THE TRAINING OF TEACHERS IN A SOCIETY OF INFORMATION AND COMMUNICATION

Mihaela VOINEA [1]

Abstract: This article is focused on the impact of the information and communication society on the teacher and teaching. The contemporary society requires a new type of culture and civilization. The teacher training must redefine itself according to the new standards of society and students' needs. The teacher should be able to create a learning context in which students can develop active and constructive processes of acquiring knowledge and skills that stimulate students to set their goals and take responsibility for their own learning activities and processes. The constructivist paradigm can help the teacher to assume the new role.

Key words: teachers training, communication society, competences, innovative teacher, constructivist paradigm.

1. Introduction

The problem of teacher education and training is a contemporary problem, because the social impact of school and teachers is major. We cannot speak about school without taking into consideration the relationship between society and school.

The contemporary society, which is dominated by change and diversity, by globalization and postmodernist values, affects the school world. The communication society requires a new type of culture and civilization to impose new capacities in order to cope with the change and the information.

Teachers are the main factors who can make the change because they are "forces of changes" [5].

Therefore we need teachers who are innovative, who have social competences, who are able to promote the desirable changes.

The teacher training must redefine itself according with the new teachers' role. The constructivist paradigm is a real solution for teacher training and teacher career development.

2. The Training of Teachers in the Communication Society

The roles of teachers today are more and more complex.

Some roles are being extended (for example the classic role of teaching is today very rich: to teach means more than transmitting information. To teach means to create an adequate learning context, to use ICT, to monitor students' learning, to help students become active participants in learning etc.).

These challenges in teachers' roles and competences determinate challenges in teachers' training. "Undoubtedly, the teaching profession is currently facing new kinds of pressure and undergoing profound

[1] Faculty of Psychology and Educational Sciences, *Transilvania* University of Braşov.

changes regarding roles, competences, values, the basic knowledge of teacher training, training strategies, the assessment system and professional certification" [11, p. 217].

Today teachers must use collaborative learning strategies, cooperative learning and project-based learning to develop social competences in students. Another requirement for teachers is to integrate and use ICT in schools.

"Teachers will also have to learn how to organize group activities and conduct individual and collective projects, not only with pupils, but also in the context of team work with other teachers, whether single-subject or inter-disciplinary projects." [3, p. 24]

The teaching profession is facing new kinds of responsibilities, roles and competences. "The teaching profession is currently in a phase of transition, which will end in the emergence of a new type of professionalism" [11, p. 218].

Therefore, the teacher training and teacher education should be matched with the new social demands and students' needs. The competent teacher is an innovative teacher who is able to make multiple decisions in particular contexts.

A lot of studies approach this topic: who is the innovative teacher? What are the pedagogical qualities of the innovative teacher?

The studies [2], [5], [9] show that the teachers who are reflexive, who promote the educational change and who have a clear self image (a professional self image) are innovative teachers. This type of teacher is very important for school, because he or she can induce an "innovation wind" in school culture.

For example, a research on the way of propagating change into population has demonstrated that: 4% are innovators, 18% follow innovators, 32% are the early

majority, 32% are the late majority, 6 % are conservatory. [9]

It is the same relatively automatic process after the innovators succeed to convince "follows innovators" and they are opinions leaders.

The same conclusion has been emphasized in a national study on the curriculum impact in May-June 2001 in our country. This study has demonstrated that teachers can be classified in: the reformers, the opportunists, the conservatives.[12]

The reformers are consistent in applying the new curricula. They represent ¼ of the teachers but they are not encouraged in the institutions.

The opportunists represent ¼ of the teachers. They do not oppose and do not promote news. The conservatives represent 1/3 of the teachers; the youngest and the oldest are yet in the "routine didactic zone".

The general conclusion is that "the teachers' culture is dominated by conservatism and conformity". Because the reformers are few, teachers shall be encouraged and other teachers must be trained to be innovative.

Stenhouse, in a study about teachers as keys to the changes of the curricula, emphasizes three major characteristics that teachers who are involved in the curricula change:
1. permanent self-evaluation as the base for self development
2. skills and desire to study his/ her own didactical behavior
3. concern to introduce in practice new ideas and to evaluate them

Another study shows the correlation between the capacity of reflection and the innovation. [apud. 9]

Fullan identifies four characteristics for a teacher who is "the change agent": " I see four core capacities required as a generating foundation for building greater

change capacity: personal vision / building, inquiry, mastery and collaboration" [5, p. 12].

All these opinions underline that the innovator teacher is a teacher who is a change agent, a teacher who learns continuously, who is reflective and has a high level of mastery and collaboration with his colleagues.

We consider that the innovative pedagogical behavior can be analyzed at two levels:

The first level of the innovative didactic behavior is: to use the new assessment methods, the cooperative learning, to develop critical thinking in their students, to develop emotional intelligence in their students, to reflect on the personal didactic level of competences etc.

At the second level, the innovative didactic behavior is: to propose new curricula, new assessment and teaching methods, to develop and test new interactive methods, to develop and account new strategies of self assessment etc. [13].

In other words, the innovative teacher can be "a user of didactic innovation", this is the first level of innovation or he can be "a producer of didactic innovation" – the second level.

A lot of competent teachers are situated at the first level. The goal of teacher training is to develop the second level of didactic innovation.

The strategy to develop competent and innovative teachers is represented by the constructivist strategies.

The constructivist paradigm represented by J. Piaget, L. S. Vigotski etc. states that cognition must be built by experience.

If the constructivist paradigm is present in students' learning, then the constructivist paradigm must be present in teacher training and teacher education too.

Because the constructivist learning involves sharing experience and the capacity to reflect on personal learning strategies, to reflect on personal qualities and weaknesses, it is a strong argument for teacher training.

"Teacher-educators should treat teachers as they expect teachers to treat students" [apud 11, p. 237].

Another aspect of the innovative teacher is the school culture. This can promote or stop the innovation in school.

It is necessary to create what Rosenholtz calls: "a dynamic school", which consists of: a high level of agreement, high level of abnegation, collaboration, cohesion, rich learning, certainty of pedagogy. [apud 7, p. 106]. The teachers need a culture of change.

The constructivist paradigm in teacher education and teacher career development is a real solution to produce an innovative teacher who creates a culture of changes.

3. Research Design

We were interested in identifying the characteristics of innovative teachers, the impact of school culture for innovative teachers and the training for innovative teachers.

The research has been developed over three years and 200 teachers, 200 students and two schools have been involved.

In this paper we present only the experiment with the teachers involved in constructivist teacher training. We organized a natural experiment with 100 in- service teachers who were involved in a teacher training.

Our general hypothesis was this: if the teachers follow a constructivist training to examine personal pedagogical behaviour, then they became teachers with a clear professional self image and consequently, innovative teachers.

The dependent variable was the professional self-image and the independent variable was the constructivist teacher training program. The variables were measured at the beginning and at the

end of the teacher training program. The methods which were used were: the test "Who I am", the participative observation, the interview.

We applied a teacher training program basis of constructivist paradigm. We used a test called "I, the teacher", who was adapted from the test "Who I am". The test is adequate for our goal because it invited the teachers to know themselves, to reflect on themselves and helped us know the level of self image of the teachers.

The teachers must be able to critically analyze personal didactic behaviour (personal pedagogical values, motivation, didactic style etc) in a composition with the title "I, the teacher …". The test was applied at the beginning and after the training program.

The training program targeted goals such as:
- to develop the capacity of reflection

- to develop critical thinking on personal didactic behaviour
- to develop motivation to progress in teaching career
- to develop innovative didactic behaviour
- to develop the consciousness of teaching identity

The training program used critical thinking methods and the teachers were asked to reflect on their teaching style, assessment style, communication style, their didactical qualities and weakness.

We analyzed the compositions from a qualitative and quantitative point of view.

4. Results and Discussions

The quantitative results show that at the beginning of the training program the capacity of reflection was weak. The frequencies of topic are presented in table 1.

The frequency of topics at the beginning of the training program   Table 1

Topics in teachers' composition	Frequency
1. Personal qualities	**68%**
2. Teaching behaviour	**67%**
3. Teaching motivation	**65%**
4. Relationship with students	**63%**
5. Professional identity	**60%**
6. Career progress	**55%**

After the training program, the composition was more profound and the approach more professional. The results are presented in table 2.

The frequency of topics after the training program   Table 2

Topics in teachers' composition	Frequency
1. Lifelong learning	**55%**
2. The extended didactic experience	**50%**
3. Share the didactic experience	**48%**
4. Personal qualities	**45%**
5. Teaching behaviour	**44%**
6. Relationship with students	**40%**

The qualitative analysis shows that the composition style has changed at the end of the training program.

If at the beginning, the composition style was formal and superficial, in the end, after reflection and critical analysis of personal didactic behaviour, the composition style was deeper and more professional.

We reproduce a fragment of a teacher's composition: "I can say that I have learned something new. We must continue to change ourselves. We must have the courage to give opinions as we give them in this course." (U.M. S.)

Another fragment of the teacher's composition is important: "I am 50 years old and I understand that I must change my attitude. I should be more tolerant and creative. I should be a partner for my students" (I.F.)

This result was confirmed by the observation which we used. We wrote down the number of active participants of debates and the contents of the debates.

The content of debates was centred on teachers' needs: to share didactic experiences, to collaborate with colleagues, to develop the didactic competences, to develop a teaching career.

The results show that the teacher training must begin by clarifying the professional identity, which is the core of didactic professionalism. Regarding the priorities in the continuous training of the teaching staff, modernisation of the training ways and methods plays a very important role. Thus the constructivist paradigm is a real solution for teacher training and trainers' training.

When teachers are aware of their role and responsibilities, they can engage their students in exploring and constructing the knowledge and positive attitudes of learning.

Thus the continuous professional development is a necessity for all today's teachers.

"Creativity and creative self image can be developed and nurtured to a great extent through professional development."[apud. 10, p. 56].

4. Conclusions

The results of our research show that the teachers who were involved in a constructivist teacher training program have developed their capacity of reflection and the motivation to progress in their teaching career. This training program offered the opportunity to reflect and develop personal pedagogical behaviour, including innovative behaviour.

The constructivist training can help the teacher to assume the new role as partner, co-learner with his students.

The majority of teachers have expressed the need to share the didactic experience with their colleagues: they need to experiment the constructivist learning in teacher education and teacher training: they need the constructivist trainer and the constructivist school culture. The training program offers the opportunity to ask themselves about their professional identity and professional competences.

A training program based on development of innovative behaviour is necessary in our contemporary society, because "unless teachers are seen as agents of innovation in the educational system, it will be very difficult for them to hold on to an important role in schooling at all" [8, p. 244].

Other information may be obtained at: mihaela.voinea@unitbv.ro

References

1. Bengtson, J.: „*What is Reflection? On reflection in the teaching profession and teacher education*" In Teachers and Teaching. (1995) vol. 1, No.1, 23-31.
2. Bolhuis, S: *Towards process/oriented teaching for self-directed lifelong learning: a multidimensional perspective*, In Learning and instruction 13 (2003), 327-347.
3. Chauve, P.: *A Challenge for Europe's Education Systems*, In Learning and teaching in the communication society, Council of Europe Publishing, 2003.
4. Dinkelman T.: *Self Study in Teacher Education A Means And Ends Tool For Promoting Reflective Teaching*, Journal of Teacher Education, (2003) Vol. 54, No. 1 January/ February, 6-18.
5. Fullan, M.: *Change Forces – probing the Depths of Educational Reform*, London, Falmer Press, 1993.
6. Hadzilacos, T.: *The processes of learning and teaching in the communication society,* In Learning and teaching in the communication society, Council of Europe Publishing 2003.
7. Hopkins, D., Ainscow, M., West, M.: *The impoving school in a change era*, Ed. Prut Internaţional, 1998.
8. Kynigos, C.: *Teacher Training and the Teaching Profession,* In Learning and teaching in the communication society, Council of Europe Publishing, 2003.
9. ∗∗∗ M.E.C.: *Educational Management for Schools*, Bucureşti, 2001.
10. Oreck, B: *The Artistic and Professional Development of Teachers. A Study of Teachers Attitudes Toward and Use the Arts in Teaching,* In Journal of Teacher Education, Vol. 55 (2004), No. 1, January/ February, p. 55-69.
11. Potolea, D.: *Reshaping the Teaching Profession in an ICT-Enriched Society*, In Learning and teaching in the communication society. Council of Europe Publishing, 2003.
12. Vlăsceanu, L. (coord.): *Scoala la rascruce. Scimbare si continuitate in invatamantul obligatoriu. Studiu de impact [School in crossing. Change and continuum in curricula]* Iaşi. Ed. Polirom, 2002.
13. Voinea, M.: *Cadrul didactic-agent al reformei educationale (reconstructia competentei profesionale)* [*The Teacher-agent of educational reform (Reconstruction of professional competence)*]. In Ph.D. Thesis, Universitatea din Bucuresti, 2008.
14. ∗∗∗ Council of Europe: *Learning and teaching in the communication society*, Concil of Europe Publishing, 2003.