

Integrated urban and mobility planning in a continuous, interactive process

Lahden suunta

Lahti direction

Baltic Sea Region SUMPS UP Workshop in Tampere 15.3.2018

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LAHTI

An aerial photograph of the city of Lahti, Finland, showing a mix of residential buildings, green spaces, and a prominent tall communication tower in the center. The city is surrounded by dense green forests.

The population of Lahti is 120 000.

Over 80 % of population lives in urbanized areas.

Over 70% of residents live within 5 km of the urban core.

Nine out of ten have an urban green area within 300 m from home.

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Naturally urban.




1.
Why should we integrate the planning of the physical environment and mobility?

2.
How it is currently done in the city of Lahti



1. Why?

An aerial photograph of a city, likely Lahti, Finland, showing a mix of urban development and green spaces. The image features several multi-story apartment buildings, industrial or commercial structures, and large areas of trees. A body of water is visible on the left side. The text is overlaid in the center of the image.

**The structure of the city effects
the productivity of the private sector,
the availability of public services,
the housing market, mobility
and people's health and well-being.**



**Spatial and transport planning
cannot be separated.**

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A group of young people are sitting on a stone wall and a bench in a modern outdoor setting. In the background, there is a fountain with several water jets, a blue car, and modern buildings with large windows and stone accents. The scene is bright and sunny, suggesting a pleasant outdoor environment.

**The physical environment
affects people's behaviour.**

People are picky over where they choose to walk.



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Cycling infrastructure costs less, because bicycles take up considerably less space than automobiles.

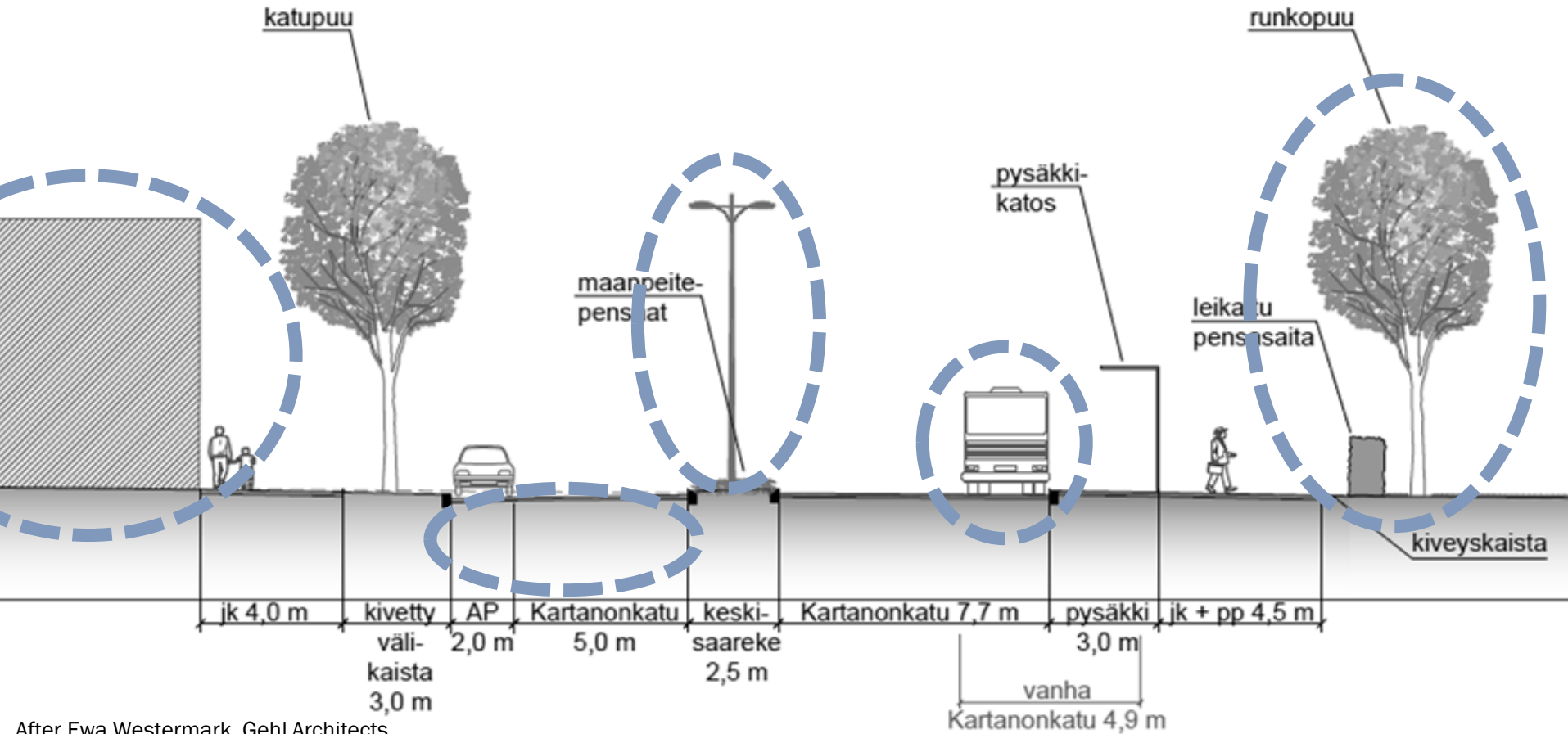


The physical environment is literally the ground of well-being.

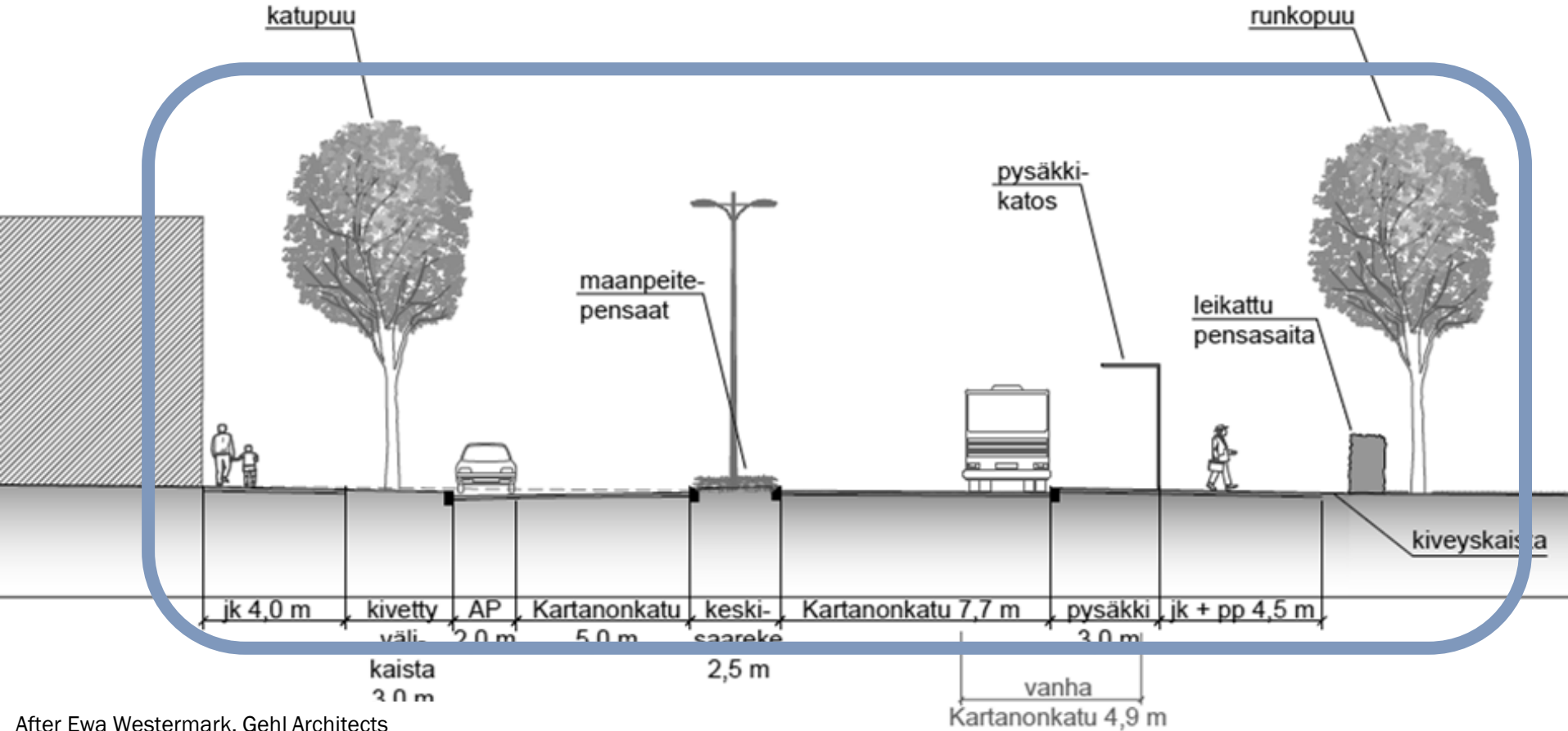
Adapted from: Hämäläinen, T. (2013.) Towards a sustainable well-being society. Building blocks for a new socio-economic model. Sitra.
https://media.sitra.fi/2013/04/21103543/Towards_a_Sustainable_Wellbeing_Society.pdf



From silos...



... to holistic people centered planning



2. How?



From information silos To seeing the big picture

The master plan is the strategic image of the city's future.

The big picture is created by building knowledge as a community.

The knowledge needs to be saved, analysed and shared for use by the whole community.

**collaboration,
openness,
responsibility**



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Theme day, 18 Aug 2017



We plan the urban environment and services in close collaboration with citizens.

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**When we build knowledge, we think
beforehand how it can be used in
planning.**



[Kokemuksellisen paikkatiedon
hyödyntäminen suunnittelussa](#)

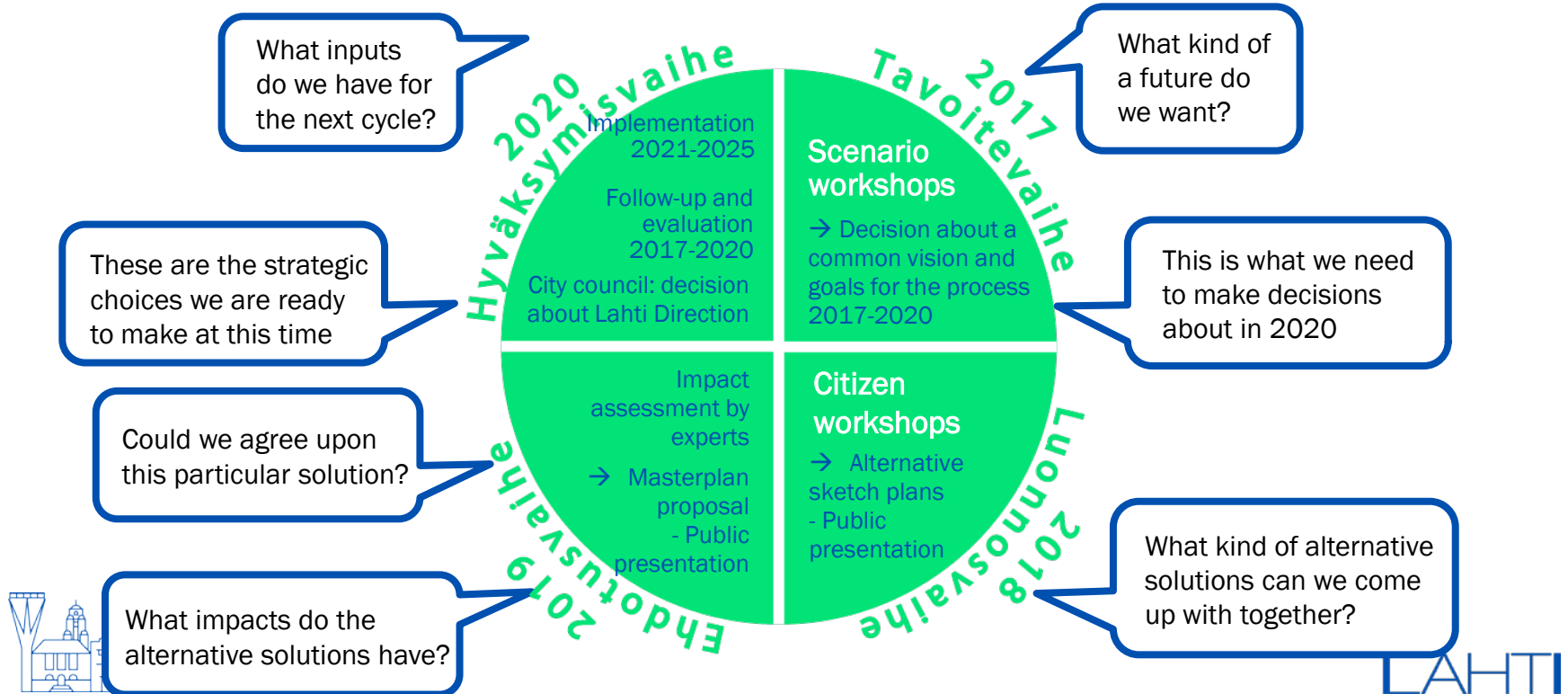
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Using multiple knowledges in planning to achieve positive change (Rydin, 2007)



Lahti Direction process 2017–2020

Strategy → Masterplan – Sustainable Urban Mobility Plan – Environmental Program – Services Program



THE MASTERPLAN IS THE IMAGE OF THE STRATEGY

- City-wide general land-use and traffic network plan since 2009
- Shows where various functions are situated, such as services, livelihoods, dwelling and green areas
- Becomes legally binding with the decision by the city council

PHYSICAL ENVIRONMENT

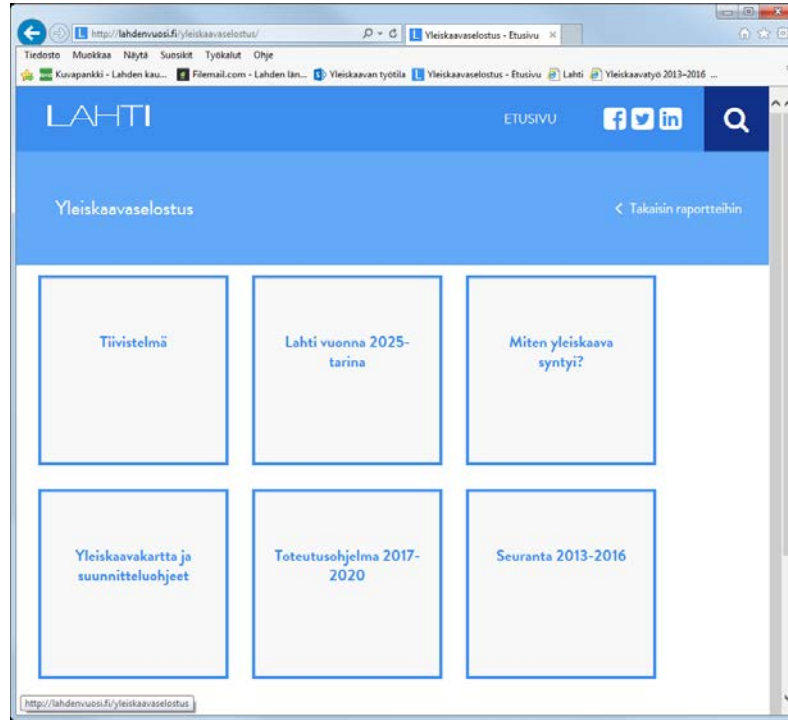
THE SUSTAINABLE URBAN MOBILITY PLAN ILLUSTRATES THE DYNAMICS OF THE CITY

- Vision and goals for sustainable mobility in the urban area for the first time in 2017
- Encompasses all modes of transport
- Is based on the city strategy and requires the whole community's input

WISE EVERYDAY CHOICES



The story of Lahti in 2025: Master plan report online



Results of participation are written into the story.

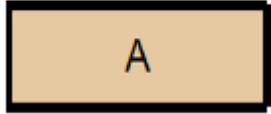


<http://lahdenvuosi.fi/yleiskaavaselostus/>

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Area descriptions and planning guidelines

Legally binding master plan regulation:



RESIDENTIAL AREA.

The area is reserved mainly for residential functions. **When positioning services, attention should be paid to accessibility on foot, by bicycle and by public transport.** In planning and building neighbourhoods special attention should be paid to the safety and comfort of the living environment.

Planning guideline:

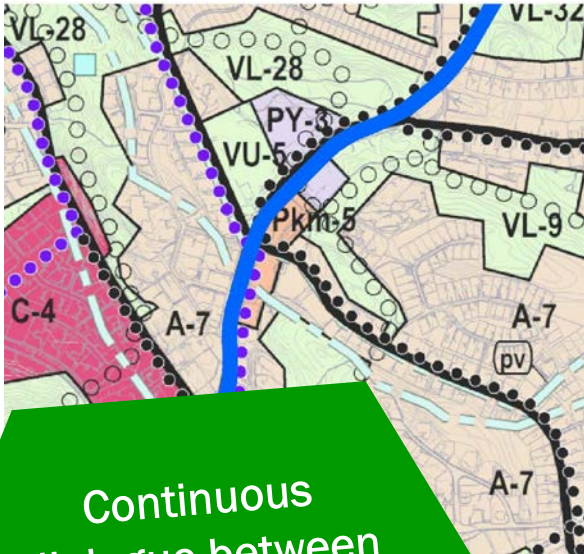
*Alueen täydennysrakennusmahdollisuuksia tutkitaan. Lähiöostokeskukseen saa sijoittaa **10 000 k-m²** kaupan tiloja. **Päiväkotien ja koulujen lähialueiden suunnittelussa kiinnitetään erityisesti huomiota kävely- ja pyöräteiden jatkuvuuteen, turvallisuuteen ja viihtyisyyteen. Lähipalveluiden ympäristön suunnittelussa tulee ottaa huomioon paikan merkitys lapsille ja nuorille. Varhaiskasvatuksessa käytettävän metsän suunnittelussa ja hoidossa tulee ottaa huomioon luonnonympäristön merkitys lapsille.** Arvokkaiden luontokohteiden läheisyyteen suunniteltaessa ja rakennettaessa vaalitaan luonnon monimuotoisuutta. Kulttuurihistoriallisesti arvokkaaseen rakennettuun ympäristöön tai sen läheisyyteen kohdistuvat muutokset tulee suunnitella paikan henkeä kunnioittaen.*

Suunnitelmissa on selvitettävä vaikutukset kasvihuonekaasupäästöihin ja muihin päästöihin, luonnonvarojen kulutukseen ja ekosysteemipalvelujen toimintaedellytyksiin tehtävään soveltuvalla työkalulla. Pohjavesialueelle rakennettaessa on saavutettava valtakunnallisen viherkerrointyökalun tavoitetaso tai sitä vastaava viherrakentamisen laatutaso.



Route descriptions and design guidelines

Lahdenkatu street segment

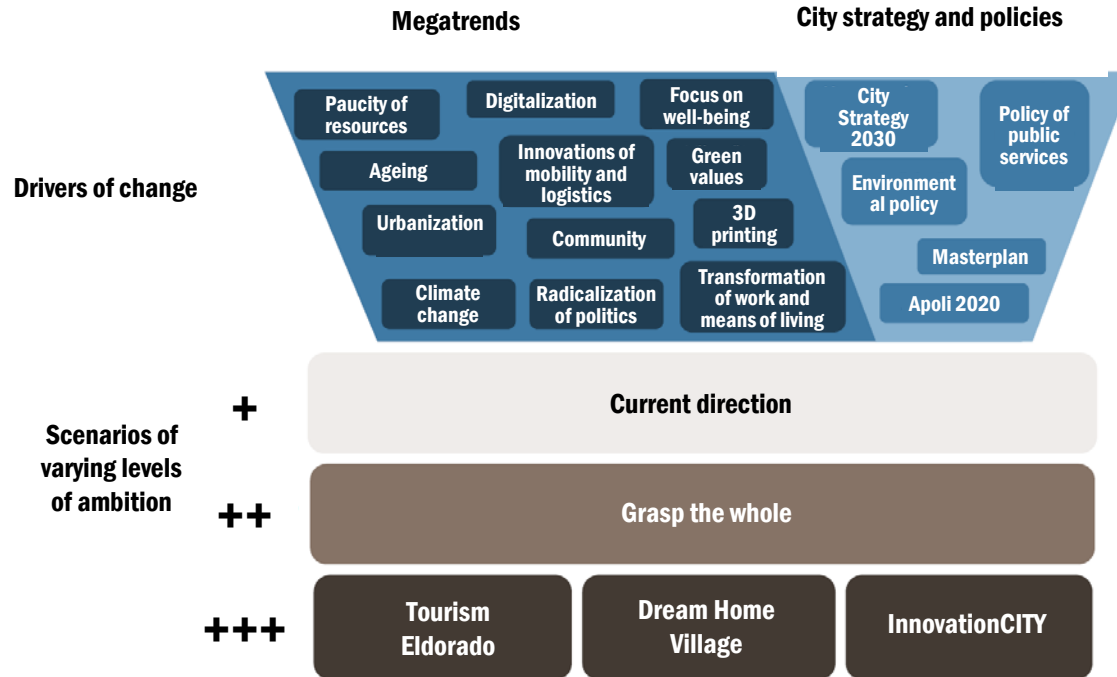


Continuous
dialogue between
land-use and
transport
planning

Design guideline

Kaupungin pääkadulle suunnitellaan korkeatasoista katu ympäristöä, jossa sekä autoliikenne että **pyöräily** toimivat sujuvasti. Liikennettä ohjataan ja kulkijoita opastetaan uusimmalla tekniikalla ja liikennevaloin. Pysäkit varustetaan laadukkailla, valaistuilla pysäkkikatoksilla, joista löytyy ajantasainen informaatio bussien saapumisesta. **Pyöräilyn pääreitin sujuvuuteen ja turvallisuuteen kiinnitetään erityistä huomiota ja sen varrella varaudutaan katetun pyöräpysäköinnin tarpeisiin.** Pyöräilyn ja kävelyn risteämistä autoliikenteen kanssa ohjataan liikennevaloin. **Kivimaan koulun lähiympäristössä kiinnitetään erityistä huomiota melusuojaukseen ja lasten turvallisiin koulumatkoihin. Alikulkukäytävän käyttöä tehostetaan laadukkein opastein.** Rengasmelua torjutaan nopeusrajoituksella ja päällysteillä. Kadun varrella on palveluita ja lyhytaikaista pysäköintiä. Asuinkortteleihin liitytään tonttikatujen kautta.

New round 2017-2020: Setting land-use and transport objectives through scenario work



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Integrated objectives for land-use and transport planning



1. Sustainably growing Lahti



2. Lahti centre



3. Living in Lahti



4. Livelihoods of Lahti



5. Services and commerce of Lahti



6. Natural Lahti



Example: Services and commercial areas in Lahti

In 2030...

In the urban zones every day services are accessible on foot or bike, other services are within reach by public transport. In rural areas services are accessed by public transport or by car.

In the urban zones public transport is a competitive service. Public transit trunk lines provide fast connections. The number of people boarding public transport has doubled.

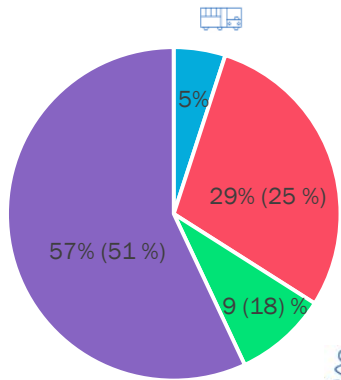
Good transit facilities have been provided in nodes of various modes of transport. Mobility services are an integral part of fluent travel chains.



Modal split now and in the future

Objective: In 2030, more than half of trips are made on foot or by bicycle.

2010



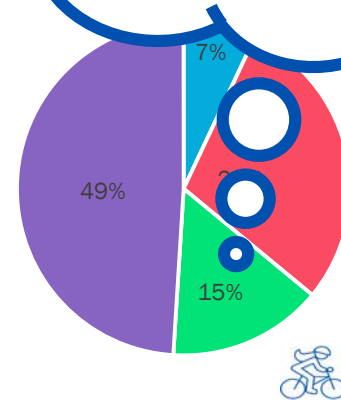
About 360 000 daily trips

in Lahti, of which

- 205 000 by car
- 18 000 by bus
- 32 400 by bike
- 104 400 on foot

■ Linja-auto ■ Kävely ■ Polkupyörä ■ Henkilöauto

What kind of urban environments do we need to create in order for people to walk and cycle more?

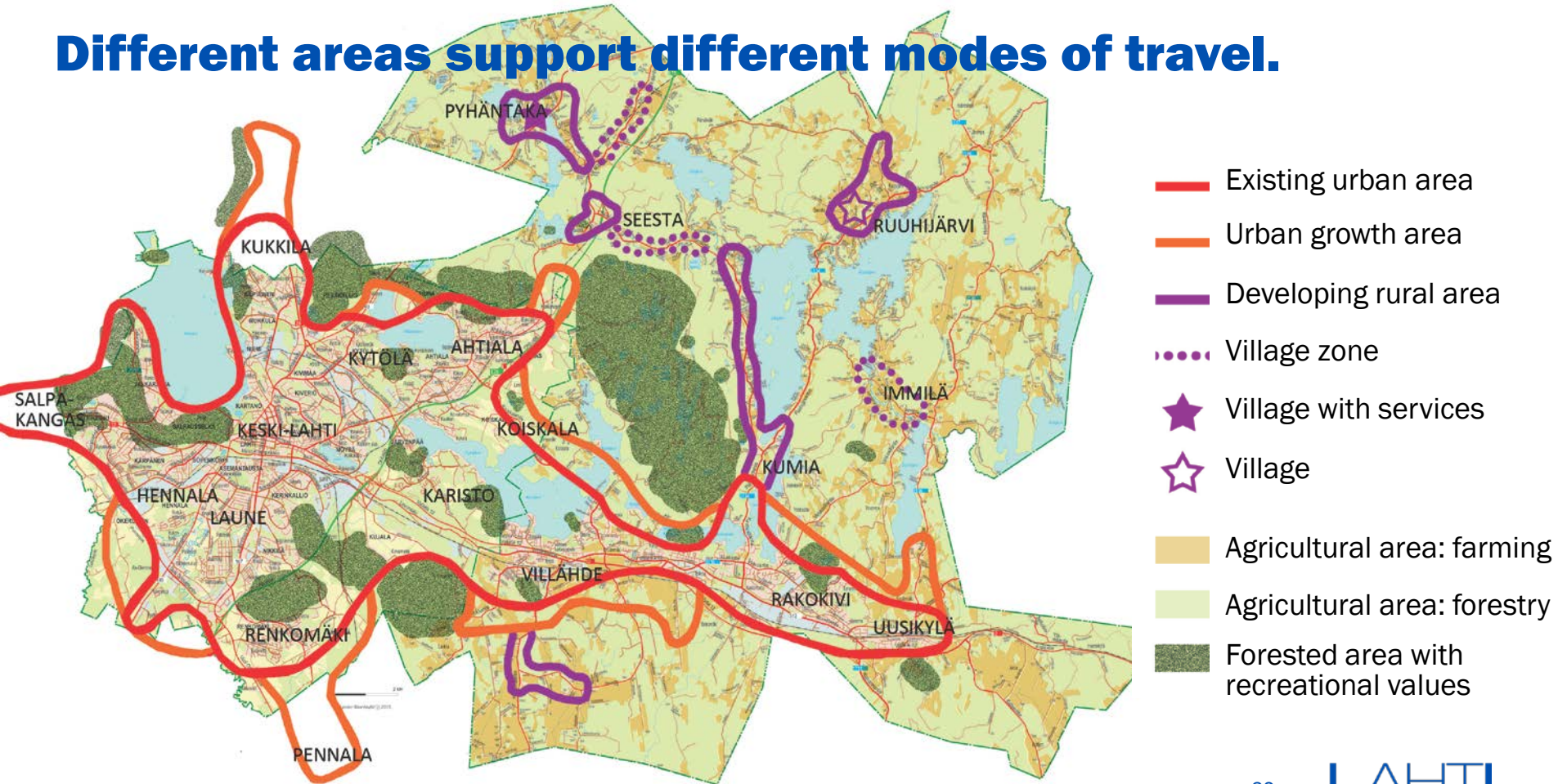


■ Linja-auto ■ Kävely ■ Polkupyörä ■ Henkilöauto

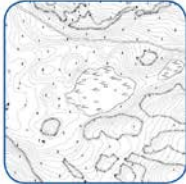

























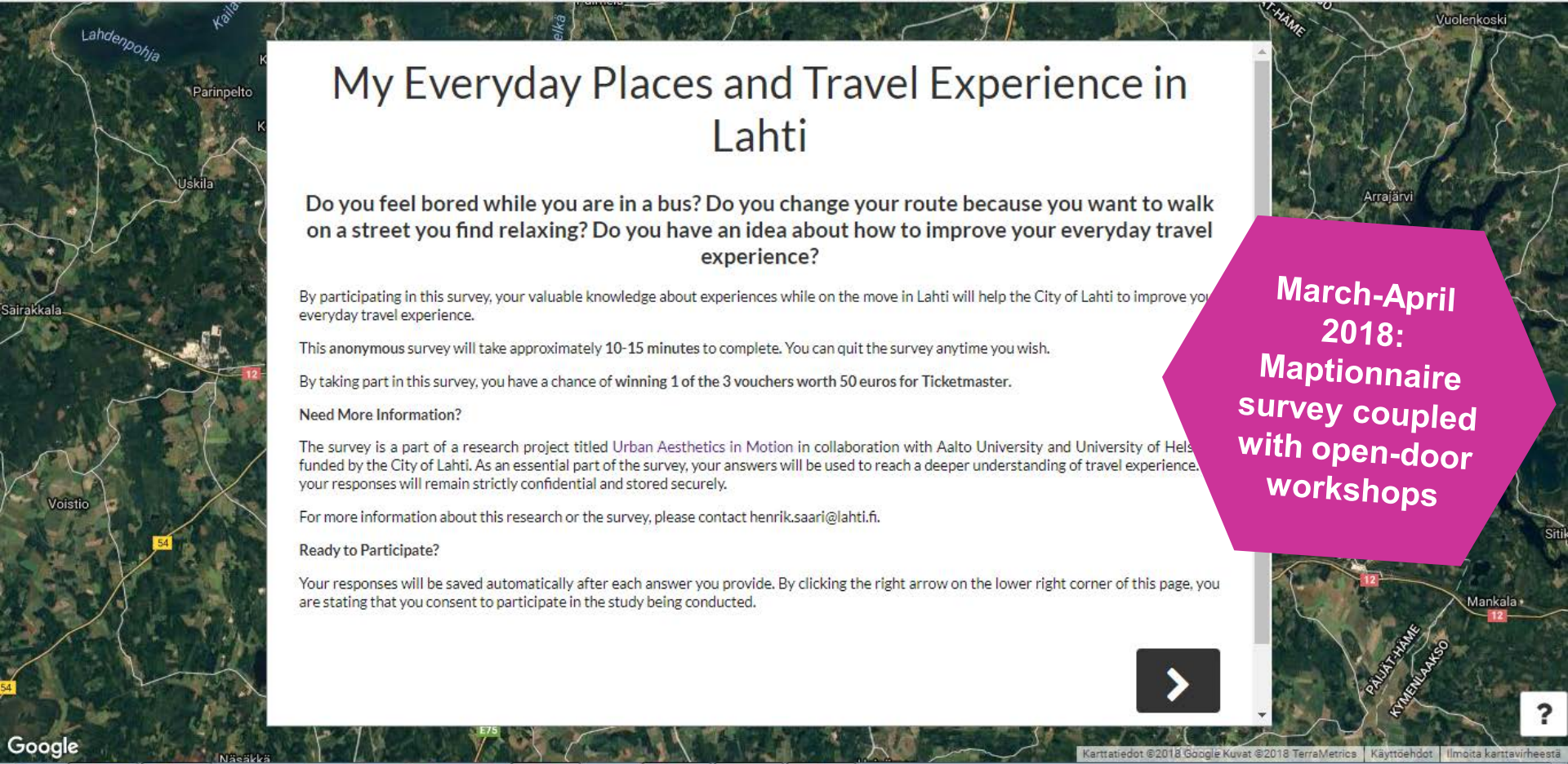
Sources: National mobility survey 2010, Lahti regional traffic survey, Lahti mobility survey 2016.

Different areas support different modes of travel.



From nature to city - Urban transect

	1.	2.	3.	4.	5.	6.
area type	Natural areas	Rural / peri-urban	Suburban single family homes	Suburban apartment blocks	Urban	Urban core
land-use	Forestry, recreation	Forestry and farming, rural living, recreation	Single-use zone Residential, services, commercial, industrial		Mixed-use zone Non-disturbing industries	
						
mobility						
						
	Pesäkalio Lapakisto	Ämmäla Ruuhijärvi	Ahtiala Villähde Uusikylä	Metsäkangas Nastolan kirkonkylä	Paavola Rakokivi Station areas	Lahti centre
nature						
	nature conservation, hiking & trekking	cultural landscape, farming	urban forests, gardens, allotment gardens	urban parks, play areas, allotment gardens	sports parks, urban parks, street trees	urban parks, esplanades, street trees, green roofs



My Everyday Places and Travel Experience in Lahti

Do you feel bored while you are in a bus? Do you change your route because you want to walk on a street you find relaxing? Do you have an idea about how to improve your everyday travel experience?

By participating in this survey, your valuable knowledge about experiences while on the move in Lahti will help the City of Lahti to improve your everyday travel experience.

This anonymous survey will take approximately 10-15 minutes to complete. You can quit the survey anytime you wish.

By taking part in this survey, you have a chance of winning 1 of the 3 vouchers worth 50 euros for Ticketmaster.

Need More Information?

The survey is a part of a research project titled Urban Aesthetics in Motion in collaboration with Aalto University and University of Helsinki, funded by the City of Lahti. As an essential part of the survey, your answers will be used to reach a deeper understanding of travel experience. Your responses will remain strictly confidential and stored securely.

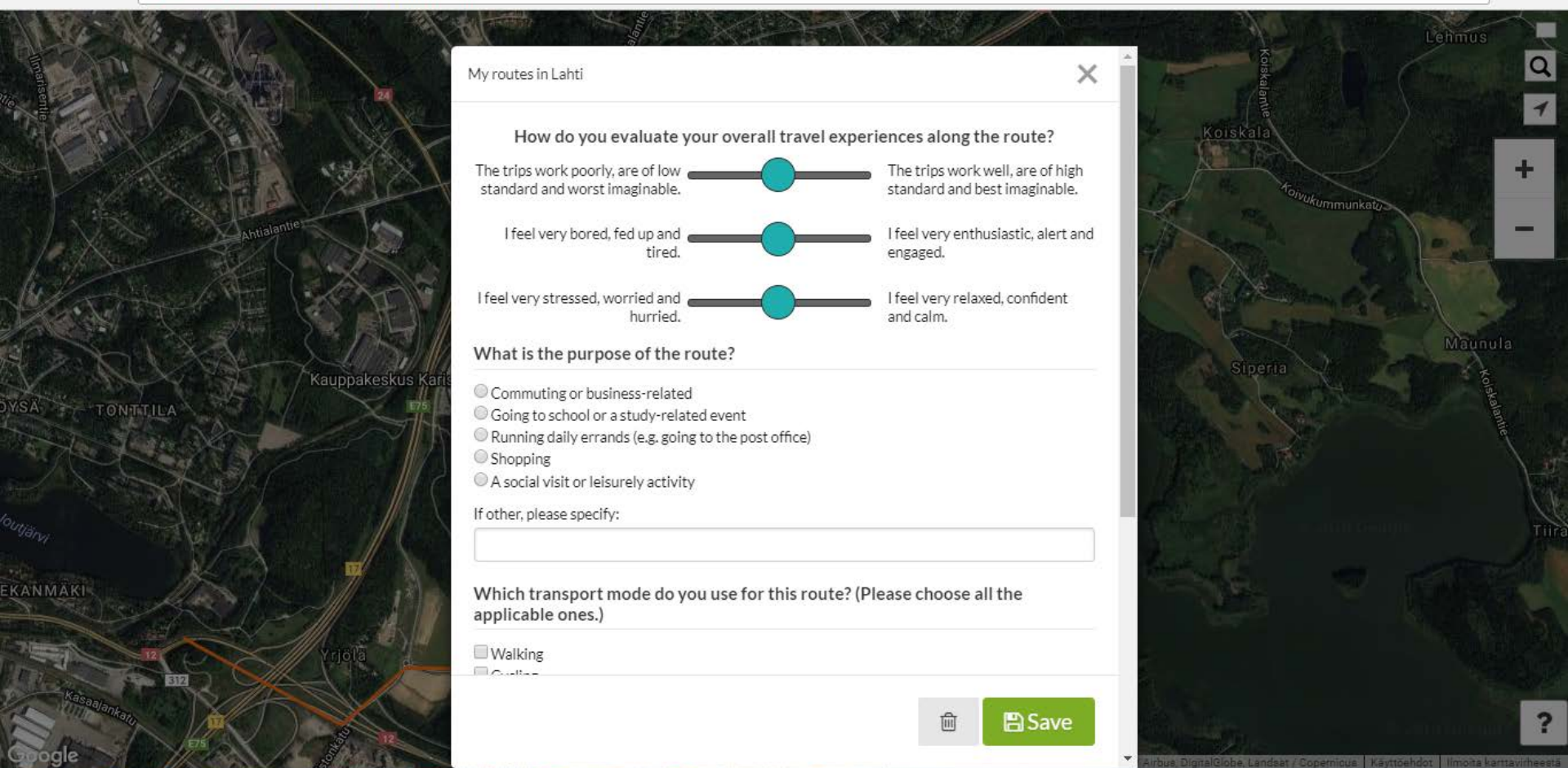
For more information about this research or the survey, please contact henrik.saari@lahti.fi.

Ready to Participate?

Your responses will be saved automatically after each answer you provide. By clicking the right arrow on the lower right corner of this page, you are stating that you consent to participate in the study being conducted.



**March-April 2018:
Maptionnaire survey coupled with open-door workshops**



My routes in Lahti ✕

How do you evaluate your overall travel experiences along the route?

The trips work poorly, are of low standard and worst imaginable. The trips work well, are of high standard and best imaginable.

I feel very bored, fed up and tired. I feel very enthusiastic, alert and engaged.

I feel very stressed, worried and hurried. I feel very relaxed, confident and calm.

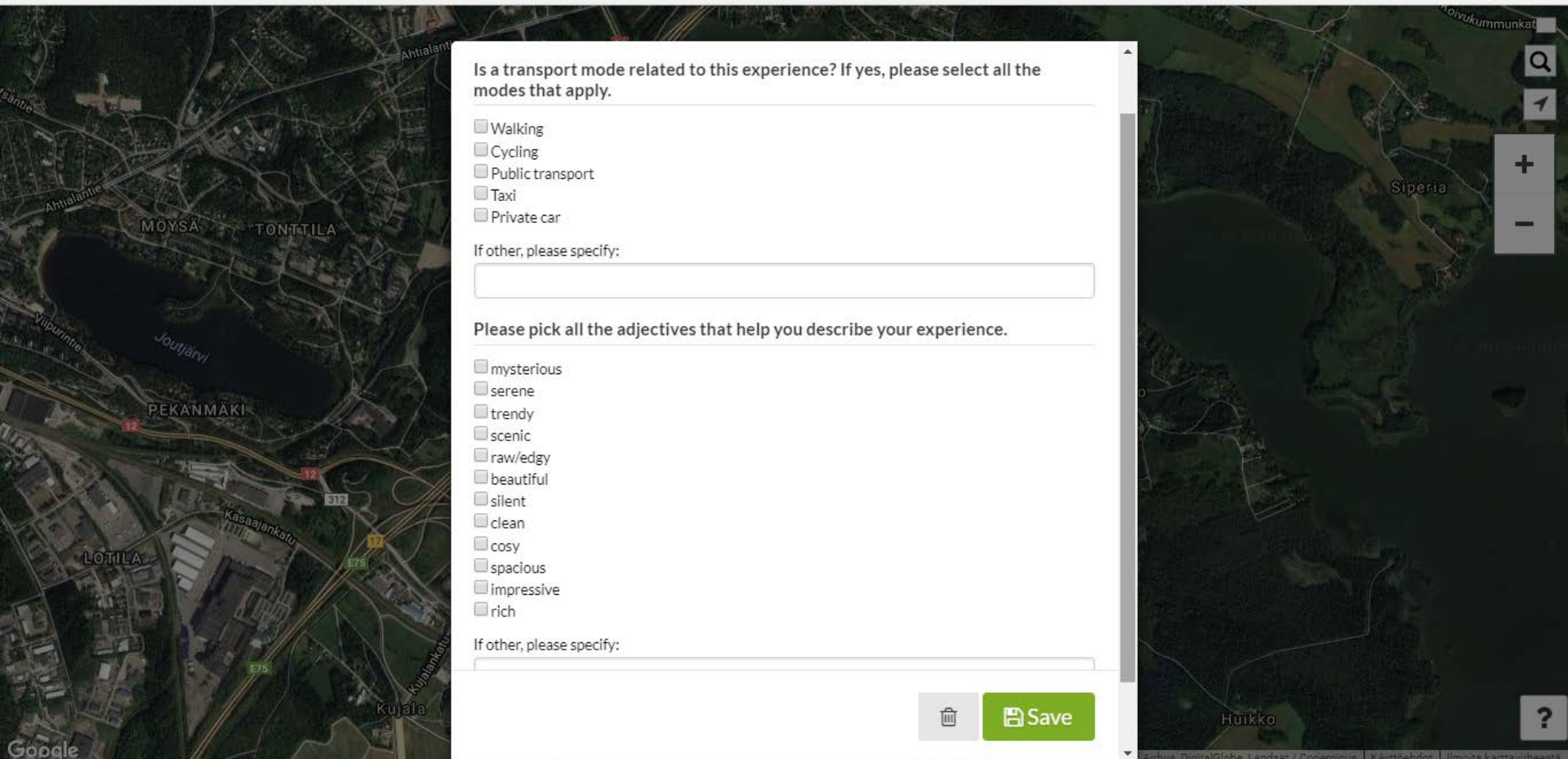
What is the purpose of the route?

- Commuting or business-related
- Going to school or a study-related event
- Running daily errands (e.g. going to the post office)
- Shopping
- A social visit or leisurely activity

If other, please specify:

Which transport mode do you use for this route? (Please choose all the applicable ones.)

- Walking
- Cycling



Is a transport mode related to this experience? If yes, please select all the modes that apply.

- Walking
- Cycling
- Public transport
- Taxi
- Private car

If other, please specify:

Please pick all the adjectives that help you describe your experience.

- mysterious
- serene
- trendy
- scenic
- raw/edgy
- beautiful
- silent
- clean
- cosy
- spacious
- impressive
- rich

If other, please specify:

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- arjen paikat ja reitit

10.4. Valo
12.4. Karisma
17.4. Trio
19.4. Rakokiven liikekeskus
Klo 14-18

Mitä sinun mielestäsi kaupungissa pitäisi kehittää tai säilyttää? Millaisessa ympäristössä sinä viihdyt ja arkesi sujuu?

Huhtikuussa ideoidaan Lahdelle uutta suuntaa. Kauppakeskuksissa eri puolilla Lahtea järjestettävissä tapahtumissa aiheena ovat arjen paikat ja reitit.

Tilaisuudessa kahvitarjoilu. Tervetuloa!

#lahdensuunta #omalahti

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My Lahti participation brand

The service promise

The City of Lahti promises that the knowledge built in collaboration with citizens will be carefully analysed, stored and made accessible for different planning purposes.

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It's all about the quality of everyday life.