Adjustment of the Zagreb University School of Dentistry Curriculum to the Corresponding Curricula in the European Countries

Usporedba nastavnog plana na Stomatološkom fakultetu Sveučilišta u Zagrebu s odgovarajućim planovima u europskim zemljama

Summary

The staff of the Zagreb School of Dentistry firmly believes that dental medicine is a differentiated profession which have been crossed over the frames of mere dentistry long time ago. The guidelines in education and practice should be based on the need of training a doctor of dental medicine to deal with the prevention, diagnosis, treatment and follow-up of the diseases of stomatognathic system and perioral regions. This statement is beyond any dispute and can be realised in future by enforcement of an independent school of dentistry within the frames of a university, with appropriate corrections of the curriculum and possibilities of introducing new subjects, according to the curricula of European Community countries and other developed countries of the globe, especially United States of America and United Kingdom.

Key words: educational plans, Zagreb, Europe

Members of the Zagreb School of Dentistry firmly believe that dental medicine is a differentiated medical profession.

We actually used to repeat this opinion of ours in the past, and still do it nowadays, considering it an appropriate frame for future developments of the Croatian dental medicine, both in education and in practice, that is, in all segments of providing and acquiring knowledge and of providing dental health care. Quite naturally, many principles of the educational process in dental medicine are similar to those in medicine proper. There are, however, many differences and specificities that ensure future development of dental medicine as an independent profession, leaving no doubt about such a concept indeed.

Indisputably, the frames of mere dentistry had been crossed over a long time ago. Therefore, guidelines in both education and practice should be based on the need of training a physician – doctor of dental medicine to deal with prevention, diagnosis, treatment and follow-up of the diseases of the stomatognathic system, and oral and perioral regions, which will require good knowledge of the basic biological sciences and general medicine subjects directed, however, toward the basic profession of dental
Accordingly, the need of an independent school of dental medicine, within the frame of a university, appears to be absolutely beyond any dispute, not only because of the specific profession reality, but also to allow education of other health workers included in dental health care and to cover the needs of postgraduate, specialist and continuous education.

Similar considerations were also repeated at the congresses of the Association for Dental Education in Europe held in Madrid (1,2) in 1988, and in Budapest (3) in 1990, partially corresponding to the »Malmö model« proposing a new type of the school of dental medicine with integrated education of all dental care workers to be introduced.

The advent of the sovereign and independent states in the region of the former Yugoslavia has raised the question of adjustment of the curricula of the schools of dentistry and medical schools from these countries with the corresponding curricula in the countries of the European Community, which Croatia will probably also join as a member country in the future.

In 1986, the European Community Commission passed an act on the minimal conditions required for mutual recognition of degrees, certificates and other evidence of formal qualifications by the member countries, based on specific training in general medicine, also referring to the adjustment of educational plans and curricula, general medicine intern and resident plans and programs, etc., all this aimed at free transfer of medical personnel (4). Commissions of the Croatian Ministry of Health designing the new Act on Health Care and other sublegal regulations take the above facts into account. We are inclined to believe that similar adjustments should also be done in dental medicine.

The need of a specialized physician, then already recognized by other European countries, resulted in the establishment of the Division of Odontology at the Zagreb School of Medicine in 1948, whereas in 1962 the School of Dentistry was founded as an independent institution of the University of Zagreb.

The events occurring during the immediate post-war period in Croatia resulted in unanimous recognition of the Republic of Croatia as an independent and sovereign country by the European and many other countries from the whole world on January 15, 1992.

With the adoption of the Republic of Croatia in the United Nations on May 22, 1992, all conditions for undisturbed democratic and civilizational development expected to bring advances in our dental medicine and approach it to the European professional endeavors, have thus been met. The extent to which the Zagreb University School of Dentistry has approached the European curricula for the study of dental medicine can be assessed from the following data.

Comparison of data for Croatia and some other European countries has revealed the number of schools of dental medicine and number of students per population to be approximately identical in all the countries observed. In Croatia, per approximately 5 million inhabitants, there is one independent School of Dentistry in Zagreb and one Department of Dentistry at the School of Medicine in Rijeka, admitting a considerably lower number of students.

Data for some European countries are approximately similar. As to our knowledge, in these countries, the number of students is on a decrease, with the number of schools unchanged, increasing the quality of education, and supporting the hypotheses on changes in population pathology and personnel saturation, also suggesting the need of changes in educational plans and curricula (5).

During the last 10 years, 1116 students have graduated from the Zagreb School of Dentistry. This number also refers to students from previous generations. Data on the so-called pure generation show a difference between the number of those enrolled and the number of graduated students during a 5-year period of time, revealing about 50% of admitted students to graduate in term on an average.

Data on the number of students enrolled in several academic years show that the number of those enrolled did not decrease, as it was recorded at schools from the comparative countries (Table 1). On the contrary, this year the number of those enrolled in the first year of study
Table 1. School of dentistry Zagreb – admitted students per year

<table>
<thead>
<tr>
<th>Year</th>
<th>Domestic</th>
<th>Foreign</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1981/82</td>
<td>121</td>
<td>23</td>
<td>144</td>
</tr>
<tr>
<td>1985/86</td>
<td>99</td>
<td>40</td>
<td>139</td>
</tr>
<tr>
<td>1990/91</td>
<td>99 + 40</td>
<td>2</td>
<td>141</td>
</tr>
<tr>
<td>1991/92</td>
<td>137 + 35</td>
<td>0</td>
<td>172</td>
</tr>
</tbody>
</table>

increased (172), which resulted from the war situation in Croatia and in Bosnia and Herzegovina, and from the overall political situation in the former Yugoslavia. As the Albanians have recently been deprived of the study of dentistry in the Province of Kosovo, and many Croats have fled Bosnia and Herzegovina, in addition to the war situation in Croatia, this academic year the entrance exam procedure had to be organized on four occasions, so that the number of those enrolled in the first year is beyond all School capacities indeed. All this, together with the increased interest in the study of dental medicine, the possibilities of private practice in dentistry, and the fact that over the past 10 years only the Zagreb School of Dentistry reduced the number of those enrolled as compared to the previous decade, whereas in other parts of the former Yugoslavia this number was on an increase, has led to the present state which is, we believe, only temporary indeed. For the same reasons, enrollment of a certain number of students paying for the study was allowed (in 1990/91 – 40 students, and in 1991/92 – 35 students). At the same time, the interest of foreign nationals for the study of dentistry in Croatia has completely vanished, which is also quite understandable.

At our School of Dental Medicine, the study takes 5 years or 10 semesters. It is completed with a graduation thesis. Duration of the study corresponds to the duration of the studies in comparative countries. Upon the completion of the study, a diploma with the title »doctor of dental medicine« is obtained. (Table 2).

Table 2. Duration of study in some European countries

<table>
<thead>
<tr>
<th></th>
<th>Germany</th>
<th>Belgium</th>
<th>Denmark</th>
<th>Hungary</th>
<th>France</th>
<th>Slovenia</th>
<th>Austria</th>
<th>Croatia</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>5 years</td>
<td>5 years</td>
<td>5 years</td>
<td>5 years</td>
<td>5 years + thesis</td>
<td>6 years</td>
<td>5 + 3 years</td>
<td>5 years + thesis</td>
</tr>
</tbody>
</table>

Enrollment conditions are generally similar to those required in other European countries. The number of those enrolled is limited (númerus clausus). The entrance procedure consisting of the evaluation of the high school marks in biology, chemistry and physics, high school final exam mark, exams in the above listed subjects (bringing the greatest number of points) and a test of psychomotor capacities, under the supervision of the staff from the Department of Industrial Psychology, Zagreb University School of Arts, at least in part prevents untalented persons to enroll in the School of Dentistry (Table 3).

The teaching activities consist of three parts: 33.3% of them refer to basic sciences, performed at various institutes of the School of Medicine, specially directed toward dental medicine as profession and science. Then, 22.3% refer to clinical education in subjects related to general medicine, performed by our faculty members at the Clinical Hospital of the School of Dentistry, also allowing specific focusing on dentistry as profession. Dental medicine subjects are represented with 44.3%, 77% of it referring to exercises in dental medicine and the rest to lectures and pre-clinical dental medicine exercises. The total time-table is 4500 and is somewhat lower than the timetable of the respective schools in some European countries.

From this academic year, exercises in dental medicine clinical subjects are performed in groups of 6 students, which results in the school working hours from 8 a.m. to 8 p.m. every day, even on Saturdays when lectures are held in the morning.

In conclusion, we believe that the future of the Zagreb University School of Dentistry lies in the present concept and frames, with appropriate corrections when and where needed.

Our intention is to reduce the number of students in the first year to 90, and at the same time to ask from the government to pay us
according to the curriculum and not according to the number of students, as has been to date.

Educational plans during the first five semesters should be changed in order to distribute the burden more evenly to all years of the study, thus adjusting them to the current curriculum, especially in the fields of biochemistry as well as in the relationship and course of training in biology, chemistry, physics, biochemistry and physiology.

When changing curriculum, care should be taken about the possibilities of introducing new subjects, such as immunology, gnathology, materials in dental medicine, implantology, perhaps also orofacial genetics or gerontology in dental medicine. This can partially be achieved by redistribution of the existing time-table and possible prolongation of the study by an additional semester consisting exclusively of practical work in dental medicine clinical courses of lectures. This additional semester could be included in the internship preceding the state finals required for the licence for work in either state institutions of private practice.

In search for a new model, however, we should not stay confined within the European model boundaries, but make use of all positive sides of the study curricula of other countries from other parts of the globe, especially from the United States of America and United Kingdom.

Sažetak

Na Stomatološkom fakultetu u Zagrebu postoji čvrsto uvjerenje svih nastavnika kako je stomatologija samostalna zdravstvena struka, koja je davno prešla okvire zubarstva te se u edukaciji treba rukovoditi pretpostavkama kako stvaramo liječnika – doktora stomatologije koji se bavi preventivom, dijagnostikom, liječenjem i praćenjem bolesti stomatognatoga sustava, oralne i perioralnih regija. Takvo stajalište može se u budućnosti osigurati samo jačanjem Stomatološkoga fakulteta kao samostalne sveučilišne ustanove u svim dijelovima njegove djelatnosti. Autori prikazuju povijesni razvoj i nastavni program Stomatološkoga fakulteta u Zagrebu, uspoređujući ga s programima fakulteta nekih europskih zemalja. Plan, program i trajanje studija stomatologije na Sveučilištu u Zagrebu vrlo su slični onima u drugim europskim zemljama. Autori vide budućnost Stomatološkoga fakulteta u sadašnjoj koncepciji i okvirima, uz odgovarajuće korekcije nastavnoga programa, koje znače ravnomjerniji raspored nastave, otvaraju pitanje uvođenja nekih novih programskih sadržaja i pitanje trajanja studija, a sve u namjeri približavanja promjenama u okvirima Europske zajednice i drugim razvijenim zemljama svijeta, posebice Sjedinjenih Američkih Država i Velike Britanije.

Ključne riječi: nastavni planovi, Zagreb, Europa

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