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Coordinator of integrated primary care – competences of a new healthcare worker

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Summary Background. 27 percent of PHC providers in Poland employ the healthcare coordinator.

Objectives. The aim was to determine the expected competencies of the coordinator in light of the needs of employers and the possibilities of an educational system.

Material and methods. In the first stage, 24 study programs were analyzed in terms of qualifications of a new profession. In the second, a survey was conducted to assess the usefulness of knowledge, skills and social competencies among the representatives of 22 PHC providers. In the third, an expert panel developed the key competencies of the coordinator.

Results. The analysis identified a number of new, unique qualifications. In the area of knowledge: understanding of work in PHC including new concepts (patient-centered care, value-based care, deinstitutionalization), population approach, key healthcare measures, interpersonal and health communication, basics of clinical work of all members of an interdisciplinary team, reporting of services. In the area of skills: communication using call-center systems, organization of teamwork, identification of patients for HC interventions in IT systems, effective recruitment, evaluation of PHC activities, health coaching and advocacy, providing health campaigns in social media. With regard to social competencies: the coordinator should build and maintain permanent relationships between the members of an interdisciplinary teams, be open to changes and new solutions, can be a guide for a patient and has a patient-centric attitude. Conclusions. We defined the professional profile of an iPHC coordinator as a guide oriented on patient's needs, who is open to changes and innovations and who is effective in communication and interdisciplinary team-work.

Key words: primary healthcare, integrated care, health workforce, organization and administration, professional competence, delivery of health care.

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Background

In times of shortage of medical staff and growing health needs, medical-related staff can contribute to reducing the excessive burden on the healthcare system. Competent, skilled and experienced employees constitute strategic resources of medical entities [1]. Qualifications and competencies of this group should be perceived as valuable capital of an entity that can be managed in order to build a competitive advantage [2, 3].

Recently, primary health care in Poland has undergone profound changes due to the implementation of coordinated care. Pursuant to the Act of October 27, 2017, on Primary Health Care, coordination of health care consists in integrating the provision of healthcare services at all stages and in all elements of healthcare implementation, using ICT systems, with particular emphasis on the quality and effectiveness of the services provided. Coordination is provided by a primary care physician in cooperation with a primary care nurse and a primary care midwife [4]. In October 2022, the basket of guaranteed services in PHC was expanded to coordinated care services in selected chronic diseases: arterial hypertension, heart failure, chronic

ischemic heart disease, atrial fibrillation, diabetes, bronchial asthma and chronic obstructive pulmonary disease, hypothyroidism and single and multiple nodules thyroid. In order to diagnose and treat the abovementioned diseases, an additional budget was launched for imaging and laboratory diagnostic tests, consultations with specialists (cardiologists, diabetologist, pulmonologists, endocrinologists), educational and dietary services and annual medical check-up aimed at the development of individual medical care plans [5].

The coordinator plays a key role in coordinated health care. Pursuant to the provisions of the Act on Primary Health Care, the obligation to create a PHC team by December 31, 2024, was introduced. Only until then can a patient choose a PHC doctor, nurse or midwife who is not a member of an interdisciplinary team. This provision actually means an obligation to coordinate the team's work, and it should translate into a comprehensive approach to the introduction of the profession of the coordinator in the primary care [4]. Paragraph 14 of the PHC Act regulates the coordinator's tasks, which include organization of the provision of health services, including provision of information about this process and cooperation between persons providing

health services. The scope of the coordinator's tasks is specified more thoroughly in the regulation of the President of the Polish National Health Fund [6].

An important issue related to the implementation of coordinator's tasks is described in the Resource Based View, which considers resources as the basis for the efficiency of systems and organizations [7]. The definition of 'resources' in scientific literature is not clear, and depending on the perspective, an economic approach is adopted (production, labor, land and capital; however, the this list is often extended to organization or entrepreneurship, which take into consideration the value of knowledge) or an approach popular in management science is adopted, which distinguishes four categories of organizational resources: human, information, material and financial resources. In this approach, special attention is paid to key competencies or outstanding abilities. Abilities (skills) are knowledge and what is necessary to take action [8], and competencies [9], which define the ability to perform an action, are the result of appropriate compilation of resources and abilities.

The Polish education and training system deal with these issues in a slightly different way. The Polish Qualifications Framework (PRK), like the European Qualifications Framework, consists of eight levels. Each of them is described using general statements that characterize the requirements of knowledge, skills and social competences that must be met by persons with qualifications at a given level. Differences between the levels are captured using universal characteristics. Knowledge includes understanding of facts, objects, phenomena, concepts and theories which are elements of both general and specialized knowledge related to the field of science or professional activity. Skills involve the ability to solve problems and apply knowledge in practice, e.g. perform tasks of various degrees of complexity, necessity to learn and communicate. Social competencies involve readiness to take on obligations that result from being a member of various communities, cooperation, ability to assess the effects of one's actions and taking responsibility for them [10]. The most common definition of a competence in medical education is the one created by Frank et al. A competence is a recognizable skill of a health professional that integrates many elements such as knowledge, skills, values and attitudes [11].

The competencies of a care coordinator have been the subject of research in countries where integrated care have been implemented, e.g. Finland, Great Britain, Canada and the USA. Nummela et al. [12] determined the competencies and skills of a coordinated care worker in relation to four areas. One - client orientation: assess patient needs; discuss cultural or religious matters relevant to care; plan the goal of the treatment; register the client's opinion; co-operate multiprofessionally in the planning; assessment and implementation of a service; advise of the use of digital services; adopt customer service orientation in all encounters. Two – responsibility for personal or a loved one's welfare: map resources to solve a problem; engage loved ones' in planning; encourage to make life changes promoting health or welfare. Three – access to the services: search for additional or alternative services; search for various forms of peer support; ensure that a client gets the support; intervene when the client faces disadvantages. Four - fluency and clarity of services: justify one's stand to the patient by using evidence or research-based knowledge; document the client process in a client database; ensure the flow of client information within a service; guide the client ahead within a care chain; ensure the progress of the client's treatment in the care chain; advise the client through digital services; estimate the costs of the service. NHS Health Education England [13] has defined a common set of competencies in the so-called care navigation and the role of the care navigator. The universal framework of competencies of the navigator (patient guide) has been developed in order to inform on the content and level of education required, as well as to plan the career paths of non-clinical staff in primary and

secondary health care. The nine domains of the care navigator according to NHS England were: effective communication, enabling access to services, personalization, coordination and integration, building and maintaining relationships between professionals, knowledge for practice, personal development and learning, working with data and information, professionalism.

The desired competencies of a PHC coordinator can be found in job profiles that have no equivalent in Poland. This applies to a public health nurse in Canada, whose competence is, for example: participation in group/community/population health assessment and analysis identifying opportunities and risks by using multiple methods and sources of knowing in partnership with the client [14]. Qualifications in management, typical of a healthcare administrator in the USA, are also desirable [15]. An international literature review identified four key competence areas for primary care professionals: interprofessional communication, interprofessional teamwork, leadership and patient-centered communication [16]. Another international literature review [17] identified new areas of competence that have not been previously addressed, such as demonstrating inclusive leadership and professional responsibility, shared decision-making with the community, recognizing and solving health and social problems in the community, local planning of integrated care strategies, investing and securing local resources for life in the community, finding solutions based on the ideas and opinions of local residents, dialogue with representatives of community members taking into account general interests, cooperation with social organizations and local institutions, effective promotion of local services, helping the local community cope with emergency situations and crisis, educating and monitoring the local community while practicing self-care, creating self-help groups. This study clearly emphasizes the community approach, where the recipients of care are members of a community, community residents or not patients, as it is customarily assumed in Poland. This is due to the fact that in many countries, coordinators are responsible for both health and social care aspects, while in Poland, there is a division between the tasks and competencies of the employees of health and social care sectors [18]. The community-based approach in the coordinator's work, which can be observed in a review of international literature and is typical of de-institutional care, while the predominant model in Poland is the institutional care model. It should be noted that coordinated care that has been implemented in Polish primary healthcare entities is the first stage of integrated care. Changes aimed at the integrated care of a de-institutional nature, which combines medical care and social assistance, will most likely be the next changes that coordinators should be prepared for. A holistic approach in the work of coordinators can be extremely useful in eliminating health inequalities, which constitutes a major challenge for the Polish healthcare system [19].

Currently, there are no statutory regulations in Poland regarding the qualification requirements for the profession of healthcare coordinator. In this respect, there are also no legal regulations of the Minister of Health, who is responsible for the health system, or the Minister of Family and Social Policy, responsible for the labor market, nor the Minister of Education and Science, responsible for the education system in Poland. In practice, anyone can become a PHC coordinator. According to the estimates of the Polish National Health Fund, 27% of 6,200 PHC providers employ a coordinator. While the liberalization of legal requirements for pursuing professions brings a number of benefits [20-22], we must not forget about the risks related to the specific nature of the healthcare industry. Medical professionals, due to their constant contact with patients and their families, are of crucial importance for society and the life and health of patients. Medical professions require knowledge and skills in the field of health care, as well as certain personality traits that facilitate conflict-free performance of work and assurance of patient safety and satisfaction [23]. Currently, the

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knowledge, skills and social competencies of coordinators are not verified either by the education system or by employers on the basis of documented qualifications. The aim of the study was to determine the competencies of the coordinator of integrated primary care as a new medical-related profession in Poland.

Material and methods

In the first stage, a review of educational outcomes that may be applicable to this profession was performed. In the second stage, a survey was conducted to assess the usefulness of areas of knowledge, skills and competencies among employers. In the third stage, an expert panel developed the key competencies of the coordinator based on the outcomes of the first two stages.

The review of educational outcomes was based on the curricula of 16 universities, departments of public health, and 8 universities, departments of healthcare management. The experts chose public health programs based on their knowledge and experience, and due to the results of the study, which showed that future public health graduates had knowledge about coordination in public health, they were the only ones who knew the main assumptions of the profession of the coordinator [24].

The survey on employers' assessment of the usefulness of the coordinator's competencies was carried out using the CAWI (Computer-Assisted Web Interview). A link with an invitation to complete the survey online was sent to the representatives of service providers who had signed a contract for the provision of coordinated care and employed (regardless of the legal form) at least one PHC coordinator. The study was carried out in November 2022. Data was obtained from 22 out of 90 facilities (24%) that were performing the coordinated care contract. Respondents assessed the usefulness of knowledge, skills and competencies by answering closed questions (Likert scale, rating from 1 to 5), and they listed additional competencies that they considered important in open questions. The participants of the survey were representatives of 22 integrated PHC providers. In this group, half were located in cities with over 50,000 inhabitants, 6 were found in towns with less than 50,000 inhabitants, and 5 were located in rural areas. 5 of the surveyed entities had up to 5,000 active patient declarations (including 1,300 and 1,590 declarations in two entities), 12 facilities showed 5,000-10,000 declarations, and the remaining 5 entities had over 10.000 declarations.

The coordinator performed tasks related solely to the coordination of care only in 6 facilities. In other facilities, the coordinator also performed the work of medical registrar (5), nurse (3), midwife (1), medical assistant or secretary (3), other (IT specialist (1), nurse manager (1), doctor without the right to fully exercise their profession (1), dietitian (1)). In the study group, 11 coordinators had higher education of the first cycle (bachelor's degree), and 3 persons were in the process of completing master's studies. 9 coordinators had higher education of the second cycle (master's degree), and 2 coordinators had secondary

school education. Among persons with higher education, education related to health care was predominant. Other persons had education related to management, administration or marketing. No one had education related directly to integrated care.

The key competencies of the primary care coordinator were developed using the expert method. The experts were representatives of three different academic centers in Poland who were responsible for education at the departments of Health Sciences, had teaching experience of over 10 years and were experts of the Sectoral Council for Competencies: Health Care and Social Care, which was operating at the Polish Agency for Enterprise Development. The expert panel worked in two rounds. In the first one, each expert assessed the usefulness of the educational outcomes identified in the review of educational programs. In the second round, each expert assessed the competencies indicated in the employer survey. The following scale of assessment of the competencies was used: useful, partially useful, not useful. Each expert made their assessments independently so as not to influence the others. A competence that was rated as useless by at least two experts was excluded.

Ethical consideration

Research was not based on human subjects, thus an opinion from the ethics committee to perform the study was not required.

Results

The review of curricula of public health faculties at the departments of Health Sciences identified five universities that included coordinated care in the study programs, subjects or specializations. A review of healthcare management curricula showed that two universities included the topics of coordinated care. At one university, a subject related to coordinated care was identified in the faculty of Emergency Medical Services. The review showed that only one university had created a faculty dedicated to medical coordinator. One university launched first-cycle degree studies called Medical Coordinator, while another ran a specialization path in coordinated care. The abovementioned review showed 10 thematically homogeneous areas of knowledge, 8 coherent skills and 7 social competencies which were assessed by employers in terms of their usefulness in the professional work of the primary care coordinator.

The results of the assessment of the usefulness of areas of knowledge in the work of a PHC coordinator are presented in Table 1. In the open question on the areas of knowledge that the coordinators should have, which were not included in the closed questions, the respondents indicated: practical aspects of coordinated care in individual dispensary groups, statistics in health care, population problems, psychology, patient education, disease prevention, contemporary concepts and trends in health care (including patient centered care, value-based care), population approach in primary health care.

Table 1. Employers' assessment of the usefulness of certain areas of knowledge in the work of the PHC coordinator							
	1	2	3	4	5	Average	
Economics and financing in health care	2	6	4	7	3	3.1	
Public administration in health care	2	3	6	6	5	3.4	
Telehealth and e-health	2	2	2	9	7	3.7	
Clinical aspects of care, e.g. rules of diagnosis and therapy of selected diseases	1	0	9	6	6	3.7	
Organization and management	1	4	6	2	9	3.7	
Medical law and healthcare law	2	4	0	8	8	3.8	
Coordinated care in Poland and around the world: theoretical foundations	1	3	3	6	9	3.9	
Personal data protection	1	2	3	5	11	4.0	
Principles of the functioning of healthcare system	1	2	3	5	11	4.0	
Interpersonal communication	2	1	0	5	14	4.3	

The results of the assessment of the usefulness of the skills of PHC coordinators are shown in Table 2. The skills that were not assessed but were important in the respondents' opinion included: cooperation with public administration institutions and NGOs in holistic patient care, work organization, use of IT tools for coordination and monitoring of care, teamwork, evaluation and assessment of preventive programs, assertive and empathetic approach to patients, the art of talking to patients and the ability to speak about prevention, communication using call-center systems, implementation of health campaigns in social media.

The results of the assessment of the usefulness of social competencies of PHC coordinators are shown in Table 3. In the open question about the competencies that were not listed as options to choose from, the respondents mentioned high per-

sonal culture, ability to cope with stress, openness to changes, listening to the team's opinion, empathy, promotion of healthy behaviors, ability to cope with stress, creativity, self-confidence, ability to learn quickly, leadership, ability to deal with difficult patients, ability to influence others, management of the effectiveness of one's work, assertiveness and proper communication with patients and their families and a patient-centered approach.

Based on the results of the experts' work in two rounds, the authors of the work developed a list of educational outcomes in relation to knowledge, skills and social competencies (Table 4). When making final conclusions about the learning outcomes, the competencies of PHC coordinators presented in international literature were considered.

Table 2. Employers' assessment of the usefulness of certain areas of skills in the work of the PHC coordinator								
	1	2	3	4	5	Average		
Establishment and maintenance of relationships with other healthcare beneficiaries	0	2	4	2	14	3.8		
Interdisciplinary teamwork	1	1	3	2	15	4.0		
Evaluation and assessment of health programs	1	2	4	3	12	4.1		
Coordination of preventive program services for patients	0	2	1	0	19	4.2		
Obedience of legal provisions in everyday practice	0	2	2	8	10	4.3		
Effective communication in the workplace	0	0	5	3	14	4.3		
Use of professional literature, databases and other sources of health information	1	2	7	2	10	4.4		
Coordination of health services for patients with chronic diseases	1	0	1	3	17	4.6		

Table 3. Employers' assessment of the usefulness of certain areas of social competences in the work of the PHC coordinator								
	1	2	3	4	5	Average		
Sensitivity to social and health issues in society, empathy	1	1	3	7	10	4.0		
Ethical attitude at work	0	0	2	7	13	4.1		
Ability to form one's own opinions and judgments	1	1	3	8	9	4.2		
Awareness of one's own limitations and willingness to seek the opinions of others	0	1	4	7	10	4.2		
Attitude that promotes health and physical activity	1	2	1	6	12	4.2		
Responsibility for one's own decisions	0	0	0	7	15	4.5		
Ability to make individual decisions	0	0	0	9	13	4.7		

Table 4. Key competencies of a healthcare coordinator: recommendations of an expert panel

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- 1. Definitions and concepts of coordinated
- 2. Differences between the traditional approach to health care and the integrated care approach
- 3. Modern concepts and trends in health care (including patient-centered care, value-based care), deinstitutionalization
- 4. Principles of community care, senior care, determinants of mental health, common long-term physical and mental diseases, principles of self-care in persons with chronic diseases
- 5. Population approach in primary health care, key healthcare indicators
- 6. Principles of organizing health care in Poland at particular levels
- 7. The concept of family medicine in Poland and around the world
- 8. Practical rules of the health insurance system (right to benefits, referral rules, waiting lists)
- 9. Patient rights
- 10. Principles of personal data protection in the workplace

Skil

- 1. Effective communication with members of the interdisciplinary medical team
- Effective communication with the patient, patient representative, patient's family (and local community)
- 3. Ability to communicate using call-center systems
- 4. Ability to cooperate with members of the interdisciplinary team in the workplace and with employees of other entities
- 5. Ability to create a friendly environment for the members of the interdisciplinary medical team
- 6. Ability to involve the patient in the decision-making process and make decisions with the patient
- 7. Ability to organize and run meetings of the interdisciplinary team (e.g. in videoconferencing systems)
- 8. Ability to effectively plan one's own work and the work of team members
- 9. Ability to identify basic health and social problems using one's competencies
- 10. Ability to find solutions on the basis of identified problems and alternative solutions

Social competencies

- 1. Ability to build and keep permanent relationships between the members of the interdisciplinary medical team
- 2. Ability to build and maintain permanent relationships between medical staff and patients (and the local community)
- 3. Understanding of the social value of integrated care
- 4. Willingness to work on new projects and initiatives
- 5. Openness to exchange knowledge and experiences with colleagues and persons from outside the medical entity
- 6. Openness to changes and new solutions
- 7. High personal culture and professionalism in the performance of tasks
- 8. Creation of a good image and reputation among patients and colleagues
- Participation in the development of local integrated care strategy, cooperation with other health and social care beneficiaries
 Interest in the organization, vision and mission, goals and measures of the medical

entity

Social competencies

Table 4. Key competencies of a healthcare coordinator: recommendations of an expert panel

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- 11. Basics of organization and management of medical entities
- 12. Principles of reporting and settling health services
- 13. Scope of tasks and competencies of the interdisciplinary PHC team
- 14. Principles of quality assurance in health care (PHC accreditation system, ISO systems)
- 15. Principles of implementing patient satisfaction surveys
- 16. Principles of implementing disease prevention and health promotion programs
- 17. Principles of evaluation and assessment of health programs
- 18. Basic principles of clinical conduct of a therapeutic team

- 11. Ability to select potential recipients of coordinated care services on the basis
- of coordinated care services on the basis of inclusion and exclusion criteria using IT systems
- 12. Ability to effectively recruit patients for preventive tests and monitor the effects of health campaigns
- 13. Proficient use of IT systems to perform one's duties (e.g. SIMP, SZOI, office applications)
- 14. Knowledge of the full range of benefits and services in the workplace, ability to inform and advise the patient on the optimal treatment scheme/path
- 15. Ability to register patients and motivate them to use individual services under the individual plan of medical services (IPOM), monitor the implementation of recommendations and measure clinical and economic effects of IPOM
- 16. Ability to report medical services under the coordinated care and control the correctness of settlements
- 17. Participation in the development and improvement of new services and procedures, ability to measure and assess the effect of the introduced changes (from the perspective of the service recipient and provider)

 18. Ability to help and advise patients in
- emergency and crisis situations
 19. Ability to search for information about health, as well as health and social services, and to evaluate it critically
- 20. Ability to advise the client on the use of digital services at the national level (e.g. online patient account, IKP) and at the level of the medical entity (e.g. e-registration, test results)
- 21. Ability to involve a patient's loved ones in the process of planning and monitoring of care
- 22. Ability to encourage the patient to make changes in life that contribute to health or mental and social well-being
- 23. Ability to determine the current legal basis for actions taken in the medical facility and to use legal comments and judicial decisions on particular legal regulations
- 24. Ability to use modern forms of communication with patients (online profile and health campaigns on social media, e.g. Facebook)
- 25. Ability to prepare the patient for individual diagnostic tests and consultations 26. Ability to list the needs and benefits of scheduled medical services and to convince the patient to have them done
- 27. Knowledge of the rules of keeping and circulating medical records, ability to ensure complete medical documentation
- 28. Ability to independently use professional literature, databases and other sources of health-related information
- 29. Ability to justify one's attitude towards others using evidence-based knowledge 30. Ability to document healthcare processes in a standard electronic form and in the system agreed upon with the healthcare provider

- 11. Interest in political, organizational, legal
- and financial changes in health care
 12. Sensitivity to patients' needs, under-
- standing of the specific cultural and social needs of patients

 13. Consideration for the special needs of
- 13. Consideration for the special needs of selected population groups when planning health care, e.g. of the elderly and the disabled
- 14. Ability to adapt forms of communication and intervention to the individual needs and expectations of the individual
- 15. Awareness of the need for lifelong learning and learning through experience
- 16. Ability to present substantive arguments in a discussion, in particular with reference to legal bases and scientific evidence
- 17. Knowledge of the level of one's own competencies and limitations, ability to set boundaries to tasks and responsibilities in the process of patient care
- 18. Ability to guide the patient through the health care system and provide support and advice in non-clinical areas
- 19. Empathy in contacting the patient, friendliness, concern and trustworthiness 20. Independence and responsibility in making decisions
- 21. Readiness to be a leader of a team/ small employee group (e.g. registration or coordination section)
- 22. Identification with the medical entity
- 23. Patient-centered attitude

Discussion

The analysis clearly showed that the coordinator cannot be perceived as a medical registrar. The registration process, in which an employee passively registers patients for medical visits on particular dates, can nowadays be performed via e-registration, chat- and voice-eboot systems, and this excludes the process of health care coordination. The fact that the coordinator is on the first line in contacting the patient should be used by the coordinator to properly identify and assesses the patient's health needs, and then manage the needs appropriately following the principle of appropriateness and substitution [25]. This is the only way to use the competencies of all members of the PHC team that are related to the delegation of competencies and limit excessive consumption of services at higher competence levels while improving access to urgent and clinically justified services. The work of the coordinator does not involve passive waiting for the patient but active reaching out to the patient in order to implement medical care plans and recruit the patient for preventive services (in accordance with the concept of managed care and the population approach).

Since the system regulator and the payer have not specified the required qualifications of the PHC coordinator, there is a risk that some healthcare providers have only formally changed the job position of their current employees to coordinators only to obtain additional financing. Currently, each PHC provider who has a contract for coordinated health care receives a flat-rate monthly allowance for the job position of a coordinator, regardless of how many patients are actually covered by the integrated care and how many services they provide. The results of the study show that the coordinators in only 6 of the 22 facilities performed tasks related only to coordination. In other facilities, the coordinator also carried out other tasks in the facility.

Although the issue of employee competencies has been extensively discussed in literature on management in human resources [26], national literature lacks references to the desired competencies of the primary care coordinator. Owczarczyk has indicated that the coordinator should be an intermediary and a binder between the patient and medical staff, as well as facilities that create a patient service network. The tasks of the coordinator indicated by the author can be related to the desired skills, including: organization of the diagnostic and therapeutic process (in consultation with the patient and medical staff); organization of home care, including transfer of the patient from the hospital; supporting the patient in a disease management program; setting dates for tests, visits and consultations ordered by a primary care physician, along with educational and dietary advice; providing information about subsequent stages of therapy; ensuring the flow of information between all health service providers [27]. The limited scope of the coordinator's tasks was also specified in the regulation of the President of the Polish National Health Fund, which defined the principles of implementing the POZ PLUS program [28], such as: ensuring the flow of information between participants in the process of providing services, both at the level of the service provider and between the service provider and external entities involved in the treatment and prevention process, supporting the organization of the treatment and prevention process, including an electronic appointment schedule and preparing reports on the implementation of care.

It is worth noticing that the above-mentioned examples of competencies in international literature, despite being valuable, cannot be thoughtlessly transferred to the Polish healthcare system. When determining the scope of competencies of the PHC coordinator, specific conditions of the healthcare system and national employment regulations should be considered.

Limitations of the study

The main limitation of the study is the small number of respondents who assessed the coordinators' competencies with regard to the employers' needs. This is due to the fact that the survey was conducted in November 2022, when only 90 health-care providers had a contract for coordinated care. However, the respondents were leaders of coordinated care in Poland, and they had experience in the implementation of coordinated care and cooperation with coordinators, including experience in implementing integrated care in the World Bank pilot project, POZ PLUS. The strength of the study is undoubtedly the fact that employers' perspectives and the current education system were considered, along with the work of a panel of experts. This is the only study in Poland to date and one of a few studies in Europe that addresses the competencies of an integrated PHC coordinator.

Social and legal requirements that indicate the need to improve the activities of organizations providing health services result in the need for inter-ministerial activities of the health, social welfare and higher education sectors. One of the fundamental changes is the introduction and operation of coordinated care, under the consideration of the requirements and principles of human resources management, whose task is to improve the efficiency in achieving organizational goals. It is conditioned by an appropriately developed competence system. The selection of persons with competencies that are adequate to the tasks that they will have to perform, considering education, qualifications and interpersonal skills, determines the quality of operation of the entire healthcare system.

Conclusions

Considering the employers' opinions, the content of educational programs at medical universities and a review of international literature, the authors synthetically defined the coordinator of integrated primary health care as a person open to changes and innovations, effective in communication, able to work effectively in an interdisciplinary team, who is a guide and who is focused on the patient's needs. In the process of education of coordinators, a greater emphasis than before should be placed on the skills and social competencies expected by employers. Knowledge should be the foundation for understanding the professional tasks to be performed, and it should be constantly updated so that decisions are made based on facts and scientific evidence. This approach is necessary due to the extremely dynamic progress in medical and health sciences, as well as dynamic legislative changes.

The quantitative involvement of coordinators in primary health care, which is currently not supported by appropriate competencies, may significantly undermine the long-awaited success of integrated care.

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