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TO CONTROL OR NOT CONTROL: A COORDINATION PERSPECTIVE TO SCALING

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Abstract

Over the past few years, the question of how social enterprises can effectively scale their impact to reach people and communities has received increasing attention from various parties such as policy makers, governments, various organizational leaders and academicians. In the organizational literature, the discussion has mainly evolved around appropriate strategies for scaling and focused on branching, affiliation and dissemination as three main organizational modes, each with their respective pros and cons. Literature to date has descriptively dealt with governance structures and the local adaptation issues under these forms. In this article, we seek to advance this line of thinking by zooming inside organizational modes adopted by social enterprises in their scaling attempts and fleshing out mechanisms at play for the functioning of these modes. For this purpose, we explore the simultaneous use of three organizational modes under one organizational umbrella in a non-profit setting, allowing for a comparative analysis of mechanisms enabling such a complex organizational structure serve its purpose(s). Further, we discuss the appropriate control mechanisms and depth of coordination an organization attempts to achieve associated with distinct modes of scaling.

Keywords: social entrepreneurship, scaling, control, coordination.

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Introduction

The question of how social initiatives can effectively scale their impact to reach individuals and communities that benefit from their innovations has received increasing attention over the past few years. A number of scholars adopt a strategic perspective and investigate the mechanisms to scale social *organizations* (Bradach, 2003; Oster, 1996), while others argue that scaling organizations is not necessarily sufficient to scale *impact* (Uvin, 1995; Wei-Skillern and Anderson, 2003). The latter group of authors argues that scale is not a particularly good proxy for the effectiveness of the programs (Frumkin, 2007), and that becoming large is only one of the many other possible ways of expanding impact in terms of the number of beneficiaries served (Edwards and Hulme, 1992; Uvin et al., 2000). These authors emphasize that instead of focusing on growing organizations, we need to turn attention to more effective and inclusive ways to address social problems.

Current discussions on scaling predominately concentrate on how to enhance social *impact* and include a broad spectrum of activities:

> "Expanding the quantity and improving the quality of the services provided directly by [the focal] organization; enabling other organizations to provide a higher quantity and quality of direct services; changing the political, cultural, or economic environment to reduce the need or problem; attracting more or improving the productivity of resources devoted to addressing the need or problem" (CASE, 2006, p. 9).

In this chapter we deliberately assume a narrow view and adopt an organizational perspective on scaling. This allows us to reengage with an important stream of literature that has emphasized the role of control in organizational achievements. Although the level of control exerted differs from one organizational setting to another, control is essential in any type of organization to coordinate organizational members toward coherent goals. In this chapter we analyze an eye care system, representing a tightly controlled setting, in order to disentangle the mechanisms underpinning coordinated efforts toward scaling.

Scholars define three modes for scaling social innovations: branching, affiliation, and dissemination. Accordingly, an awareness of the potential options help social entrepreneurs in

specifying the core of the strategy for scaling their organizations' social impact. While we know that moving along a continuum, from dissemination to affiliation to branching, organizations require larger amounts of resources and an increasing degree of control (Dees et al., 2004), we know little about how such control is exerted. A better understanding of how organizations scale, the mechanisms they put into use for achieving differing degrees of control under different organizational modes, can help both organizations and entrepreneurs align their strategies with appropriate design features. In order to shed light on the mechanisms at play, we investigate Aravind Eye Care System,[1] a nonprofit organization based in India providing eye care services to poor people. Aravind serves as a unique setting for zooming inside organizational modes since it is a rare example of an organization that applies the three modes simultaneously. Based on our interview data as well as on longitudinal data for a number of past and ongoing scaling efforts that employ different organizational strategies and structures, we identify the mechanisms employed by Aravind under the three organizational modes. It is our hope to provide social entrepreneurs with the know-how to design the tools they need for exerting differing degrees of control once they decide on the organizational mode for scaling their social impact.

Scaling Social Impact: an Organizational Perspective

Recently, there has been an increasing interest among organizational scholars to conceptualize the strategies that social organizations pursue in their scaling attempts (Bradach, 2003; Dees et al., 2002, 2004; Uvin, 1995; Uvin and Miller, 1996; Uvin et al., 2000; Wei-Skillern and Anderson, 2003). Three dominant organizational modes for scale are described in the nonprofit world as branching, affiliation, and dissemination. A case study survey on social enterprises reveals that 77 percent of the organizations investigated for the study employed branching, 41 percent affiliation, and 36 percent dissemination as their scaling strategy (La France Associates, 2006).

Accordingly, *branching* is a direct activity (Uvin et al., 2000), where all units are legally part of one organization: a setting analogous to company owned stores (Dees et al., 2002). This mode is the closest one to 100 percent replication of the original model as it involves only a few adaptations. In *affiliation* mode, independent legal entities are tied with the founding structure through a formalized contract that specifies the procedures and practices to be shared by all sites (Dees et al., 2002). Organizations employing this mode can increase impact both directly – by delivering services to a larger number of people –and indirectly – by inducing partners to undertake new activities that are geared to enlarging the overall impact (Uvin et al., 2000).

Finally, *dissemination* typically relies on contractual agreements and the focal organization actively shares information with the recipient organization for the adoption of the model (Dees et al., 2002, p. 5). Frequently referred to as diffusion, spread, or political scaling out, the dissemination mode is an indirect means for greater impact, where "non-profits that are capable of learning the lessons from their operational programs diffuse the resulting knowledge through training, information sharing, consultancy and advice whether to other non-profits, governments, or international donors" (Uvin et al., 2000, p. 1414). While the process of spreading ideas or knowledge is not amenable to a great deal of control (Frumkin, 2007), dissemination mode is advantageous in that it not only allows nonprofits to increase their impact without expanding in size (Uvin et al., 2000), but is also a prerequisite for learning which elements of the program are relevant to be routinized for expansion through large scale operations (Korten, 1980).

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[1] Hereinafter referred to as Aravind.

Dees et al. (2004) suggest that all these organizational modes – branching, affiliation, and dissemination – should be considered as a continuum in terms of increasing degree of central coordination and resource requirements toward branching. The authors argue that dissemination is the simplest and usually the least resource intensive mode since "the originating organization has at most a short-term agreement to provide technical assistance to those who would use this information to bring the innovation to a new locale" (Dees et al., 2002, p. 5). However, according to the authors, the disseminating organization has little control over implementation in new locations (Dees et al., 2004). Dees and his colleagues (2004) argue that branching, at the other end of the spectrum, offers the greatest potential for coordination and commonly requires the greatest investment of resources by the focal organization.

In this chapter, we seek to go beyond static descriptions of organizational modes adopted by social enterprises in their attempts to scale social impact. We seek to contribute to the organizational perspective on scaling impact through a systematic analysis of the mechanisms employed by a nonprofit organization to activate varying degrees of control in three organizational modes. By unpacking the "nuts and bolts" of a successful initiative, we hope to provide tools for social enterprises in determining the design features of their organizations to achieve fit with their intended strategies.

Organizational Control

Control is one of the main pillars of organizational design. Tannenbaum (1968) defines control as "any process in which a person (or group of persons or organizations of persons) determines or intentionally affects what another person, group, or organizational will do" (p. 238). Control can be conceptualized as how much power an organization has over its other resources and subunits (Floyd and Lane, 2000; Jaeger and Baliga, 1985; Kirsch, 1996; Tannenbaum, 1968), or as the processes by which the firm coordinates the activities (Lebas and Weigenstein, 1986; Ouchi, 1979, 1980; Tushman and Nadler, 1978). To date, scaling scholars have focused on the former perspective and analyzed the degree to which organizations can control the implementation of its practices in new locations. In this chapter, we adopt the latter perspective and investigate the mechanisms that enable coordination within and between subunits once the organization chooses the organizational mode(s) through which it scales its impact.

Control is crucial in ensuring that organizational members direct their efforts toward the attainment of organizational objectives (Olsen, 1978). In designing the control system, it is important to keep coherence with the strategy, and to implement features that ensure progress toward desired organizational and social outcomes (Chenhall, 2003). A study on social enterprises replication efforts supports these arguments suggesting that one of the key questions to be addressed in a replication strategy is "what level of control does the social enterprise want to have over replicated entities?" (UnLtd Ventures, 2008). Accordingly, the degree of control the organization seeks to exercise is important in ensuring that the appropriate structure is chosen for replication of the social innovation in new locations. However, understanding how much control the focal organization can employ is not sufficient. We need a better understanding of the design features that enable the activation and maintaining of the level of control the organization seeks to exercise under various organizational modes.

This study is based on an instrumental case study research design. Our research setting, Aravind, uniquely combines three modes of scaling discussed in the popular literature on scaling, namely branches, affiliation, and dissemination. The mission of the organization is to eliminate needless

blindness by: 1) providing compassionate and high quality eye care for all in its branch hospitals; 2) working with socially committed partners in underserved areas of India and other developing countries in its affiliated hospitals, and 3) providing teaching, training, capacity building, advocacy, research, and publications in its dissemination mode.[i] As suggested by the literature, all those modes/strategies require different levels of resource commitments and control properties. In the rest of the chapter, we provide an analysis of how the focal organization in this study coordinates its activities around the sub-purposes mentioned earlier. We build on longitudinal archival data as well as interviews and observations from multiple field trips to conduct a comparative analysis on the specific coordination mechanisms characterizing each mode.

Aravind Eye Care System

Aravind was founded in 1976 with the objective of overcoming preventable blindness in resource-poor settings, India being the initial target. According to World Health statistics,[2] as of 2009, there are about 314 million visually impaired people worldwide, of which 45 million are blind. Geographic distribution of people with visual problems is not even: approximately 87 percent live in developing countries. In India, in particular, over 12 million people—of which 63 percent are cataracts — are visually handicapped (IndiaStat, 2004). It is estimated that more than 6 million operations are needed per year to tackle the rising incidence rate (Bhandari et al., 2008). Infrastructure deficiencies in India to meet this need energized Dr. Govindappa Venkataswamy —known to many as "Dr. V." — to start Aravind Eye Care System.

The initial goal of the organization was to provide quality eye care surgeries at reasonable cost. Over time, however, Aravind built a self-sustaining business model, where the quality of eye treatment combined with compassionate care and the efficiency of operations are its main strengths. Aravind charges below-market prices for patients who can afford the surgery and cross-subsidizes the income generated therein for the patients who cannot afford to pay. Today, approximately 60 percent of the all operations at Aravind are provided for free or at a low cost (Bhandari et al., 2008).

The ability to provide free and/or low cost surgeries to poor people while being financially self-sustaining is due to the efficiency achieved at Aravind. Two key components of the innovative Aravind model are among the many things that help explain the level of efficiency achieved: cost cutting through establishment of Aurolab, the lens manufacturing division of Aravind, and the large volume of surgeries thanks to the flow of operations. From its establishment until 1992, intraocular lenses needed for cataract surgeries were donated by American manufacturers for Aravind to fulfill its social mission. However, the fast growth in the number of surgeries proved the model based on donations infeasible. To overcome the dependence on other parties in its operations, Aravind established Aurolab in 1992 and started producing its own lenses for ten dollars each while the market price for the same variety was two hundred dollars in the United States.

The other key component of the Aravind efficiency model is the "serial production model" inspired by the McDonald's food chain model (Bhandari et al., 2008). Young girls hired from villages are trained for two years to become mid-level ophthalmologists (MLOPs) who can fully prepare patients for operation. The doctor, having two operating tables one next to another, takes solely six minutes to perform a cataract surgery and has the next patient ready by the time he finishes one operation. These two examples illustrate many of the innovative dots of the Aravind

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[2] http://www.who.int/mediacentre/factsheets/fs282/en/index.html (last access: October 22, 2009).

business model through which it sought to increase productivity at the lowest cost possible, and hence to serve as many people as possible.

Efficiency is the key to success in this type of setting, and Aravind puts utmost effort into maintaining quality while providing large volume of eye care service. The organization emphasizes “treating rich and poor people alike” as the core principle of the organizational culture, and is driven by values such as modesty, sincerity, dedication, teamwork, conservatism, growth, spirituality, discipline, and energy to help the poor sector. According to the founders, commitment to the value system established at Aravind is vital to the sustainability of the model over years and across contexts.

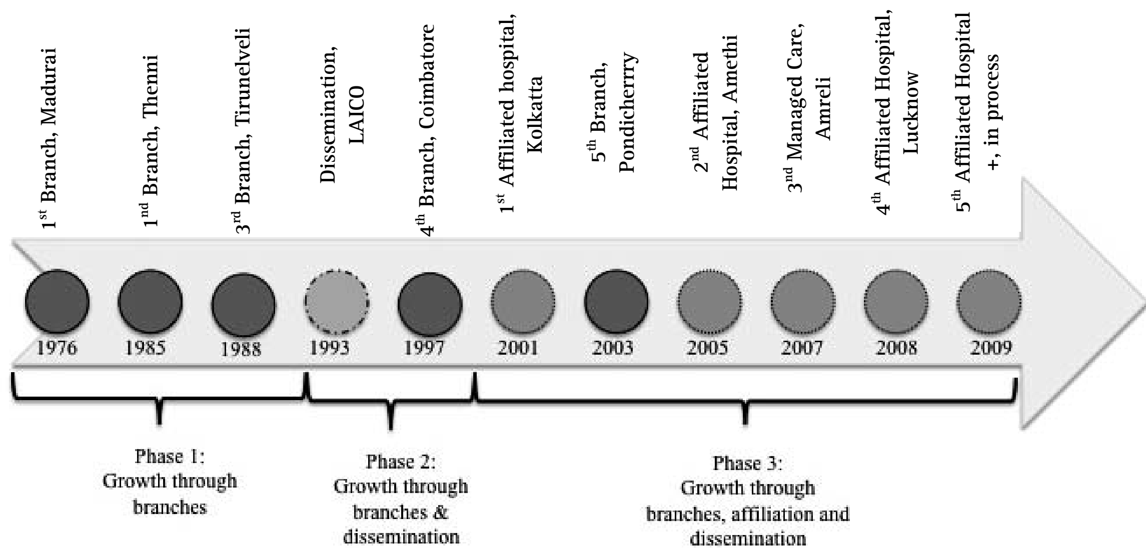
Since its inception, therefore, Aravind is faced with two major conflicting challenges that are common to many social enterprises: 1) How to scale up their innovative health service business model to build capacity for achieving their strategic objective of delivering one million eye surgeries per year by 2015? 2) How to cultivate and maintain value consistency across the system throughout expansion?

Organizational Evolution

Having started off with an 11 bed capacity, Aravind increased its number of cataract surgeries from a total of 29,928 in 1988 (Natchiar et al., 2008) to 269,577 in 2008, performed at five branches. Today, Aravind Eye Care System is the largest provider of eye care in the world: the organization performs approximately 270,000 surgeries per year and serves over two million patients in its branch and affiliated hospitals; it has provided consulting and capacity building services to 216 hospitals across India, South East Asia, and Africa.[3] Figure 1 provides an overview of the evolution of the organizational modes adopted by Aravind over time.

Figure 1

Timeline and phases of the Aravind Eye Care System evolution



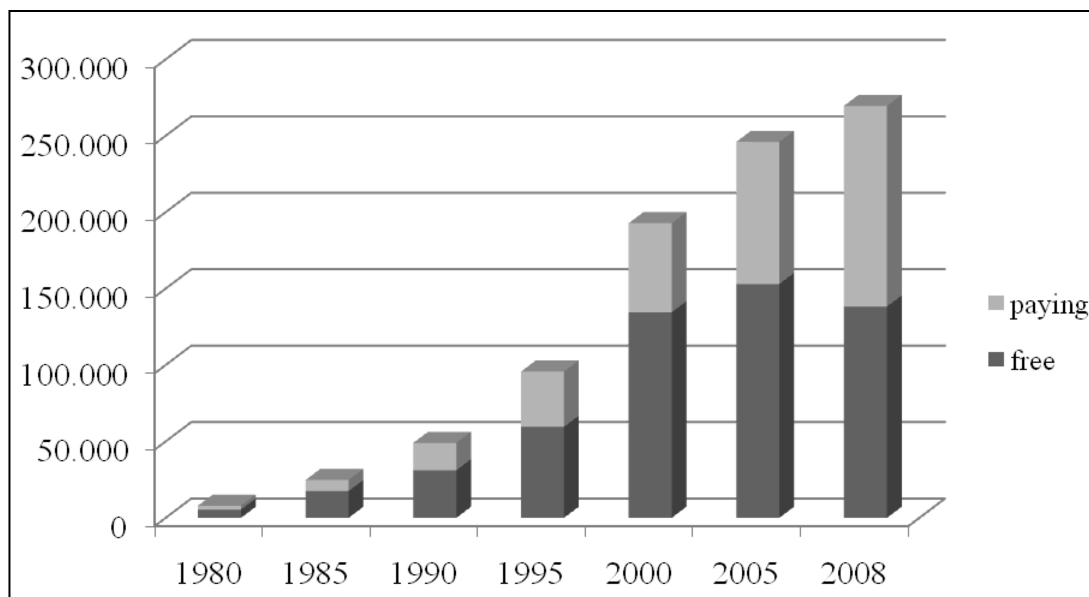
[3] See www.aravind.org

As Figure 1 suggests, Aravind expanded only through branches in *Phase 1*. After expanding its capacity to 250 beds in Madurai, the organization built its Thenni branch in 1985 and Tirunelveli in 1988. By the beginning of (?) 1990s, Aravind had obtained "proof of concept" through its hospital in Madurai and the successful replications of the main hospital in two other Indian cities. The success of the Aravind model attracted the attention of other organizations that sought to collaborate with it in different ways. *Phase 2* started with Lions Clubs International Foundation approaching Aravind to join forces for overcoming blindness. Lions had raised money to fight cataract blindness and the organization decided to use the fund for improving poorly performing hospitals around India instead of building new ones. Leveraging the knowledge base it accumulated over years, in 1993 Aravind standardized its practices and created templates for strategies to generate demand, provide low cost high quality services, and achieve financial viability. In 1996, Lions Institute of Community Opthalmology (LAICO) was officially established through which Aravind started disseminating knowledge by training healthcare and managerial personnel in the development and implementation of efficient eye care services. *Phase 3* started in 2001 when Aravind, for the first time, was approached by a third party organization to establish affiliated hospitals. From then onward Aravind has been expanding its impact through a combination of all three organizational modes mentioned in scaling literature: branching, affiliation (a.k.a. managed care in Aravind terminology), and dissemination (a.k.a. consulting and capacity building projects through LAICO).

Today, Aravind has five branch hospitals with nearly 4,000 bed capacity, four affiliated units and plans of reaching a target of 25 affiliated hospitals and 1 million surgeries by 2015, and has provided capacity building services to 216 hospitals and indirectly helped them increase their performance significantly. Figure 2 provides an illustration of the performance data on Aravind branch hospitals. Social impact achieved through these direct (branching and affiliation) and indirect ways of scaling (dissemination) is evident: the evolution described has played a major role in increasing the cataract surgery rate in Tamil Nadu (from 2,039 in 1988 to 7,633 in 2005) and in India as a whole (Natchiar et al., 2008).

Figure 2

Number of surgeries performed in branches over years



However, as mentioned earlier, since its inception, Aravind has endeavored to fulfill dual objectives simultaneously: scaling social impact to overcome blindness and keeping value consistency within the system throughout expansion. In the rest of the chapter, we illuminate the key mechanisms at play under the three organizational modes employed by Aravind to demonstrate its efforts to serve those dual purposes. As suggested by previous research on scaling, we also observe that Aravind has greatest control over its resources in branches and decreasingly so toward the dissemination mode. However, our analysis pushes the thinking on control issues in social enterprises by providing a coordination perspective where we systematically investigate the mechanisms enabling the functioning of a complex system encompassing three organizational modes simultaneously.

Mechanisms at play

Our data reveal that in trying to maintain consistency across the system in terms of practices, procedures, and values, Aravind uses patterns of coordination activities that are organized under four mechanisms: *training*, *mobility, communication,* and *sharing of knowledge through templates*. That is to say, the organization attempts to: 1) train organizational members in order to teach them skill and cultivate values; 2) rotate organizational members to cultivate values in newly established hospitals and maintain values in existing ones; 3) ensure communication between the hospitals mainly to monitor performance measures and also to reinforce the other two mechanisms, and 4) provide up-to-date templates reflecting its best practices to be shared with third party hospitals. However, as the following analysis demonstrates, differences between organizational modes in terms of their subgoals determine whether a mechanism is employed by an organizational unit and, if yes, to what extent.

Training

Training is necessary in establishing control because while providing organizational members with the necessary abilities to be functional in the organization, it allows the organization to communicate and cultivate its expectations (Jaeger and Baliga, 1985). At Aravind, there is a strong emphasis on training. Especially in branches and affiliated hospitals where Aravind seeks to establish tight relationships with its partners, training serves as a mechanism to establish and maintain consistency not only in terms of operations but also in terms of values and culture. Differences remain, however, between branches and affiliated units since affiliation mode limits the organization's span of control. At the other end of the spectrum, Aravind provides training services mainly to share its best practices with other hospitals. Therefore, training is less intensive in terms of duration and levels of organizational members involved from the third party hospitals.

More specifically, in the *dissemination* mode, clinical and management staff from clients, and managers from funding agencies receive training mainly at LAICO that is located at the base hospital. Depending on the need, however, other branches also get involved in training of the consulted hospitals under dissemination mode. While the standard version of the training provided in this mode is a one-week vision-building workshop, depending on the demand from the client, duration of the training ranges from several days up to a year.

Training in affiliated units and branches, however, goes beyond short- to long-term workshops. In the case of *affiliated hospitals*, clinical and management staff get trained in the responsible branch, although for slightly shorter periods than the staff that are employees of branches.

Doctors of affiliated units are sent to Madurai for three months: two months for organizational orientation and one for surgical training; and the duration of the MLOP training varies between six months to one year, while locally recruited doctors and other medical staff receive bundled training in various branches for one to several months. Aravind puts great effort into going beyond teaching operating skills through their training programs in affiliated hospitals. According to one of our interviewees, operating skills are easy to learn; what makes the difference is the "attitude toward patients" that organizational members acquire throughout training.

In *branches*, same as affiliation units, all clinical and management staff gets trained; however, training in this mode takes place only at base branch. This centralized approach ensures the highest level of homogeneity possible. In branching mode, training of the branch staff is considered to be an ongoing activity, as the organization considers branches as the originating points for disseminating the original business model and the staff there is considered to be learning-by-doing on a continuous basis. Moreover, training takes more time in this mode. For instance, MLOP training is two years instead of one in branches. Our informant responsible for the training of the staff explains that the first year of branch MLOP training includes teaching skills and values, and the second year is for "molding" them for Aravind culture.

Table 1 compares branches, affiliated hospitals, and dissemination mode in terms of their use of mechanisms. As shown, training gets more intensive toward branches. Drawing from the literature on control mechanisms and our observations, we expect that organizational subunits that are subject to more intensive and centralized training are likely to be more coordinated with the original model.

Table 1

Coordination mechanisms at use under different organizational modes

	Branches	Affiliated Hospitals	Dissemination
Training	• Centralized • Longer	• Decentralized • Shorter	• Decentralized - centralized • Shortest
Communication	• Larger scope in terms of levels of staff involved • Higher frequency	• Smaller scope in terms of levels of staff involved •Lower frequency	• Smallest scope in terms o levels of staff involved • Lowest frequency
Mobility	• Larger scope during establishment • Larger scope and higher frequency at established hospitals	• Smaller scope during establishment • Smaller scope and lower frequency at established hospitals	• Smallest scope • No repetition, merely visits
Templates	No templates	In process	Extensive use of templates

Communication

Communication is also crucial in establishing and maintaining control, because as Stacey (1993) puts it: "control operates through self organization: through the spontaneous formation of interest groups and coalitions around specific issues, communication about those issues,

cooperation and the formation of consensus and commitment to a response to those issues" (p. 242). In other words, communication is a means to control and helps build commitment. Although at varying degrees among branching, affiliation, and dissemination modes, communication is extensively used by Aravind as a mechanism to monitor various performance outcomes in its lightest form, and to be aware of changes taking place in different parts of the system, to be informed about emerging problems, to harmonize problem solving efforts, and to acknowledge accomplishments.

Under the *dissemination mode*, communication is limited. While the heads of client hospitals and involved funding agencies receive reports from Aravind regarding the general outcomes of consulting projects, in return, they provide Aravind with monthly standardized reporting on financial and outcome measures.

In *affiliated units*, standardized performance reports are produced and shared with the branches. Moreover, subjective reporting on outcomes and quality are exchanged on an individual basis between hospital heads and AMECS staff at the headquarters. There is also ongoing emailing and telephone calls on a nonstandardized basis between management, clinical staff (doctors and nurses) with senior staff from branch in charge. One of our interviewees explains that he meets with doctors at the end of the month to discuss the reasons for the complications, how they handle them, and how they could be overcome. Moreover, every six months all supervisors gather to have an interaction with one of the founding members and discuss what they have been doing. In these meetings, information is presented to the vice chairman and is then spread throughout the system.

Within the *branches*, there is continuous exchange of information and experience between staff at all staff meetings. Moreover, communication is more frequent and the tools used more elaborate in comparison to affiliation units. Other than the standardized and comprehensive reporting agendas on finance, performance, and quality measures, there is ongoing teleconferencing, internal mailing lists, internal newsletters, and journal clubs to share experiences, frequent meetings of hospital, clinical, and nursing heads at the base hospital, and semiannual auditing team visits that are still to be standardized. One of the hospital administrators interviewed explained that every change made in the branch hospitals is communicated to the main branch, and that the change is integrated into the system if it is considered valuable to the system.

As Table 1 suggests, in branch hospitals, communication is more frequent and covers a larger scope of staff levels. As we move along the continuum, however, smaller numbers of staff levels get involved in coordinating the activities and communication channels are less frequently utilized. Therefore, while in the case of branching communication serves as a strong mechanism to ensure coordination and consistency across units, in the dissemination mode, it barely has positive effects on the performance of the consulted hospitals.

Mobility

One distinctive practice employed by Aravind to ensure consistency throughout the system is the continuous movement of organizational members. This mechanism is predominantly evident in managed care and branch hospitals. The rationale behind this mechanism is to establish commitment to organizational values in newly established hospitals, and to maintain Aravind value system across the already existing hospitals. Mobility is effective in maintaining consistency across the system because it goes beyond formal training methods by teaching values through role models. Value training or socialization is an interpersonal process of informally or implicitly teaching organizational values and behavioral expectations to organizational members

to bring them in line with what is required for successful participation within the organization (Etzioni, 1961; Jaeger and Baliga, 1985). The use of this mechanism varies significantly across organizational modes at Aravind.

In the *dissemination mode*, clinical and management staff from hospitals involved in capacity building projects visit Aravind hospitals to observe the functioning of the system, only for short durations though.

In *affiliated units*, both clinical staff (doctors and nurses) and management staff (hospital and department administrators) rotate on a temporary basis. Especially during the establishment of the affiliated units, senior clinical staff and one hospital administrator move temporarily to the unit until the system is in place. This generally takes about two years. Moreover, for their training purposes, MLOPs visit the branch associated with the affiliated hospital they will eventually settle down in. MLOP training used to take four months in the making of the affiliation mode; however, it is now increased to one year to enhance learning. Nurses interviewed confirm that spending time in branch hospitals is key to understanding the Aravind-way-of-doing-things. However, this process is not repeated after the training period is over. Once the best practices are settled and core values cultivated, an unsteady circulation of the senior level staff or high potential candidates starts from branches to affiliation hospitals. This is the main distinction between mobility of staff in affiliated hospitals and branch staff, although senior management is currently considering standardizing the ongoing rotation of the former to reenergize them periodically.

In the case of *branches* there is a *steady* circulation of clinical staff and management staff. All clinical and administrative members take on duties in various branches before they settle down to one. The chief training officer for MLOPs explains that rotation during and after training ensures that branch members experience at least three hospitals before they settle in. Moreover, any organizational member can be called on duty when a new branch is to be established. So, establishment of branches involves not only senior executives, but also all levels of hospital staff, including housekeepers, MLOPs, operation theatre nurses, and so on. During the establishment of one of the branch hospitals, for instance, out of 150 people needed for the new hospital, 130 were transferred from other branch hospitals to ensure that the value system was in place. One of the informants highlights that they started employing local people only after the system was settled in that new branch hospital, and when the established system could absorb those newly hired within a short period of time.

As Table 1 demonstrates, dissemination lies at the far end of the continuum: only hospital heads are involved in the process and they visit Aravind hospitals for only short periods of time to observe the functioning of the system. In branch hospitals, during start-up of new hospitals and ongoing operations, mobility covers the largest scope of employee levels and is most frequent. Although differences remain between branches and affiliated hospitals, people in branches and affiliated units are mobilized for ensuring that they learn the Aravind-way-of-doing-things through firsthand experience; and they are expected to serve as role models committed to Aravind values when they settle in a hospital. Therefore, while employed at varying degrees, mobility at Aravind serves a strong mechanism for establishing and maintaining consistency across the system.

Templates

Organizational literature suggests that templates are useful for sharing codifiable practices with other organizations (Jensen and Szulanski, 2007; Jensen et al., 2003). Although having access to a template does not ensure that the template is used by the recipient unit, it helps the focal

organization to communicate its practices and serve as a means to reproduce the complex set of interrelated organizational routines necessary when setting up a site for independent production or for improving the practices of an existing organization. At Aravind, generating templates is related both to the size of the operations of organizational modes and to the depth of content Aravind coordinates with other hospitals. Accordingly, template use becomes more salient when the focal organization seeks to coordinate the activities with a larger number of hospitals and when it seeks only to coordinate practices rather than to transfer tacit knowledge that is embedded in individuals (Nonaka, 1994; Polanyi, 1966).

Hence, template is the mechanism that is mainly used by *dissemination mode*. To share its knowledge base on human resource management, infrastructure, systems, and procedures built over time at the branches, Aravind has prepared extensive templates related to demand generation, quality, and financial viability. Having standardized the mainstream activities that are considered to have a positive effect on performance in terms of number and quality of surgeries and hospital performance, and having prepared simplified checklists out of them, Aravind has shared knowledge with 216 eye hospitals across India, South East Asia, and Africa to date.

There are no templates available for the *affiliated units*, although the senior management at Aravind considers having templates for this mode as an emergent necessity. One of the interviewees highlights that mistakes that were made during the making of affiliation mode might not be affordable with intended scaling efforts through this mode (i.e., reaching the target of one million surgeries per year via twenty-five affiliated hospitals to be established by 2015). Another informant also confirms that standardizing the process and generating templates simplify the scaling efforts as it prevents the organization from reinventing the wheel and helps in focusing on novel tasks.

"In the branches there is almost zero documentation: mind wise, it's more like that," says one of the senior managers regarding the use of templates in *branches*. Another informant explains that branches do not need templates due to the accumulated knowledge in humans. In other words, in trying to maintain full consistency across its branches, Aravind relies more on the other three coordinating mechanisms mentioned earlier rather than on template use.

As Table 1 suggests, templates are mainly used in the dissemination mode for sharing practices. Since Aravind seeks to coordinate values as well as practices in branches and affiliated hospitals, to date, templates have not been utilized under these two modes. However, the need for standardizing activities becomes more salient as the affiliation mode evolves to become a larger subsystem. Therefore, templates are in process to ensure that the basics of the complex Aravind model are shared with newly established units via templates, and higher order coordination is to be maintained through the support from the other three mechanisms.

Organizational Modes, Coordination, and Scaling

The analysis presented in this chapter allows us to go beyond a brief description of the level of control implemented through different organizational modes and demonstrates the mechanisms the organization has available to activate the level of control it seeks to exert on third parties. Table 2 provides a comparison of the three organizational modes in terms of their use of the discussed mechanisms. The difference between modes in terms of use of mechanisms arises from the level of coordination Aravind seeks to achieve under different modes.

Table 2

Intensity of coordination mechanisms used under organizational modes

	Branches	Affiliation	Dissemination
Training	+++	++	+
Communication	+++	++	+
Mobility	+++	++	0
Templates	0	In process	+++

In the dissemination mode, Aravind merely shares strategies and best practices with consulted hospitals and does not seek to impose its value system on the recipient units. Hence, mechanisms used under this mode are mainly to transfer operational knowledge and coordinate the activities of the consulted hospitals with that of Aravind. In branching and affiliation, however, Aravind seeks to go beyond replicating best practices, although differences remain between these two modes. Full ownership of its branch hospitals allows the organization to fully concert the efforts of its organizational members toward the achievement of the organizational mission, which is scaling social impact while maintaining value consistency throughout the system for Aravind. Although the same level of consistency is intended for the affiliation mode, full coordination in the mode is contingent upon the extent to which Aravind has control over its partner organizations.

These observations suggest that when the organization seeks also to ensure value consistency together with operational consistency across branches and affiliated units, there is higher reliance on informal coordination mechanisms such as training, communication, and mobility. When the objective is to coordinate only practices and procedures, as is the case in the dissemination mode, there is higher reliance on formal coordination mechanisms such as templates (although this mechanism is also enforced through communication and training). Informal mechanisms help establish a base of attitudes, habits, and values that foster cooperation and minimize the divergence of preferences among group members by exerting culture control through socialization instead of formal performance evaluations as control mechanisms (Govindarajan and Fisher, 1990; Pascale, 1985). Formalizing through templates, on the other hand, helps to share knowledge on good practices at larger scale since they are codified, standardized forms of knowledge (March and Simon, 1958) that coordinate activities without stretching human resources and at lower cost.

These observations are helpful for understanding the design features that are relevant for differing degrees of control exercised under different organizational modes. Depending on: 1) the level of control a social entrepreneur seeks to exercise, and 2) what it seeks to coordinate an organization needs to employ various combinations of coordination mechanisms at varying degrees. However, it should be noted that choice of mechanisms to exert differing levels of control across organizational modes is not a static decision. As the organizations evolve to scale further, they might need to revise their structural components since increasing number of employees intensifies

the need for coordination in the organization (Blau, 1970). For instance, at Aravind, at its initial stage, affiliated hospitals were intended to be fully aligned with branches (to the extent that the partners' values are consistent with Aravind's). However, as the organization moved toward higher number of affiliated units, the need to generate templates for establishing and maintaining new hospitals arose.

Therefore, when the objective is to coordinate practices only, formal mechanisms are useful. Higher reliance on informal mechanisms is advisable when the organization seeks to achieve value consistency together with coordinated practices. However, as the scale of operations increases, there is a tendency to include formal mechanisms in the formula. Table 3 summarizes our conclusions related to coordinating mechanisms in terms of scaling and coordination considerations.

Table 3

Type of coordination mechanisms appropriate for varying degrees of coordination and scale

		Coordination of…	
		Practices only	**Practices and values**
Scale	**High**	Formal mechanisms	Informal and formal mechanisms
	Low	Formal and informal mechanisms	Informal mechanisms

Conclusion

The difficulties around scaling and replicating good practices have been discussed widely and these difficulties are evident in the many failures to replicate new business models in different contexts. Therefore, by studying the main features of the innovative Aravind business model we seek to provide insights into the main challenge of scaling social impact while maintaining core values. Zooming in on the organizational modes employed by Aravind, we provided a systematic analysis of the mechanisms underlying the organizational structure. We identify the practices to establish and maintain differing degrees of control depending on the organizational subunit purposes. Linking our observations to "what the organization seeks to coordinate" and the scale of operations under each organizational mode, we then offered suggestions as to the types of mechanisms appropriate for organizational strategy, objectives, and structure. By systematically unpacking the "building blocks" of a successful initiative, therefore, we hope to have provided know-how and possible tools for social enterprises in determining the design features of their organizations to achieve fit with their intended strategies.

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