

A MODEL OF PROBLEM-BASED LEARNING IN A TUTORIAL DESIGNED FOR DEVELOPING THE OCCUPATIONAL THERAPISTS' COMPETENCES

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Abstract

The aim of this research is to present a model of problem-based learning (PBL), as a case-based learning, in a tutorial addressed to first year Occupational Therapy (OT) students, level 5 (Bachelor degree). We choose two competences that can be developed by the proposed tutorial, extracted from the TUNING document: a generic competence (Ability to work in an interdisciplinary team) and a specific one (Professional reasoning) and we described the learning outcomes that come from these competences, as knowledge, skills and attitudes. In order to achieve the mentioned competences, we outline some integrated subjects (topics) that need to be learned by the students and we designed the lessons framework. At the end of the tutorial we hope that our students in occupational therapy will be able to understand and to apply an instrument of evaluation of the quality of life (WHOQOL-26), inside a multidisciplinary team-work, remaining with the basic concepts of clinical reasoning in a complex clinical case of an old man with important neuro-vascular comorbidity. This model of PBL in a tutorial designed for developing the occupational therapists' competences represents an example of good practice in higher education, with large applicability in health sciences.

Keywords: problem-based learning, occupational therapy, professional reasoning, teamwork

1. INTRODUCTION

The aim of this research is to present a model of problem-based learning (PBL), as a case-based learning, in a tutorial addressed to first year Occupational Therapy (OT) students, level 5 (Bachelor degree). This tutorial belongs to a practical discipline from OT university curricula entitled *Applied occupational therapy*.

PBL is a modern method of education, largely spread in medical universities, in which 6 to 7 students work with a tutor, using scenarios of clinical cases. With this method, the students learn individually and inside the group through group activities and discussions, discovering topics related to a concrete problem and solutions for solving that problem, acquiring knowledge about the disease such as pathology, clinical information, assessment and diagnosis, rehabilitation and treatment procedures (Suzuki & Maruyama, 2010).

2. MATERIAL AND METHOD

We choose two competences that can be developed by the proposed tutorial, extracted from the TUNING document: a generic competence (Ability to work in an interdisciplinary team) and a specific one (Professional reasoning). These competences can be found both in the European Network of Occupational Therapy in Higher Education (ENOTHE) - www.enothe.eu and in the National Register of Qualification in Higher Education (RNCIS) - www.mcis.ro.

The learning outcomes that come from these competences, as knowledge, skills and attitudes are respectively the followings:

1. Ability to work in an interdisciplinary team (generic competence)

Learning outcomes:

a) Knowledge:

- of the basic theoretical concepts of communication theory in general and communication techniques in particular (concepts and terms specific to the discipline);
- the understanding and the correct use of communication techniques in order to achieve efficient communication in different situations specific to the role of occupational therapist

and according to behaviours and their effects in different situations of communication in occupational therapy;

- the interpretation of the role of communication in professional activity and the explication of different types and methods of communication in occupational therapy;
- the identification and the description of psychological theories and mechanisms aimed at communication in occupational therapy.

b) Skills:

- the appropriate use of various techniques of communication according to the established objectives;
- the evaluation and the interpretation of results obtained from a process of communication in occupational therapy;
- the acquisition of verbal and non-verbal behaviour code, of communication process principles and the basic principles of verbal and nonverbal communication efficiency in occupational therapy;
- the application of effective communication principles in order to establish an appropriate contact to the particularities of the beneficiary in occupational therapy.

c) Attitudes:

- the understanding of the occupational therapist role as a communicator, the importance of active listening and appropriate message transmission in relation to all employees in this process;
- the development and the promotion of values related to acceptance, tolerance, support, understanding etc. in communication in occupational therapy process.

2. *Professional reasoning (specific competence)*

Learning outcomes:

a) Knowledge:

- of the basic concepts of the occupational therapy field;
- the profession of occupational therapy in Romania and in Europe;
- achieving knowledge regarding the ethics and standards of practice in occupational therapy;
- of the occupational therapy practice models and their applications;
- the decision procedures and the clinical reasoning in the context of occupational therapy.

b) Skills:

- to apply in practice the occupational therapy models, in the context of various disorders (physical, psychosocial etc.);
- use of occupational therapy models and methods in order to achieve the specific client assessment (occupational profiling, analysis of occupational performance);
- use specific occupational therapy models and methods to create and implement action plan;
- use models and methods of the occupational therapy intervention to measure results;
- acquire good decision-making skills in occupational therapy practice.

c) Attitudes:

- showing an acceptance attitude towards other people;
- health promotion and participation in life by engaging in activity;
- availability of training for teamwork;
- promote specific values of humanity and mutual assistance;
- client-centered intervention process.

In order to achieve the mentioned competences, we outline some integrated subjects (topics) that need to be learned by the students such as: concepts of communication theory, communication techniques, particularities of communication in occupational therapy, basic concepts of the occupational therapy, ethics and standards of practice in occupational therapy, occupational therapy

models and methods, clinical reasoning in most important disorders, referring to different target groups (children, elderly, disabled people etc.), quality of life concept and assessment.

The learning sessions must cover a period of at least 6 weeks, with lectures, seminars and tutorials, covering 6 hours daily, 5 days per week. According to modern tendencies in PBL, the tutorial must be organized in groups of 6-7 students each, lasting minimum 8 hours per week.

The process of PBL must start with a motivating trigger for the problem, in order to stimulate the OT student's interest in resolving the problem scenarios presented (McCarron & D' Amico, 2002).

In our situation the starting point is represented by the clinical case of Mr. Vlad, a 65 years old male retired from activity, engaged in physiotherapy at his residence. Mr. Vlad was recommended at our request by his physiotherapist, with whom we have a very good collaboration relationship. From the physiotherapist we found out that he suffered a surgical intervention for internal hydrocephalus in August 2010 and another one in October 2010 in order to renew the dysfunctional drainage valve with uni-shunt drain. His note showed: history of subarachnoid haemorrhage with unknown aetiology, right suprarenal adenoma, hypertension and dyslipidemia. It was recommended for him to avoid physical exertion, alcohol and coffee consumption, to have neuro-motor recovery addressed for: sphincters control disorders, poor balance, gait and also a compensatory approach for his memory disorders. He should avoid sun exposure and engaging in any activity that puts in danger to hurt himself.

For this client we propose to assess his quality of life, form the perspective of a multidisciplinary team approach, considering the clinical reasoning as a guide to improve the students' learning process.

We choose as instrument of assessment the WHOQOL-26 (World Health Organization Quality of Life questionnaire, short version with 26 items). This instrument was developed starting from the self-perception of the client, having large applicability in health services and research field. Practically, the domains that are covered by this instrument are: physical health, psychological, level of independence, social relations, environment and spirituality/religion/personal beliefs.

Because the WHOQOL-26 is a person-centred questionnaire for subjective assessment, with a multi-dimensional profile, enabling a wide range of diseases and conditions to be compared (Skevington et al., 2004), it can be applied by different professionals in a multidisciplinary team, valorising the clinical reasoning and the communication between team members.

At the end of the tutorial we hope that our students will be able to understand and to apply the WHOQOL-26, inside a multidisciplinary team-work, remaining with the basic concepts of clinical reasoning in a complex clinical case of an old man with important neuro-vascular comorbidity.

3. RESULTS AND DISCUSSIONS

The use of PBL tutorials represents a good educational alternative, but it is very seldom utilised in the Romanian academic domain. The lack of experience in PBL represents a barrier for implementing such educational programs in Romanian context, but the future can bring more attractive ways of diversifying the university curricula, in occupational therapy and related fields.

The two proposed generic and specific OT competences are representative regarding the efficiency of PBL strategy in OT higher education, according to most authors.

The dynamic interaction between the client and the occupational therapist, the flexibility of practice process given by the PBL framework, the communication inside a team-work of professionals, highly motivated, the clinical reasoning and judgement in occupational therapy and the permanent client-centred approach are the main aspects covered by this tutorial.

After completing the PBL tutorial, students must gain a way of learning and interacting, producing discursive practices of accumulating of knowledge and modes of interacting within the domain of OT.

4. CONCLUSIONS

Occupational therapy educational programs in higher education aim to develop OT competences required by the labour market, forming practitioners with adequate knowledge, skills and attitudes (Scaffa & Wooster, 2004). Problem-based learning (PBL) in occupational therapy higher education has become increasingly important, especially in last decades (McCannon et al., 2004).

The proposed model of PBL in a tutorial designed for developing the occupational therapists' competences represent an example of good practice in higher education, with large applicability in health sciences, that can significantly facilitate the development of students' clinical reasoning skills, enhancing their capacity of team-work in a multidisciplinary client-centered approach.

5. REFERENCES

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