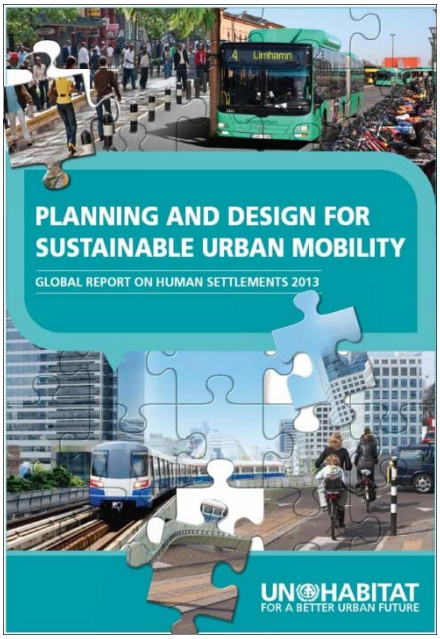
Planning and Design for Sustainable Urban Mobility: Global Report on Human Settlements 2013

Key messages

Need for a paradigm shift in urban mobility planning and policies



Planning for efficient movement by private cars has been the dominant transport planning paradigm for more than six decades. However, the collective ***costs of 'automobility'*** have become abundantly apparent – including urban sprawl, air and noise pollution, climate change, road traffic accidents, and the physical separation of people by class and race.

The GRHS 2013 thus calls for a ***paradigm shift*** to understand the role of transportation within cities. The purpose of 'transportation' and 'mobility' is to gain access to destinations, activities, services and goods. Transportation is a means, not an end. Thus, ***access is the ultimate objective of all transportation*** (save a small portion of recreational mobility).

Urban form is an essential component of urban mobility planning

The development of enhanced transportation systems is thus only one (of several) policy initiatives to enhance access. If city residents can achieve access without having to travel at all (for instance through telecommuting), through more efficient travel (online shopping or car-sharing), or by travelling shorter distances, this will contribute to reducing some of the current urban transport challenges. Thus, ***urban planning and design should focus on how to bring people and places together***, by creating cities that focus on accessibility, rather than simply increasing the length of urban transport infrastructure or increasing the movement of people or goods. The broadening of objectives to include accessibility, inescapably leads to a wider array of approaches to physical planning, including better land-use management.

Furthermore, a focus on more accessible cities, characterized by ***sustainable urban densities***, holds promise for drawing more and more travellers out of cars and onto trains, buses, bike paths, and sidewalks. Accessible cities encourage a ***shift towards more sustainable modes of transportation***.

Urban mobility planning needs to occur at different geographical scales, incorporating a multimodal approach

Yet, urban densities need to be carefully organized and designed, so that co-dependent land uses are near each other. Simultaneously, coordinated and integrated ***planning needs to occur at multiple scales***. Neighbourhood scale designs can minimize movement conflicts and allow non-circuitous travel, thus promoting non-motorized transport at the local level. Regional scale planning ensures balanced growth patterns that internalize trips within sub areas and

allows for efficient travel streams. Also critical, is a robust ***institutional framework and regulatory and planning tools*** that facilitate regional collaboration and cross-sector cooperation. Political visionaries attach great importance to inclusive planning frameworks that ensure that a voice is given to all segments of society, including vulnerable and disadvantaged population groups.

Priority should be given to non-motorized and public transport

High-capacity public-transport systems – such as metros and bus rapid transport (BRT) – are a necessary condition for the creation of sustainable urban mobility systems. However, such systems need to be designed and operated to allow seamless intermodal connections and integrated services and tariff systems. The system is the solution for urban mobility. The efficiency of an urban mobility system is not simply the sum of its individual parts. It is the efficiencies of an ***integrated mobility system*** that allows high-capacity public-transport systems and non-motorized transport to compete with the perceived advantages of 'automobility'. Furthermore, in an environment characterized by scarcity, it is essential that financial resources are allocated to the travel modes that are most efficient (for the society at large), and that cater to the needs of the majority of the population. Accordingly, the highest ***priority should be given to non-motorized movement and public transport***.

The integration of land-use planning and transport planning is an essential pre-condition for sustainable urban mobility systems

Cities need to envisage their long-term futures, crafting visions that are eventually articulated into spatial plans and specific-land use initiatives. ***The integration of transport and land-use planning*** is an essential pre-condition for sustainable urban mobility systems. A spatial framework should guide public transport and other infrastructure investments. In this respect, the channelling of higher urban densities along high-capacity public transport corridors – so called 'transit-oriented development (TOD) – is of particular importance.

Urban goods transport must be integrated in urban planning and design

In most cities, the neglect of urban freight distribution and management – both in land-use and transport planning –makes goods transportation a major impediment to sustainable urban mobility. Decisions regarding urban goods transport have, to large degree, been made within the confines of company boardrooms, rather than by urban planners. The business logic of goods transport favours fewer deliveries, with larger trucks, to destinations with larger storage areas. Thus urban goods transport has been a major driver of urban sprawl. Night or off-peak deliveries, freight stations and consolidation centres that allow shared-use of delivery vehicles, and bicycle carriers suited to the constraints of urban circulation, might be called for.

The 'business model' for urban accessibility is not as developed as for the one for urban transport

One of the challenges of moving from 'traffic' or 'mobility' approaches, and to integrate human rights and the essential component of equitable access, is that the 'business model' for urban accessibility is not well understood. Empirical and technical information related to ***measuring access*** – and the quantification of the economic and social value that it creates – is still to be integrated into urban agendas for the development of sustainable mobility systems.