Mapping land values

Two technologies are converging and could make a huge impact on the search for policies that support sustainable land management, writes Tony Vickers

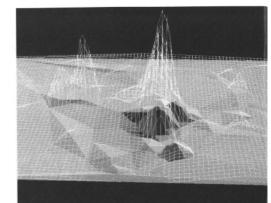
COMPUTER ASSISTED MASS Assessment (CAMA) within the property valuation field, and Geographic Information Systems (GIS) more generally, have the capability of bringing the intangible reality of global and local economic landscapes to life.

My task is to evaluate the potential of this new science – which I term 'ecomorphology' – in a UK-focused research programme at England's Kingston University. Countries have such a variation in their political, legal, cultural and technological status that it would be too complicated to draw conclusions as to the cost-effectiveness of value maps everywhere. In England, we have a peculiarly secretive and disjointed collection of publicly held information about land, with different ministers responsible for different parts.

If the information could be brought together and maintained, the potential is there to discover the 'economic signatures' of all kinds of physical interactions between mankind and nature, from moving a bus route to assigning special status to a high school, even to predictions on the sea-level effect of global warming.

It seems to me that for governments to attempt the complex task of managing land use sustainably without developing and exploiting value maps, alongside land use and topographic maps, would be like weather forecasters denying themselves barometers. Just because measurement of air pressure is more difficult than measuring temperature and precipitation and the phenomenon is itself unseen, does not make it less important.

Land values, as distinct from building values, are not created by the owner of a piece of land but by the entire community within which each site resides. There should be no privacy attached to land value maps: they are a reflection of the economic health and wealth of a community and not of



Downtown area of Toledo, Ohio

A lattice framework of building values is shown draped over a solid surface of land values. The basic data comes from the county assessor's files on real property values. These are based on actual market transactions.

individual effort. Land value maps can and ought to be in the public domain just like weather maps and street maps.

The property industry and its clients – effectively all of us – ought to demand that much more research goes into exploiting CAMA and GIS to ensure that this happens.

What goes around, comes around

A long-running dispute about who owns the rights to Monopoly has dogged the world's most successful board game. Ciaran Jennings reports on a new initiative involving an area on the board that is bound to raise the eyebrows of LVT supporters

SET IN THE heart of London's theatreland, Coventry Street was laid out in the West End in 1681 and is probably best known worldwide as one of the three yellow squares at the top of the Monopoly board.

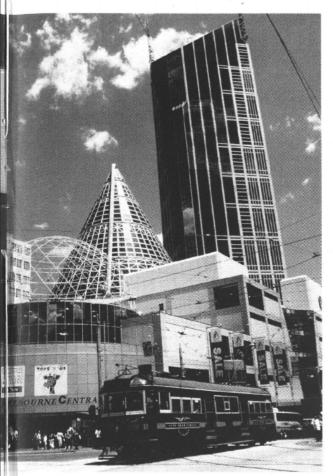
This is ironic for two reasons. First, the modern Coventry Street is today at the centre of a scheme to form a Business Improvement District (BID) that could prospectively be funded by a land value tax. Second, the game of Monopoly, which put Coventry Street on the world stage, has long been the subject of intense

wrangling over the nature of the game and who owns its rights. How did this arise?

In 1904, Lizzie Magie, a passionate supporter of Henry George's arguments for LVT, patented a game called the Landlords' Game. It was designed so that it could be played in two separate but connected ways. The aim of the first was for players to buy and sell property in such a way that the contestants attempted to bankrupt their opponents. The second way involved players adhering to the Georgist philosophy of communal benefit – the more land each player owned the more LVT he or she paid.

Some 23 years later, Dan Layman decided to develop an offshoot game, which he patented as Monopoly. Layman also patented his rewritten rules, which dispensed with the Georgist perspective and focused on the capitalist method. In 1934, Parker

Brothers bought the rights for Monopoly from Charles P Darrow, who had passed it off as his own invention. Parker Brothers had to buy the rights to Layman's game as well as the Magie version after they discovered these pre-dated Darrow's claim.



Victoria's land value maps will enable people to plan for the future

Land value maps in action

I WAS HIRED 18 months ago by the Valuer-General Victoria (VGV), the Australian local government agency which values land in Victoria, writes Connie Spinoso.

My job as spatial information analyst is to train valuers in the use of land value maps, which I am developing for the whole of Victoria.

These computerised maps will revolutionise the way land is valued. Valuers, politicians and tax administrators will all be able to see graphically how much the land across the area is worth. They will be able to plan for the future with a much clearer idea of the economic consequences of development.

The value maps will not only show how land was developed in the past and how values changed as a result, but should also give a model for how certain kinds of development will affect land values in the future.

As a result of a VGV strategy formed two years ago, all valuers working for the state are doing computer-assisted valuations. These allow us to use Geographic Information Systems (GIS) in value maps, meaning the land itself can be valued independently of the buildings on it.

This is needed for levying the land value tax, which accounts for A\$500 million from 300,000 mainly large commercial properties, although only three out of the 78 municipalities actually tax the land independently of the buildings.

The adoption of GIS is the linchpin to being able to use land value maps, as it is these systems that allow land to be tied to the theoretical value depicted on a land value map. The VGV itself tackled the adoption of GIS head on by launching a project last May to help 14 rural councils improve their digital map base.

This requires educating the valuers and council staff in the use of GIS, not only in collecting the data so that it can be used properly, but also in understanding and manipulating the system.

In 1974, Ralph Anspach, an economics professor, decided he wanted to show how business monopolies were a bad thing and how they could be dismantled. He based his game, called Anti-Monopoly, on Monopoly. General Mills, which had bought out Parker Brothers, went to court to stop him. Anspach lost his rights when judges ruled that his game was too similar in design to Monopoly.

The Coventry Street initiative is bound to raise some eyebrows among Henry George's supporters. BIDs are a Government initiative designed to get local businesses to work together and form a non-profit making management company to co-ordinate and implement development over a local area.

Coventry Street is one of five areas looking to become a BID as part of a scheme called the London Circle Initiative, and wants to run itself along the same lines as BIDs in the US. These tax property owners, sometimes using

LVT, to revitalise areas. The idea behind BIDs is to create a company to administer £4.6 million of Single Regeneration

Budget (SRB) money from the Government. Julie Grail, director of London Circle, says: "The Government has allowed a levy to be made on all businesses in a BID but the details aren't finalised. This would be based on the current rating list, so the burden would fall on tenants. The rating list could be used more effectively through making landlords pay as well. Landowners are keen to pay and get involved so that they have an influence over how the area is developed."

BIDs see companies working together for communal benefit. Perhaps Lizzie Magie has had the last laugh.



Coventry Street is best-known for its position on the board of the successful game, Monopoly, which has its origins in a game invented by avid Georgist Lizzie Magie in 1904