# Software requirements

### 1 Introduction

"BSUIR Professor" - mobile application for iOS platform, designed for easy and quick access to teacher's schedule of BSUIR University. The application is designed specifically for BSUIR and displays information only for this university. Special and unique applications in that it shows the information about the schedule of teachers, while counterparts are working only with the schedule of the students.

## 2 User requirements

## 2.1 Program interfaces

Developed application interacts with the service BSUIR schedule API, which provides programming interfaces for working with the schedule of groups and teachers. Internet service is a reliable source of information that allows you to avoid mistakes and ensure the correctness of the data user.

#### 2.2 User interfaces

The application interacts with the user by means of user-friendly and interactive table that corresponds to the generally accepted rules of building GUI iOS applications. The table is divided into sections which represent the days of the week. Sections are divided into cells, which include all necessary information for students and teachers information about class. The interface is intuitive and easy for even the most inexperienced smartphone users. To select a teacher, user must enter the name of the teacher in the search bar. Navigation in the table takes place using the scroll, which is also quite convenient for owners of smartphones from Apple.

#### 2.3 User characteristics

This program will be useful not only for teachers BSUIR, but for students of all forms of learning. The application is designed just not for experienced iPhone users, but for novice to use the mobile operating system iOS. It is suitable for both young students between the ages of 17 years and for teachers of all age groups. The app is not aimed at a particular social group of individuals that is certainly a plus.

## 2.4 Assumptions and Dependencies

The program depends on the service BSUIR schedule API. In the case of mechanical damage to the service may not be available. It should be remembered that the application programming interfaces can be modified or disabled at any time without prior notice. Also, at any time may change the conditions of access to services.

## 3 Specific requirements

To create the program was used the programming language Objective-C and the development environment Apple XCode 6. The use of this medium allows to develop high-quality and easy-to-use application for a family of operating systems iOS. The app is specially designed only for Apple smartphones and works directly in the operating system, it is not cross-platform and requires access to the network.

## 3.1 Functional requirements

- 1. Design of the interface;
- 2. Designing ways to interact with the server;
- 3. Design mechanisms to download and decrypt data;
- 4. Testing and debugging.

### 3.2 Software system attributes

The development objective of the program was to create a useful and functionally complete product and application, which is convenient, easy and visually pleasing to use.

- 1. Making the application should not be too intrusive. At the same time, the visual components of the program should be designed so as to be pleasing to the user and included all the required data. Design and ease of use are often the key factors for the user when using the application.
- 2. The application must be clear to the user, and most importantly should correctly display the information received from the service. Invalid or incorrectly decoded data can be displayed to mislead both students and faculty members of BSUIR, that is simply unacceptable.
- 3. The application must save the data to the opportunity to work with the schedule of off-line, which is very convenient for the user that does not have reliable access to the Internet.