## Calgary's Centre City Cycle Track Pilot Network:

## Moving from Plan to Action

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Above: 7 St S.W and 3 Ave S.W. Cycle Track received from The City of Calgary

Above: Cycle Track Network Pilot Project source The City of Calgary

#### **Abstract**

Cycle Tracks
Protected bike lanes
Pilot

Cycle tracks are protected bike lanes where cyclists are separated from cars, both parked and moving. Anderson (2014) reports that few cities have connected cycle track networks on the ground "though many North American cities now have downtown grids of protected bike lanes in their official plans". Starting in April 2015, a network of cycle tracks will be installed in Calgary's Centre City as a one-year pilot project. The network will open in late June. The goal of the project is to "provide a safe and convenient network of cycling routes into and around the downtown core" (Bracic, 2014, p. 3). Calgary's Centre City Cycle Track Pilot Project is both a best management and cutting-edge practice. For this case-in-point I collaborated with Blanka Bracic, P. Eng. Bracic lead the planning of Calgary's Centre City Cycle Track Network and is the project manager for the Stephen Avenue shared space pilot project. The lessons from this case study are:

- Political support is needed to plan and install protected bike lanes.
- Stakeholders should be engaged in the planning process as early as possible.
- Practitioners should learn from other cities and adapt lessons to their context.
- Support needs to build ahead of time. Policy, administrative capacity, advocacy, and budgetary resources must be in place to make protected bike lanes a reality on the ground.

## Background

Increasingly policy makers are encouraging sustainable modes of transportation such as cycling. Substituting bicycle trips for car trips can contribute to "the reduction of noise, air pollution, greenhouse gas emissions, congestion and chronic disease, as well as to improved traffic safety and quality of life in cities and towns" (Sanders, 2013, p. 198)

Pucher and Buehler (2008) analyzed policies in the Netherlands, Denmark and Germany to gain an understanding of how to make cycling a safe and convenient travel mode in urban areas. They concluded that "the key to achieving high levels of cycling appears to be the provision of separate cycling facilities along heavily travelled roads and at intersections, combined with traffic calming of most residential neighbourhoods" (p. 495).

In 2014 there were 722,000 trips per day in and out of Calgary's Central Business District (The City of Calgary, 2015). Approximately 12,300 of those trips were made by bicycle. Currently, 2.5 percent of peak morning trips into downtown are made by bicycle. The Cycling Strategy sets a 2020 target of four percent of peak weekday morning trips into downtown made by bicycle.

Pucher and Buehler state that "separate [cycling] facilities are not sufficient but they are certainly necessary to ensure that cycling is possible for a broad spectrum of the population" (2008, p. 513).

#### Cycle Tracks

Cycle tracks are protected bike lanes where cyclists are separated from cars, both parked and moving. Cycle tracks are common in northern Europe and are increasingly being installed in North American cities (Pucher, Buehler, & Seinen, 2011, p. 465). Montreal was the first city in North America to install cycle tracks, it has "been quietly building cycle tracks since the late 1980s" (Babin, 2014). Babin credits cycle tracks as the reason Montreal is recognized as one of the "most bike friendly cities in the



Above: 7 St. S.W. Cycle Track and recieved from The City of Calgary

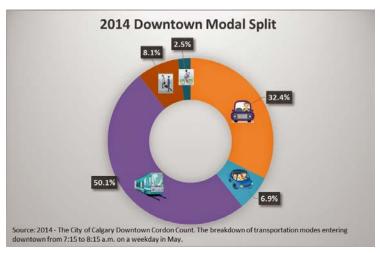
world" (2014).

White (2014) highlights that cyclists, pedestrians and drivers all benefit from protected bike lanes because they create "a more orderly and predictable integration of all three modes of traffic." New York was the first US city to introduce cycle tracks and it was partly to respond to conflicts between bikes and cars.

# Facts & Outcomes

The planning context will be discussed first, then how the projects started, and lastly the details of the project.

Plans, Policies and Strategies Calgary's highest level plans, the Municipal Development Plan (MDP) and the Calgary Transportation Plan (CTP), prioritize sustainable modes of transportation and providing



Above: Central Business District Cordon Count source The City of Calgary.

Calgarians with more transportation choices. Calgary's Bicycle Policy and Centre City Plan stress the importance of cycling infrastructure that is safe, convenient and well connected.

In 2011, Calgary adopted their Cycling Strategy, in order to achieve the goals and policies of their higher level plans. This strategy contains actions that will help make Calgary a more bicycle friendly city, and includes the year-by-year planned development of the Centre City Action Plan's Map, which identifies future bicycle routes in the Centre City.

#### How did the Centre City Cycle Track Pilot Project start?

In July 2011 Council directed administration to engage with the cycle community and review the Centre City Action Plan Map to provide an updated "East-West-North-South separated cycle route network through the Centre City" (Bracic, 2014). This is the origin of the Centre City Cycle Track Pilot Network project.

#### **Project Details**

Blanka Bracic, P. Eng, Transportation Engineer, Leader Active Transportation Projects, lead the planning of Calgary's

TARGET

0.7 KM EXISTING CYCLE TRACK

6.3 KM TOTAL FOR FOUR CYCLE TRACKS AND STEPHEN **AVENUE SHARED SPACE** 

Above: Cycle Track KM in The City of Calgary

Centre City Cycle Track Pilot Network. The planning started in the fall of 2011 and the goal was to identify the network.

Cycling Strategy • Has 50 actions that will help make Calgary a bicycle-friendly community. Created three dedicated staff positions to plan and design infrastructure. and educate and promote cycling. Identifies a budget Municipal Centre City Cycle **Imagine Calgary** PlanIt Calgary 7 St S.W. Cycle for bicvcle Development Plan Track Opens Track Pilot Community Process to create infrastructure capital Project opens visionning and integrated Calgary projects, 1.1 percent First cycle track in consultation process. transportation and of the Transportation City Centre, 0.7 KM Transportation Plan The goal was to land use plans to budget is dedicated long. Increased emphasis on create a shared guide growth for the exclusively to the sustainable modes of next 60 years. vision for Calgary. cycling strategy. transportation and Sets a target of 30 KM providing more of cycle tracks by transportation choices. 2020. 2010 2011 2005 2006 2007 2008 2009 2012 2013 2014 2015 2016 Bicycle Policy Centre City Plan Council approves Pilot Project Includes a goal "to **Evaluation Report** Directs the provision pilot of Cycle design and operate a of "a safe, convenient to Council Track Network city in which cycling is and well-connected and Stephen a meaningful bicycle network Avenue shared transportation choice within the Centre for social and space City." economic interaction. The goal can be achieved by providing well-designed and operated, direct, convenient, safe and Above: Timeline of Plans. Policies. Strategies and Cycle Tracks comfortable bicycle Created by Lucy Ramirez from information from The City of Calgary

routes and facilities."

To identify the network, potential north-south and east-west corridors were evaluated. Corridors "were defined as a grouping of two or three streets that serve similar trip origins and destinations" (Bracic, 2014, p. 3) In the spring of 2013 a consultant with North American cycle track design expertise was hired to assist with the project. The core project team consisted of Bracic, two consulting engineers and a communications professional. Additional expertise was brought in when needed. When selecting and designing the cycle tracks "the project team vetted the results of the technical evaluation with site observations. feedback from the public and City staff, and best practices" (Bracic, 2014, p. 3).

The 7 St. S.W. cycle track, the first in the Centre City, informed the Cycle Track Network. Best Management Practices such as the National Association of City Transportation Officials (NACTO) urban bikeway design guidelines were used. The 7 ST. S.W. cycle track was a test case in designing facilities for all street users. It helped address questions such as: how wide to make the buffers, how to design parking lanes next to a cycle track, cycle track design, installing signs in buffer space, deciding on conflict pavement marking (which material to use) how to talk to businesses. how to evaluate, and how to message the project (personal communication, March 20, 2015). Typically, a municipality will install one or two cycle tracks at a time over a number of years. However, it became apparent that there might not be the support to install permanent cycle tracks in the Centre City. So administration recommended "installing the cycle tracks and opening them as a complete network for a one-year pilot period" (Bracic, 2014). This is a cutting edge practice.

## Lessons Learned

Political support is needed to plan and install protected bikes lanes. In Calgary the Mayor championed the project. The Centre City Cycle Track Pilot Network was approved by a narrow Council vote - eight members were in favour and seven were opposed.

Stakeholders should be engaged in the planning process as early as possible. This raises awareness of the project and allows practitioner to highlight how the project can benefit stakeholders. In this project the consultation process was extensive. As Bracic (2014) explains, "the project team... hosted 90 open houses, information sessions and oneon-one meetings since spring 2013. Over 2,200 feedback forms...[were] collected in the same timeframe" (p. 5). Harris and Nixon (2013) emphasize that documenting the consultation process for Cycle Tracks is important. This was reaffirmed in this case study.

Meeting with stakeholders early helped the germination of a grass roots campaign to support the cycle track network, the campaign, called Calgarians for Cycle Tracks, continues today. Over 20 civic leaders wrote to City Council to endorse the Cycle Track Network's health, economic and safety benefits. Over 50 businesses displayed the 'We Support the Cycle Track" sign (Bike Calgary, n.d.).



Above:We Support the Cycle Track Sign source Bike Calgary

Practitioners should learn from other cities and adapt lessons to their context. In Calgary, "cycle track configurations were based on current best practices in North American bicycle planning and design, understanding of the local context, and feedback received during the ongoing engagement" (Bracic, 2014, p. 3). The engagement process was informed by Vancouver's experience and recommendation to meet with business early on.

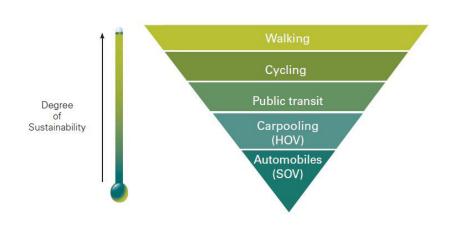
Experiences from other cities also informed the evaluation of the pilot project, by giving a sense of what should be monitored. The Association of Pedestrian and

Bicycle Professionals (APBP) was a good resources. Bracic also monitored newsletters from other cities, interviewed other professionals and is active on Twitter. She concluded most cities monitor the same things. "Data was collected the summer and winter before the installation of the pilot network. Data will be collected the summer and winter immediately after it's installed, and again in the summer a year after installation" (Bracic, 2014).

The final lesson from this case study is to build support ahead of time. Practitioners need to have the policy, administrative capacity, advocacy, and budgetary resources in place to make protected bike lanes a reality on the ground. In Calgary, this support came from a number of the City's existing plans and strategies. Sustainable transportation is emphasized in Calgary's highest level plans such as the Municipal Development Plan (2009) and the Calgary Transportation Plan (2009). The Bicycle Policy (2008) and the Centre City Plan (2010) both emphasize the importance of building safe, convenient, and well-connected bicycle routes and facilities. Lastly, the Cycling Strategy (2011) set specific actions to make Calgary a bicycle friendly city. Its approval also provided Council endorsement for a City bicycle program - with staff and a capital budget. The Cycling Strategy built momentum to make cycling a real transportation choice. Among its actions the strategy created three dedicated

"Speak to stakeholders as early as possible, to let them know how the design could benefit them. Speaking to stakeholders [in the Centre City] meant community representatives had the information to then create a campaign to support the cycle track routes."

- Blanka Bracic. The City of Calgary



Above: The Transportation Sustainability Triangle, source Municipal Development Plan p. 2-34

staff positions to plan and design infrastructure, and educate and promote cycling. "The presence of staff has done a lot. They have influenced others in the organization and build support for cycling. The discourse has changed and as result the culture has changed" (personal communication, March 20, 2015).

### Conclusion

Calgary has been working towards the goal of becoming a bicycle friendly city for a number of years. The Cycling Strategy has been instrumental in making this goal a reality. The Council motion that precipitated the Centre City Cycle Track Pilot Network originated from wanting a more detailed Centre City Action Plan Map in the Cycling Strategy. While protected bike lanes on their own do not ensure people will cycle, they are necessary to make cycling appealing to both young and old, women and men, and people with all levels of cycling ability. Calgary's Centre City Cycle Track Pilot Network is both a best management and cutting edge practice to watch.







Above: 7 St S.W. Cycle Track in Winter recieved from The City of Calgary

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