Applying means-end to hospitality hosts: a study of winery tasting rooms

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Abstract

Purpose – The paper has a twofold purpose: (1) to test the application of means-end theory to providers of hospitality goods and services, and (2) to explore this question in the context of winery tasting rooms when they had a unique opportunity to restructure their hospitality experience due to government restrictions in response to COVID.

Design/methodology/approach – A qualitative approach was adopted, and a convenience sample was used to conduct semi-structured laddering interviews. Forty interview transcripts were coded as means-end ladders, which were analyzed using a custom computer program to develop the implication matrix and the hierarchical value map.

Findings – This paper demonstrates that means-end is a useful approach to investigate the values and behaviors of the producer, specifically hospitality hosts. It finds that the principal goal of tasting rooms is to generate sales, and offering a compelling guest experience is the characteristic that contributes the most to achieving that goal. The staff and the atmosphere created for the guests are the two factors with the greatest influence on the guest experience.

Originality/value — This is the first paper to use means-end theory to study the hospitality host, or the producer of goods and services in general, and the first to study winery hospitality primarily through the lens of means-end theory. The study also helps fill a gap in research on tasting room sales focused on the winery's goals.

Keywords Means-end methodology, Winery hospitality, Winery tasting room, Guest experience **Paper type** Research paper

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Introduction

Means-end methodology in hospitality

Forty years ago, Gutman (1982) proposed the means-end model to operationalize prior theoretical and conceptual structures connecting consumers' values to their buying behavior and give those structures a central place in marketing planning and consumer research. Subsequent research applied the means-end methodology to a diverse range of settings, including hospitality and tourism beginning with the Klenosky, Gengler and Mulvey (1993) study of the choice of a ski vacation destination. In a research note contending that the means-end methodology would be valuable for studying tourist behavior, McIntosh and Thyne (2005) suggested that the means-end approach has potential application for understanding the values and behaviors of the hospitality hosts. Nunkoo and Ramkissoon (2009) also advocated for using means-end to study the attitudes of the hospitality hosts toward tourism. Despite these suggestions, the application of means-end theory to consider the choices made by hospitality hosts has remained a gap in the literature.

This study extends the use of means-end theory to investigate the hospitality host. This is the first paper, to the best of the authors' knowledge, to use means-end theory to investigate the decisions of the producer rather than the consumer, and the first to do so in a hospitality setting. This study explores the elements of the tasting room operations (e.g. reservations, the setting/ambience) that tasting room managers think are most important for helping the winery achieve its tasting room goals and the chain of consequences that lead from that specific element to a given goal.

Winery tasting rooms

As of 2021, the U.S. had more than 11,000 bonded wineries, and over 80% of them produced fewer than 5,000 cases annually (Sovos ShipCompliant and Wines Vines Analytics, 2022, p. 3). Winery tasting rooms, as the centerpiece of wine hospitality and tourism in the United States, play an important role in the wine industry and in the economic vitality of the regions that wine tourists visit. In California, for example, an estimated 25.2 million wine-related tourist visits to California wineries in 2022 accounted for \$8.6 billion in visitor-related annual expenditures (Wine Institute, 2022).

While premiumization of wine has been underway at many wineries for years (Anderson & Nelgen, 2021), most wineries did not extend it to the basic tasting room experience by offering features such as seated tastings and the opportunity to make a reservation. In 2018, only 12% of California wineries outside of Napa County and Sonoma County required reservations, and 34% did not offer them (Silicon Valley Bank, 2022). Typically, only exclusive high-end wineries and those with local restrictions severely limiting the permissible number of visitors required reservations. In the California counties of Napa and Sonoma, with a significant presence of such exclusive high-end wineries and local restrictions, 60% of wineries required reservations and only 7% did not allow for reservations.

Then COVID changed everything. The declaration of a worldwide pandemic in March 2020 led many U.S. state and local governments to issue orders that severely curtailed a winery's ability to operate its tasting room. In California, Oregon and Washington – the states that account for most wineries and much of the wine hospitality in the U.S. – governments issued orders that effectively shut down winery tasting rooms until mid-May 2020 or later. When wineries were allowed to offer in-person wine tastings again, they faced new restrictions and requirements (Wine Institute, 2021). Such restrictions included limiting party size, requiring reservations and offering only seated tastings with one party per table.

While wineries had to comply with the restrictions to reopen, they did not necessarily embrace the changes immediately. One winery owner/winemaker told one of the authors that his winery reacted to the restrictions by "kicking and screaming" and vowed to return to its prior mode of operations as soon as possible. In time, however, numerous wineries discovered that some aspects of the COVID requirements allowed them to offer their customers a better

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experience, with more time and space to present and explain the wines than was possible with customers crowded around the tasting room bar. They often realized that they could make a more personal connection with the customers in the process. In short, the COVID restrictions forced wineries to bring premiumization to the basic tasting room experience, and many wineries (including the aforementioned owner/winemaker) have said that they intend to maintain the new model – or major aspects of it – even with restrictions essentially lifted.

Because wineries were forced to reconfigure the tasting room experiences they offered to visitors at the beginning of the pandemic, they found it relatively easy coming out of the pandemic restrictions to make changes that would best serve its customers and deliver on the winery's goals for the tasting room. Many tasting room managers interviewed for this study indicated that most customers did not expect to return to the pre-pandemic status quo ante and that the restricted model had not been in place long enough to establish a new status quo. Accordingly, a winery could determine if it wanted to keep any of the pandemic-restricted features, modify a feature or return to its pre-pandemic format. For example, a winery could decide to continue offering only seated tastings and encourage reservations while accommodating walk-ins on a space-available basis.

Against this background, this paper explores the following questions: What elements of the tasting room operations do winery managers with responsibility for the tasting room think are most important for helping the winery achieve its tasting room goals? How do those elements lead to meeting the goals? Using means-end theory, the paper analyzes the impact those identified elements have and the goals they help the winery pursue. In doing so, this paper fills a gap in means-end and hospitality research as the first paper to use means-end theory to study the hospitality host or the producer of goods and services in general.

Literature review

Means-end research

Gutman (1982) proposed the means-end model to operationalize prior theoretical and conceptual structures connecting consumers' values to their behavior. The model incorporates four fundamental assumptions: (1) values, or desired end-states, play a central role in guiding the product choice patterns of consumers; (2) consumers structure their choices of products that are potential satisfiers of value into sets or classes to reduce complexity, and these sets may be based on product function rather than product type; (3) all consumer acts have consequences; and (4) consumers learn to relate certain consequences with specific actions. In sum, consumers learn to choose a product that has properties (attributes) that produce results (consequences) that help the consumer move toward or achieve a desired end-state (value).

Gutman wanted to provide a model to give the theoretical and conceptual structures connecting consumers' values to their behavior a central place in marketing planning and consumer research. Reynolds and Gutman (1988) further refined the means-end model and provided a general methodology for collecting means-end data through laddering and analyzing it using content analysis summarized in an implication matrix and hierarchical value map. Subsequent research applied the means-end methodology to a diverse range of settings, from consumer recycling decisions (Bagozzi & Dabholkar, 1994) to the creation and testing of conditional-normative accounting theory (Mattessich, 1995) to consumer resistance to Internet banking (Kuisma, Laukkanen, & Hiltunen, 2007).

The means-end methodology proved valuable in hospitality and tourism research, including studies of the choice of a ski vacation destination (Klenosky *et al.*, 1993), the use of interpretive services by visitors at state parks (Klenosky, Frauman, Norman, & Gengler, 1998), the motivation for Asian and Western business travelers to stay at a luxury hotel (Mattila, 1999) and the motivation-based values of museum visitors (Thyne, 2001).

Other research applied the methodology to the broader experience industry to explore choices of outdoor recreational activities such as participating in a ropes course (Goldenberg,

Klenosky, O'Leary, & Templin, 2000), Outward Bound and National Outdoor Leadership School programs (e.g. Goldenberg & Pronsolino, 2008), BASE jumping (Allman, Mittelstaedt, Martin, & Goldenberg, 2009), college outdoor wilderness orientation programs (Lien & Goldenberg, 2012), hiking National Scenic Trails such as the Appalachian Trail and the Pacific Crest Trail (e.g. Hill *et al.*, 2014), visiting botanical gardens (Wassenberg, Goldenberg, & Soule, 2015) and participating in outdoor adventure programs (Goldenberg & Soule, 2015).

In the wine industry, the means-end methodology provided a basis for investigating the market for sparkling wine (Judica & Steven Perkins, 1992), consumer behavior based on buying occasion (Hall & Lockshin, 2000), the decision whether to buy organic wine (Fotopoulos, Krystallis, & Ness, 2003; Rahman, Stumpf, & Reynolds, 2014), the motivations for a wine distributor (as the wholesale purchaser) and the possibilities to pursue them in a relationship with a small winery (Escobar & Gil, 2016).

Little research has been done employing the means-end methodology to study the producer or supplier of goods and services and the connections between attributes, consequences and values from that perspective. Skytte and Bove (2004) applied the means-end chain approach to study food retailers as trade buyers. Similarly, Escobar and Gil (2016) investigated wine distributors but used means-end to identify the values of the transaction's purchaser side.

In a research note contending that the means-end methodology would be valuable for studying tourist behavior, McIntosh and Thyne (2005) suggested that the approach has potential application for understanding the values and behaviors of the hosts. Nunkoo and Ramkissoon (2009) also advocated for using means-end to study the attitudes of the hospitality hosts toward tourism.

Winery tasting room research

The winery tasting room has been studied both as a part of a winery's marketing activities in general and as a major element of wine hospitality and tourism. Although smaller wineries are highly reliant on direct-to-consumer (DTC) sales, especially through tasting room sales, for their success (Haverila, Haverila, & Twyford, 2021; Shapiro & Gómez, 2014), relatively few studies have focused directly on the tasting room as a means for the winery to increase its sales. Fountain, Fish and Charters (2008) found evidence that sales were greater when the winery made a greater personal connection with the visitor and established a stronger rapport between the visitor and the tasting room staff. The study noted that the purchase of wine at the winery after a tasting was often seen by tasting room visitors as a precursor to post-visit purchases. Visitors frequently noted, however, that there were few openings to purchase at the tasting or that staff did not seem interested in selling wine.

Thomas, Gómez, James Gerling and Katharine Mansfield (2014) found that both bottle and dollar sales were higher when winery tasting rooms used tasting sheets without sensory descriptors than when the tasting sheets had sensory descriptors, controlling for factors such as the weather, day of the week and festivals occurring in the area. Cuellar, Eyler and Fanti (2015) found that off-premise sales through traditional retail outlets performed better for wine brands with tasting rooms than wine brands without, and that wineries in high-traffic areas performed better than wineries in low-traffic areas. They attribute the superior performance to opportunities for tasting rooms to act as a form of experiential marketing for wineries, creating brand awareness and building long-term brand loyalty.

In the context of the marketing function, prior research has examined how wineries may use the tasting room experience to cultivate relationships with customers that build brand attachment (Thach & Olsen, 2006) or commitment and loyalty (Nowak & Newton, 2006). Other studies examined how the tasting room helps to connect with a new generation of wine drinkers to develop long-term, profitable relationships based on continued patronage (Nowak, Thach, & Olsen, 2006).

Fountain et al. (2008) concluded that building brand loyalty requires establishing an emotional connection between the visitor and the winery, its product and the staff; wine

quality and customer service alone are insufficient. Bruwer, Coode, Saliba and Herbst (2013) found a strong correlation between the winery tasting room experience and brand loyalty due to increased positive brand attitudes. Joy, Yoon, Grohmann and LaTour (2021) found that the sensory aspects of the experience (esthetics) and social interaction with the tasting room staff and other guests have the strongest effect on the customer's perception of the experience. Kolyesnikova and Dodd (2008) found that smaller groups felt higher levels of gratitude and obligation and spent more money per person at the winery. Shapiro and Gómez (2014) determined that ambience, tasting protocol, service, retail execution and tasting experience were the five drivers of customer satisfaction and that customer satisfaction significantly influenced purchase intentions, the amount of dollars spent and quantity purchased.

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In terms of what is important for tasting room employees to offer an exceptional tasting experience, Thach and Olsen (2003) indicated that knowledge of the basics of viticulture and winemaking and knowledge of their winery's products lead the list of training areas essential for tasting room employees. Similarly, Marlowe, Brown and Zheng (2016) found that managers of tasting room employees in Oregon most commonly specify that product knowledge is the most important form of employee training.

In the context of winery hospitality and tourism, Bruwer and Alant (2009) first applied the experiential view of consumption to wine tourism to explore the nature of the motivations of wine tourists. Bruwer and Lesschaeve (2012) extended the concept of "servicescape" to develop a model of the winescape that included natural and social environments of wineries. These and subsequent studies, including Bruwer and Gross (2017), Bruwer and Rueger-Muck (2019), Santos, Ramos, Almeida and Santos-Pavón (2020) and Quintal, Thomas, Phau and Soldat (2022), determined the attributes that winery tourists most sought out or appreciated in winery visits. Leri and Theodoridis (2019) extended this framework to examine the impact of the visitors' tasting room experience on their perception of the host winery and found that a visitor's overall satisfaction positively influenced the visitor's post-experience intentions to revisit the winery and give it positive word-of-mouth.

Focusing on the role of sustainability in wine tourism, Barber, Taylor and Deale (2010) found that wine tourists tend to have strong environmental attitudes toward wine tourism, with females more likely to be emotionally involved and passionate about environment issues than males and as a result are more likely to be willing to pay a higher price for environmentally friendly wine and have a stronger purchase intention. More broadly, Forbes, Cohen, Cullen, Wratten and Fountain (2009) found that consumers have a strong demand for sustainably produced wine and are willing to pay more for these products.

Collectively, prior research shows the importance of a visit to the winery tasting room to both the visitor and the winery; however, there appears to be a gap in the research on how wineries view the goals they have for their tasting rooms and how different aspects of the tasting room operations help achieve those goals. This study examines the views of tasting room managers to explore their goals for the tasting room and what aspects of the visitor experience they see as antecedents to achieving those goals. This study's means-end approach elicited open-ended responses that allowed the winery tasting room managers to make their own connections between elements of the tasting room operations, the visitor's experience and the goals of the winery. This study's use of the means-end theory is, to the best of the authors' knowledge, novel in exploring tasting room operations and in applying it to the hospitality host. In doing so, it extends the application of means-end theory and fills a gap in winery tasting room hospitality research.

Methodology

Data collection

Interviewing is the preferred method of data collection for means-end studies due to its ability to elicit attribute-consequence-value associations and discover the fundamental reasons

underlying the respondent's perceptions and behavior (Reynolds & Gutman, 1988). Moreover, interviews provide a way to continue or stop the interview questioning as needed, giving more flexibility and control of the means-end data collection and decreasing the number of unusable responses. Surveys are more likely to result in respondents providing redundant responses and may not reach higher levels of abstraction on their own (Phillips & Reynolds, 2009).

Undergraduate students in a senior capstone course were trained to conduct semistructured interviews using means-end laddering questions. Using convenience sampling, the students conducted 41 interviews during May 2022. One interview with a combination wine bar and shared tasting room was excluded because its business model was substantially different than that of a winery. The remaining 40 interviews meet the minimum number of quality interviews required for means-end research (Allman *et al.*, 2009). Interviews of 17– 32 minutes were conducted either in person or using Zoom. The interviewers made audio recordings of the interviews, which were transcribed using otter.ai. One of the researchers reviewed the transcripts to correct any major transcription errors. The researcher then sent the transcripts to the original interviewer to correct remaining transcription errors.

All the wineries were in a major wine region of California, located in Napa County, San Luis Obispo County or Sonoma County. All the interviewees held management positions in which they had decision-making responsibility for the tasting room operations. The majority of the interviewees were tasting room managers or hospitality managers. The others were nearly evenly divided between owners, general managers and other sales/marketing management titles.

The interviewers asked questions about the age and size of the winery, the size of the wine club and the proportion of DTC sales. Information about the wineries in the sample is presented in Table 1. In an interesting data point that speaks to the growing importance of

Years of operation	Low		High	Mean
Winery Tasting room ^a	6 3		54 43	23 16
		Low	High	Median
Approximate annual case product Total employees ^{c, d} Tasting room/Hospitality employ		500 2 4	100,000 200 35	4,500 12 10
Affiliation				N
Independent Part of small winery group Part of a large wine company				31 4 5
Ownership/Management structur	re ^f			N
Family-/Small-group-owned and Family-/Small-group-owned, prof Corporately owned		ed		29 6 4
Note(s): ^a 1 winery that recently ^b 3 large wineries chose not to ar ^c 27 wineries reporting ^d 4 wineries did not report numb ^e 11 wineries reporting ^f 1 winery chose not to answer Source(s): Table by authors	nswer	g room exclude	ed	

Table 1. Winery information

tasting rooms, four of the twenty wineries that are at least 20 years old previously operated without a tasting room for more than twice the time they have operated a tasting room. DTC sales accounted for more than two-thirds of total sales for 27 of the 37 wineries that disclosed DTC as a percentage of total sales.

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The interviewers next collected information on any focus the winery promotes in terms of region/AVA or varietals and then asked about the winery's tasting room operations before COVID, during the height of the pandemic and with pandemic-related requirements lifted. Many wineries expressed that they felt they were currently operating without any constraining pandemic requirements.

To address the central research question, the interviewer asked, "What three aspects of the tasting room operations do you think are most important for helping the winery achieve its goals with respect to the tasting room?" Taking the answers one at a time, the interviewer would ask, "Why is [that aspect] important?" and then "Why is that important?" and continue asking "Why is that important?" until the response was something like "That is the goal (or purpose) of having a tasting room" or they could no longer provide an answer.

Coding procedures

One primary researcher read the interview transcripts to identify the ladders and entered them in a spreadsheet using Microsoft Excel 365, with each ladder as a separate row and each response in the ladder as a separate cell. At this stage, the ladder cells contained the respondent's words. In total, 40 interviews generated 115 ladders. The next stage in the process was to edit the ladders to remove redundancies that occurred when a respondent reiterated or expanded on an earlier response in the same ladder (Goldenberg *et al.*, 2000). The ladders averaged almost 4.4 responses each, with 503 total responses. Four ladders had only two responses, but each interview produced at least one ladder with at least three responses. The maximum number of responses in any ladder was nine.

Codes are first assigned to the ladder cells to detect recurring patterns; then, they are clustered to create a smaller number of categories (Miles, Huberman, & Saldaña, 2020). The researcher created an initial list of potential coding terms based on previous research, the researcher's knowledge of the industry and key phrases that emerged when entering the ladders in the spreadsheet. The researcher and a research assistant knowledgeable about the wine industry, this study and coding for means-end research then reviewed the coding terms while referring to the ladders. Based on that discussion, the coders agreed to an initial list of terms to use.

They then grouped coding terms by concept type (attribute, consequence, value) and developed an explanation for each term in the context of this study. For example, the consequence *Customer Loyalty* was described as, "Customers feel a devotion to the winery (because of a positive experience)." The value *Profit/Sales* was described as, "a catch-all term to capture the broader idea of making money, from Sales/Revenue to Profit/Net Income—or being successful as a business."

Next, they independently coded the ladders using the list and definitions. The coders were not restricted to using terms on the list and could decide to use additional terms if needed. The coders agreed on the coding for 79% of the ladder responses. The two coders resolved each of the differences. Many of the initial disagreements involved highly related concepts, such as *Guest Experience* versus *Personal Experience*, and based on the discussion, various descriptions of the guest experience (i.e. personal, unique or memorable) were collapsed into a single code, *Guest Experience*. The final set of code terms are presented in alphabetical order by concept type in Table 2.

As the last step in the coding process, a sample of 29 randomly selected ladders, representing 25% of the total, were coded by a third trained research assistant. Out of a total of 137 responses, the third coder agreed on 117 of the items, indicating an intercoder

IHR	Attributes (18)	Consequences (32)		Values (3)
Table 2. Content codes	Ambience/Setting Customer service Events Family owned/operated Marketing communication Orderliness Ownership/Management Price point Product Production quantity Reservations Seated tastings Staff Sustainability Vineyard ownership Walk-ins Weather Wine club Source(s): Table by author	Affordability Atmosphere Authenticity Brand awareness Comfort Continuous improvement Customer expectations Customer loyalty Customer relationship Diversity/inclusivity Guest experience Heritage Innovation Local More customers Operate as a business Operate smoothly Organizational culture	Recognition Sense of exclusivity Staff attitude Staff development Staff engagement Staff hiring and retention Staff scheduling Staff teamwork Telling the story Test the market Value for money Wine club growth – retention Wine education Word of mouth	Helping society Integrity Sales/profit

reliability of 85%, exceeding the acceptability baseline of 80% (Allman *et al.*, 2009; Neuendorf, 2002; Wassenberg *et al.*, 2015). Table 3 provides examples of coded ladders.

Data analysis

The researchers processed the coded ladders using Python, version 3.8.2 (Van Rossum & Drake, 2009), script utilizing the pandas (The pandas development team, 2022), data analysis library, version 1.3.4, to read each ladder's codes into a list. The Python script counted the number of times each concept appeared in a ladder and the number of times a concept is associated with a subsequent concept in the same ladder.

A benefit of the means-end methodology is its ability to identify the associations between attributes, consequences and values. These associations are indicated in an implication matrix with counts of every concept's relationship to every other concept. Consistent with Reynolds and Gutman (1988), the term "ladder" indicates a sequence of concepts coded from individual respondents, and "chain" references a sequence of elements to emerge from the implication matrix. Following Klenosky *et al.* (1993), the implication matrix includes both

And they spend their money with us. (V = Sales/Profit)

Note(s): A = attribute; C = consequence; V = value

Source(s): Table by authors

Table 3. Examples of ladders and coding

The wine club. (A = Wine Club)

The idea is to have as many members as you can, so we want to do something special (e.g. individual tasting options or cave tastings) for them. (C = Guest Experience)

It's all about club retention. (C = Wine Club Growth – Retention)

That's the base that supports you during the lean times. They're the ones that are buying the most wine. (V = Sales/Profit)

We blast out emails constantly about sales. (A = Marketing Communication)

It keeps us in their mind and keeps the connection going. ($\bar{C} = Customer Relationship$)

So they want to support us. (C = Customer Loyalty)

direct and indirect associations. For example, a chain of $Staff \rightarrow Staff \ Development \rightarrow Wine \ Education$ would have two direct associations ($Staff \rightarrow Staff \ Development$; $Staff \ Development \rightarrow Wine \ Education$) and one indirect association ($Staff \rightarrow Wine \ Education$).

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The diversity of wineries in this study resulted in an unusually large implication matrix: 52×52 with 2,704 cells. Most means-end implication matrices contain many cells with a value of zero or near zero (Klenosky *et al.*, 1993). For half the concepts in Table 2, all cells in the implication matrix were zero or near zero. Most means-end studies apply a cutoff to determine which associations in the implication matrix capture the most meaningful relationships (Goldenberg *et al.*, 2000; Phillips & Reynolds, 2009; Reynolds & Gutman, 1988). A cutoff of three was chosen to illustrate which concepts were most strongly associated with each other. Any concept not associated with another concept more than the cutoff level was excluded from the implication matrix.

Table 4 presents the implication matrix. The row indicates the first concept in the association; the column indicates the second. The corresponding cell specifies the number of times that association appears directly or indirectly in the ladders. The row headings indicate the concept number used in the column headings.

Cytoscape, version 3.9.1 (Shannon *et al.*, 2003) was used to construct a hierarchical value map (HVM) that provides a graphical representation (Figure 1) of the associations in the implication matrix. The circles represent concepts, with attributes in yellow, consequences in green and values in blue. The concept code and the number of ladders expressing that concept are inside the circle. The lines between circles represent the associations between concepts, and the numbers along the lines indicate the number of ladders that include that association, directly or indirectly. The diameter of the circles and the thicknesses of the lines further emphasize the relative numbers.

Before completing the HVM, redundant associations were removed to present a more meaningful map (Goldenberg et al., 2000; Klenosky et al., 1993). Redundant associations result when $A \rightarrow B \rightarrow C$ and all three concepts exceed the cutoff level. In the HVM, the $A \rightarrow C$ association count would be reduced by the number of $A \rightarrow B \rightarrow C$ ladders because the associations would already be shown in the $A \rightarrow B$ and $B \rightarrow C$ lines. As a result, not all the associations shown in the implication matrix are illustrated on the HVM. For example, Table 4 shows that Staff led to Wine Education five times; however, in four of them, Staff led to Staff Development first and then to Wine Education. Those four ladders are shown in the HVM lines from Staff to Staff Development and from Staff Development to Wine Education. To show them again directly from Staff to Wine Education would be redundant. Since the number of associations remaining for the direct line from Staff to Wine Education does not exceed the cutoff level of 3, the line is not shown on the HVM.

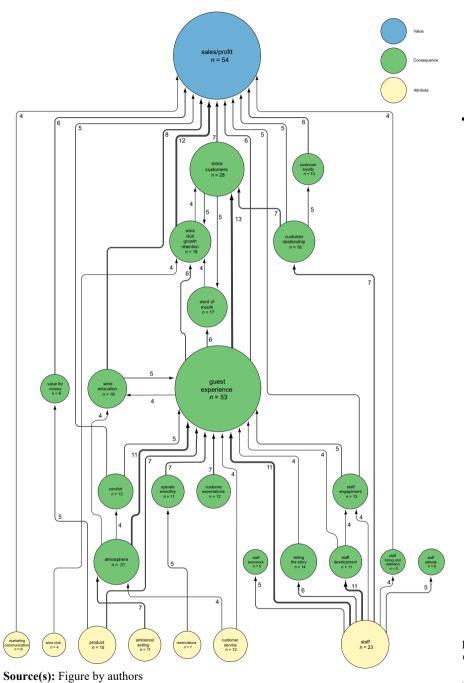
Results and discussion

A winery's approach to running the tasting room, and its goals for it, may be influenced by factors such as the winery's ownership and management structure, annual case production, the DTC sales percentage and whether the winery is independent or part of a wine group/large wine company. Furthermore, some wineries concentrate intensely on the wine itself, and other aspects of the tasting experience are secondary; other wineries emphasize the overall experience, which may include food, music, a chance to socialize or the opportunity to enjoy time outdoors in a beautiful setting, and the wine plays more of a supporting role; and many wineries focus on a total experience in which the wine has the highest priority. Some wineries are highly reliant on their wine clubs, while the wine club is less consequential for others. Overall, the ladders reflect the broad diversity of wineries and the goals (values) they have for their tasting rooms.

From To	Cl	C2	2	C2	95	77	8	63	C10	C111	C12	C 13	C 14	C15	C16	C17	C 18	V1	Out total
Attributes A1 Ambience/Setting A2 Customer service A3 Marketing communication	*/ 4				2	4 6									rc	4	9	9 4	16 37 4
Product Reservations Staff Wine club				2	7 6 13	9	2	2	11	∞	4	2	9	ro.	4	ಬ	വ	7 13 4	11 88 8
Consequences C1 Atmosphere C2 Confort C3 Customer expectations		4			13	7									-	4	4	7 6 2	37 11 15
			വ			7									+ ∞ rυ	4	0 0	6 119 10	24 20 20 7
					4 5					4						4	4	9 7 4	18 16 4
Cl3 Start teamwork Cl4 Telling the story Cl5 Value for money Cl6 Wine club growth –					4	4 4												5 6 12	13 6 16
retention C17 Wine education C18 Word of mouth					2										4			∞ ದ	13 9
Values V1 Sales/Profit In total	Ξ,	4	5	۲,	88 :	50	22	2	Ξ,	12	4	2	9	2	30	21	33	149	

Note(s): * To be read, "ambience/setting" led to "atmosphere" seven times across all respondents' ladders Source(s): Table by authors

Table 4. Implication matrix for winery tasting room operations



 $\begin{array}{c} \textbf{Figure 1.} \\ \text{Hierarchical value map} \\ \text{of winery tasting room} \\ \text{outcomes (n} = 40) \end{array}$

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Means-end concepts

Attributes. An attribute is a quality or feature regarded as an inherent part of something. Reynolds and Gutman (1988) describe attributes as the concrete aspects of the product. A business, within applicable laws, chooses what attributes to include in its products. The purpose of the first laddering question is to elicit an attribute that is important to the interviewee. This study asked, "What three aspects of the tasting room operations do you think are most important for helping the winery achieve its goals with respect to the tasting room?" The attribute identified most often was Staff, in 23 ladders (20%). The wine itself (Product) was cited in 15 ladders (13%). The third most mentioned attribute was Customer Service, in 12 ladders (10%), followed closely by Ambience/Setting in 11 (10%). Reservations with 7 (6%), Marketing Communication with 6 (5%) and Wine Club with 4 (3%) have enough associations to appear in Table 4. Another ten attributes were identified less, and they do not appear in Table 4. Collectively, they appeared in 32% of the ladders. One ladder, which was 1% of the ladders, started with a consequence and did not contain an attribute.

The Staff, Customer Service and Ambience/Setting findings support prior servicescape and winescape research (e.g. Bruwer & Alant, 2009; Bruwer & Lesschaeve, 2012; Santos et al., 2020) that confirmed the importance of elements of the winery's ambience or setting and aspects of the guest's interaction with staff and perception of customer service to a positive view of the tasting room experience. The importance attributed by the tasting room managers to Product is interesting. Studies looking at the motivation for winery tourism (Bruwer & Alant, 2009, Bruwer & Lesschaeve, 2012, and Bruwer & Rueger-Muck, 2019) found that the highest ranked factor was tasting wine; however, other factors directly related to the wine, such as find a unique wine, did not rank as highly. Further, Fountain et al. (2008) found that wine quality was insufficient to create brand loyalty. On the other hand, Nowak and Newton (2006) found that higher perceived wine quality was strongly associated with a higher level of repurchase intention, and Bruwer et al. (2013) found that perceived quality has a significant effect on brand attitudes.

Consequences. A consequence is any result a consumer derives directly or indirectly from their behavior. The consequence may be physiological or psychological and may accrue to the consumer sooner or later. Consequences differ from attributes in that people receive consequences, whereas products have attributes (Gutman, 1982). Eighteen consequences were identified more than three times each in the coding and had more than three associations with at least one concept. Guest Experience was found almost twice as many times (53) as any other consequence, accounting for 46% of the ladders. More Customers was identified 28 times, Atmosphere 21 times and Customer Relationship and Wine Club Growth – Retention 18 times each to complete the five most identified consequences. Another 13 consequences appear in Table 4, having more than three associations with at least one concept. Fourteen other consequences were identified in the coding with an insufficient number of associations with any one concept to be included in Table 4.

That *Guest Experience* is the consequence expressed most often may not be surprising given that all prior tasting room research emphasizes its importance. It is interesting that managers recognized that the overall guest experience is the important consequence and do not focus as highly on contributing factors such as the tasting room atmosphere or the staff telling the winery's story. Also the second and fourth (tied) most mentioned consequences, *More* Customers and *Wine Club Growth – Retention* respectively, are consequences that benefit only the winery and do not add to the guest experience. Since prior tasting room research has focused on the consumers, it was not clear in advance how winery-benefitting consequences would factor into the results. The importance of *Customer Relationship* aligns with previous research that found good customer relationships can help build brand attachment (Thach & Olsen, 2006) and commitment and loyalty (Nowak & Newton, 2006) and leads to higher sales (Fountain *et al.*, 2008).

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Values. Values are high-level consequences, defined by Gutman (1982) as desired endstates. Means-end studies of individual consumers often identify values in reference to an
established set of values, such as the Rokeach value survey (Rokeach, 1973) or the list of
values (Kahle & Kennedy, 1988). These values represent goals that individuals may want to
achieve in their lives, such as self-respect, social recognition, a sense of accomplishment, or
fun and enjoyment in life. Most studies of business values, in contrast, consider outwardfacing ideals such as environmental sustainability or social justice, usually under the broad
heading of corporate social responsibility. The objective of this study, however, is to identify
the ultimate goals for the winery tasting room to achieve, analogous to the goals of
individuals typically identified in means-end studies as values. Accordingly, values are
inferred from their level of importance and relative positions in the ladders as indicated in the
implication matrix and their position on the HVM.

In that sense, *Sales/Profit*, in 54 ladders, was the only value identified more than three times. Clearly, a goal of any business is to be profitable, and being profitable starts with earning revenue (sales). Nonetheless, Fountain *et al.* (2008) found that visitors frequently noted that there were few openings to purchase at the tasting or that staff did not seem interested in selling wine. Even so, one may expect a winery to have other values such as providing for the owner's financial future or preserving the land for future generations. However, this study focused specifically on the winery's goals with respect to the tasting room, and these other goals typically involve aspects of the winery's operations that reach far beyond the tasting room, even in a 100% DTC model. The values *Helping Society* and *Integrity* were identified at counts below the cutoff level.

Also, 20 ladders ended with *Guest Experience*, indicating that some tasting room managers may see creating an exceptional experience for the guest as an end in itself. Cuellar *et al.* (2015), investigating wine brands with a meaningful presence in the 3-tier system, suggested that the tasting room acts as a form of experiential marketing. For wineries in this situation, the highest goal of the tasting room may be to create an exceptional guest experience since tasting room sales are a minor part of the overall sales and not a focal point of the tasting room.

Means-end ladders. A "ladder" is a sequence of concepts coded from individual respondents (Reynolds & Gutman, 1988), generally progressing from an attribute to a consequence with a low level of abstraction to one or more consequences of higher levels of abstraction, ideally leading to a value. This section identifies individual ladders that share a common sequence (direct or indirect) of concepts. The sequences that were most shared among ladders are Reservations \rightarrow Operates Smoothly \rightarrow Guest Experience and Staff \rightarrow Staff Development \rightarrow Sales/Profit, each found in six ladders that account for 15% of respondents. (Note that these are common sequences within ladders, not necessarily the complete ladders.)

What is striking about the first sequence is that only seven respondents included *Reservations* as one of the most important attributes for the tasting room, and 86% of them included this sequence. The only attribute to generate a higher level of congruence was *Wine Club*. Only four ladders, accounting for 10% of respondents, listed Wine Club as one of the most important attributes, but all four included the sequence $Wine Club \rightarrow Wine Club Growth$ and $Retention \rightarrow Sales/Profit$.

Ladders emanating from Staff exhibited a high level of clustering, with 22 of the 27 ladders containing at least one of the following sequences: $Staff \rightarrow Staff \ Development \rightarrow Sales/Profit$, $Staff \rightarrow Staff \ Engagement \rightarrow Sales/Profit$, $Staff \rightarrow Guest \ Experience \rightarrow Sales/Profit$, $Staff \rightarrow Guest \ Experience \rightarrow Word \ of \ Mouth$, or $Staff \rightarrow Customer \ Relationship \rightarrow Sales/Profit$. By contrast, Product (the wine) was named in 15 ladders, yet the only three-concept sequence starting with Product that appeared in more than two ladders was $Product \rightarrow Value \ for \ Money \rightarrow Sales/Profit$.

Means-end chains. Whereas a ladder is a sequence of concepts from an individual respondent, a chain is a sequence of concepts that emerges from the implication matrix (Reynolds

& Gutman, 1988), with the strongest chains shown on the HVM. As explained earlier in the *Data analysis* subsection, concepts identified in ladders but not associated with another concept a sufficient number of times are excluded from the implication matrix (Table 4), and redundant indirect associations in the implication matrix have been removed from the HVM (Figure 1).

Means-end chains leading to sales/profit. Guest Experience was the most frequently mentioned concept other than Sales/Profit, and the implication matrix shows that it leads to Sales/Profit more times (19) than any other concept. As the HVM illustrates, it often gets there by way of More Customers, Word of Mouth or Wine Club Growth – Retention. Collectively, over 47% of the times the manager mentions Guest Experience, they are concerned with these future outcomes related to the current tasting room visit. Given the widespread importance of Guest Experience – 82.5% of the interviews included it in at least one ladder – the factors that influence it are extensive. Guest Experience has more concepts leading to it than any concept except Sales/Profit. Staff and Atmosphere are mentioned most often (13). Customer Expectations, Customer Service, Operate Smoothly and Product each led to Guest Experience in seven ladders. Seven other concepts led to Guest Experience often enough to include in Table 4.

Staff was the most frequently identified attribute, and it was second to Guest Experience in the number of times leading to Sales/Profit (13). The HVM shows the various ways the managers for the tasting room see staff impacting the operations. Staff led to Guest Experience as many times as it led to Sales/Profit. Eleven managers noted the importance of Staff Development. Four of those times the manager noted the importance of staff development in helping the winery educate the customers about its wines. The manager mentioned the impact staff development has on staff engagement an equal number of times, half of all associations from Staff to Staff Engagement. Other guest-related associations with Staff included its connection to Customer Relationship (7), Telling the Story (6) and More Customers (6).

Interestingly, the HVM shows tasting room managers identifying both *Guest Experience* as a consequence of *Wine Education* (5) and *Wine Education* as a consequence of *Guest Experience* (4). Tasting room managers in the first group feel that one component of creating an outstanding guest experience is providing more information about the wines, the vineyard, the grapes or whatever the winery feels is important for the customer to know to appreciate the wines more fully. One such coded ladder indicated *Reservations* \rightarrow *Operate Smoothly* \rightarrow *Wine Education* \rightarrow *Guest Experience* \rightarrow *Sales/Profit*. Managers in the second group see one consequence of creating an outstanding guest experience is that the customer then can learn about the wines. One of these coded ladders indicated $Staff \rightarrow Staff Scheduling \rightarrow Guest Experience \rightarrow Telling the Story <math>\rightarrow$ *Wine Education*.

The concepts that managers next most often identify as impacting Sales/Profit are Customer Relationship and Wine Club Growth – Retention, with 12 each. As with Guest Experience, managers that identify Customer Relationship are often concerned about its potential to affect future sales, specifically its contribution to building More Customers and creating Customer Loyalty. Although managers collectively discussed 23 concepts that led to Customer Relationship, only Staff was mentioned enough times (7) to meet the cutoff. Antecedents of Wine Club Growth – Retention that managers identified were Guest Experience (8), Customer Service (5), More Customers (5), Customer Loyalty (4) and Word of Mouth (4). Four of the 12 managers that associated Wine Club Growth – Retention with Sales/Profit started the ladder by identifying the wine club as one of the most important attributes in helping the winery achieve its tasting room goals.

Lines also go both directions between *Wine Club Growth – Retention* and *More Customers*. Some wineries make a substantial proportion of their total sales to wine club members, and growing the wine club is the prime path to having more customers. For other wineries, the wine club is a much smaller slice of the business. Wine club members are still valuable because of their high customer lifetime value, and the more customers they get to the tasting room, the more likely they will grow the wine club.

Means-end chains leading from attributes other than staff. Behind Staff, Product (the wine) was the second most cited attribute (15). Managers associated Product with Guest Experience slightly more often (7) than with Value for Money (5), but the managers went on to associate Value for Money with Sales/Profit more often (4) than they went on to associate Guest Experience with Sales/Profit (2).

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The next most frequently noted attribute was *Customer Service* (12). *Customer Service* led to associations with more concepts than any other attribute except *Staff* in Table 4. It led to *Guest Experience* more times (7) than any other consequence. It led to *Word of Mouth* as often (6) as to *Sales/Profit*. The next most often discussed attribute was *Ambience/Setting* (11), which is the physical situation such as a beautiful vineyard or exquisite tasting room or the intangible things that create the vibe. *Ambience/Setting* was associated with 16 concepts in the full implication matrix – only *Staff* and *Customer Service* had more – yet, only *Atmosphere* (7), *Guest Experience* (5) and *More Customers* (4) were associated often enough to appear in Table 4.

Conclusion

The researchers believe this is the first paper to use means-end theory to investigate the values and behaviors of the seller, specifically hospitality hosts, rather than the consumer and demonstrates that means-end is a useful approach in this context, as suggested by McIntosh and Thyne (2005) and Nunkoo and Ramkissoon (2009). By collecting data through openended laddering questions and using means-end theory to analyze the responses using content analysis, the study discovered how tasting room managers associate certain consequences with specific actions. This approach provides a more holistic view of the factors affecting the achievement of tasting room goals and the antecedents to and consequences of previously studied concepts such as customer loyalty and staff development. In doing so, it illustrates the complex set of factors impacting their values or goals, such as sales, and the interactions of those different factors.

Sales was the only values-level goal identified in the ladders a significant number of times, and Guest Experience was the dominant factor in reaching that goal. Many tasting room managers saw Guest Experience as a quasi-goal, as it ended ladders more often than any other concept except Sales. Tasting room managers widely recognize the importance of Staff in creating the guest experience and generating sales. Staff is identified as one of the most important attributes in achieving tasting room goals over 50% more often than the wine itself.

Limitations and research implications

Because it may not be surprising that *Sales* dominates as the only goal identified in the cutoff implication matrix, future research may benefit from structuring the laddering questions specifically to recognize other goals. If prior knowledge or a pilot study establishes that financial success is a dominant goal, researchers may want to consider controlling the consideration of financial incentives such as sales or profit with the aim of generating better insight into the secondary values of the hospitality business.

Moreover, this study focused specifically on the winery's goals with respect to the tasting room. Other potential goals, for example related to sustainability, integrity or helping society, typically involve aspects of the winery's operations that reach far beyond the tasting room, even in a 100% DTC model. For example, many of the wineries interviewed for this study are certified sustainable, yet sustainability was mentioned only infrequently and does not appear in the implication matrix. Barber *et al.* (2010) found that wine tourists tend to have strong environmental attitudes that result in stronger purchase intentions toward and a willingness to pay a higher price for environmentally friendly wines. A means-end approach could help determine how tasting room managers view the operations of the tasting room as supporting and communicating these broader goals.

A wide variety of wineries participated in this study, and a much larger sample size would be necessary to allow for a meaningful analysis of differences based on factors such as size, ownership or management structure, or average price of the wine. Future research studies could trade off generalizability of the results for the ability to do more in-depth analysis by focusing on wineries that meet certain specific characteristics. For example, a study could limit participating wineries to those that are small non-luxury wineries that have annual production below 5,000 cases, with all wines priced below \$50 per 750 ml bottle.

The wineries participating in this study comprised a convenience sample, which may impact the results. For example, the wineries are similar geographically, with all of them in the same state and most in the same county. Both the state and the county are commercially important wine regions, nationally and internationally. The nature and expectations of winery tasting room hospitality may be different in regions where the wine is less widely acclaimed, regions where the wine industry is in an earlier stage of development or outside the U.S. Wineries there may identify different attributes as important to the tasting room's success and different consequences or values that follow from them. Conducting a similar study in other regions may provide interesting insights for the broader wine industry.

Practical implications

With a dominant goal of generating sales, most tasting room managers recognize the overwhelming importance of the guest experience and the essential role the staff play in delivering that experience. It is encouraging that managers acknowledge the importance of *Staff Development*, which includes training. It is worth noting, however, that *Staff Development* was not associated with *Customer Relationships* or *Telling the Story* often enough to appear in Table 4. Perhaps it would benefit wineries to enhance their staff development efforts in these two areas, especially given that Joy *et al.* (2021) identified social interactions between visitors and employees as an important factor contributing to the winery hospitality experience. Since the interviews took place well into the so-called "great resignation" and many hospitality jobs were going unfilled, it was surprising that only five managers raised the issue of staff hiring and retention.

Guest Experience was the final response in 20 ladders (17%), second only to Sales/Profit and twice as often as the next most identified ladder-ending concept. The prominence of Guest Experience in the minds of managers in charge of the tasting room is not surprising. After all, definitions of wine tourism stress the importance of the wine tourist's experience (Saayman & van der Merwe, 2015). In about half the ladders in which Guest Experience is identified, the tasting room manager spoke of a specific characteristic to the experience, such as being personal, unique or memorable.

Managers seem to recognize the complex nature of the guest experience, noting 13 different concepts that led to *Guest Experience* in the ladders. Shapiro and Gómez (2014) found that ambience and service exerted the most influence on overall customer satisfaction, and managers recognized *Atmosphere*, how the customer perceives the ambience, as leading to *Guest Experience* 13 times, tied with *Staff* for the highest number. *Customer Service* was part of a 4-way tie for the third most identified concept leading to *Guest Experience* (7).

The focus on the guest experience and recognizing the importance of staff could indicate that managers ultimately understand that the execution of the tasting room experience may be more important than the specific features of the experience. Becker and Jaakkola (2020) suggest that the difference between an ordinary experience and an extraordinary experience is the intensity of the customer's response to the experience offering rather than the offering itself. As a cautionary note, Charters and Ali-Knight (2002) observed that the level of interest in wine may vary greatly among tasting room visitors, and even wine lovers may be engaged in an overall tourism experience in which the visit to the winery forms a small part of the mix of attractions. Tasting room managers would probably benefit from considering how the

experiences they offer might appeal to guests with only a passing interest in wine. The managers we interviewed discussed diversity and inclusion only seven times in total (mostly with respect to wine knowledge/experience or budget), and *Diversity/Inclusivity* was not associated with any concept more than the cutoff level.

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Theoretical implications

While there are numerous papers researching wine tourism and winery tasting rooms that take a number of different approaches, there is a scarcity of papers studying the tasting room hospitality experience from the viewpoint of the winery or the tasting room manager. This paper explores the question of what attributes of the tasting room experience the managers feel are important and how they produce consequences that lead to the tasting room achieving its goals. In doing so, it provides the basis for building a framework for analyzing winery hospitality from the winery's perspective.

This study started the laddering questions with an open-ended question about the most important aspects of the tasting room operations. Another approach is to present the interviewee with a list of attributes and ask which attribute on the list is most important (and perhaps repeat the process once or twice to explore the two or three most important attributes on the list). The winescape literature (Bruwer & Lesschaeve, 2012; Quintal *et al.*, 2022; Santos *et al.*, 2020) could provide a good basis for creating such a list and create a connection between the winescape literature and literature investigating the tasting room from the perspective of the wineries in future research.

This study exposes a gap in the theory of business values. Most research of business values considers the business's support for societal goals rather than the end goals a business may have for its own benefit or improvement. Developing a business analogy to the Rokeach value survey (Rokeach, 1973) or the list of values (Kahle & Kennedy, 1988) would be a beneficial endeavor to add to the understanding of business values.

The focus of this paper was on the goals of the winery for its tasting room business. Alternatively, a means-end approach could be used to explore how the attributes of the tasting room and offering the hospitality experience contribute toward the tasting room managers reaching their individual values. This approach could provide interesting insight into the motivations of hospitality hosts. In any case, the paper demonstrates the applicability of means-end theory to providers of hospitality services.

References

- Allman, T. L., Mittelstaedt, R. D., Martin, B., & Goldenberg, M. (2009). Exploring the motivations of BASE jumpers: Extreme sport enthusiasts. *Journal of Sport Tourism*, 14(4), 229–247, CABDirect. doi: 10.1080/14775080903453740.
- Anderson, K., & Nelgen, S. (2021). Internationalization, premiumization and diversity of the world's winegrape varieties. *Journal of Wine Research*, 32(4), 247–261. doi: 10.1080/09571264.2021. 2012444.
- Bagozzi, R. P., & Dabholkar, P. A. (1994). Consumer recycling goals and their effect on decisions to recycle: A means-end chain analysis. *Psychology and Marketing*, 11(4), 313–340. doi: 10.1002/ mar.4220110403.
- Barber, N., Taylor, D. C., & Deale, C. S. (2010). Wine tourism, environmental concerns, and purchase intention. *Journal of Travel and Tourism Marketing*, 27(2), 146–165. doi: 10.1080/10548400903579746.
- Becker, L., & Jaakkola, E. (2020). Customer experience: Fundamental premises and implications for research. *Journal of the Academy of Marketing Science*, 48(4), 630–648. doi: 10.1007/s11747-019-00718-x.
- Bruwer, J., & Alant, K. (2009). The hedonic nature of wine tourism consumption: An experiential view. International Journal of Wine Business Research, 21(3), 235–257. doi: 10.1108/17511060910985962.

- Bruwer, J., & Gross, M. (2017). A multilayered macro approach to conceptualizing the winescape construct for wine tourism. *Tourism Analysis*, 22, 497–509. doi: 10.3727/108354217X15023805452059.
- Bruwer, J., & Lesschaeve, I. (2012). Wine tourists' destination region brand image perception and antecedents: Conceptualization of a winescape framework. *Journal of Travel and Tourism Marketing*, 29(7), 611–628. doi: 10.1080/10548408.2012.719819.
- Bruwer, J., & Rueger-Muck, E. (2019). Wine tourism and hedonic experience: A motivation-based experiential view. *Tourism and Hospitality Research*, 19(4), 488–502. doi: 10.1177/1467358418781444.
- Bruwer, J., Coode, M., Saliba, A., & Herbst, F. (2013). Wine tourism experience effects of the tasting room on consumer brand loyalty. *Tourism Analysis*, 18(4), 399–414. doi: 10.3727/108354213X13736372325957.
- Charters, S., & Ali-Knight, J. (2002). Who is the wine tourist? Tourism Management, 23(3), 311–319. doi: 10.1016/S0261-5177(01)00079-6.
- Cuellar, S. S., Eyler, R. C., & Fanti, R. (2015). Experiential marketing and long-term sales. *Journal of Travel and Tourism Marketing*, 32(5), 534–553. doi: 10.1080/10548408.2014.918925.
- Escobar, C., & Gil, J. M. (2016). Marketing channels for small wineries: A means-end chain approach. New Medit, 15, 33–41.
- Forbes, S. L., Cohen, D. A., Cullen, R., Wratten, S. D., & Fountain, J. (2009). Consumer attitudes regarding environmentally sustainable wine: An exploratory study of the New Zealand marketplace. *Journal of Cleaner Production*, 17(13), 1195–1199. doi: 10.1016/j.jclepro.2009.04.008.
- Fotopoulos, C., Krystallis, A., & Ness, M. (2003). Wine produced by organic grapes in Greece: Using means—end chains analysis to reveal organic buyers' purchasing motives in comparison to the non-buyers. *Food Quality and Preference*, 14(7), 549–566. doi: 10.1016/S0950-3293(02)00130-1.
- Fountain, J., Fish, N., & Charters, S. (2008). Making a connection: Tasting rooms and brand loyalty. International Journal of Wine Business Research, 20(1), 8–21. doi: 10.1108/17511060810864589.
- Goldenberg, M., & Pronsolino, D. (2008). A means-end investigation of outcomes associated with Outward Bound and NOLS programs. *Journal of Experiential Education*, 30(3), 271–276. doi: 10. 1177/105382590703000310.
- Goldenberg, M., & Soule, K. E. (2015). A four-year follow-up of means-end outcomes from outdoor adventure programs. *Journal of Adventure Education and Outdoor Learning*, 15(4), 284–295. doi: 10.1080/14729679.2014.970343.
- Goldenberg, M. A., Klenosky, D. B., O'Leary, J. T., & Templin, T. J. (2000). A means-end investigation of ropes course experiences. *Journal of Leisure Research*, 32(2), 208–224. doi: 10.1080/00222216. 2000.11949914.
- Gutman, J. (1982). A means—end chain model based on consumer categorization processes. *Journal of Marketing*, 46(2), 60–72. doi: 10.2307/3203341.
- Hall, J., & Lockshin, L. (2000). Using means-end chains for analysing occasions—not buyers. Australasian Marketing Journal, 8(1), 45–54. doi: 10.1016/S1441-3582(00)70184-4.
- Haverila, M., Haverila, K., & Twyford, J. C. (2021). Identification of key variables and constructs in the context of wine tasting room: Importance-performance analysis. *International Journal of Wine Business Research*, 33(1), 80–101. doi: 10.1108/IIWBR-02-2020-0006.
- Hill, E., Gómez, E., Goldenberg, M., Freidt, B., Fellows, S., & Hill, L. (2014). Appalachian and pacific crest Trail hikers: A comparison of benefits and motivations. *Journal of Unconventional Parks, Tourism and Recreation Research*, 5(1), 9–16.
- Joy, A., Yoon, S., Grohmann, B., & LaTour, K. (2021). How winery tourism experience builds brand image and brand loyalty. Wine Business Journal. doi: 10.26813/001c.30210.
- Judica, F., & Steven Perkins, W. (1992). A means-end approach to the market for sparkling wines. International Journal of Wine Marketing, 4(1), 10–18. doi: 10.1108/eb008589.
- Kahle, L. R., & Kennedy, P. (1988). Using the list of values (LOV) to understand consumers. *Journal of Services Marketing*, 2(4), 49–56. doi: 10.1108/eb024742.

- Klenosky, D. B., Gengler, C. E., & Mulvey, M. S. (1993). Understanding the factors influencing ski destination choice: A means-end analytic approach. *Journal of Leisure Research*, 25(4), 362–379. doi: 10.1080/00222216.1993.11969934.
- Klenosky, D., Frauman, E., Norman, W. C., & Gengler, C. (1998). Nature-based tourists' use of interpretive services: A means-end investigation. *Journal of Tourism Studies*, 9, 26–36.
- Kolyesnikova, N., & Dodd, T. H. (2008). Effects of winery visitor group size on gratitude and obligation. *Journal of Travel Research*, 47(1), 104–112. doi: 10.1177/0047287507312411.
- Kuisma, T., Laukkanen, T., & Hiltunen, M. (2007). Mapping the reasons for resistance to Internet banking: A means-end approach. *International Journal of Information Management*, 27(2), 75–85. doi: 10.1016/j.ijinfomgt.2006.08.006.
- Leri, I., & Theodoridis, P. (2019). The effects of the winery visitor experience on emotions, satisfaction and on post-visit behaviour intentions. *Tourism Review*, 74(3), 480–502. doi: 10.1108/TR-07-2018-0092.
- Lien, M., & Goldenberg, M. (2012). Outcomes of a college wilderness orientation program. *Journal of Experiential Education*, 35(1), 253–271. doi: 10.1177/105382591203500104.
- Marlowe, B., Brown, E. A., & Zheng, T. (2016). Winery tasting-room employee training: Putting wine first in Oregon. *Journal of Quality Assurance in Hospitality and Tourism*, 17(2), 89–100. doi: 10. 1080/1528008X.2015.1034399.
- Mattessich, R. (1995). Conditional-normative accounting methodology: Incorporating value judgments and means-end relations of an applied science. *Accounting, Organizations and Society, 20*(4), 259–284. doi: 10.1016/0361-3682(94)00023-O.
- Mattila, A. (1999). An analysis of means-end hierarchies in cross-cultural context. *Journal of Hospitality and Leisure Marketing*, 6(2), 19–28. doi: 10.1300/J150v06n02_03.
- McIntosh, A. J., & Thyne, M. A. (2005). Understanding tourist behavior using means-end chain theory. Annals of Tourism Research, 32(1), 259–262, CABDirect. doi: 10.1016/j.annals.2004.05.005.
- Miles, M. B., Huberman, A. H., & Saldaña, J. (2020). *Qualitative data analysis: A methods sourcebook* (4th ed.). Los Angeles: Sage Publications.
- Neuendorf, K. (2002). The content analysis guidebook. Los Angeles: SAGE Publications, Inc.
- Nowak, L. I., & Newton, S. K. (2006). Using the tasting room experience to create loyal customers. *International Journal of Wine Marketing*, 18(3), 157–165. doi: 10.1108/09547540610704738.
- Nowak, L., Thach, L., & Olsen, J. E. (2006). Wowing the millennials: Creating brand equity in the wine industry. *Journal of Product and Brand Management*, 15(5), 316–323. doi: 10.1108/ 10610420610685712.
- Nunkoo, R., & Ramkissoon, H. (2009). Applying the means-end chain theory and the laddering technique to the study of host attitudes to tourism. *Journal of Sustainable Tourism*, 17(3), 337–355. doi: 10.1080/09669580802159735.
- Phillips, J., & Reynolds, T. (2009). A hard look at hard laddering: A comparison of studies examining the hierarchical structure of means-end theory. *Qualitative Market Research: An International Journal*, 12, 83–99. doi: 10.1108/13522750910927232.
- Quintal, V. A., Thomas, B., Phau, I., & Soldat, Z. (2022). Segmenting hedonic wine tourists using push-pull winescape attributes. Australasian Marketing Journal, 30(3), 237–245. doi: 10.1177/1839334921999478.
- Rahman, I., Stumpf, T., & Reynolds, D. (2014). A comparison of the influence of purchaser attitudes and product attributes on organic wine preferences. *Cornell Hospitality Quarterly*, 55(1), 127–134. doi: 10.1177/1938965513496314.
- Reynolds, T. J., & Gutman, J. (1988). Laddering theory, method, analysis, and interpretation. *Journal of Advertising Research*, 28(1), 11–31.
- Rokeach, M. (1973). The nature of human values. Free Press.

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- Saayman, M., & van der Merwe, A. (2015). Factors determining visitors' memorable wine-tasting experience at wineries. *Anatolia*, 26(3), 372–383, doi: 10.1080/13032917.2014.968793.
- Santos, V., Ramos, P., Almeida, N., & Santos-Pavón, E. (2020). Developing a wine experience scale: A new strategy to measure holistic behaviour of wine tourists. Sustainability, 12(19). doi: 10.3390/ su12198055.
- Shannon, P., Markiel, A., Ozier, O., Baliga, N. S., Wang, J. T., Ramage, D., ... Ideker, T. (2003). Cytoscape: A software environment for integrated models of biomolecular interaction networks. Genome Research, 13(11), 2498–2504. doi: 10.1101/gr.1239303.
- Shapiro, M., & Gómez, M. I. (2014). Customer satisfaction and sales performance in wine tasting rooms. *International Journal of Wine Business Research*, 26(1), 45–60. doi: 10.1108/IJWBR-09-2012-0026.
- Silicon Valley Bank (2022). 2022 direct-to-consumer wine survey report. Available from: https://www.svb.com/trends-insights/reports/dtc-wine-survey-report-2022 (accessed 28 August 2022).
- Skytte, H., & Bove, K. (2004). The concept of retailer value: A means-end chain analysis. Agribusiness, 20, 323–345. doi: 10.1002/agr.20010.
- Sovos ShipCompliant and Wines Vines Analytics (2022). 2022 direct-to-consumer wine shipping report. Available from: https://www.sovos.com/shipcompliant/content-library/wine-dtc-report/(accessed 5 September 2022).
- Thach, E. C., & Olsen, J. E. (2003). Customer service training in winery tasting rooms: Perceptions of effectiveness by tasting room personnel. In *Third Australian Wine Marketing Conference*, Adelaide. Available from: http://academyofwinebusiness.com/wp-content/uploads/2010/05/File-001.pdf
- Thach, E. C., & Olsen, J. (2006). The role of service quality in influencing brand attachments at winery visitor centers. *Journal of Quality Assurance in Hospitality and Tourism*, 7(3), 59–77. doi: 10. 1300/J162v07n03_04.
- The pandas development team (2022). Pandas-dev/pandas: Pandas 1.4.3 (v1.4.3). Zenodo. doi: 10.5281/zenodo.6702671.
- Thomas, L., Gómez, M. I., James Gerling, C., & Katharine Mansfield, A. (2014). The effect of tasting sheet sensory descriptors on tasting room sales. *International Journal of Wine Business Research*, 26(1), 61–72. doi: 10.1108/JJWBR-01-2013-0002.
- Thyne, M. (2001). The importance of values research for nonprofit organisations: The motivation-based values of museum visitors. *International Journal of Nonprofit and Voluntary Sector Marketing*, 6(2), 116–130. doi: 10.1002/nvsm.140.
- Van Rossum, G., & Drake, F. L. (2009). Python 3 reference manual. Scotts Valley: CA: CreateSpace.
- Wassenberg, C. L., Goldenberg, M. A., & Soule, K. E. (2015). Benefits of botanical garden visitation: A means-end study. *Urban Forestry and Urban Greening*, 14(1), 148–155. doi: 10.1016/j.ufug. 2015.01.002.
- Wine Institute (2021). COVID-19 guidance from state ABCs, San Francisco, available at: https://wineinstitute.org/our-work/compliance/covid-19-guidance-from-state-abcs/
- Wine Institute (2022). California wines pour jobs and dollars into economy. Press Release. Available from: https://wineinstitute.org/press-releases/california-wines-pour-jobs-and-dollars-into-economy/

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