

## PREFACE

This is an abridged version of Bicycle Strategy for Oslo 2015-2025, adopted by the Oslo City Council 29 April 2015, case number 86/15.





## INTRODUCTION

Oslo is one of the fastest-growing cities in Europe. Growth strains the city transport system and street space. Bicycles are environmentally-friendly and space efficient and therefore are a key part of future urban transport solutions. Cycling also contributes to enhancing city life and improving public health.

Encouraging travel by bike is in keeping with key goals for Oslo, including absorbing the growth in passenger transport by walking, cycling, and public transport travel, as set forth in the Parliamentary climate agreement and the National Transport Plan (2014-2023). The strategy also harmonizes with the "Oslo 2030; Smart, Secure, and Green" municipal plan.

The goal of Norway's National Bicycle Strategy (2014-2023) is for 8% of all trips to be by bicycle. This means that the cycling mode share of trips in cities should be 10% to 20%. As Norway's capital and largest city, Oslo should lead in adopting solutions making that possible. A comparative study for the Ministry of Transport and Communication showed that differences in the cycling mode share of trips in Norwegian,

bicycle kilometre is 26 NOK.

Danish, and Swedish cities cannot be explained by climate and topography, but are due to aspects of social structure, such as contiguous bicycle networks and commitment to cvclina.

As a mode of transport in line with cars and public transport, cycling historically has had low priority in Oslo. So to make cycling more attractive in Oslo, a contiguous bicycle network should be built. With it, cyclists can travel quickly, simply, and securely around the city. Hence building one is the principal measure of the bicycle strategy.



## **SURVEYS**

Research has provided sound basis for the bicycle strategy. An extensive survey of travel habits, attitudes, and behavior has been made, and the existing bicycle network has been analyzed. A "Cycling City Index" has been compiled, in which Oslo has been classified according to criteria for bicycle friendliness. The previous Oslo Bicycle Strategy(2005-2015) also has been evaluated. The surveys are collected in three reports that are available on the City of Oslo website. This knowledge comprises the starting point for identification of goals and priorities in the Cycling Strategy.

## Basis of strategy: Travel habits in Oslo in 2013

In 2013, 8% of everyday travel was by bike. The main goal of the Oslo Bicycle Strategyis to raise that portion to 16% by 2025. Population growth taken into account, that amounts to a tripling of everyday travel by bike. A considerable part of overall everyday travel in 2013 was by environmentally-friendly transport, as by walking and cycling and on public transport. The public transport share is greater in Oslo than in Copenhagen, and the cities are comparable in the amount of environmentally-friendly travel (walking, cycling, and public transport). Oslo decidedly is a pedestrian town. That quality should be developed further. The goal is for the growth in cycle traffic to come from a corresponding decline in car traffic, particularly for journeys of less than 5 kilometers.

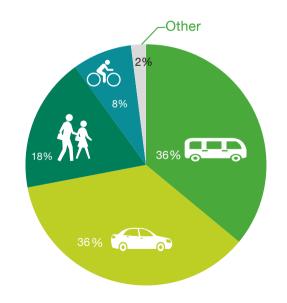
#### Who bikes in Oslo?

Some 94% of the residents of Oslo favor municipal efforts to encourage cycling, and many wish to cycle if the conditions are improved. The cycling mode share varies markedly between the Districts of the city. In the Grünerløkka District it is 15%. In the Frogner and St. Hanshaugen Districts it's nearly as much, 14%, However, in the Alna District, only 1%

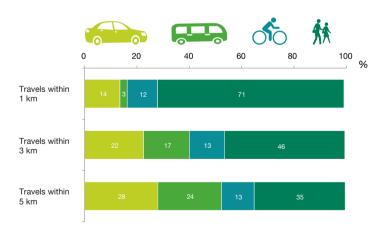
of everyday travel is by cycle. Despite its proximity to the center of the city, the cycling mode share in the Gamle Oslo District is only 4%. The Cycling City Index for Oslo indicates that the conditions for cycling are high in some Oslo City districts and low in others. This implies that the needs for improvements are not the same across the city. So individual city district cycling plans need to be drawn up. In turn, the potential for increasing the cycling mode share will vary from District to District.

Surveys in 2013 and 2014 indicated that Oslo residents deem the city as insecure for cycling. In all, only 9% of Oslo's residents think that the city is secure or very secure for cycling. Consequently, a key goal of the Strategy is to improve cycling road safety and cyclists' sense of security.

The goal is to increase the cycling mode share of trips at the expense of a corresponding decline in trips by car, particularly for shorter trips for which cycling is attractive and competitive. The potential is considerable. In 2013 people used cars more often than cycles, even for trips as short as one kilometer.



Modal share in Oslo, 2013





## VISION AND GOALS

The vision of the bicycle Strategyis that Oslo shall be a bicycle city for all. This means that people of all ages and proficiencies should be able to cycle in Oslo. The goals and secondary goals of the Strategy are aligned to achieve that vision. So they are about travel habits, cycling facility quality, and how cycling is experienced.

Oslo is on the right path toward increasing the share of travel by bicycle. The bicycle network and bicycle parking facilities continue to improve, and increasingly more people find cvclina secure.



#### Goal 1: Travel habits

The cycling mode share of trips shall increase to 16% by

## Secondary goal:

- The bicycle share of trips by people in underrepresented groups shall go up by 50%.
- The bicycle share of journeys to work shall go up to 20%.
- The share of children and young people who walk or bike to school shall be 90%.
- The share of cycling in winter shall to up to 30% of the share in summer.

The bicycle mode share varies by City District and trip purpose. The secondary goals are formulated to ensure their being met by the efforts to increase cycling mode shares.



Target proportion of bicycle travels.

#### Goal 2: Quality

Oslo's bicycle network shall be accessible, passable, and

## Secondary goal:

- At least 75% of the stretches and intersections of the bicycle network shall be of high passability to approved standards of security and safety.
- The bicycle network shall be configured so that at least 80% of the residents of the city live within 200 meters of it.
- The accident risk in 2025 shall be at the same level as in 2013.

The bicycle network shall be densified to be readily accessible where many people live, work, and travel. Densifying the bicycle network doesn't involve building cycle tracks and lanes on all streets and roads, but rather implementing measures in places that simplify cycling and make it more secure. So the bicycle network may include both elevated cycle tracks of high standard and local, low traffic streets, crosscuts, walking paths, parks, and green areas that need little or no further adaption.

The essential attributes of the bicycle network of accessibility and passability should be preserved in its denser parts with more traffic and trip destinations. With more, probably shorter cycle trips, it's essential that accident risk be held low or reduced.

The secondary goals will be followed up in the Bicycle Accounts every other year and lead to a new analysis of the bicycle network in 2025.



## Goal 3 Residents shall experience Oslo as a secure city for cycling

In the future, Oslo residents shall regard Oslo as a secure city for cycling, well suited for children and seniors on bikes.

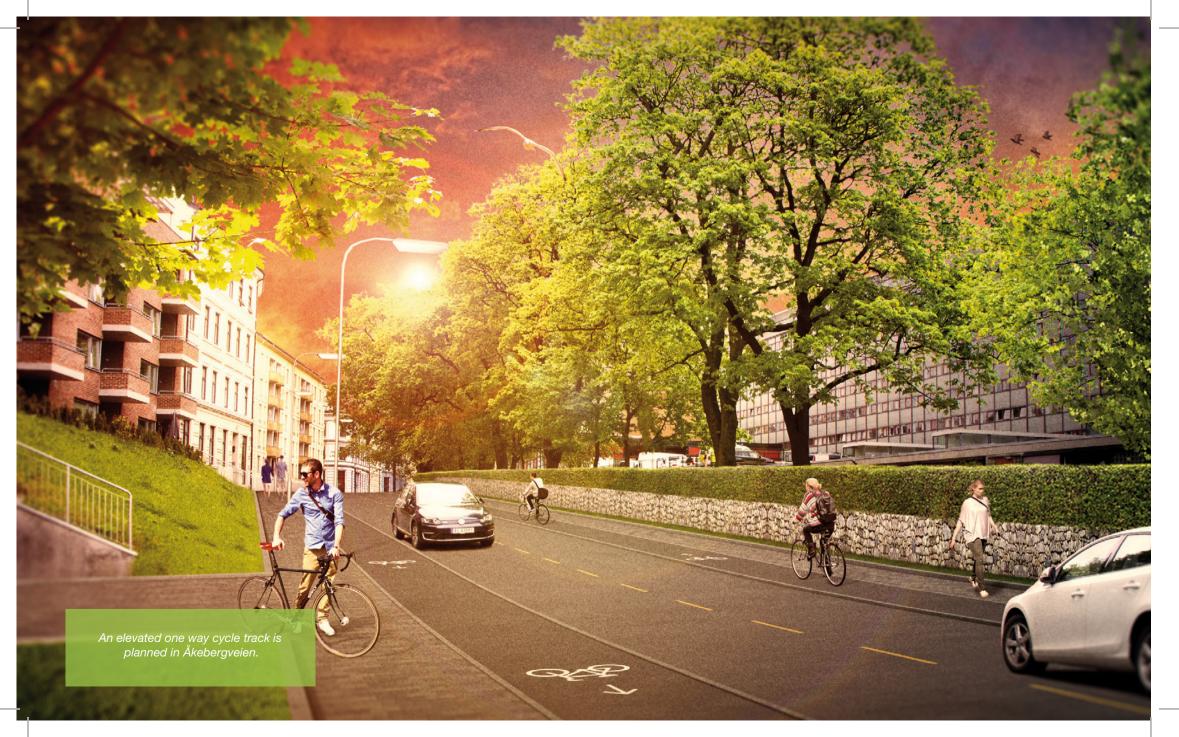
## Secondary goal:

- By 2025, 30% of all residents shall experience Oslo as a good cycling city.
- 25% of all residents shall experience Oslo as a good cycling city for children and seniors.
- 30% of all residents shall experience Oslo as a secure cycling city.

Experiencing security as a cyclist means that trips by cycle are predictable and that cyclists have a distinct place in traffic.







The Strategy identifies three priority areas linked to the main goals:

- 1. Bicycles are part of city life and urban spaces
- 2. A dense bicycle network of Oslo Standard shall be established
- 3. The entire city is involved in the bicycle initiative

For each priority areas there are eight measures: 1 A-H, 2 A-H, and 3 A-H



## The bicycle: part of urban life and city spaces

- Priority area 1

A precondition for the success of the bicycle initiative is to see the bike in the greater urban development context. An attractive, compact city development needs cycling as much as cycling needs compact city development.

A wide range of urban enterprises, high density, and functional mix are advantages for cycling, as they enable shorter trips. These city qualities also create attractive residential qualities.

## Include bikes in new development plans, measure 1A

At the outset, new development plans shall include the criterion of good cycling infrastructure. To a great degree, facilitating cycling and constraining areas for cars in new city developments enables other activity areas and/or green structures. Car pooling schemes can contribute to meeting much of the need for private cars. The emphasis should be on security, passability, availability, and recreation. On the basis of the Cycling City Index, a design guide for planning cycling in new city developments will be prepared in 2016.

## Signs and marking near construction works, measure 1B

Arranging well-signed diversions is necessary whenever construction work impinges upon the bicycle network. Cyclists should have as few detours as possible, each with good levels of security and safety. The municipal routines for signage and redirection during building and construction work will be reviewed, starting in 2015.

## Adapting buildings for bike parking, measure 1C

Good cycling cities need buildings adapted for cyclists. Requirements for bike parking should apply to new as well as rehabilitated buildings. Moreover, workplace needs for other facilities, such as locker rooms, showers, and drying cabinets should be assessed. On March 25, 2015 the Oslo City Council adopted resolution 72/15, "Evaluation of parking norms for Oslo" that called for strengthening and imposing requirements on bicycle parking. These proposals will be followed up in the revision of the parking norms.

## Plan for bike parking in Oslo, measure 1D

An increased cycling mode share entails a greater need for bike parking places, both permanent and temporary. In addition to being located in the right places, bike parking facilities must be maintained and provide for safe locking of all types of bikes, as set forth in a plan for bike parking in Oslo.

## Coordinated cycling and public transport, measure 1E

Planning of cycling and public transport should be considered together, which eases combining these modes of transport. This requires bicycle accessibility at transport terminals and stations as well as bicycle parking quality. At bus and tram stops and at train and Metro stations, users need secure and safe bicycle parking. A study should be made to determine if there's a need for differentiated short-term and long-term parking at the largest transport nodes. Oslo's bike sharing system is well suited as a link in the green travel chain. So adequate racks for bike share system at public transit hubs are important.

In 2015, the bicycle accessibility at all train and Metro stations in Oslo will be evaluated. The evaluation shall be followed up by recommendations for future development needs for and quality of bicycle parking at bus and tram stops and transport interchange nodes.

#### Bikes on public transport vehicles, measure 1F

In Oslo bikes may be taken on some public transport vehicles. Limited capacity on transport vehicles restricts the number of bicycles that may be accommodated, particularly during rush hours. There are many good examples of facilitating the carrying of bikes on public transport. For example, in Copenhagen there are dedicated carriages for bicycles on S-trains. Several public actors are cooperating to increase the capacity of public transport in the greater Oslo area, particularly of the light rail transport and Metro systems. From 1 January 2015, bikes may be taken free on Metro trains outside rush hours.

In 2015 a study will be made of the possibilities of taking bicycles on Light Rail Transit (LRT) vehicles.

## Pilot project with a bike hotel, measure 1G

At larger public transport hubs, such as Oslo Central Station and Skøyen Station, there are needs for staffed bike parking facilities to meet the needs of cyclists who wish to park their bikes for several hours or days. Good bike parking facilities are a key mean for increasing the number of trips by bicycles, particularly in commuting to and from workplaces. In connection with the evaluation of public transport hubs (measure 1E), in 2015 a pilot project study will be made and a transport node where it's feasible to establish a bike hotel will be identified. The pilot project will include indoor parking facili-

ties in surroundings attractive for cyclists, as well as a service station with standard tools, pumps, and lockers for storing personal gear, such as helmets and clothing. The pilot project of a bike hotel will be launched in 2015.

#### Expanding the bike sharing system, measure 1H

The bike sharing system has clearly shown that everyone can bike in Oslo. For various reasons, not everyone has their own bike. Oslo now has a popular and smooth-running bike sharing system. It lowers the threshold for cycling, as users have no expenses for bicycle maintenance and do not need to worry about bicycle theft. The bike sharing system also works well for people who arrive in Oslo by public transport and will continue their journeys on bicycles.

A new bike sharing system will be established in 2015, and in 2016 will comprise nearly 3000 bikes and 300 racks, including racks at the large campuses. In addition, the scheme will be extended to cover the city within the Ring 3 circumferential highway.



## A dense bicycle network of Oslo standard

- Priority area 2

The knowledge basis from of 2014 showed that residents were dissatisfied with Oslo as a cycling city and regarded it as insecure for cycling. As the country's largest city, Oslo needs a higher and more adapted standard than the normal requirements to which the cycling infrastructure was built.

The strategic goal for Oslo is to accommodate a tripling of bike traffic level of 2013. The bicycle infrastructure must be designed and shaped so that growth may be attained and managed.

## Develop a more accessible bicycle network, measure 2A

To strengthen the competitive advantage of cycling, the bicycle network must be more accessible than in 2015. The Norwegian Public Roads Administration standard, (Sykkelhåndboka, "The Cycling Handbook") recommends a bicycle network mesh size, that is the distance between bike routes, of 500 to 800 meters. In the main bicycle network in Oslo in 2015 the average of that distance was 1780 meters. The City of Oslo and the Norwegian Public Roads Administration have initiated work to create a more accessible bicycle network, aimed to be completed in 2015. The result will be a new plan for the bicycle network in Oslo. In addition, the remaining parts of the main bicycle network will be reviewed to identify which parts of the plan should be pursued and which parts are outdated or inappropriate in view of the new strategy.

## Introduce a higher standard in Oslo than required in The Cycling Handbook, measure 2B

Future cycling facilities must have sufficient capacity to cope with more cyclists than in 2015. A uniformly crafted bicycle network is one of the key factors enabling cyclists to feel secure in traffic. A standard for bicycle planning should be compiled as part of the work with the new network in 2015.

Whenever pedestrian traffic is low, cycling on sidewalks in Norway is allowed. But it should not be included in future plans. As a matter of course, the future bicycle network will have areas and strips dedicated to cycling. So it should be planned as if cycling on sidewalks was not allowed. As the number of cyclists goes up, pedestrians must be safeguarded as well as possible. Combined bicycle and pedestrian infrastructure isn't an ideal solution in a city, neither for cyclists nor for pedestrians, so it shouldn't be included in new projects.

### Larger and clearer signing, measure 2C

The signs used in Oslo in 2015 comply with the national standard. They are small, pallid, and not very noticeable in traffic, neither for cyclists nor for other road users. Guidelines for signing and marking for cycling should be compiled, as part of the work on a new bicycle network plan for Oslo. After the bicycle network plan is finalized, a new standard for cycling signage should be compiled. It should contain specifications of routines for inspection of existing signs (identifying defects and needs for action) as well as routines for erecting new signs in step with the expanding city. The network stretches to be signed should also be clearly specified.

#### Improved maintenance of bicycle network, measure 2D

Good operation and maintenance of the bicycle network are vital to increasing cycling mode share, particularly in winter. Snow, slippery streets, or gravel on the bicycle network increase the risk of accidents and reduce passability and reduce cycling comfort. Pavement smoothness and quality as well as quality of signage are among the other essential conditions that should be checked regularly. By the end of 2015, the City of Oslo and the Public Roads Administration shall jointly compile clear guidelines for standard levels of maintenance that reflect the needs of cyclists for security and passability.

#### Oslo speed limit plan, measure 2E

The effect of speed on accident risk and severity is indisputable. Nine of ten people survive collisions at 30 km/h. Lower speed limits and speed control measures can improve traffic interaction. Traffic calming measures include speed bumps, narrowing, and passage restrictions on motor vehicle traffic. A plan for speed limits on stretches included in the bicycle network will be compiled in 2016. City district traffic improvement and speed zone plans may provide the requisite bases for the plan.

#### Counter-flow cycling on one-way streets, measure 2F

Counter-flow cycling on one-way streets is an effective measure that prioritizes cycling. The experience with the measure is good in Oslo and other Norwegian cities, as well as elsewhere in the world. One-way streets inside the Ring 3 circumferential highway will be mapped in 2015, and a plan will be compiled for counter-flow cycling on them.

#### Initiatives in intersections, measure 2G

Many bicycle accidents occur in intersections. Mapping shows that improvements are needed at several intersections in the bicycle network. In order to improve cyclists passability and traffic safety bicycle infrastruture should be reviewed with intersections and prioritizing of cycling in mind. The measures that improve cycling safety include pregreen, withdrawn and advanced stop lines at traffic signals. These measures give cyclists a head start on other traffic at an intersection. Improvements at intersections will start so the first are finished in 2015. Works at half the intersections in need of improvement should be finished by the end of 2019, and all should be finished by the end of 2025.

## Initiating immediate measures in the bicycle network, measure 2H

Regular inspection of the bicycle network reveals needs for simple measures. Simple measures applied on longer stretches will contribute to the quality and enjoyment of the bicycle network. Bicycle network maintenance work in response to needs identified by regular inspection include signing, marking, advanced stop lines at intersection, and the like. Each half year, at least one longer route on the network should be inspected and repairs needed should be done rapidly and continuously.

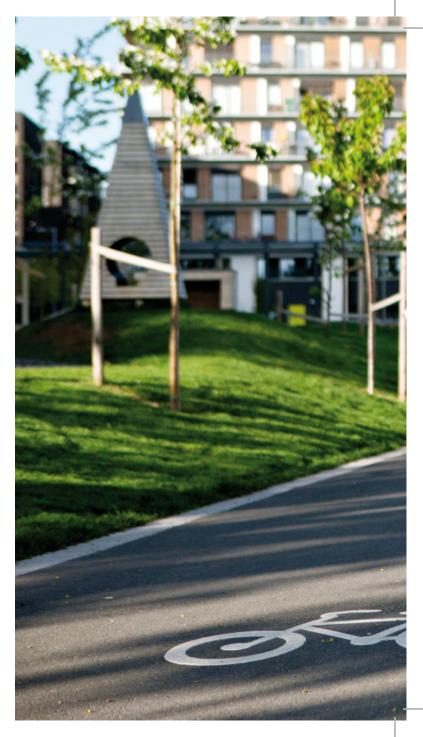
#### Oslo center

There is no contiguous network of secure bikeways through the center of Oslo. Surveys have shown that in the city center cycling passability and safety are low. So many cyclists choose to bypass the center by cycling around it. Consequently, the center of Oslo is a barrier, and not the hub it should be in a cycling city. In 2015, a pilot project will be conducted to improve bike passability in the center of Oslo.

## Cycling in mixed traffic

A denser bicycle network entails adapting more streets for bike traffic. Street adapting measures include counter-flow cycling on one-way streets, lower speed limits for cars, measures at intersections, marking, signage, and traffic management. In 2015 a pilot project will be conducted to facilitate cycling in mixed traffic with a cross-connection through the center between east and west.







## The entire city is involved in the bicycle initiative

- Priority area 3

In Oslo the cycling mode share varies considerably between Districts, age groups, and genders, and there is an urgent need for measures specifically for underrepresented groups of residents.

## City of Oslo to introduce its own standard for bike facilities, measure 3A

City of Oslo is one of Norway's largest employers, with more than 50,000 employees, including municipal enterprises. So improving municipal workplace cycling facilities potentially may increase the city's cycling mode share. By developing its own standard for bike facilities for employees and users, Oslo can be a pioneering municipality. Cycling should be a natural mode of transport to and from municipal offerings and services. So wherever possible, good bike facilities should be integrated in municipal offerings and services. Accordingly, agencies and activities shall be reviewed and adapted on an ongoing basis. Oslo also shall require bike facilities in new municipal buildings.

In 2016, at least two pilot projects will be started at selected municipal activities. The results of the pilot projects will lead to the compiling of guidelines for bicycle facilities at work-places and municipal services. The guideline document should be suitable as a tool for other workplaces.

Create a certificate for bike-approved workplaces, measure 3B A certificate for bike-approved workplaces will accentuate

the facilities for cyclists. Companies might use the certificate in promotion, on a level with "Eco Lighthouse" certification. "Bike-friendly workplace" incentives have already been implemented in Gothenburg and Trondheim. Requirements for approval can be taken from measure 1E.

## Cooperation with the business community and landlords, measure 3C

Cycling customers should be able to park their bikes close to entrances. City of Oslo shall cooperate with businesses and services to improve facilities for customers who bike to and from destinations.

Each City District shall have its own bicycle plan, measure 3D. Women, children, immigrants, students, and seniors cycle less than the population as a whole. There also are considerable differences between City Districts. The Alna District has a cycling mode share of 1%, the lowest in the city, while the Grünerløkka District has a cycling mode share of 15%, the highest. The great differences in cycling mode share between the Districts point to a need to tailor measures for cycling to needs in each District.

Each City District plans shall describe how the District can attain a higher cycling mode share. The City District plans will be compiled in pilot projects for one or two Districts and should include strategic approaches to bike travel. The pilot projects shall start in 2015, and all Districts shall have their own plans by the end of 2020.

School travel plans to promote more cycling, measure 3E Interviews of principals of Oslo elementary schools have shown that only 15% of schoolchildren cycle to school in

summer. In 2015, the traffic safety of areas around Oslo elementary schools varied. Nearly nine out of 10 schools have had no activities that promote cycling. Only half of the schools teach traffic rules, despite traffic education being compulsory in the curriculum.

Oslo schools should be encouraged to compile their own school travel plans to promote green travel to and from school. Plans for travel to and from school should chart needs and the possibilities for physical facilitating at schools and along the ways to and from them. Activities that can contribute to increasing cycling mode share include bike playgrounds in schoolyards, cycling in groups or with others traveling to and from school, campaigns, and initiatives. City of Oslo shall develop and follow up school travel plans in cooperation with elementary schools and other involved parties. In 2016, school travel pilot projects will be started at two elementary schools. The City Council resolution on the bicycle Strategycalls for the establishment in 2016 of two bicycle playgrounds in Oslo that will be available for schools and others seeking to teach cycling to children.

## Action plan for campuses, measure 3F

Many cities with high percentages of cyclists have campuses with noticeable cycling cultures, such as Lund, Cambridge, and Trondheim. In Oslo there are about 90,000 student places. In contrast to the situation in most other cities, the cycling mode share among students in Oslo is markedly lower than among the population in general. Only 4% of student in-town trips are by bicycle.

By the end of 2016, City of Oslo will initiate cooperation with at least one of the larger campuses in Oslo to compile an ac-

tion plan for increasing the cycling mode share among staff and students.

Conduct bike campaigns, measure 3G

Successful cycling campaigns have been conducted in some cities, including Odense in Denmark and Malmø in Sweden. Cyclists are not a single target group, but rather several target groups. So campaigns aimed at specific target groups are vital, such as campaigns toward motorists or people on shopping trips. Cycling campaigns should be in line with the bicycle Strategygoals and whenever suitable should be planned together with physical measures.

Bike route cooperation with neighboring municipalities, measure 3H

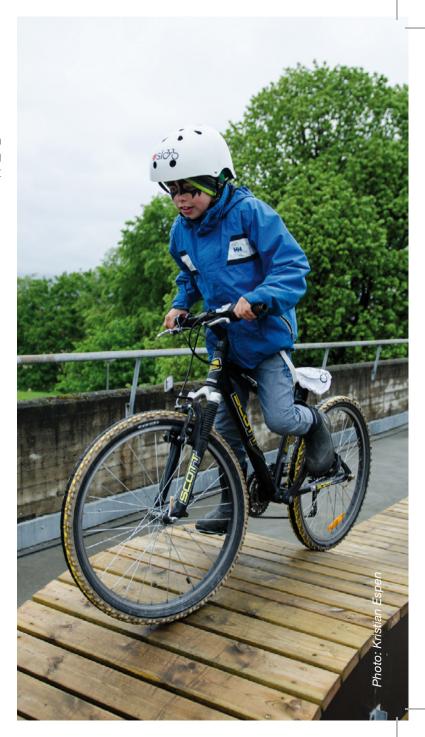
Oslo's neighboring municipalities are growing rapidly, and many of their residents commute by bicycle to Oslo. City of Oslo shall initiate cooperation among cycling specialists to better coordinate cycling studies, planning and conducting new measures, operation and maintenance, and the like. In 2015, at least two joint projects shall be conducted with selected neighbor municipalities.

## Bicycle Strategyfollow-up

The bicycle Strategyshall be followed up with an action plan that is revised once a year. Responsible actors should be involved in follow-up activities. The Bicycle Agency is responsible for following up the strategy. Experience with the Project has been good. Its organization has resulted in essential clarifications for project progress being rapidly made. Moreover, The Bicycle Agency has contributed to strengthening and positive marketing of the municipal cycling initiatives and projects. Progress in all action areas of the bicycle Strategy-

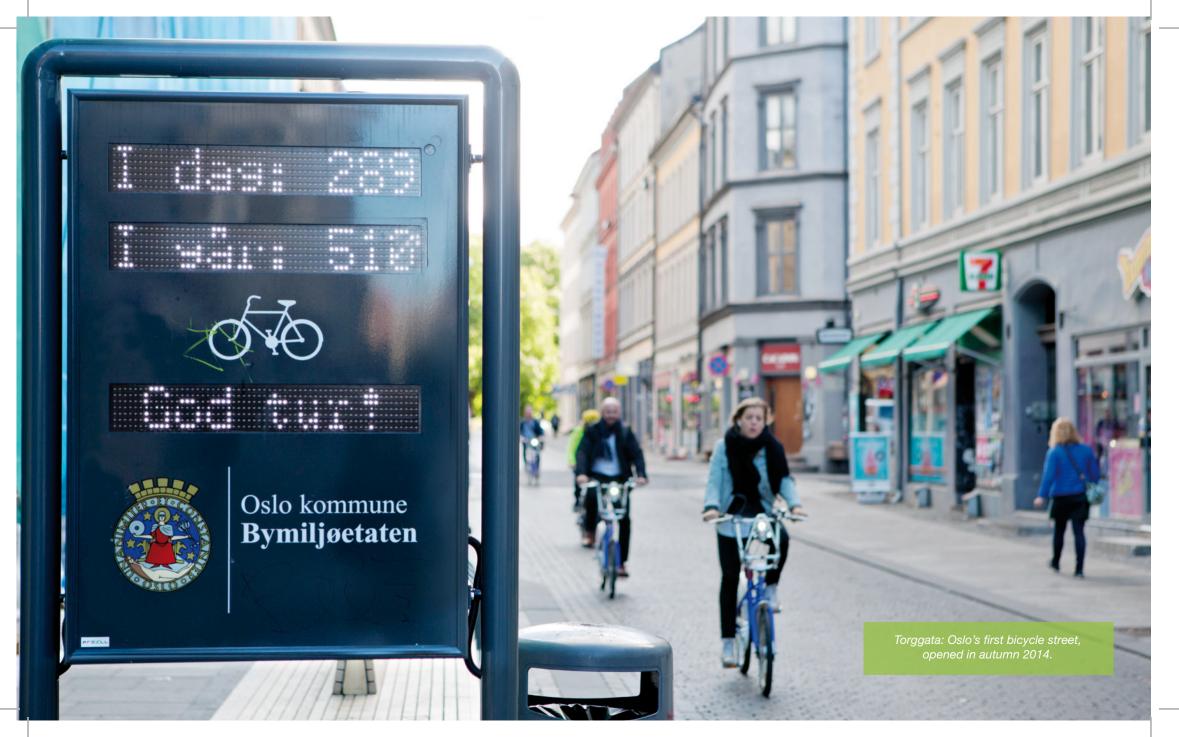
shall be reported to the Oslo City Council in connection with the Annual Report and Budget. An action plan for carrying through the bicycle Strategyshall be presented such that it can be included in the financial plan for 2016-2019.











## **ATTACHMENTS**

# Attachments available at oslo.kommune.no (only in Norwegian)

- Sykkelstrategi for Oslo 2015-2025, bystyrets vedtak 29. april 2015 med saksnummer 86/15 ("Bicycle Strategy for Oslo 2015-2025, adopted by the Oslo City Council 29 April 2015, case number 86/15").
- Reisevaneundersøkelse (RVU) for Oslo 2013, underlags rapport ("Oslo travel habits 2013, supporting report")
- Oslosyklisten, kartlegging av dagens og morgendagens syklister, 02.06.2014, underlagsrapport ("The Oslo cyclist, mapping the cyclists of today and tomorrow, 02.06.2014, supporting report")
- Evaluering av sykkelstrategi for Oslo 27.05.2014, un derlagsrapport ("Evaluation of the bicycle Strategyfor Oslo 27.05.2014, supporting report")
- Sykkelnettet, kartlegging av sykkelveinettets kvaliteter og defekter, 27.05.2014, underlagsrapport ("Bicycle network, survey of network quality and defects, 27.05.2014, supporting report")
- Høringsuttalelser ("Hearing comments")



