

Abstract

Despite the flow fluctuations and increased traffic demand in Macedonian cities in the last fifteen years, Republic of Macedonia is one of those countries which still employ only the traditional systems of traffic management and control. Those are fixed control systems, which burden the network with problems such as increased travel times and travel expenses as well as environmental degradation. A general call for *something to be done* becomes obvious. The best practices have shown that this can be realized through unconventional solutions i.e. by means of intelligent traffic management systems.

It is the first time that in R. Macedonia a decision has been reached to have a system and thorough approach in the replacement and modernization of the traffic control system. The first step has been made with a research project aiming at intelligent traffic management and control system in the centre of the city of Skopje as a constituent of the Testing Innovative Strategies For Clean Urban Transport For Historic European Cities - RENAISSANCE - FP7 Project.

The study denotes the process of designing intelligent management for city centre, and defines the phases of design and the corresponding technology.

Our main goal was to create a “smart” traffic management and control system so that the city of Skopje can cope with the increased traffic problems. What we primarily had in mind here was meeting the needs of all kinds of traffic users with reference to mobility, safety, sustainability, accessibility, environmental protection. We believe that the city of Skopje will make a step forward and “learn” that there are “intelligent” techniques for improvement of traffic conditions only by sharing both the best practices with the other cities – project participants and the positive results that the adaptive traffic management and control system – UTOPIA has shown. We are convinced that we have slightly diverged from the current conventional approach and therefore made the right choice with a vision from a higher prospective.

Keywords

.....signalized intersections, traffic management and control, intelligent traffic solution, traffic management centre