

Exploring structural and strategic correlates of difficulties in the internationalisation process of Italian wine SMEs[☆]

Christopher Karl Köhr*, Luca Camanzi, Giulio Malorgio

Department of Agricultural and Food Sciences, University of Bologna, Italy

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Abstract

Internationalisation has been a key strategy for businesses around the world over the last decades. Nowadays, the European wine sector finds itself in an increasingly competitive international environment, which is characterised by mature and declining per capita wine consumption in traditional markets and increasing competition from new emerging wine producing countries. Structurally, this sector is characterised by a vast majority of family businesses and faces several particularities. This research investigates the perception of difficulties in the internationalisation process of small and medium wineries in two emerging Italian wine exporting regions. It is found that the difficulties perceived in the internationalisation process depend on strategic and structural factors. The strategic factors highlighted in this paper are the degree of international diversification and the geographic scope of a firm's export activities. The structural factors relate to the characteristics of the exported goods, the management and the size of a firm. The findings are discussed in the light of recent developments of Italian wine exports and their implications for the Italian wine sector are derived.

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Keywords: Internationalisation; SME; Italy

1. Introduction

Internationalisation has been identified a key driver of firm growth and an important strategy for businesses to diversify their operational risk (Johanson and Vahlne, 1977; Leonidou, 2004). Hence, firms that do not consider selling their products and services internationally put themselves at a disadvantage. Particularly the current change of global wine consumption pattern forces wine businesses to reconsider their distribution strategies in order to ensure profitability and survival on the long run (Mariani et al., 2014a). This development is a key concern especially for many small and medium businesses (Pomarici, 2016). In Italy, a shift in demand for Italian exports towards higher quality wines has opened an important opportunity for small and medium businesses (Corsi et al., 2004). However, during the internationalisation process, businesses face

managerial, financial and market-related barriers with respect to their activities. These challenges are linked to structural characteristics and the strategic decisions a business takes during this process of internationalisation. The examination of related obstacles and problems has been an important field of study among researchers in the past (Katsikeas and Morgan, 1994; Saeed and Vincent, 2011; Azzi da Silva and da Rocha, 2001).

International trade is a topic of foremost interest at the European level. This can be seen from commissioned dedicated research by the European Commission (Reinstaller et al., 2010). However, the vast majority of past studies have focused on MNEs¹ (Laufs and Schwens, 2014) and large manufacturing firms in the United States (Hitt et al., 2006), while small and medium sized firms have received less attention in the past (Chiao et al., 2006). The European wine sector is predominantly shaped up by small and medium enterprises (European Parliament, 2012). Existing research on

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*Corresponding author.

E-mail addresses: christopherkarl.kohr@unibo.it (C.K. Köhr), giulio.malorgio@unibo.it (L. Camanzi), luca.camanzi@unibo.it (G. Malorgio).

¹MNEs: Multinational Enterprises

internationalisation in SMEs² (Paul et al., 2017) lacks of the consideration of sector-specific needs of the wine industry. These knowledge gaps and the past studies' limited transferability to the wine sector provide the starting point for dedicated research. The influencing effects of structural characteristics and strategic action in the process of internationalisation are important to understand in an age shaped by increasing transnational trade relationships, yet no dedicated literature has jointly investigated specific structural and strategic in the wine sector. Identifying the particularities that apply for businesses in the European wine sector is the purpose of this research.

The exploration of the structural and strategic correlates discussed above is not only important for future scholarly research but also valuable guidance to industry practitioners and policy makers. For this reason, the present study investigates how structural firm characteristics and strategic actions relate to the perception of difficulties in the internationalisation process of SMEs in the Italian wine sector. Understanding obstacles related to the internationalisation process can help different stakeholder groups to support the economic growth of small businesses in the wine sector. Results help management teams to take proactive measures to influence the effects of export barriers and their perception. Educators may support this process by providing managers with relevant skills in achieving this goal. Policy makers can better understand the needs of small and medium firms and better evaluate their related difficulties and derive implications in the policy making process. Finally, scholars can consider the findings of this research when developing or validating related frameworks in internationalisation research.

2. Literature review and tested hypotheses

The phenomenon of international trade and the resulting process of internationalisation³ relates at its core to the unique resources of a firm, which allow the same to develop and sustain a competitive advantage in the marketplace (Barney, 1991). A major source of competitive advantage in the agricultural sector is largely related to the location of production and its related uniqueness, which in the European context is protected by European law (Morrison and Rabelotti, 2017). The choice to internationalise involves difficulties, which need to be overcome. Previous research has shown that relationships between these difficulties, structural characteristics and strategies of a firm exist.

Firms have to identify the degree of internationalisation that maximises their performance in foreign markets as a part of their strategic planning (Hitt et al., 1994). This decision is closely linked to the geographic scope of a firm's export activities. The characteristics of exported goods or services are another crucial strategic aspect that firms need to carefully

consider (Cavusgil and Kirpalani, 1993). For instance, recent research in the wine sector points out that quality wine with denomination of origin is associated with higher export values, and hence achieves a better valuation through the market (Agostino and Trivieri, 2014). Also structural factors have been instanced to influence the process of internationalisation in a firm. One factor that has been long-discussed and often considered is the size of a business. Human resources, especially at the managerial level, are a further meaningful determinant of successful internationalisation. It has been recently argued that business leaders accumulate experiential knowledge during their tenure, but also become more risk-averse as they age (Gielnik et al., 2012). The following paragraphs discuss the previously mentioned aspects and their relationships in greater detail.

2.1. Perceived difficulties in the internationalisation process of SMEs

Previous research has pointed out the importance of export related perception variables, such as problems and difficulties, to be important predictors of export performance (Aaby and Slater, 1989; Zou and Stan, 1998). Shaw and Darroch (2004) argue that managerial perceptions of the macroeconomic environment and the related barriers are more important than facts when it comes to choosing internationalisation strategies and have a profound influence on the internationalisation of a business. For this reason and due to the inherent challenge to identify appropriate measures of export performance, it is similarly argued that the adoption of perceptual measures of export performance is advantageous since "management action is driven by perceptions of company performance rather than by objective calibration of its performance characteristics" (Katsikeas et al., 1996).

Developing an understanding of managerial perceptions of export barriers is important as it is associated with a firm's continuity of export activity (Azzi da Silva and da Rocha, 2001). More importantly, research in SMEs has a key constraint due to the fact that financial data which would enable direct conclusions regarding a firm's export performance is not publicly available for this type of businesses and firms are reluctant to disclose such information. Earlier research has pointed out, that export related perception variables strongly correlate with firm export performance (e.g. Katsikeas et al., 1996; Axinn, 1988; Zou and Stan, 1998): factors related to management's attitudes and perceptions seem to be potent determinants of the financial measures of export performance. The link between export performance and perceived difficulties/barriers has not been unambiguous in early research in the 1980–1990s (Azzi da Silva and da Rocha, 2001), but a growing body of recent literature has found a strong link between these two variables (Cameiro et al., 2011; Cacic et al., 2002; Jalali, 2015; Mavrogiannis et al., 2008; Altıntaş et al., 2007).

Abstracting from specific firm or industry levels, barriers may be generally subdivided into the following three groups (Shaw and Darroch, 2004): managerial, financial and market-

²SMEs: Small and Medium Enterprises

³Researchers propose different terminologies, i.e. degree of internationalisation, multinationality, international diversification, which are used interchangeably throughout this study.

based. This classification spans a similar scope as other distinctions of barriers (Paul et al., 2017), such as micro (e.g. organisational capabilities, resource constraints) and macro level challenges (e.g. institutional barriers and country-level antecedents). Shaw and Darroch (2004) consider cost-related financial barriers to be the most significant barrier for firms during their decision to internationalise. Also Leonidou (2004) attributes highest relevance to cost barriers with respect to the internationalisation of SMEs. In the classical understanding, direct cost that emanate from exporting are known as tariff barriers, while cost that incur indirectly by the need to comply to standard of the destination market are called non-tariff barriers (Mariani et al., 2014a). These additional non-tariff market-based barriers, such as administrative and bureaucratic burdens, are considered significant in the trade of wine and influence the success of exportation activities (Leonidou, 2004; Mariani et al., 2014b). Such non-tariff barriers emanate from an administrative viewpoint and incur indirectly for an exporting firm and have been identified an important correlate of export performance of a firm (Axinn, 1988). As marginal cost incur to overcome these barriers, firms would only invest resources if the marginal cost is less than the marginal return of this investment (Roth, 1992). The idea that informational barriers constitute a key constraint in developing international relationships dates back to the very beginning of internationalisation theory of the *Uppsala school* (Johanson and Vahlne, 1977). Informational barriers may be a key challenge for SMEs due to their relatively higher resource constraints compared to MNEs to obtain assimilate and process information (Laufs and Schwens, 2014; Shaw and Darroch, 2004; Leonidou, 2004). Such barriers emanate from the difficulties SMEs experience analysing foreign markets and identifying related business opportunities. Katsikeas et al. (1996) underline the importance of perceived informational barriers to be a key indicator of firm export performance. Despite being proposed in the key work of Johanson and Vahlne (1977), linguistic difficulties have been long underestimated with respect to their role in international trade (Lohmann, 2011). The author argues that the importance of language has been underestimated due to dichotomous modelling of the variable. This finding has been confirmed recently by Cahen et al. (2016), who propose a new classification of barriers in three groups: institutional barriers, organisational capabilities barriers and human resource barriers. The former two groups resemble earlier classifications of barriers, which are often distinguished into the micro and macro level (Paul et al., 2017). However, the third group emerges to be independent and distinctive from the former two groups. The vast part of the latter group's explanatory power derives from linguistic barriers (Cahen et al., 2016). More importantly, language barriers constitute a possible crucial constraint in the light of managerial characteristics in top management teams of SMEs that are known for their long tenures (Zahra, 2005). A high age of a firm's management team may risk lacking leaders with extensive experience in an international environment.

The afore mentioned barriers have also been recently confirmed in an extensive study commissioned by the

European Commission to be specific to the situation of small and medium companies (Reinstaller et al., 2010, pp. 122).

2.2. International markets

2.2.1. International diversification

Specific barriers to export can be perceived at any stage of internationalisation (Kahiya and Dean, 2016). The aggregated nature of these barriers tends to differ among each stage of internationalisation (Morgan, 1997). During early stages of internationalisation, businesses need to overcome informational barriers and development of knowledge related to internationalisation, which is commonly described as *liability of newness*. As firms seek to expand their activities, additional initiative and spare resource capacity (*liability of expansion*) is required (Cuervo-Cazurra et al., 2007). For this reason, during later stages of internationalisation, informational barriers decrease due to the subsequent generation of experiential knowledge (Johanson and Vahlne, 1977). As for this reason, experimental exporters may perceive informational barriers more markedly than firms that have established strong export relationships (Bamberger and Evers, 1994). However, as export share of a firm increases, other types of barriers, such as market-based barriers (e.g. administrative and bureaucratic burdens), move into focus (Kahiya and Dean, 2016). The perception of barriers is closely linked to export performance of firms (Katsikeas et al., 1996). Related to this, past research has found differing effects of international diversification on firm performance, ranging from none over linear to curvilinear effects. These differing findings may be partly attributed to the different measures and data chosen in past studies: A meta-analysis by Hitt et al. (2006) favours a curvilinear inverted U-shaped relationship. However, for specific samples differing distributions may be observed, i.e. due to sub-sampling effects or industry-specific particularities. In business practice, exploitation of resource advantages has led to a marked growth of MNEs, which particularly have capitalised on related economies of scale. However, due to growing complexity and competition from small businesses in local markets, profitability of highly internationalised MNEs have dipped (The Economist, 2017). Widely acknowledged previous research has presented evidence in favour of an inverted U-shaped relationship between the degree of firm internationalisation and performance exists (Gomes and Ramaswamy, 1999; Hitt et al., 1994, 1997).⁴ Hitt et al. (1994) explicitly mention that at a certain stage of internationalisation marginal cost exceed marginal returns, which is ultimately conceptualised to result in the curvilinear relationship stated above. This observation

⁴Another stream of research has found that export performance and internationalisation follow a sigmoid-shaped relationship (Contractor et al., 2003). However, the present study focuses on small and medium businesses and considers exportation as the only mode of internationalisation. Firms in the sample do not consider foreign direct investments. This trait is common to many firms in the agricultural sector as their activities are strongly rooted in their local territory (Morrison and Rabelotti, 2017). Due to these structural specificities emphasis is given to a quadratic rather than a cubic relationship of the individual variables.

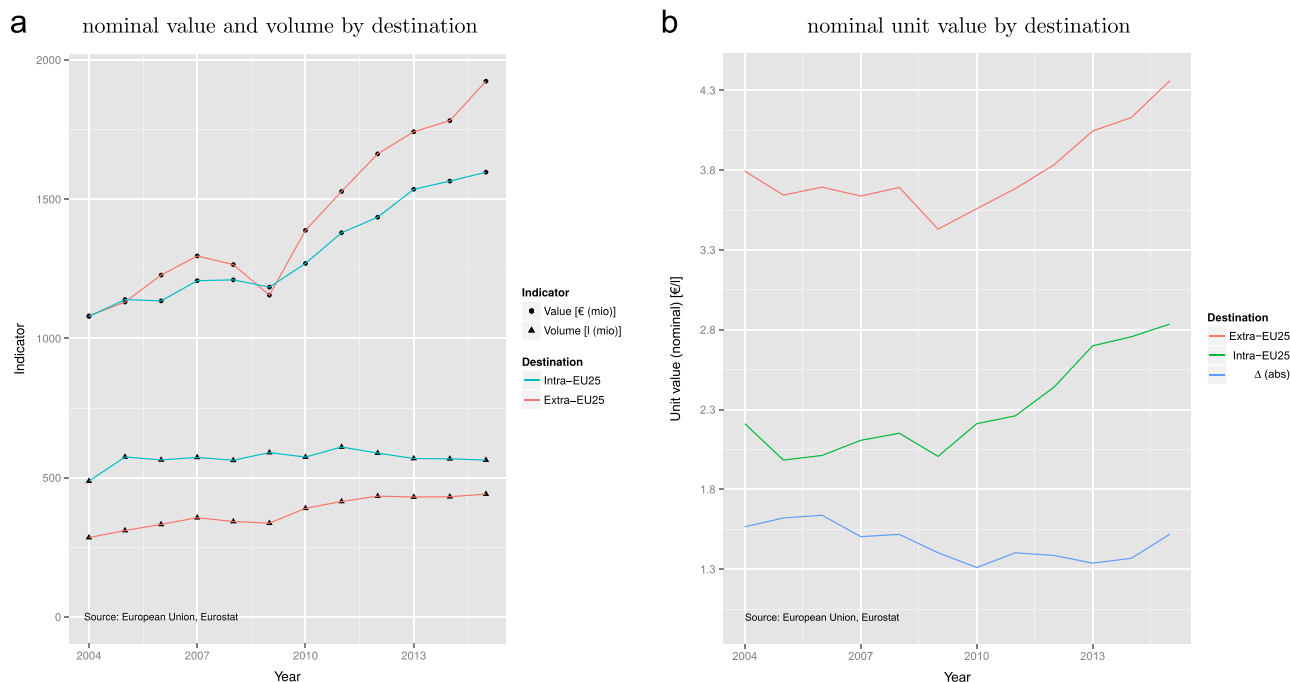


Fig. 1. Italian bottled still wine exports 2004–2015. (a) nominal value and volume by destination. (b) nominal unit value by destination.

indicates that businesses may pursue a strategy of selective internationalisation, which allows firms to exploit the most effective outcomes for a business (Roth, 1992). This relationship has been more recently confirmed to also apply to the case of SMEs (Chiao et al., 2006).

2.2.2. Geographic scope

Due to the long tradition of viticulture in Europe, wine consumption pattern among consumers are well established and markets are considered rather mature (International Organisation of Vine and Wine, 2015). In several countries, most importantly France and Italy, per capita wine consumption is on the decline. On the other hand, many countries outside Europe, such as China, are starting to adopt wine in their beverage repertoire. When comparing intra- and extra-EU trade of bottled still wine in Italy, official statistics show that unit values within the EU are markedly lower than in the extra-EU context (Fig. 1b). On the other hand, the single market is thought to facilitate trade among the individual Members States, most markedly though harmonisation and absence of tariffs. Mariani et al. (2012) have shown that the share of intra-EU wine shippings as a proportion of global wine shipping have decreased by 10% in value and 13.8% in volume in the first decade of the 21st century. In the same period, the share of extra-EU exports has seen an increase in value and volume, however a decrease of unit values. More recent data for Italy (Fig. 1b) show that the reported decline in unit value for extra-EU exports appears to be related to the setback during the global financial crisis and has been more than caught up in recent years.

In the light of these developments, strategies of geographic scope of export may gain importance for Italian producers:

Fig. 1a shows Italian bottled still wine exports⁵ by nominal value and volume in the period of 2004 to 2015. The data indicate that bottled still wine export volumes to extra-EU destinations have shown an incline in the last decade, while intra-EU exports have marginally declined. In the same period, total values of intra- and extra-EU exports have increased markedly. After a setback in the years 2008 and 2009, a strong and steady growth trend has established which however developed greater momentum for extra-EU exports.

When comparing Italian wine exports to EU and non-EU countries, marked differences in unit values of exported goods emerge. Fig. 1b shows wine exports destined outside the European Union exhibit higher unit values than exports within the European Union. This relationship is observed consistently during the observation period 2004–2015. It is however observed that the absolute difference in unit value has steadily decreased during this period. The decrease of extra-EU export premiums on a percentage basis is amplified by the incline of nominal unit values in the aftermath of the global financial crisis. When comparing the situation for exports to EU and non-EU countries separately, it becomes obvious that developments for extra-EU exports are volume and value driven, while for intra-EU exports mainly a premiumisation of demand is observed. These facts show that geographic distinction of intra- and extra-EU exports is an important aspect to be attributed in the following analysis.

⁵Italian bottled still wine exports are defined as the aggregate of CN codes 22042111 to 22042184 of the Combined Nomenclature of the European Union.

2.3. Product characteristics

Product characteristics have been considered a key determinant of a product's success in the marketplace (Escobar Gonzalez, 2016). Alchian and Allen (1964) argue that low quality products are less competitive than high quality products at an international level. This argument stems from the reasoning that low quality goods do not emanate of a resource that is rare and difficult to imitate (Barney, 1991). In addition, transport cost incurring for goods with low value exhibit a higher impact on total cost compared to high value goods. In the European context, geographic indications of origin are thought to be a trust-mark for consumers and provide information about the provenance of a good. Protection of these denominations of origin (PDO) and geographic indications (PGI) is documented in regulations No 607/2009 and No 1308/2013 of the European Parliament and Council of the European Union. As this provenance is linked to a limited area of production and protected by European law, a resource in the spirit of Barney (1991) is formed. For wine, provenance-related effects may show a particularly high relevance, as intrinsic characteristics are difficult to assess for consumers. Lombardi et al. (2016) find that bulk wine exports experience a stronger penalisation with increasing distance to destination than bottled wine exports. This finding is in line with earlier research by Agostino and Trivieri (2014) indicating that European quality wine exports with geographic designation achieve a positive valuation in international markets. This finding is supported by the fact that over the past decade the world market share of European bottled wine exports (value) has grown from 48% in 2004 to 56% in 2012, while bulk wine exports have seen a sharp penalisation from 35% in 2004 to 21% in 2012 (Mariani et al., 2014b). Hence, wine without appellation of origin, which is commonly exported in bulk, can be more easily considered a commodity. For this type of wine, transport cost account for a substantial amount of the global cost. Buyers will hence strive to improve sourcing efficiency circumvent high transport cost and prefer purchasing large volumes of wine, preferably in bulk, at once. Small and medium businesses are not be able to serve this type of demand. Hence, small and medium producers, which export wine of this category, experience more difficulties during the internationalisation process.

In addition, regional wine brands are known to profoundly influence the perception of wine quality and purchase behaviour (Johnson and Bruwer, 2007). The authors state that regional brand identity is a complex interplay of inter-related elements from a production and a marketing point of view. The former exerts a direct influence on the intrinsic characteristics of the produce (i.e. environmental conditions, cultivars, processing), the latter concerns the commercialisation and stakeholder perceptions. The wide recognition of a certain region can be an origin of positive externalities for firms and become a strategic resource (Duarte Alonso and Bressan, 2016).

2.4. Age of management

Difficulties in internationalisation are further linked to managerial characteristics in firms. The management of a business is not only an important resource, but also influences the creation of knowledge during the process of internationalisation. Managerial expertise and its development can help businesses overcome difficulties in the process of internationalisation (Bartlett and Ghosbal, 1987; Cuervo-Cazurra et al., 2007). Laufs and Schwens (2014) argue that management in SMEs differs from large MNEs due to the common private - and more often family-based - ownership structures. This fact has direct implications on the management of SMEs. In first generation family firms, leadership transition from the founding generation to the incumbent is a major concern (Ward, 2016, pp. 49). Since family firm managers are known for their long tenures, it is important to understand the effect of a manager's age on difficulties during the process of internationalisation. Zahra (2005) finds that long tenures of CEOs in family firms exhibit a negative effect on entering foreign markets. Similarly, Cruz and Nordqvist (2012) state that CEO age negatively influences entrepreneurial orientation in a firm, which has also been conceptualised by Levesque and Minniti (2006) and empirically confirmed by additional studies (Gielnik et al., 2012; Naldi and Davidsson, 2014). Further, negative effects of CEO age on international diversification (Fernandez-Ortiz and Lombardo, 2009) and international growth (Naldi and Davidsson, 2014) have been identified recently. This indicates that the beneficial effects of increasing experiential knowledge of older CEOs are overly negatively affected by a decreasing entrepreneurial dedication towards international markets. This decrease in entrepreneurial dedication reasons in the fact, as age of a leader increases, it may be harder for an individual to adapt business processes to the needs of new ventures. This outcome has been conceptually linked to a shift in priority allocation, increasing age-related constraints in the personal environment, diminishing support to engage in supporting third-party relationships (e.g. access to credits) and a decrease in fluid intellectual abilities (Gielnik et al., 2012). Due to the conflicting nature of experiential knowledge and risk aversion, it remains to be seen how these effects aggregate with respect to the perception of difficulties. Nonetheless, following the literature review, difficulties may be perceived more severely by individuals at a higher age and for this reason a positive effect of age on perceived difficulties may be observed.

2.5. Firm size

Internationalisation of a firm is closely connected to the ability to generate and exploit resources. This activity is considered substantially different between SMEs and MNEs (Laufs and Schwens, 2014). Firm size is considered to cause a substantial difference for small businesses (Katsikeas and Morgan, 1994). This reasoning emanates from a resource-based view of the firm. Small businesses may find themselves to face more resource constraints than big firms do. This aspect may be correlated with the lack of personal and financial resources. Saeed and Vincent (2011) have confirmed effects of

scale with respect to the perception of cost barriers, while Katsikeas and Morgan (1994) find the most severe differences with respect to informational barriers. Due to this lack of resources, smaller firms may show a higher aversion towards risk (Calof, 1994). Although Calof confirms this hypothesised effect, the author underlines the limited importance of absolute firm size on export attitudes. These points provide a possible explanation why the perception of export barriers correlates negatively with firm size (Azzi da Silva and da Rocha, 2001). Similarly, and in line with the previous finding, Presutti et al. (2016) have recently found small firm foreign performance to be positively related to their size. However, findings about the effects of firm size on perception of difficulties in past research have not been unambiguous (Bonaccorsi, 1992; Azzi da Silva and da Rocha, 2001; Katsikeas and Morgan, 1994).

2.6. Hypotheses

The objective of this research is to identify the effect of structural and strategic variables on managerial perceptions of difficulties in the internationalisation process among Italian wine SMEs. A set of independent variables has been identified based on the previous review of literature in Sections 2.1–2.5. The following hypotheses about the relationship of these variables with the dependent variable of this study can be derived:

Hypothesis 1. Perceived difficulties in the internationalisation process and the degree of internationalisation follow a U-shaped curvilinear relationship (cp. Chiao et al., 2006).

Hypothesis 2. Perceived difficulties in the internationalisation process and a firm's share of intra-EU exports (geographic scope) follow a positive linear relationship (cp. Mariani et al., 2012).

Hypothesis 3. Perceived difficulties in the internationalisation process and exports of wine without PDO or PGI follow a positive linear relationship (cp. Agostino and Trivieri, 2014).

Hypothesis 4. Perceived difficulties in the internationalisation process and CEO age follow a positive linear relationship (cp. Gielnik et al., 2012).

Hypothesis 5. Perceived difficulties in the internationalisation process and firm size follow a negative linear relationship (cp. Azzi da Silva and da Rocha, 2001).

3. Methodology

3.1. Sample

Data of 57 exporting wineries have been collected in the first quarter of 2016 in the neighbouring Italian wine regions Emilia-Romagna ($n = 28$)⁶ and Marche ($n = 29$). Overall, 77% of wineries in the sample showed an affiliation to three

key producer associations in the both regions. The sample accounts for 18% of all partner wineries of the local association *Consorzio Vini di Romagna*, 16% of *Consorzio Vini Picensi* and 11% of *Istituto Marchigiano di Tutela Vini*. The study comprised a quantitative questionnaire investigating the role of exports for businesses. A quantitative questionnaire has been designed to collect demographic and export-related attitudinal characteristics of respondents.

3.2. Measurements

The dependent variable of the models is a composite measure of perceived export barriers, which is thought to change in its aggregate nature throughout different stages of internationalisation (Morgan, 1997). Managerial perceptions of export activity are known to have a significant effect on export performance (Axinn, 1988; Carneiro et al., 2011; Cicic et al., 2002; Altuntaş et al., 2007; Jalali, 2015; Katsikeas et al., 1996; Mavrogianis et al., 2008). The measurement of export difficulties (DIF, Section 2.1) constitutes from a four-item five point Likert scale capturing the key dimensions identified during the literature review: cost, administrative, information and language barriers. Unidimensionality of the measures was assured through explorative factor analysis, yielding one factor with Eigenvalue larger than 1. Internal scale consistency has been tested through Cronbach's alpha ($\alpha = .738$). The scale is defined as a compounded scale of the four individual Likert items and ranges from zero to one, with zero meaning no barriers perceived and one meaning most severe perception of barriers, after normalisation is performed. Earlier studies, such as Reinstaller et al. (2010), have employed various means of measurement, such as binary dependent variables. The approach taken in this study may improve the predictive power of the model given particular consideration to the overall sample size. The independent variables of this study constitute as follows: International diversification (INT, Section 2.2.1) is measured through the share of international sales relating to total sales. This measure has been adopted throughout past research on internationalisation (Hitt et al., 1997; Chiao et al., 2006). The choice of export share can be considered a proxy measure of internationalisation as it can be assumed the preferred mode of internationalisation of SMEs in the wine sector. International diversification is expressed further through the geographic scope of export markets (GEO, Section 2.2.2) and defined as the share of intra-EU exports in relation to total exports. This cardinal measure is superior to a binary instrument; however, limitations exist due to the lacking consideration of actual export destinations. Nonetheless, the main objective of this variable is to capture the extent to which a firm pursues its export activities within the common market, which is not subject to tariff barriers. Product characteristics have been considered in earlier studies, such as Agostino and Trivieri (2014) and have been found to significantly affect exports. Product characteristics (PRC, Section 2.3) are measured through the share of exports of wine without PDO or PGI on total wine exports. Following the call of Laufs and Schwens (2014) to investigate the effect of

⁶Sampled businesses in the region of Emilia-Romagna emanate from the provinces Ravenna, Forlì-Cesena, Rimini and Bologna. The objective of this subsampling is to maintain the comparability of the regional produce among the both regions, since the wine industry in the north west of Emilia-Romagna is organised differently than the sampled provinces in the south east.

managerial age (AGE, Section 2.4), CEO age is introduced as independent cardinal measurement in the model, as in an earlier study by Cruz and Nordqvist (2012). The measurement of firm size (REV, Section 2.5) is considered the average annual revenue in million Euro, following earlier work, such as Azzi da Silva and da Rocha (2001). However, this study makes use of a cardinal instrument (Autio et al., 2000) to improve power of the model. A dummy variable (REG) represents the both regions firms are from and takes the value one when a business is located in Marche and zero when a business is located in Emilia-Romagna.

As the dependent variable is bound in an interval [0; 1], the use of ordinary least squares estimation methods may produce estimates that fall outside the rating scale and hence fall short with respect to their functional form of specification. To account for particularities of Likert scales, Gallani and Krishnan (2017) have recently proposed the use of fractional response models (FRM) in survey research. This type of model has been first presented and validated for the estimation of linear and non-linear effects by Papke and Wooldridge (1996). Its use is gaining popularity, as commonly used censored regression, tobit and logit models show several limitations. The following analysis estimates one multiple ordinary least squares regression model as well as one fractional response model implemented in R (Core Team, 2017).

4. Results

A univariate analysis of the sample in Table 1 shows that the dependent and independent variables of the study show very similar characteristics between the regions. Mann–Whitney U tests fail to indicate significant differences among the regions at a 5% confidence level. As none of the six variables are found different, vast homogeneity of the sample across the two regions can be assumed.

On average, businesses export 24% of their production. Out of these total exports, 62% is exported to another EU Member State. Wine without PDO or PGI only accounts for a 2% of the exports wine volume on average, and is only stated to be an export wine category among businesses in Emilia-Romagna. Businesses in the sample generate an average revenue of 1.17 million Euro per annum. Age of business leaders is 48 years on average.

Table 1
Breakdown by regions (mean).

Variable	Region			Sig. p
	Romagna	Marche	Total	
International diversification (INT)	0.21	0.28	0.24	ns
Geographic scope (GEO)	0.64	0.61	0.62	ns
Firm size (REV)	1.22	1.12	1.17	ns
Product characteristics (PRC)	0.03	0.00	0.02	ns
Age of management (AGE)	47.82	49.10	48.47	ns
Perceived difficulties (DIF)	0.56	0.52	0.54	ns
	28	29	57	

Variable measurement is explained in Section 3.2 ns : $p \geq 0.05$

Table 2
Spearman correlations.

Variable	1	2	3	4	5	6	7
1 INT	1						
2 INT ²	0.31*	1					
3 GEO	-0.32*	-0.16	1				
4 REV	0.30*	0.34**	-0.32*	1			
5 PRC	-0.09	-0.1	0.21	0.1	1		
6 AGE	0.11	0.26	-0.06	0.04	0.04	1	
7 DIF	-0.17	0.02	0.41**	-0.40**	0.37**	0.23	1
mean	0.24	0.10	0.62	1.17	0.02	48.47	12.65
sd	0.21	0.16	0.33	2.80	0.08	10.27	3.20
min	0.01	0.00	0.00	0.01	0.00	27.00	6.00
max	0.80	0.64	1.00	15.50	0.59	70.00	20.00

Univariate statistics before centering and normalisation.

* $p < 0.05$.

** $p < 0.01$.

The bivariate analysis in Table 2 shows that perceived export barriers are highly positively correlated with intra-EU exports and the share of exports of wine without PDO or PGI, while a highly significant negative correlation with annual firm revenue is found. Among the independent variables several correlations can be identified. The analysis of variance inflation factors (VIFs) however shows that collinearity does not appear to affect the regression model with all VIFs well below the critical threshold of 10 (Hair et al., 2010). The highest VIFs are found for the variables INT and INT², which originates by definition through the introduction of the curvilinear term. Centering is performed to account for this effect. Cook's distance was calculated to identify outliers. A threshold where the Cook's distance is bigger than the 10th percentile of an F distribution with p and $n-p$ degrees, where p is the number of parameters and n is the number of observations, has been used. None of the Cook's distances exceeded the critical F value.

Table 3
Average partial effects.

	OLS		FRM	
INT	-0.34 (0.17)	*	-0.33 (0.15)	*
INT ²	1.45 (0.46)	**	1.41 (0.51)	**
GEO	0.21 (0.07)	***	0.20 (0.06)	***
REV	-0.02 (0.01)	*	-0.02 (0.01)	*
PRC	0.83 (0.09)	***	1.21 (0.14)	***
AGE	0.01 (0.00)	**	0.01 (0.00)	**
REG	-0.04 (0.04)	ns	-0.04 (0.04)	ns
n	57		57	
Sig.	0.000		0.000	
R^2	0.47		0.47	

***: $p < 0.001$; **: $p < 0.01$; *: $p < 0.05$; ns: $p \geq 0.05$ Dependent variable: DIF

Table 3 reports the results of the regression analysis. Two regression models have been specified using the underlying data set of the univariate and bivariate analysis in the previous paragraphs. Both, F statistic for the OLS model, as well as the quasi-likelihood ratio statistic (Papke and Wooldridge, 1996) for the FRM are found to be highly significant ($p < 0.000$) for the data and capture 47% of the variability of the dependent variable. Since perceived difficulties are by their definition on a Likert-scale a limited dependent variable and OLS estimations might be biased (cp. Olmos, 2011), a FRM is estimated to attribute the censored character of the dependent variable (Gallani and Krishnan, 2017). However, the comparison in Table 3 shows that both models produce consistent coefficient estimates that lead towards very similar conclusions for all variables.

Results indicate a curvilinear relationship between the dependent variable and the degree of internationalisation, with the coefficient of the first order term being negative and the second order term being positive. Firms in the sample *ceteris paribus* report least difficulties when exports amount about 32% of total sales, according to the first derivative of the OLS regression equation. The estimated coefficients are significant at a 5% level for the first order term and significant at a 1% level for the second order term. Intra-EU exports show highly significant positive correlation with perceived difficulties ($p < 0.001$). The measurement of firm size shows significant negative association with the dependent variable ($p < 0.05$). Further, export share of wine without PDO or PGI shows a highly significant positive relationship with perceived export barriers ($p < 0.001$). The age of firm CEOs is also positively related to the dependent variable among respondents at a 1% significance level. In line with the observation in Table 1, no overall regional effect has been observed to influence the perception of difficulties in the dataset.

5. Discussion

The statistical analysis has identified several important structural and strategic correlates of perceived difficulties in the internationalisation process of Italian wine SMEs. Confirmation of a curvilinear relationship of international diversification supports hypothesis 1. This finding is in line with the view that during early stages of internationalisation firms lack related capabilities and perceive barriers more significantly (Johanson and Vahlne, 1977). By contrast, high levels of internationalisation cause marginal cost to increase at a higher rate than marginal revenues. Due to the rapid increase in complexity of the export activities, companies face more difficult challenges that require the allocation of additional resources, which in turn decreases the profitability of the export venture (Gomes and Ramaswamy, 1999; Hitt et al., 1994, 1997). Further, the fact that businesses may seek to export first to markets that are the most economically attractive and easy to access, can ultimately lead to decreasing returns at higher degrees of international diversification.

Not only the degree of internationalisation, but also the geographic scope of a firm's export activities has been found a

significant predictor of the dependent variable (hypothesis 2). Trade data provides additional support for this finding showing that unit values of Italian intra-EU exports are markedly lower than unit values of Italian extra-EU exports. This fact indicates the prevalence of a high competitive pressure on Italian still bottled wine exports to the European common market. Adding to this, the latter finds itself at a mature stage with declining per capita consumption in many countries, while the key emerging consumption countries (e.g. BRIC countries) are located outside the European common market (Morrison and Rabellotti, 2017). This view is underlined by data shown in Fig. 1a and b. Comparing intra- and extra-EU exports it becomes clear that export volumes to EU member countries have remained stable over the last decade, while extra-EU exports have seen an increase in volume. In addition, Fig. 1b shows that unit revenues of Italian bottled still wine exports to non-EU countries are substantially higher than unit values destined to EU Member States. This fact advocates the view that differences in the development of export markets contribute to the heterogeneity of perceptions of export difficulties. However, Fig. 1b also shows that the absolute differences in unit values have been decreasing during the monitoring period, implying harmonisation of this gradient over time. Nonetheless, from a strategic viewpoint, hedging strategies may be favourable for producers, since according to Fig. 1a export values and volumes to European countries have shown to be more resilient in the immediate aftermath of the financial crisis. Reinstaller et al. (2010, p. 156) conclude that the relatively high heterogeneity of preferences among consumers across EU Member States cause particular challenges for firms. The authors find that even within the single market barriers continue to exist, particularly referencing inland transport being particularly high within some Member States. In addition, the relatively high sophistication of buyers may be considered a further obstacle, which can cause a higher competition within a product category and hence raise barriers for firms. Further, language barriers within the EU are substantial, while many overseas countries are embedded in the Anglo-Saxon culture, having one single medium of instruction. The high heterogeneity of local languages may particularly for small businesses represent a notable constraint in accessing new markets within the EU.

In support of hypothesis 3, characteristics of exported goods have shown to be an important determinant of perceived export barriers. Wine producers that rely on export of PDO and PGI wines are found to report fewer difficulties compared to those that export wine without these qualities. This finding is in line with the reviewed literature arguing that international competitiveness of goods requires superior and unique characteristics. According to the findings of this study, and in support for the findings of Agostino and Trivieri (2014), denominations of origin can reduce perceived barriers for wine exporters. Hence, for small and medium wine exporters, product quality appears to be an important determinant of product reception in foreign markets. Consequently, denominations of origin can be considered a strategic resource in the marketplace and can constitute a sustained competitive advantage.

CEO age has also been found to significantly influence perceived difficulties, leading to support [hypothesis 4](#). Theory suggests that as business leaders' age increases, entrepreneurial orientation decreases ([Cruz and Nordqvist, 2012](#)). Entrepreneurial orientation has further been found to be a key antecedent of internationalisation ([Calabro et al., 2017](#)). Both aspects relate directly to the finding in this study. The significant positive influence of CEO age on perceived export difficulties provides support for the view that younger CEOs are more committed to drive the internationalisation process of a firm. In addition, the process of internationalisation involves a significant amount of resources and a long-run strategy. Especially the latter is more difficult to implement for older managers as personal time horizons become more constrained ([Gielnik et al., 2012](#)). Further, this finding is in line with earlier findings that postulate a global mindset to be fundamental to internationalisation of a firm ([Paul et al., 2017](#)). In this regard, positive effects of young managers' natural international exposure and proficiency of foreign languages have been called a precondition to develop this mindset ([Fernandez-Ortiz and Lombardo, 2009](#)).

Results provide supporting evidence for [hypothesis 5](#) and suggest a significant influence of firm size on the perception of difficulties. It has been argued, from a resource-based view, that larger companies face fewer constraints than their smaller counterparts. Hence, it is easier for these companies to allocate resources (e.g. dedicated and experienced staff) and to develop business operations in international markets. However, despite the statistical significance of this effect, its magnitude is small and shows only a very limited impact on the dependent variable. Given the focus of this study on small and medium businesses whose average annual revenue hardly exceeds 1 million Euro, the vast majority of these firms may find this effect subordinate in practice. [Escobar Gonzalez \(2016\)](#) suggest that smallness can also be a chance for wineries to differentiate more clearly from large producers and gain a competitive position in the marketplace despite lacking economies of scale. Still, the significance of this relationship leads to support the view of previous research which advocates the view that firm size affects the perception of barriers ([Azzi da Silva and da Rocha, 2001](#)).

Finally, data do not indicate significant differences among the neighbouring wine growing regions Marche and Romagna with respect to the investigated structural correlates and the multivariate analysis suggests that firms in the sample do not exhibit differing perceptions of overall difficulties between the two regions.

6. Conclusion

This study investigates the effects of structural factors on the perception of difficulties in the internationalisation process among Italian wine SMEs. In this context, recent developments in international trade of Italian bottled still wine are investigated and linked to the results of the survey.

International diversification of companies has been found to follow a non-linear relationship. Findings suggest that export

experience will attenuate the perception of barriers up to a certain point, the internationalisation threshold; high shares of export however challenge internal resources of firms. This result is important for researchers as this relationship is still subject of academic discourse in internationalisation research ([Hiitt et al., 2006](#)) and also addresses the call for industry-specific studies. Practitioners may consider these findings during strategic planning to set long-term goals and allocate resources accordingly. Educators may particularly consider the gradual decrease of barrier perceptions up to the internationalisation threshold⁷. As high perceived barriers discourage firms from expanding their activities in foreign markets, the dissemination of knowledge and advice helps businesses to overcome this inhibiting relationship.

Managers may also pay attention to the geographic scope of export activities. Findings of this research imply that the perception of difficulties to export shows a clear relation with respect to the geographic scope of export activities. The higher the share of bottled wine intra-EU exports, the higher the reported difficulties. This result requires further investigation, as it can be concluded that barriers other than tariff barriers constitute a key obstacle for businesses. Difficulties for intra-EU exporters further arise due to the fragmentation of the European market with respect to language barriers. This is an important aspect for policy makers to be aware of when shaping the strategy of European integration. High cost of transport, high competitive pressure and high buyer sophistication have independently been found a key obstacle to trade within Europe by an earlier study ([Reinstaller et al., 2010](#), pp. 138–148), which is a meaningful aspect for policy makers to lay out policies that reduce these constraints. In addition, the long history of wine production and consumption has resulted in a mature European market, stagnant growth ([Fig. 1a and b](#)) and is a further reason for the high competition in the European marketplace ([Morrison and Rabellotti, 2017](#)). Although the dependent variable only provides an aggregated view into the perception of difficulties, their relationship with the geographic focus of export activities in the wine sector is of high relevance. Future research can contribute further by investigating difficulties in distinct groups to provide evidence for the points raised above.

Product quality has shown to markedly influence perceived export barriers. Literature suggests that low quality wines are easier to substitute in the international environment, while wine sourced from reputable geographic indications is not ([Lombardi et al., 2016](#); [Agostino and Trivieri, 2014](#)). Findings of this study confirm the former and are supporting evidence in favour of the European system of protected origins. Strong local brands can further improve perceived quality from a consumer point of view ([Johnson and Bruwer, 2007](#)). The reason why this study fails to detect regional effects may originate in the vast structural and strategic similarities of firms

⁷The authors advise further scholarly research to be carried out on this specific aspect. Due to the narrow spatial distribution of the sample, the numerical specification of internationalisation thresholds may show variation at regional and national levels.

and high geographic proximity of both regions in the sample (Table 1).

The age of business leaders exercises a positive effect on the perception of difficulties in the internationalisation process. This effect is in line with previous research, which argues that firm growth at an international level is negatively affected as CEO age increases (Naldi and Davidsson, 2014). Young leaders in a business are more inclined to exploit opportunities of international diversification. Nevertheless it can be inferred that the collaboration of multiple generations in a business creates a resource advantage, as older leaders can contribute significant accumulated knowledge and compensate young business leaders' lack of this resource. This view is not considered to conflict with the overall beneficial effects of long tenures in family business that positively affect long-term strategies (Le Breton-Miller and Miller, 2006), however is a call to family firms to reconsider practices of inter-generational leadership. Lengthy transitions of leadership and a lack of trust of the incumbent generation may create a competitive disadvantage to the internationalisation process of a business. Ward (2016, pp. 49) argues that predominantly first generation family firms exhibit such behaviour. In addition, changing demographics in developed economies intensify the economic effect of this relationship (Gielnik et al., 2012). Consultants and educators should take this finding into consideration, particularly when providing consultation services or when planning leadership succession in firms.

Business size has shown to exercise a significant but limited effect on perceived export difficulties. This conclusion emanates from the finding that perceived difficulties do only decrease by 2% points each million the annual turnover of a business increases. As the average annual revenue of a firm in the sample barely exceeds one million Euro, it may be concluded that the size related measure used in this study only exercises a minor effect on the dependent variable. Calof (1994) has earlier stated the limited effect of firm size on export attitudes. Hence, it can be concluded that relevant barriers for small and medium firms constitute from other structural characteristics (i.e. international diversification) than mere size, following Calof who advocates experiential barriers to be a major constraint on export. Practitioners in the wine sector may consider this aspect when planning their distribution strategy. Nevertheless, more scholarly investigation in the field is required to answer the preceding question whether size influences the categorical decision of a firm to become an exporter.

Future research can extend the angle taken by this study by investigating export performance as a construct of financial data rather than by inference through managerial perceptions. Such studies would further serve the confirmation of the assumption of a linear relationship between export performance and the dependent variable of this research. As the distinction into intra-EU and extra-EU export markets in this study hints towards different levels of perceived export difficulties between both groups, a more detailed analysis of their origins is required. Prospective research can further compare key structural and strategic correlates across

structurally and strategically heterogeneous regions or countries of origin. For this reason, further studies could not only advance the knowledge about different regions, but also identify successful export strategies in a given destination, or among a group of homogeneous destinations (Paul et al., 2017).

This study is not free of limitations and falls short particularly with respect to its limited sample size and geographic scope. In addition, a limited number of businesses in the data set that export wine without PDO or PGI may reduce the explanatory power of this respective variable. Hence, the ability to extrapolate results of this study is limited as conclusions are drawn based on a singular data set. Despite these limitations, this study has for the first time jointly analysed important structural and strategic factors that interfere with the perception of difficulties in the internationalisation process of Italian wine SMEs.

Conflicts of Interest

The authors declare no conflict of interest.

References

- Aaby, N.E., Slater, S.F., 1989. Management influences on export performance: a review of the empirical literature 1978–1988. *Int. Mark. Rev.*, 6.
- Agostino, M., Trivieri, F., 2014. Geographical indication and wine exports. an empirical investigation considering the major european producers. *Food Policy* 46, 22–36.
- Alchian, A.A., Allen, W.R., 1964. *University Economics*. Wadsworth Publishing Company.
- Altıntaş, M.H., Tokol, T., Harcar, T., 2007. The effects of export barriers on perceived export performance: an empirical research on smes in turkey. *EuroMed J. Bus.* 2, 36–56.
- Autio, E., Sapienza, H.J., Almeida, J.G., 2000. Effects of age at entry, knowledge intensity, and imitability on international growth. *Acad. Manag. J.* 43, 909–924.
- Axinn, C.N., 1988. Export performance: do managerial perceptions make a difference?. *Int. Mark. Rev.* 5, 61–71.
- Azzi da Silva, P., da Rocha, A., 2001. Perception of export barriers to mercosur by brazilian firms. *Int. Mark. Rev.* 18, 589–611.
- Bamberger, I., Evers, M., 1994. Internationalisierungsverhalten von Klein- und Mittelunternehmen Empirische Ergebnisse. In: *Strategien für nationale und internationale Märkte*. Springer, pp. 249–283.
- Barney, J., 1991. Firm resources and sustained competitive advantage. *J. Manag.* 17, 99–120.
- Bartlett, C.A., Ghosbal, S., 1987. Managing across borders: New organizational responses. *Sloan Management Review* (1986–1998) 29, 43.
- Bonaccorsi, A., 1992. On the relationship between firm size and export intensity. *J. Int. Bus. Stud.* 23, 605–635.
- Cahen, F.R., Lahiri, S., Borini, F.M., 2016. Managerial perceptions of barriers to internationalization: an examination of brazil's new technology-based firms. *J. Bus. Res.* 69, 1973–1979.
- Calabro, A., Campopiano, G., Basco, R., Pukall, T., 2017. Governance structure and internationalization of family-controlled firms: the mediating role of international entrepreneurial orientation. *Eur. Manag. J.* 35, 238–248.
- Calof, J.L., 1994. The relationship between firm size and export behavior revisited. *J. Int. Bus. Stud.* 25, 367–387.
- Carneiro, J., da Rocha, A., da Silva, J.F., 2011. Determinants of export performance: a study of large brazilian manufacturing firms. *Braz. Adm. Rev.* 8, 107–132.
- Cavusgil, S.T., Kirpalani, V.M., 1993. Introducing products into export markets: success factors. *J. Bus. Res.* 27, 1–15.

- Chiao, Y.C., Yang, K.P., Yu, C.M.J., 2006. Performance, internationalization, and firm-specific advantages of smes in a newly-industrialized economy. *Small Bus. Econ.* 26, 475–492.
- Cicic, M., Patterson, P., Shoham, A., 2002. Antecedents of international performance: a service firms perspective. *Eur. J. Mark.* 36, 1103–1118.
- Contractor, F.J., Kundu, S.K., Hsu, C.C., 2003. A three-stage theory of international expansion: the link between multinationality and performance in the service sector. *J. Int. Bus. Stud.* 34, 5–18.
- R Core Team, 2017. R: A Language and Environment for Statistical Computing. R Foundation for Statistical Computing, Vienna, Austria (<http://www.R-project.org/>).
- Corsi, A., Pomarici, E., Sardone, R., 2004. Italy. In: *The world's wine markets: Globalization at work*. Edward Elgar Publishing, chapter 4.
- Cruz, C., Nordqvist, M., 2012. Entrepreneurial orientation in family firms: a generational perspective. *Small Bus. Econ.* 38, 33–49.
- Cuervo-Cazurra, A., Maloney, M.M., Manrakhan, S., 2007. Causes of the difficulties in internationalization. *J. Int. Bus. Stud.* 38, 709–725.
- Duarte Alonso, A., Bressan, A., 2016. A resource-based view of the firm and micro and small italian wine firms. *Int. J. Wine Bus. Res.* 28, 349–368.
- Escobar Gonzalez, C., 2016. Marketing channels for small wineries: a means-end chain approach. *New Medit.* 15, 33–41.
- European Parliament, 2012. The liberalisation of planting rights in the EU wine sector. Study for the Directorate-General for Internal Policies, Policy Department Structural and Cohesion Policies. Technical Report.
- Fernandez-Ortiz, R., Lombardo, G.F., 2009. Influence of the capacities of top management on the internationalization of smes. *Entrep. Reg. Dev.* 21, 131–154.
- Gallani, S., Krishnan, R., 2017. Applying the Fractional Response Model to Survey Research in Accounting. Harvard Business School Technical Report.
- Gielnik, M.M., Zacher, H., Frese, M., 2012. Focus on opportunities as a mediator of the relationship between business owners' age and venture growth. *J. Bus. Ventur.* 27, 127–142.
- Gomes, L., Ramaswamy, K., 1999. An empirical examination of the form of the relationship between multinationality and performance. *J. Int. Bus. Stud.*, 173–187.
- Hair, J.F., Anderson, R.E., Babin, B.J., Black, W.C., 2010. *Multivariate Data Analysis: A Global Perspective*. volume 7. Pearson, Upper Saddle River, NJ.
- Hitt, M.A., Hoskisson, R.E., Ireland, R.D., 1994. A mid-range theory of the interactive effects of international and product diversification on innovation and performance. *J. Manag.* 20, 297–326.
- Hitt, M.A., Hoskisson, R.E., Kim, H., 1997. International diversification: effects on innovation and firm performance in product-diversified firms. *Acad. Manag. J.* 40, 767–798.
- Hitt, M.A., Tihanyi, L., Miller, T., Connelly, B., 2006. International diversification: antecedents, outcomes, and moderators. *J. Manag.* 32, 831–867.
- International Organisation of Vine and Wine, 2015. Stataiv extracts. URL: (<http://oiv.int/en/databases-and-statistics/statistics/>).
- Jalali, S.H., 2015. Export barriers and export performance: empirical evidence from the commercial relationship between greece and iran. *South-East. Eur. J. Econ.*, 10.
- Johanson, J., Vahlne, J.E., 1977. The internationalization process of the firma model of knowledge development and increasing foreign market commitments. *J. Int. Bus. Stud.* 8, 23–32.
- Johnson, R., Bruwer, J., 2007. Regional brand image and perceived wine quality: the consumer perspective. *Int. J. Wine Bus. Res.* 19, 276–297.
- Kahiya, E.T., Dean, D.L., 2016. Export stages and export barriers: revisiting traditional export development. *Thunderbird Int. Bus. Rev.* 58, 75–89.
- Katsikeas, C.S., Morgan, R.E., 1994. Differences in perceptions of exporting problems based on firm size and export market experience. *Eur. J. Mark.* 28, 17–35.
- Katsikeas, C.S., Piercy, N.F., Ioannidis, C., 1996. Determinants of export performance in a european context. *Eur. J. Mark.* 30, 6–35.
- Laufs, K., Schwens, C., 2014. Foreign market entry mode choice of small and medium-sized enterprises: a systematic review and future research agenda. *Int. Bus. Rev.* 23, 1109–1126.
- Le Breton-Miller, I., Miller, D., 2006. Why do some family businesses out-compete? Governance, long-term orientations, and sustainable capability. *Entrep. theory Pract.* 30, 731–746.
- Leonidou, L.C., 2004. An analysis of the barriers hindering small business export development. *J. Small Bus. Manag.* 42, 279–302.
- Levesque, M., Minniti, M., 2006. The effect of aging on entrepreneurial behavior. *J. Bus. Ventur.* 21, 177–194.
- Lohmann, J., 2011. Do language barriers affect trade?. *Econ. Lett.* 110, 159–162.
- Lombardi, P., Dal Bianco, A., Freda, R., Caracciolo, F., Cembalo, L., 2016. Development and trade competitiveness of the european wine sector: a gravity analysis of intra-eu flows. *Wine Econ. Policy* 5, 50–59.
- Mariani, A., Pomarici, E., Boatto, V., 2012. The international wine trade: recent trends and critical issues. *Wine Econ. Policy* 1, 24–40.
- Mariani, A., Napoletano, F., Pomarici, E., Vecchio, R., 2014a. Tariff and non-tariff barriers to wine exports and initiatives to reduce their effects. *Agric. Econ. Rev.* 15, 5–24.
- Mariani, A., Napoletano, F., Vecchio, R., Pomarici, E., 2014b. European wine exports: the key role of trade policy. *EuroChoices* 13, 46–53.
- Mavrogianis, M., Bournakis, M.A., Dawson, P.J., Ness, M.R., 2008. Assessing export performance in the greek food and beverage industry: an integrated structural equation model approach. *Br. Food J.* 110, 638–654.
- Morgan, R.E., 1997. Export stimuli and export barriers: evidence from empirical research studies. *Eur. Bus. Rev.* 97, 68–79.
- Morrison, A., Rabellotti, R., 2017. Gradual catch up and enduring leadership in the global wine industry. *Res. Policy* 46, 417–430.
- Naldi, L., Davidsson, P., 2014. Entrepreneurial growth: the role of international knowledge acquisition as moderated by firm age. *J. Bus. Ventur.* 29, 687–703.
- Olmos, M.F., 2011. The determinants of internationalization: evidence from the wine industry. *Appl. Econ. Perspect. Policy* 33, 384–401.
- Papke, L.E., Wooldridge, J.M., 1996. Econometric methods for fractional response variables with an application to 401 (k) plan participation rates. *J. Appl. Econ.* 11, 619–632.
- Paul, J., Parthasarathy, S., Gupta, P., 2017. Exporting challenges of smes: a review and future research agenda. *J. World Bus.* 52, 327–342.
- Pomarici, E., 2016. Recent trends in the international wine market and arising research questions. *Wine Econ. Policy* 5, 1–3.
- Presutti, M., Boari, C., Fratocchi, L., 2016. The evolution of inter-organisational social capital with foreign customers: its direct and interactive effects on smes foreign performance. *J. World Bus.* 51, 760–773.
- Reinstaller, A., Hlzl, W., Janger, J., Stadler, I., Unterlass, F., Daimer, S., Stehnen, T., 2010. Barriers to internationalisation and growth of eu's innovative companies. European Commission, DG Enterprise and Industry: PRO INNO Europe: INNO-Grips II report.
- Roth, K., 1992. International configuration and coordination archetypes for medium-sized firms in global industries. *J. Int. Bus. Stud.* 23, 533–549.
- Saeed, A., Vincent, O., 2011. Financial obstacles to firm export: insight from a developing country. *J. Transatl. Manag.* 16, 204–220.
- Shaw, V., Darroch, J., 2004. Barriers to internationalisation: a study of entrepreneurial new ventures in new zealand. *J. Int. Entrep.* 2, 327–343.
- The Economist, 2017. The retreat of the global company. URL: (<http://www.economist.com/news/briefing/21715653-biggest-business-idea-past-three-decades-deep-trouble-retreat-global>).
- Ward, J., 2016. *Perpetuating the Family Business: 50 Lessons Learned From Long Lasting, Successful Families in Business*. Springer.
- Zahra, S.A., 2005. Entrepreneurial risk taking in family firms. *Fam. Bus. Rev.* 18, 23–40.
- Zou, S., Stan, S., 1998. The determinants of export performance: a review of the empirical literature between 1987 and 1997. *Int. Mark. Rev.* 15, 333–356.