Malmö traffic surveys
– how to use data for planning sustainable mobility measures in Malmö

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Traffic strategist

Malmö stad

A young, global and growing city in a growing region

- Sweden's third largest city, growing fast
- 31 % of inhabitants foreign born from 177 countries, 150 languages
- 320,000 inhabitants
- In region of 3.8 million inhabitants, 1.3 million on Swedish side
- 250,000 companies with 1.8 million employees
- 14 universities with 140,000 students

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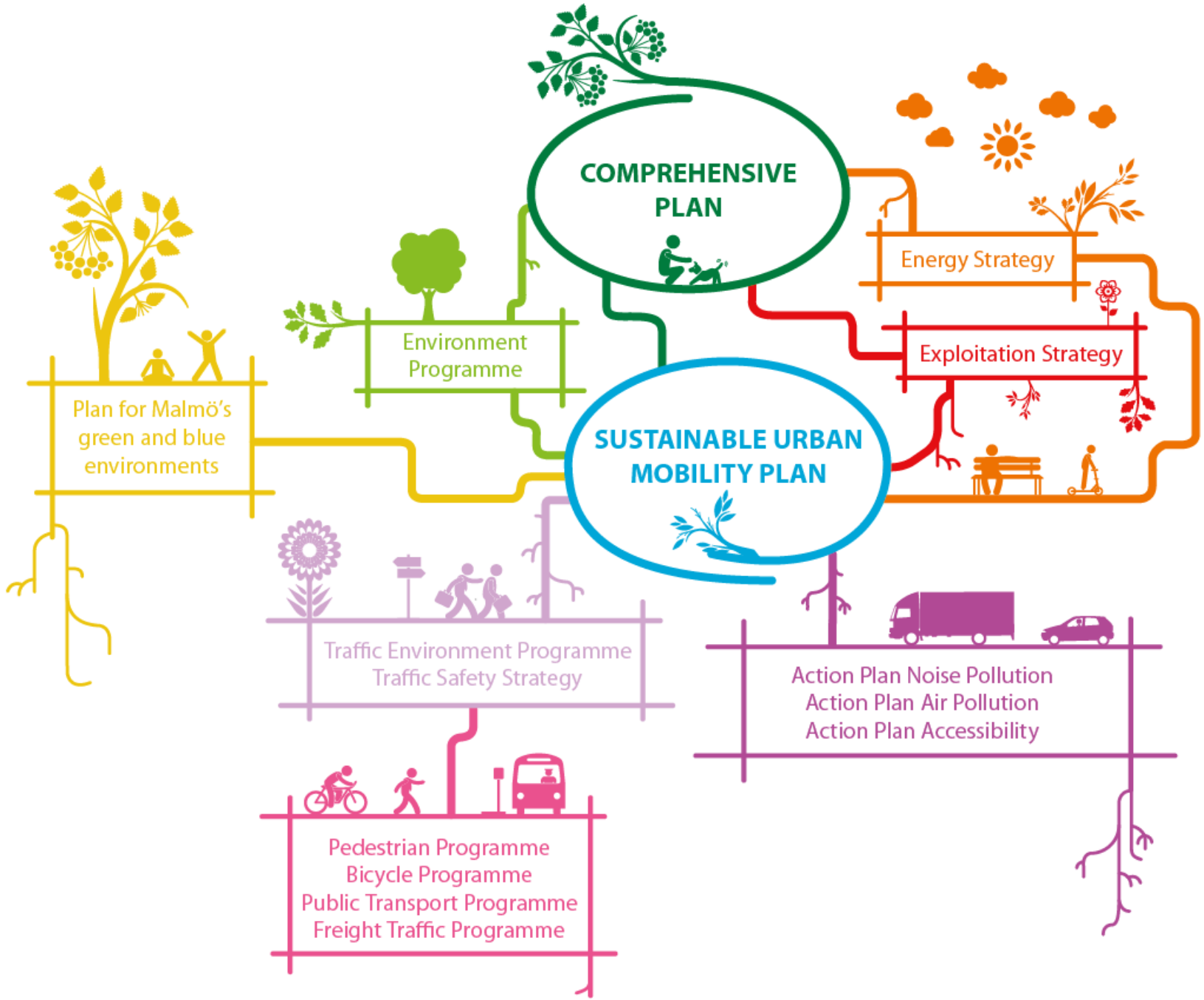
COMPREHENSIVE PLAN
Energy Strategy
Exploitation Strategy
Environment Programme
Plan for Malmö's green and blue environments
SUSTAINABLE URBAN MOBILITY PLAN
Traffic Environment Programme
Traffic Safety Strategy
Action Plan Noise Pollution
Action Plan Air Pollution
Action Plan Accessibility
Pedestrian Programme
Bicycle Programme
Public Transport Programme
Freight Traffic Programme

How do we monitor traffic in Malmö?

- Counting
- Travel survey
- Modelling

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Counting traffic
Manual and mechanical collection of data

- Budget – 170 000 euro/year
- **Spring data collection** – from the end of mars to the beginning of June
- **Autumn data collection** – from school starts (middle of august) to end of november.

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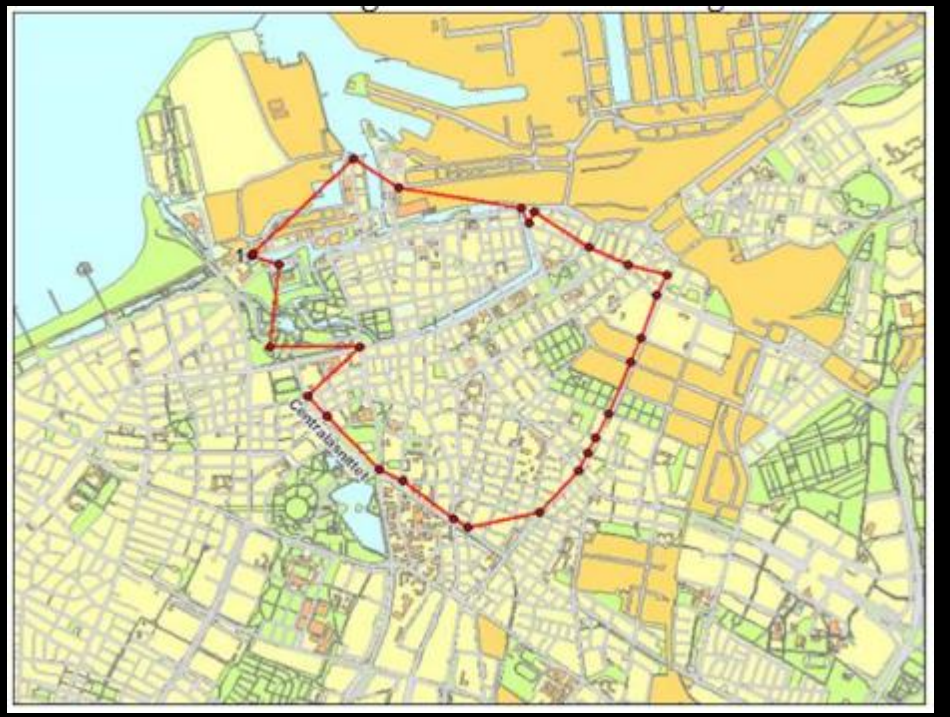
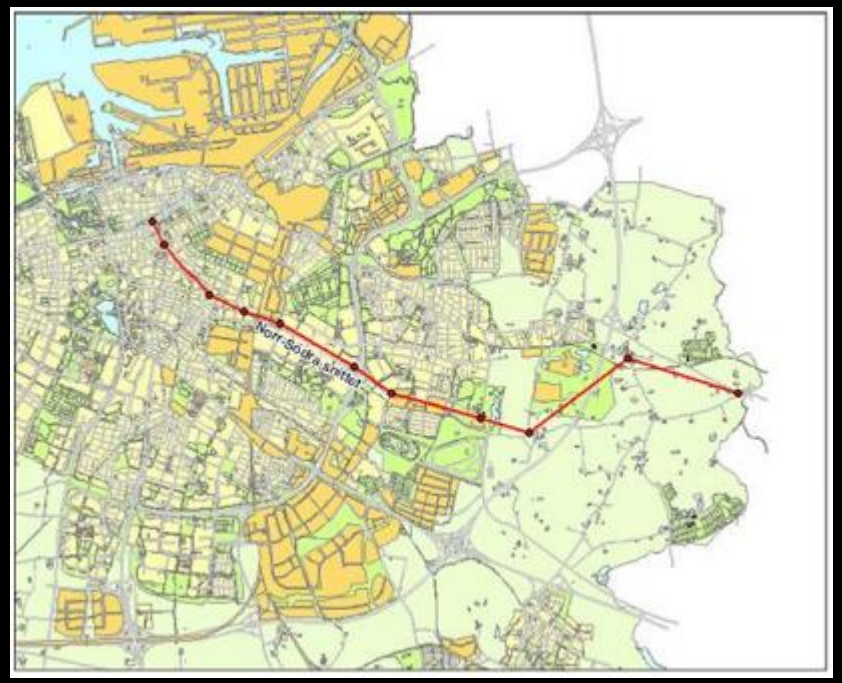
Kommungränssnittet


Centralsnittet


Norr-Södra snittet

Inre Ringvägensnittet

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Manual collection of data

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MECHANICAL DATA COLLECTION

- Mechanical collection is made by:
  - **Built in tubes** in the roads register passing vehicles weight class, speed and direction
  - Where we dont have built in tubes we put **rubber tubes.**
  - Another possible technology is using **radar**.
  - **Video analysis** is a new better way to get info on bicycle and pedestrian traffic

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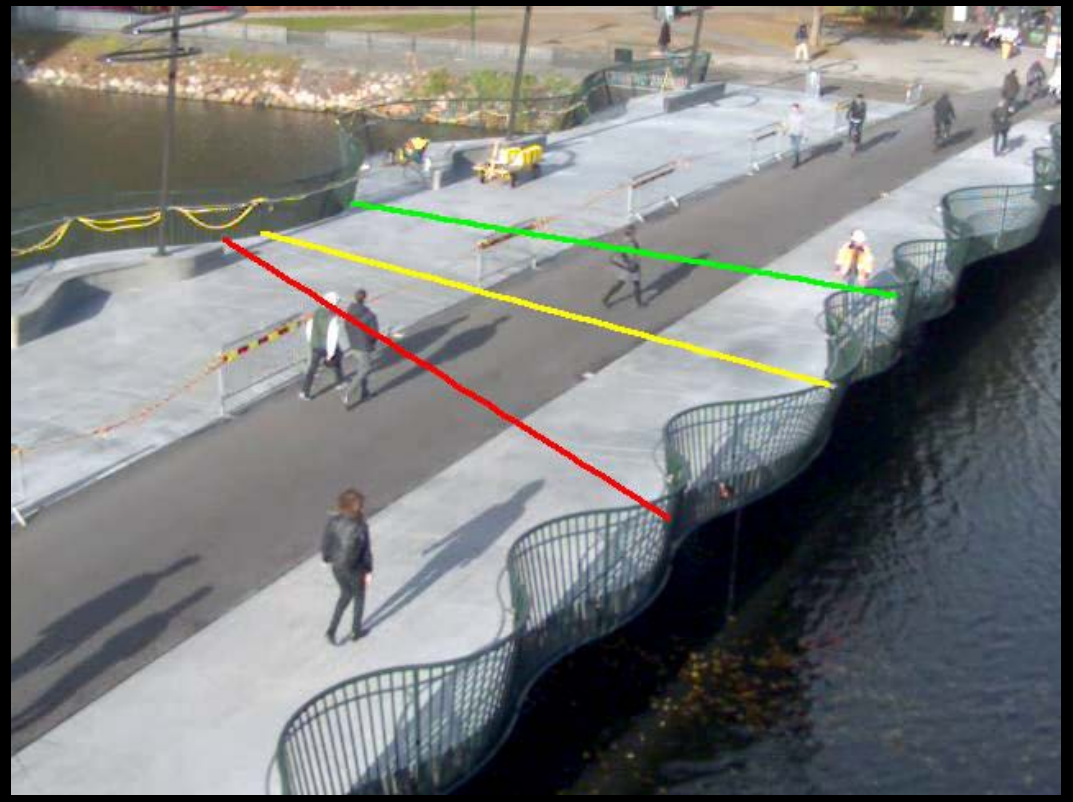
Bicycles and pedestrians



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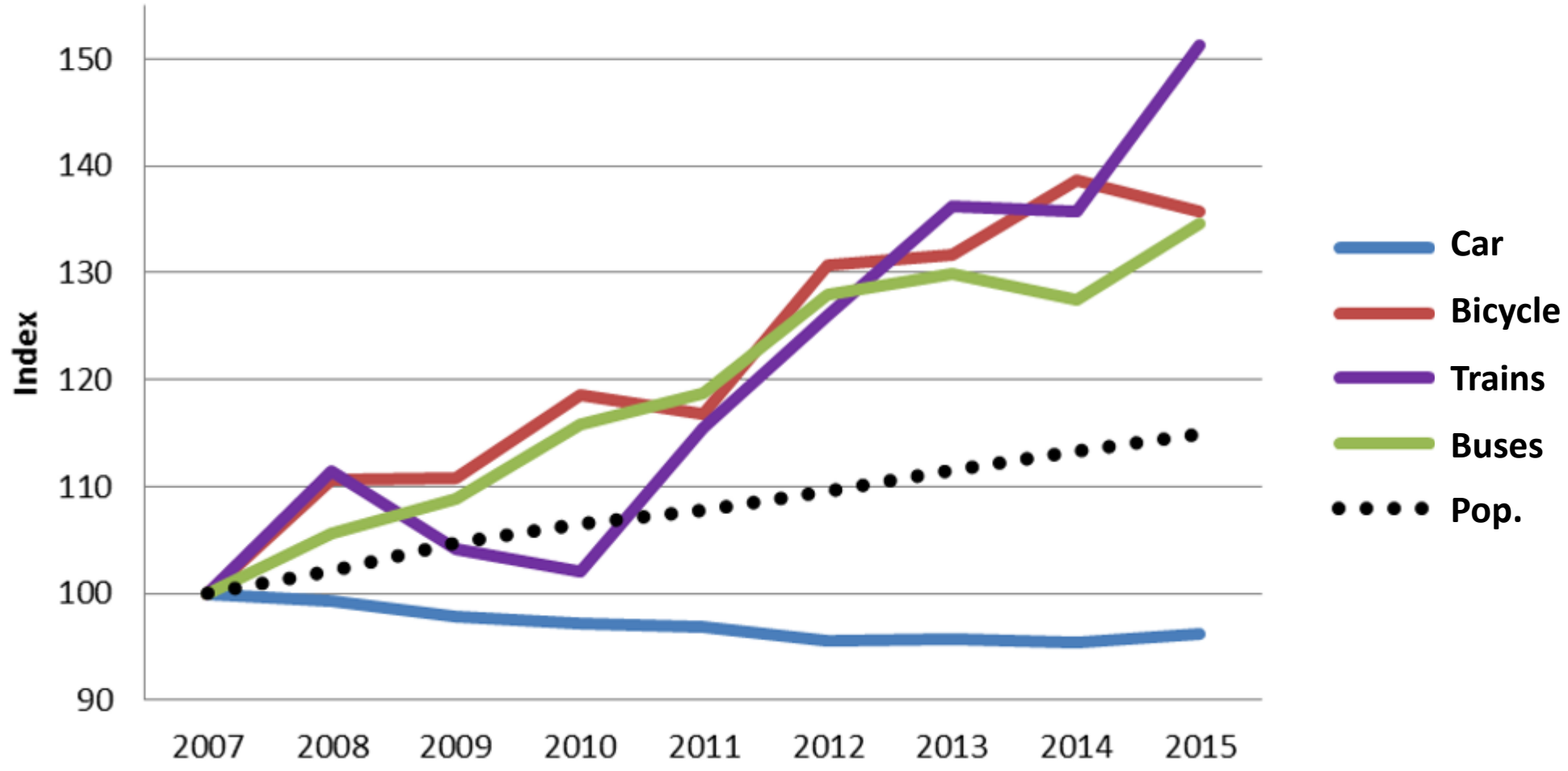
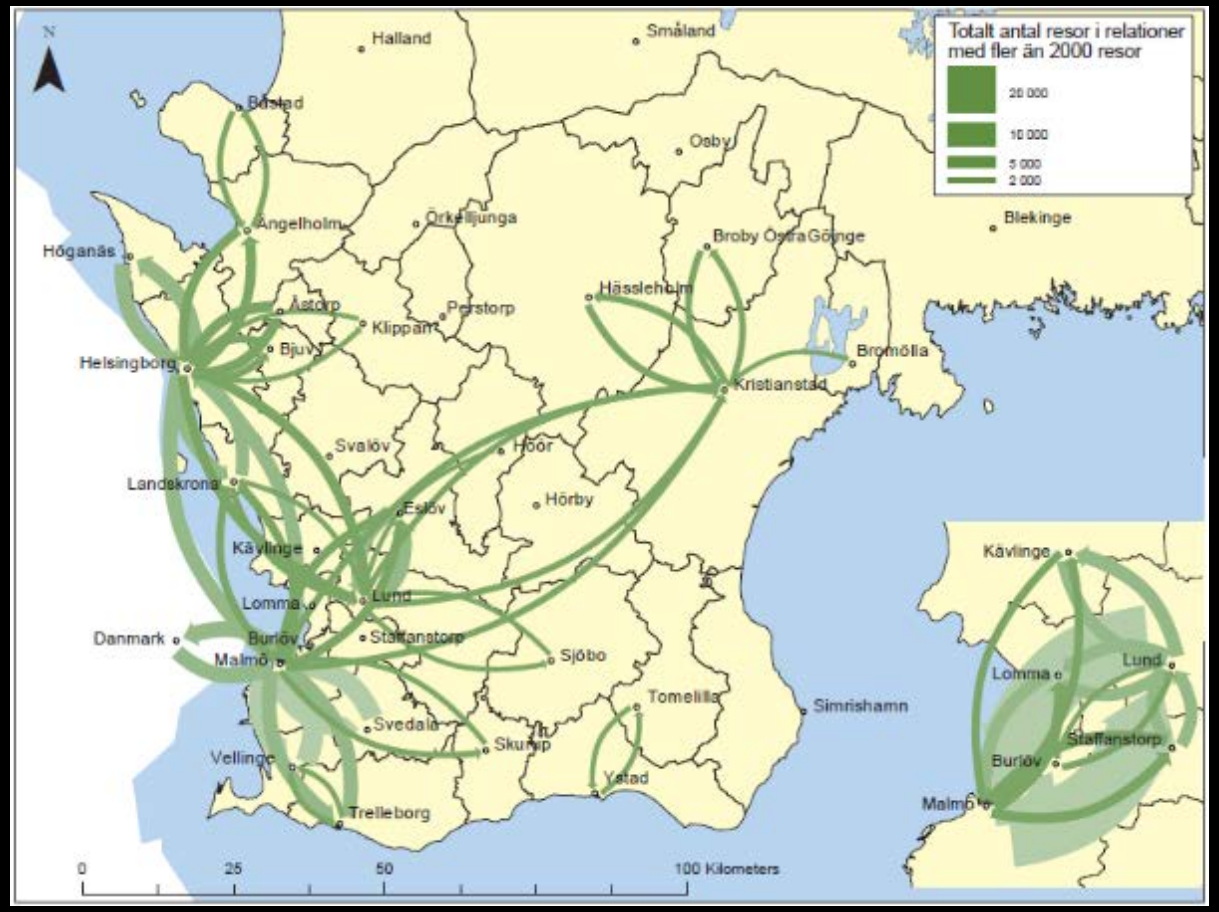
Traffic development since 2007



Travel survey (RVU) in Skåne every five years

- ✓ To monitor travel habits
- ✓ As input in infrastructural investment
- ✓ To monitor change over time
- ✓ Last survey was made 2013 and the results from 2018 is being processed



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Implementation

- Survey

  - questions about background and mode of transportation

  - travel diary

- Postal survey and web-based survey

- Two reminders

  - postcard

  - entire survey sent out again

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Selection and answers

- ✓ Ages 15-84 år
- ✓ The selection was 70 000 persons in Skåne (12 000 in Malmö)
- ✓ Unbound random selection
- ✓ Number of answers was 25 733, which is 37 % of the entire selection + 1026 more in Malmö after an extra selection only in Malmö
- Results in two databases, the ones that answered and all the travels made

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Travel survey by app 2018

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Result

- **Background factors** (Gender and age, Composition of household, Education and occupation, income)
- **Description of the participants – transport access** (Drivers licens, car ownership and car access, Access to bike, Access to public transport card, Access to transport benefits from work or studie)
- **Trips made – travel diary** (Number of daily trips, Daily distance travelled, Distance each trip, Number of trip, Average travel distance for every mode of transport, Share of travels for different errands, time of travel
- **Travel between municipalities**

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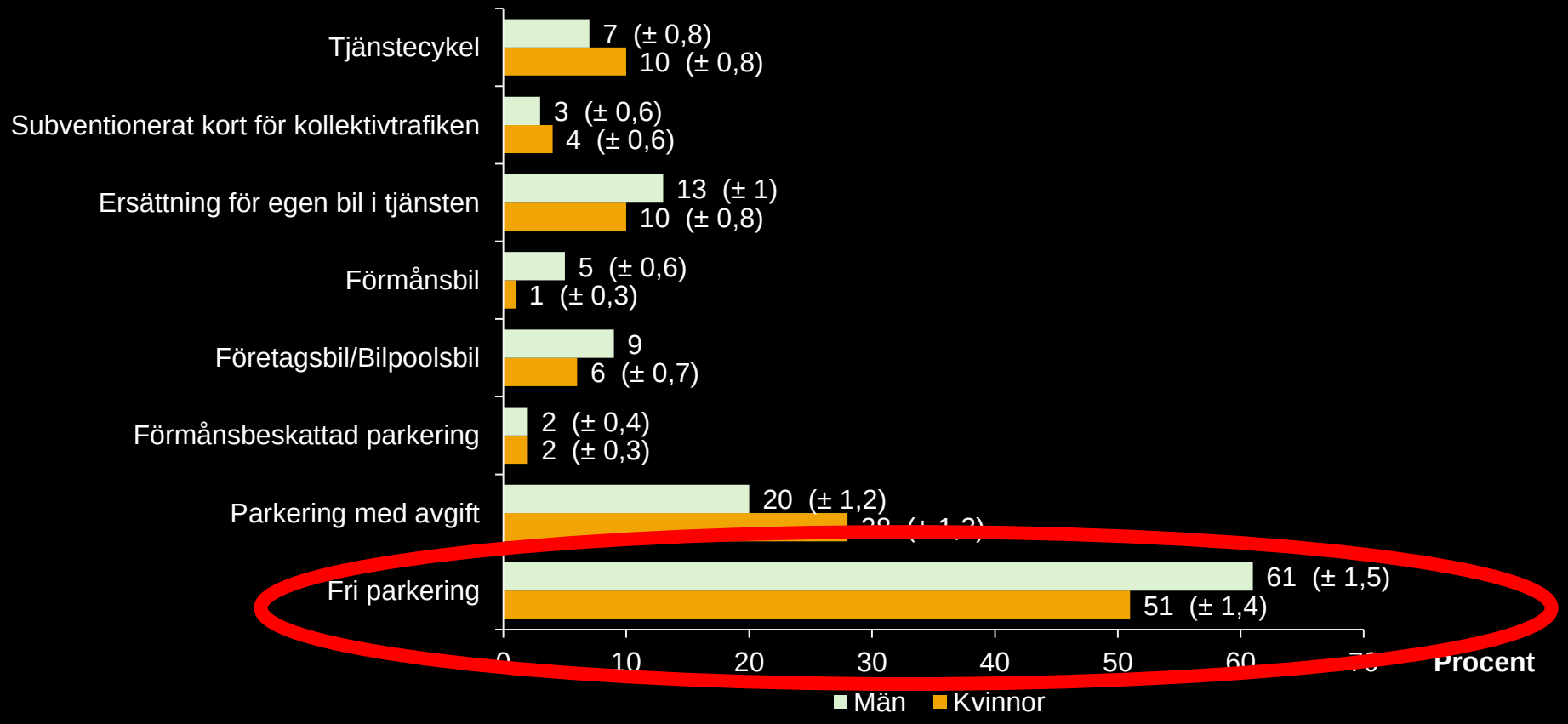
Benefits at work



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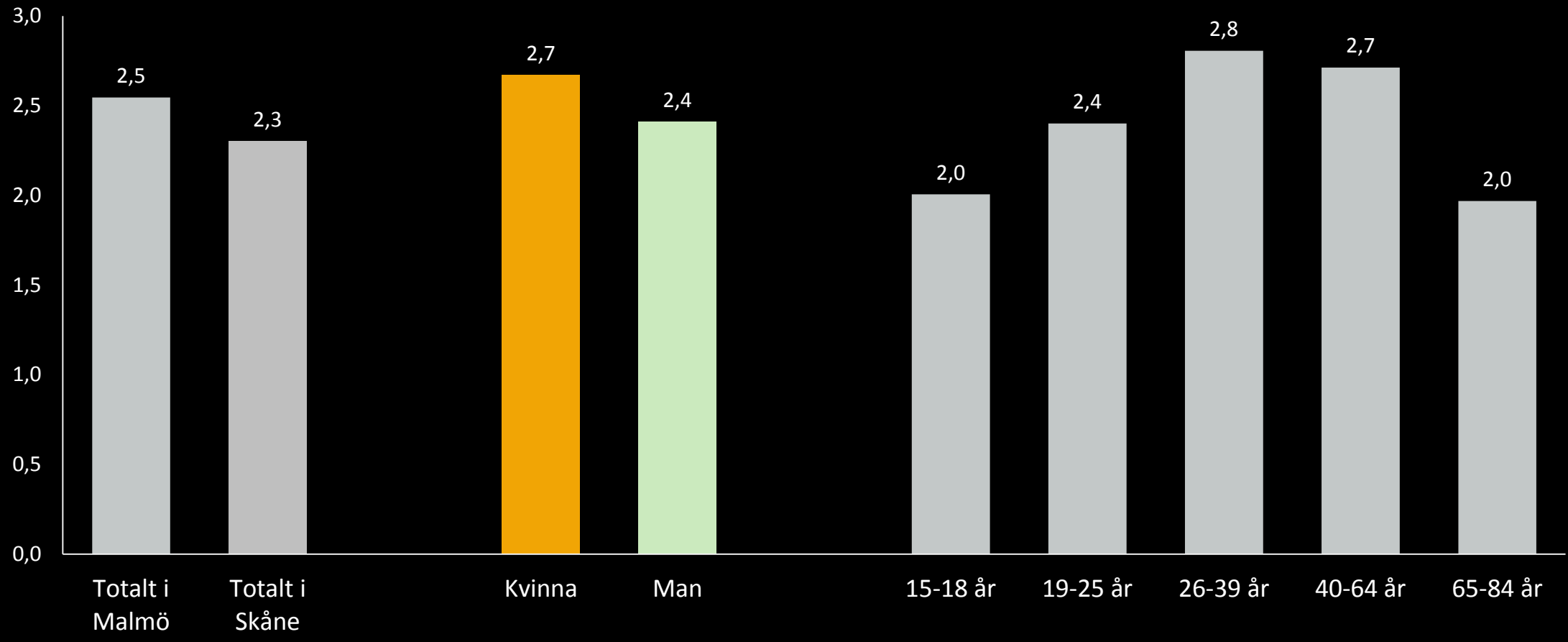
Numer of trips per person and day in Malmö



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Traffic analysis modelleing
Goal oriented and traditional

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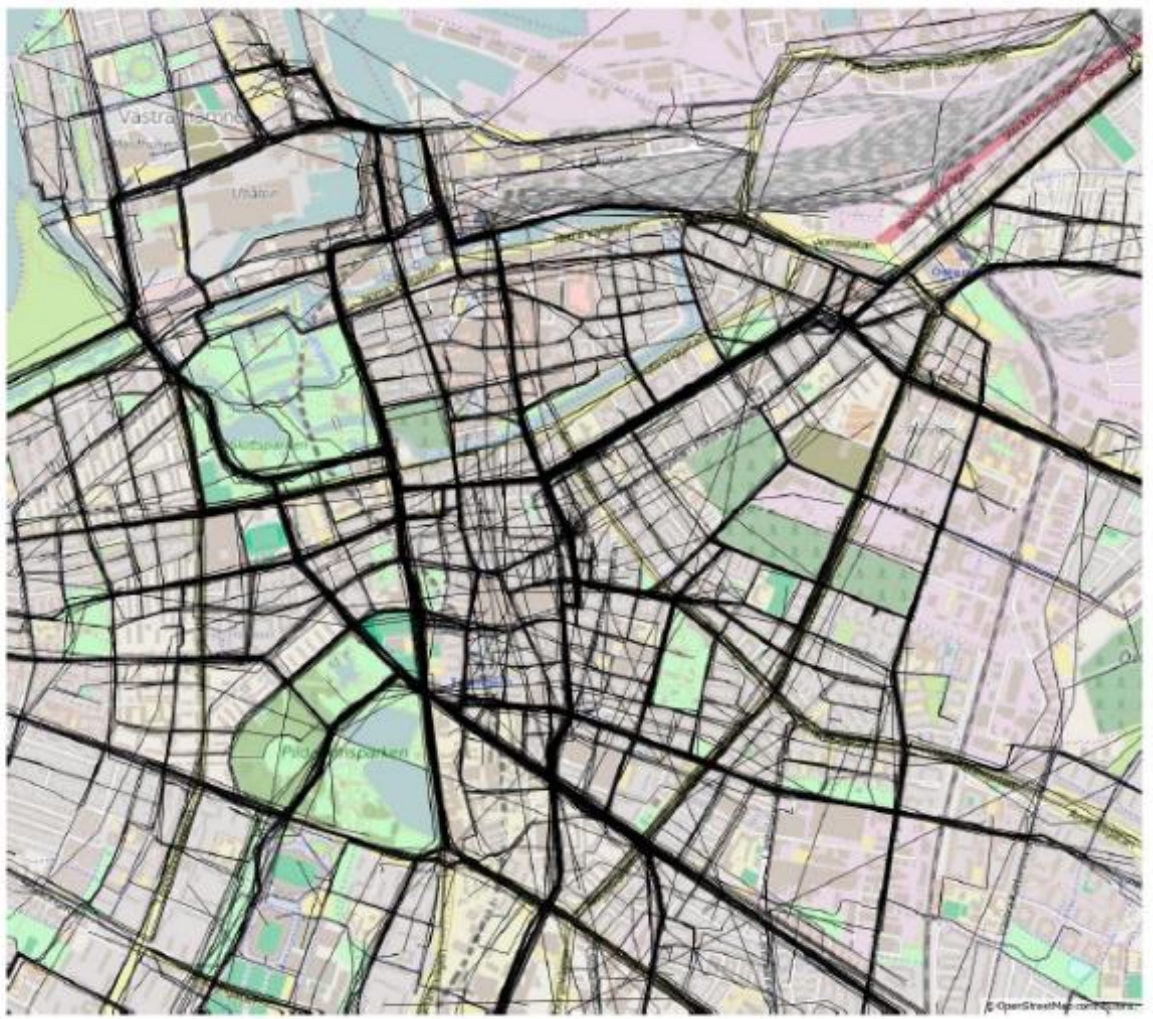
Compare travel survey to model and attune model



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18 % - *”Better accessibility and more space for the cars within the city”*

34 % - *”Calmer traffic within the city”*

47 % - *”A city-center where more streetspace is dedicated for walking, biking and public transport”*

dialogue

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Why is this so important for us?

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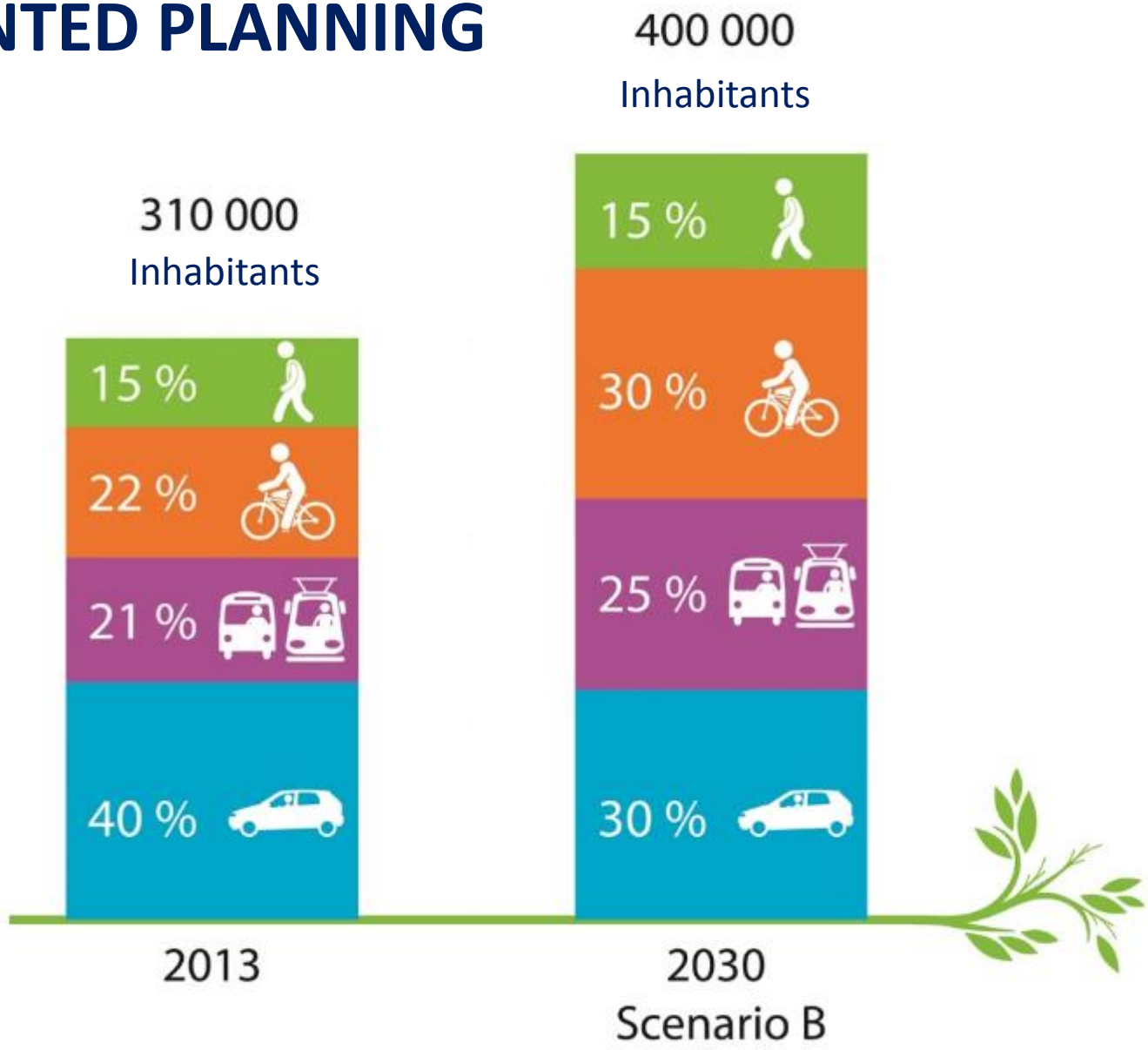
GOAL ORIENTED PLANNING



4
3
KIRSEBERG
5
CENTRUM
1
2
6
13
LIMHAMN
9
8
7
IÅGERSRO
BYLLIE
FOSIE
BUNKEFLOSTRAND
11
12
10
14
ÖXIE
15
TYGELSJÖ

Delområde				
1 Centrum	15% (25%)	25% (23%)	35% (25%)	25% (25%)
2 Slottsstaden	25% (33%)	20% (16%)	40% (34%)	15% (14%)
3 Västra hamnen	20% (30%)	30% (25%)	30% (25%)	20% (17%)
4 Norra hamnen	25%	30%	30%	15%
5 Kirseberg	25% (34%)	30% (24%)	30% (24%)	15% (16%)
6 Rosengård/Sorgenfri	20% (31%)	30% (25%)	35% (28%)	15% (15%)
7 Fosie	30% (49%)	35% (24%)	25% (18%)	10% (6%)
8 Holma/Kroksbäck	30% (40%)	20% (17%)	30% (22%)	20% (18%)
9 Limhamn	35% (54%)	20% (14%)	30% (20%)	15% (10%)
10 Bunkeflostrand	45% (62%)	25% (18%)	20% (9%)	10% (8%)
11 Hyllie	30% (56%)	30% (14%)	20% (12%)	20% (18%)
12 Jägersro	50% (59%)	15% (12%)	20% (15%)	15% (15%)
13 Husie	50% (63%)	20% (15%)	20% (14%)	10% (8%)
14 Oxie	50% (64%)	25% (20%)	15% (6%)	10% (8%)
15 Tygelsjö	55% (72%)	20% (12%)	15% (4%)	10% (9%)
Summerat	30% (40%)	25% (21%)	30% (22%)	15% (15%)

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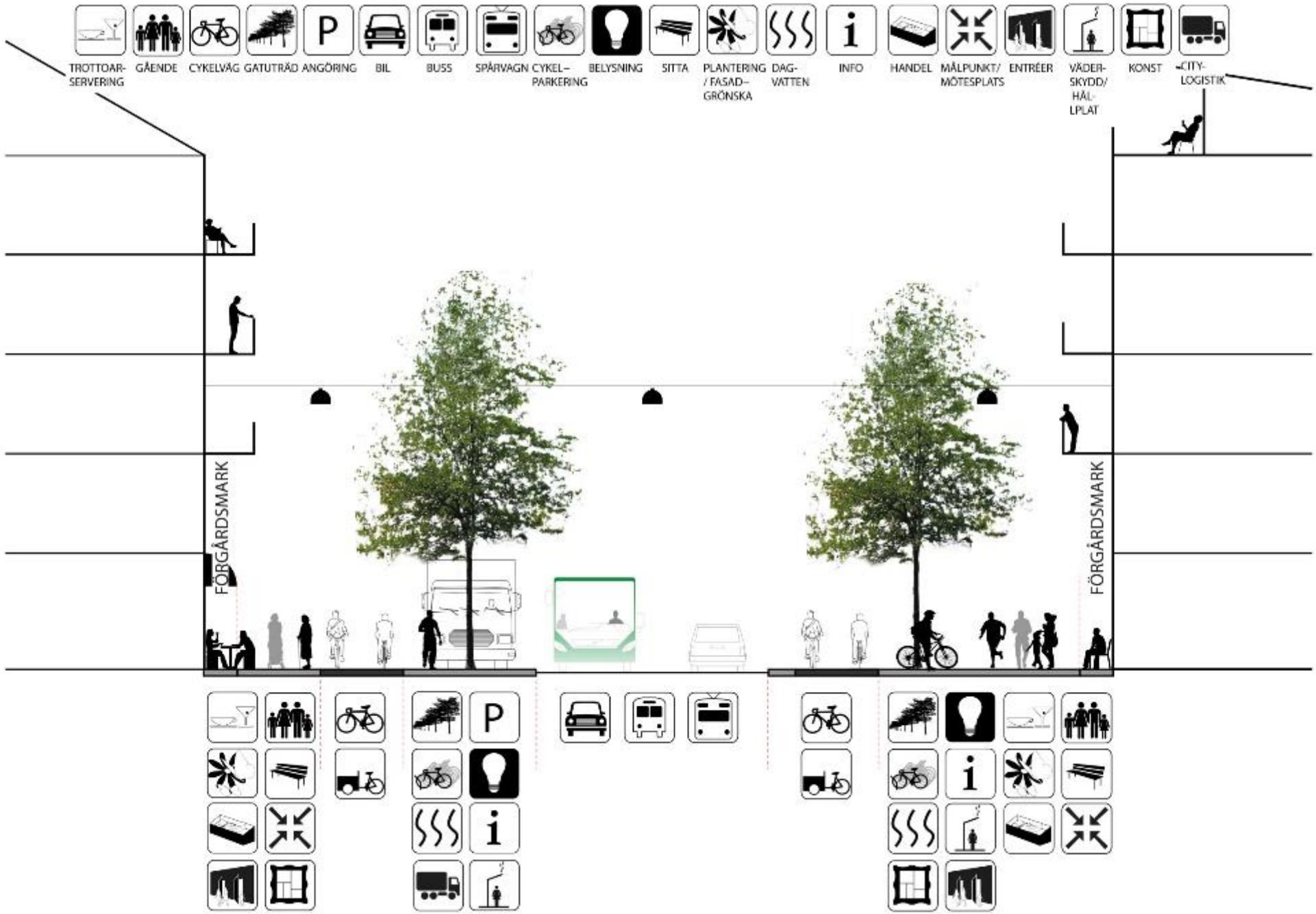
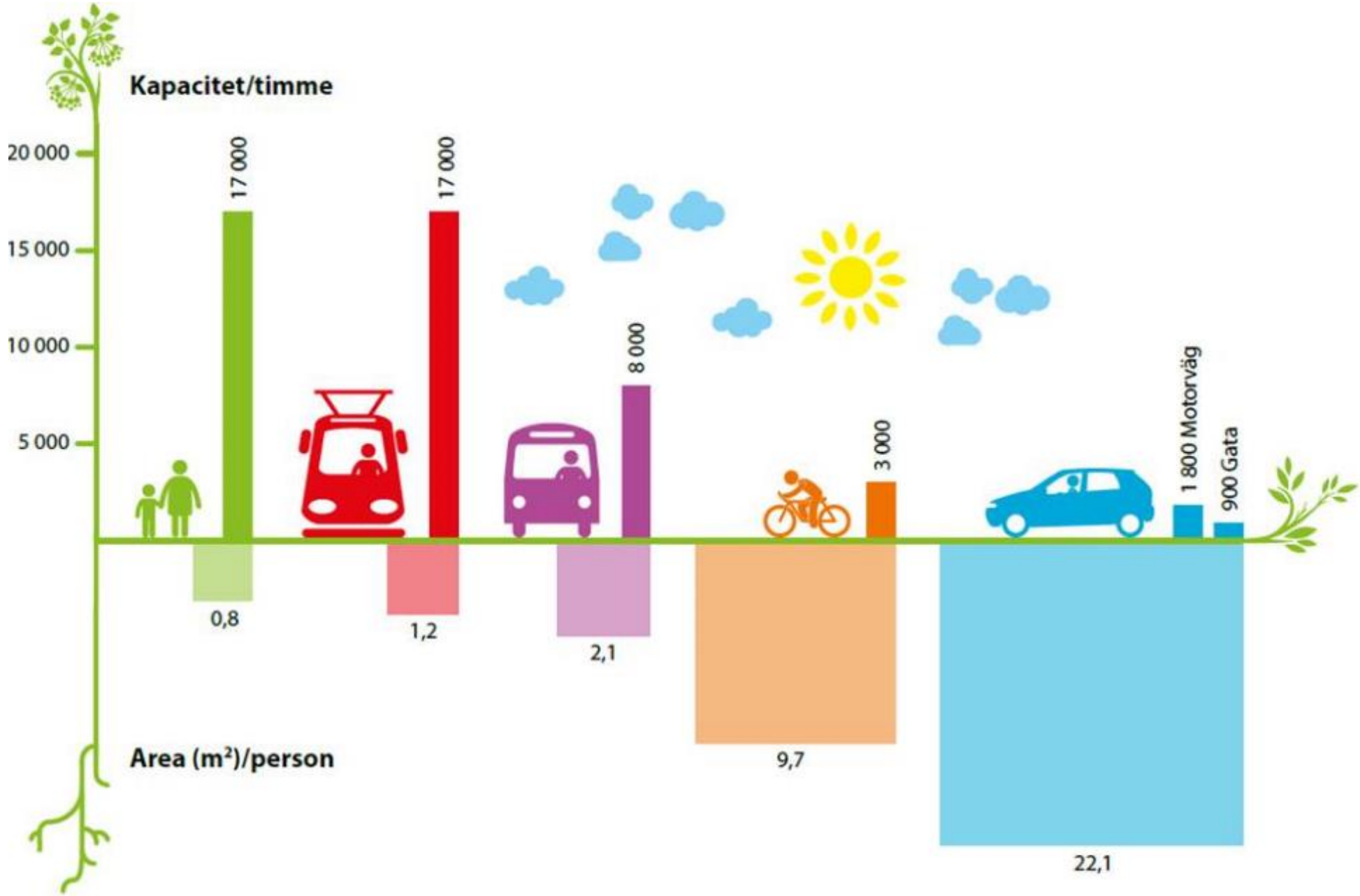
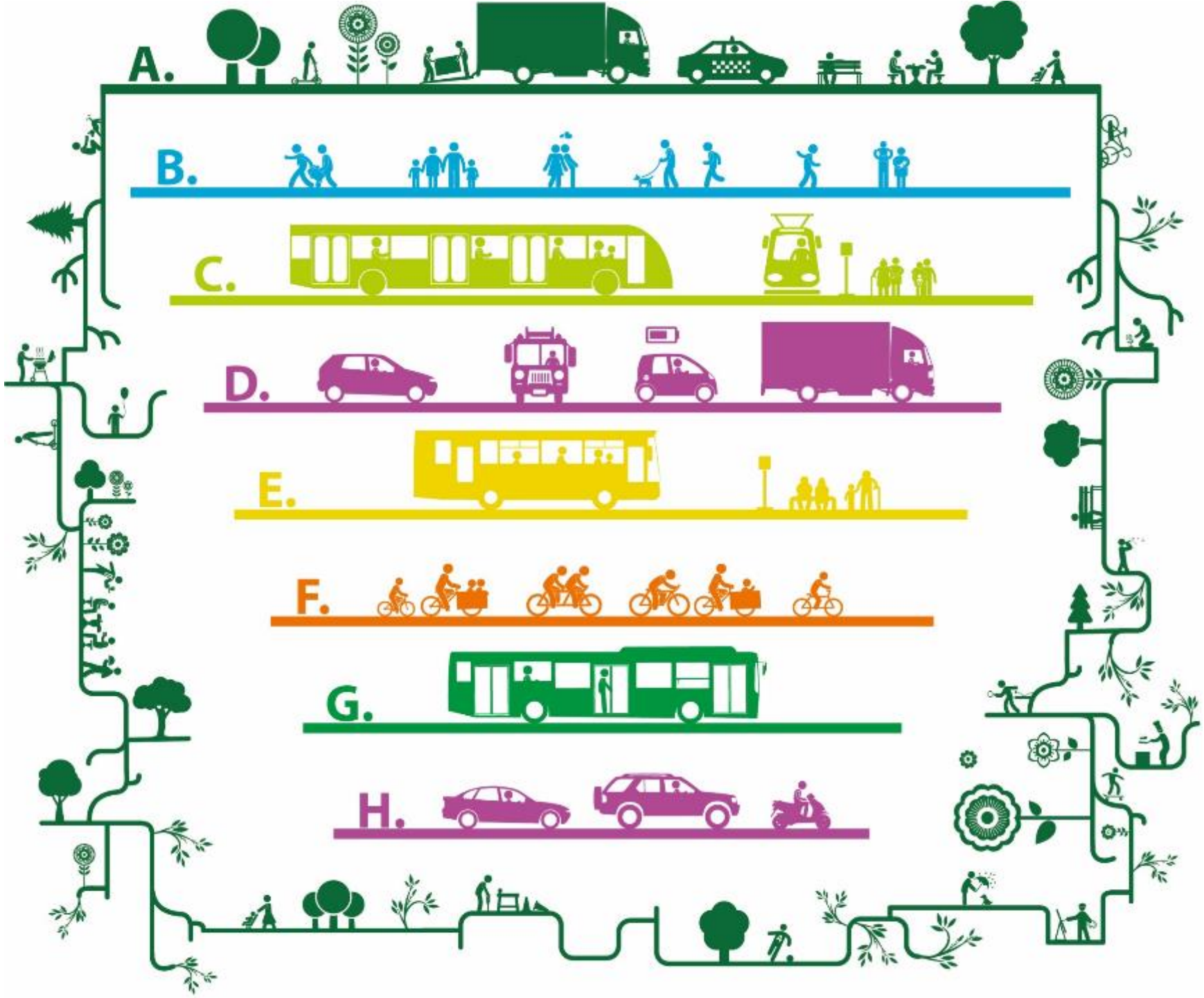
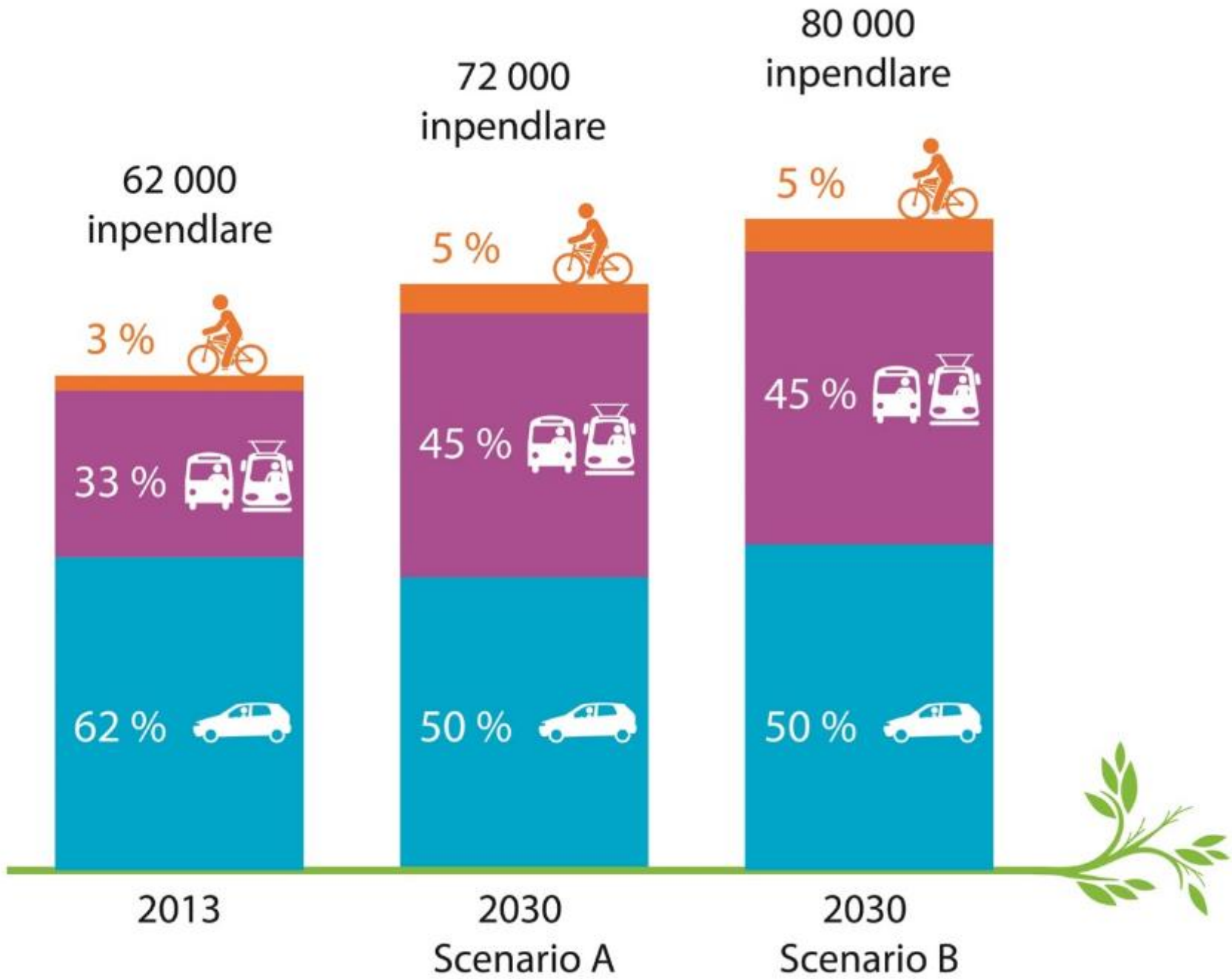
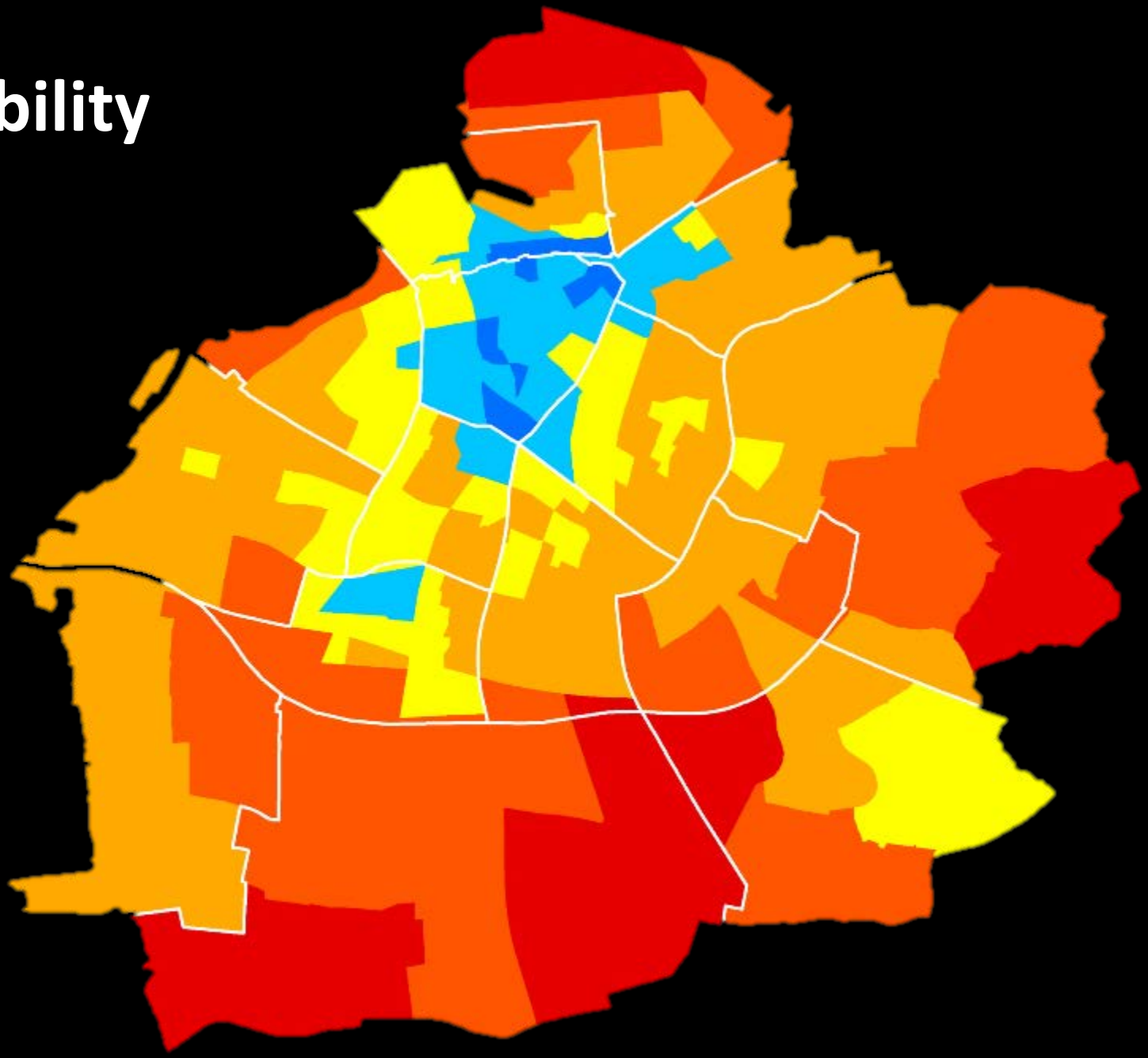

TROTTOAR-SERVERING
GÅENDE
CYKELVÄG
GATUTRÄD
ANGÖRING
BIL
BUSS
SPÅRVAGN
CYKEL-PARKERING
BELYSNING
SITTA
PLANTERING / FASAD-GRÖNSKA
DAG-VATTEN
INFO
HANDEL
MÅLPUNKT/ MÖTESPLATS
ENTRÉER
VÄDER-SKYDD/ HÅL-LPLAT
KONST
-CITY-LOGISTIK
FÖRGÅRDSMARK
FÖRGÅRDSMARK


Kapacitet/timme
20 000
15 000
10 000
5 000
17 000
17 000
8 000
3 000
1 800 Motorväg
900 Gata
0,8
1,2
2,1
9,7
22,1
Area (m²)/person


A.
B.
C.
D.
E.
F.
G.
H.


62 000 inpendlare
3 %
33 %
62 %
2013
72 000 inpendlare
5 %
45 %
50 %
2030 Scenario A
80 000 inpendlare
5 %
45 %
50 %
2030 Scenario B

Accessability



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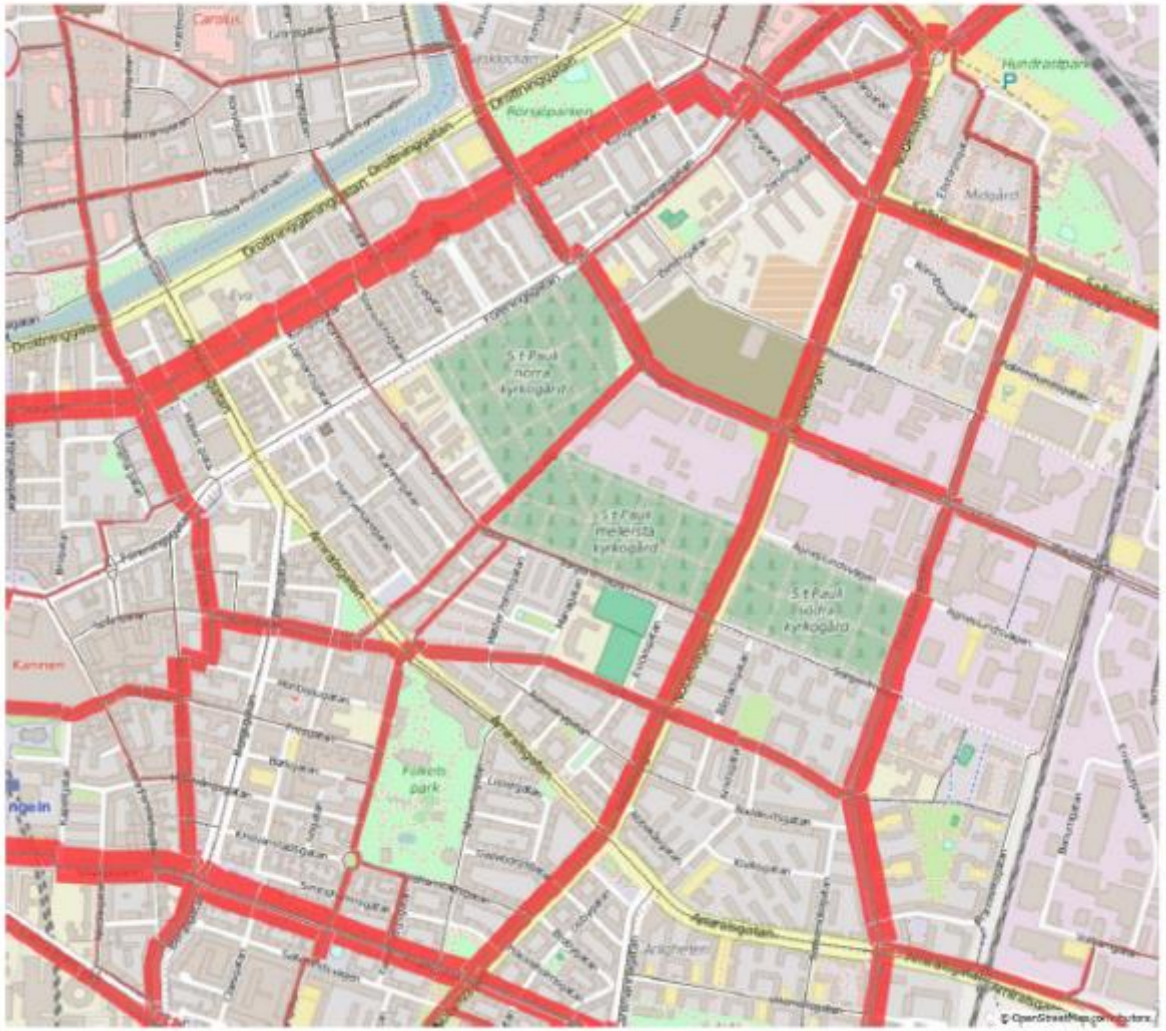
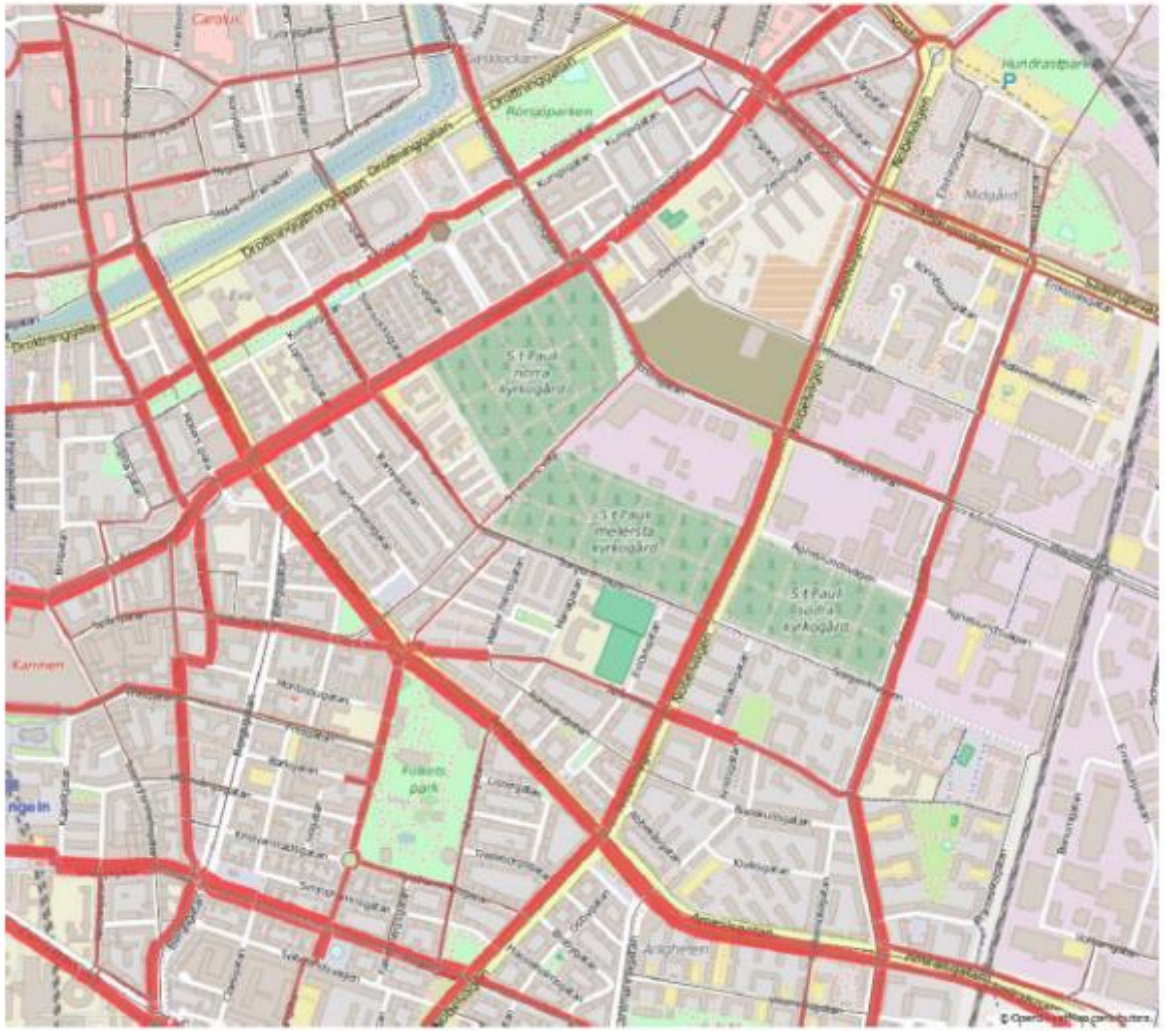
Example rout choice

How will the new bikelanes affect bikers

Now

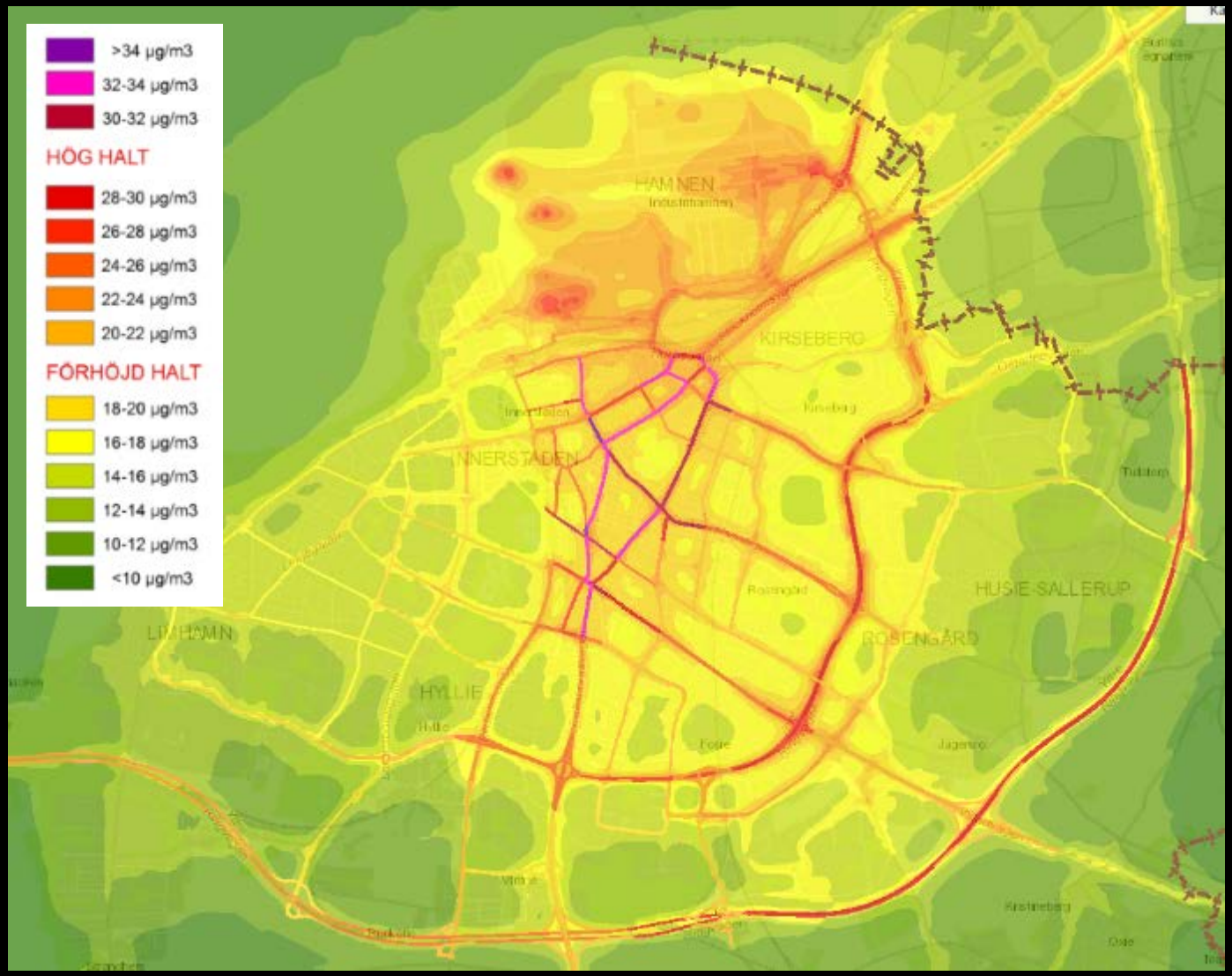


New bike lanes



Environmental Quality Standards

Nitrogendioxide
NO_2



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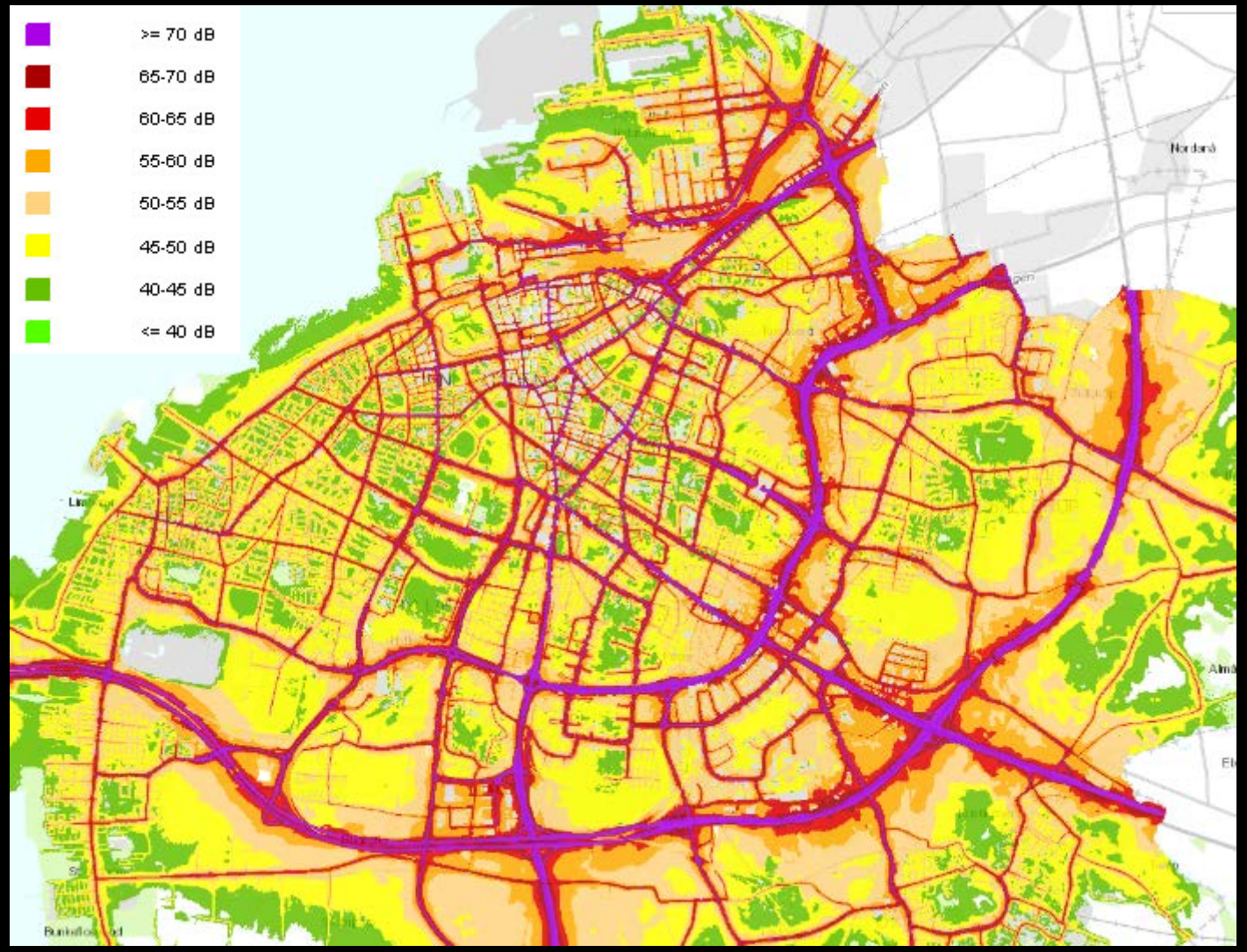
Environmental Quality Standards

Noise pollution dB



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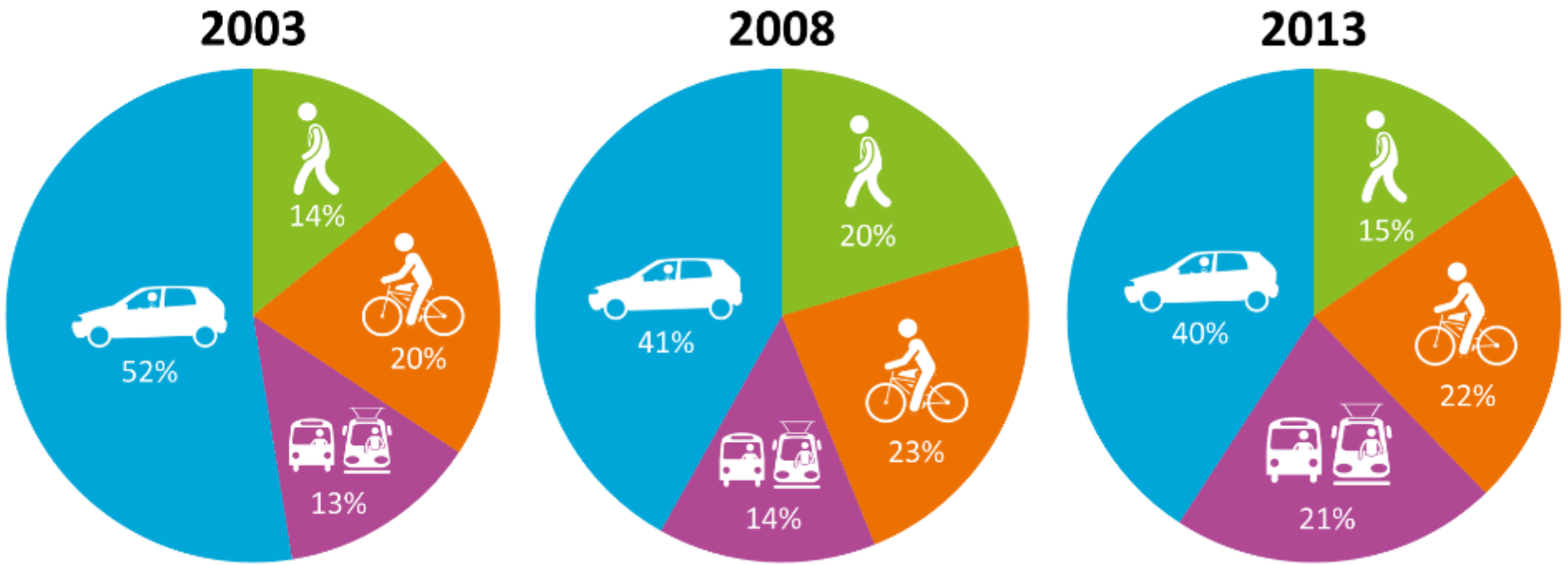
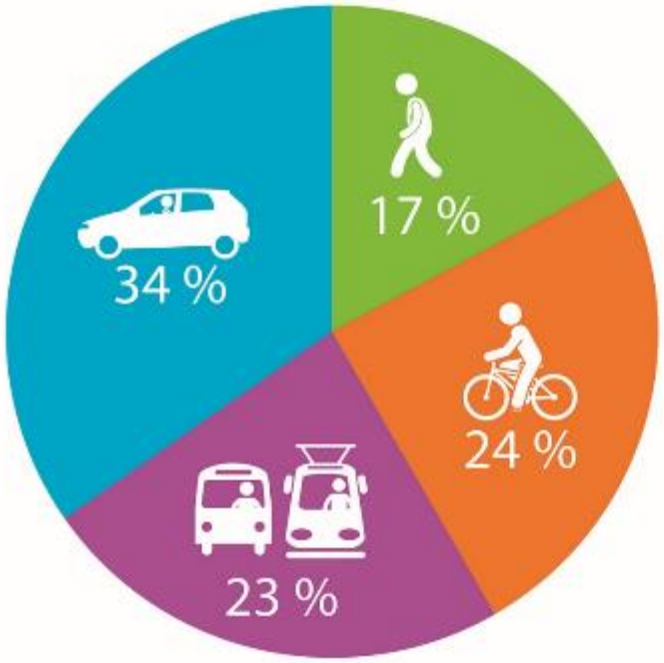
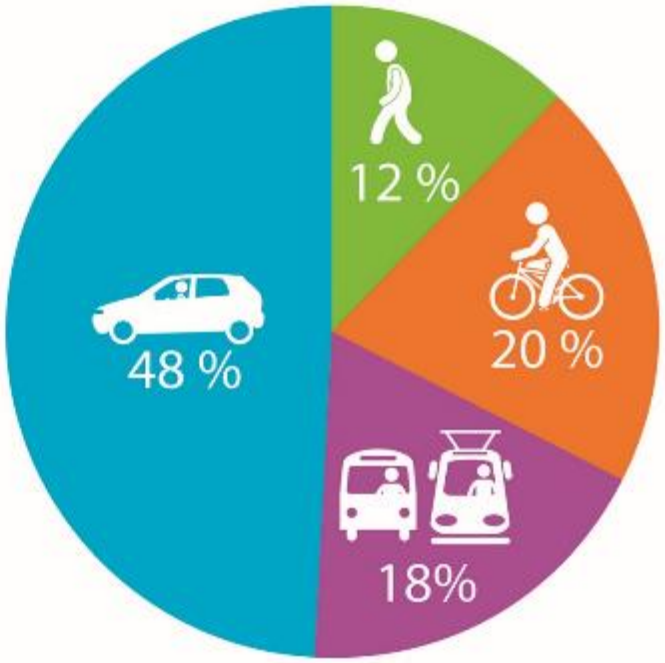

2003
14%
20%
13%
52%
2008
20%
23%
14%
41%
2013
15%
22%
21%
40%

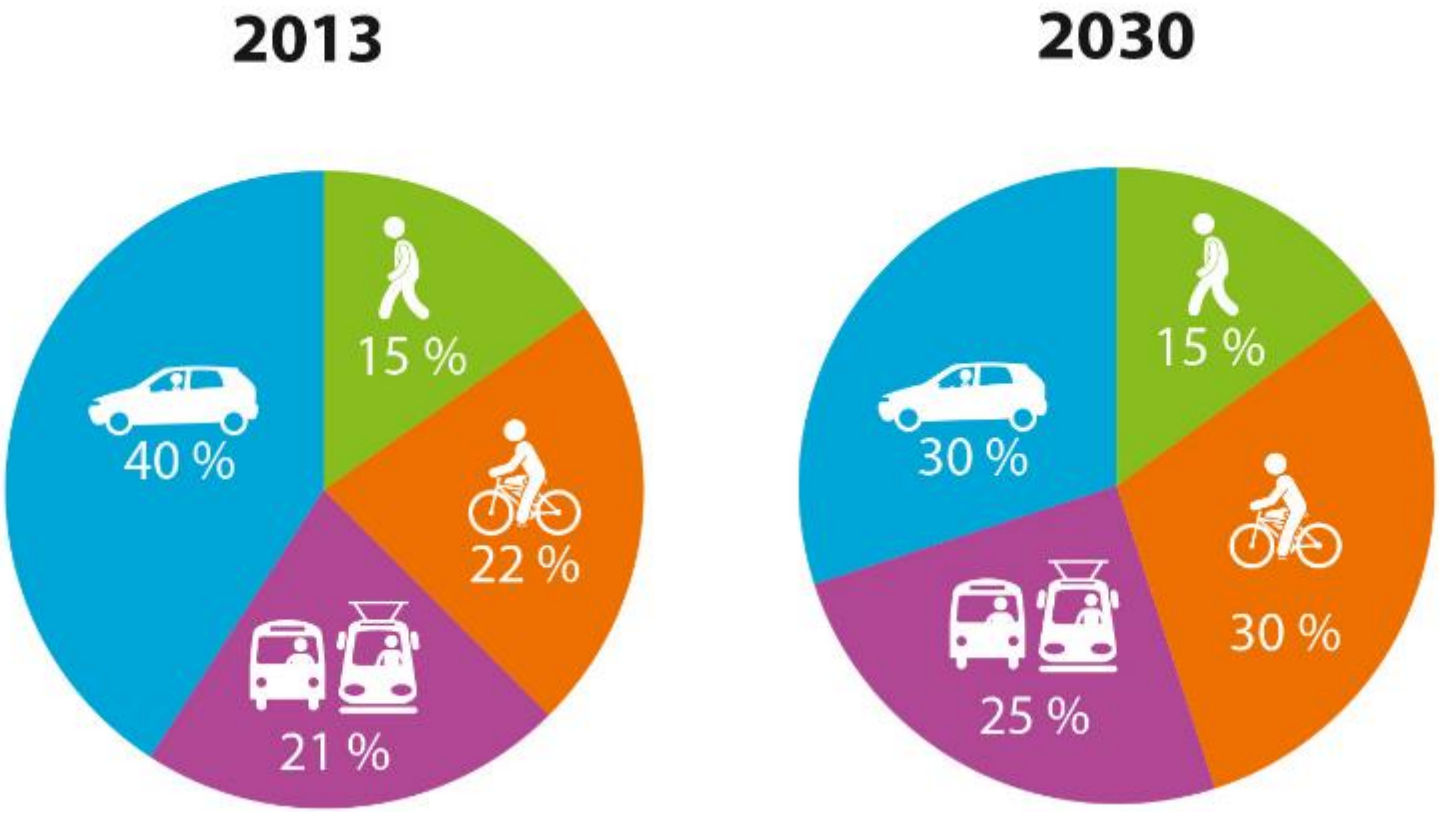
women



men



opportunities



THANK YOU FOR LISTENING

www.malmo.se/TROMP

andreas.nordin@malmo.se

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