

Moderately developed employee performance appraisal systems in Hungarian hospitals*

Norbert Zétény Sárga, Richárd Kása**

Abstract

The aim of the study is to assess and present the structure of the performance management system and the practice of performance appraisal in Hungarian state-run hospitals in the framework of an exploratory, descriptive research. Objective data may be used to support performance appraisal practices, primarily alongside a strategic performance management goal. The performance measurement and evaluation practice emerging from the research can be considered to be of adequate quality on the basis of the recommendations formulated in the literature. It is found that moderately developed performance appraisal systems exist in Hungarian hospitals. When observing work performance, the direct results of employees' work are the primary basis for performance appraisal. A scale for measuring the development of a performance appraisal system has been developed.

Keywords: performance appraisal systems, employee, Hungarian, hospital

JEL Codes: M12

1. Introduction

The harmony of organizational and individual goals is essential in the operation of a successful organization (Bakacsi, 2015; Hermel-Stănescu, 2015), and hospitals are no exception to this. Without performance appraisal (PA), it is hard to measure the fulfillment of organizational goals and the work of an individual. Performance appraisals are a regular review of employee performance within an organization (Patil & Dalvi, 2019). A performance appraisal system (PAS), and the information derived from it, provide support for making many management decisions, is crucial for accountability and serves as a source of feedback and is a guidance tool for the managerial level of organizations (Horenberg, Adrian, & Nuti, 2020; Marr & Gray, 2006). Performance management (PM) can transform an individual's talent and motivation into a strategic, business advantage for the organization (Aguinis, 2005), such as a hospital. New public management has appeared in public administration, because the public sector is expected to increase efficiency and effectiveness among others via the use of managerial techniques typical of for-profit companies (Hajnal, 2004). Talbot states (2007) that it is worthwhile and necessary to examine the effectiveness

* Received: 25.02.2021, accepted: 15.03.2022, 2 revisions.

** Norbert Zétény Sárga, (Corresponding author) PhD Candidate, Doctoral School of Mental Health Sciences, Semmelweis University. Email: sarga.zeteny@semmelweis-univ.hu. Main research interest: human resources management.

Richárd Kása, PhD, Senior researcher, Faculty of Finance and Accountancy, Department of Management, Budapest Business School. Email: kasa.richard@uni-bge.hu. Main research interests: innovation management, statistical methods.

of a government program; as well as the operation of a (state) organization, or the work of those who work in it. State-controlled organizations, including hospitals, are trying to adapt the HR systems typical of for-profit organizations, performance management necessarily appears in this field also. According to Sing and Vadivelu (2019), 60 % of hospital employees believe that performance appraisal plays a crucial role in their career development. The PAS is also an integral part of healthcare organizations (Vanieri, Ferré, Giacomelli, & Nuti, 2017).

We believe it is worthwhile to share our research experience, as present experience may influence the performance evaluation practices of hospital staff. Based on these, we recommend our article to senior hospital executives, along with other practitioners.

1.1. The Hungarian health care system

Hungary is located in Central Europe, with a population of almost 10 million. Over the last ten years, the structure of health care has changed. After a short period of privatization following the end of state socialism, the (re) nationalization of hospitals began in 2012. As a result, the vast majority of Hungarian hospitals came under state control (with the exception of some church- and foundation-maintained institutions). The Hungarian health care system is hospital-centric, and the care is provided on the basis of a compulsory insurance relationship. The contribution-based health insurance fund has existed since 1989, and from 2012 onwards it has been characterized by an increase in tax-containing items (tax-like elements of the health financing, in addition to the mandatory Social Security contribution payment). The Hungarian hospital system has 3 divisions: city, county and national or 'central' hospitals. In 2011, the Secretary of State for Health created the Semmelweis Plan, a conceptual document that identified structural and functional problems in the health sector. Based on an assessment of the system, the central performance problem of the Hungarian health care system is the resource allocation and the lack of efficiency resulting from the redistributive distortion (State Secretariat for Health, 2011). The objective of the "Healthy Hungary 2014–2020" health sector strategy was to improve the health status of Hungarian citizens and to increase the operational efficiency of health care (Ministry of Human Resources, 2014). That is, in this environment, cost savings and efficiency were expected from the hospital system, and thus from the management, in addition to appropriate patient care. Section 40 of Act XXXIII of 1992 on the Legal Status of Civil Servants, which was in force at the time of this study, lists the qualification requirements of civil servants, but no other mandatory regulations on employee performance appraisal were in force at the time. Our study joins this milieu. The aim of our research is to assess and present the structure of performance management systems and the practice

of employee performance evaluation in Hungarian, state-maintained hospitals and inpatient hospitals within the framework of a descriptive-exploratory study. We are confident that the findings will serve as a useful empirical basis for developments at both organizational and sectoral levels.

The key research questions are: how the PAS is structured, what considered performance is, what PA techniques are used, who the participants in the appraisal system are and how developed the PAS is. The research questions for this study can be found in Table 1.

Table 1: Research questions

No.	Research question	Sub-questions	Method
1.	What are the characteristics of the performance appraisal system in Hungarian public hospitals?	<ul style="list-style-type: none"> ■ How do the protocols look? ■ How regular is the evaluation? ■ Are managers prepared to evaluate employees in public hospitals? 	Descriptive statistics and conclusion on population characteristics
2.	What is the structure of the performance appraisal system in Hungarian public hospitals?	<ul style="list-style-type: none"> ■ What is the primary performance management goal? ■ What is measured? ■ Which techniques are used? ■ Who is involved in the evaluation? 	Creating a PAS development scale and performing comparative analyzes

Source: own research

1.2. History of the present research

In 2015, an employee performance appraisal system was developed and introduced as a pilot program at the Central Physiotherapy Department of the Nagykőrös Rehabilitation Hospital, the results of which have already been published (Sárga, 2016). After the implementation of the project and the evaluation of its results and lessons learned, we decided to extend the framework of that study by examining the systems of the hospitals of the region. The aim of the study was to assess and present the structure of the PM system, and the actual practice of performance evaluation in the hospitals of the Dél-Alföld region in Hungary (Sárga, 2017).

2. Literature review and theoretical framework

As Horenberg et al. argue (Horenberg et al., 2020), in order for PAS to be effective in public hospitals it should be characterized by: (1) multidimensional indicators; (2) shared-design (all stakeholders and health professionals should be involved in the design and fine-tuning process of the PAS and associated indicators); (3) the opportunity to overcome self-referentiality and to measure

avoidable variation and space for improvement; (4) transparency; and (5) timeliness (allows policymakers to make decisions promptly) (Nuti, 2016; Nuti, Noto, Vola, & Vainieri, 2018). The main challenges in hospitals in developing PAS lies in the demand for a flexible and appropriate system for the professional staff (Sing & Vadivelu, 2019). Nevertheless, developing a well-functioning PAS is crucial, as some researches suggests (West et al., 2002), that in hospitals there are 'strong associations' between HR practices and patient mortality, including particularly regarding strong relationships between appraisal/performance management systems (Wilkinson, Muurink, Awan, & Townsend, 2019).

The steps of developing a performance appraisal system are of strategic importance. A well-functioning PAS and the information derived from it provide support for any management decision. When developing PAS, not only the definition of performance is a key consideration, but also the steps in its development. The first step for the efficient operation of PM systems is to decide which PM goals form the foundation upon which a performance appraisal system is to be developed (Bakacsi et al., 1999). The literature distinguishes the following goals: strategic / business, development, and administrative or compensation goals (Bokor et al., 2009; Boswell & Boudreau, 2002; Cleveland, Murphy, & Williams, 1989; Karoliny & Poór, 2010; Takács, 2000).

The next step in the PM system is deciding what to consider as performance, what to measure, what to evaluate and what to monitor. Srivastava (Srivastava, 2017) distinguishes the following three major groups: attribute, behavior, and outcome-based information. Karolinyé and Poór (Karoliny & Poór, 2010) also confirm this same division and add that competence-based information as a new approach. Bokor et al (Bokor et al., 2009) basically talk about two types of performance appraisals, outcome and competency-based.

Among the various performance evaluation techniques and measurement methods, the following can be distinguished (Bakacsi et al., 1999; Bokor et al., 2009; Shrimali & Rathore, 2017): rating scale, checklist, informal report (essay), work standard, critical incident method, and behaviorally anchored rating scales. Management by Objectives (MBO) is also used (Islami, Mulolli, & Mustafa, 2018). The techniques and methods mentioned thus far have only been used to measure the performance of a single employee. In addition, there is a way to compare multiple employees: using the ranking method and forced distributions (Dharmadhikari & Bampooori, 2018).

The next question to be decided by PAS is who the evaluator should be. Here are some options, according to the literature:

- The boss, his / her immediate superior, or the workplace manager. Due to his position, he has the best opportunity to observe and evaluate the work, his performance, and the obligations assigned to the employee, in relation to the

expectations placed on him (Bokor et al., 2009; Boncz et al., 2011; Karoliny & Poór, 2010).

- Self-appraisal. One of the arguments in favor of self-appraisal is that the employee is aware of his / her motivation and has sufficient information about his / her own work (Bokor et al., 2009). At the same time, the problem with self-appraisal may be that employees do not always know or do not want to see their own performance clearly and objectively; according to attribution theory, people tend to attribute successes to themselves and failures to others (Bakacsi et al., 1999; Bokor et al., 2009; Boncz et al., 2011).
- Additional participants such as: colleagues, HR department, or evaluation committee. Multi-phase or multi-source, i.e., based on the opinions of several evaluators such as – 360-degree or 720-degree feedback (Bakacsi et al., 1999; Bokor et al., 2009; Karoliny & Poór, 2010; Patil & Dalvi, 2019). The essence of this method is to get the most objective and complete picture of the evaluated person's work by involving a wide range of evaluators in the evaluation process.

Kondrasuk (2011) writes of an ideal assessment in his study (Kondrasuk, 2011). He found that, although evaluation is considered necessary, many managers still find it a problem, and there are countless flaws not only in the system built, but in the implementation of the evaluation itself. In order to eliminate errors, it is primarily a matter of deciding what the purpose of the evaluation is. We need to look at the ideal PAS from two perspectives: from the managerial point of view, and from the subordinate point of view. It is important to be aware of which party expects what from the assessment. Kondrasuk (2011) also summarizes more than 70 problems related to PAS in the literature and reduces them into four categories, which are: the purpose of the evaluation, the participants in the evaluation; what and how they measure, as well as the system and implementation categories. He suggests the following methods for evaluation: formulate more measurable goals, provide more frequent feedback to the employee, reduce biases in evaluation, provide better training for evaluators, and review the evaluation system on a regular basis. (Kondrasuk, 2011)

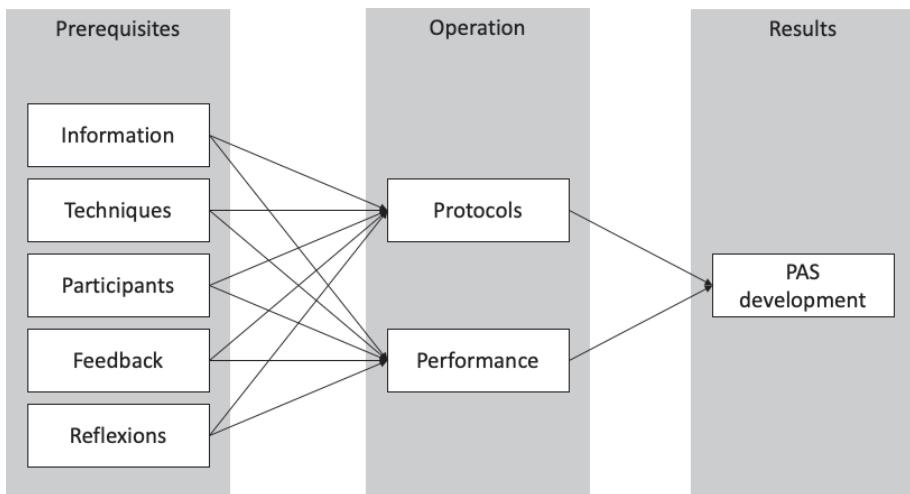
In connection with the unconscious distortions inherent in performance evaluations, Traub (Traub, 2013) suggests that there can be both positive and negative distortions and biases, which affect not only the careers of employees, but also the capacity of the company. The following biases should be considered: managerial, self-assessment, structural / organizational, and calibration / comparison. Importantly, we need to be aware of the existence of these biases, understand their manifestations and their consequences, and identify strategies to mitigate these biases. Ideally, PA is accurate and objective. Lunenburg (Lunenburg, 2012) notes that the performance appraisal process is far from accurate and objective, sometimes with evaluation errors. In its formulation, the four most

common evaluation and classification errors are: the error of rigor or leniency, the nature of the centering, the halo effect, and the error of recent events.

During the operation of the performance appraisal system, the above-mentioned errors and bias may occur, which the evaluators also must be aware of. For this reason, it is important that the evaluation system is regularly maintained. However, due to methodological and scope limitations, our present research does not focus on biases, but on the structure of the evaluation systems themselves, their description and presentation.

According to our research and the literature, we formed a theoretical framework for the concept of the hospitals' PAS development. It has the prerequisites of obtaining the relevant information, using the relevant and effective techniques on the proper group of participants involving all the relevant actors of the process, and also including reflexional and feedback mechanism. This should be placed on the work on operational level with well elaborated protocols and measurable performance, thus as a result a well-established PAS can evolve. This framework is highlighted in Figure 1:

Figure 1: Research framework



Source: own research

3. Methodology

The focus of our research is on state-owned hospitals, assuming that they perform employee performance appraisal practices, and that this practice can be measured and examined. Due to the ongoing restructuring of the hospital system, we planned to involve all 114 state-run hospitals in the study (church-,

foundation-, or university-maintained institutions were not included in our study). Our research focuses on the top management perspective: the types of top management decisions, performance appraisal system support, the structure of the system, and the characteristics of the performance appraisal practice for measuring and evaluating the performance of physicians and professionals actively involved in inpatient care. Data collection was performed using a questionnaire. When compiling the questionnaire, we took into account the performance appraisals systems recommended and already developed and described by the literature, as well as the available professional materials, together with the results and experiences gained during the examination of the Dél-Alföld region (Sárga, 2017). HR experts and hospital managers were involved in the development of the questionnaire. The questionnaire was distributed among the state-maintained hospitals' top managers. The responses were voluntary and anonymous, and the data obtained were used for scientific purposes only. The completed questionnaires were returned directly to the research participants. The sampling took place in August and September 2018.

For the evaluation of questions concerning *performance protocol, preparing middle managers for appraisal, feedback, reflections and formal framework for appraisals* 4–4options were offered as an ordinal scale. For the evaluation of questions for *PA reviewed* and *frequency of appraisals* 5 options were offered as an ordinal scale. Questions entitled *PM goals, performance types, PA techniques, PA participants* were assessed using a 4-point Likert scale. Multiple choice was used for the question for *distribution of PA*. This question has been taken over and expanded with the possibility of “qualification” from the research of Petró and Stréhli-Klotz (Petró & Stréhli-Klotz, 2013) on Hungarian public services. We considered it worthwhile comparing the practice of hospital PA with the practice of other Hungarian public service organizations.

Based on previous research (Sárga, 2017), in order to get the most nuanced picture of the practice of PA, we weighted the variables in the following questions: *performance types, PA techniques* and *PA participants*. The variables and the degree of weighting are shown in Table 2a-c. When weighting the work performance information, we built on the results obtained during the examination of the already mentioned Dél-Alföld region (Sárga, 2017); according to what is considered the most work performance, what and how much is measured. With respect to performance appraisal techniques, we assumed that few performance appraisal techniques are likely to be used. Although informal feedback may contain relevant information, we do not consider it as valid to the performance appraisal techniques developed. The first research question was included in the questionnaire as 2 separate questions (to gain as many information as possible), which were combined in the analysis.

For the question in which we examine the development of PAS, a suitable scale has been considered for measuring the development of PAS (we call “PAS developmental scale”), which we created from the questions associated with performance protocol, preparing middle managers for appraisal, performance types, PA techniques, PA participants, feedback and reflections. The weights of different options were obtained by our research team in these three fields: the performance information with 9 options and weights scaled from 0.2 to 1, as can be seen in table 2a; applied performance appraisal techniques with 12 options and weights scaled from 0.5 to 1, as can be seen in table 2b; and participants in the evaluation with 7 options and weights scaled from 0.05 to 0.9, as can be seen in table 2c. Thus, the range of this generated scale is set between 1 to 6 by Guilford optimal scaling where the highest score indicates the highest level of development. We distinguished three levels: high (5–6 scale value), medium (3–4 scale value), and low (1–2 scale value) developed PAS. The more developed the PAS, the more performance information is evaluated. Typically, the appraisal is not done by a single method, and there are a number of participants involved in the appraisal process (along the lines of the 360-degree evaluation) and the employee to be evaluated in the appraisal. Moreover, the employee gets feedback or has the opportunity to offer reflections. We also examined where the responding hospitals are located on this scale, as shown in the following tables.

Table 2a: Weighted variables (questions 5)

Name of the variable	Variable's weight
5. Performance information	
General characteristics and competencies of employees.	1
Some well-grasped types of behavior of employees, their attitude to work.	1
Some well-grasped types of behaviors of employees, attitudes towards coworkers.	0.2
Qualification of employees.	0.4
Work culture of employees.	0.4
Direct results of employees' work.	1
Absence of workers.	0.2
Employee communication.	0.5
Other non – job responsibilities of employees.	1

Source: own research

Table 2b: Weighted variables (questions 6)

Name of the variable	Variable's weight
6. Performance appraisal techniques	
Rating scale	1
Informal form report (essay), textual evaluation	1
Work standard	1
Critical incident method	1
Checklist	1
Behaviorally anchored rating scales	1
Behavior monitoring scale	1
Management by Objectives (MBO)	1
Ranking method	1
Paired comparison	1
Forced distributions	1
Informal feedback	0.5

Source: own research

Table 2c: Weighted variables (questions 7)

Name of the variable	Variable's weight
7. Participants in the evaluation	
Workplace manager / supervisor	0.9
Employee's employer	0.5
Self-appraisal	0.6
HR department	0.05
Coworkers in the identical position	0.35
Coworkers in the non-identical position	0.15
Patients treated by the employee	0.35

Source: own research

4. Statement of Ethics

For the research, we received permission and support from the maintainer of the examined hospitals, the so called State Health Care Center (ÁEEK). The research was reviewed by the Scientific and Research Ethics Committee of the Health Science Council of Semmelweis University and, given that it is not aimed at questioning either health or personal data, was not considered to be within its remit. Informed consent was obtained from all subjects involved in the study and the authors declare no conflict of interest. An Institutional Review

Board Statement is not applicable in this study as we are not utilizing health or personal data.

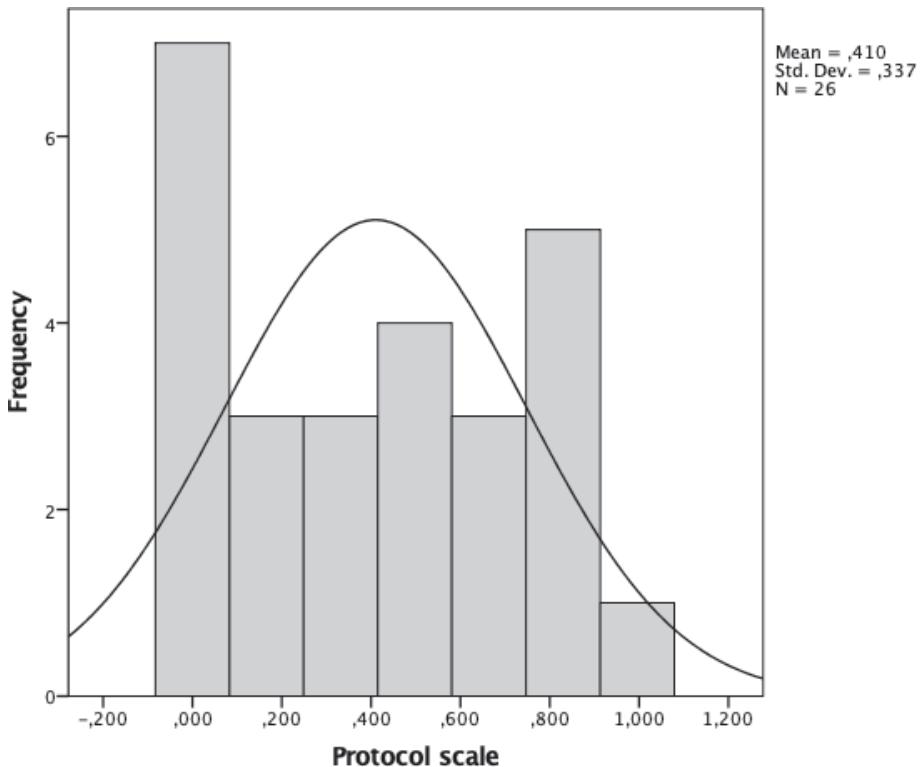
5. Results

The questionnaire was returned by a total of 31 hospitals, with a response rate of 27 %, so we covered a quarter of the whole population. Considering the difficulties of accessing public sector institutions, especially hospitals, we believe that this coverage can give an almost complete picture of the sector, and this is also the largest sample in Hungary of hospitals. We have run scale validity tests and reliability analyses, but due to the high scale item variance and the heterogeneity of the sample, they are not meaningful. However, our population is very crisp (state-run hospitals in Hungary) it is also diverse, and the questionnaire scales (nominal and ordinal scales) should have too many items. It is also resulted in the high item variance and deviation.

Slightly more than half (51.5 %) of the responding hospitals do not have a protocol for measuring performance, while almost 20 % (19.4 %) have it regularly updated and 12.9 % have a protocol, which is widely known and the evaluation is based upon this protocol. *How regularly is the protocol for the hospital's PA reviewed?* 28 % of respondents *do not have such a protocol*, 7 % *it doesn't happen*, 29 % *regularly* and 36 % *occasionally* (n=28). Figure 2 shows the distribution of the developed "protocol scale" (and its relation to the normal distribution): the values of the protocol scale show an overall decreasing trend, which means that most respondents achieved a lower value and only a few are at the top of the scale.

29 % of middle managers are not trained, 26 % sometimes, 22 % often and 23 % are regularly trained for evaluation (n=31). 37 % of the hospitals in the study had individual performance appraisals, and in contrast 16 % did not have performance appraisals. There were 14 % with group PAs, 9 % with organizational level PAs, 3 % employing 360-degree PA and 21 % based upon qualifications (n=31).

Based on the obtained results, it can be said that the practice of performance appraisal in the participating hospitals is mostly alongside a strategic goal. It should be emphasized that the other PM goals are also considered to be largely important; the second PM goal is development, as shown in the following table.

Figure 2: Protocol scale distribution

Source: own research

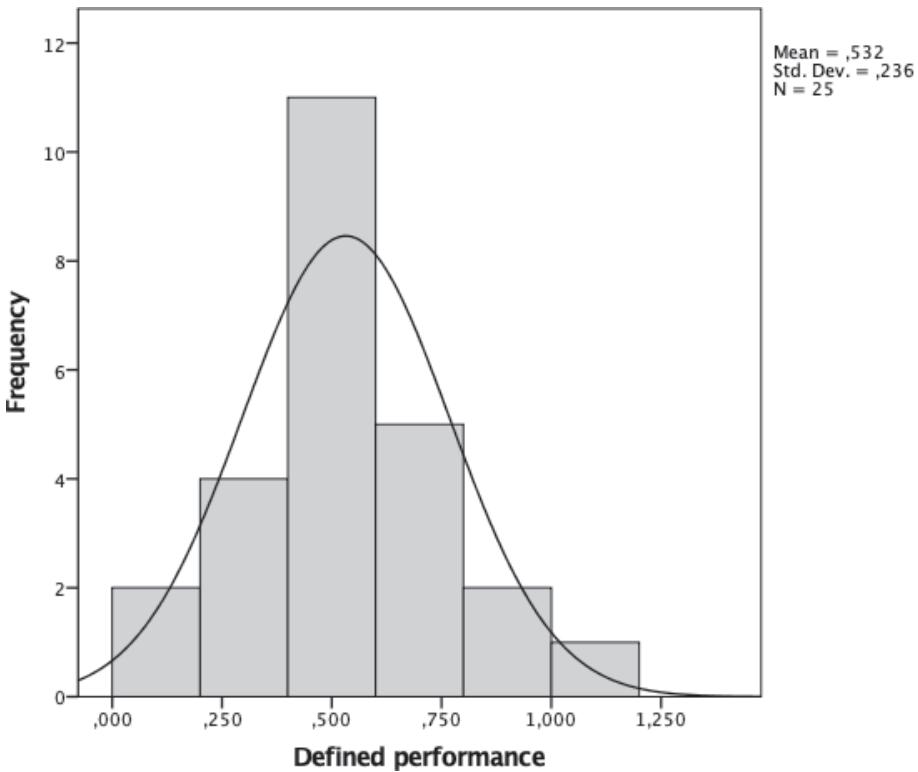
Table 3: Distribution of PM goals (n = 28)

	Minimum	Maximum	Mean	Std. Deviation
Strategy	2	4	3.16	0.943
Development	2	4	3.08	0.640
Compensation	1	4	2.40	0.957
Administrative	1	4	2.76	0.831

1: not considered a goal. 4: important

Source: own research

Based on the results obtained, it can be stated that the direct results of employees are generally considered for performance evaluation. At the same time, it can be said that the attitudes and types of behavior of employees are measured in most hospitals, but to varying degrees. The distribution of performance information is shown in Table 4, while the distribution of performance types for the hospitals examined is shown in Figure 3.

Figure 3: Distribution of defined performance for the hospitals studied

Source: own research

Table 4: Performance types

	Minimum	Maximum	Mean	Std. Deviation
General characteristics and competencies of employees	1	4	2.88	0.833
Some well-grasped types of behavior of employees. their attitude to work	1	4	2.88	0.927
Some well-grasped types of behaviors of employees. attitudes towards coworkers	1	4	2.80	0.957
Qualification of employees	1	4	3.00	1.041
Work culture of employees	1	4	3.04	1.020
Direct results of employees' work	1	4	3.08	1.038
Absence of workers	1	4	2.32	1.030
Employee communication	1	4	2.96	1.020
Other non – job responsibilities of employees	1	4	2.28	0.936

1: not used; 4: important

Source: own research

The following statements can be made about the distribution of the use of performance evaluation techniques: the most popular technique is the rating scale. This is followed by an informal report (essay) and informal feedback. The least-used tools are the behaviorally anchored rating scales, the behavior monitoring scale, and Management by Objectives (MBO) as shown in Table 5.

Table 5: Performance appraisal techniques

	Minimum	Maximum	Mean	Std. Deviation
Rating scale	1	4	2.75	1.260
Informal form report (essay), textual evaluation	1	4	2.21	1.215
Work standard	1	4	1.35	0.832
Critical incident method	1	4	1.74	1.054
Checklist	1	3	1.43	0.728
Behaviorally anchored rating scales	1	4	1.25	0.737
Behavior monitoring scale	1	3	1.13	0.458
Management by Objectives (MBO)	1	3	1.26	0.689
Ranking method	1	4	1.65	0.935
Paired comparison	1	3	1.22	0.518
Forced distributions	1	2	1.04	0.209
Informal feedback	1	4	2.21	1.141

1: not used; 4: important

Source: own research

Regarding the question of the participants of the performance appraisal system, it can be stated on the basis of the obtained results and according to the recommendations of the literature, the evaluated workplace manager is the most common participant in the appraisal, but self-appraisal is also a notable element of PAS. Patient evaluation is less typical. The least active participants in the evaluation are the staff and the HR department. See Table 6 and Figure 4:

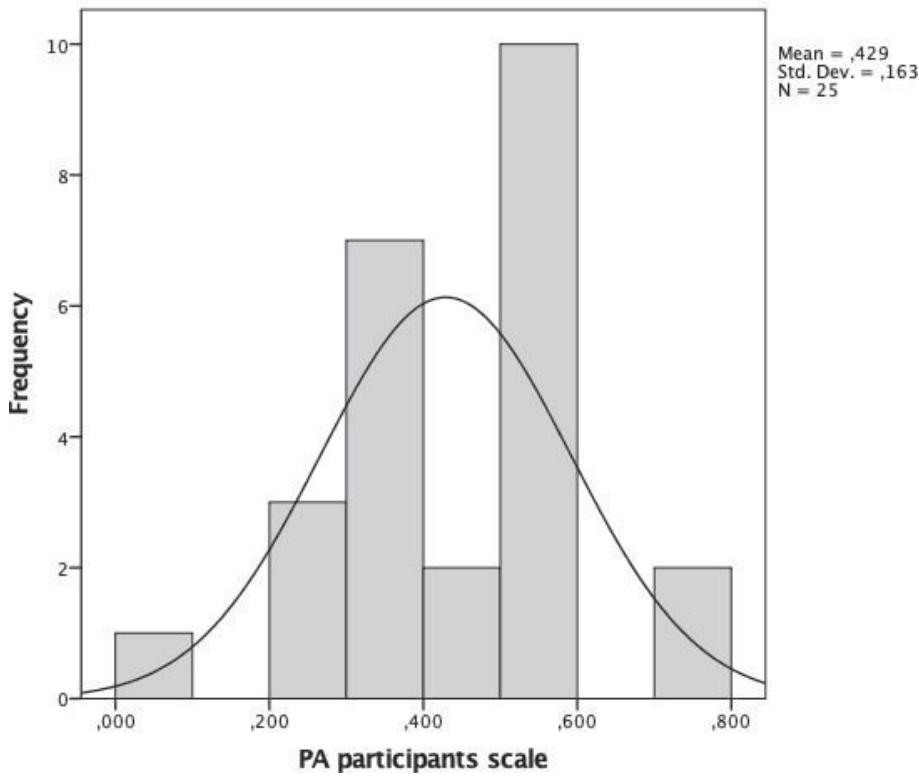
Table 6: Performance appraisal participants

	Minimum	Maximum	Mean	Std. Deviation
Workplace manager / supervisor	1	4	3.52	0.714
Employee's employer	1	4	2.52	1.262
Self-appraisal	1	4	2.48	1.295
HR department	1	3	1.36	0.569
Coworkers in the identical position	1	3	1.42	0.654
Coworkers in the non-identical position	1	3	1.28	0.542
Patients treated by the employee	1	3	1.52	0.823

1: not involved; 4: most important

Source: own research

Figure 4: Distribution of performance appraisal participants scale based on responding hospitals

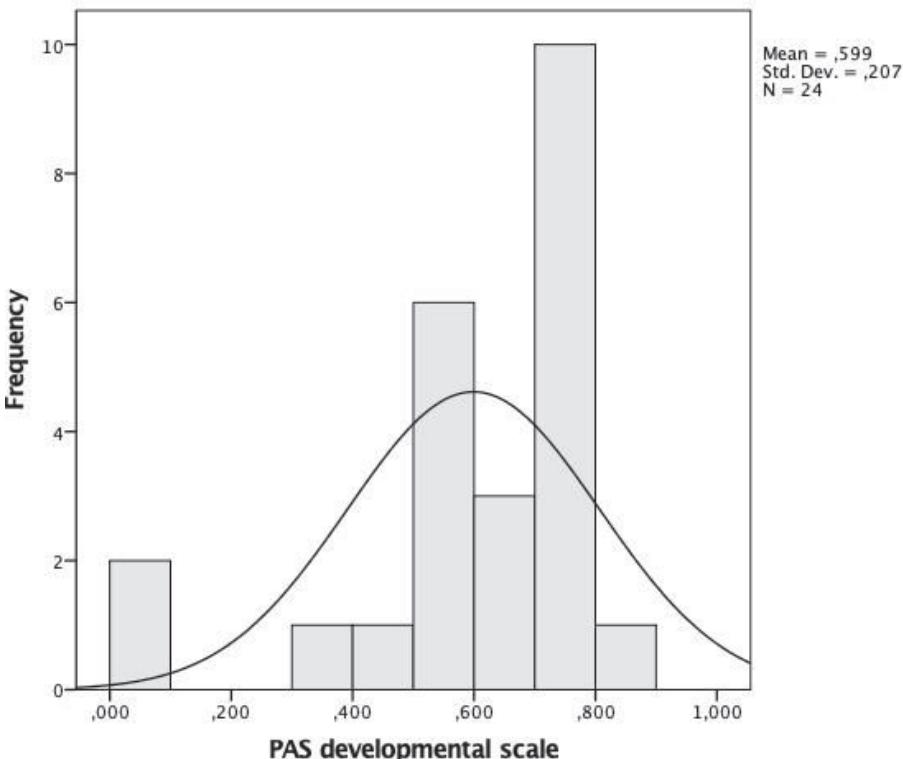


Source: own research

Regarding the feedback on the evaluations, it can be said that 48 % of the evaluated employees receive feedback, both in writing and orally, 15 % only orally, 30 % only in writing and 7 % do not receive feedback in any form (n=27).

We also examined the extent to which the employee has the opportunity to formulate reflections on the evaluations. In 74 % of cases, the employee has the opportunity to formulate reflections, and some are taken into account, 8 % possibly, 7 % often and 11 % not (n=27).

Figure 5: Distribution of PAS developmental scale in the surveyed hospitals



Source: own research

For an analysis of the formal framework of appraisal, there were two alternatives – in writing, on a performance appraisal form; and orally, in the framework of an interview. 52 % combined the use of both forms, 4 % orally, in interviews, and 24 % in writing on a PA sheet. For the remaining 20 % of the cases, the assessment is informal (neither oral nor written) (n=25). When examining the frequency of appraisals, it is found that 64 % of the appraisals take place only annually, 7 % half a year, 4 % monthly. In a quarter of cases, however, it takes place less frequently (n=28).

In interpreting the PAS developmental scale, it was found that most hospitals use moderately developed PAS.

In addition, it can be stated that there is a strong significant relationship between the feedback given to the evaluated employee and the formulation of employee reflections.

Table 7: Correlation coefficients between the developed scales and their level of significance

		Correlations						
		PA participants scale	PA techniques scale	Def. performance scale	Protocol scale	Prepared scale	Reflections scale	Feedback scale
PA participants scale	PearsonCorrelation	1	.259	.439*	.285	.439*	.404*	.308
	Sig. (2-tailed)		.210	.028	.178	.028	.045	.134
	N	25	25	25	24	25	25	25
PA techniques scale	PearsonCorrelation	.259	1	-.039	-.041	.058	.240	.379
	Sig. (2-tailed)	.210		.853	.849	.783	.247	.061
	N	25	25	25	24	25	25	25
Def. performance scale	PearsonCorrelation	.439*	-.039	1	.371	.395	.444*	.328
	Sig. (2-tailed)	.028	.853		.074	.051	.026	.110
	N	25	25	25	24	25	25	25
Protocol scale	PearsonCorrelation	.285	-.041	.371	1	.384	.360	.357
	Sig. (2-tailed)	.178	.849	.074		.053	.071	.074
	N	24	24	24	26	26	26	26
Prepared scale	PearsonCorrelation	.439*	.058	.395	.384	1	.468*	.471*
	Sig. (2-tailed)	.028	.783	.051	.053		.014	.013
	N	25	25	25	26	27	27	27
Reflections scale	PearsonCorrelation	.404*	.240	.444*	.360	.468*	1	.524**
	Sig. (2-tailed)	.045	.247	.026	.071	.014		.005
	N	25	25	25	26	27	27	27
Feedback scale	PearsonCorrelation	.308	.379	.328	.357	.471*	.524**	1
	Sig. (2-tailed)	.134	.061	.110	.074	.013	.005	
	N	25	25	25	26	27	27	27

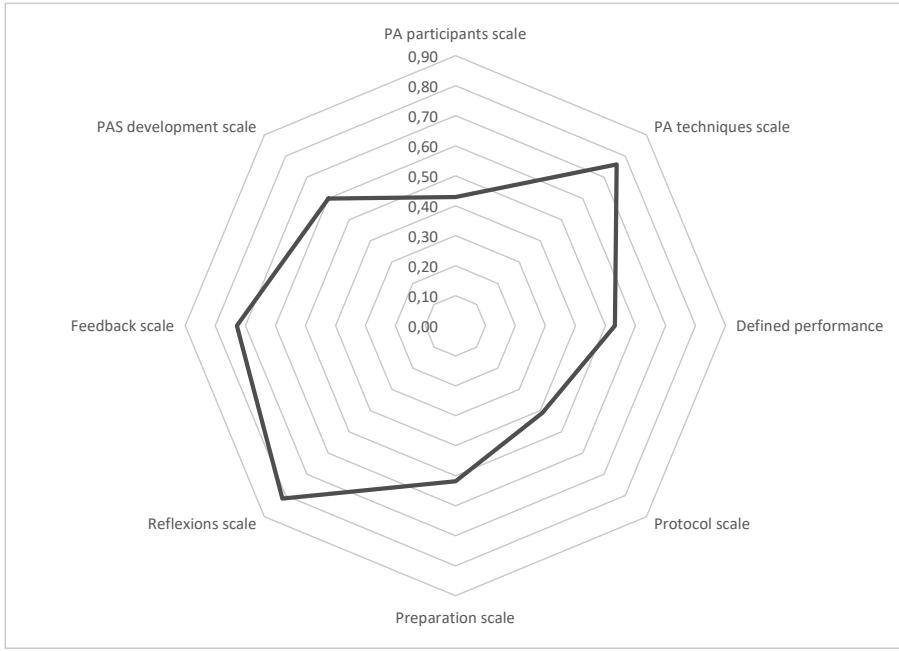
* Correlation is significant at the 0.05 level (2-tailed).

** Correlation is significant at the 0.01 level (2-tailed).

Source: own research

The distributions of hospitals on the scales are shown in Figure 6.

Figure 6: Means of the scales for Hungarian hospitals



Source: own research

6. Discussion

To the best of our knowledge, no such health (hospital) research results have been produced in Hungary so far. It has been also found that, in the examined institutions, it is typical for the performance appraisal practice to be in line with the strategic performance management goal, but the performance appraisal practice in line with the development PM goal is also emphasized. The least used is the compensation PM goal. This is consistent with the fact that in Hungary, at the time of the study, a significant proportion of hospital staff was employed as civil servants. This legal relationship is characterized by the salary scale of civil servants, which determines the remuneration and wages of employees.

In Petró and Stréhli-Kotz's (Petró & Stréhli-Klotz, 2013) research on public services, individual performance appraisals were performed in an average of 82 % of the 3 occupations examined; among public administration, self-government and law enforcement. According to the authors, the reason for this was the mandatory introduction of a common integrated PAS. They also conclude that a 360-degree assessment doesn't work in either area. In our study, individual performance assessment was done in 37 %, and in addition, 60 % of hospitals

have some form of PA (at the individual, group, or organizational level), which is remarkable in light of the fact that there is no mandatory PA in this sector. Related to this is the fact that certification is performed in 21 % of cases. It can be stated that top management has a need and an intention for the employee to receive some feedback on their performance. This is confirmed by the fact that informal feedback is the second most commonly used PA technique. However, a 360-degree feedback is also not typical (3 %).

Evaluating the findings, the following summary conclusions can be drawn:

- Based on the recommendations formulated in the literature, the performance measurement and evaluation practice emerging from the research can be considered to be of adequate quality (according to industry and government standards). Evaluations are carried out on a regular and documented basis, in which the evaluators themselves participate and consider their views to be significant. This is essential for evaluations with the development PM goal, especially if the developments are targeted at employees. However, it is not common practice to have a relatively large number of actors in the evaluation. The actors are characterized by a triad of superior appraisal, employer appraisal and self-appraisal. It would be worthwhile expanding the scope of the appraisal, as the employee's appraisal depends largely on the employee's workplace manager. At the same time, the evaluations and opinions provided by the coworkers and the patients cared for by the evaluated person may carry a lot of useful information, which the workplace manager has is not aware of.
- In appraisals, objectivity is sought, and so the direct results of employees' work are primarily measured when judging work performance.
- Performance appraisal techniques typically do not use the behaviorally anchored rating scales, the behavior monitoring scale, and Management by Objectives (MBO). This is understandable, in light of the fact that the development of these scales is expensive and time-consuming, and that the institutions involved in the study focus on the direct results of employees' work. The method of work standard is more significant in the production sector and not in public services. This is why it is understandable and acceptable to ignore these techniques. It can be stated that quite a few evaluation techniques are used, it is recommended to expand the tools.
- In a significant number of cases, there is no protocol for appraisal, yet they may consider it important to provide feedback to employees, presumably this is why the use of informal feedback is so high; the second most popular procedure. It would be necessary to rethink this practice, as informal feedback cannot be considered as a full-fledged performance appraisal technique. In this context, an examination of the frequency of appraisals found that appraisals take place annually in almost two-thirds of hospitals; in a quarter of cases, however, less frequently. This is probably related to the aforemen-

tioned fact that informal feedback is so widely used among performance appraisal techniques. Annual appraisals are useful management tools, but the effectiveness of less frequent evaluations is questionable. It can also be related to the fact that in 20 % of cases the evaluation is not done orally, in the framework of an interview or in writing. It is likely that the frequency of using informal feedback may also play a role in this.

7. Conclusion

An exciting analysis can be made by examining the factors that significantly affect individual performance, even though the individual has no influence on them: certain organizational-level problems and general organizational problems (such as lack of resources) may impair an individual's performance.

In addition to the above-mentioned workplace manager, we can get a relatively accurate picture of the employee's performance from the evaluations by the coworkers. Colleagues with the same qualifications and in the same position may also have a good view of the performance of the person being evaluated, especially if there is a relatively large number of employees in the given department and / or the manager is away from the workplace. However, staff appraisal requires thorough elaboration and preparation, and it is necessary for the organizational culture to be able to provide the right atmosphere for this type of appraisal. Moreover, despite careful preparation, these evaluations may contain certain biases due to human factors, which should be taken into account with due care throughout the evaluation process.

In judging work performance, the direct results of employees' work are considered important, measured, and the results obtained are used; performance appraisal systems (PAS) are thus mostly results-oriented. Related to this, the question arises, how do hospitals define the performance itself and the result to be achieved? Moreover, there may even be differences between departments in the definition of outcomes, if we compare, for example, an acute surgery department and a rehabilitation department. It may be worthwhile carrying out such a study, as it is more difficult to formulate the expected results in healthcare due to the specialty of the sector. There are several reasons for this. From the perspective of the patient being treated, the "information asymmetry" makes it difficult to judge the effectiveness of treatment (Ivády, 2014), as well as the success of a therapy depending on several factors, such as not only the choice of effective therapy, but also compliance with the patient's therapeutic cooperation. On the other hand, although the patient has insight into the conditions of their care (the infrastructure of the care institution and the behavior of the staff caring for them), they often evaluate the attitudes and behavior of the managers (doctors, specialists) and not their performance. In our study, a 360- degree appraisal was used in a small number of cases, which includes assessment by patients.

Information received from patients may also come through patient satisfaction surveys, which may also be relevant to an employee's assessment.

In a world of limited resources, there is an increasing emphasis on performance management, which is a powerful aid in achieving organizational goals. This seems to justify that non-profit organizations also use certain HRM activities that are more typical of for-profit organizations, such as performance management. While critical remarks about the objectivity of evaluations may be justified, a well-designed and structured PAS, when operated effectively, makes transparent how well the expected and set performance goals have been achieved and whether the work done is compensated accordingly. The development of appraisal systems characterizes the organizational culture of the institution; a key question is what to do with the results obtained at both the individual and organizational levels.

8. Limitations and future research

The most important strength but also the weakness of our research is the sample size. Although we covered more than a quarter of the whole population in our sample, it may still be considered low and does not allow any multivariate complex analysis and modeling. Furthermore, this population is very divergent, resulting in high variances of these scales and consequently making it very hard to run classical statistical inference methods.

As mentioned earlier, this investigation takes a top management perspective; with top-down logic, and because of this, there is a lack of the employees' views. Our research was actually based on the responses of top executives, so further research into lower levels of employees would likely be a rich source of data both researchers and practitioners. Another interesting direction for further research may be how well middle managers can channel top performance expectations to employees.

A well-designed and constructed PAS can also contain errors and distortions. Unconscious biases in performance evaluations affect the objectivity of appraisals; it can be both a positive and a negative bias (Traub, 2013). The analysis of these unconscious mechanisms is also a significant and worthwhile consideration for further research.

9. Acknowledgments

We would like to thank the management of the Hungarian hospitals for their active participation in the research. Special thanks to the helpers who actively contributed to the conceptualization of the questionnaire, as well as to the help and support of Professor Dr. Gyula Bakacs. We thank the reviewers for their valuable comments.

10. References

Aguinis, H. (2005). *Performance Management* (No. PE-A1-engb 1/2011). Edinburgh.

Bakacsi, G. (2015). *Foundations of Organizational Behavior*. Budapest: Semmelweis Publishing.

Bakacsi, G., Bokor, A., Császár, C., Gelei, A., Kováts, K., & Takács, S. (1999). *Strategic Human Resources Management*. Budapest: Economics and Law Publishing House.

Bokor, A., Szöts-Kováts, K., Csillag, S., Bácsi, K., & Szilas, R. (2009). *Human Resource Management*. Budapest: AULA Publishing Ltd.

Boncz, I., Ágoston, I., Gábor, K., Illei, G., Kriszبacher, I., Sándorné Szabó, I., & Sebestyén, A. (2011). *Basics of healthcare financing, management and quality assurance*. Budapest: Medicina Publishing Zrt.

Boswell, W. R., & Boudreau, J. W. (2002). Separating the developmental and evaluative performance appraisal uses. *Journal of Business and Psychology*, 16(3), 391–412.

Cleveland, J. N., Murphy, K. R., & Williams, R. E. (1989). Multipleuses of performance appraisal: Prevalence and correlates. *Journal of Applied Psychology*, 74, 130–135.

Dharmadhikari, P., & Bampooori, M. (2018). Study of employee performance appraisal methods in hospitals. *International Journal of Academic Research and Development*, 3(2), 1149–1153.

Hajnal, G. (2004). *Igazgatási kultúra és New Public Management reformok egy összehasonlító esettanulmány tükrében*. Budapesti Közgazdaság tudományi és Államigazgatási Egyetem.

Hermel-Stănescu, M. (2015). The Role Of Performance Appraisal In The Context Of Performance Management Systems. *SEA – Practical Application of Science*, 3(1(7)).

Horenberg, F., Adrian, D., & Nuti, S. (2020). Measuring research in the big data era: The evolution of performance measurement systems in the Italian teaching hospitals. *Health Policy*, 124(12), 1387–1394. <https://doi.org/10.1016/j.healthpol.2020.10.002>

Islami, X., Mulolli, E., & Mustafa, N. (2018). Using Management by Objectives as a performance appraisal tool for employee satisfaction. *Future Business Journal*, 4(1), 94–108.

Ivády, V. (2014). *Basics of health economics*. Budapest: Semmelweis University, Health Management Training Center.

Karoliny, M., & Poór, J. (2010). *Human Resource Management Handbook*. Budapest: ComLex Publishing Legal and Business Content Service Ltd.

Kondrasuk, J. N. (2011). So What Would An Ideal Performance Appraisal Look Like? *Journal of Applied Business and Economics*, 12(1), 57–71.

Lunenburg, F. C. (2012). Performance Appraisal: Methods and Rating Errors. *International Journal of Scholarly Academic Intellectual Diversity*, 14(1), 1–9.

Marr, B., & Gray, D. (2006). *Strategic performance management*. Taylor Francis.

Ministry of Human Resources, S. S. for H. (2014). „*Healthy Hungary 2014–2020*“ *Health Sector Strategy*.

Nuti, S. (2016). Making governance work in the health care sector: Evidence from a ‘natural experiment’ in Italy. *Policy Law*, 11(2), 17–38.

Nuti, S., Noto, G., Vola, F., & Vainieri, M. (2018). Let’s play the patients music systems in healthcare. *Management Decision*, 56(10), 2252–2272.

Patil, A. M., & Dalvi, C. S. (2019). 720 Degree Performance Appraisal Systems. *International Journal of Trend in Scientific Research and Development, March*(Special Issue Fostering Innovation, Integration and Inclusion Through Interdisciplinary Practices in Management), 4–8.

Petró, C., & Stréhli-Klotz, G. (2013). A teljesítménymenedzsment humánfolyamatának működése a köszolgálat szervezeteiben. In *Közszolgálati Humán Tükör 2013*. Budapest: Magyar Közlöny Lap- és Könyvkiadó.

Sárga, N. Z. (2017). Employee performance appraisal systems with a results approach in the hospitals of the Dél-Alföldi Térség. In *PEME XIV. PhD. – Conference*.

Shrimali, D., & Rathore, S. (2017). A Study of Performance Appraisal Practices of Selected Private Banks of Indore Divison. *Commonwealth Journal Of Commerce & Management Research*, 4(1).

Sing, R. D. R., & Vadivelu, S. (2019). A study on employee performance appraisal system in hospitals-with respect to hospitals in Vellore City. *Indian Journal of Public Health Research and Development*, 10(6), 233–237. <https://doi.org/10.5958/0976-5506.2019.01273.7>

Srivastava, R. (2017). A Managerial Study of Performance Appraisal in BHEL Jhansi Unit. *International Journal of Allied Practice, Research and Review*, 4(9), 19–27.

State Secretariat for Health. (2011). *Semmelweis Plan for the rescue of Health*. Budapest.

Takács, S. (2000). *The effect of organizational culture on the organization's performance appraisal practice. (Empirical study of managerial evaluation behavior)*. Ph.D. dissertation.

Talbot, C. (2007). Performance Management. In E. Ferlie, L. E. J. Lynn, & C. Pollitt (Eds.), *The Oxford Handbook of Public Management* (pp. 1–32). Oxford, UK: Oxford University Press. <https://doi.org/10.1093/oxfordhb/9780199226443.003.0022>

Traub, L. (2013). *Bias In Performance Management. Review Process*. Silver Spring: Cook Ross Publication.

Vanieri, M., Ferré, F., Giacomelli, G., & Nuti, S. (2017). Explaining performance in health-care: How and when top management competencies make the difference. *Health Care Management Review*, 44(4), 306–317. <https://doi.org/10.1097/HMR.0000000000000164>.

West, M. A., Borrill, C., Dawson, J., Scully, J., Carter, M., Anelay, S., ... Waring, J. (2002). The link between the management of employees and patient mortality in acute hospitals. *The International Journal of Human Resource Management*, 13(8), 1299–1310. <https://doi.org/10.1080/09585190210156521>

Wilkinson, A., Muurlink, O., Awan, N., & Townsend, K. (2019). HRM and the health of hospitals. *Health Services Management Research*, 32(2), 89–102. <https://doi.org/10.1177/0951484818805369>