



Polycentric structures in practice

The experience of the Parkstad Region (Limburg, The Netherlands)

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www.poly-sump.eu



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Outline

- **Description of the region**
 - Population trends
 - Settlement structures
- **Mobility patterns**
- **Poly-centric profile (spider diagram)**
- **Assessment: Barriers, drivers and chances towards sustainability**
- **Next activity!**





Parkstad – Description of the region

- 211 km²
- 8 Municipalities
- Living: 47% urban area
- Employment: 63% urban area
- 255 thousands inhabitants
- 5.1% unemployment rate

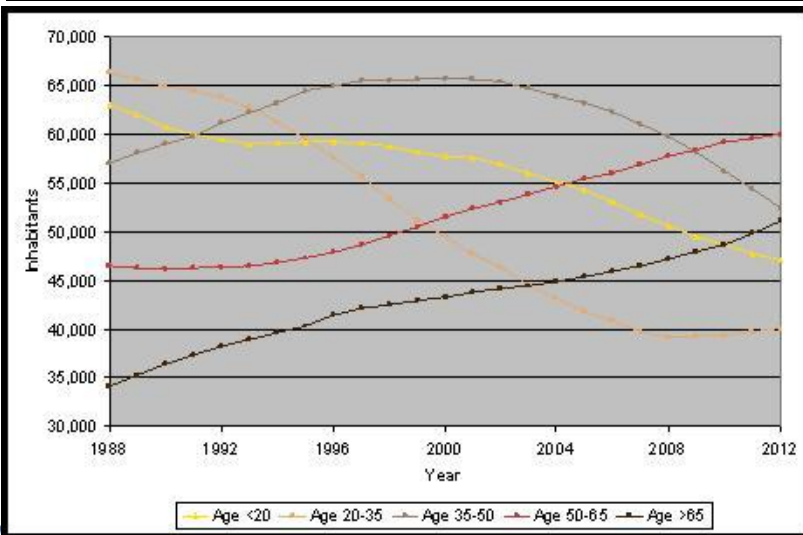
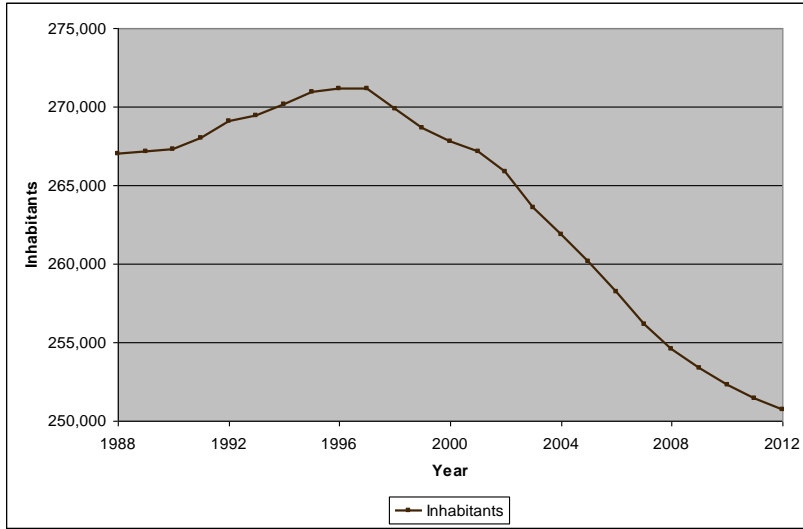


Source:
<http://www.parkstad-limburg.nl/>

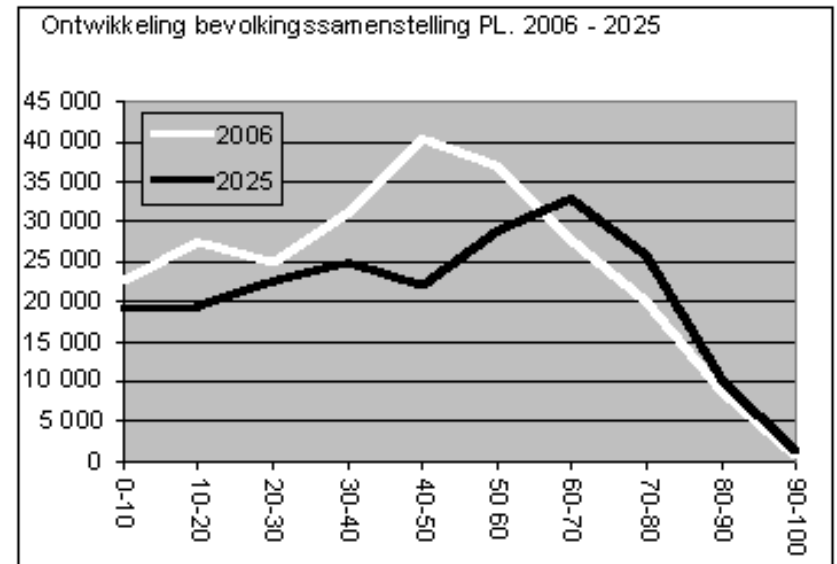


Population trends

Historical data



Forecasts

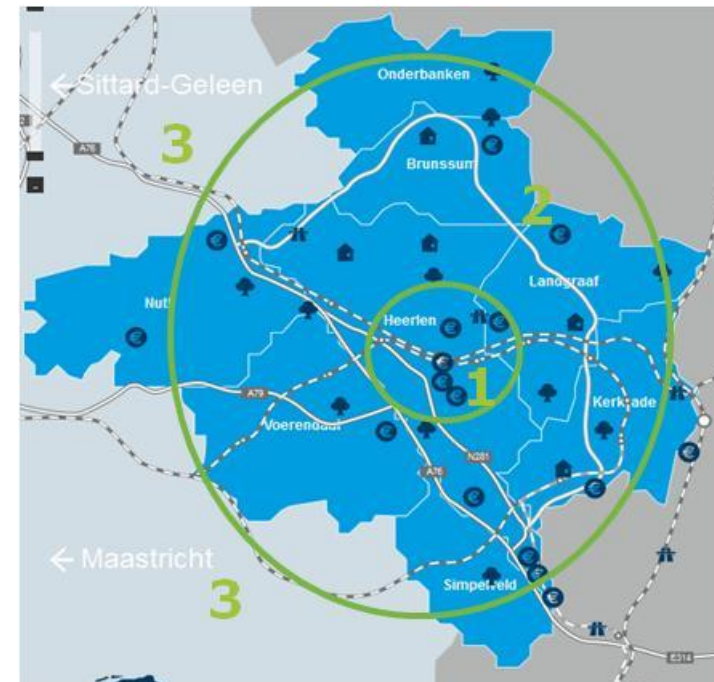




Polycentric Parkstad

- **Defining the region**
 - 3 poles
 - Heerlen
 - Brunssum, Kerkrade, Landgraaf, Nuth, Onderbanken, Simpelveld, Voerendaal
 - Sittard-Geleen, Maastricht

Source:
<http://www.parkstad-limburg.nl/>

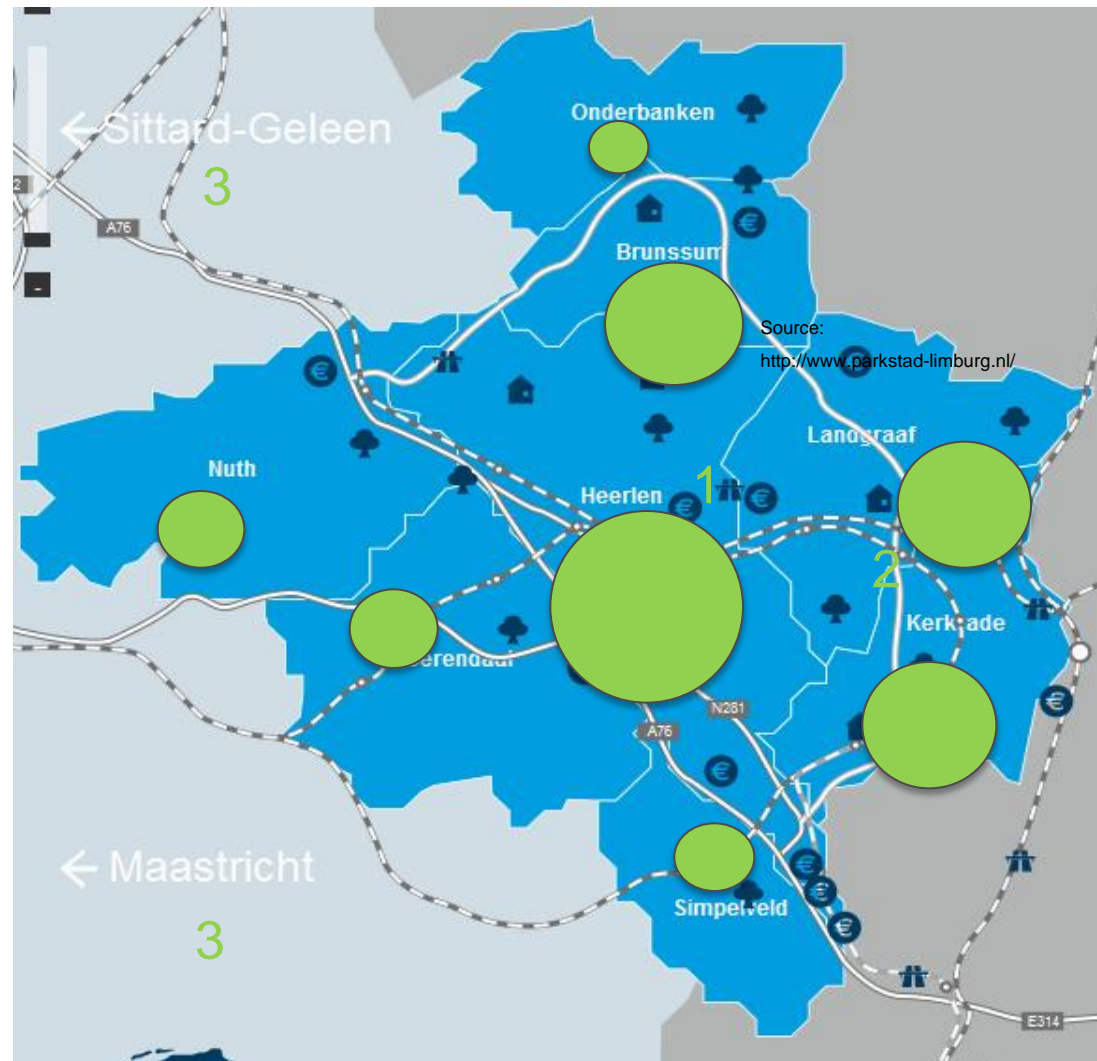




Polycentric Parkstad

- Defining the region
 - Population

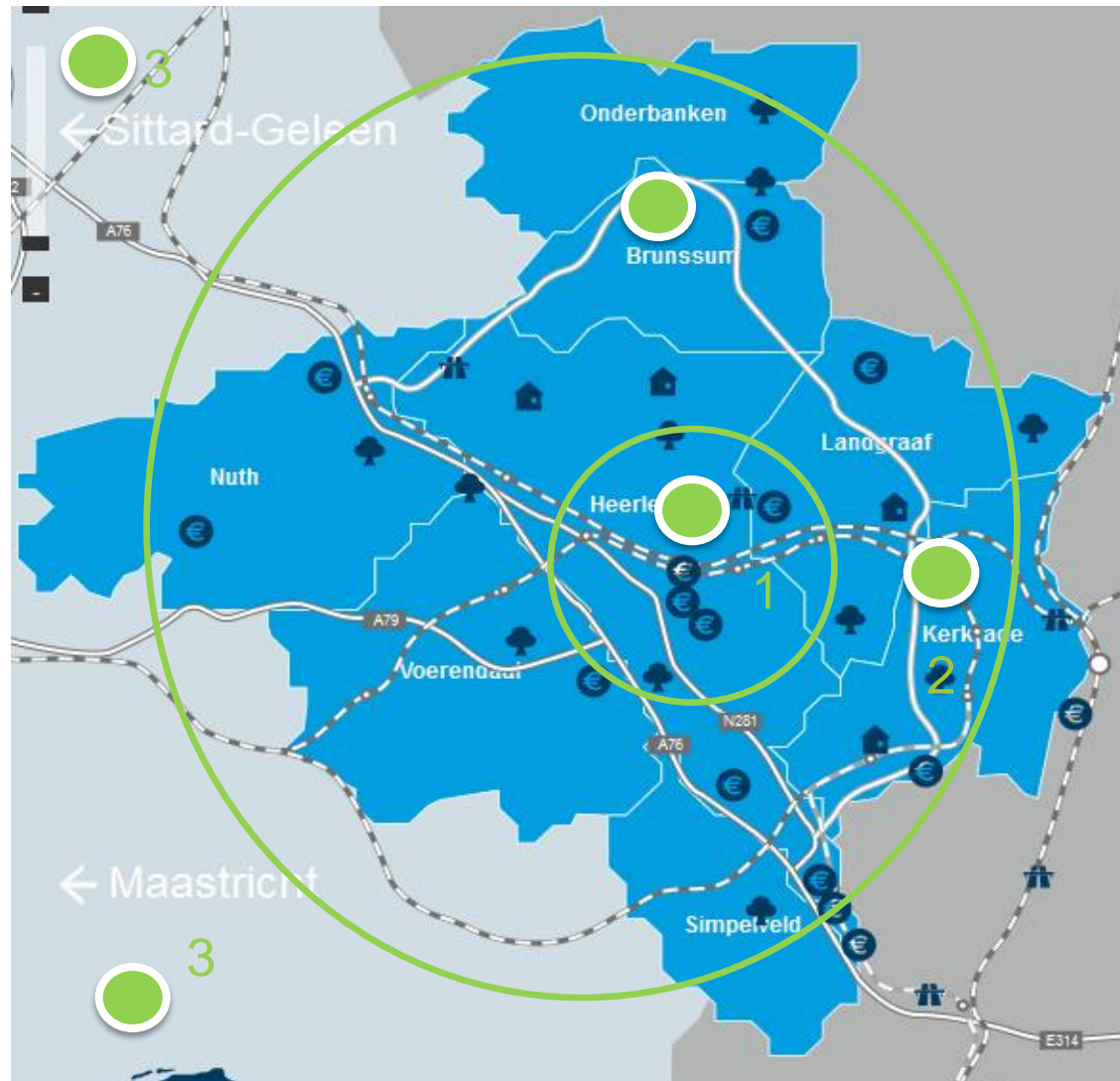
Onderbanken	8,016
Simpelveld	10,953
Voerendaal	12,664
Nuth	15,595
Brunssum	29,375
Laandgraaf	38,186
Kerkrade	47,409
Heerlen	89,212
Sittard	94,533
Maastricht	121,010
Total	466,953





Polycentric Parkstad

- **Defining the region**
 - **Health**
 - 3 health centres in Parkstad
 - 2 outside the Parkstad ring

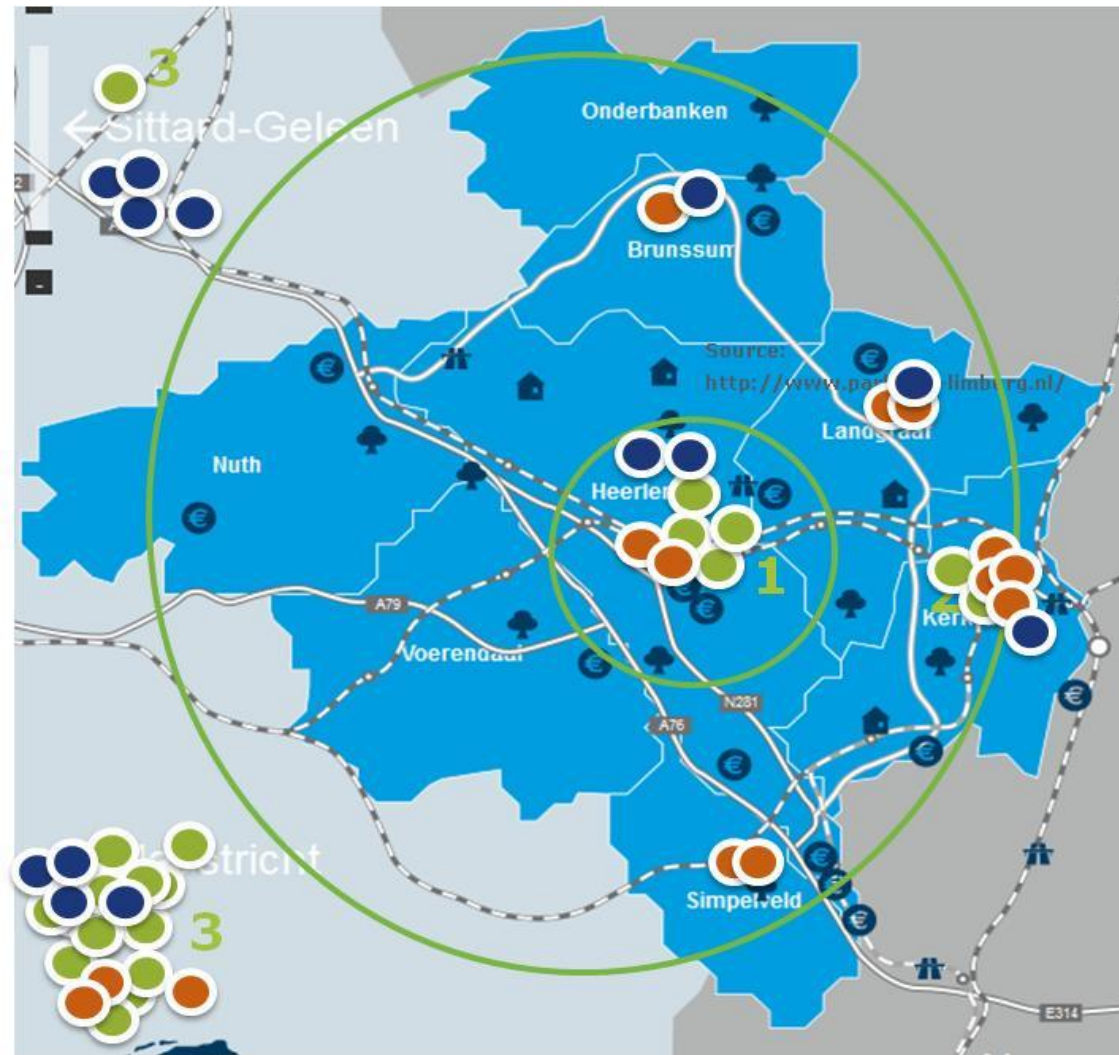




Polycentric Parkstad

• Defining the region

- **Culture**
- 15 museums 
- 17 music podia 
- 14 theaters 
- 3 cinemas
- Attraction parks 
- Galleries, art houses etc.





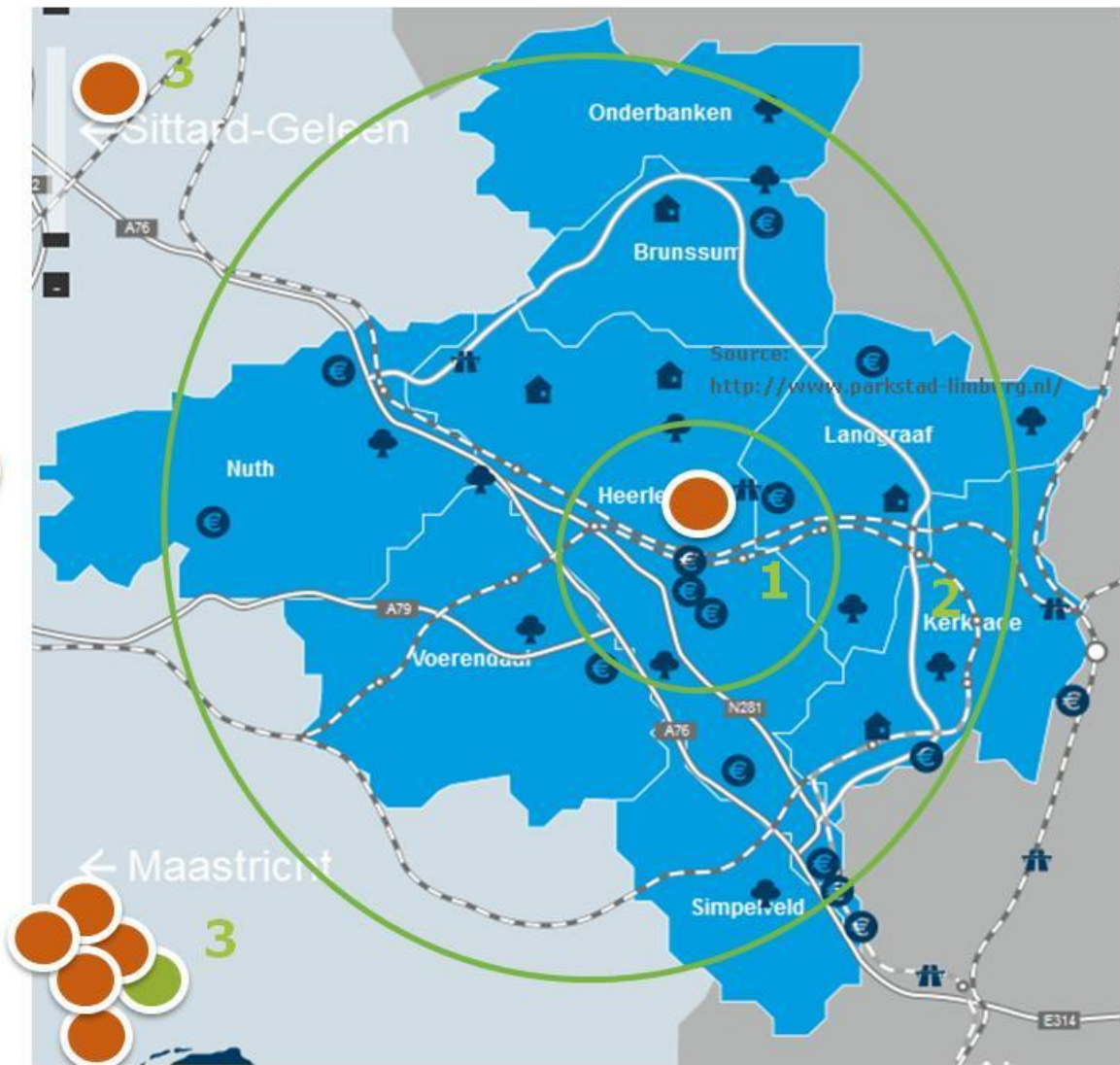
Polycentric Parkstad

- **Defining the region**

- **Studies**

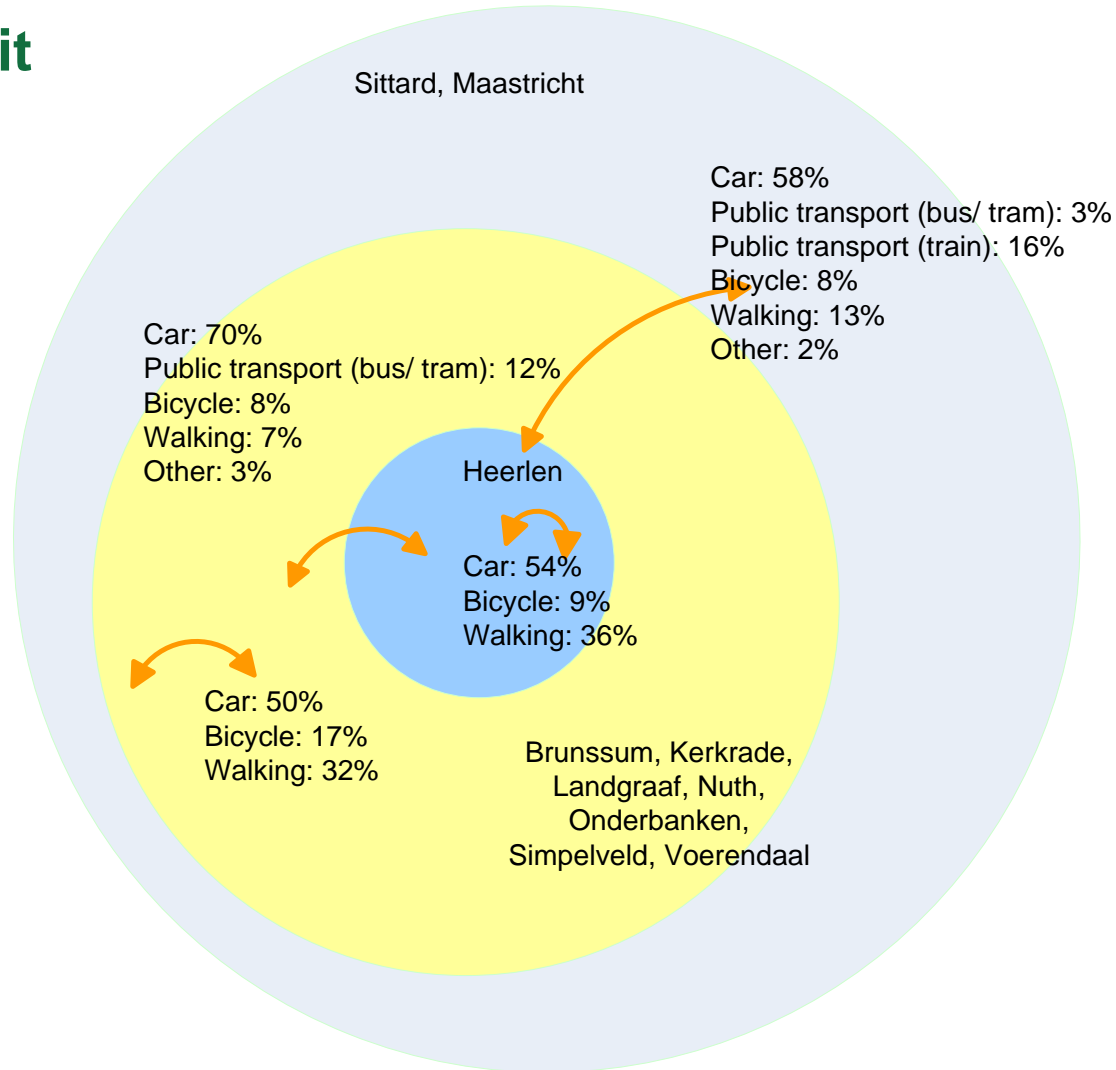
- University 

- Higher education 





Modal split





Travel patterns according to purpose

- Work

Work		Destination		
		Pole 1	Pole 2	Pole 3
Origin	Pole 1	60%	32%	8%
	Pole 2	27%	54%	20%
	Pole 3	4%	13%	84%

- Leisure

Leisure		Destination		
		Pole 1	Pole 2	Pole 3
Origin	Pole 1	76%	23%	1%
	Pole 2	12%	84%	4%
	Pole 3	0%	3%	96%

- Healthcare

Healthcare		Destination		
		Pole 1	Pole 2	Pole 3
Origin	Pole 1	71%	27%	2%
	Pole 2	14%	79%	7%
	Pole 3	1%	3%	96%

- Studies

Studies		Destination		
		Pole 1	Pole 2	Pole 3
Origin	Pole 1	60%	23%	17%
	Pole 2	15%	76%	9%
	Pole 3	8%	8%	85%



Parkstad polycentric profile

Density of population

Share of non motorised trips

Modal split share of non motorised modes (working day)

Share of PuT trips

Modal split share of public transport (working day)

Average distance to recreation

average distance to recreation

Average distance to work

average distance to workplace

Distribution of inhabitants

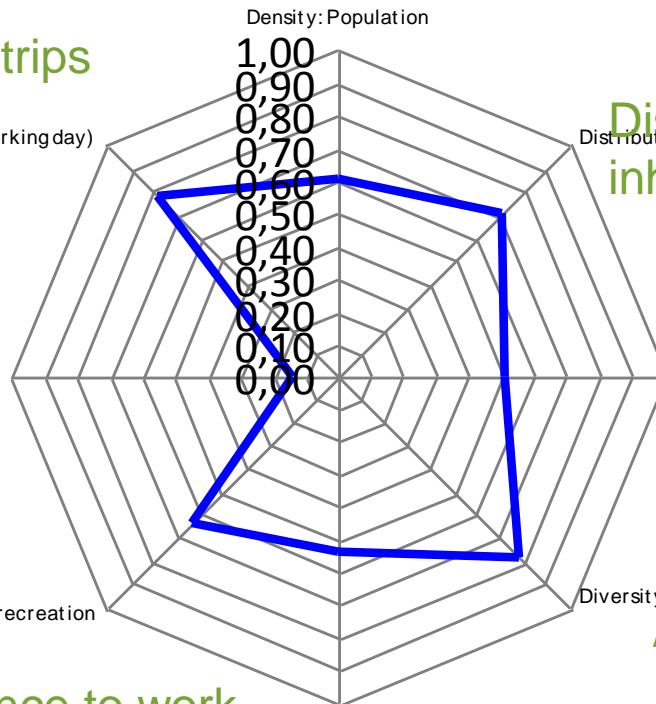
Distribution: GINI-coefficient inhabitants

Distribution of working places

Distribution: GINI-coefficient work places

Distribution inhabitants / working places

Diversity: GINI-coefficient employed inhabitants / work places





Assessment

- **Policy content indicators**
 - Follow mainly national, provincial and local plans (goals)
 - **Programme!**
 - Focus on interchanges (chain) and cross-border (train / Interreg)
- **Current mobility situation**
 - Free choice, no barriers in congestion or parking
- **Focus**
 - Economy driven, housing market
 - With an eye for mobility





Assessment

- **Policy processes**
 - Not always measurable goals
- **Core skills**
 - Project management depends on scale of municipality / organisation
 - Programme management links to multi-disciplinary (regional level)
 - Knowledge of public transport in transport authority (train is special expertise)





Barriers for sustainable development

- No congestion, no parking problems: no pressure to change mode
- Declining population: lead to less mobility and reducing energy emissions
- Own focus points of different authorities creates a barrier for one vision / cooperation
 - Inventing own wheel, working parallel
- Tender procedures not allowing operators to be strategic partners
- Ticketing system: cross-border and cross-authority
- Availability of source data from chipcard / parking / etc. to develop chain mobility





Drivers and chances

• Drivers

- Communication and participation
- Cooperation between stakeholders
- Citizens' awareness

• Chances

- Average distance recreation and work (11 and 14 km) means a chance for electric bikes
- Aging society means a base for a chance in awareness and change of life style (electric bike / bike / walking)
 - Including involved volunteers!
- Decentralisation of disabled transport means a new integrated vision on planning, dedicated and public transport
- Current poles of work attraction are relatively low (compared to poles of work generation)



Good examples

- The IBA concept (exchange ideas, develop projects. Bring together people and resources) for reinventing and rebuilding cities
- (cross-border) mobility meetings
- Current stakeholder consultation about new tendering process public transport (emissions)
- Zero Emission Bus pilot (new business models)
- Plans for complete cycle network





Next activity

- **Building a concrete action plan: focus on concrete projects and actions, shared roadmap**
- **Possible link with IBA**
- **Local Future Search 10th and 11th of September in Heerlen (Parkstad Limburg, The Netherlands)!**





Questions? Comments?

Thank you!

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