

The concept of terroir: The elusive cultural elements as defined by the Central Otago Wine Region

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Abstract

The impact of the physiological elements of terroir, soil, climate, and topography on the taste of wine is well accepted in wine research. Less research has been conducted on the cultural interposition of man concerning tradition, environmental orientation, and information and social exchange within wine regions in enhancing terroir. In spite of deficiency in the literature concerning the cultural elements of terroir, scholars suggest that they are of equal importance to the physiological elements in the concept of terroir. Because terroir is a distinctive marker of wine quality, terroir matters to consumers purchasing premium wines. Therefore, to provide a holistic delineation of terroir absent in the literature, this qualitative study defines the physiological and cultural elements of terroir for a particular wine region, the Central Otago Wine Region in the South Island of New Zealand, a New World wine region. The study was conducted through personal interviews with 24 vintners, viticulturalists, and managers associated with the wineries of the region. The findings demystified the cultural meaning of terroir as delineated by the regional constituents. The results are important to academia as it expands the literature on terroir and wine marketing. For practicum, the findings are advantageous for other regions striving to differentiate their wines in a decidedly competitive global marketplace.

Key Words: terroir, wine marketing, wine regions

1. INTRODUCTION

'Terroir' is a derivative of the French word for soil, *terre*, (Murray, Bradley, Craigie, and Onions, 1989, p. 219) and is an idiosyncratic word that does not translate easily from French to any another language. In fact, many authors writing about the subject of wine avoid defining it (Hancock, 1999; Robinson, 1999). Much attention has been given to the concept of terroir and studies support the connection between the earth and the quality and typicity of wines (Hancock, 1999; Trubeck, 2008; White, 2003; Wilson, 1998). Specifically, the soil, climate, and topography impact the taste of grapes, therefore, the taste of the wines, which elevates the reputation of the wine, the winery, and even the vineyard.

Many studies relate to a technical-scientific relationship between the physiological aspects of the agricultural and winemaking activities of wine production. However, some authors emphasize the intangible, cultural aspects of terroir, for example, the people being connected to the land and the traditions of an area (Deloire, Prévost, and Kelly, 2008; Gade, 2004; Van Leeuwen and Seguin, 2006; Vaudour, 2002; Wilson, 1998). While the composition of the physiological aspects of wine making are readily acknowledged and agreed upon, the cultural factors are not. For example, according to Wilson (1998, p.55) "The culture of the site (racial and religious make-up, *morés*, the economic and educational attainment of its peoples)" is integrated with the physiological components of terroir, but without an in-depth explanation. Recent research indicates that a combination of the physiological and cultural elements is important in the quality and presentation of the wine to the world (Beverland, 2004; Moran, 2001; Vaudour, 2002). In particular, Vaudour (2002) posits that the "conscience" component, the cultural and sociological identity, and the "slogan" or marketing element are linked to the physiological factors in the marketing of premium wines to gain emotional attachment with consumers (p. 120). However, without a clear identification of the cultural elements, an effective promotional campaign cannot be developed, thus undermining a unified regional marketing effort. Therefore, this study determined not only how the physiological factors are defined for a particular wine region, but also the cultural factors in an effort to clarify this elusive but significant element of terroir.

2. BACKGROUND OF TERROIR

Although the origins of the idea of terroir are unclear, different types and styles of wine gained prominence even in ancient Mesopotamia as early as the fourth century B.C. (Pellechia, 2006). Today, terroir is historically associated with French winemaking, and features significantly in promoting a passionate other-worldly, yet apparently, scientific aspect of that country's wines. However, wineries throughout the world now claim to have terroir. Whether associated with a wine, winery, vineyard, or sections of vineyards, the word terroir projects a somewhat spiritual level of quality. From a commercial perspective, the marker of terroir carries heavy weight with wine critics, therefore is important to serious wine consumers (Hancock, 1999; Robinson, 1999). Thus, marketability of wines from various regions, specific vineyards, and producers is affected by a strong link to terroir (Aylward, 2005; Aylward, 2008).

Terroir offers a labyrinth of perspectives. The direct, physiological elements of terroir, soil, climate and topography, are widely accepted and generally agreed upon as critical. In relation to wine, neighboring vineyards can indeed have different characteristics caused by subtle soil differences. Additionally, temperature and precipitation are key components in climate variation (Bohmrich, 1996, Halliday, 1993, White, 2003). Likewise, the topography of a particular vineyard or section plays a significant role in winemaking (Bohmrich, 1996).

However, some researchers argue that there are other indirect influences that, although important, are not well researched. There is some support in the literature for introducing a cultural aspect to terroir which, of course, adds to its complexity, but not to the clarity of the meaning (Wilson, 1998). For example, human motivations, attitudes, and beliefs are stated as being part of the composition of terroir, but are never precisely explained by scholars (Veseth, 2005). Emmanuelle Vaudour (2002) a French wine researcher, introduced the concept that identity or “conscience” type of terroir consists of “ancestry, authenticity, and tradition” (p. 119). Gade (2004) expands the concept of terroir to human knowledge and skills learned in the past and passed on to future generations, a type of legacy. Likewise, Demossier (2001) contends that terroir could be seen as less geographically connected, instead has a historical perspective– that of producers assigning new meaning to the past and re-writing the history of the location.

In an interview with Trubek (2004), Alain Carbonneau, a Professor of Viticulture at École Nationale Supérieure Agronomique in Montpellier indicated that the French understand the meaning of terroir in the contexts of culture and landscape and their traditional relationship to a farming lifestyle. He stated further that the rest of the world interprets terroir on a scientific level of soil, climate, and topography and ignores the traditional attributes (those of a cultural nature) that the French apply to terroir. The cultural side of terroir is a critical part of the controversy between the Old World and New World (Americas, Africa, Australia, New Zealand) wine producing areas with the Old World indicating that they alone can claim to have terroir because of these attributes. Therefore, this study delineated the physiological and ambiguous cultural elements of a particular New World wine region.

3. OLD WORLD/NEW WORLD CONTROVERSY

Terroir in French wine arose from a comeback from disaster. In 1865, a small number of wine producers experienced the death of their vines due to *Phylloxera*, a microscopic insect living in the vine roots (Pellechia, 2006). It spread rapidly throughout France and Europe threatening to eradicate the entire wine industry. To help rebuild the industry in France once *Phylloxera* was under control, *Appellation d’Origine Contrôlée* (AOC), a categorization system for the major wine regions in France, was established in 1935 to designate major classifications of quality (Gade, 2004). Through this system of regulation, France has elevated the promotion of its wine. The quality is assumed by consumers to be tightly controlled and uniquely defined and by this logic, France claims to be a premium wine producer with authentic terroir (Aylward, 2005; Trubek, 2008).

European colonial expansion into new territories from the 1500s gave rise to New World wines (Phillips, 2000). The explorers brought grape vines with them and established modest wine production in the Americas, Africa, Australia, New Zealand, and later China and India, although commercial production was not seen until the mid-19th century. However, Europeans, particularly the French, did not acknowledge it as quality wine. This Old World-New World quality perspective favored the Old World growers and continued until an American wine won a blind taste test in Paris 1976 (Veseth, 2005). This caused much consternation among the French, however, they were very confident that the stringent rules of their AOC, limiting production and controlling wine quality of regions, enabled them uniquely to continue to claim terroir. Customers began to recognize distinctive terroir associated with specific places, thus increasing demand for wines containing the elusive characteristic (Aylward, 2005).

New World wine countries have expropriated terroir as a quality marker and have applied it to their wine environments, with the Old World disputing the claim. The concept of terroir is prone to attract controversy at the level of eco-systems, oenological (winemaking), science, politics, and indeed, as a tool in marketing practice. Terroir is important in marketing with its link to specific places (Johnson and Bruwer, 2007). From a marketing perspective it is clear that terroir has market value and it links consumer to vineyard (Cullum, 2006). However, as noted above, terroir comprises more than the physical elements of the place, but these other “cultural” or people elements that are not well-defined (Bohmrich, 1996; Vaudour, 2002; Wilson, 1998). This research has identified those important cultural elements of terroir integrated with the physical elements in one particular New World wine region.

There are significant economic reasons for the increased importance of the claim to terroir. From modest beginnings, the wine industry has grown into a global marketing entity. In recent years, the industry world-wide has realized moderate growth, however, it exceeded USD\$107 billion in 1995, increased to USD\$257.5 billion in 2011, and is expected to grow to \$327.8 billion by 2016 (Wine: Global Industry Guide, 2011). In vying for an increased share of this large world market, competitive conflict has arisen between the producers of Old World wine in Europe and New World producers. Wines substantiated by wine critics as expressing terroir obtain high customer demand thus escalating revenues for wineries (Beverland, 2004).

Competition between the Old and New Worlds has accelerated because younger consumers from traditional wine countries, such as France, Italy, Spain, and Portugal have decreased the amount of wine consumed on a daily basis (Demossier, 2001; Global Wine Consumption, 2008; Macle, 2008). However, a new group of “occasional” drinkers is seeking premium rather than ordinary wines and New World wines are beginning to meet their needs. Therefore, a New World region’s or winery’s claim to the quality identification of terroir has become more important in attracting consumers seeking high-end wines (Beverland, 2004; Charters, 2006; Gil & Mercedes, 1999; Santos, Blanco, and Fernández, 2006; Thode and Maskulka, 1998).

Because terroir has become an important link to wine quality impacting consumer decisions and it is argued in the literature that there are cultural (albeit with little explanation) and physiological elements in its meaning, it would seem important to understand all of the aspects that comprise it. Therefore, a specific research aim in the study was to understand and analyze the physiological and cultural elements of terroir in a New World wine region.

4. RESEARCH CONTEXT – CENTRAL OTAGO WINE REGION

This research was conducted in the Central Otago Wine Region in the South Island of New Zealand (see Appendix A for Regional Map). The region began to achieve global recognition in 1864 after the discovery of gold. This attracted a rambunctious group of pioneers willing to take substantial risks in the gold-mining effort, similar to the wine producers of the region today (Oram, 2004). At 45° south, this is the world’s southernmost winemaking region and also New Zealand’s highest in altitude. The climate is unpredictable, resulting in a precarious grape-growing environment. With fewer than 100 small-production wineries, the region is still considered young as it began seriously producing premium Pinot Noir and Riesling in the 1990s (COWA, 2013; Oram, 2004). Currently, 74% of the wine produced is Pinot Noir and the region is receiving significant worldwide acclaim for the full-fruit, yet earthy quality of Pinot Noir it produces (Prince of Pinot, 2006; Robinson, 1999).

The small producers recognized that they did not have individual market clout and could more successfully develop regional recognition by working together on some activities, even though they were competitors. This strategy, strongly dictated by an uncertain climate resulting in less production, focuses on producing high-quality wines, likely to secure premium prices in the marketplace (Caple, 2012; Harmon, 2005; Top ten Otago Pinot Noir, 2009). Central Otago wineries also claim to have terroir as the specific physiological elements of the region (climate, soil, and topography) are often linked to premium Pinot Noir producing areas. Because of the presence of terroir in the regional wines, as proclaimed by wine critics, and the fact that it is a new region in the process of heightening its distinctiveness, the region was deemed ideal to identify and analyze the cultural elements of terroir (Robinson, 1999).

5. RESEARCH METHODS

The method of research was a qualitative, single-case study unraveling *how* winery personnel understood what terroir meant for their region. Since the cultural elements of terroir are claimed to be derived from the people living in a region as stated in the literature, it made sense to capture individual explanations and reflections from people who were involved in the day-to-day process of producing wine. Therefore, in-depth, open-ended interviewing was the appropriate method of data collection for this study. The interview was semi-structured, encouraging participants to speak about their connection to the place of Central Otago and their interpretation of the terroir of the region. Twenty-four owners, vintners, and viticulturalists were interviewed with a final interview with one of the wine-producing founders of the region (see Appendix B for criteria for choosing the participants).

After the interviews were transcribed by an outside professional, content analysis was used because this method has been generally accepted as a useful means of textual analysis by researchers to interpret meaning (Silverman, 2001; Weber, 1990). The transcripts were read in detail and significant statements were coded descriptively. The descriptive codes or categories across all the interviews were reviewed to see how they linked together or did not seem to fit in developing themes and patterns. Many general themes began to emerge, such as the personal meaning the participants ascribed to the physical place of Central Otago. This included engaging in physical activities associated with the region, enjoying the beautiful landscape, and a sense of permanence or “home”. These themes allowed a semblance of the cultural elements of Central Otago terroir to emerge.

A qualitative data analysis software tool, NVivo®, was chosen for this study as it provides advanced coding and data manipulation (Gilbert, 2002). NVivo® assisted in sorting through enormous amounts of text and associating codes and patterns with text (quotations).

6. RESULTS OF STUDY

This study demystified and defined the elusive cultural elements of terroir for Central Otago so often glossed over in the literature (Demossier, 2004; Trubek, 2004; Vaudour 2002; Wilson, 1998). In the participants’ minds, these cultural elements are embodied in their wines as much as the physiological elements are. The patterns and themes emerging from the interviews concerning cultural elements are significant because they have not been revealed in other research and the findings substantially expand the literature of terroir and wine marketing. Practitioners can also benefit by understanding the important link between the physiological and cultural aspects of terroir, and marketing regional premium wines.

In the following section, the participants' viewpoints of the physiological and cultural aspects of terroir associated with the region are delineated.

6.1 Physiological Aspects of Terroir

6.1.1. *Soil, climate, and topography*

While the *physical* elements of the terroir - soil, climate, and topography, were part of the Central Otago region long before the wine was produced there, of interest in this study was the perception of the elements from the participants' viewpoints. An important part of Central Otago's terroir is that the winery personnel are beginning to understand the nuances and differences of each section of their vineyards. As the vintner/owner from a Wanaka winery stated:

To have an expression of terroir from a particular vineyard like this one, will take longer to come through in the taste because it's a matter of the winemaker understanding the site.

This is important to terroir as the roots have now matured and penetrated the soil more deeply and the "taste" of the earth is more strongly reflected in the taste of the wine. The vintner at a Cromwell winery reinforced this idea:

All the decisions that you make, how you set your winery up, are all based around what we see coming from the vineyard - these types of grapes, we get these flavors, and so you know it's going to be making this type of wine, and we have to equip ourselves to follow the best path.

With this preface, all the participants agreed that climate and soil imparted individuality to their wines and some claimed it to be an expression of the region, others the sub-regions or the individual vineyards. Comments like this were heard:

Owner in Alexandra: You might say the broad picture of Central terroir is that there is a similar product coming off similar quality berries and similar quality wine coming off the whole lot. There must be a sort of a blanket that you could throw over the whole place and say this is what it looks like.

A theme emerging from the study was that the participants did believe that their wines exhibited terroir associated with the soil, climate, and topography. They also emphasized the importance of proclaiming and promoting *regional* terroir, not individual vineyard or sub-region, to further establish the distinctiveness of the wine in association with the region.

6.1.2 *Physical human intervention*

Another theme that emerged among the wineries was the importance of "natural" wine production and grape growing to allow true terroir to come through. This means that the winemaker does not chemically alter the wine. As the winemaker from a Gibbston Valley winery indicated, "It's almost what I don't do rather than what I do." Likewise, another way of letting the natural terroir in wine emerge is through vineyard management techniques, such as reduction in the use of machinery, pesticides, and herbicides. All grapes are picked by hand and organic techniques were being adopted by many wineries. As the owner of a Wanaka winery stated:

You're backing away from more and more from winemaker influence and just trying to show what the terroir can do.

A vintner from a Bannockburn winery added this:terroir

We're focusing a lot more on expressing our terroir or our sense of place in our wines. For terroir, natural approaches in the vineyard will help accentuate whatever difference we have on our patch of ground.

6.1.3 Harsh Climate

Throughout the analysis, it was evident that the physiological elements were tightly linked to the physiological aspects of terroir. For example, the expression of the harshness of the climate in which they grew grapes was mentioned repeatedly. This is understandable, because it drives the persistence necessary to produce wine in Central Otago.

Vintner of a Bannockburn winery: *We're so used to it, you know. One day is it hot and about 30 degrees and the next day it snows!*

Viticulturalist of an Alexandra winery: *The weather just doesn't cooperate and people have no idea how volatile this climate is, and we are used to incredible change.*

The fight against climate is particularly difficult with their "policy" of having natural practices and limiting machinery, such as windmills, to deter frost. They all know what they are facing and the harsh climate and their strong will to overcome odds are embedded in their approach to viticulture.

In summary, all of the participants recognized that their wines reflected physiological aspects of terroir. They were also adamant that regional terroir should be emphasized, and should not be associated just with individual wines, vineyards, or wineries. This ideology of proclaiming a united stance heavily influences the ethos of the region and cultural aspects of terroir.

6.2 Cultural aspects of terroir

An important theme emerging from in-depth interviews about terroir, was the human aspect associated with it. Many winery personnel felt that the physical elements of terroir could not be separated from the people, a link that had been previously suggested in the literature (Trubek, 2004; Vaudour, 2002; Wilson, 1998). However little empirical research exists to support this connection or provide detailed explanation. Some comments by the study participants about the human connection to the individuality of their wines were:

Owner in Alexandra: *I'm of the opinion that terroir is not just of the earth, the rainfall and the heat, but it's the human element and the knowledge and the pairing over hundreds of years of looking at what plants go where and that sort of stuff.*

Owner in Bendigo: *Climate is part of the terroir, and I also think the way the industry has evolved, I actually think the people are part of the terroir.*

In probing further into the participants' thoughts of why and how people were included in their formula of terroir, it became more difficult for them to articulate, reflecting the abstruse nature of the cultural aspects of terroir. This study was valuable because several themes and patterns evolved through the process of questioning and interpretation, illuminating the latent cultural elements of Central Otago terroir. Four main themes emerged from the analysis of the interview data: Pioneers, Attachment to Place, Collaboration, and Pride and Passion.

6.2.1 Collaboration

Collaboration is part of the defining identity of Central Otago and is the most important factor in their success, both in marketing their wines and in maintaining quality. They have received domestic and global recognition for their wines and that motivates them to produce better wine. They hold each other to high standards. They maintain wine quality through open exchange of knowledge that incorporates other Pinot Noir producing wineries around the world, not just Central Otago. In a sense, they contribute to their terroir, but their terroir motivates them. A viticulturalist in the Bannockburn sub-region stated:

It's being part of a Pinot Noir community, more than a Central Otago community here. There is a huge history of information sharing and pushing quality.

Owner from Bendigo: *And, within and outside of New Zealand, people look at Central Otago as... held up as one of the top areas to grow Pinot Noir.*

Vintner from Gibbston Valley: *I believe that terroir is not just of the earth, but it's the human element and shared knowledge.*

6.2.2 Pioneers

Early wine pioneers in Central Otago were attracted to Central Otago and overcame the odds to produce premium wines through perseverance. Their isolation from the rest of the world means they have to share knowledge and risks in an effort to sustain and enhance the quality of their wines. Also, the harsh climate means that annually the participants go through suspenseful situations in fighting frost and insects. This "going against the odds" attitude motivates them to continue to express their distinctive terroir through premium wine production. As expressed by a viticulturalist in the Banockburn sub-region:

We're all new to it, really. Because it's such a new area, that's probably what makes us all band together.

And by an owner in Wanaka: *I just think it's people who want to make the best wine possible and probably because everyone outside Central Otago said that grapes could never be grown here and good wine could never be made. We were always wanting to show that it could be done.*

6.2.3 Attachment to Place

The attraction to the place is more to the people than just being able to produce premium wine. They enjoy the mountainous landscape and the rural environment. Their lifestyle involves outdoor activities and solid community commitment. This "love of the land"

evolved into respect for what the soil and climate could give them, although constant challenges are present. A vintner in Alexandra stated:

I think it [people wanting to make excellent wine] happens quite easily because people are just gobsmacked by the beauty of the region – the mountains, the lakes and rivers.

And from an owner in Gibbston Valley: *When I'm not here [winery], you can find me fishing on a stream. We love Central.*

An owner/vintner in Wanaka had yet another viewpoint of terroir. His vineyards and winery are completely biodynamic, so he is very connected to the concept of being a caretaker of the earth. Regarding terroir he indicated: "I'm not a religious person, I'm just saying that the intent is to glorify nature, that is to say, this is actually a wine that belongs to a place. We should go back to hundreds of years ago when winemakers were introspective and humble and were filled with humility for the soil and their surroundings." So, his concept of terroir is one of a more spiritual nature or respect for the earth, instilling pride in producing excellent wine. As he has some of the oldest vines in the region, his terroir is "stronger" than other wineries and that has an impact on his thinking, therefore on the way his vineyards and winemaking are managed.

6.2.4 Pride and Passion

Passion and collaboration are tied to producing the best wine possible. The wineries' collaboration assists in enhancing the regional terroir, or the distinctiveness of the region. There is another aspect to it - they do not want to disappoint others or be the one who produces lesser quality wine by not expressing Central Otago's terroir. As the owner/vintner from an Alexandra winery said: "You want to bring people up, but you also don't want to let them down." Clearly, collaboration assists in sustaining and enhancing terroir, but the mirror image of this exists. That is, terroir and with it differentiation, assists in collaboration and sustaining pride and passion – it is a unifying factor physically and culturally tying all the wineries together. As an owner in Cromwell indicated:

"As a group of winemakers, we've been very supportive of each other, we've shared information, shared ideas, so that the terroir of Central Otago embraces the winemaking aspect. That sort of passion - the striving to make the best wine and to look at what your raw materials are, the sun, the light, the soils etc, I think that does, to some extent, set Central Otago aside from other regions in the world."

In the case of Central Otago, it appears as though *their* terroir and *their* regional identity cannot be separated. Differentiation is important to the regional wineries both from commercial and pride perspectives, therefore they collaborate to enhance their terroir. And, they work together to project a united image through their marketing efforts. As a Cromwell owner/vintner said: "That's why I say we have to be ourselves, we have to let our individuality come through in our wines. I mean not us as people but us as a region".

As a regional founder stated:

And even the guys behind the counter, they know where Central Otago is and they know what you do. And to me that's amazing, in just 15 years of being out there, marketing- 10 years really in terms of most of the wines that are available now. We have gotten huge recognition in a short time. And I think most of us, when we go away and do a tasting anywhere we're telling the regional story as well. We're talking about Central Otago and what makes us different. And our wines are part of that so obviously, we talk about the regional terroir, the regional difference and again that isolation factor, the distance from other regions.

In summary, in the minds of the participants, there is a distinctive, *differentiated* taste associated with the attributes of the region and its people. The cultural aspects of terroir are embodied in the identity of the region as described by the participants. Maintaining terroir is dependent upon producing quality wine. One of the unique Central Otago cultural aspects is the concept of collaboration, exchanging wine making and vineyard management techniques facilitating the enhancement of terroir. So the soil, climate, and topography help to differentiate the wines, but the distinctive regional marketing “story” is powerful because of the interplay between the physiological factors and the cultural elements of terroir. From a marketing perspective, the physiological elements are a given because a premium wine exhibits the soil, climate, and topography of an area. However, the real differentiators in the marketplace are the cultural elements of terroir or how the people interact with the place. This is a concept that can be used effectively in marketing communication.

A representation of the embodiment of the physiological and cultural aspects of terroir is depicted in Figure 1. This figure summarizes the basis of terroir for the region in the soil, topography, and climate. Human intervention is integral with how the vineyard is managed and how the wine is made. The cultural elements are particular to Central Otago including the pioneering, “can do” attitude, the participants attachment to the place, their willingness to collaborate to produce excellence in the region, and their pride and passion in producing premium wine. These elements were found to be in contrast to previous literature accentuating tradition and history. Lacking these elements, the regional constituents attached their own meaning and definition to their terroir.

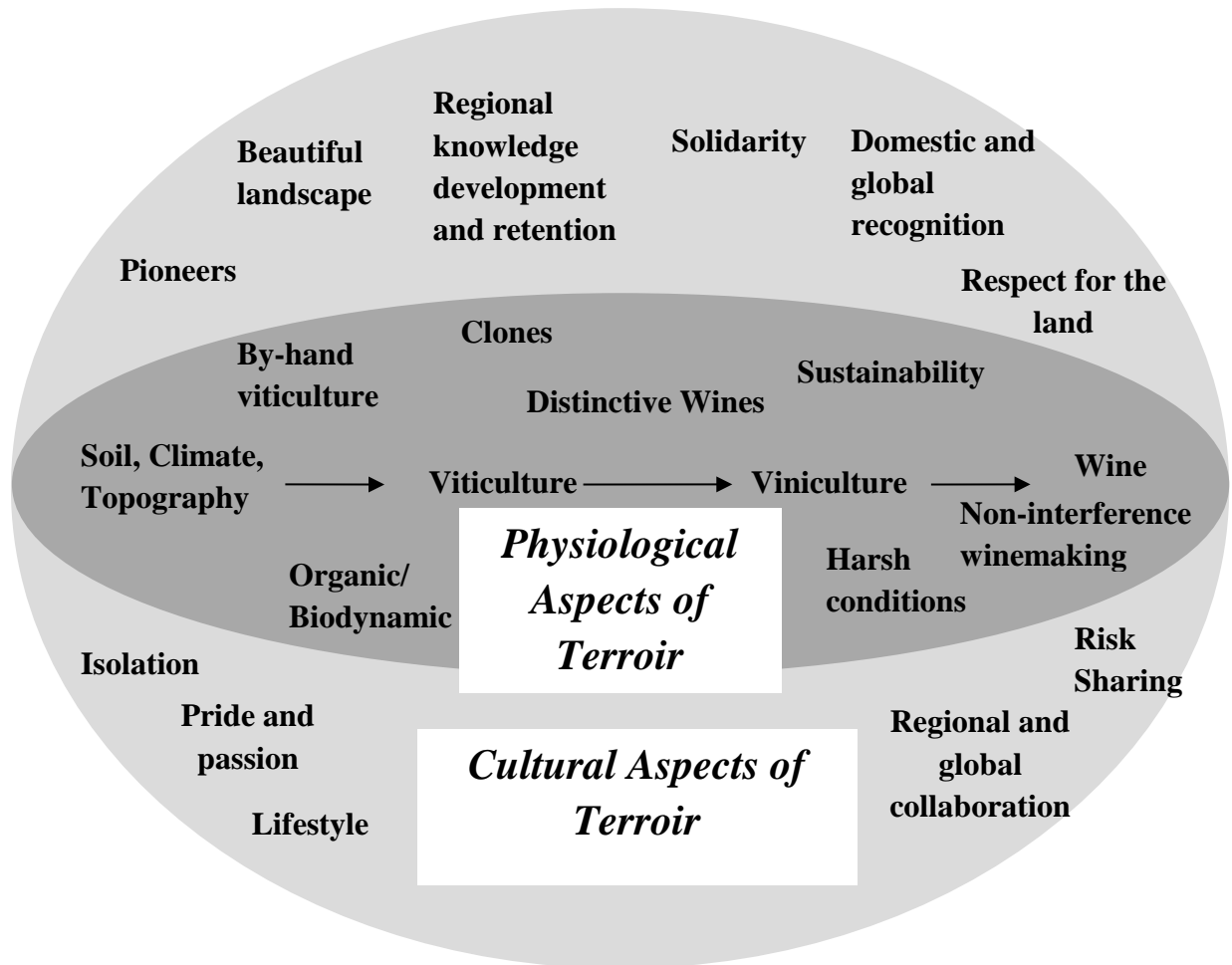


Figure 1. Elements of the Physiological Aspects and the Cultural Elements of Terroir

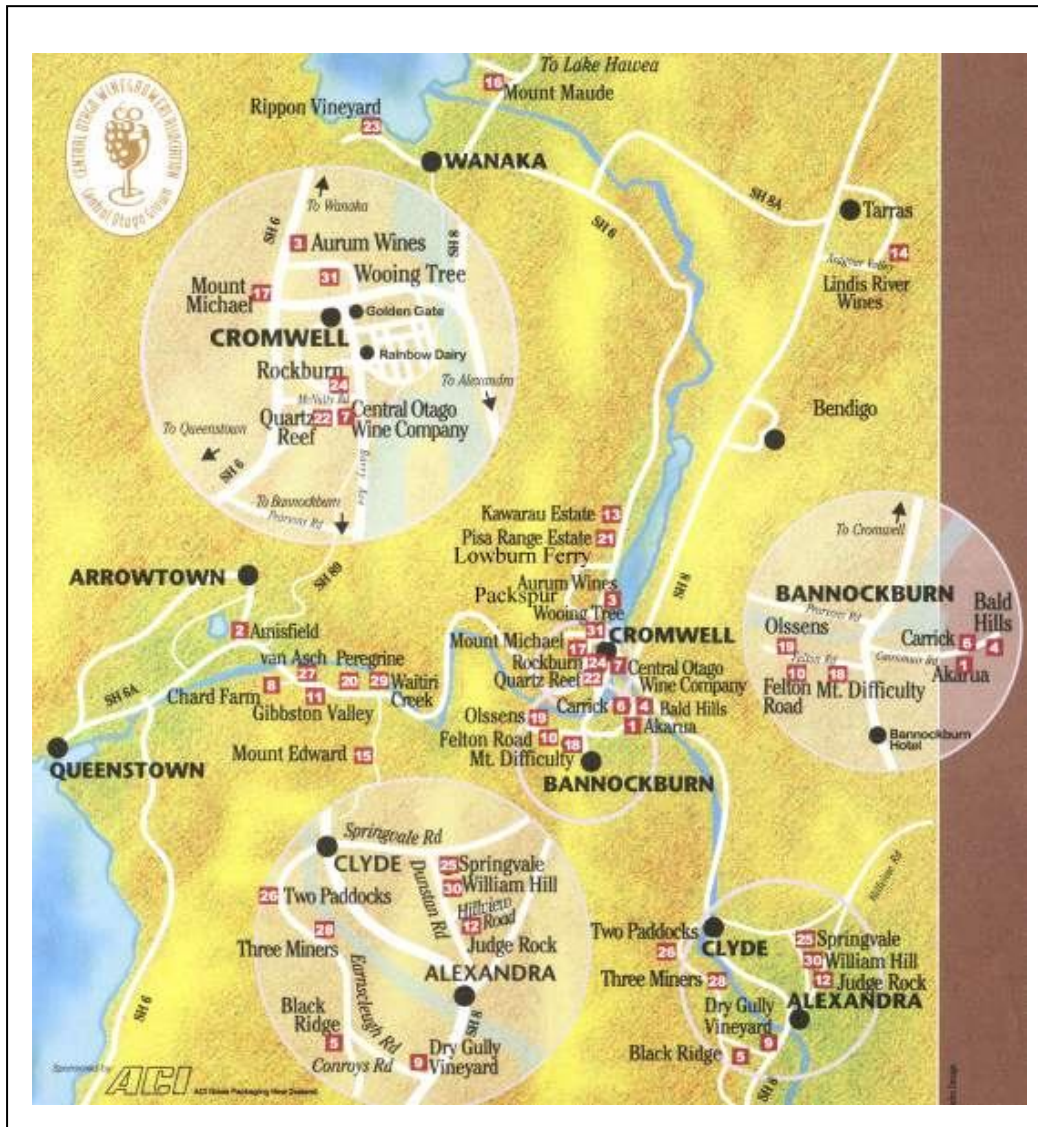
This research has defined the cultural aspects of terroir, which until now has been ignored in the literature. The results are insightful because the cultural or human elements of terroir are important to a region in projecting a distinctive global image of the wine. The participants acknowledged the existence of the physiological aspects of the region but indicated that there was more to terroir than those elements. Their emotional attachment to the place with its beautiful landscape yet harsh climate, the desire to overcome the odds, pride and passion, and the willingness to collaborate to produce premium are embodied in their wines. The integration of the distinctive elements of the physiological and cultural elements of terroir in a region has not been researched previously and significantly contributes to academic research on terroir. Likewise, the findings of this study are useful to management because the factors defining the cultural elements of terroir were determined for a region. These elements are used extensively by the participants in marketing communication to distinguish Central Otago wines in the global marketplace. Regional entities could follow Central Otago’s strategy by linking constituents’ feelings about a place to marketing messages. Future research could include similar studies in different wine areas or conducting research from a consumer viewpoint to establish a different lens on the physiological and cultural elements of terroir.

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Appendix A – Central Otago Wine Map



Source: COWA (2012). *Wine Map: Region*. Retrieved from <http://www.cowa.org.nz/downloads/maps/main-map.pdf> [Accessed 6 June, 2012].

Appendix B

Criteria for choosing participants

1. Experience and expertise in the region. People with a continuum of experience were chosen. It was important for the participants to be knowledgeable about the history of the region and understand the role terroir did or did not play in their wines. However, the viewpoints of newcomers to the regions were significant also, to determine if there were similarities or contrasts between the two groups. Demographically, newcomers ranged in age from 30-45 and people who had been in the region longer from ages 40-70.
2. Represented a continuum of new to old wineries, which typically aligned with smaller to larger production. Differences could exist in the interpretation of terroir and general knowledge of the region among wineries with different production levels, therefore all sizes were included.
3. Represented all of the six sub-regions of Central Otago. Although the study was concerning the terroir of Central Otago, it was important to determine if there were similarities or differences within the sub-regions and gain understanding from all of them. Since there were physical elements impacting wines from each sub-region, it was important to determine if the cultural elements were expressed differently
4. Primarily produce Pinot Noir as that wine varietal is tightly linked to regional recognition. Globally, Pinot Noir is a premium wine often associated with terroir.
5. Produce their own wine and bottle single-vineyard (bottled wines come from one specific vineyard) wines, so they employed vintners who were important respondents in the study. As this is a newly-formed region, not all wineries produce their own wine. The participants needed to have extensive knowledge of their individual wines to enable them to respond to the questions about the meaning of terroir.