

Shared Space and Street Design

Emerging best practice for reconciling people, places and traffic

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The growing relevance of public space for the economic vitality of towns and cities has prompted renewed efforts to improve street design, and on ways to integrate traffic with civic activities. Pioneering work in a number of European countries including the United Kingdom is challenging many long-standing assumptions surrounding road safety, design speed and the segregation of traffic from pedestrian movement. The principles of “shared space” provide important opportunities for planners, urban designers and traffic engineers in Japan and elsewhere to redefine professional boundaries and responsibilities, and to establish a new streetscape vocabulary based on low-speed contextual design and place-making. This article reviews the background to these changes, and considers the implications of successful pioneering projects in the United Kingdom.

Streets are complicated places. They have to serve a range of functions, principally those associated with movement and traffic circulation, and those associated with interaction, exchange, and other social and civic activities. Reconciling the different functions of streets has been central to urban and transport policy throughout the developed world for the past century. This article explores an important change in assumptions and policy concerning traffic in towns that is rapidly transforming policy and practice for street design, especially in mainland Europe and the United Kingdom. It is a development that could hold significant opportunities for municipalities in Japan. The models imply a number of critical changes in the relationship between urban design, planning and traffic engineering. They also imply a different relationship between the state, communities, and individuals, which could initiate a very different role for the state in managing the interaction of people in the streets and spaces that make up the bulk of our public realm.

The renewed interest in streets and streetscape stems from economic realities. Until very recently, the markets around which towns and cities formed were functional necessities. Regardless of their intrinsic qualities, everybody had to partake in the interchange of goods, services and information provided by

markets, whether they wished to or not. Today, for the first time, individuals can obtain all their needs from out-of-town superstores, or from the internet. They can even maintain their social networks on the internet, if they so wish. Physical markets are becoming functionally redundant. The only reason village, town and city centres will survive is because they fulfill higher order needs – because we wish to congregate for wider social benefits. This change in the role of markets and urban centres has profound implications for the design and management of the public realm. It suggests a shift from functionalism towards and emphasis on distinctiveness of place.

Streets are not only complicated. They are also immensely important. In Europe, and even more in the USA, streets represent perhaps 80% of the public realm of the urban environment. The renewed interest in street design reflects the economic relevance of their role, and growing public concern about the intrinsic spatial quality of much of the public space they represent. For the majority of cities and towns, the design of streets has been dominated by the regulations and assumptions of highway engineering. The majority of these assumptions concern themselves with the safe and efficient movement of vehicles, and are built on ideas established during the first half of the 20th



Typical street clutter London

Century. From the CIAM Charter of Athens of 1928, through the urban manifestos of Le Corbusier, to the highly influential “Buchanan Report” of 1961 entitled “Traffic in Towns”, the principle of segregation of traffic from pedestrians developed as the foundation for urban streetscapes and safety. The familiar elements of pedestrian underpasses, bridges, barriers, traffic signals, signs and markings all stem from this principle.

Historically, streets have always seen informal and negotiated integration of traffic movement and pedestrian activities. Indeed, many streets around the world continue to operate through informal social protocols and negotiation. But it was not until the late 1960’s when pioneers in Denmark and The Netherlands began to challenge the principle of segregation, and to explore the potential for deliberately mixing social activities such as civic space and playgrounds with moving traffic. The earliest examples developed as the woonerf, residential streets designed to create low-speed environments where traffic movement was merely one of dozens of social functions. The



Woonerf Holland

model proved highly popular, spreading throughout Europe and eventually developing as home zones in the UK. The ideas has influenced key European policy documents such as the UK’s Manual for Streets (published March 2007), and has helped to re-establish the twin functions of streets as both PLACES, as well as corridors for movement.

More recently, a growing understanding of behavioural psychology and the factors that influence driver awareness and traffic speed has underpinned the emergence of “shared space” principles. These principles are now influencing the design and management of busier streets and spaces where traffic and pedestrians coexist, extending the potential for integration well beyond the quieter residential streets of the woonerf or home zone. The most notable pioneer of social integration as a principle for traffic engineering remains the late Hans Monderman, former Head of Road Safety for the northern provinces of the Netherlands. His practical and innovative ideas shifted the emphasis away from signs, road markings, signals and traffic regulatory devices,

towards an emphasis on place-making and subtle behavioural clues. At the same time, similar themes were evident in numerous European countries, as well as in North America.



Hans Monderman 1944-2007

At the heart of shared space lies a shift away from formal state regulation and control towards an emphasis on informal negotiations and social civilities. Such civil processes are clearly not appropriate for motorways and dedicated highways, and Hans Monderman was at pains to illustrate the critical differences between “the highway” and “the public realm” and for designers and engineers to clarify and signal the differences. Typical shared space scheme avoid any reference to highway infrastructure, such as standard signs, road markings, traffic signals, controlled pedestrian crossings, guardrails or other physical barriers. In its place street design builds on extensive understanding of the

distinctive qualities of place and the broader context. Drivers are provided with a rich and intriguing story that highlights and emphasizes the peculiarities of their surroundings. The resulting engagement of driver with place dramatically reduces speed and promotes informal interaction.

For many years, commentators and governments have been sceptical that simple design elements – designed to play to the intelligence of the driver rather than to treat him as a zombie – could really influence speeds and improve safety. But enough examples of streets based on shared space are gradually building a basis for observation and empirical research. Kensington High Street in West London continues to accommodate over 40,000 vehicles per day, with greatly improved pedestrian safety after the removal of all guardrails and most of the highway clutter. Pedestrians are encouraged to cross the busy road wherever they wish. Other schemes in Denmark, Germany, Sweden and The Netherlands have established the validity of the principles, demonstrating the potential for traffic engineering without all the expensive and disfiguring clutter of signals, barriers and markings.



Kensington High St.

But it is in the UK that the most significant progress has been made in recent years. New Road, a city centre street in Brighton, has been transformed into a spectacularly successful social and economic space through creating a low-speed environment for the buses, taxis, cars and vans that continue to use the street. And around the market town of Ashford in Kent, a former three-lane, one-way race track inner ring road has been transformed into a low-speed shared space environment where



New Road Brighton



Seven Dials London

pedestrians interact informally with the 12,000 vehicles that continue to use the streets each day. The Ashford scheme is the largest and most ambitious European scheme to date, transforming over one kilometer of the former ring road into a very different model for town centre streets. Traffic signals guard rails, and all road markings have been removed. In their place, a series of distinctive places at each intersection are linked by simple boulevards of visually narrowed carriageways bisected by informal “courtesy crossings”. The first 15 months of operation has seen traffic speeds drop to around 21 mph, and a significant drop in accidents and injuries.

If Ashford and other recent schemes have achieved anything, it is to demonstrate that alternative models for reconciling traffic with urban space are available. It allows governments and municipalities around the world, and especially in Japan, to question the necessity of expensive and disfiguring traffic control systems, such as traffic lights, barriers, signs and road markings. The popularity and quantifiable benefits for urban safety and



Ashford typical boulevard



Ashford place-making



Ashford Elwick Square

environment. An awareness of place and context, informed by an understanding of behavioural psychology, has implications for the education and training of engineers, planners and urban designers. There are important implications for the definition and response to safety and risk, as well as the need to appreciate techniques for place-making, transition points and entry gateways, and many other essential components of shared space. Finally, and perhaps most importantly, shared space suggests a new relationship between the state (in all its manifestations) and communities and individuals. The potential to create streets which foster an informal, unregulated relationship between all street users, whether drivers, pedestrians or cyclists, allows political leaders to propose a new vision for towns and cities that reflects their changing purpose. The streets and public spaces that constitute the public realm can accommodate traffic movement and vehicles, whilst promoting the essential urban qualities of social interaction and civility that characterize the world's most successful cities.



Simple Tokyo shared space

civility, and for the apparent reductions in congestion and delay for traffic, have excited and inspired communities and engineers across Europe and North America. The implications for Japanese planning are especially significant!

The introduction of shared space has a number of important implications for professionals, municipalities and for political leaders. Firstly, shared space implies a redefinition of the professional boundaries and responsibilities for urban traffic engineers and the design professionals responsible for the built

*Japanese translation is on the printed copy.