E–Planning

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INTRODUCTION

E-planning is the e-government concept applied to urban and regional planning. It is the widespread use of information and communication technologies (ICTs), especially the Internet, in the planning system. A planning portal is the access point in the Internet, frequently in the context of a public digital city project. E-planning allows the municipality to carry out a new set of activities or to implement traditional procedures in a new form, due to geographical information systems, computer aided design and database systems, among other tools mentioned, for example, in Mohamed, Meng, and Abdullah (2003), Budthimedhee, Li, and George (2002), Campagna and Deplano (2004), and Harrison and Haklay (2002). E-planning corresponds, therefore, to the passage from a paper-based urban management system to one based primarily on electronic means of information and communication. But it must be seen as more than a simple transfer to a computer system of the traditional paper based routines (Mohamed et al., 2003; Parsol, 2004), requiring also the re-engineering of procedures, the development of a fully integrated ICT back office and, as Harrison et al. (2002) suggest, changes in the nature of the planning process itself. The aims of e-planning, such as more generally all the other components of e-government (for example, OECD, 2003; Pascual, 2003), are to provide better public services, more efficiently, with lower costs and, at the same time, to do that through more participative, transparent and more accountable decision-making processes.

In its more basic level, the e-planning system only offers information and is, therefore, easier to implement. In its more advanced versions, where all or most of the planning services are delivered electronically, its implementation and daily management is not only a more complex task but it also involves more investment, as Couclelis (2004) notes for digital cities. According to the standards of e-Europe, the European Union (EU) initiative for the information society (CEC, 2000, 2002), the availability of public services online can be measured in relation to a framework of four levels of e-government maturity (CEC, 2004).

Applying this scheme to the planning sector, we can consider that the first level—information—consists only in the publication of digital information through the Internet, with few or no capacities to interact. In the second level of maturity—interaction—users of the system can communicate directly with the planning department by electronic mail (one-way interaction); it is possible to download planning applications, for example. In the third level—transaction—users and the planning department communicate electronically with each other (two-way interaction); it is possible to process planning applications and to authenticate them. In the fourth level—integration—there is a full electronic handling of all planning functions.

BACKGROUND

Main Characteristics of E-Planning

According to the previous framework, applied to this specific policy area, and taking into consideration the content of several planning sites in Europe, a standard full-developed e-planning portal is expected to provide general information about the functioning of the planning system, municipal regulations, and planning procedures and to include basic and specialised information on all aspects of the planning system, in its several scales—national, regional, and local—as well as, in the case of European countries, a supranational level. It is also expected to provide access to online planning services covering all stages of the development and control process: pre-application advice, submission of applications, consultation, e-petitions, commentaries, complaints, and planning decisions (for the UK example, see Parsol, 2004).

Other planning functions are also present such as the publication of local plans, technical reports, public participation files, monitoring and evaluation reports, and urban marketing campaigns. Urban plans are available in electronic format, allowing any citizen to visualise land use proposals through a public participation geographical information system (PPGIS) and to get a better understanding of all its potential consequences (Carver, Evans, Kingston, & Turton, 2001; Harrison et al., 2002). Detailed information on each parcel of land or building can also be available online, with restricted access conditions in what respects information on private persons (e.g., e-signa-

tures), allowing any local citizen to verify the situation of a process in which he or she has a stake. It must also be possible to make payment of services, fees, or taxes through the planning portal.

A planning blog, a digital newsletter, and mailing lists to distribute automatic e-mail updates about the Portal content are examples of e-planning tools that can be used to stimulate citizen involvement in decision making. But, as Carver et al. (2001) point out, it is not enough to make information available and to stimulate participation, it is necessary to provide information that can be understood by the local community, technology that a common citizen can use and to open the internal decision-making process (Harrison et al., 2002) applying, in practice, the Aarhus Convention on access to information and public participation in decision making (UN, 1998).

A section for children and youths, with information and games for different ages, organised around planning themes, should be included as a form to stimulate participation of young people in municipal and regional life (CoE, 2003) and, through that, to contribute in practice to the implementation of the UN declaration on the rights of the child, especially the right to express views freely in all matters affecting them (UN, 1989).

In an increasingly multicultural society a planning portal is also expected to have an English version and also versions in the main non-native languages present in the local community, if that is the only way to communicate with large sections of the immigrant population, as part of the moral obligation due to cultural diversity (UNESCO, 2001).

It can include an agenda of events related to planning such as, for example, public inquires or municipal boards meetings dealing with planning issues, and a process to measure citizen satisfaction with e-planning services, among other items. If not integrated or linked to a wider municipal Web site, the planning portal should also include general information about the municipality (e.g., geography, history, economy, culture), as well as about the municipal organisation (e.g., organisational chart, elected members, contacts, activities, including e-procurement related to urban management).

Strengths and Constraints

In relation to the traditional paper based planning system, e-planning presents several advantages, such as those mentioned in Mohamed et al. (2003) or in Yeh and Webster (2004), among other authors, and in several governmental reports, such as DoE (2003) and SE (2001), which are similar to those mentioned for e-government in general (OECD, 2003; Pascual, 2003): more accessible, efficient, effective, quicker, and with lower costs.

It is more comfortable for citizens because it reduces the number of direct contacts needed and time spent, as well as the administrative costs that affect small- and medium-sized enterprises. Planning information can be available permanently for planners and other staff, as well as for the public, in almost every place, if wireless communications are used. It makes easier to work from home, both for planners and for other people that need planning information. It needs less physical space for storage and tends to require less as technology improves.

E-planning has the potential to open up a new Era in public participation in planning, especially through the use of PPGIS (Carver et al., 2001; Harrison et al., 2002) and through the visioning of any area in three dimensions. It can make decision-making more transparent and accountable by allowing the development of a more informed opinion about urban or regional plans proposals, which can contribute to prevent NIMBY (not in my backyard) type of reactions during plan implementation, therefore increasing citizens' confidence in the planning system.

E-planning also faces several types of constraints (Campagna et al., 2004; Carver et al., 2001; Couclelis, 2004; Harrison et al., 2002; Mohamed et al., 2003, among others), not different from those usually referred for e-government in general, such as legislative and budgetary barriers, technology requirements and digital divide issues (OECD, 2003; Pascual, 2003), or the lack of staff's specific training in e-planning, which together can explain partially the difference encountered among municipalities or regions (Campagna et al., 2004), or among countries (CEC, 2004; West, 2003, 2004).

Examples of legal barriers are, for example, the copyright of cartographic bases (Carver et al., 2001), or the classified nature of public information (Mohamed et al., 2003), or the fact that the law requires, in several circumstances, that a communication needs to be done in paper form and by post, which limits the possibilities to use electronic communications (SE, 2003).

The migration from a paper-based system may face in some cases resistance from staff and local councillors, similar to those mentioned in Mohamed et al. (2003): departmental unwillingness to share information; implementation of e-planning solutions separately in each department, to address specific tasks, proving later to be difficult to link; to maintain information outdated in the planning portal.

FUTURE TRENDS

Future development of e-planning faces external challenges associated with the overall development of ICT sector and the expansion of the information society (e.g.,