

## TRADITIONS AND INNOVATIONS IN SPECIAL SUBJECT TEACHING OF FOREIGN STUDENTS IN THE DEPARTMENT OF LANGUAGE AND SPECIAL SUBJECT TEACHING OF THE MEDICAL UNIVERSITY – PLOVDIV

**Dafinka Kalinova**

Department of Language and  
Special Subject Teaching, Medical  
University,  
15a Vassil Aprilov St., 4002 Plovdiv

**Nedyalka Grigorova**

Department of Language and  
Special Subject Teaching, Medical  
University,  
15a Vassil Aprilov St., 4002 Plovdiv

**Iliyana Stefanova-Kancheva**

Department of Language and  
Special Subject Teaching, Medical  
University,  
15a Vassil Aprilov St., 4002 Plovdiv

1. Traditions
  - A. Standard forming of groups.
  - B. Standard syllabus including
    - a. Introductory course, giving the general concepts, terms, regularities.
    - b. Basic course, given in lectures, practical classes, seminars, observations.
    - c. Checking and assessment of the knowledge acquired, by means of tests, colloquia and examinations.
2. Innovations
  - A. Standard forming of groups.
  - B. Introducing a specialized terminology in natural sciences during the initial 6-week training in Bulgarian language and phonetics.
  - C. Introductory course based on role play.
  - D. A restructuring test.
  - E. Semestrial restructuring of groups.
  - F. Introducing a synchronous syllabus in natural science subjects.
  - G. Basic lecture course of various duration.
  - H. Annual written examination.

Classical methods of teaching foreign students have been applied for over 20 years in the Department of Language and Special Subject Teaching (DLSST) of the Medical University – Plovdiv. In the last 5-6 years these methods were gradually replaced by more modern methods of teaching, developed by the specialists working in the field of foreign language teaching for special purposes.

The traditional way of teaching foreign students is characterized by a standard approach to the introduction of specialized training in biology, chemistry and physics. The student groups are formed and filled up according to the order in which the students enlist. The groups formed in that way are included in a syllabus of a 27-week duration that has been confirmed over the years as the most adequate one. The overall number of classes in biology, chemistry and physics for the introductory course, the basic course of lectures, checking and assessment of the knowledge acquired is given in table 1. The volume of the material studied is identical in all groups. The students obtain basic knowledge in biology, chemistry and physics that they will need in their first-year studies in medicine and dentistry ( table 1).

The material studied is regularly checked by means of tests (current assessment). The students are given an opportunity to sit for colloquia and get assessed for part of the examination questions; for the greater bulk of the latter, though, students are assessed at the examinations themselves. The examinations in biology are two, and have to

be taken at the end of the first and second semesters, whereas in chemistry and physics the students get current assessment throughout the two semesters and sit for an examination at the end of the second semester.

Table 1.

Subject	Introductory course	Basic course	Checking and assessment of the knowledge acquired
Biology	25	165	20
Chemistry	20	130	18
Physics	15	106	14

The professional experience gained throughout the years, the access to new information technologies and forms and methods of teaching, urged the authors to look for an innovative approach in foreign language teaching in natural sciences. The aim of that approach was to achieve a higher effectiveness of teaching at the DLSST of the Medical University – Plovdiv.

At the beginning of the academic year the student groups are formed in the manner described, after which we apply the innovative elements of the scheme developed by us:

- Test assessment of entrance level
- Restructuring of the groups
- Introducing courses of different duration and applying:
  - team work

- association
- interdisciplinary approach

**A. A considerable part of the students have studied biology, chemistry and physics before but do not master the specific terminology of science in Bulgarian.**

We thought that during the initial 6-week teaching of Bulgarian language and phonetics it would be a good idea to teach terms from three different points of view – that is, from point of view of biology, chemistry and physics. In that way the interest of the students in the special subjects is provoked, stress is reduced and simultaneous teaching of different natural sciences is initiated. Thus, the relationships between the subjects become more stable and terms with identical or different meaning get in the focus of attention.

**B. The syllabi in biology, chemistry and physics start with an introductory course that, in contrast to the traditional one (lectures and seminars), is suggested to be based on role play, which means that the exercises are distributed among the students and the latter work in teams.**

If one student asks a question, another one gives the answer, and *vice versa*. Students are placed in situations where each one of them needs help from his/her colleague. The principle of role play can be used when teaching the basic course as well. The integration approach is applied here in the bilateral presentation of one and the same lecture topic. For example, the lecture “Structure of the atom” is given from point of view of chemistry and physics, “Work of the heart and blood flow in the cardio-vascular system” - from point of view of biology and physics, “Chemical composition of the cell” - from point of view of chemistry and biology. Thus, the relationships inside a given subject and between the different subjects get more stable and allow the foreign students to get oriented more easily in a new theoretical or preclinical discipline.

**C. At the end of the first semester there is a test and according to its results the groups are to be restructured according to the individual abilities of the students to learn the material taught.**

Three levels are possible, in which the basic lecture course is of different duration and the syllabus is synchronized in all natural sciences. The realization of the project in time is as follows:

- Standard groups working in the I-st semester
- Restructuring test
- Restructuring of the groups and their inclusion in the synchronized syllabus for the II-nd semester of the following durations:
  - shortened, containing lectures, tests and control
  - normal, containing lectures, seminars, tests and control
  - lengthened, containing lectures, seminars, practical classes, and discussion control

The advantages of the innovative approach are:

1. There is a greater opportunity in the first semester to introduce specialized vocabulary that is larger in volume.
2. The students get used to the principles of team work, which will be naturally imposed in their future profession
3. Greater flexibility in applying different variants, in agreement with the new requirements for credit transfer in the higher education
4. The joint efforts of biologists, chemists, physicists and language specialists are coordinated in the theoretical training of students.

## REFERENCES

- Kalinova D., Grigorova N., Stefanova I., 2001. Semestrial Restructuring of Student Groups in the Department of Language and Special Subject Teaching - *Folia Medica*, XLIII, Suppl. 1/2001.
- A Compendium of Reports at the Jubilee Scientific Session - 15 Years of Preparatory Courses for Foreign Students, 1996, Medical University, Plovdiv.