



Journal of Advances in Management Research

A longitudinal study into the effectiveness of the HPO Framework: The case of a social care and rehabilitation organization

André de Waal,

Article information:

To cite this document:

André de Waal, (2017) "A longitudinal study into the effectiveness of the HPO Framework: The case of a social care and rehabilitation organization", Journal of Advances in Management Research, Vol. 14 Issue: 3, pp.352-374, <https://doi.org/10.1108/JAMR-11-2016-0092>

Permanent link to this document:

<https://doi.org/10.1108/JAMR-11-2016-0092>

Downloaded on: 18 July 2017, At: 03:48 (PT)

References: this document contains references to 49 other documents.

To copy this document: permissions@emeraldinsight.com

The fulltext of this document has been downloaded 1 times since 2017*

Access to this document was granted through an Emerald subscription provided by

Token:Eprints:WPJSHG8FJKZV6P9PTPAK:

For Authors

If you would like to write for this, or any other Emerald publication, then please use our Emerald for Authors service information about how to choose which publication to write for and submission guidelines are available for all. Please visit www.emeraldinsight.com/authors for more information.

About Emerald www.emeraldinsight.com

Emerald is a global publisher linking research and practice to the benefit of society. The company manages a portfolio of more than 290 journals and over 2,350 books and book series volumes, as well as providing an extensive range of online products and additional customer resources and services.

Emerald is both COUNTER 4 and TRANSFER compliant. The organization is a partner of the Committee on Publication Ethics (COPE) and also works with Portico and the LOCKSS initiative for digital archive preservation.

*Related content and download information correct at time of download.

A longitudinal study into the effectiveness of the HPO Framework

The case of a social care and rehabilitation organization

André de Waal

*HPO Center, StatMind Management Research & Development,
Hilversum, The Netherlands*

352

Abstract

Purpose – The academic and management literature offers an abundance of techniques for helping organizations improve their performance. Generally, though, these techniques have not been subjected to rigorous, evidence-based evaluation or have been tested in practice over time. The purpose of this paper is to describe a longitudinal study into the effectiveness of the High Performance Organization (HPO) Framework at a social care and rehabilitation organization.

Design/methodology/approach – The HPO Framework was applied at LIMOR in the Netherlands. The longitudinal nature of the study consisted of conducting an “HPO diagnosis” twice at the organization, in 2012 and 2015. In the second diagnosis, the effectiveness of the interventions the organization undertook to address the recommendations originating from the first HPO diagnosis was also measured.

Findings – The study aimed to discover whether the HPO Framework was a suitable improvement technique with which to increase the performance of a social care and rehabilitation organization in a sustainable way. The results showed that it was used to ward off and contain the negative effects of external turbulent developments, and thereby helped LIMOR to perform better than comparable organizations.

Originality/value – As a longitudinal study of the workings and effects of the HPO Framework at a social care and rehabilitation organization, this study is the first of its kind. Moreover, it addresses two gaps in the current literature, by contributing longitudinal evidence to the body of knowledge on improvement techniques, specifically in the non-profit sector, and by adding insights on the practical workings of the HPO Framework in a non-profit context, specifically the social care and rehabilitation sector.

Keywords Organizational performance, High performance organizations, Healthcare management, HPO Framework, Longitudinal approach

Paper type Research paper

1. Introduction

The academic and management literature provides an abundance of techniques which their authors claim will help organizations to improve their performance. One might expect that the authors of such studies would invest in subjecting their techniques to rigorous evidence-based management research in order to test their ideas in practice over a certain time period and evaluate whether they have sustainable positive effects, thereby proving their relevance to managerial practice (Pfeffer and Sutton, 2006; Kieser *et al.*, 2015). In reality, this is hardly ever done, and in practice it turns out that many of these so-called “miracle cures” have, at best, only a short-term positive effect (Axson, 2010; Parnell *et al.*, 2012). Thus, there seems to be a distinct gap in the extant literature regarding studies that evaluate the effectiveness of organizational improvement techniques (Rosenzweig, 2007; HakemZadeh and Baba, 2016). One way to evaluate this effectiveness would be to subject the improvement technique to a longitudinal study, an approach that can be defined as “an empirical inquiry that investigates a contemporary phenomenon as it changes over time within its real-life context, especially when the boundaries between phenomenon and context (including temporal context) are not clearly evident” (Rainer, 2011, p. 733), or, even more precisely, as research in which “data are collected



on one or more variables for two or more time periods, thus allowing at least measurement of change and possibly explanation of change” (Menard, 2008, p. 3).

This paper describes a longitudinal study into the effectiveness of the “High Performance Organization (HPO) Framework” (de Waal, 2012) at a social care and rehabilitation organization. The HPO Framework aims to guide organizations in their transition from average to high performance. An HPO is defined as “an organization that achieves financial and non-financial results that are increasingly better than those of its peer group over a period of time of five years or more, by focussing in a disciplined way on what really matters to the organization” (de Waal, 2012, p. 5). The effectiveness of this framework in increasing sustainably and enduringly the performance of organizations has been validated several times, but not yet in non-profit organizations. Accordingly, this study tests the efficacy of the HPO Framework over time at a social care and rehabilitation organization.

There is hardly any scholarly literature to be found on improving social care organizations themselves, with most research seemingly focussed on the improvement of treatment methods. Thus, the research question of the present study is as follows:

RQ1. Is the HPO Framework an effective technique with which to address the performance issues of social care and rehabilitation organizations?

Accordingly, this study aims to address two gaps in the current literature: in the theoretical literature, by contributing longitudinal evidence to the current limited body of knowledge on the effects of improvement techniques in the specific context of the health sector (Kovner, 2014); and, in the practitioner literature, by adding knowledge on the applied workings of the HPO Framework in a healthcare context, specifically the social care and rehabilitation sector.

The remainder of this paper is structured as follows. The next two sections briefly describe the social care and rehabilitation sector and discuss previous research into high performance therein. This is followed by sections specifying the HPO Framework and the case study company. Subsequently, the research approach and research results are discussed. Finally, the article’s conclusion is presented, potential limitations of the research are considered, and opportunities for future research are suggested.

2. The social care and rehabilitation sector

Social care and rehabilitation organizations are public organizations working under a government framework of the law on social provision (Costa and Anderson, 2011). Social care is administered through local authorities, and in essence is a locally delivered service operating to centrally determined policy goals (Clarkson *et al.*, 2009). The main goal of social care and rehabilitation is to maintain and enhance the individual well-being of people, by supplying services that try to achieve and sustain the optimum state of health of the recipients of these services (Schmid, 2002). A rehabilitation centre is a distinct form of social care organization that specializes in providing care for the particular needs of patients, ranging from individuals suffering with a specific illness or injury to those who are homeless. People typically attend rehabilitation centres because they need particular care and treatment protocols that hospitals or town councils often do not offer but they urgently require (Chandra *et al.*, 2014). Thus, the “client base” of social care and rehabilitation organizations consists of persons needing specialized care and/or therapy that assists them in their restoration to good health and improves their quality of life. In effect, social care and rehabilitation organizations deal with the *urgence sociale* of people – situations of “social emergency” – as well as broader crisis interventions addressing such situations (FEANTSA, 2005). The workforce within social care and rehabilitation organizations comprises both medical (e.g. physicians in specialty fields, nurses) and non-medical personnel (Chandra *et al.*, 2014).

In recent years in developed countries, factors such as the decline of the family unit, ageing populations, innovations in healthcare technology, rising expectations of clients and the economic crisis have increased the demand for social care while simultaneously causing (financial) pressure on the delivery of social care services (Pavolini and Ranci, 2008; FEANTSA, 2016), in turn creating unrest among the parties in the social care process, including care recipients, care providers and audit bodies that regulate care provision (Asenova *et al.*, 2011). In response, governments have introduced reforms to social care services, with the aim of diversifying provider markets, for example, allowing local authorities with responsibility for the provision of social care to purchase services from independent for-profit and not-for-profit firms, and giving service recipients more choice and thus more control over their care (Malley and Fernández, 2010). At the same time, the call for higher productivity in this sector has intensified (Hofmarcher *et al.*, 2016). These developments have increased the demand among the management of social care and rehabilitation organizations for techniques that can strengthen their organizations so that they not only can deal with their current situation but can also prosper in the future, no matter what the circumstances.

3. High performance in the social care and rehabilitation sector

Much research into the improvement of the social care and rehabilitation sector looks at increasing the quality of care delivery to patients. In general terms, the service quality of social care services is conceptualized as “quality of care” or “quality of life” (Malley and Fernández, 2010). Malley and Fernández (2010, p. 561) have described aspects of the quality of care that can be found in the literature as including:

[...] service accessibility, accountability, attitudes and behaviour of staff, continuity of care workers, fluid communication of changes in care, flexibility of the service to meet changing needs, privacy and dignity, reliability and responsiveness of care workers, and skills, knowledge, and trustworthiness of staff.

However, research on the improvement of the internal organization of social care and rehabilitation organizations themselves is much more fragmented, and often only looks at one or a limited number of organizational aspects to be improved.

One major research stream concerns the workings of the delivery process of social care and rehabilitation services to patients, both in social care organizations and between them. Stewart *et al.* (2003), studying the cooperation between Scottish social care organizations, identified joint training and cross-organizational secondments as being central to building a shared culture across the cooperating parties. The European Federation of National Organisations working with the Homeless (FEANTSA, 2004) investigated ways to strengthen cooperation among social care organizations in order to combat homelessness in Europe. Gard and Larsson (2006) perceived actions that could improve cooperation between different rehabilitation parties in a Swedish vocational rehabilitation planning process, and found that a greater emphasis on clients’ needs and participation in the rehabilitation process increased the focus of rehabilitation professionals on their own responsibilities therein, and that the early identification of rehabilitation needs and goals, early rehabilitation, and a better understanding of mutual roles and interests between rehabilitation centres and social insurance companies were all of importance. Heenan and Birrell (2006) reported that, in Northern Ireland, social care organizations established professional forums to deal with problems arising from cultural differences between various organizations that had to collaborate to provide social care. These forums focussed on issues of professional development, training and governance, and offered peer support and information on good practice. Wolstenholme *et al.* (2007) looked at mismatches between how managers claimed their organizations worked and observed behaviour, with the disparities

discovered to stem from the development of informal coping policies across multiple social care organizations that had led to many unintended consequences for patient care and costs. Øvretveit *et al.* (2010) reported on a longitudinal study of the development of an integrated health and social care organization in Sweden that combined service provision, purchasing and political governance, and found that carefully coordinated actions at different levels and of varying types were needed to achieve proper care coordination. Andersson *et al.* (2016) investigated a programme that aimed to develop inter-professional collaboration in Sweden to improve care and service to people with psychiatric disabilities in ordinary housing, and inferred that, despite the improvement programme being both time and energy intensive, care and service deliveries were improved. Memon and Kinder (2017) considered whether the co-location of local public services could yield more than just cost benefits, and found that, for Scottish partnerships charged with coordinating health and social care, co-location effected a learning environment for service innovations.

In the literature, quite a few investigations into increasing the quality of social care and rehabilitation organizations can be found too. For instance, van Harten *et al.* (2002) evaluated the introduction of a quality management system in a large rehabilitation hospital, using the European Foundation of Quality Management (EFQM) Framework, and found a positive correlation between participation in quality activities, work satisfaction and a favourable EFQM score (compared to national levels). Schmid (2002) analysed the relationships between organizational properties and organizational effectiveness in, amongst others, home care organizations, and discovered that centralization of authority, formalization, workers' autonomy, coordination, control, empowerment and training had the most influence on organizational effectiveness. Clarkson *et al.* (2009) evaluated the effects of performance measurement systems (comprising centralized targets, public reporting of data, and the use of rewards and penalties) that had been implemented in a top-down manner in the English social care sector, and concluded that these systems had helped social care organizations to improve their performance over time. Malley and Fernández (2010) discussed developments of theoretical and practical frameworks used for assessing quality in social care and for understanding the impact of services on the well-being of patients, using the "production of welfare" framework (Davies and Knapp, 1981; Knapp, 1984). This framework was developed to identify the contributions of the care service itself, of non-service-related factors such as the personal circumstances of the individuals involved (including material, psychological, social and cultural influences), and of resource inputs (such as buildings, human resources and transport) on the outcome state of recipients of the social care services. Asenova *et al.* (2011) specifically looked at how the Scottish Government's social care regulator, the Care Commission, was pursuing continual improvement in the quality of social care services using separate measures of risk and quality, and concluded that this system had important advantages but that the Commission should seek to minimize misunderstanding and conflict between regulators and regulatees on the closely interrelated matters of risk, quality and efficiency. Aas *et al.* (2016) looked at the characteristics that drive successful innovation processes in public organizations providing care services, and found that employee participation and involvement has to be an integral part of these processes. Bloice and Burnett (2016) explored the theory of knowledge-sharing barriers (KSBs) in the context of social care organizations, and identified several barriers that did not fit neatly into the existing definitions of KSBs. In consequence, these authors presented an updated list of KSBs to reflect social care sector.

Finally, there is some research into aspects of improvement of social care and rehabilitation organizations. Cornes and Horton (1981) developed scales to measure the social climate of rehabilitation centres, and used these scales to evaluate the extent to which the social climates comprised an amalgam of "industrial" and "therapeutic" elements. Chandra *et al.* (2014) looked at how rehabilitation centres can market themselves more assertively, in order for the general

public to become aware of their important role in providing patient care services. Carrizales *et al.* (2016) reviewed existing cultural competency initiatives in healthcare, social work and other public sector organizations, where “cultural competency” was characterized as specific organizational actions and policies that enable an organization to more effectively serve its culturally diverse populations. They found that public service academies, associations and accrediting body practices can help these initiatives by informing, guiding and advocating cultural competency in public sector organizations. Tistad *et al.* (2016) studied the feasibility and usefulness of a leadership intervention (including workshops, seminars, and teleconferences with a particular focus on leadership behaviours) aimed at supporting managers in the implementation of national guideline recommendations for stroke care in outpatient rehabilitation, and found this intervention to have limited impact on managers’ behaviours or clinical practice. The researchers concluded that future interventions directed towards managers should have a stronger focus on developing leadership skills and behaviours to tailor implementation plans. Sometimes, the improvement studies focus more on development of the aspects themselves and less on the sector in which the research took place; one example of this is Costa and Anderson’s (2011) study into a method to measure trust in teams, which took place at several social care organizations.

The literature review did not, though, yield any holistic improvement techniques that might be used by social care and rehabilitation organizations to increase their performance, which means that scholars and practitioners must turn to generic techniques that may not have been developed for specific sectors. One such technique is de Waal’s (2012) HPO Framework, which was based on data from the healthcare sector, among others, but has also been validated for use in a large number of sectors. Therefore, it is posited that this framework could potentially be suitable for improving social care and rehabilitation organizations in a sustainable manner.

4. The HPO Framework

4.1 HPO characteristics

The objective of the present research into HPOs was to identify factors that affect the sustainable high performance of an organization. The research was conducted in two phases. The first involved collecting studies on high performance and excellence. To be included in the research, the studies had to meet one or more of the following criteria (de Waal, 2012):

- be aimed specifically at identifying HPO factors or best practices;
- consist of either a survey with a sufficiently large number of respondents for its results to be assumed to be (fairly) generic, or in-depth case studies of several companies, so that its results would at least be valid for more than one organization;
- employ triangulation by using more than one research method; and
- include written documentation containing an account and justification of the research method, research approach, and selection of the research population, a well-described analysis, and retraceable results and conclusions allowing assessment of the quality of the research methods.

For the literature search, the Business Source Premier (EBSCO Information Services), Emerald and Science Direct databases were reviewed, and Google was also used to search for relevant sources. The following search words and terms were used: “accountable organization”, “adaptive enterprise”, “agile corporation”, “flexible organization”, “high performance work organization”, “high performance work system”, “high-reliability organization”, “intelligent enterprise”, “real-time enterprise”, “resilient organization”, “responsive organization”, “robust

organization” and “sustainable organization”. In addition, books were reviewed, mostly from the business and management fields.

Having identified 290 studies that fulfilled all or some of the above-listed four criteria, the identification process of HPO characteristics continued as follows. First, elements were extracted from each of the publications that the authors of the studies regarded as essential for high performance. These elements were then entered into a matrix. Because different authors used different terminologies in their publications, similar elements were placed in groups of common factors, and each group – later to be termed “characteristic” – was given an appropriate description. Subsequently, the aforementioned matrix was constructed for each factor listing a number of characteristics. In total, 189 characteristics were identified. The next step was to calculate the “weighted importance” – that is, the number of times a characteristic occurred in the individual categories, for each of the characteristics. Finally, the characteristics with a weighted importance of at least 9 per cent were chosen as the characteristics that potentially contribute towards an HPO: in total, there were 54 characteristics.

In phase 2 of the HPO research, the 54 potential HPO characteristics were incorporated in a questionnaire that was distributed during lectures and workshops delivered to managers by the authors in several global locations. The questionnaire respondents were asked to indicate how well their organization performed on each of the various HPO characteristics – on a scale from 1 (very poor) to 10 (excellent) – and also how their company’s results compared to those of its peer group. Two types of competitive performance were calculated (Matear *et al.*, 2004): relative performance (RP) vs competitors: $RP = 1 - ((RPT - RPW) / (RPT))$, in which RPT = total number of competitors and RPW = number of competitors with worse performance; and general historic performance of the company over the past five years compared to its complete peer group (possible answers: “worse”, “the same” or “better”). These subjective measures of organizational performance are accepted indicators of real performance (Dawes, 1999; Heap and Bolton, 2004; Jing and Avery, 2008). The questionnaire yielded 2,015 responses from approximately 1,470 profit, non-profit and government organizations. Using a correlation analysis and a factor analysis, 35 characteristics with both a significant and a strong correlation with organizational performance were extracted, identified and categorized into five factors. The factor scales showed acceptable reliability (Hair *et al.*, 1998) with Cronbach’s α close to or above 0.70.

These five factors and their accompanying 35 characteristics show a direct and positive relationship with the competitive performance of an organization. Moreover, these factors have, since 2007, been validated for many countries, based on data collected worldwide from approximately 3,000 organizations, both profit and non-profit. In essence, they remain unchanged regardless of the type of organization being diagnosed, the type of industry involved, or the country in which the organization is based. This is likewise the case with respect to the healthcare sector, as, in the data collected for the statistical analysis, data from healthcare organizations of all types were present. The reason why the factors and characteristics remain unchanged is because they indicate what is important for an organization to pay attention to in order to become high performing. They do not stipulate how an organization should improve, as this depends on the context (i.e. the sector). In this respect, the HPO factors and characteristics can be called “evergreens” of management (de Waal, 2013).

4.2 HPO factors

The five HPO factors are described below (see also Table AI for details of the factor characteristics):

- HPO Factor 1: management quality. HPO managers focus on encouraging belief and trust from their employees in them. They value loyalty and live with integrity; they

treat their employees respectfully and maintain individual relationships with them. HPO managers are highly committed to the organization and have a strong set of ethics and standards. They are supportive and help employees in achieving results, and also hold them accountable for these results. HPO managers are role models for the rest of the organization.

- HPO Factor 2: openness and action orientation. HPO managers value the opinions of employees and always involve them in important business and organizational processes. Taking risks is encouraged and making mistakes is always forgiven in an HPO, as these are considered valuable opportunities to learn, to develop new ideas and to exchange knowledge in pursuit of collective improvement.
- HPO Factor 3: long-term orientation. For an HPO, long-term commitment is more important than short-term gain. Stakeholders of the organization benefit from this long-term orientation, and are assured that the organization is maintaining mutually beneficial long-term relationships with them. HPO managers are committed to the organization and new positions are filled from within the organization. An HPO is a secure and safe workplace where people feel free to contribute to the best of their ability.
- HPO Factor 4: continuous improvement and renewal. An HPO has a unique strategy that makes the organization stand out in its sector. It is responsive to market developments by continuously innovating its products and services, thus creating new sources of competitive advantage. An HPO ensures that core competencies are retained in-house and non-core competencies are outsourced.
- HPO Factor 5: employee quality. HPO employees are flexible and resilient, as they are trained (formally and on the job) and encouraged to achieve extraordinary results. As a team, they are diverse and, therefore, complementary, enabling them to deal with all types of issues and generate sufficient alternative ideas for improvement.

4.3 HPO diagnosis

An organization can evaluate its HPO status by conducting an “HPO diagnosis”. This starts with an HPO awareness workshop for management and other interested parties. During this workshop, the people become acquainted with the HPO Framework, the HPO diagnosis and the potential HPO transformation process. During the actual HPO diagnosis, management and employees complete the HPO questionnaire comprising questions based on the 35 HPO characteristics. The individual scores are converted to average scores on the HPO factors for the complete organization. These average scores indicate the HPO factors and HPO characteristics in relation to which the company needs to implement improvements to become an HPO.

5. The effectiveness of the HPO Framework

5.1 Prior studies

The effectiveness of the HPO Framework has, since its inception in 2007, been evaluated in several studies: in the British information and communications technology sector (de Waal, 2012), the Dutch retail sector (de Waal, 2012), the Tanzanian education sector (de Waal and Chachage, 2011), the Nepalese banking sector (de Waal and Frijns, 2011), the Philippine food sector (de Waal and de Haas, 2016), and the Dutch cable and media sector (de Waal *et al.*, 2015). In all these cases, the performance of the organizations increased over time. However, these studies were all (except for de Waal and Chachage, 2011) conducted in the profit sector – hence, the present study’s test of the effectiveness of the HPO Framework in the non-profit sector.

5.2 Present case study

LIMOR is a national institute for social care and rehabilitation in the Netherlands. It is a client-oriented organization that offers many forms of care and support to people who have difficulties with self-reliance and/or social participation and have become or are in danger of becoming homeless. The aim of LIMOR is to guide the client, in the shortest possible time, towards functioning again in society, preferably for a long time. Its clients, encompassing homeless individuals, addicts, former detainees, people with mental health issues and people with debts, often have a complex combination of problems, and, therefore, there is no standard approach and treatment methods are adapted to each client's circumstances and environment. This notwithstanding, every client approach is based on the organization's governing principles of "take in, deal with, let go" under which LIMOR first takes care of any crisis situation by creating stability and peace of mind, and agrees a customized approach with the client, which ultimately should lead to a stable life that no longer requires support. This stable life is based on the four pillars of a financial stability, stable housing, active participation in society, and building and using the client's own social network. The organization employs more than 300 staff and annually assists about 1,600 clients. Counselling of clients takes place at the client's home or at a LIMOR location. LIMOR is a demand-driven organization, which means that responsibilities and authority have been put as close as possible to where the work is done. To facilitate this, the organization is divided into 11 demand-driven units (DDUs). Each DDU has its own role within the primary care process. There is a clustering of DDUs in the north, east and west regions, and, in addition, staff services consist of three units: administration and control; facilities and IT; and personnel, policy and communications.

As stated in its strategic plan (LIMOR, 2012), the organization elected to conduct an HPO diagnosis in order to evaluate the current performance status of the organization:

During the previous policy period, many improvement projects have been finalized in various parts and functions of LIMOR. Instinctively, we feel we can be very satisfied with the progress and results of these projects. In the context of economy and efficiency, it is smart, at the beginning of this policy period, to review the status of LIMOR in a holistic way and to identify which areas in the organization need attention to gain further performance improvement. To get this picture, an HPO diagnosis will be conducted. As the HPO Framework connects the characteristics of high performance in a scientific way to the service the client receives, this framework is for LIMOR a testable holistic framework to achieve its objectives. Thus, the HPO diagnosis will not only indicate to LIMOR what its status compared to HPO is, it will also clearly indicate which activities in the organization really contribute to excellent performance.

6. Methodology and results

Rainer (2011) distinguished four types of longitudinal study, as follows: describing a phenomenon (e.g. focussing on the portrayal of temporal sequences); exploring a phenomenon in order to find out what is happening (e.g. seeking to draw connections between events and processes over time); explaining a phenomenon, to seek (causal) explanations of events and processes as they change over time; and improving the phenomenon (i.e. seeking to improve over time some aspect of the phenomenon). As the present research aims to measure the effectiveness of an organizational improvement technique, it utilized the fourth type of longitudinal study, with the phenomenon in question being organizational performance. In addition, a prospective and a priori focussed longitudinal study is used, as the current investigation is based on repeated data collection from the same subject over a period of time (Hassett and Paavilainen-Mäntymäki, 2013), and it has a pre-planned research design in which data collection has been planned and decided upon beforehand (Alfodi and Hassett, 2013).

The longitudinal nature of this study consisted of conducting the HPO diagnosis twice at LIMOR, in 2012 and 2015 (both described below). In the second HPO diagnosis, the

effectiveness of the interventions the organization undertook to address the recommendations originating from the first HPO diagnosis was also measured. The author was not involved in either diagnoses, except for helping in the listing of the interventions, nor had he any dealings with the organization in the intermediate years. After the second HPO diagnosis, a draft of this paper was sent to and subsequently discussed with LIMOR's management, who approved it for publication. In the following paragraphs, the research process per diagnosis and the respective results are discussed in more detail.

6.1 The first HPO diagnosis

The first HPO diagnosis took place in 2012 and comprised several steps. First, the HPO questionnaire was distributed to all personnel of LIMOR through an internet link. In total, 196 managers and employees filled out the questionnaire, representing a response rate of 65.1 per cent. Individual HPO scores were then calculated, summarized and presented in a graph illustrating LIMOR's performance relative to the average score of an HPO, as established in the HPO research (see Figure 1 and Table AI).

Subsequently, the HPO diagnosis team held interviews with 18 managers and employees to get "the stories behind the scores". Interviewees were chosen based on their questionnaire responses, making sure there was a balanced distribution over organizational levels and regions. Each interview was semi-structured in nature and conducted by two interviewers, with one asking the questions and the other taking notes. Confidentiality was assured to all interviewees, and, at the end of each interview, the interviewees were asked if they were happy with the interview. The notes were subsequently summarized and shared among the diagnosis team. The team then analysed the data from the questionnaires and interview summaries to identify areas for improvement. The team shared the results of the analysis with the management team during a workshop to explain the HPO scores and identify areas for improvement, and discussed the HPO action plan to address those issues. This action plan focussed on three improvement areas, as follows:

- Improvement area 1 (concerning HPO characteristics 9, 11, 13, and 28; see Table AI): there was insufficient focus on the execution of improvement projects

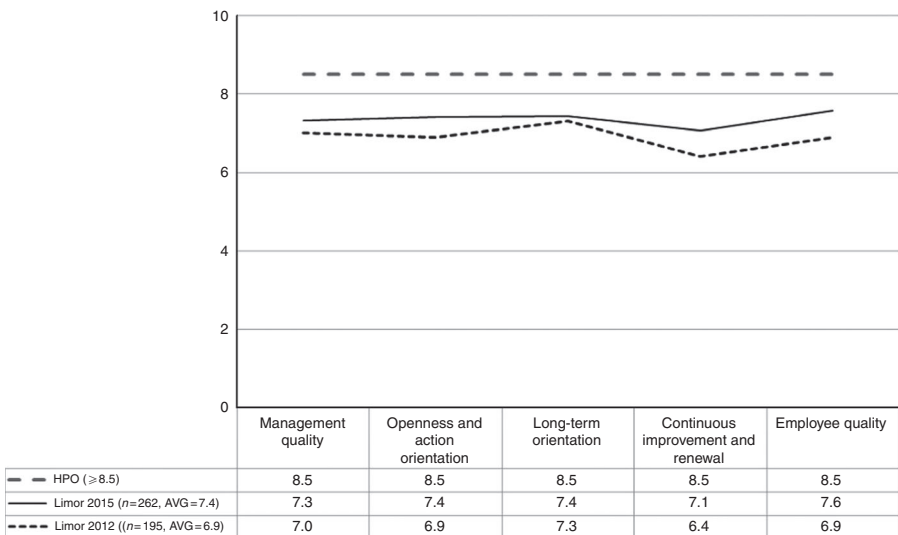


Figure 1.
HPO scores of LIMOR
in 2012 and 2015

and the internal alignment of these in the organization. This was caused by the difference and resulting tension between improvements motivated by external developments and those motivated by client-driven innovation, as illustrated by these quotes from the interviews: “Decisions for change and improvement are increasingly made based on external developments and legislation” and “If there are financial opportunities, decisions are made too quickly without sufficiently involving the regions, causing care-related components to be seemingly less important than the finances”. Another cause was the gap between the vision and goals of the management team and the execution on the work floor, causing dissonance and misunderstandings: “Decisions are taken too quickly, without consulting or informing the work floor enough”. The recommendation made towards improving this was to strengthen internal alignment so that people across the various organizational units and levels better understand one another and are more willing to cooperate. In addition, it was recommended that less organizational improvements should be dealt with, no more than three at a time, and the focus should be on implementing and finishing the improvement projects. People should emphatically be involved in the decision making and execution of these improvements, and managers should be trained to delegate more and have increased dialogue with their staff.

- Improvement area 2 (HPO characteristics 15-26): for LIMOR to become an HPO, the quality of management needed to be increased at all levels. Specifically, the lack of dialogue between the various levels had to be addressed, as illustrated by these quotes: “All information streams go top-down” and “In my region, we’re doing well, so I don’t get to hear anything from above, but surely I can also still improve?” Another issue identified was that the management did not yet represent a cohesive team: “The manner in which managers act depends on the region, there doesn’t seem to be a uniform or agreed way of management in LIMOR”. The recommendation for improving this was to get organization levels together in meetings, facilitated by an external person, to discuss their opinions of one another, to show real interest in one another, and to start giving and receiving feedback. In the management team, responsibilities had to be discussed and redefined together, according to the leading principle of practising “T-shaped management”, under which managers are together responsible for the overall results (and can be held accountable for them, as well as for when they do not help one another enough) while also being solely responsible for their organizational area (function or region).
- Improvement area 3 (HPO characteristics 7, 8 and 30): the external profile of LIMOR had to be strengthened, to attract better staff and good partners with which the organization could grow even further. To date, the organization had not sufficiently made known its social value to the external world, and had not actively established links with possible collaborative parties, as illustrated by these quotes: “We have been too much on an island”, “There are not enough external partnerships, we prefer to do everything ourselves” and “We don’t have a clear profile in the outside world”. The recommendation for how to improve this was that the organization makes a conscious effort to increase wider recognition of its name by proudly showing what it had achieved in recent years, and by starting to network more.

6.2 The second HPO diagnosis

In the period following the first HPO diagnosis, LIMOR undertook a series of activities (see the Interventions section, below) to address the three areas for improvement that it had identified, which were mostly led by the managers of the DDUs, special multidisciplinary project teams,

or the support departments. After three years, the management team felt it was time for another HPO diagnosis, this time to evaluate the results of these improvement actions.

The expectation was that the HPO score would be the same or even lower this time, compared to that of the first HPO diagnosis, as the external environment of LIMOR had changed quite dramatically. The Dutch Government had initiated severe cuts in the healthcare budget, and also passed new legislation that changed the funding process. As a consequence, care organizations like LIMOR had to do more with less funding, and, at the same time, needed to apply increased administrative efforts to deal with the new legislation (*Wet Maatschappelijke Ondersteuning*; in English, the Social Support Act), which shifted the care financing stream from government to municipalities. This meant that, instead of one party in the form of the Ministry, LIMOR now had to deal with 90 different parties (the municipalities), which caused delays and uncertainty in both the care-providing and financing processes, in turn resulting in lower financial results. The management team therefore anticipated that these new stresses might cause the second diagnosis's respondents to lower their opinion of the quality and the strength of the organization.

This second diagnosis took place in 2015, and had three main goals: to check "whether LIMOR had improved after three years, despite the difficult external circumstances", "what the effects of the interventions had been" and "whether the DDUs had indeed taken responsibility for the organizational results". The diagnosis process consisted again of enlisting people to complete the HPO diagnosis, processing the scores, and plotting the results (see Figure 1). This time, 262 managers and employees of LIMOR participated, yielding a response rate of 78.4 per cent. The interventions were scored, on a scale of 1 to 10, by the respondents on three dimensions: "The intervention helped me increase my knowledge about HPO", "The intervention increased my willingness to show HPO behaviour" and "The intervention helped me to actually show HPO behaviour". There was also a control question that checked whether the respondents had participated in the intervention or had heard about it. As with the first HPO diagnosis, and in the same way, LIMOR personnel were interviewed – this time, a total of 48 people. This was a considerably larger number than during the first HPO diagnosis, with the reason being that LIMOR's management team wanted to attain a comprehensive insight into the effects of the HPO transformation and the interventions across all parts of the organization, and, thus, a larger cross-section was needed.

As Figure 1 shows, in three years, LIMOR had increased its HPO score by 0.5 points, with an increase for all HPO factors. From the scores and through the interviews, it emerged that the organization had become particularly strong in its client-oriented attitude (which matched with LIMOR's vision on how to approach clients), with a diverse and complementary workforce and managers who were open to change. Figure 2 shows the HPO score of LIMOR compared to the average score for a sample of Dutch mental healthcare respondents. The latter data were sourced from the HPO database of the HPO Center (where the author of the present paper works). The mental healthcare sector was chosen because, although it is not the same as the social care and rehabilitation sector, it comes closest in terms of processes, services and organization.

As Figure 2 shows, LIMOR outperformed the mental healthcare sector by 1.3 points, which indicates that, while not quite an HPO, it is certainly a frontrunner in the sector. In order for the organization to make the final push to HPO, three further improvement areas were formulated, as follows:

- (1) Improvement area 1 (concerning HPO characteristics 2-4; see Table AI): exercise a more stringent focus on projects and their completion. LIMOR still had difficulties in bringing discipline to the improvement process, as these quotes illustrate: "We tend to go happily to the next project without looking back at what happened with previous projects", "We need to really finish improvement projects, then measure their effects, and use this information for the next planning" and "Sometimes people

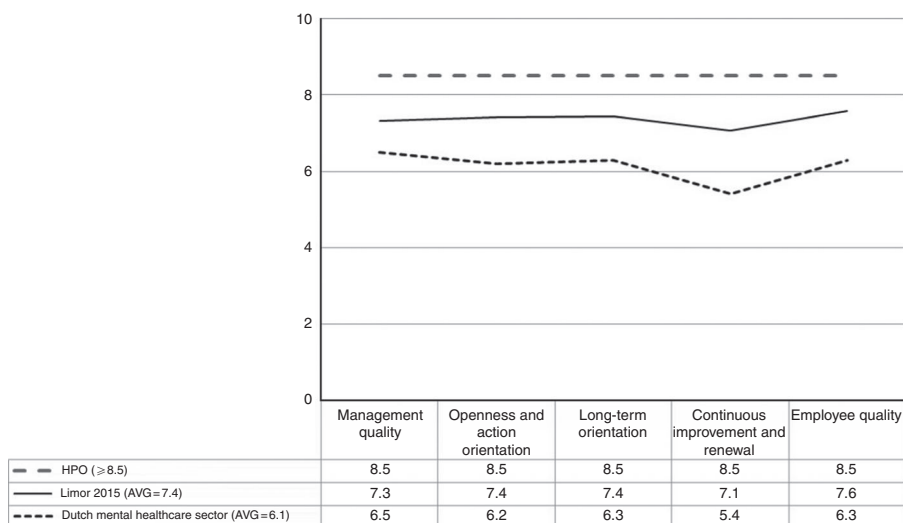


Figure 2.
HPO scores of LIMOR compared to the Dutch mental healthcare sector

trip over all those changes and innovations”. Recommendations on how to help deal with this issue were to limit the number of new projects; involve the regions in choosing the projects to be executed; agree on a uniform way of working in improvement projects, and ensure that all DDUs adhere to this; start a new project only when the previous one is finished successfully and has taken root in the organization; and appoint a central project manager to maintain and manage the project portfolio and look after the quality of the project execution.

- (2) Improvement area 2 (HPO characteristics 20, 22, 23, and 25): further professionalize the management team. During the interviews, several remarks were made concerning the quality and work practice of managers: “Not enough is discussed directly and in the open”, “We never disagree, we find it difficult to hold each other accountable” and “We have excellent managers on the ‘soft side’, but they should really work on their ‘hard side’”. The main recommendation with respect to addressing this was to let managers jointly follow a management development programme in which there was sufficient attention to developing their “hard side” (i.e. holding people accountable, dealing with non-performers) and their dialoguing skills.
- (3) Improvement area 3 (HPO characteristics 10, 11, 18, 19 and 22): remove the difference in management of the DDUs and the traditional top-down approach. Although DDUs were created to distribute authority to lower levels of the organization, this type of management had not been fully introduced in all parts of the organization, and specifically not in the head office or in the way top managers dealt with the DDUs, as these quotes illustrate: “The old hierarchy and the change to DDUs still frustrate each other, which works negatively on our effectiveness”, “There is not enough discussion to come to a standard way of managing” and “Top managers themselves should start delegating authority”. Recommendations on how to deal with this were to ensure that managers from head offices, managers from the DDUs, and the top management team regularly visit one another’s locations, in order to get to know one another better, discuss issues, and exchange ideas and priorities, and in this way to come to a uniform way of managing and to a priority agenda for activities and projects.

6.3 *The interventions*

Table I provides a description of the various interventions LIMOR undertook in the period 2012-2015.

Table II ranks the interventions according to overall effectiveness. "Average effectiveness" was calculated as the average score given for the combination of the three dimensions "The intervention helped me increase my knowledge about the HPO", "The intervention increased my willingness to show HPO behaviour" and "The intervention helped me to actually show HPO behaviour". "Overall effectiveness" was calculated as the product of the "average effectiveness" multiplied by the number of people who actually participated in the intervention (which is the reverse of the total number of respondents who answered that they did not know about or did not participate in the intervention). The resulting score for overall effectiveness should not be strictly measured against the scale of 1-10 (because taking into account the number of respondents who participated in an intervention makes this impossible), but rather as a ranking of effectiveness (i.e. "Making available a laptop and a smartphone" was the most effective intervention as it has the highest overall effectiveness score).

From Table II, it becomes clear that the oldest interventions are the least effective, an outcome caused by, amongst others, employees leaving and new people joining the organization. The new staff members were obviously not present when earlier interventions were embarked upon, and therefore did not recognize several of them when completing the HPO questionnaire. Notwithstanding this, LIMOR has in general to engage people in the interventions more intensively in order to make these more effective, as even some of the more recent interventions do not reach 20-35 per cent of the people.

In Table III, the interventions are categorized according to their character: cultural interventions (i.e. aimed at changing the culture at LIMOR), structural interventions (aimed at changing the structure of the organization) and resource interventions (aimed at providing people with the right tools).

From Table III, it is clear that resource interventions are basically only effective when they immediately unburden people in their daily activities (such as providing them with a laptop and a smartphone so they can be easily reached and reach others, no matter where they physically are) or provide people with information they can apply in their daily work environment (such as information on the care approach and HPO). The more general resource interventions, such as a new website and a new corporate identity, do not seem to help people in their day-to-day activities and could be perceived as less effective. The second most effective intervention, organizing regional workplaces to discuss organizational issues, is of a cultural nature. It was an intervention that was quite unusual in the sector, as LIMOR created opportunities for management and employees to get into closer contact on a regular basis. In fact, the statutory participation of employees, as prescribed in Dutch law, was embedded in these workplaces. Two members of the Works Council were part of the organizing committee, and, as such, could easily raise topics for discussion. In addition, the agreements reached between employees and management during a workplace session were considered to be the official opinion and position of employees and the Works Council, and, as such, were accepted by management for implementation.

Reviewing the interventions, it can be inferred that the two most effective ones both make better communication, discussion and dialogue possible among the staff at LIMOR, thus helping them to quickly deal with issues and obtain information on how to improve processes. This is in line with the findings of de Waal and de Haas (2016) following their research into the effectiveness of interventions at a Philippine company, in which they found cultural interventions to be the most effective. LIMOR applied quite a few structural interventions aimed at improving the effectiveness of the organization, and Table III shows

Intervention	Description	Relation with HPO characteristic	Initiated by
Making available a laptop and a smartphone (2015)	LIMOR introduced “flexible working” in which employees can work wherever (in any physical place) and whenever they want, as long as they can be reached. This way of working is facilitated by providing employees with a laptop and smartphone	28. Organizational members are trained to be resilient and flexible	Management
Organizing regional workplaces to discuss issues (2014 – currently)	LIMOR organizes “regional workplaces” where employees in an easy and non-threatening way can communicate with management, discuss with and learn from colleagues, and get involved in important organizational changes	11. Organizational members are always involved in important processes	Management
Distributing the document “Take in, deal with, let go” (2015)	The brochure “Take in, deal with, let go” was distributed in order to present a clearer profile to the external world and to distinguish LIMOR from other care organizations	Improvement area 3 from the first HPO diagnosis: raise the external profile of LIMOR	Management
Adapting offices to the open office space philosophy (2014-2015)	LIMOR introduced “flexible working” in which employees can work wherever (in any physical place) and whenever they want, as long as they can be reached. This way of working was facilitated by a new office design based on the open workspace philosophy	28. Organizational members are trained to be resilient and flexible	Management
Creating the demand-driven units (DDUs) (2014)	In order to better react to the demands of clients, responsibilities are delegated as close as possible to the place at which the care is given. The resulting DDUs thus have maximum autonomy to meet clients’ demands	8. Our organization continuously innovates its products, processes, and services	Management
Introducing the new website (2014)	The new website aimed to present a clearer profile to the external world and to distinguish LIMOR from other care organizations	Improvement area 3 from the first HPO diagnosis: raise the external profile of LIMOR	Management
Distributing the book <i>A High Performance Organization – What is That?</i> (2015)	Renewed attention regarding the HPO Framework was achieved by distributing the book <i>A High Performance Organization – What is That?</i> to participants at the regional workplaces	11. Organizational members are always involved in important processes	Management
Distributing LIMOR’s strategic plan (2013)	LIMOR’s long-term strategic plan was translated into a version in which the organizational strategy was explained in an easy to digest way	11. Organizational members are always involved in important processes	Employees
Creating multidisciplinary teams (2011-2014)	Changes in financing and funding streams required a further differentiation and diversification of activities and functions. This led to the creation of multidisciplinary teams with complementary employees who together could optimally provide care to clients	29. Our organization has a diverse and complementary workforce	Management

(continued)

Table I.
Overview of the
HPO interventions
at LIMOR

Intervention	Description	Relation with HPO characteristic	Initiated by
Introducing the new corporate identity (2014)	A new corporate identity was introduced that conveyed that LIMOR is an inspired, enthusiastic and entrepreneurial organization	Improvement area 3 from the first HPO diagnosis: raise the external profile of LIMOR	Management
Implementing team targets (2012)	Target setting was changed from an overall target per caregiver to a team target for which all members in the team are responsible and have to jointly work for to achieve	26. The management of our organization always holds organizational members responsible for their results	Management
Distributing the <i>Workstyle</i> magazine (2013)	In the <i>Workstyle</i> magazine, the results of a study into the right balance between pleasure in one's work, efficiency and client care were published	28. Organizational members are trained to be resilient and flexible	External party

Table I.

Interventions	"This intervention helped me increase my knowledge about the HPO"	"This intervention increased my willingness to show HPO behaviour"	"This intervention helped me to actually show HPO behaviour"	Average effectiveness	Did not know about/ did not participate in this intervention (%)	Overall effectiveness
Making available a laptop and a smartphone (2015)	7.1	7.5	8.0	7.6	7	7.0
Organizing regional workplaces to discuss issues (2014 – currently)	6.8	6.7	6.8	6.8	17	5.6
Distributing the document "Take in, deal with, let go" (2015)	6.3	6.2	6.2	6.2	22	4.9
Adapting offices to the open office space philosophy (2014-2015)	5.4	5.9	5.9	5.7	17	4.7
Creating the DDU's (2014)	6.3	6.4	6.4	6.4	35	4.1
Introducing the new website (2014)	5.6	5.5	5.5	5.6	28	4.0
Distributing the book <i>A High Performance Organization – What is That?</i> (2015)	6.3	6.1	6.1	6.1	35	4.0
Distributing LIMOR's strategic plan (2013)	6.1	6.0	5.9	6.0	35	3.9
Creating multidisciplinary teams (2011-2014)	5.9	6.0	6.1	6.0	40	3.6
Introducing the new corporate identity (2014)	5.1	5.1	5.2	5.1	30	3.6
Implementing team targets (2012)	5.2	5.4	5.3	5.3	44	3.0
Distributing the <i>Workstyle</i> magazine (2013)	5.5	5.6	5.5	5.5	50	2.8

Table II.
Rankings of the HPO interventions at LIMOR

Table III.
HPO interventions at LIMOR ranked according to average effectiveness

Interventions	Average effectiveness	Type of intervention
Making available a laptop and a smartphone	7.6	Resource
Organizing regional workplaces to discuss issues	6.8	Cultural
Creating the DDUs	6.4	Structural
Distributing the document "Take in, deal with, let go"	6.2	Resource
Distributing the book <i>A High Performance Organization – What is That?</i>	6.1	Resource
Distributing LIMOR's strategic policy document	6.0	Resource
Creating multidisciplinary teams	6.0	Structural
Adapting offices to the open office space philosophy	5.7	Structural
Introducing the new website	5.6	Resource
Distributing the <i>Workstyle</i> magazine	5.5	Resource
Implementing team targets	5.3	Cultural
Introducing the new corporate identity	5.1	Resource

that these were received with mixed success. The creation of DDUs seemed the most effective structural change, and this could be because these units were small scale, making communication and dialogue between people easier, and because the organization positioned itself closer to the clients. Table IV shows the relations between the five most effective interventions and the HPO characteristics they affected.

6.4 Organizational results

This research set out to evaluate whether de Waal's HPO Framework is a suitable improvement technique with which to increase the performance of a social care and rehabilitation organization in a sustainable way. Furthering this level of analysis, Table V presents the financial and non-financial results of LIMOR over the period 2010-2015.

Interventions	Average effectiveness	HPO characteristics affected	Change in HPO score
Making available a laptop and a smartphone	7.6	2. In our organization, processes are continuously improved	+0.5
		3. In our organization, processes are continuously simplified	+0.8
		4. In our organization, processes are continuously aligned	+0.8
Organizing regional workplaces to discuss issues	6.8	9. The management of our organization frequently engages in dialogue with employees	+0.5
		10. Organizational members spend a lot of time on communication, knowledge exchange, and learning	+0.5
Creating the DDUs	6.4	14. Our organization is performance driven	+0.3
		30. Our organization grows through partnerships with suppliers and/or customers	+0.6
		32. Our organization is aimed at servicing the customers as best as possible	+0.6
Distributing the document "Take in, deal with, let go"	6.2	32. Our organization is aimed at servicing the customers in the best way possible	+0.6
Distributing the book <i>A High Performance Organization – What is That?</i>	6.1	10. Organizational members spend a lot of time on communication, knowledge exchange, and learning	+0.5
		28. Organizational members are trained to be resilient and flexible	+0.5

Table IV.
Relations between the most effective HPO interventions and HPO characteristics

According to the HPO theory, if the HPO score goes up, an increase in organizational results can be expected (de Waal, 2012), as has been observed at other case study organizations (de Waal and Chachage, 2011; de Waal and Frijns, 2011; de Waal *et al.*, 2015; de Waal and de Haas, 2016). In general, if an organization has worked in a disciplined way on the improvement areas, depending on the local circumstances, an average increase of 0.3 in HPO score per year can be expected (de Waal, 2012). Although the increase in HPO score for LIMOR was relatively small (0.5 over three years, representing an average annual increase of 0.167), a higher organizational performance should nonetheless be observable, and in this respect Table V presents a mixed picture. An important factor affecting the organizational results was the aforementioned change in the financing streams, causing less revenue. This downturn was partly offset by a trend, which started in 2010, of an increase in the hours of outpatient counselling and days of shelter provided, but these came under stress under the new legislation. LIMOR, anticipating this new legislation and driven somewhat by the results of the HPO diagnosis, restructured itself, introducing function differentiation, increasing its external profile, extending the range of services offered and making processes more efficient. In this way, the HPO Framework helped the management team to deal with external developments in an appropriate and proactive way. The decrease in revenue per FTE from 2013 to 2015 was caused by an increase in personnel during this year, itself a result of implementing function differentiation, which necessitated hiring more caregivers, some of whom were functioning as support staff whose activities were not declarable.

The slight decrease in client satisfaction was again a direct result of internal changes caused by the new legislation. Function differentiation and introducing DDU's meant that personnel in the care teams changed, resulting in clients having to get used to new faces. This caused some dissatisfaction among clients, although through the HPO interventions, this dissatisfaction was minimized and remained within acceptable limits (as the overall satisfaction score was still high).

At first sight, it might appear that the HPO diagnosis and interventions overall have not resulted in improved organizational results. However, on closer scrutiny, it becomes clear that, because of external developments, LIMOR has been under great pressure and its results could have deteriorated considerably, as did happen at many of LIMOR's peer organizations. LIMOR, by contrast, has been able to contain the detrimental effects of the developments, and the management team credits the HPO diagnosis and accompanying improvements and interventions for supporting the organization through tough times. Finally, it should be recalled that Table II shows that the most effective interventions were undertaken in the years 2014 and 2015, which might mean that their impact is not yet fully reflected in the organization's financial and non-financial results.

7. Conclusion, limitations and future research

The goal of this study was to evaluate whether the HPO Framework (de Waal, 2012) is an effective technique with which to address the performance issues of social care and rehabilitation organizations. The research results suggest that, for this case study company at least, the HPO Framework does not appear to have helped to significantly increase

Table V.
Organizational performance of LIMOR for the period 2010-2015

Indicator	2010	2011	2012	2013	2014	2015
HPO score			6.9			7.4
Revenue (in €1,000,000)	16.5	18.1	19.6	20.4	20.9	20.0
Revenue/FTE (in €1,000)	78.8	84.1	75.4	82.9	81.3	71.3
Client satisfaction score	8.02		8.45			8.34

organizational results. Instead, the framework was used at LIMOR to deal with the negative effects of external developments. This is a relative new finding, which has been demonstrated only once in prior research when a for-profit company used the HPO Framework to deal with the negative effects of the economic crisis (see de Waal, 2012). In general, the HPO Framework is used at organizations to identify the areas that have to be strengthened in order to become high performing and achieve better results than the peer group. In the case of LIMOR, the framework was also used to identify the areas that had to be strengthened. However, this was not with the intent to outperform the peer group but to survive in adverse external circumstances. As such, the case of LIMOR provided a new additional use of the HPO Framework.

The present study adds to the academic literature on high performance in several ways. It adds to the body of knowledge on performance improvement techniques, specifically pertaining to the social care and rehabilitation sector; and it opens several new avenues of study, such as into the various uses and application of a holistic improvement technique, and the use of improvement techniques for safeguarding the position of organizations in their sector. The study also has practical implications, as managers of social care and rehabilitation organizations will now be able to apply a framework that has been validated in practice to start strengthening their own organizations, and they can be prepared for the practical workings of such a framework in a healthcare context.

The management team of LIMOR commented on the use of the HPO Framework at the organization as follows:

The HPO Framework helped us in several ways. It helped us translate our management model and philosophy to practical activities and behaviours on the work floor. It helped us to create the discipline needed to constantly evaluate and adjust our activities, and it helped us to keep the focus on the long term, to keep developing our people, to stress the importance of connecting people to the organization and create long-term employment. We also like that the framework is not a prescriptive bodice as it gives space for local circumstances. It is a philosophy and mentality that you translate to your own context. It is all about whether you take it up and run with it.

There are some limitations to be found in this study, which at the same time serve as opportunities for future research. The study took place at only one organization in the social care and rehabilitation sector, so one must be cautious in generalizing the results of the research to the complete sector. Future research should test the HPO Framework at multiple social care and rehabilitation organizations. Also, the longitudinal research should be continued at LIMOR, to evaluate the effects of the interventions that the organization will make following the second HPO diagnosis and to analyse their impact on LIMOR's performance. As the example of LIMOR shows, external circumstances can influence organizational performance a great deal, thus making it difficult to isolate the effects of one particular improvement technique such as the HPO Framework. Hence, further longitudinal research should be conducted at organizations that use the HPO Framework, in order to better evaluate its long-term effects. Finally, as the HPO Framework is a generic one, future research could focus on identifying additional characteristics that create and sustain high performance in the social care and rehabilitation sector.

References

- Aas, T.H., Jentoft, N. and Vasstrøm, M. (2016), "Managing innovation of care services: an exploration of Norwegian municipalities", *Cogent Business & Management*, Vol. 3 No. 1, pp. 1-15.
- Alfodi, E.A. and Hassett, M.E. (2013), "Dealing with unpredictability and change in longitudinal studies of organisations: a priori versus progressive focusing approach", in Hassett, M.E. and Paavilainen-Mäntymäki, E. (Eds), *Handbook of Longitudinal Research Methods in Organisation and Business Studies*, Edward Elgar, Cheltenham, pp. 271-294.

- Andersson, A.C., Ainalem, I., Berg, A. and Janlöv, A.C. (2016), "Challenges to improve inter-professional care and service collaboration for people living with psychiatric disabilities in ordinary housing", *Quality Management in Healthcare*, Vol. 25 No. 1, pp. 44-52.
- Asenova, D., Stein, W. and Marshall, A. (2011), "An innovative approach to risk and quality assessment in the regulation of care services in Scotland", *Journal of Risk Research*, Vol. 14 No. 7, pp. 859-879.
- Axson, D.A.J. (2010), *The Management Mythbuster*, John Wiley & Sons, Hoboken, NJ.
- Bloice, L. and Burnett, S. (2016), "Barriers to knowledge sharing in third sector social care: a case study", *Journal of Knowledge Management*, Vol. 20 No. 1, pp. 125-145.
- Carrizales, T., Zahradnik, A. and Silverio, M. (2016), "Organizational advocacy of cultural competency initiatives: lessons for public administration", *Public Administration Quarterly*, Vol. 40 No. 1, pp. 126-155.
- Chandra, A., Stroube, W.B. and Willis, W.K. (2014), "Rehabilitation centers: marketing analysis and future challenges", *Health Marketing Quarterly*, Vol. 31 No. 4, pp. 326-338.
- Clarkson, P., Davies, S., Challis, D., Donnelly, M. and Beech, R. (2009), "Has social care performance in England improved? An analysis of performance ratings across social services organisations", *Policy Studies*, Vol. 30 No. 4, pp. 403-422.
- Cornes, P. and Horton, D. (1981), "The measurement of rehabilitation centre social climates", *Journal of Occupational Psychology*, Vol. 54 No. 4, pp. 289-297.
- Costa, A.C. and Anderson, N. (2011), "Measuring trust in teams: development and validation of a multifaceted measure of formative and reflective indicators of team trust", *European Journal of Work and Organisational Psychology*, Vol. 20 No. 1, pp. 119-154.
- Davies, B. and Knapp, M. (1981), *Old People's Homes and the Production of Welfare*, Routledge and Keegan Paul, London.
- Dawes, J. (1999), "The relationship between subjective and objective company performance measures in market orientation research: further empirical evidence", *Marketing Bulletin*, Vol. 10, pp. 65-76.
- de Waal, A. and Chachage, B. (2011), "Applicability of the high-performance organisation framework at an East African university: the case of Iringa university college", *International Journal of Emerging Markets*, Vol. 6 No. 2, pp. 148-167.
- de Waal, A., de Mooijman, E. and Ferment, M. (2015), "From crisis to all-time high performance: using the HPO framework to improve customer relations at Ziggo", *Global Business and Organisational Excellence*, Vol. 34 No. 2, pp. 6-18.
- de Waal, A.A. (2012), *What Makes a High Performance Organisation, Five Validated Factors of Competitive Performance that Apply Worldwide*, Global Professional Publishing, Enfield.
- de Waal, A.A. (2013), "Evergreens of excellence", *Journal of Management History*, Vol. 19 No. 2, pp. 241-278.
- de Waal, A.A. and de Haas, J. (2016), "Longitudinal research into the effects of the high performance organisation framework: the case of NEH the Philippines", paper presented at the PMA 2016 Conference, Edinburgh, 26-29 June.
- de Waal, A.A. and Frijns, M. (2011), "Longitudinal research into factors of high performance: the follow-up case of Nabil bank", *Measuring Business Excellence*, Vol. 15 No. 1, pp. 4-19.
- FEANTSA (2004), "Co-operation between all relevant bodies to improve the fight against homelessness: review of the situation in the member states of the European Union", FEANTSA report (annual theme 2003), European Federation of National Organisations Working with the Homeless, Brussels, 15 September.
- FEANTSA (2005), "Street homelessness: a growing problem that needs urgent attention", FEANTSA report (annual theme 2005), European Federation of National Organisations Working with the Homeless, Brussels.
- FEANTSA (2016), "Time for EU to acknowledge increase in levels of homelessness as a social emergency", Press release, European Federation of National Organisations Working with the Homeless, Brussels, 14 June.

- Gard, G. and Larsson, A. (2006), "How can cooperation between rehabilitation professionals in rehabilitation planning be improved? A qualitative study from the employer's perspective", *Work*, Vol. 26 No. 2, pp. 191-196.
- Hair, J.F., Anderson, R.E., Tatham, R.L. and Black, W.C. (1998), *Multivariate Data Analysis*, 5th ed., Prentice Hall, Upper Saddle River, NJ.
- HakemZadeh, F. and Baba, V.V. (2016), "Measuring the actionability of evidence for evidence-based management", *Management Decision*, Vol. 54 No. 5, pp. 1183-1204.
- Hassett, M.E. and Paavilainen-Mäntymäki, E. (2013), "Longitudinal research in organisations: an introduction", in Hassett, M.E. and Paavilainen-Mäntymäki, E. (Eds), *Handbook of Longitudinal Research Methods in Organisation and Business Studies*, Edward Elgar, Cheltenham, pp. 1-22.
- Heap, J. and Bolton, M. (2004), "Using perceptions of performance to drive business improvement", in Neely, A., Kennerly, M. and Waters, A. (Eds), *Performance Measurement and Management: Public and Private*, Centre for Business Performance, Cranfield University, Cranfield, pp. 1085-1090.
- Heenan, D. and Birrell, D. (2006), "The integration of health and social care: the lessons from Northern Ireland", *Social Policy & Administration*, Vol. 40 No. 1, pp. 47-66.
- Hofmarcher, M.M., Festl, E. and Bishop-Tarver, L. (2016), "Health sector employment growth calls for improvements in labor productivity", *Health Policy*, Vol. 120 No. 8, pp. 894-902.
- Jing, F.F. and Avery, G.C. (2008), "Missing links in understanding the relationship between leadership and organisational performance", *International Business & Economics Research Journal*, Vol. 7 No. 5, pp. 67-78.
- Kieser, A., Nicolai, A. and Seidl, D. (2015), "The practical relevance of management research: turning the debate on relevance into a rigorous scientific research program", *The Academy of Management Annals*, Vol. 9 No. 1, pp. 143-233.
- Knapp, M. (1984), *The Economics of Social Care*, Macmillan, Basingstoke.
- Kovner, A.R. (2014), "Evidence-based management: implications for nonprofit organisations", *Nonprofit Management & Leadership*, Vol. 24 No. 3, pp. 417-424.
- LIMOR (2012), "Strategisch Koersdocument 2012-2016", strategy document (in Dutch), LIMOR, Zwolle.
- Malley, J. and Fernández, J.L. (2010), "Measuring quality in social care services: theory and practice", *Annals of Public & Cooperative Economics*, Vol. 81 No. 4, pp. 559-582.
- Matear, S., Gray, B.J. and Garrett, T. (2004), "Market orientation, brand investment, new service development, market position and performance for service organisations", *International Journal of Service Industry Management*, Vol. 15 No. 3, pp. 284-301.
- Memon, A.R. and Kinder, T. (2017), "Co-location as a catalyst for service innovation: a study of Scottish health and social care", *Public Management Review*, Vol. 19 No. 4, pp. 381-405.
- Menard, S. (2008), *Handbook of Longitudinal Research: Design, Measurement, and Analysis*, Academic Press, Burlington, MA.
- Øvretveit, J., Hansson, J. and Brommels, M. (2010), "An integrated health and social care organisation in Sweden: creation and structure of a unique local public health and social care system", *Health Policy*, Vol. 97 Nos 2/3, pp. 113-121.
- Parnell, J.A., Dent, E.B., O'Regan, N. and Hughes, T. (2012), "Managing performance in a volatile environment: contrasting perspectives on luck and causality", *British Journal of Management*, Vol. 23 No. 4, S1, pp. S104-S118.
- Pavolini, E. and Ranci, E. (2008), "ResStructuring the welfare state: reforms in long-term care in Western European countries", *Journal of European Social Policy*, Vol. 16 No. 3, pp. 246-259.
- Pfeffer, J. and Sutton, R.I. (2006), *Hard Facts, Dangerous Half-Truths. and Total Nonsense: Profiting from Evidence-Based Management*, Harvard Business School Press, Boston, MA.
- Rainer, A. (2011), "The longitudinal, chronological case study research strategy: a definition, and an example from IBM Hursley park", *Information & Software Technology*, Vol. 53 No. 7, pp. 730-746.

-
- Rosenzweig, P. (2007), *The Halo Effect ... and the Eight Other Business Delusions that Deceive Managers*, Free Press, New York, NY.
- Schmid, H. (2002), "Relationships between organisational properties and organisational effectiveness in three types of nonprofit human services organisations", *Public Personnel Management*, Vol. 31 No. 3, pp. 377-397.
- Stewart, A., Petch, A. and Curtice, L. (2003), "Moving towards integrated working in health and social care in Scotland: from maze to matrix", *Journal of Inter-Professional Care*, Vol. 17 No. 4, pp. 335-353.
- Tistad, M., Palmcrantz, S., Wallin, L., Ehrenberg, A., Olsson, C.B., Tomson, G., Holmqvist, L.W., Gifford, W. and Eldh, A.C. (2016), "Developing leadership in managers to facilitate the implementation of national guideline recommendations: a process evaluation of feasibility and usefulness", *International Journal of Health Policy & Management*, Vol. 5 No. 8, pp. 477-486.
- van Harten, W.H., Casparie, T.F. and Fisscher, O.A.M. (2002), "The evaluation of the introduction of a quality management system: a process-oriented case study in a large rehabilitation hospital", *Health Policy*, Vol. 60 No. 1, pp. 17-39.
- Wolstenholme, E., Monk, D., McKelvie, D. and Arnold, S. (2007), "Coping but not coping in health and social care: masking the reality of running organisations beyond safe design capacity", *System Dynamics Review*, Vol. 23 No. 4, pp. 371-389.

HPO factor	No.	HPO characteristic	LIMOR	
			2012	2015
Continuous improvement and renewal	1	Our organization has adopted a strategy that sets it clearly apart from other organizations	6.4	7.4
Continuous improvement and renewal	2	In our organization, processes are continuously improved	6.8	7.3
Continuous improvement and renewal	3	In our organization, processes are continuously simplified	5.7	6.5
Continuous improvement and renewal	4	In our organization, processes are continuously aligned	5.9	6.7
Continuous improvement and renewal	5	In our organization, everything that matters to the organization's performance is explicitly reported	6.7	7.2
Continuous improvement and renewal	6	In our organization, both financial and non-financial information is reported to organizational members	6.2	7.0
Continuous improvement and renewal	7	Our organization continuously innovates its core competencies	6.7	7.3
Continuous improvement and renewal	8	Our organization continuously innovates its products, processes and services	7.0	7.3
Openness and action orientation	9	The management of our organization frequently engages in dialogue with employees	7.0	7.5
Openness and action orientation	10	Organizational members spend a lot of time on communication, knowledge exchange, and learning	6.5	7.0
Openness and action orientation	11	Organizational members are always involved in important processes	5.9	7.1
Openness and action orientation	12	The management of our organization allows making mistakes	7.2	7.5
Openness and action orientation	13	The management of our organization welcomes change	7.6	7.9
Openness and action orientation	14	Our organization is performance driven	7.2	7.5
Management quality	15	The management of our organization is trusted by organizational members	6.9	7.4
Management quality	16	The management of our organization has integrity	7.5	7.7
Management quality	17	The management of our organization is a role model for organizational members	7.1	7.3
Management quality	18	The management of our organization applies fast decision making	7.0	7.1
Management quality	19	The management of our organization applies fast action taking	7.1	7.2
Management quality	20	The management of our organization coaches organizational members to achieve better results	6.9	7.3
Management quality	21	The management of our organization focusses on achieving results	7.5	7.7
Management quality	22	The management of our organization is very effective	6.9	7.1
Management quality	23	The management of our organization applies strong leadership	6.3	7.4
Management quality	24	The management of our organization is confident	7.3	7.6
Management quality	25	The management of our organization is decisive with regard to non-performers	6.7	6.9
Management quality	26	The management of our organization always holds organizational members responsible for their results	7.1	7.3

(continued)

Table AI.
35 characteristics of the five HPO factors, with the average scores for LIMOR for the years 2012 and 2015

HPO factor	No.	HPO characteristic	LIMOR	
			2012	2015
Employee quality	27	The management of our organization inspires organizational members to accomplish extraordinary results	7.3	7.6
Employee quality	28	Organizational members are trained to be resilient and flexible	6.0	7.5
Employee quality	29	Our organization has a diverse and complementary workforce	7.3	7.9
Employee quality	30	Our organization grows through partnerships with suppliers and/or customers	6.8	7.4
Long-term orientation	31	Our organization maintains good and long-term relationships with all stakeholders	7.2	7.4
Long-term orientation	32	Our organization is aimed at servicing the customers in the best way possible	7.4	8.0
Long-term orientation	33	The management of our organization has been with the company for a long time	7.8	7.3
Long-term orientation	34	New management is promoted from within the organization	7.3	6.9
Long-term orientation	35	Our organization is a secure workplace for organizational members	6.6	7.6
Average HPO score			6.9	7.4

Table AI.

Corresponding author

André de Waal can be contacted at: andredewaal@planet.nl