LOCALISATION OF SHOPPING MALLS IN SCANDINAVIA
Planning regulations as a policy instrument for reducing greenhouse gas emissions

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Background

• A pronounced international goal to:
  – Make urban development more sustainable
  – Reduce GHG emissions and avoid global warming (Kyoto Protocol, UN, EU)

• At the same time the GHG emission is still increasing

• To prevent catastrophic and irreversible climate changes, reduce GHG emissions by 50% to 80% by 2050 (IPCC 2007)

• Transport is a large and growing source of GHG emissions
Localisation of shopping malls

• Trend in Western European countries:
  – More retail businesses concentrated in fewer and bigger shopping malls at the outskirts of the urban areas

• Researchers suggest:
  – A clear interaction between location of shopping malls and choice of transport modes

• According to these, shopping malls outside city centres:
  – Generate longer trips and more traffic by car
  – Leads to urban sprawl and limit accessibility for people without a car

• Several European countries have adopted planning guidelines aiming at:
  – Controlling development of shopping malls
Objectives of the study

• “Dislocated” shopping malls contradicts common goals to reduce GHG emissions

• The study will show:
  – Why localisation of shopping malls are important in mean to achieve the goal for a reduce in GHG emissions?
  – How adopting planning policies can contribute to achieve this goal?
Development in traffic volumes

• Many factors affect the development of traffic volumes, i.e.: economic development, labour force participation, growth in population

• An interdependent relationship between the development of:
  - Land use
  - The transport system
  - Travel behaviour

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To reduce traffic volumes
  - Efficient land use and transport system, that influence the travellers’ behaviour in the right direction
What should be done?

- Promote an efficient land use and transport planning that:
  - Reduce the transport demand

- Favour more environmentally friendly modes of transport
  - Reduce the use of cars
  - Promote public transport, cycling and walking

Car traffic volumes can be reduced by:
- Fewer trips
- Shorter distance
- Less vehicle kilometre (vkm)
- Low car modal split (shifting modal split towards public transport, cycling and walking)
How?

• An efficient land use depends on two factors:
  – Density: high population density
  – Location: “right” location of “right” activities, mix of functions in the city centre

• Leads to:
  – concentrated cities
  – shorter distance between different functions within cities
    (reduced travel distance)

• Makes it possible to use public transport and non-motorised means of transport
  (walking and cycling)

• At the same time we avoid:
  – Urban sprawl
  – Car dependency
  – Limited access for people without car

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How?

The transport system must prioritise:

- Walking and cycling in shorter trips
- Improve the public transport service
- Apply restrictive policies for car use
- These actions must be combined!
Shopping malls in Scandinavia

- Trends in shopping malls development in Scandinavia contradicts the theoretical approach
- More retail businesses in Scandinavia are located at the outskirts of the urban areas and result in independence of car

Some example of surveys:

Denmark (TetraPlan 2006)
Shopping malls outside city centre: car is dominant means of transport in the inner city: reached by walking or cycling

Sweden (Vägverket 2006)
Shopping malls outside city centre gives four times as much CO2-emission as the mall inside city centre

Norway (Hanssen 1998, Nielsen 2008)
Shopping malls outside city centre: car dependency up to 95 %.
within the city: car dependency at 20 %

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These examples show:
• It is a clear interaction between the location of the shopping centre and choice of transport mode
• Location matters for the travellers’ behaviour
• Shopping malls must be situated centrally, in order to use environmentally friendly modes of transport.
Adoption of planning policies

• How can planning policies contribute to stop this development?

• Case study of planning policies in Denmark, Sweden and Norway

• Similarity in
  – social and cultural relationship
  – economic growth
  – institutional framework and administrative level for development issues

• There are some geographical differences between the countries, i.e: topography, urban structure, population density

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Regulation
- Traditionally strict control of establishing location retail trade
- Regulations implemented in Danish planning (1997)
- Regional authorities (counties) have responsibility to work out planning policies for the local authority (municipalities) in regional plans
- Not allowed shopping malls > 3500 m² outside of city centres
- Define geographic boundary (on maps)
- Corresponding boundaries are required for the municipality plans
- The Ministry of the Environment has a legal right for raising an objection

Result
- High extent of county planning
- Most shopping malls within city centres

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Result - Sweden

• Regulation
  – No limit for location of shopping centres
  – The municipalities have self-determination
  – “Planning-monopoly” in municipal plans and detail plans
  – Limited opportunities for governmental intervention

• Result
  – None or weak county planning
  – Fragmented municipal plans without comprehensive perspective
  – Competitions between municipalities
  – Increase of shopping malls in suburban areas, and along major roads

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• Regulation
  – National Policy Guideline for co-ordinated land use and transport planning in 1993
  – A temporary probation for shopping malls > 3000 m² in suburban areas in 1999
  – No geographical boundary on maps
  – The regulation ended and was replaced by regulations at the regional level in 2004
  – Variation in the counties’ implementation of regulation led to new regulation for
    shopping malls > 3000 m² in 2008

• Result
  • “Back and forth-politics”, location of shopping malls in suburban areas and along
    major roads
  • As a result of the temporary probation, malls located in the centre of cities has had
    the biggest growth since 2000
  • The new regulation seem to prevent further establishment of shopping malls outside
    of city centre
  • Planned shopping malls in suburban areas are being stopped
Table 1. Characteristics of regulation policies in Denmark, Sweden and Norway.

<table>
<thead>
<tr>
<th></th>
<th>Level of administrative control</th>
<th>Planning policies extent: strict vs. liberal</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Denmark</td>
<td>Central (National government/Ministry of the Environment)</td>
<td>Strict</td>
<td>Few or none shopping malls outside of city centres</td>
</tr>
<tr>
<td>Sweden</td>
<td>Local (municipality)</td>
<td>Liberal</td>
<td>Several shopping malls outside city centres and along main roads</td>
</tr>
<tr>
<td>Norway</td>
<td>County/ Municipality</td>
<td>Liberal-strict-liberal-strict</td>
<td>Several shopping malls outside of city centres and along main roads</td>
</tr>
</tbody>
</table>
Conclusion

• Planning policies should be:
  – Consistent and persistent
  – The responsibility
    • Controlled by the national government
    • Embedded at all administrative levels (counties and municipalities)

• “Look to Denmark”
  – Achieved an sustainable urban development
    • Shopping malls within the city centres
    • Can be reached by more people and by environmental friendly transport modes

• It is possible!
  – To promote the use of environmental friendly transport modes for shopping trips
  – Maintain viable cities with a variety of shopping and activities

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Thank you for your attention!

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