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LANGUAGE AND EDUCATION POLICY IN INFORMATION SOCIETY

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A modern society has to cope with two tendencies: a spread of new technologies and an increase in ethnic and language sentiments conditional partly on labor migration. Since technologies are seen by local economies as a panacea, the needs for experts in Research and Development (R&D) have increased. Demands for R&Ds at regional labor market level do not always meet with the quantity and quality criteria from local universities. Hence experts from other countries are invited using the green-card program. In a number of International Organizations and Transnational Cooperations graduates from different universities of various countries are working together. A question is how they manage to adapt their professional knowledge under conditions of ethno-cultural variables of verbal behavior and lingual diversity? The aim of this article is to emphasize the role of nowadays universities in teaching and training professionals ready to respond to demands of labour market at either local (regional) or global (international) levels. Three qualities of graduate experts that are wanted by a nowadays employers are: one's computer literacy; one's competence in foreign languages and personal capacities for tolerance towards alien cultures. Those qualities are argued to become special targets of higher professional education and higher additional professional education in responding to the educational needs of local R&D networks.

Key words: language policy, multilingual environment, R&Ds on labor market, models of universities, sections of employment.

The national policy within educational institutions deals with a choice of a language as a media for education as well as with a choice of a foreign language to be studied by students. Migrants' social integration via bilingualism needs special attention by local authorities within the framework of the concepts of international and professional education. Those and other objectives are highlighted in a so-called knowledge society in discussion on globalization [4, 43] as one of the issues of the UNESCO Project of INFORMATION FOR ALL Program and the RF Scientific and Applied Permanent Seminar on Knowledge Society: Sociological Aspect (RHSF Grant-2008 № 08-03-50380r/II).

Among important indicators that reflect the quality of social existence in a nation-country in a globalizing world, it is its attitude to education. There are two ways to estimate a nation-country attitude to education and scientific knowledge: the quantitative way and the qualitative way. Among the later it is the quality of life of

population is an indicator of the both forms of knowledge shared by a nation-state, i, e, scientific elaboration and public awareness about know-how, know-why and know-what. Among the former it is mostly the statistic data on (a) a nation's government expenses on education and fundamental sciences that signify the level of national attitudes towards education in a given nation-country. Even if private enterprises can invest much more money than governmental programs into education and sciences, it is not due to occasional private charities but due to regular governmental support that educational institutions, from kindergarten to graduate students, can evolve, exist and survive.

A look at available data indicates that public expense as a share of gross national product (GNP) in modern Russia is rather low (3, 6%) as compared with Germany (4, 5%), USA (4, 8%), Canada (5, 4%) and France (5, 8%). Looking into the past of the former USSR one should be surprised that in the 1950s and 1960s years, when the country was to restore its economy after a complete destruction done by the Second World War, for education and sciences was given somewhat between 13 and 15% of the GNP. The idea behind was that through proper education the future generations would be capable to contribute more into knowledge as a fundamental basis for economy, ecology and education. Money invested into education of children would come out as national heritage and economic prosperity – that was the motto of the time and tide. As a result the success of Russian sciences in the 1960s was obvious.

Russia is an education-oriented country with high intellectual potential. According to the UN annual reports on Human Development Index (HDI) even if USA is ahead of Russia in secondary (95%) and tertiary (73%) education, the ratio of those in primary and higher education to total number of population is much higher in Russia than in USA. Since education reflects scientific achievements and meets the social demands of its labor market needs, it is no wonder that knowledge has become a commodity [3, 81] and makes educational services a profitable enterprise. There are about 60 non-state higher educational institutions per 100 State ones currently in Russia. This can be good for universities and for students whose parents can pay for their education. But it can be not very good for students from families with low-levels of income. The governmental scholarship for a

student of a professional institute (college) is about 20 Euro a month. It is 30 Euro a month for a student of University. A graduate student is paid 90 Euro a month. It is too small amount for living. That is why Russian students prefer to study abroad with a scholarship from other countries universities. The system of providing scholarship for students by national and/or transnational cooperation is based on agreements between fundamental sciences (the national Academies and Universities) and industrial entertainments (the national and private industrial cooperations).

Scholarship from foreign companies has been recently introduced in Russia. And it requires its elaboration as business and social management between universities, sciences and industries. There are a few projects dealing with it. But in general there is an increase in a number of foreign students in universities of Europe, USA and in Russia. It is connected with the ‘Bologna processes’. The later is a key-word used to notify all recent changes and reforms in higher school and professional education in Russian Federation.

Since Russia has joined the Bologna agreement and accepted all reforms connected with the introduction of European education standards the needs of students in relation to foreign language learning when they are educated in other countries have been recognized. While learning abroad students become familiar with foreign languages and learn to face cultural diversity with more tolerant views. Education policy in a state with heterogeneous cultural traditions faces rather controversial problems as it warrants the human rights of all citizens to be educated in their native language and warrants the enhancement of integration with residents of a country which is different from their national, ethnic, religious and social affiliation. Today more than eighty five languages are taught at schools in Russia. Fifty six indigenous languages are used in Russian local radio broadcasting; Sixty nine languages are used in regional TV-broadcasting which would indicate that future employees, to be expert in those languages, will need to be educated to a certain level in educational institutions [2].

Three aspects of the national policy in education.

1) Instrumental or organizational aspect

In dealing with the routine organization and experience of education, one of the issues is a choice of a language for higher educational institutions under conditions where several languages are used as an official and/or semi-official instruments in the education of students at the initial and secondary levels of education, such as in states with multiethnic population, e.g. India. In a modern nation-state a commonality of linguistic understanding is problematic, due to labour migration, in the professional work place.

For example, Russia is also a multiethnic state with its long traditions of cross-cultural communication. The Law “On education” of the Constitution of Russian Federation [CRF] (10.6.1992, No. 3266-1) points out the general principles of education and provides for “protection and development of national culture and regional cultural traditions” under conditions of a multi-cultural state [CRF, Article 14]. It declares Russian a state language [CRF, Article 68] in Russian Federation and gives rights to regions to use other languages as official ones as well as Russian. The Law “On languages of peoples of Russian Federation” CRF, 11. 12, 2002, No 165-2] warrants equal rights to national languages in Russian Federation (RF). The legislation of RF on use of ethnic minority languages in public areas fulfils the international standards. However, this needs some improvement of the legal terms of social practice of educational institutions in regions of Russia. The needs to expand regional institutions for education in native languages include a spread of the distance learning programs via Internet and mass media [5].

2) The substantial aspect

This deals with the content and curricula of educative institutions at different levels of education. The problem of the unification of those programs that exist in Universities of various countries is a complicated one. On the one hand it seems very attractive idea to unify those programs especially with a view of possible perspectives of student exchange and exchange of experts from different universities within the framework of Bologna processes. But on the other hand it can lead to a loss of traditions developed by European, American and Asian institutions of higher professional education. This idea is not supported by

Universities on the whole. But there are attempts to coordinate the levels of education as the standards more or less universal for various countries.

Thus, there are recognized five levels of education: the primary (Level 1), the secondary (Level 2) and the vocational levels to higher (Level 3) and post-graduate education (Level 4). The tertiary education (Level 5) is for those who need additional higher professional qualifications. In order to improve one's career one is to have got additional higher professional education either at university or at college or institute. A number of people with two higher professional educations is high in modern technologized countries. Thus, among persons with higher education in Russia there are 54, 0% that have two professional educations. A number of persons with two higher professional educations in Canada is 41, 6% of a total number of educated persons. 28, 3% of all persons with higher professional education in USA have also two professional higher education (See the Table 1).

THE TABLE 1

Percentage Share of People Aged 25-64 with Tertiary Education. Based on: The 2002 National Census in Russia (http://www.gks.ru/perepis/osn_itog.htm) & Education at a Glance. Paris: OECD, 2003, tab. A3.

Countries	A number of persons with two higher educations (Level 5 & 6) as a whole (%) among the whole number of people with higher education	A number of persons (%) who have second special higher additional educations (Level 5B and Level 6)	A number of persons (%) who have second additional professional additional education (Level 5A and Level 6)
Russia	54,0	33, 5,%	20,6
Canada	41,6		
USA	28,3		28,3 (maximum)
Ireland	21,6	21,6 (maximum)	
Turkey	8,9		
Slovakia		0,6 (minimum)	
Portugal			6,9 (minimum)

Notes: The countries with the maximum and minimum numbers of persons with two educations (diplomas).

- The abbreviation OECD is for the Organization for Economic Cooperation & Development.
- The abbreviation ISCED is for the International Standard Classification of Education

Usually the professional tertiary education (type 5A) is provided by the higher additional educational institutions (HEIs) or colleges. Special tertiary education is provided by the medium special educational institutions (MSEIs).

The third aspect is called here pragmatical. It deals with the quality of education and with a number of professions required by society. Let us restrict the discussion and focus on the problem of language(s) choice as a means of instruction relative to the lingual diversity of students. Teaching native and foreign languages at different levels of education for students is problematic. There are special educational programs for children of migrant families. Thus, in the USA

there are programs of bilingual education [1] available for migrants and foreign students. Native languages of pupils e.g., Spanish (66%), Vietnamese (4%), Chinese (2%), etc. are used at levels of elementary and secondary education with a further shift to English at other levels [1, 7]. Under student exchange conditions and within the framework of the Bologna process, the need is emphasized for foreign language students to learn the mother tongue the country that they have come to be educated in. In 2002 at least 10,000 students from Russia went to study in the USA (48%), in Germany (21%), and in France (15%). Russian universities have again become attractive for foreign students too. Thus in 2004 circa 60,000 students from 14 New Independent States (NIS) came to study to Russia. In 2002 there were 60,000 students from Asian countries (34,000), Europe (6,000), Baltic countries (4,000), USA and Canada (2,000) in Russia. Most of the students who come to the universities of RF have to learn Russian in order to attend the lectures.

One's choice of language as a means of professional discourse depends on one's access to scientific information and, obviously, is connected with the country in which such an expert has been educated. Being educated in one's native language R&Ds require knowledge of foreign language(s) for their professional needs and due to labour migration. It is possible to speak about a competition among languages of scientific knowledge in professional spheres.

It is no wonder that English (with its coefficient 1, 6 of a potential link of international information about sciences) takes the first place as a link for an access to real and virtual storage and data-banks of human knowledge. But it might be a surprise for general population to learn that it is Russian (with the coefficient 3, 0), that follows English and keeps the second place as a link of information about natural and social sciences worldwide. The third place is occupied by Japanese (with the coefficient 3, 8). It is followed by with French (5, 6) and German (5, 9) taking fourth and fifth places accordingly [6, 51-52].

The international university models (see: p.8 of this article) have not only inspired certain traditions and scientific contributors but they have also introduced their own languages as a symbolic heritage of national knowledge. Under the umbrella of globalization, the concept of international education has been evolved as around **world civilization** in American educational programs after

the Second World War [7, 69]. Universities of USA organized projects to study world cultures together with the UNO and the UNESCO. In the 1970 somewhat forty nations participated in half of the cross-cultural projects. More than 400 world languages came into focus in those projects. They were devoted to Latin America (30%), Asia (28%), Europe (20%), former USSR (18 %) and African countries (14%) [8, 304]. The USA faces needs in cross-cultural studies as well as by now 17 states of the USA have special Laws declaring English as the official language, e.g., Arizona (1988), Arkansas (1987), California (1986), Colorado (1988), Florida (1978), Illinois (1969), etc. This shows that even within a country a choice of a language for professional education is not a simple one. This makes us to look to the pragmatical aspects of education and to look at it from the point of view of labour market demands related to local (national, regional) and global (international, transnational) organizations and cooperations.

There are four major labour sections of employment distribution: agriculture, industry, service and information. Let us compare available statistical data about national employment as indicated by The Year Book Statistics /1994/ for the USA, Germany, Hungary, Russia, China and Japan (The Table 2).

TABLE 2

Economically Active Population in Four Major Labor Sections (in 1990-1993) of Japan, China, Russia, Hungary, Germany, USA / persons aged 16 and over/.

Sections:	Japan	China	Russia	Hungary	Germany	The USA
Agriculture	4	1	4	2	4	4
Industry	2	2	1	1	2	3
Service	1	4	3	3	1	2
Information	3	3	2	4	3	1

Even if in the national statistics in those sections are specified according to local national standards, the main trends can obviously be seen. Agriculture is the main employment in China. In the post industrial countries USA, Germany, and Japan service and information are prominent. In Russia industry and information are is dominant section of employment. Under conditions of globalization a spread of new technological networks for communication online has laid grounds for the needs of digital technologies in all labour sections including the agriculture. It means that each labour section of nowadays requires R&Ds or experts in technology. A question arises how to educate and train operators and technicians at Universities around the world to make them capable to work (a) in each of the

four major labour sections and of (b) different countries. There are some peculiarities of each labour section as far as operative and instrumental aspects are concerned. They are usually considered by professionals working in the Section as well as by technical operators. There are also differences in communication and information technologies produced by various countries. That is why the problem of international models of higher (University) education has become so urgent in the 21st century.

The five international models of universities i.e., American, British, German, French, and Russian models have been recognized, as significant international models of higher professional education. Due to scientific contribution of their highly qualified experts and professionals into world knowledge those models of universities are well known and they attract students from all over the world. Even if within a country universities can vary a lot it is possible to specify those models of universities. The **British model** is the most traditional being famous for its fundamental theoretical content and practical issues of education. The Open University has been available since 1971 for distance learning, teaching using the media of radio and TV. **The French model** orients to centralization and universalism in knowledge. Technology is a separate division in its educational curriculum. The **German model** was influential in Europe in the 19th c., especially in Scandinavia and Russia. The rights of students to form their own programs for learning and the rights of professors to represent their subjects and research were first declared in German universities, although it was reduced in the Nazi period. Now it is reviving through unification and is restoring its international connections.

British, German and French models prevailed as influential in Europe until the 19th century. During the 20th century Russian and American models dominated. **The American model** of higher education was developed under the influence of all four models through migrant professors from Europe. A range of services for the general public disseminated through the mass media and educational TV programs exist. **The Russian model** is also integrative and was based on Byzantine traditions. It had strong connections with German & French universities before the 1930. Today the Russian model maintains its international contacts in sciences. In Russia training is taken up by students through part-time

correspondence courses and at evening classes. Public Universities for the general population and educational programs on TV and radio were popular before the 1990. Two events are to be taken into consideration when speaking about the influence of the American model of university education in the 1960th and the technological revolution of 1997 that introduced educational programs via the Internet and mass media. As to the Russian model of education in the domains of natural sciences no one can forget the success in the 1950's and 1960's with technical and scientific research and development. Today American and Russian models of universities are recognized as the leading authorities in fundamental theories with a particular emphasis on the practical utility of knowledge.

The five models of university education have influenced other models of higher education in the world. Thus, the **French model** was introduced in Tunis, Quebec, Indochina, Latin America, Brazil, and the Pacific. The **English model** was introduced into India, Africa, Malay, The Near and Far East and dominates in Canada, Australia, South Africa, and New Zealand. The **American model** was introduced to some regions of the East, Far East, North Africa, and the Central Asia. The **Russian model** has been adopted by universities in the NIS (New Independent Countries, which the former Soviet Republics are now called). The extent and range of each model's influence varies according to the economic and political environment. However, the success of the expansion of universities in the world mainly depends on the enthusiasm of local elite and national intellectuals. An expansion of these five models of universities in other parts of the world means not only a spread of the traditions of educational content and their forms of administrative organization of Universities in Europe, USA and Russia, it also means that the languages of these models, i.e. English, French, German and Russian have become dominant as the communicative means of professional education.

Some Conclusions:

1. Since technologies are seen by local economies as a panacea, the needs for experts and R&Ds to operate them increase. Demands for R&Ds at regional labour market level do not always meet with the quantitative and qualitative assurance criteria of local universities. Hence experts from other countries are employed using the green-cards programs which give a chance for

immigrants workers with higher education to nativization or becoming a citizen of the country if they have jobs there. Labour migration is in a focus of sociological and sociolinguistics surveys. The problem of a means of communication in professional spheres under condition of ethnocultural and lingual diversity of staff has not lost its importance in a knowledge society.

2. Since innovations in technologies continually require new qualifications from experts, the concept of continuous education has become very popular. It includes (1) re-education of adults on their working places; (2) additional professional education known also as the tertiary education (3) improvement of one's qualification through seminars.
3. The concepts of **international, professional and permanent** education are revived and revised to speculate on language policies of professional education with a focus on the languages used in instructing students who come to foreign countries for their education. The five models of international universities (American, British, French, German and Russian) have gone through a number of reforms in order to adapt to the needs and demands of their national labour markets, demanding qualified technicians for the four main sections of employment: agriculture, industry, service and information.
4. R&Ds have high expectations from their employees: computer literacy, good knowledge of at least one foreign language and abilities to regard cross-cultural communicative etiquettes in the work place. The success of regional educational institutions depends on their capacity to respond to the demands of labour markets under the conditions of a multilingual environment of modern society.
5. A comparative analysis of hard competition between the USA, Europe and Asia with a focus on the distribution of technicians, scientific workers and R&Ds as related to the needs in education and the requirements for their jobs has shown that there is a competition among universities of various countries as well as serious competition among universities within a country for knowledge and innovations in technologies and natural sciences.

6. However, there are several trends that can be argued as more or less common for universities either in Europe or Asia or USA:

- An increase in the number of experts for technology in Asia;
- An increase in the number of female students in all braches of knowledge;
- An increase of interest in applied sciences and pragmatic disciplines;
- General decrease of students' interest in fundamental theories;
- A more narrow specialization at the early stages of education;
- Needs for re-educational courses for adults and postgraduate technicians;
- A necessity of languages education for experts in social & natural sciences.

7. In general natural sciences are more attractive for economy with their broad contribution to market economy. Hence they are better supported by local governments. But it is hardly wise to underestimate social sciences contributions into a knowledge society. Humanitarization of a society through mass media information opens the new perspectives for social sciences as a branch of knowledge and as an instrument of spiritualization of life in public spheres of human communication.

References:

1. *Jacobson R.* The Social Implications of Intra-Sentential Code-Switching // Jon Amastae and Lucia Elias-Olivares, Eds., Spanish in the United States: Sociolinguistic Aspects. Cambridge: University Press, 1982. P. 34-87.
2. *Harnisch S.I.* Languages and Technologies // Jazyk i transnatsionalnye problemy /Language and transnational problems/. Moscow, Tambov: TSU, 2004. P.100-114.
3. *Mulgan G.J.* Communication and Control: Networks and the New Economies of Communication. Oxford, Cambridge: Basil Blackwell Ltd, Polity Press, 1991.
4. *Robertson R.* Globalization: Social Theory and Global Culture. London: Sage, 1992.
5. *Treskova S. I.* Sotsiolingusticheskiye problemy massovoj kommunikatsiji: Principy izmerenija variativnosti / Sociolinguistic Problems of Mass communication: Principles of Variability Estimation/. Moscow: Nauka, 1989.
6. *Ulijn J. H., Strother J. B.* Communication in Business and Technology. Frankfurt/Main: Peter Lang, 1995.
7. *Wallerstein I.* Geopolitics and Geoculture. Cambridge University Press: Cambridge, N.Y. Editions de la Maison des Sciences de l'Homme, Paris. 1991.
8. *Woelfel J.* Development of the Western Model: Toward a Reconciliation of Eastern and Western Perspectives// Kincaid, D.Lawrence, Eds., Communication Theory. N.Y.: Academic Press, 1987. P. 299-318.