaniuk, 2014). The combinatory design comprises 13 product attributes, eight of which contained multiple levels – country of origin, price point, closure type, label style, grape variety, expert rating score, store rating score, and presence of a gold medal – while five – fictitious brand name, alcohol content, bottle shape, bottle volume, vintage – have been kept constant. Different from (Williamson et al., 2016), who asked respondents to complete the DCE after priming them with various advertorial messages, the respondents in this study were asked to think about buying wine for one of three consumption occasions in the store where they normally purchase their wines. The occasions, an informal meal at home, celebrating a special occasion at home and a dinner at home with guests were varied between participants. These occasions were chosen based on the growing trend of athome consumption illustrated by Corsi, Cohen, and Lockshin (2016) in a three-year market research report on the attitudes, perceptions and behaviour of the upper-middle class urban population aged 18-49 living in Beijing, Shanghai, Guangzhou, Chengdu, Shenyang, and Wuhan who drink imported wine at least twice a year. These consumers are driving the growth of imported wine.

The data were collected online in November 2015 generating a total of 1,295 completed questionnaires. The sample was socio-demographically representative in terms of age, gender and income of the cohort of consumers mentioned previously. After checking for flat-liners, speeders and inconsistent responses, the sample was reduced to 1,004. The majority of respondents were 30-39 years old (44%), male (62%), earning more than RMB 10,000 (AUD 1,500) per month (63%), living in Shanghai (37%), Guangzhou (15%), and Beijing (12%).

Data were analysed using LatentGold Choice 5.1. Attribute importance for each of the three occasions was calculated using Wald statistics (Scozzafava, Corsi, Casini, Contini, & Loose, 2016; Williamson et al., 2016) and the results are compared descriptively. In order to examine whether the part worth utility associated with each attribute's level is statistically different across the other three occasions, the Wald(=) statistic was computed (Loebnitz, Loose, & Grunert, 2015; Williamson et al., 2016). To present the part worths utilities in a more managerially

understandable way, we convert them into market shares following the procedure suggested by Williamson et al. (2016).

. Results

The results show that country of origin and price are the two key choice drivers overall. Chinese consumers are mostly driven by price, when buying wine for an informal dinner at home (69%) with origin also having an influence (16%). Origin is the most important factor when buying wines for dinner at home with guests or for special occasions (45% and 42% importance, respectively). Price is second (12% and 17%, respectively). Unlike the informal dinner at home, the other occasions caused more factors to be considered in the wine choice. A special occasion or hosting guests cause a wine buyer to use a more complex set of factors to make his/her choice, especially raising the importance of various third party endorsements, like medals, store ratings and expert ratings. Label and grape variety also increased in importance. Closure had no impact on choice in any purchase occasion. Table 1 below summaries the results.

Table 3: Product feature importance across different purchase occasions

Product feature	Informal dinner at home (%)	Special occasion at home (%)	Dinner with guests at home (%)
n	331	332	341
Country	16	42	45
Price	69	12	17
Closure	0	0	1
Label	1	12	5
Grape	3	8	7
Medal	1	11	6
Store rating	5	5	13
Expert rating	5	10	6
Total	100	100	100

When looking at preferences towards attribute levels, the results show significant differences between occasions in relation to countries, prices, labels, and medals (see Table 4).

France is consistently the most preferred country, but, while Australia equals Italy as the second most preferred country when buying wine for an informal dinner, Italy solidly surges over Australia when buying for a special occasion or a dinner at home with guests. As expected, Chinese consumers prefer to spend less for an informal dinner at home (RMB 130) than for a special occasion (RMB 190 – RMB 370), or a dinner at home with guests (RMB 250). A similar pattern can be seen in relation to labels. An elegant design is slightly more preferred over other label designs when choosing wine for an informal dinner, while a prestigious label design is preferred for the other two occasions. Lastly, and contrary to expectations, Chinese consumers do not find medals on wine labels to be important. This tendency seems to be stronger when buying wines for more formal occasions than for informal ones.

As for those attributes, which do not show significant differences between occasions, Chinese consumers appear to be completely indifferent to the type of closure wines are sealed with; they prefer dry reds and Cabernet Sauvignon over Pinot Noir and Shiraz; and to buy wines with the highest possible store rating scores. Interestingly, though, when it comes to expert ratings, Chinese consumers seem to either prefer to purchase wines with the highest score a wine can receive, or not to have an expert rating at all, rather than having a good, but not exceptional rating.

Table 4: Share of preferences for product attribute' levels – By consumption occasion

	Informal dinner at home	Special occasion at home	Dinner with guests at home		
n	331	332	341		
Country	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
France	32	35	35	27.98	0.00
Australia	25	21	22		
Italy	25	27	27		
China	18	17	17		
Price (RMB)	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
70	16	8	8	581.18	0.00
130	21	12	13		
190	18	14	14		
250	13	14	15		
310	10	14	13		
370	9	14	14		
430	7	12	12		
490	6	12	13		
Closure	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
Screw cap	51	50	52	2.51	0.28
Natural cork	49	50	48		
Label	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
Elegant	14	13	13	27.03	0.02
Prestigious	13	17	14		
Stately	13	12	13		
Light hearted	13	14	13		
Modern contemp	12	11	11		
Eclectic	12	12	11		
Modern classic	12	11	13		
Modern vibrant	11	10	11		

Grape	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
Dry Red	27	26	28	5.43	0.49
Cab. Sauv.	27	29	28		
Pinot Noir	23	24	22		
Shiraz	22	21	22		
Medal	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
none	53	58	56	12.67	0.00
Gold medal	47	42	44		
Store rating	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
99 points	39	38	40	7.39	0.12
95 points	31	31	32		
none	30	31	28		
Expert rating	MS (%)	MS (%)	MS (%)	Wald (=)	p-value
96 points	39	38	39	3.45	0.49
None	32	31	31		
92 points	29	30	29		

Adj. $R^2 = 0.032$; LL = -28,632; BIC(LL) = 41,166; n = 1004; df = 924

.. Discussion and conclusion

Only some of these results are in line with previous research. Contrary to Quester and Smart (1998), this research shows differences in the importance given to the origin of the product. However, Quester and Smart (1998) conducted the research in Australia used region of origin. This study used country of origin instead to ensure comparability with Williamson et al. (2016), and functionally to present the Chinese with "origins" they had knowledge of and use in wine choice (Corsi et al., 2016). As the China market evolves replication with both regions and countries of origin should be conducted to test if the patterns hold. Extant literature offers plenty of references to justify the use of both product attributes (Lockshin & Corsi, 2012).

It is interesting to observe the changes in the importance of prices between occasions. Wakefield and Inman (2003) noted that when consumption occasions are perceived to be more hedonic, the importance of prices decline. We didn't test the hedonic perception of the various occasions, but if we adopt the argument of Fountain and Lamb (2011), who claimed that special occasion is more hedonic than regular occasion, these results are in line with previous literature. We see a marked decline in the importance of prices too, as the occasion shifts from an informal meal at home to a special occasion or a dinner at home with friends, but, as the occasion becomes more hedonic, the most preferred price point grows. Showing medals on the label wines is not a recipe for success in China. Chinese consumers don't display interest in line with Williamson et al. (2016). Label style is important when choosing wine for a special occasion. In line with previous research (Lockshin & Corsi, 2012), this study shows that traditional labels and colours are preferred over complicated designs and unfamiliar colour combinations in China.

Lastly, previous research using DCEs has shown that consumers do not care much about medals, awards, or labels (Goodman, 2009; Lockshin & Corsi, 2012), except for low involvement consumers, as in Lockshin, Jarvis, d'Hauteville, and Perrouty (2006). However, studies using Likert scales draw opposite conclusions (Atkin, Nowak, & Garcia, 2007; Rocchi & Stefani, 2005). This is a call to the research community to think carefully about the methodology adopted to conduct the research, the value of replication under various conditions.

We acknowledge that our study did not include other product attributes from previous research in the field of situational influence (e.g. Hall et al., 2000). This was due to the desire to replicate Williamson et al. (2016). Other product attributes, such as wine style or brands, do play a role in the decision process, which could influence the results. Also, we can't generalise across China. Our respondents represented only one very important cohort of Chinese consumers (i.e. the upper-middle class urban population aged 18-49 living in major Chinese cities who drink imported wine at least twice a year). Although these consumers represent quite a significant proportion of current wine buyers in China, we cannot exclude that the results could be potentially different with more heterogeneous respondents. This research only looked into the effects that occasions have in the selection of wine. However, we know that occasions not only change the way in which wines are purchased, but they actually change the beverages people consume (Agnoli, Begalli, & Capitello, 2011). Future research could therefore fill this gap, by investigating how consumers, particularly younger ones, form their product portfolios.

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