

Fakultät Verkehrswissenschaften "Friedrich List" Institut für Verkehrsplanung und Straßenverkehr

Verkehrs- und Infrastrukturplanung



Prof. Dr.-Ing. Gerd-Axel Ahrens

Sustainable Urban Mobility Planning in Germany – Example

Conference
Sustainable Urban Mobility Plans –
Current Approaches to Mobility Planning

THE PRAGUE INSTITUTE OF PLANNING AND DEVELOPMENT

Prague, June 26, 2014

Examples Dresden in comparison with other cities

- Berlin
- Hamburg
- München
- Dresden
- Leipzig
- Magdeburg
- Bremen

Google: name of city

Verkehr and/or Mobilität

www. [name of city] .de

Click to Mobilität, Verkehr or VEP

Forschungsgesellschaft für Straßen- und Verkehrswesen (FGSV): Hinweise zur Verkehrsentwicklungsplanung. Ausgabe 2013. ISBN: 987-3-86446-058-6 (Translation into English available in February 2015 through Prof. Ahrens)

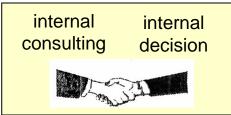
EU: www.mobilityplans.eu

Co-operative planning

Formal planning processes: Participants and processes are regulated by law. Further participation is possible (e.g. land-use plan, public transportation plan)

Other informal planning processes: Not regulated by law. How communication and participation is organized is developed by the planers (e.g. general transport plan, individual plans)

conventional way of planning







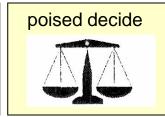
Implementation?

?

co-operative planning



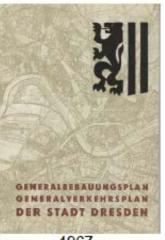
Pick up information open consulting

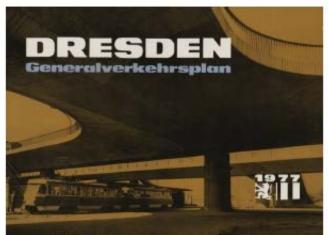


Implementation

Long tradition of Transport-Master-Planning in Dresden









1950

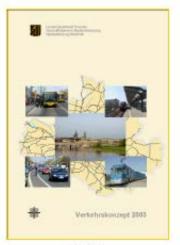
1967

1977

1989









1990

1994

2003

2007

Source: Mohaupt, M.: Verkehrsentwicklungsplan 2025plus (VEP) der Landeshauptstadt Dresden. Presentation at POLIS-Jahreskonferenz November 29, 2011 in Brussels

Dresden's mobility strategy since 1990

City development and transport

Transport infrastructure

Transport management

Mobility management

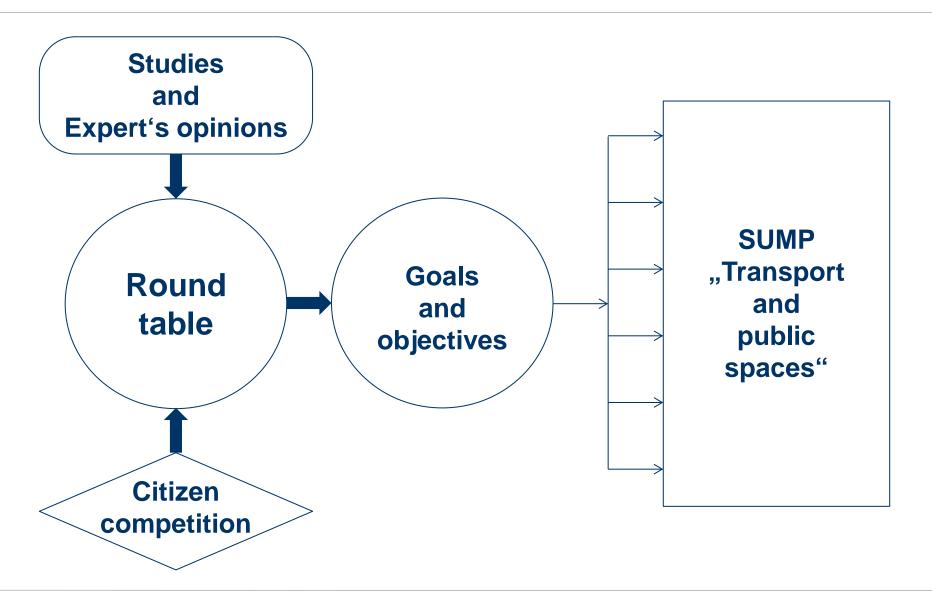
SUTP Dresden 2025+ The new strategy bridge

SUSTAINABLE URBAN TRANSPORT PLAN

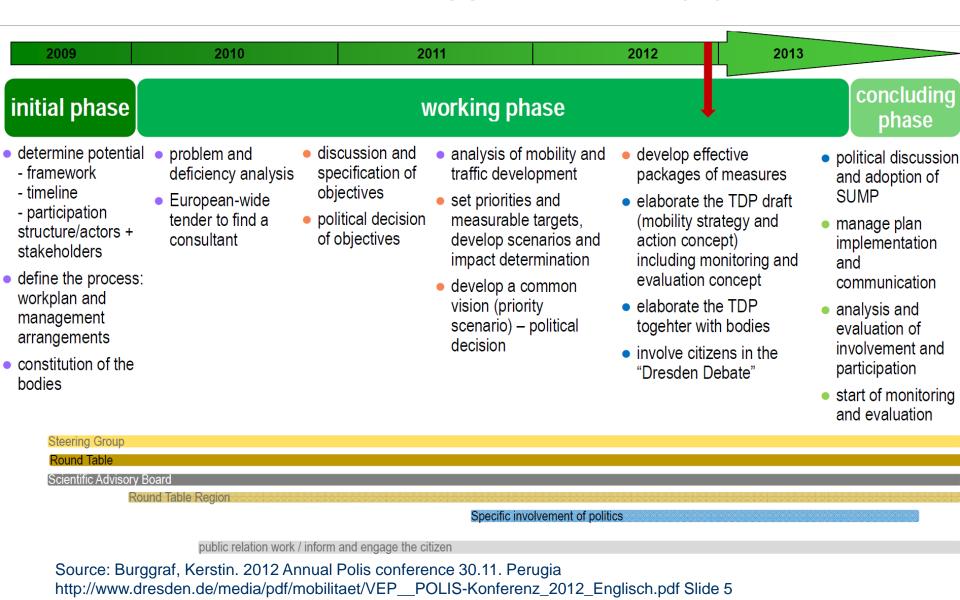
Clean Air Plan Noise Action Plan Transport measures and concepts

Public Transport Plan Further sector plans related to traffic and transport

SUMP-planning process in Leipzig



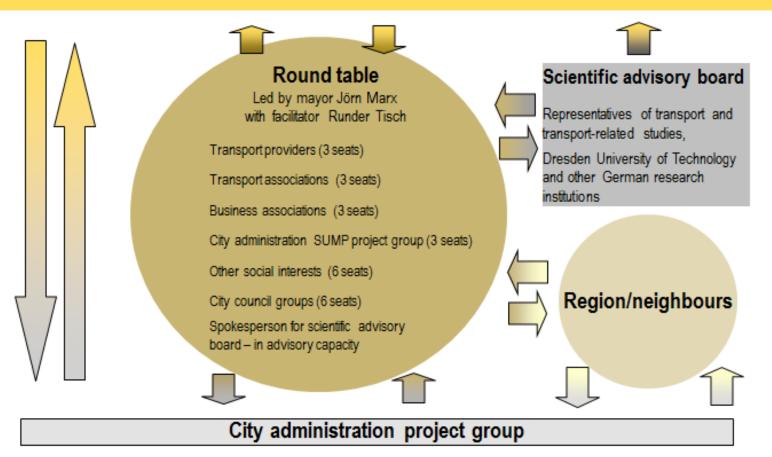
Tasks in detail – SUMP Dresden 2025+



SUMP Dresden 2025+ - Communication and cooperation

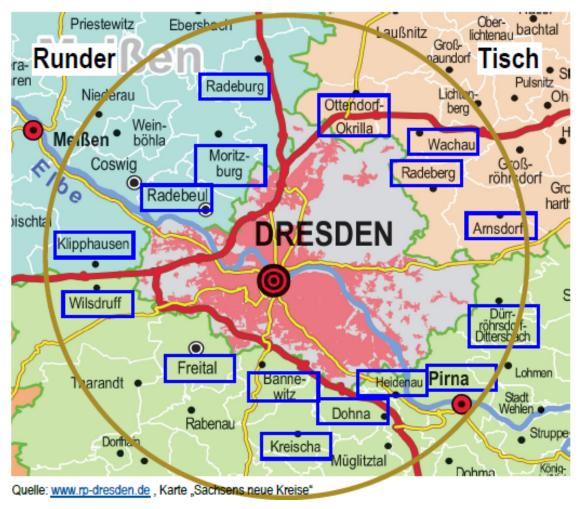
Steering committee led by mayor Jörn Marx

Representatives of city council groups, heads of department, City of Dresden officials, councillors, project managers, round table facilitators



Source: Mohaupt, M.: City of Dresden 2025 plus, sustainable urban mobility plan (SUMP), Annual POLIS conference 2011, 29. November 2011, Brussels

Round table with neighbouring communities in Dresden



- Landkreis Bautzen
- Landkreis Meißen
- Landkreis Sächsische Schweiz-Osterzgebirge
- SMWA
- LD Dresden
- Straßenbauamt Meißen-Dresden
- Straßenbauamt Bautzen
- VVO
- MDV Mitteldeutsche Verkehrsverbund GmbH
- Verkehrsverbund Oberlausitz-Niederschlesien GmbH
- Euroregion Elbe/Labe
- Regionaler Planungsverband Oberes Elbtal/Osterzgebirge
- Regionaler Planungsverband
 Oberlausitz/Niederschlesien

Source: Mohaupt, M.: City of Dresden 2025 plus, sustainable urban mobility plan (SUMP), Annual POLIS conference 2011, November 29, 2011, Brussels

Working steps in Dresden and Bremen

	External dialogues		
1 Goals and objectives	Summer 2010 council decision spring 2011 Round table Scientific advisory board City council	Summer 2012 Citizen meetings Agencies of public interest	
Analysis: Chances & insufficiencies	Summer 2011 Round table Scientific advisory board Internet, press and public meetings	Winter 2012/13 Online dialogue Regional work groups Agencies of public interest	
3 Scenarios: Development of measures	Autumn 2011 Round table Scientific advisory group City Council (decision Sept. 2012)	Late summer 2013 Online dialogue Citizen meetings Regional workgroups Agencies of public interest	
4 Effects and evaluation of measures	2012 to Autumn 2013 Round table Scientific advisory board Dresden Debate [information container + online dialogue]	1st quarter of 2014 Online dialogue Citizen meetings Regional workgroups Agencies of public interest	
5 Draft SUMP-concept (Decision of city council)	since Autumn 2013 political decision since January 2014 in debate	2nd quarter of 2014 Online dialogue Citizen meetings Regional workgroups Agencies of public interest	
	Dresden 2025+	Bremen 2025	

Preamble

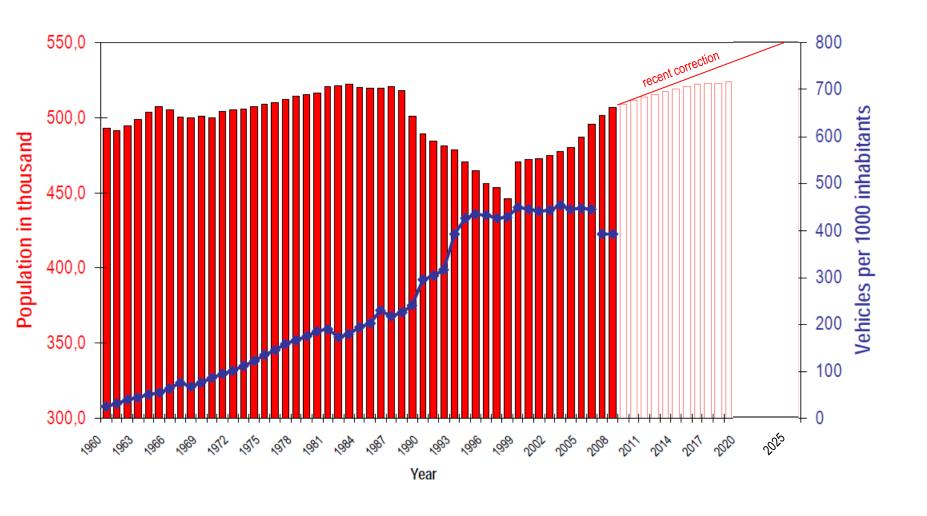
- 1. Transport is not an end in itself! Its purpose is to improve residents' mobility and support the city's economy. Both these aims require a free choice of transport mode.
- 2. Maintaining mobility in a way that is affordable, safe and eco-friendly is an issue of primary importance for all of society. The process should be implemented by consensus and with as little dirigisme as possible.
- 3. Equality and the right to physical integrity are laid down in the german constitution. The duty to strive towards achieving equal living conditions is also established in thistitution of the Free State of Saxony. Both are essential guidelines for modern and future transport development.
- 4. The development of mobility and transport is subject more than ever to global influences: economic fluctuations, limited fossil fuel resources, rising energy prices and climate change. Transport development planning needs to find answers to this.
- 5. The same is true of the effects of demographic change, producing new demands when it comes to the necessities of life, transport and mobility.
- 6. The transport infrastructure needs to be maintained and developed in a way that pays particular attention to the cost-value ratio.
- 7. National and European laws and directives set out the fundamental conditions for transport development planning. The City of Dresden will actively shape these conditions.

Criterion 1 Enduring, sustainable and eco-friendly transport and mobility standards for citizens and the economy	1.1	Setting standards for accessibility and development on a city district level – especially district hubs – taking all modes of transport into account
	1.2	Attaining high-quality development and accessibility for ecomobility transport within the entire city area
	1.3	Ensuring that social and cultural institutions and everyday destinations are accessible
	1.4	City-friendly transport development which is conducive to business and tourism
	1.5	Giving precedence to ecomobility in central areas
	1.6	Improving the situation, accessibility and design of interfaces between motorised and non-motorised private transport, local public transport and long-distance passenger rail services
	1.7	Barrier-free adaptation of links between local public and private transport (cycle, car, pedestrian traffic), taking into consideration the needs of people with restricted mobility
	1.8	Ensuring that there are sufficient short-stay cycle and car parking facilities at the main access points to local public transport
	1.9	Improving regional rail and bus connections (DB, DVB, VVO) by extending networks and raising frequencies
	1.10	Optimising access to Dresden for long-distance travellers by improving interregional transport connections (air and rail transport) and integrating them into European transport corridors, taking into account regional development planning
	1.11	Supporting innovative transport solutions and technologies, such as electromobility
	1.12	Improving information and signage system for compatible ecomobility transport and tourism in the Dresden metropolitan area
	1.13	Developing and perpetuating quality-based transport management
	1.14	Ensuring that both existing and new commercial locations can be accessed on defined routes
	1.15	Directing long-distance road goods traffic along specially selected routes by means of indicators on higher-order access roads
	1.16	Promoting cooperation between transport providers in the field of business transport; developing the goods transport centre by adding modules for road and rail transport, IWT and logistics

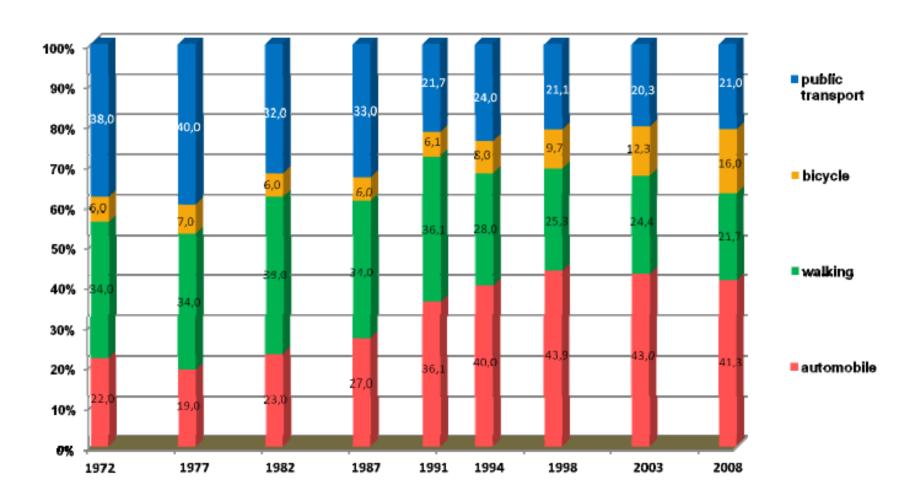
Criterion 2 Socially just participation in mobility – taking into account specific needs resulting from differing living conditions – and thus equal opportunities for everyone to take part in society	2.1	Guaranteeing access to transport networks and means of transport for people with restricted mobility and on low incomes, including improving the options available for their use
	2.2	Ensuring that stops are accessible and access to local public transport is barrier-free; providing necessary information on means of transport, especially for people with restricted mobility
	2.3	Promoting independent and safe mobility for children, young people and the elderly
	2.4	Raising the safety of all transport users by adapting or redesigning transport facilities which are critical to safety (aiming to halve the number of injuries and avoid traffic deaths)
Criterion 3 Achieving and maintaining high quality levels regarding the city and the environment by raising the efficiency of integrated transport systems and reducing the use of natural resources for transport purposes	3.1	Improving living quality in city districts by reducing disturbances caused by traffic, for instance by traffic calming measures.
	3.2	Improving city image, making streets and squares more pleasant to use and improving the usability of the living environment
	3.3	Creating closer connections between sustainable transport and city development planning, taking into account local climate goals
	3.4	Giving precedence to development within the city, putting everything within easy reach
	3.5	Reducing the burden of through traffic on the city centre and residential areas, instead shifting traffic onto the high-quality network of thoroughfares
	3.6	Space-saving construction and conversion, deconstruction and unpaving on transport areas which are no longer required; developing best practice models
	3.7	Cross-linking private and public passenger transport when putting through new transport plans
	3.8	Striving to further raise the percentage of the modal share taken up by ecomobility (local public transport, cycle traffic, pedestrians)

Criterion 4	4.1	Taking into account and integrating both regional and national plans in this field
SUMP to be an open planning and decision-making process taking into account transport engineering, associations, transport providers, other social groups, officials, concerned citizens and various technical disciplines	4.2	Regularly checking and adjusting goals; monitoring and evaluation as fixed elements of this process
	4.3	Providing continual information about important transport parameters (e.g. traffic pollution, number of users of different modes of transport, number of accidents)
	4.4	Providing information und balancing interests at an early stage when planning and implementing transport interventions
	4.5	Greater cooperation on a local and regional level
	4.6	Interdepartmental and interdisciplinary linking of transport-relevant spheres of action (e.g. transport/urban/environmental/open area planning)

Population and motorization



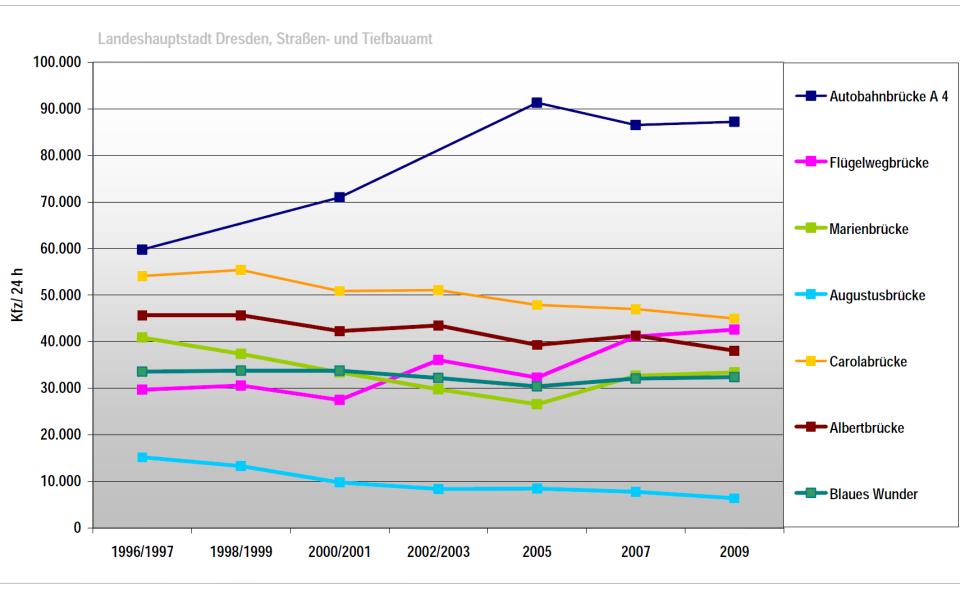
Modal split in Dresden



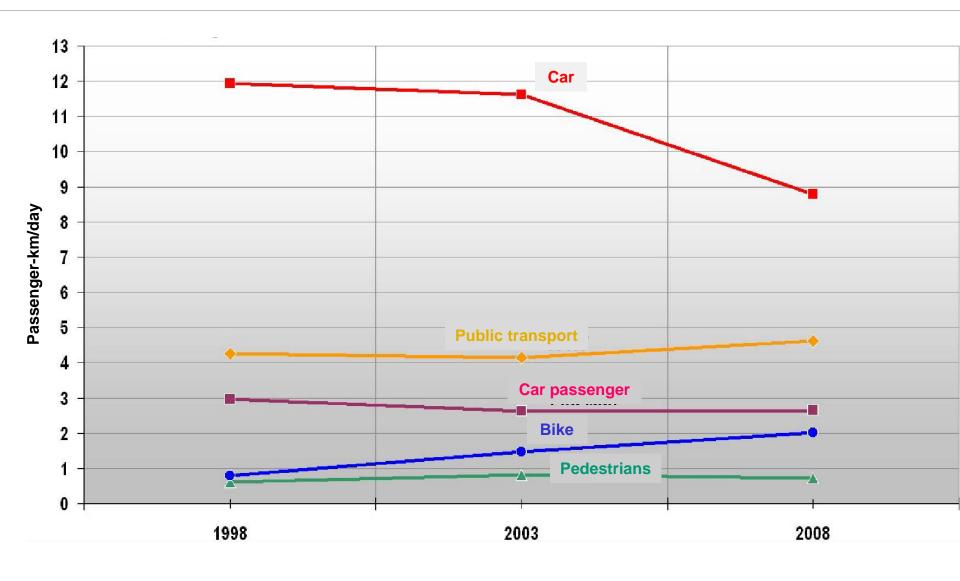
In 2008 37 % of Dresdens housholds had no private car!

Mobility in cities - SrV

Traffic volumes on Labe-bridges in Dresden



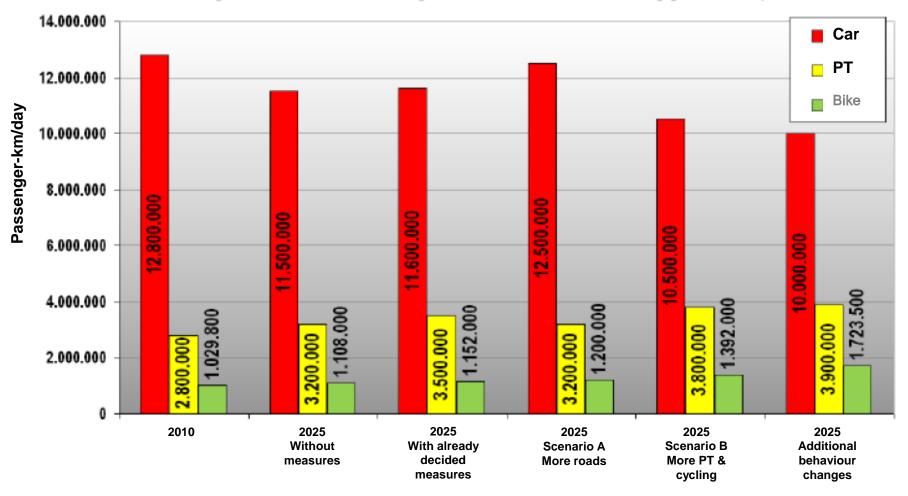
Changes of travelled km by mode



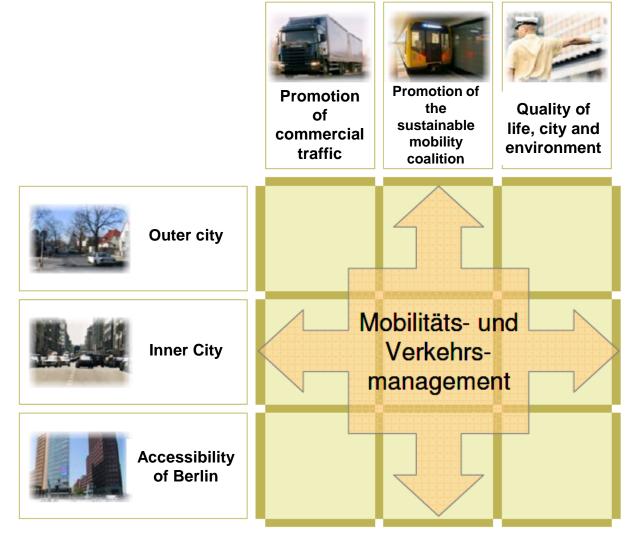
SUMP Dresden 2025+ - results of scenarios

Passenger-km car/PT/bicycle in Dresden

Quelle: Szenarienberechnungen VEP Dresden, Pkm/d im Stadtgebiet Dresden, Annahmen für Besetzungsgrad/ Rad-km/d)

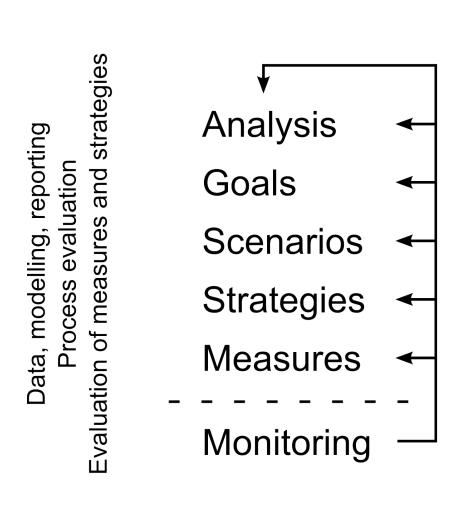


Strategy-levels of the Mobility Plan Berlin



Source: Senatsverwaltung für Stadtentwicklung Berlin, Stadtentwicklungsplan Verkehr Berlin, June 2011

SUMP-process



public Information of policy, administration and public and administration policy, Participation of

Lessons learned

- Allow much time for discussion and elaboration
- Transparency and target orientation
- External experts are helpful but involvement and identification of administration and decision makers is more important
- Internal and external cooperation need organisation
- Public relations is a continuous task
- Consensus oriented processes need the involvement of politicians and leading administrators
- SUMP is a continous process
- Clear goals and strategies
- Use of scenario techniques
- Integration of soft measures
- Quality management: Evaluation and control of success

Thank you for your attention!



Prof. Dr.-Ing. Gerd-Axel Ahrens

+49 351 / 4633 29 75 gerd-axel.ahrens@tu-dresden.de www.tu-dresden.de/srv