



TECHNOLOGY OFFER OF THE UNIVERSITY OF PÉCS

# Biochem City

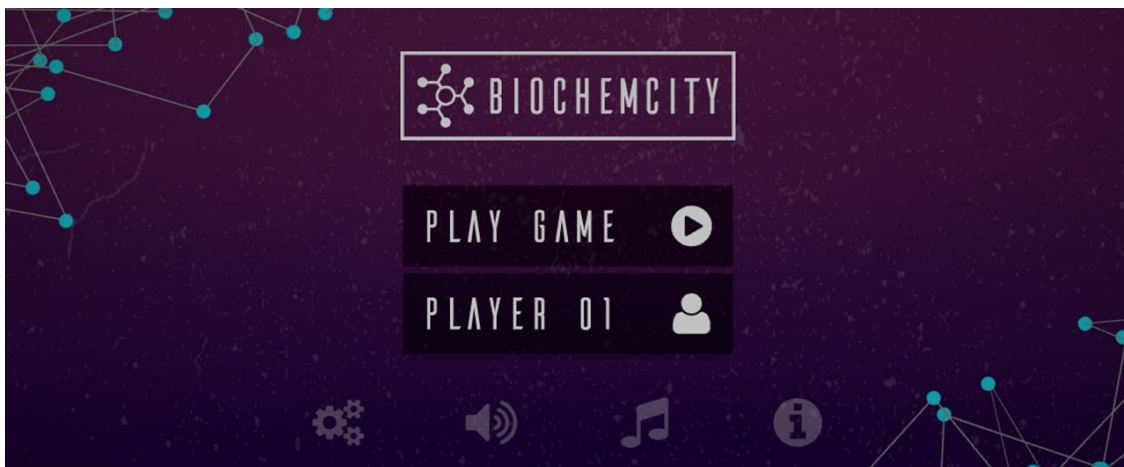
## Educational application for mobile devices

**Keywords** biochemistry learning, software, gamification, preparing for biochemistry exams

The biochemistry course is an integral part of all life science training (medical doctor, dentist, biologist, biotechnologist, veterinarian, food and agricultural engineer). It is one of the most difficult disciplines and is the bottleneck of the basic module in most training. The most challenging part of learning biochemistry successfully is understanding and memorizing the reactions with the structural formula of the molecule and understanding the systemic network of these reactions. There is currently no program/application on the market to assist in this process.

Biochemcity is a language-independent mobile application that breaks the past practice and tries to provide a new concept to teach biochemical core material (biochemical reactions). Biochemcity guides the user through a labyrinthine network of metabolic pathways in a revolutionary edutainment environment, providing a successful alternative learning strategy. The concept is based on the fact that metabolic pathways can be conceived as a real road network, plastically illustrating the metabolic connection points, the junctions, the real connections between the parts that are far apart in the curriculum or the textbooks. We are building a 3D city on this map, which creates the background of the application. In this cosy night city, the user has to find his way with street lamps 'built-in' mini-games, each of which hides a biochemical reaction. Successfully solving and practicing the reactions on that graphical interface (turning on the streetlamps) leads to the discovery of the whole city, that is, to master the matter (more light -> more knowledge).

BRIEF DESCRIPTION



**We are seeking for:** licencing partners

**IP status** Know-how. The disclosed method and technology is fully owned by the University of Pécs.

### Contact

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