CREATION OF A GEOGRAPHICAL DATABASE OF PARKING CONNECTED TO THE ROAD DATABASE IN THE URBAN TRANSPORT PLAN

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ABSTRACT

The important developments recently experienced in Algerian cities require a new and more appropriate organization, especially in the urban space. The introduction of new and sophisticated technologies requires more material resources and more efficient processes of used techniques. This paper is devoted to the special issue of the lack of parking, which is increasingly causing troubles day by day. This is a significant phenomenon in urban areas, due to a fulgurating progression of vehicle fleet in Algeria and a slow development of basic infrastructure. The design process to follow examines the match between supply and demand for parking zones. Thereby providing support for decision making in terms of appropriate parking policies. The proposed solution is based on the implementation of a design system of an Urban Transport Plan (UTP). This system consists in several steps, each one developing management applications, manipulation applications and control applications in the studied areas. The aim is also to provide assistance for the parking areas control, by means of Geomatics tools implementing a parking system integrated in the UTP.

This system refers to the designed DB and requires various stages. That is, an appropriate description of the system characteristics and an evaluation of the parking offer and demand (according to the use aggregated by location, schedule, duration, type of place, categories of occupants, etc...). This is ultimately the establishment of a parking database "**Parking_DB**".

KEYWORDS: Geomatics, GIS, Parking Systems, Parking Zones, Road Database, Urban Transport Plan