Competency Management as the Direction of the Development of Enterprises—based on Research

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Abstract. This paper presents the stages of research concerning the demand for employee competencies among entrepreneurs in the region of Wielkopolska, Poland. Identification of current and forecasting future demand for competencies within an enterprise is a measure of responsible and strategic management of an enterprise. Development based on competencies guarantees an advantage in the market competition. The paper also shows that such activities should be of systemic character, based on the policy of institutions responsible for the labour market, as well as for education – especially in the area of technical education on middle level.

Introduction

Managing employee competencies is indispensible for efficient business operations. The size, branch or the level of automation of the enterprise do not decrease the influence of the human factor in achieving economic goals of a business. Dynamically changing needs of the market require both management and employees themselves to develop continuously employee competencies.

This paper describes assumptions and stages of the research regarding management of employee competencies in enterprises. If the strategy of an enterprise includes proper management of human resources, then employee competencies are a resource based on which steady competitive advantage can be built. It refers especially to innovative, smart enterprises, which care about sustained development. [2, 8, 10].

The main goal of this paper is to present the structure of systemic activities in the area of forecasting the demand for employee competencies in planning the development of the enterprise. Efficient management of competencies is based on the diagnosis of own potential of employee competencies and the demand for them in view of the whole enterprise, with the strategy of development in mind [15, 18]. Information about own needs must be compared with information about the access to current and reliable knowledge concerning availability of competencies on the (local) labour market – most often the local labour market [1, 4].

Aware employers appreciate the value of employee assessment of their competencies and they connect them with the realisation of current tasks and the strategy of future development of the organisation. Employee competencies are the potential of collected knowledge, skills, personal qualities and attitudes that decide about their efficiency in the organisation [14, 17,
In order to use these competencies in the organisation, they need to be examined. The level of employee competencies is examined in an enterprise, using various methods [19].

Research aimed at improving the efficiency of a large group of enterprises in the region must be realised in stages and in a systemic way [5, 6]. This type of research is presented in this article.

**Introductory Analysis based on system.zawodowcy.org (System for Professionals)**

The assumption for starting activities aiming at support of competencies management in an enterprise was the results of projects realised by the authors. A research among employers of the Wielkopolska region started in 2008. It investigated the demand for chosen employee competencies and the potential of the region’s secondary schools in developing these competencies. The research also investigated the need for obtaining information about competencies [22]. The goal of the research was to create a systemic solution supporting communication about the demand and supply of competencies. An IT tool – system.zawodowcy.org – was introduced on the labour market in 2010. It is a tool of both communication and research, and is continuously improved depending on user expectations [7, 21].

In order to manage efficiently employee competencies in an enterprise, it is necessary to analyse the market environment in view of demand and supply of given competencies. Based on data obtained from over 1200 employers and more than 20,000 registered potential employees, competencies searched for (fig.1) and available (fig.2) are analysed.

![Diagram](image)

Source: own elaboration based on system.zawodowcy.org.

Figure 1. Skills – components of professional competencies for a given workstation and the level of acquisition expected by employers.

The analysis of job offers where employers define expected competencies and skills is automatically adapted to job applications by potential employees. The analysis of excess and
deficit of competencies in a given region is the basis for future research. Based on the demand reported by employers, information is aggregated and passed on to institutions responsible for supporting the labour market (local governments) and for formal education (schools, universities) as well as informal education (courses, trainings). This information is prepared in the form of periodic reports and is confronted with regional and European research on the labour market development [11, 15, 20].

![Image](image.png)

Source: own elaboration based on system.zawodowcy.org.

Figure 2. Interpersonal skills declared by potential employees, and employers’ expectations regarding the level of acquisition.

**Designing the Matrix of Professional Competencies**

Matrices of Professional Competencies, concerning individual professions and workstations, are designed based on data obtained from: system.zawodowcy.org, research on employers’ needs [6, 4], guidelines for vocational education [13], and trade literature [3, 9, 12, 16]. The Matrix of Professional Competencies is the synthesis of effects of vocational education for a given profession and the group of competencies, and the outcome of the needs of numerous employers in a given branch and/or region.

The dynamics of economy imposes changes in the needs for competencies among employers, and thus the measure and assessment of the competencies. It is therefore justified to prepare requirements regarding expectations from the future employee. These requirements result directly from employee’s responsibilities and are linked to the workstation for which a set of competencies and the level of acquisition should be defined. Identified needs are then included in the description of the competencies profile of an employee (a workstation or a group of workstations), which can be referred to the required quality of the competencies profile. Based on the Matrix of Professional Competencies, the detailed level of competencies can be attributed to persons and workstations. This method of evaluating competencies...
requires processing information, e.g. in dedicated IT systems (such as system.zawodowcy.org), but also carrying out research directly with employers.

**Verification Analysis with an Employer**

The main goal of the research carried out with an employer is to recognise expectations as to competencies for given workstations. Required skills in indicated workstations and their priorities are diagnosed. It is possible to evaluate one workstation, considering employee seniority, and thus other requirements regarding the level of competencies—in this case mechanical factory near Poznan, employing about 200 workers (fig.3). Assessment of competencies of the employee, compared to those required by the employer (model), and the assessment of an individual employee is carried out.

![Figure 3. Technical competencies required and assessment by supervisor for the workstation of IT technician – three stages of employment.](image)

Source: own elaboration.

Once the levels of competencies for each workstation have been measured, a report is prepared with the qualitative and quantitative analysis of competencies levels for given workstations (e.g. fig. 4 electro-mechanical technician), disparity range of competencies (gaps) of the evaluated employee is analysed, and the employee’s self-assessment of knowledge and skills is analysed. As a result, direct supervisors and evaluated employees receive detailed feedback on competencies for a given workstation. If needed, this examination can be applied to the whole enterprise.

Research carried out is the basis for verification of the Matrix of Professional Competencies and can be used both in the whole region of Wielkopolska and for the enterprises where it was carried out. It is an improvement program increasing the competencies of employees. Such research is the basis for an objective assessment of
competencies and it facilitates forecasting the demand for competencies in the management of the whole enterprise.

Source: own elaboration.

Figure 4. Requirements for social competencies, supervisor’s assessment and employee’s self-assessment for the workstation of electro-mechanical technician.

Summary
The research approach presented in this article is the effect of multi-year research focused on identifying the needs of entrepreneurs from Wielkopolska, Poland. Since the research is significant from the perspective of long-term enterprise management, and has economic and preventive importance, activities described in the article are of systemic and innovative character, covering the area of the whole region of Wielkopolska, Poland. In order to popularise the solutions, the research links numerous projects and involves many institutions connected with the labour market and improvement of vocational education on both the middle and higher level.

The IT tool – system.zawodowcy.org – is used both as information integrator and as the basis for introductory research aimed at identification of the area of future research. The Matrix of Professional Competencies is a more detailed form of the research. On the one hand it can be practical help for one enterprise, but on the other – after collating a few reports, it can set the trends of workstation competencies for a given branch or region.

The research approach described in this article aims at solving in a systemic and innovative way communication difficulties between employers, job applicants and local government institutions responsible for the labour market and vocational education. The particular goal of the research and solutions resulting from it is to support employers in managing employee competencies.
References


