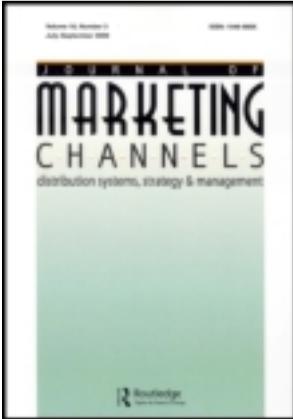


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Dildar Hussain^a & Josef Windsperger^a

^a Center for Business Studies, University of Vienna, Vienna, Austria

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ARTICLES

Multi-Unit Ownership Strategy in Franchising: Development of an Integrative Model

DILDAR HUSSAIN and JOSEF WINDSPERGER

Center for Business Studies, University of Vienna, Vienna, Austria

In this article, we examine the evolution of multi-unit franchising (MUF) research and develop an integrative model for the franchisor's choice of ownership strategy between single-unit and multi-unit franchising. Although several empirical studies were published on MUF in the last two decades, the research deficit primarily results from the lack of theoretical foundation of this ownership strategy. We extend the literature in the following way: First, based on the transaction cost view of governance mechanism, we examine the influence of environmental uncertainty on the choice of ownership strategy. Second, we develop hypotheses based on the resource-based and organizational capabilities view. Third, we investigate the influence of contractibility of resources and organizational capabilities on the choice of ownership strategy. Finally, we apply the screening theory and argue that specific investments of MUF have an ex-post bonding function, based on transaction cost reasoning, and an ex ante screening function.

KEYWORDS *agency theory, multi-unit franchising, property rights theory, resource-based theory, transaction cost economics*

INTRODUCTION

A major portion of recent growth in franchising business can be attributed to the emergence of multi-unit franchising (MUF) (Dant, Kacker, Coughlan, & Emerson, 2007; Gruenhagen & Dorsch, 2003; Kaufmann, 1992). Almost half of the franchised units in the United States are operated by multi-unit franchisees

Address correspondence to Dildar Hussain, Center for Business Studies, University of Vienna, Bruenner Str. 72, A-1210 Vienna, Austria. E-mail: hussaindildar@yahoo.com

(Wadsworth & Morgan, 2003). When a franchise firm decides to expand the number of its outlets, it has two options: Either it can own a new outlet unit or it can franchise. Franchising can be done either by selecting a new franchisee or by selecting one of the existing franchisees to operate the new unit. A multi-unit franchisee can be defined as a firm that owns two or more units at multiple geographic locations in the same franchise system. The phenomenon of MUF can be divided into two types (i.e., area development multi-unit strategy and sequential multi-unit strategy; Kaufmann, 1992; Kaufmann & Dant, 1996). In the first case, the franchisee is obliged to open a certain number of branches/outlets in a particular geographical area during a specified time period, and in the second case, the existing franchisee is granted the right to sequentially open up additional outlets, and each outlet is governed by a separate franchising contract (Gruenhagen & Mittelstaedt, 2005).

In the past, the main focus of franchising research has been on single-unit franchising (SUF). Although several empirical studies were published on MUF in the last two decades, the research deficit primarily results from the lack of theoretical foundation of this ownership strategy. Starting from this deficit, there is a need to apply multiple theories to explain this network form (Castrogiovanni, Combs, & Justis, 2006a). In this article, we examine the evolution of MUF research in the last three decades and develop an integrative model for the franchisor's choice of ownership strategy between SUF and MUF. We extend the franchise literature by developing hypotheses from organizational economics and strategic management theories. First, on the basis of a transaction cost view of governance mechanism, we examine the influence of environmental uncertainty and transaction specific investments on the choice of ownership strategy. Second, we derive hypotheses on shirking and free riding from the agency theory. Third, we develop hypotheses based on the resource-based and organizational capabilities view. Fourth, we investigate the influence of contractibility of resources and organizational capabilities on the choice of ownership strategy. Finally, we apply screening theory and argue that specific investments of MUF have not only an ex post bonding function, based on transaction cost reasoning but an ex ante screening function.

The article is organized as follows: In section two, we give an overview of the development of the literature on MUF and analyze the empirical studies in the light of agency theory, resource-based view and transaction cost theory. In section three, we discuss the theoretical deficits of the literature and develop an integrative model for empirical research.

EXAMINATION OF THE EVOLUTION OF MULTI-UNIT RESEARCH

Development of the Empirical Literature

The phenomenon of MUF has been investigated since the 1980s. The appendix shows the evolution of empirical research on MUF in last three decades.

In one of the pioneer studies on MUF, Zeller, Alchabal, and Brown (1980) discuss various advantages of multi-unit franchising systems. Under MUF, the franchisor has to coordinate one franchisee instead of several single-unit franchisees, which results in reduced management problems. A relatively lower level of conflicts between franchisor and franchisee typically characterizes MUF networks. Kaufmann (1992) formulates four different strategies for the allocation of new units in franchise systems. They include SUF, area development franchising, non-projected sequential MUF (new units are allocated to existing franchisees based on performance tests and continue to permit expansion until the performance falls below the expected level), and the projected sequential MUF (the franchisor projects ahead the effect of allocation of unit to existing franchisees and places a limit on allocating units to the franchisee even if the performance still meets the expected level). By applying the simulation method, Kaufmann shows that area development franchising has a lower performance among all four strategies and that sequential MUF may perform better as compared to single-unit strategy. According to Robicheaux, Dant, and Kaufmann (1994), mature franchise systems use a relatively higher proportion of MUF compared to new franchise systems. In addition, they conclude franchisors that expect management problems with MU operation have a relatively lower proportion of area development agreements. According to Kaufmann and Kim (1995), there is a positive relationship between use of MUF and system growth rate. However, they do not investigate the casual effect of this relationship. Kaufmann and Dant (1996) also confirm the positive relationship between MUF and growth rate. In addition, they argue that MUF better aligns the incentives of franchisor and franchisee that ultimately results in increased growth. Kaufmann and Dant (1998) argue that multi-unit franchisees are expected to influence the strategies of the franchisor, particularly if they are granted exclusive rights in large territories. Therefore, some franchisors restrict area development agreements and even do not encourage sequential MUF as well.

Based on franchisors' perception, Bradach (1995) argues that it is less risky to allocate new units to an existing franchisee rather than new and untested franchise partners. The author found that MUF systems can address certain management issues in a more effective way as compared to SUF systems, particularly the issues related to unit growth and system-wide adaptation. By analyzing data from small business firms, Bates (1998) found empirical support that the new units that are allocated to existing franchisees enjoy lower risk of failure. Bercovitz (2003) investigates the use of MUF as a governance form to mitigate the risk of opportunistic behavior of the franchisees. She argues that the shirking and free riding can be reduced by providing franchisees an opportunity to become a multi-unit franchisee. In addition, she examines the relationship between two performance outcomes (i.e., system termination and litigation rates) and system structure. The data support the propositions suggesting that MUF reduces

the system termination and system litigation rate. Bercovitz (2004) applies agency cost and resource scarcity theory to MUF. She argues that MUF provides a cost-effective method of mitigating shirking and free-riding hazards. Wadsworth and Morgan (2003) collected data from American and Canadian franchise systems to investigate the propensity of MUF. The results indicate that the franchisors are motivated to adopt MUF to increase the growth rate of the systems, and more units are awarded to existing franchisees as reward strategy.

Gruenhagen and Mittelstaedt (2002) examine franchisees' motivation for entering into MUF agreement. They develop propositions based on perceived motivations of MU franchisees. First, MU franchisees expect higher participation in decision-making process of the franchisor as compared to SU franchisees. Second, the motivation behind entering into a MUF arrangement could be the expectation of higher residual income, owing to economies of scale. According to empirical results from Gruenhagen and Mittelstaedt (2005), area developer MU franchisees consider their entrance into the franchising network as an investment opportunity, and sequential MU franchisees are more motivated by their entrepreneurial ambitions.

Garg and Rasheed (2003) examine international SUF and international MUF in terms of agency problems, like free riding, shirking, insufficient risk bearing, adverse selection, and quasi-rent appropriation. They argue that MUF can address various agency problems more effectively compared to SUF. Garg, Rasheed, and Priem (2005) investigate the factors that influence the franchisor's choice of adoption of MUF. The results indicate that the franchisors that plan for rapid expansion are more likely to use MUF. The results also suggest that the franchisors who place more emphasis on uniformity are more likely to use a relatively higher proportion of area development agreements rather than sequential MUF. Conversely, the franchisors who focus more on local responsiveness are more likely to use sequential MUF agreements. These results are in agreement with the findings of an earlier study by Bradach (1995).

Kalnins and Lafontaine (2004) investigated the question about how new units are allocated to franchisees. They found that the franchisors prefer existing franchisees to allocate new units and particularly to the franchisees that presently operate unit(s) close to the proposed location of the new unit. In addition, they argue that reduction in monitoring costs and efficiency benefits associated with MUF can compensate the franchisor for disadvantages of MUF created by divided attention of franchisee and his increased bargaining power. Kalnins and Mayer (2004) show that local market knowledge gathered by the franchisee plays an important role for success of subsequent units opened in the same geographical area.

In recent years, important contributions on MUF were published by Lorelle Frazer and her research colleagues. Weaven and Frazer (2003) argue that most of the studies on MUF use resource scarcity or agency theoretical

frameworks to explain the motivations behind MUF. They proposed a model that was empirically tested by Weaven and Frazer (2004). Only the hypothesis about a positive relationship between MUF and system maturity was confirmed. In addition, they proposed a negative relationship between MUF and the level of conflict in franchise system. However, the results indicate that there is a significant positive relationship between level of conflict and MUF. Weaven and Frazer (2006) examine the motivational factors of SU franchisees and MU franchisees. Their findings suggest that, compared to SU franchisees, MU franchisees place more emphasis on the importance of business concept, potential for expansion, ongoing training, involvement in the decision-making process, and governance structure. Weaven and Frazer (2007a) apply agency theory and resource-based view to explain MUF. They found that franchisors who perceive higher agency costs tend to use a higher proportion of MUF. In addition, the relationship between adoption of MUF and system uniformity and higher brand value was positive and significant. Furthermore, the results revealed that franchisors have a strategy to reward high-performing franchisees with multi-unit contracts. Weaven and Frazer (2007b) conducted a study of 19 Australian franchise systems to test the hypotheses about relationship between the characteristics of franchisor and the adoption of MUF. They found a positive relationship between MUF and age, size of franchise system, system corporatization and use of plural forms, and a negative relationship between level of conflict and MUF. They argue that systems that have a higher level of conflict may be less attractive for MU franchisees, and such franchise system face difficulties in recruiting area developers. Based on a multiple-case study approach, Weaven and Herington (2007) show that the choice of governance structure and human resource management (HRM) policies is influenced by the size, age, and nature of the industry. The results indicate that less mature and small franchise systems use less MUF and less-sophisticated HRM policies and, conversely, large and mature franchise systems use more MUF and more-sophisticated HRM policies. In addition, they argue that MUF networks share information more effectively and are more likely to adopt system wide adaptations compared to SUF systems.

Watson et al. (2007) explore the question why MUF is not widely used in the United Kingdom. They argue MU franchisees may require different set of competencies and skills as compared to SU franchisees. Empirical results from Germany (Cochet, Dormann, & Ehrmann, 2008) indicate that the objectives of franchisee and franchisor are better aligned in MUF compared to SUF networks. In addition, Sanchez, Saurez, and Vazquez (2006) show that MUF is positively related to franchise system density (number of franchised units in relation to population). The authors argue that the risk of free riding is lower in a dense franchise system. In addition, it is easier for an MU franchisee to manage his mini-chain in highly dense systems. Their data from Spain also support the hypotheses that larger franchise systems and franchise

systems operating in service sectors use relatively more MUF. Finally, the results of a recent study on MUF by Lopez-Bayon and Lopez-Fernandez (2008) indicate that ex post rents are higher for MU franchisees compared to SU franchisees.

Theoretical Framework and Empirical Results

As previous research is reviewed, it is important to identify the theoretical frameworks that were used and which hypotheses were confirmed in the empirical studies. Thus, we now analyze the empirical research results in the light of agency theory, resource-based, and organizational capability view and transaction cost theory (see Appendix).

AGENCY THEORY

Several researchers argue that MUF can address a number of agency problems in a more effective way compared to SUF (Bercovitz, 2004; Garg & Rasheed, 2003, 2005; Kalnins & Lafontaine, 2004; Kalnins & Mayer, 2004; Weaven & Frazer, 2007a). Especially, MU franchisees are better motivated to reduce the monitoring costs. Geographical contiguity of franchised units is one of the important factors that plays a role in adoption of MUF. The franchise systems with a higher number of geographically contiguous units are more likely to use a higher proportion of MUF. When the franchisor has a strong brand name, there is a higher risk of free riding by the SU franchisee. The franchisors prefer MUF as compared to SUF to reduce the risk of free riding at the local outlets (Bercovitz, 2004; Brickley, 1999; Kalinins & Lafontaine, 2004). Fladmoe-Lindquist and Jacque (1995) argue that MU franchisees provide better quality of good/services as compared to SU franchisees because shirking on quality would affect the MU franchisee's business in the local network and ultimately his or her profitability. Consequently, the MUF system is a governance form that reduces monitoring costs and the risk of free riding compared to the SUF system.

TRANSACTION COST THEORY

Transaction cost theory (Klein, 1980, 1995; Manolis, Dahlstrom, & Nygaard, 1995; Williamson, 1979, 1983) argues that specific investments increase the hold-up risk and hence the ex post transaction costs. Bercovitz (2003) applies transaction cost theory to explain MUF. She argues that MUF increases the franchisee's quasi-rents based on higher outlet-specific investments and thereby increases the self-enforcing range of the franchise contract (Klein, 1995). If the self-enforcing range is higher under MUF compared to SUF, the opportunism risk is lower, and the franchisor less frequently uses disciplinary measures (litigation and termination) for contract enforcement. Consequently, MUF reduces the hold-up risk, owing to the stronger incentive effect compared to SUF.

RESOURCE-BASED AND ORGANIZATIONAL CAPABILITIES

The resource-based and organizational capabilities view argues that firm-specific resources and capabilities result in competitive advantage (Helfat et al., 2007; Jacobides, 2006; Teece, Pisano, & Shuen, 1997). The firm achieves competitive advantage if its resources and capabilities are rare, difficult to imitate and substitute (Barney, 1991).

In franchising, resource scarcity theory explains the use of franchising as a means to overcome the scarcity of resources (i.e., capital, managerial resources, and local market assets). Under the capital scarcity perspective, MUF systems have a relative advantage over SUF systems (Kaufmann & Dant, 1996). MU franchisees are larger partners and have better access to capital to finance system growth. Empirical studies show that MUF and system growth are positively related (Bradach, 1995; Kaufmann & Kim, 1995; Kaufmann & Dant, 1996). Kaufmann & Kim also argue that franchise systems with a higher growth rate are in a better position to attract high-quality franchisee as MU franchisees. Conversely, MUF systems have lower local market capabilities compared to SUF systems, owing to their lower local responsiveness (Bradach, 1995, 1998).

Contrary to the predictions of resource scarcity theory, the use of MUF increases with size and maturity of the franchise system (Sanchez et al., 2006; Weaven & Frazer, 2007b; Weaven & Herington, 2007). This may be explained by the fact that size and maturity are indicators of greater organizational capabilities of the MUF system (Bradach, 1995, 1998). MUF increases the organizational capabilities (such as monitoring, knowledge transfer, and innovation capabilities) and, consequently, strengthens the competitive position of the system. System uniformity, system-wide adaptations, and system coporatization are examples of organizational capabilities (Bradach, 1995, 1998; Weaven & Frazer, 2007a, 2007b). The franchisors that focus on system uniformity, system corporatization, and system-wide adaptations are more likely to use MUF. In addition, MUF increases the knowledge transfer capability of the system. If the system-specific know-how of the franchisor is important for the success of the network, it should be efficiently transferred to the other partner (i.e., the franchisee should be able to replicate it at the local markets; Eramilli, Agarwal, & Dev, 2002). Consequently, compared to SUF, MUF systems have financial resources and organizational capabilities advantages and, conversely, local market know-how disadvantages.

RESEARCH DEFICITS AND DEVELOPMENT OF
AN INTEGRATIVE MODEL

The analysis of the literature on MUF has shown that both the franchisor and the franchisees may realize efficiency advantages if they choose a multi-unit strategy. Although several empirical studies exist on MUF, the major focus of

previous research has been upon the motivations behind entering into multi-unit arrangements. Conversely, the research deficit primarily results from the lack of theoretical foundation of this ownership strategy. Especially environmental uncertainty (Williamson, 1975), specific investments as screening device (Dnes, 1992), and contractibility of organizational capabilities and financial assets (Windsperger & Dant, 2006) as determinants of the ownership strategy have not been investigated in previous studies.

Starting from these deficits, there is a need to apply multiple theories to explain this network form (Castrogiovanni, Combs, & Justis, 2006a, 2006b; Combs & Ketchen, 1999). In the following, we attempt to develop an integrative view on MUF by extending the existing literature in the following way: First, we apply the transaction cost approach by investigating the influence of environmental or market uncertainty on the choice of ownership strategy; second, we develop hypotheses based on the resource-based and organizational capabilities view; third, starting from the property rights theory, we investigate the influence of contractibility of resources on the choice of ownership strategy; and finally we examine the ex ante screening effect of franchisees' higher specific investments that strengthens the ex post bonding effect compared to SUF. Figure 1 summarizes our integrative model.

Transaction Cost Theory

According to Oliver Williamson (1975, 1983, 1985), transaction specific investments and environmental uncertainty are the major determinants of governance mechanism.

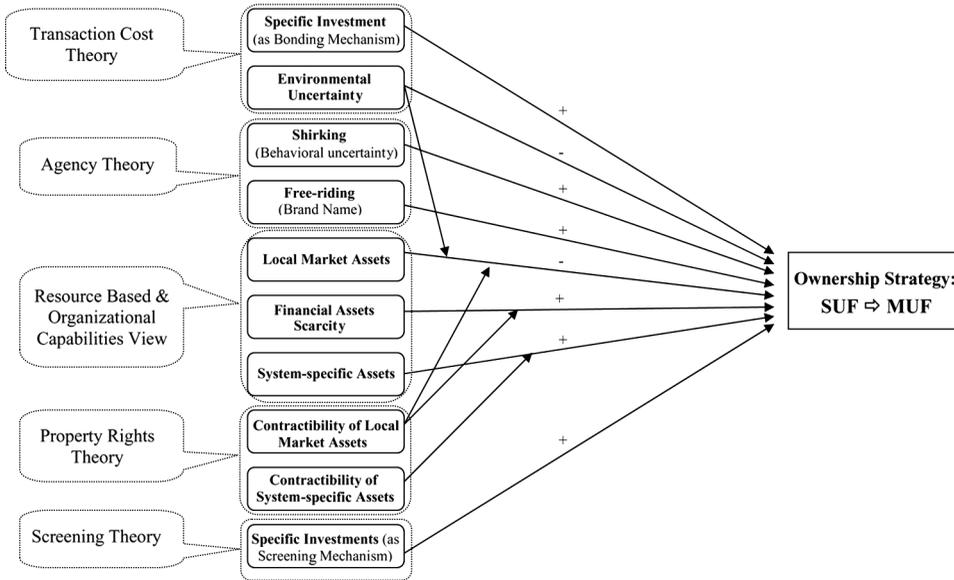


FIGURE 1 An integrative model.

SPECIFIC INVESTMENTS

Specific investments (as selfish investments) of the franchisee have the following effect on the governance structure: If the franchisee is a multi-unit owner, he or she has to undertake higher specific investments to open up the local network compared to SUF. Conversely, the additional investment costs are decreasing with the number of units in the mini-chain. This bonding effect increases the franchisee's dependency and hence his or her motivation to act cooperatively. In addition, franchisee's investments also increase the franchisor's dependency, if these investments have both a selfish and cooperative element (Che & Hausch, 1999). The cooperative effect results from synergies between franchisees' and franchisors' investments that increase the self-enforcing range of franchise contracts (Klein, 1995). Consequently, we can derive the following proposition: The higher the bonding effect of the franchisee's specific investments under MUF compared to SUF, the higher is the tendency toward MUF.

H1: Franchisee's specific investments are positively related with the franchisor's tendency toward MUF.

ENVIRONMENTAL UNCERTAINTY

Although Williamson (1975) extensively discussed the role of uncertainty/complexity for the choice of organization form, few studies investigate the influence of this factor on the choice of governance mechanism (Anderson, 1985; Klein, Frasier, & Roth, 1990; Noordewier, John, & Nevin, 1990). Based on Simon's information processing view of organization (Simon, 1947, 1976), higher environmental uncertainty requires more local information processing capacity by delegating coordination tasks (Prendergast, 2002). Applied to franchising, the higher the environmental uncertainty at the local market, the more local information processing capacity is required to acquire and process the relevant local market knowledge (Campbell, Datar, & Sandino, 2007) and the lower is the tendency toward MUF.

H2: Environmental uncertainty is negatively related with the franchisor's tendency toward MUF.

Agency Theory

According to the agency theory (e.g., Brickley, Dark, & Weisbach, 1991; Lafontaine, 1992), agency costs result from behavioral uncertainty, owing to shirking and free riding of the network partners. Compared to SUF, MUF can mitigate these agency problems by creating a stronger incentive system for the franchisees. Higher motivation of the franchisees at the local outlets results in lower shirking under MUF compared to SUF. Conversely,

additional monitoring costs may arise, owing to agency problems between franchisees and their outlet managers in the mini-chains. However, economies of monitoring and coordination of the mini-chains may mitigate this effect (Grünhagen & Mittelstaedt, 2002; Weaven & Frazer, 2003b). In addition, the stronger incentive effect of MUF compared to SUF may also result in lower free-riding risk (Bercovitz, 2004). Free-riding risk concerns the probability that the franchisor's brand name is tempered by the franchisee's opportunistic behavior. We can derive the following hypotheses:

- H3a: Behavioral uncertainty, due to shirking, is positively related with the franchisor's tendency toward MUF.
- H3b: Behavioral uncertainty, due to free riding, is positively related with the franchisor's tendency toward MUF.

Resource Scarcity and OC Theory

RESOURCE SCARCITY VIEW

According to the resource scarcity view, the franchisor has not enough local market knowledge and financial resources at the beginning of the franchise life cycle (e.g., Dant & Kaufmann, 1996; Oxenfeldt & Kelly, 1968). SUF enables him or her to overcome this scarcity problem. The question to ask is: Does MUF additionally mitigate this scarcity problem for the franchisor?

First, local market knowledge can be more efficiently acquired by SU franchisees compared to employees of the MU network because the SU franchisee (as residual claimant) has higher entrepreneurial capabilities and is more motivated to exploit the profit opportunities at the local market than the MU employee. Conversely, sequential MUF has efficiency advantages compared to area development MUF because sequential MUF functions as promotion scheme—through the lens of tournament theory—to sort franchisees on the basis of their entrepreneurial capabilities (Lazear & Rosen, 1981; Prendergast, 1993, 1999; Rosen, 1982).

- H4a: The importance of local market know-how of the franchisee is negatively related with the franchisor's tendency toward MUF. This negative effect is higher under area development MUF compared to sequential MUF.

In addition, the importance of local market know-how of the franchisee as entrepreneur to create residual income varies positively with local market uncertainty. Frank Knight (1921), in the early part of the last century, even argued that uncertainty is the origin of the entrepreneurial role to seize opportunities for profit. The higher the environmental uncertainty, the more relevant is the outlet-specific knowledge of the franchisee for creation of residual income of the network, and the lower is the tendency toward MUF.

H4b: The negative effect of local market know-how on the franchisor's tendency toward MUF increases with local market uncertainty.

Second, financial resources scarcity of the franchisor may result in a higher tendency toward franchising to finance the expansion of the system. MUF offers additional growth opportunities for the franchisor compared to the SUF, because MU franchisees are less constrained in financing the local investments compared to the SU franchisees. As a result, we derive the following hypothesis:

H5: Franchisor's financial resources scarcity is positively related with his or her tendency toward MUF.

ORGANIZATIONAL CAPABILITIES

Based on March (1991), the organization of the firm has two functions: (1) creation of new knowledge (exploration or dynamic capabilities; Helfat et al., 2007) and (2) exploitation of given knowledge (exploitation capabilities). The question to ask is: Can the franchising network realize higher exploration and exploitation capabilities by using MUF compared to SUF? In other words, can MUF better circumvent the managerial constraints to system growth compared to SUF, owing to the Penrose effect of franchising (Thompson, 1994)?

Exploitation capabilities refer to monitoring capabilities, knowledge transfer capabilities, and entrepreneurial capabilities. MUF result in higher monitoring capabilities of the network compared to a system with SU franchisees, because the franchisor can decentralize some of the coordination tasks to the franchisees who are able to realize economies of monitoring and coordination in their mini-chains. This is compatible with Bradach's view (1997, p. 285): "The chain's relatively wide spans of control over franchisees are attributable in part to the presence of franchisee-owned and operated mini-hierarchies, which exercised control over franchise units and enabled the chain to devote fewer resources to controlling the units." In addition, as MU franchisees are more likely to replicate the organizational routines and procedures of the franchisor in their mini-chains compared to SU franchisees, the monitoring capabilities of the network increase owing to the similarity of performance measurement systems of MU outlets and company-owned outlets of the franchisor (Bradach, 1997). Furthermore, the knowledge transfer capability of the network is greater under MUF compared to SUF, because the franchisor can delegate some knowledge transfer tasks to the mini-chains. Moreover, MUF systems are characterized by higher human resources capabilities, owing to economies of training and recruiting of the mini-chains, compared to SUF systems (Weaven & Herington, 2007).

In addition, exploration or dynamic capabilities primarily refer to the higher innovation and site-development capabilities of the networks

(Bradach, 1995). MUF improves the capabilities of the system to grow and innovate. Especially, testing and evaluating new ideas in the mini-chains and implementing them in the entire system is more efficient under MUF compared to SUF. Furthermore, MUF networks have greater size-development capabilities owing to the experience MU franchisees accumulated from previous outlet openings.

Consequently, the higher exploration and exploitation capabilities of the MUF systems enable both the creation of more system-specific know-how and its more-efficient exploitation (through higher knowledge transfer, monitoring, recruiting, and training capabilities) compared to SUF systems. The higher the system-specific know-how, owing to higher innovation capabilities of the MUF system, the more important are its greater monitoring, knowledge transfer, and human resource capabilities for the creation of residual surplus of the system. In sum, we can derive the following hypothesis:

H6: System-specific assets are positively related with the franchisor's tendency toward MUF.

Screening Theory

Based on screening theory (Dnes, 1992), specific investments have not only an ex post bonding function, as argued in the transaction cost theory, but an ex ante screening function. Owing to the heterogeneity of potential franchisees in their entrepreneurial capabilities, the franchisor uses the higher specific investments of MUF as a screening device to attract franchisees with high entrepreneurial capabilities and a low propensity to act opportunistically. The latter also results in less monitoring during the contract execution period (Huang & Cappelli, 2006). As mentioned earlier, MU franchisees as area developers have to undertake higher specific investments than SU franchisees. Hence, franchisees choose area development MUF if they believe that they possess the desired entrepreneurial capabilities to generate a high residual surplus that more than compensates the higher investment costs. Consequently, in addition to the transaction cost hypothesis of specific investments, we can derive the following hypothesis

H7: Franchisee's specific investments as screening mechanism vary positively with the franchisor's tendency toward MUF.

Property Rights Theory

According to the property rights theory, the contractibility of assets determines the ownership structure of the firm (Hart, 1995; Hart & Moore, 1990; Windsperger, 2001; Windsperger & Dant, 2006). *Contractibility of*

assets refers to the extent to which the franchisor's and franchisee's assets can be easily codified and transferred to another partner. The impact of contractibility of assets on the choice of SU- and MU-ownership strategy in franchising has not been examined in the literature. The lower the contractibility of local market assets, the more important is the outlet-specific knowledge of the local entrepreneur for the generation of residual income, and hence the stronger is the negative impact of local market assets on the tendency toward MUF. In addition, the contractibility of local market assets also influences the impact of financial resources on the ownership structure. The higher the contractibility of local market assets, the lower is the positive impact of financial resources on MUF, because the franchisor's ability to acquire financial resources from the external capital market increases (Windsperger & Dant, 2006). Moreover, the lower the contractibility of the system-specific know-how, the more knowledge transfer capabilities are required to transfer the system know-how to the local outlets, and the greater is the effect of system-specific assets on the tendency toward MUF. As a result we can derive the following hypotheses:

- H8: The positive effect of system-specific know-how on the franchisor's tendency toward MUF decreases with the contractibility of system-specific assets.
- H9: The negative effect of local market know-how on the franchisor's tendency toward MUF decreases with the contractibility of local market assets.
- H10: The positive effect of financial assets scarcity on the franchisor's tendency toward MUF decreases with the contractibility of local market assets.

CONCLUSION

Castrogiovanni, Combs, and Justis (2006a) recently highlighted the growing importance of application of multi-theoretical reasoning to explain franchising as governance form. Our study makes an important step in that direction. We developed a model that derives hypotheses from agency theory, transaction cost theory, resource-based and organizational capability theory, property rights theory, and screening theory. According to our model, the residual income of the network can be increased by reducing transaction and agency costs and by increasing the organizational capabilities of the network, such as monitoring, knowledge transfer, human resource, innovation, and site-development capabilities. Therefore, MUF can better circumvent the managerial constraints to system growth compared to SUF (Thompson, 1994). In addition, higher relationship-specific investments of franchisees under MUF have a higher bonding, screening, and cooperative effect than under SUF (Che & Hausch, 1999; Dnes, 1992; Williamson, 1983). Finally, our integrative model should also help

franchisors in focusing more sharply on the major drivers of ownership strategy that generate a higher residual income stream of the network.

Our model will be empirically tested in future research. The major empirical challenge is the operationalization of theoretical variables because the test of hypotheses derived from different theories requires high validity and reliability of the constructs. Especially the use of proxy variables with low construct validity does not allow differentiating between theories. For instance, resource scarcity is measured by age, system size, and growth rate that more likely represent agency-theoretical variables that explain the firm's use of franchising (Combs & Ketchen, 2003).

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APPENDIX Multi-Unit Franchising: Development of the Empirical Literature¹

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Zeller et al. (1980)	Simulation	Area developers are considered as MU-franchisees.	The major findings of article include the following: (1) Under MUF, franchisor has to deal and coordinate with only one franchisee instead of several SU-franchisees and that results in reduced management problems. (2) MUF results in relatively lower level of conflicts between franchisor and franchisee. (AT)*	NA (Not Available)
Kaufmann (1992)	Simulation	Use of area development MUF and sequential MUF arrangements	The author simulated four franchising strategies in the article and results reveal the following: (1) Area development MUF has the lower performance among all four strategies. (2) Sequential MUF performs better as compared other franchising strategies.	NA
Robicheaux, Dant & Kaufmann (1994)	160 fast food franchisors in the United States	Franchisees having more than one unit are MU-operators.	The paper reveals the following: (1) The MUF is widely used in the United States, particularly in fast food sector. (2) The less mature and declining franchise systems have relatively lower proportion of MUF.	NA

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APPENDIX Continued

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Kaufmann & Kim (1995)	169 franchise systems from multiple industries in the United States	Area developers are those franchisees who accept obligation to open a specific number of outlets in given time a period.	<p>(3) Franchisors believe that MU franchisees can effectively manage group of units but have difficulty in managing individual units.</p> <p>(4) The franchisor who believe that management problems grow with MU operations, have relatively lower proportion of area development agreements.</p> <p>The study provides insights of masters franchising and MUF. Important findings include the following:</p> <p>(1) The use of master franchising (sub-franchising & area development) has a positive relationship with system growth rate. (RB)*</p> <p>(2) However the empirical support refers only to the relationship not the causation. The authors think that it might be the case that systems with higher growth rates are able to attract MU-franchisees (i.e., area developers).</p>	NA
Bradach (1995)	130 loosely structured interviews held during 1989–1991 from people (franchisor and	More than one unit owned by a single franchisee is considered as MUF.	<p>The article explores the following:</p> <p>(1) MUF is more efficient for unit growth as compared to SUF, therefore franchisors who use MUF enjoy a higher growth rate</p>	NA

franchisees) working in 5 fast food restaurant chains in the United States	as compared to those who do not use this type of franchising arrangement. (OC)* (2) Franchisors revealed that MU franchisees and SU franchisees perform equally well in terms of uniformity. (3) The study disclosed that SU-franchisees are more efficient as far as local responsive is concerned. (OC)* (4) The MU-franchisors are more efficient in adopting the system wide changes made by the franchisor. (OC)*	Percent of franchisees that owned more than one outlet.	Confirmed
Kaufmann & Dant (1996) 152 franchisors in fast food restaurant industry in the United States (1986–1991)	H1: The greater the emphasis on franchising, the greater the system's growth rate. (OC)*	Percent of franchisees that owned more than one outlet.	Confirmed
	H2: The greater the proportion of franchisees holding multiple units, the greater the system growth rate. (OC)*		Confirmed
	H3: The greater the proportion of MU franchisees operating under area development contracts, the lower the system growth rate. (OC)*		Not confirmed
	H4: The greater the number of units per franchisee, the less the commitment the franchisor has to a strategy of franchising.		Confirmed
	H5: The greater the ability of the franchisor to attract financial capital elsewhere, the less commitment the franchisor has to a strategy of franchising. (RB)*		Confirmed

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APPENDIX Continued

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Bates (1998)	Secondary data about 52,088 small firms (franchised and non-franchised) that entered into business during 1984–1987.	N/A	The author explored possible causes of young franchisee discontinuance using econometric analysis of secondary data. Major findings of the study include the following: (1) The purchase of franchise does not lower the risk of closure as compared to independent start-ups. (2) The franchisors who purchased units from previous franchisee had a higher risk of closure. (3) The new units that are allotted to existing franchisors enjoy less risk of failure.	NA
Bercovitz (2003)	96 franchise systems operating in food, retail and automotive sectors in the United States	Number of MU outlets divided by total number of franchised outlets.	H1: A franchisor's use of disciplinary mechanisms will be negatively related to the franchisor's propensity to offer MUF opportunities. (TC)* H2: A franchisor's use of disciplinary mechanisms will be positively related to the concentration of MU ownership. (TC)*	Confirmed
Wadsworth & Morgan (2003)	145 franchise systems from the United States and Canada	Franchisees owning more than one unit	The important findings include the following: (1) MU franchisees account for 19.9% of total franchisees and own 52.6% of all units.	NA

	<p>(2) Overall average of number of units per franchisee in the United States is 1.7, whereas MU franchisees own on average 4.5 units.</p> <p>(3) Certain industries have more propensity of MUF; these include fast food, automotive, restaurant, and retail food, and the like.</p> <p>(4) The franchisors use higher proportion of MUF to increase the growth rate of their systems or to reward the high-performing franchisee.(RB)*</p>		
Bercovitz (2004)	64 franchise system from fast food and other retail sectors in the United States.		<p>H1b: Given franchising, the franchising that particular franchised outlet will be one of several owned by an individual franchisee will be negatively related to the level of shirking-based monitoring costs. (AC)*</p> <p>H2b: Given franchising, the probability that particular franchised outlet will be one of several owned by an individual franchisee will be positively related to the level of the free-riding hazard. (AC)*</p> <p>H3b: Given franchising, the predicted relationship between the use of MUF and brand name value (spillover potential) will become more positive as the level of the spillover potential (brand name value) increases. (AC)*</p> <p>The article explores those factors that effect the allocation of new units. The authors draw following conclusions:</p>
Kalnins & Lafontaine (2004)	Secondary data about 3,428 units in fast food industry in Texas	An owner who has more than one unit is considered as MU owner.	<p>Not Confirmed</p> <p>Confirmed</p> <p>Confirmed</p> <p>NA</p>

(Continued)

APPENDIX Continued

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Weaven & Frazer (2004)	114 franchisors in Australia	Franchise density was calculated as ratio of number of franchisees divided by the number of franchise units in the system.	<p>(1) MUF is frequently used by franchisors.</p> <p>(2) Geographical closeness of the exiting unit has an effective role in allocation of new units to the exiting franchisees; the same applies to company owned outlets as well. (AT)*</p> <p>(3) The franchisors prefer to allocate new unit to those existing franchisees who have experience of operating the in similar markets. (RB)*</p> <p>H1: There is a positive relationship between MUF and franchise system maturity. (OC)*</p> <p>H2: There is a positive relationship between MUF and the degree of franchise system corporatization. (OC)*</p> <p>H3: There is a positive relationship between MUF and franchise systems characterized by plural forms of distribution</p> <p>H4: There is a negative relationship between MUF and the level of conflict within the franchise system. (AC)*</p> <p>H5: There is a positive relationship between MUF and availability of geographically contiguous franchise units. (AC)*</p> <p>H6: There is a positive relationship between MUF and system reward strategies. (AC)*</p> <p>H7: There is a positive relationship between MUF and firm growth. (RB)*</p>	Confirmed Not confirmed Not confirmed Not confirmed Not confirmed Not confirmed Not confirmed

Kalnins & Mayer (2004)	Outlets in pizza restaurant industry in Texas.	More than one unit affiliated to a franchisee are considered as MU outlets.	H1a: The likelihood of unit's failure will decrease with that unit's congenital experience gained locally by its owner. H1b: The likelihood of a unit's failure will increase with that unit's congenital experience gained distantly by its owner.	Confirmed Not confirmed
Gruenhagen & Mittelstaedt (2005)	192 franchisees belonging to 14 fast food franchise systems in the United States	Franchisees having more than one unit	H1: Compared with area development franchisees, sequential MU-franchisees are more likely to report that, at the time they became MU-operators, they had a greater entrepreneurship motivation. H2: Compared with sequential MU-franchisees, area development franchisees are more likely to report that, at the time they became MU-operators, they had a greater investment motivation.	Confirmed Confirmed
Grag, Rasheed, & Priem (2005)	94 usable responses from franchisors operating in various industries in USA	Intend to use MUF was measured by a dummy variable (Yes/No)	H1: The greater the franchisor expectation of unit additions, the more likely the franchisor will be to use MUF. (AT)* H2: Within MUF, the greater the franchisor expectation of unit additions, the more likely the franchisor will be to use area development franchising. (AT)* H3: The greater a franchisor's emphasis on uniformity, the more likely the franchisor will be to use MUF. (OC)* H4: Within MUF, the greater the franchisor emphasis on uniformity, the more likely the franchisor will be to use area development franchising. (OC)*	Confirmed Confirmed Not confirmed Confirmed

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APPENDIX Continued

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Weaven & Frazer (2006)	19 (10 single unit and 9 multi-unit) franchisees of McDonald's franchise system in Australia	Franchisee owning two or more units is considered as MU-franchisee.	<p>H5: The greater the franchisor's emphasis on local responsiveness, the less likely the franchisor will be to use MUF. (RB)*</p> <p>H6: Within MUF, the greater a franchisor's emphasis on local responsiveness, the less likely the franchisor will be to use area development franchising. (RB)*</p> <p>The major findings of article include:</p> <p>(a) While entering into franchise relationship, SU franchisees mainly focus on strength of franchisor brand, initial training days, operations freedom, and opportunities to employ family members.</p> <p>(b) MU franchisees consider business concept, ongoing training and support, professionalism of the governance structure, potential for expansion, and level of involvement in decision making as important factors while assessing a franchise offer.</p>	Not confirmed Confirmed NA
Sanchez, Saurez, & Vazquez (2006)	138 franchise systems operating in Spain.	Intensity of use of MUF is calculated by dividing franchised units by franchisees in the system.	<p>H1: The greater the density of the franchise system, the greater will be the intensity of the use of MUF. (AT)*</p> <p>H2: The greater the franchise system, the greater will be the intensity of use of MUF. (RB)*</p>	Confirmed Confirmed

			H3: The greater the growth of the franchise system, the greater will be the intensity of use of MUF.	Not confirmed
			H4: Service franchise systems will use MUF more intensively than retail franchisors. (AT)*	Confirmed
Weaven & Frazer (2007a)	Convergent interviews from 23 Australian franchisors operating in various business sectors	MUF refers to a situation where a franchisee owns more than one outlet.	P1: There is a positive relationship between multiple-unit franchising and a franchisor's perception of future buy-back potential of profitable units. (RB)*	Not confirmed
			P2: There is a negative relationship between multiple-unit franchising and a franchisor's perception of future agency cost minimization. (AT)*	Confirmed
			P3: There is a positive relationship between multiple-unit franchising and system-wide adaptation to changes in the marketplace. (OC)*	Not confirmed
			P4: There is a positive relationship between multiple-unit franchising and system uniformity. (OC)*	Confirmed
			P5: There is a positive relationship between multiple-unit franchising and local market innovation. (RB)*	Not confirmed
			P6: There is a positive relationship between multiple-unit franchising and franchisor's perception of future chain franchise opportunism. (AT)*	Not confirmed
			P7: There is a positive relationship between multiple-unit franchising and value of the franchise system brand. (AT)*	Confirmed
			P8: There is a positive relationship between multiple-unit franchising and the availability of geographical contiguous franchise units. (AT)*	Confirmed

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APPENDIX Continued

Study	Data	Operationalization of multi-unit franchising	Hypotheses/major findings	Hypotheses confirmed/not confirmed ²
Weaven & Herington (2007)	Qualitative multiple case study approach was used to analyze 19 franchisors operating in Australia	N/A	<p>P9: There is a positive relationship between multiple-unit franchising and system reward strategies of granting units in the system. (AT)*</p> <p>The findings suggest the following:</p> <p>(1) System size, industry maturity, and nature of market demand influence the choice of governance structure of the system.</p> <p>(2) Generally less sophisticated HRM policies are employed by the small and less mature franchise systems that predominantly use single unit franchising. (OC)*</p> <p>(3) Conversely, mature and large franchise systems employ MUF and sophisticated HRM policies. (OC)*</p> <p>(4) MUF networks share information more effectively, and MU franchisees are more likely to adopt system wide adoptions as compared to SU franchisees. (OC)*</p>	Confirmed
Weaven & Frazer (2007b)	17 franchisors from various industries in Australia	Convergent interviews conducted to collect the opinions of respondents and test hypotheses. Ownership of more than one unit by a single franchisee refers to MUF.	<p>H1: There is a positive relationship between the age and size of the franchise system and multiple unit franchising adoption. (RB)*</p> <p>H2: There is a positive relationship between the degree of franchise system corporatization and multiple-unit franchising adoption. (OC)*</p>	Confirmed

Confirmed	H3: There is positive relationship between franchise systems characterized by plural form of distribution and multiple unit franchising adoption. (OC)*		Cochet, Dormann, & Ehrmann (2008)	208 franchisees from 11 franchise systems operating in various business sectors in Germany
Confirmed	H4: There is a negative relationship between the level of conflict within the franchise system and multiple unit franchising adoption. (AT)*			
Not confirmed	H5: There is a positive relationship between the level of franchise system complexity and multiple unit franchising adoption.			
Confirmed	H1: The extent of franchisee autonomy is positively related to the intensity of relational governance in any dyad. (AT)*	Number of units owned by a franchisee		
Weakly confirmed	H2a: The number of outlets owned by a franchisee will moderate the relationship between the extent of autonomy and relational governance intensity specifically; the positive relationship between autonomy and relational governance will be less strong among MU than among SUF. (AT)*			
Confirmed	H1: There exist positive economic rents, ex ante and ex post, in franchise chains. (AT)*	Franchisees owning more than one unit are considered as MU-owners.	Lopez-Bayon & Lopez-Fernandez (2008)	22 chains from Spanish restaurant industry
Confirmed	H2: Economic rents at the outlet level will be higher for MU-franchisees compared to SU-operators. (AT)*			

¹Only those hypotheses and important findings listed in the appendix relate to MUF.

²Confirmation/non-confirmation refers to the results of statistical tests.

*AT means that the hypothesis is primarily compatible with the agency theory. OC means that the hypothesis is primarily compatible with the organizational capabilities view. TC means that the hypothesis is primarily compatible with the transaction cost theory. RB means that the hypothesis is primarily compatible with the resource-based view.