O. Nikolaychuk, Master student A. Morozov, PhD in Engr., Ass. Prof., research advisor V. Shadura, Senior lecturer, language advisor Zhytomyr State Technological University

HIGHER EDUCATION INSTITUTION SCHEDULE AUTOMATED SYSTEM DEVELOPMENT

The beginning of every Academic year brings a lot of troubles to a University employees concerning schedule design. The problem is too complex due to the fact that there are some people involved in this process and it is hard to synchronize the work. Also too many details have to be taken into account such as: the number of student in a group, the type of class-room, the same subjects for some groups and the possibilities to find the best solutions to make the studying process more effective and so on. So, there appeared the need to develop the appropriate algorithm to solve this problem.

The following web technologies are applied to make the simultaneous use of several schedule users more comfortable: PHP, MySQL and javascript to achieve the dynamic content changes. All the mentioned above technologies help to develop the application which can be available either for a personal computer or a mobile device.

The application will have several modes:

Schedule designer. The users can form the schedule by themselves and the application will check it for the possible changes accuracy by means of the specific algorithm. The latest technology Drag and drop on the basis of javascript is used here to make the use comfortable. This technology allows dragging the pieces of information that brings a designer effect. JQuery is used here to check the accuracy of data in schedule and this provides the direct accesses to server without page loading. It will also help to make the work faster and to save the obtained data.

Automation. The system generates schedule automatically taking into account the forseen probabilities of any event and checking algorithm for the accuracy of data obtained.

User tips. The students and the teachers will be able to visit the site any time and to check the schedule. The search of different types of information will be implemented such as the schedule for some definite group, the availability of class-room, etc. The results can be saved or typed.

The given application will reduce the time of schedule design and will bring the accuracy to its data.