DECISION/DIRECTION NOTE

Title:	Bike St. John's Task Force – Final Report
Date Prepared:	January 25, 2017
Report To:	Community Services and Housing Standing Committee
Councillor and Role:	Deputy Mayor Ron Ellsworth
Ward:	n/a

Decision/Direction Required:

Direction is required on what steps the City of St. John's should take next with regard to cycling in the City.

Discussion – Background and Current Status:

The Current Cycling Master Plan (2009) implemented a variety of cycling facilities starting in 2010. Over time, feedback on these facilities and the lack of further action on cycling led to the creation of the Bike St. John's Task Force in 2015. A one year mandate was established to:

1. consider the current state of the Bike St. John's initiative
2. consider current Bike St. John's priorities and the direction of related City plans
3. recommend the next steps that would be appropriate for the City to take on the Bike St. John's initiative

The current status review: considered the history of the Cycling Master Plan (2009) and it's implementation; conducted three site visits; completed an extremely successful public opinion poll; reviewed data from the industry on the impacts of cycling use in communities; and, conducted a parking study to assess the impacts of bike lanes on on-street parking.

The results of this review were that residents of the City have a strong desire to see safe, comfortable, and convenient cycling facilities available to them. A strong majority agreed that it would be appropriate to change the layout of streets, including the removal of one side of parking in some areas, to accomplish this goal. The research reviewed showed strong evidence that increased cycling improves the health of the population, decreases the reliance on personal vehicles, reduces air pollution, improves performance of adjacent businesses, provides a cycling tourism attraction, and reduces overall spending on transportation infrastructure. It also found that concerns over impacts on local on-street parking are not borne out in an objective assessment.

Four overall themes were identified for future priorities. These themes were:

1. to support opportunities for safe cycling
2. to foster a cultural change in attitudes toward cycling
3. to ensure cycling is a viable transportation option
4. to push toward efficient and effective use of existing resources and future investments

An examination of the different types of facilities, the different material types available, network design considerations, and the different users that need to be considered was carried out. This resulted in several important findings. For example, when designing a cycling network it is important to consider the wide variety of people that may wish to use these facilities. Users could include a child on a park trail; a road racer on a training run; someone on a "fat bike" out enjoying the winter weather; a family taking advantage of the T'Railway; a mountain biker on the East White Hills; a tourist seeing the sites across the City; or, any number of other activities.

Three key next steps have been identified by the Task Force. First, a broad strategic direction needs to be established, second two major initiatives have been identified, and finally a selection of quick win projects has been identified to allow for immediate action.

Key Considerations/Implications:

1. ***Budget/Financial Implications***

   $125,000 is required to complete a Comprehensive Bicycle Strategy and Master Plan. $90,000 was previously allocated for this work and approval would not impact the 2017 budget. $35,000 of new funding would be required in the 2018 budget.

   $50,000 in the 2017 budget would be an appropriate allocation to complete most or all of the identified Quick Win projects in 2017.

2. ***Partners or Other Stakeholders***

   The Task Force included representation from multiple City divisions, a local cycling group, the Grand Concourse Authority, the RNC, and several members of the public at large.

3. ***Alignment with Strategic Directions/Adopted Plans***

   Providing support for cycling infrastructure and programs will contribute to these strategic directions and goals:

   - Neighbourhoods Build Our City: Promote a safe and secure City & Improve neighbourhood-level services
   - A City for All Seasons: Support year-round active transportation & Promote active and healthy living

4. ***Legal or Policy Implications***

   The priorities identified by the Task Force require some policies and/or practices to be updated to ensure proper consideration of cycling in City work.

5. ***Engagement and Communications Considerations***

   Future engagement will be required as the Bike St. John's initiative moves forward but none directly related to this decision/direction note.

6. ***Human Resource Implications***
   Staff time and resources will be consumed as this initiative moves forward.

7. ***Procurement Implications***
   A Comprehensive Bicycle Strategy and Master Plan as well as some Quick Win projects will require consultant and equipment tenders.

8. ***Information Technology Implications***
   N/A

9. ***Other Implications***
   The strategic direction established by this decision/direction will have a direct impact on all residents of St. John's well into the future.

Recommendation:

The Bike St. John's Task Force recommends that the City of St. Johns complete the following next steps. Other than the strategic direction these recommendations may be considered and approved individually.

Strategic direction:

i. That the City commit to developing safe, comfortable, and convenient cycling infrastructure, policies, and programs.

Major Initiatives:

ii. That the City establish an ongoing Bicycle Advisory Committee.
iii. That the City approve $125,000 to hire a consultant to assist with the preparation of a Comprehensive Bicycle Strategy and Master Plan. This includes $90,000 already allocated and that an additional $35,000 be considered in the 2018 Capital Budget.

Quick Win Projects:

iv. That the City consider approval up to $50,000 in the 2017 Capital Budget for the completion of the following quick win projects.
    a. That the City upgrade the T'Railway with signage, repairs, and automated usage monitoring equipment.
    b. That the City create a "Car Free Sunday Event" in partnership with community groups.
    c. That the City create a cycling education event.
    d. That the City develop a bike rack design competition in support of the local arts community.

In addition to these recommendations Council has expressed the wish to adjust parking regulations in select bicycle facilities. The details of this adjustment are provided in the attached *Bicycle Lane Parking Adjustment*.

Prepared by:
Garrett Donaher, Transportation Engineer

Signature:_____

Approved by:
Brendan O'Connell, Director of Engineering

Signature:_____

GD/

Attachments:
Bike St. John's Task Force – Final Report

Bike St. John's Public Opinion Poll

Bicycle Lane Parking Adjustment

Bike St. John's Task Force – Final Report

Introduction

In July of 2010 City Council approved the implementation of the first phase of infrastructure identified in the 2009 Cycling Master Plan. By 2015 many of the facilities created by this round of implementation suffered from maintenance neglect and a lack of connectivity. Further, questions were raised in City Council as to whether there was any value at all in several on street facilities. In June of 2015 Council considered a status report on the 2009 Cycling Master Plan. This status report recommended that a Master Plan update be completed. At this time Council directed staff to form a committee to review the relevant issues and report back to council on the result. In February of 2016 Council approved the membership and terms of reference for a new Bike St. John's Task Force.

Over the course of 2016 the Bike St. John's Task Force completed many items in consideration of the relevant issues including:

- discussed the current state of cycling facilities in the City
- discussed the comments received by Council with respect to impacts of the existing infrastructure
- reviewed the petitions received opposing and in favour of the first round of implementation
- provided information to council on the relationship between cycling and parking
- initiated a process to incorporate cycling guidance in the NL Road User Guide (driver handbook)
- advanced a pilot project concept for Quidi Vidi Lake loop trail
- contributed to the Provincial Climate Change Strategy consultation process
- supported a local academic grant proposal to enhance cycling data and awareness in the region
- visited key sites with bike rides to Cowan Heights, Prince Philip Drive, and MacDonald Drive - downtown
- contributed to the 2017 Budget Consultation process
- discussed how the City may approach cycling into the future and what priorities would best address the concerns of the public
- conducted an online public opinion survey
- conducted a parking utilization study in areas affected by cycling lanes

This report documents the review, findings, and recommendations of the Bike St. John's Task Force. It begins by outlining the current status of cycling in St. John's, proceeds into an exploration of possible future priorities and concludes with a set of recommendations for council to consider with respect to cycling in the City over the long term.

Current State Review

1. ***Cycling Master Plan (2009)***

   In May 2007 a consulting team including Hatch Ltd, Marshall Macklin Monaghan, and Nova Consultants was retained by the City of St. John's to develop a Cycling Master Plan. In 2010 a subsequent risk assessment of the implementation plan was completed by a team including Delphi - McCormick Rankin and TRL.

In July of 2010 council approved implementation of Phase 1 and Phase 2 of the infrastructure recommended in the Cycling Master Plan.

In response to the public consultation completed as part of the Cycling Plan implementation there were several submissions concerning the proposed plan. There were petitions received from residents of Frecker Drive (262 signatures), Canada Drive (77 signatures), Newtown Road (69 signatures), Old Topsail Road (35 signatures) and two written letters. These 445 total signatures/letters were against the implementation of bicycle facilities, primarily due to the parking impacts in front of their homes. An online petition in support of the plan implementation, regardless of impacts, received 1,094 signatures.

In response to the public consultation and feedback received, City Council amended the implementation plan as part of their approval. **Table 1** details what cycling facilities were implemented as part of this approval.

Table 1	*Recommended*	*Council Approved*	*Completed*	*Parking Impact*
Phase 1				
Frecker Drive, Canada Drive, Hamlyn Road, Cowan Avenue	Bicycle Lanes	Bicycle Lanes	Yes	One Side, both in some areas
Captain Whelan, Columbus Drive, Prince Philip Drive	Multi-use Trail	Multi-use Trail	Yes	None
Cashin Ave Extension	Bicycle Lanes	Bicycle Lanes	Yes	None
Cowan Ave - Topsail to Waterford Bridge	Bicycle Lanes	Sharrows	Yes	One Side
Mundy Pond Road - Columbus to Ropewalk	Bicycle Lanes	Bicycle Lanes	Yes	Both Sides
Bennett Ave - Cashin to Hamilton	Sharrows	Sharrows	Yes	One side, both in some areas
Beaumont Street - Bennett to Campbell	Sharrows	Signed Only	Yes	One Side
Hamilton, Pleasant, Campbell	Signed Only	Signed Only	Yes	None
Newtown Road - Elizabeth to Merrymeeting	Sharrows	Signed Only	Yes	None
Merrymeeting	Signed Only	Signed Only	Yes	None
Bonaventure	Sharrows	Sharrows	Yes	None
Harbour Drive	Bicycle Lanes	Bicycle Lanes	No	One Side
O'Leary Ave	Bicycle Lanes	Bicycle Lanes	Yes	None
Larkhall, Wicklow	Sharrows	Sharrows	Yes	One Side, none in some areas
Hogan, Anspatch	Sharrows	Sharrows	Yes	One Side, none in some areas
James, Cornwall, Craigmillar	Signed Only	Signed Only	Yes	None
Topsail Road	Sharrows	Sharrows	Yes	Both Sides
Water Street	Signed Only	Signed Only	Yes	None
Blackhead Road	Bicycle Lanes	Bicycle Lanes	Signed Only	None
Signal Hill Road, Empire Ave, Forest Road, Quidi Vidi Village Road, Boulevard	Signed Only	Signed Only	Yes	None, one side in small area

Table 1	*Recommended*	*Council Approved*	*Completed*	*Parking Impact*
East White Hills Road	Bicycle Lanes	Bicycle Lanes	Yes	N/A
Churchill Ave	Sharrows	Sharrows	Yes	N/A
Selfridge Road	Bicycle Lanes	Bicycle Lanes	No	None
Airport Heights, Viscount	Bicycle Lanes	Bicycle Lanes	Yes	One Side
McNiven Place	Signed Only	Signed Only	Yes	None
Phase 2				
Virginia River Trail	Quidi Vidi to Winsor Lake	Phased Approach (Penney Crescent to Winsor Lake)	First Segment Only	N/A

2. Cowan Heights (Site Visit #1)

This, first of three, site visit focused on a neighbourhood served by existing cycling facilities. The other two sites visits are discussed under Future Priorities. In order to help understand the impacts and concerns of bicycle lanes on existing communities the Task Force conducted a site visit in Cowan Heights. This site visit included a bike ride around the neighbourhood with stops for discussion and observations at various points. This site visit included a number of cyclists, both experienced and inexperienced which led to great discussion and learning opportunities for the group. These discussion touched on the following points:

- The parking available was underutilized, however there were a few vehicles parked in the cycling lanes illegally which impacts cyclist safety and comfort.
- How on street bicycle lanes are less comfortable than off street trails
- How the cost of developing off street trails is higher than re-painting a wide road to implement on street bicycle lanes
- Selection of trail material, design of trail structure and maintenance implications
- Width required to provide safe multi-use facilities
- The group saw many other cyclists on the road and noted cyclist behaviour with respect to available infrastructure, desire lines, and perception of cyclists by other road users
- The advantages of highlighting our green spaces with trail infrastructure

3. Public Opinion Poll

From December 8 to December 19, 2016 the Bike St. John's Task Force conducted an online public opinion poll to better understand how the community feels about some of the issues that the Task Force is considering.

The questions in this poll were developed to be clear and simple while also providing a comparison point to the public survey that was conducted as part of the Recreation and Parks Master Plan in 2008.

Recreation and Parks Master Plan Survey (2008)

The 2008 survey asked residents "Does St. John's need more of the following types of outdoor facilities?" A list of different facility types was then read to survey respondents. 73% stated that "Bicycle trails" were needed, this was the highest positive response of any type of facility. 61% also stated that "Walking trails" were needed.

In response to the question "Which outdoor facilities are needed the most?" 23% of respondents identified bicycle trails and 21% identified walking trails. These were the top two facility types by a wide margin.

When asked "Should the City of St. John's commit extra funding to the following facilities?" respondents were 71% in favour of "cycling trails" and 68% in favour of "walking and cycling trails". These were the second and fourth highest responses to this question[1]. The 2008 survey also noted that >99% of respondents were willing to pay a modest increase in their property tax to fund the facilities they identified for extra funding.

Task Force Opinion Poll Results

1. In the past year did you use a bike
    a. **27%** recreationally (just for fun or exercise/training)
    b. **6%** purposefully (to get to work, the corner store, visit a friend, etc)
    c. **39%** both recreationally and purposefully
    d. **28%** neither (you have not cycled in the last year)

    Comments on results: This looks like a really strong representation of people from across the board. The 28% in the "neither" category may be a bit low but overall an excellent response from a group that would not normally be engaged in a "cycling" survey.

2. How would you describe yourself with respect to cycling:
    a. **24%** You are a strong, confident cyclist
    b. **28%** You often or regularly use a bike to get somewhere you need to be, to exercise, or just to enjoy the ride.

[1] Highest response was "Multi-purpose community facilities such as the Mews Centre" (83%) and third was "Parks and green spaces" (69%).

c. **33%** You don't bike much, or at all, but would try it more if you had a convenient route that felt safe and comfortable.
d. **14%** You are not interested in cycling or have limitations that mean you can't bike.

Comments on results: We see a strong response from those who currently cycle in the first and second categories here. Interpretation of responses to the remainder of the survey needs to be careful to account for any overrepresentation of this group.

3. If you had a driveway and/or garage, how would you feel about bike facilities that require changes to the road in front of your home?
    a. 2.96 average on 0 to 4 scale, 63% okay - If the road becomes narrower but all on-street parking and lanes are maintained.
    b. 2.86 average on 0 to 4 scale, 60% okay - If on-street parking on only one side of the road is permitted.
    c. 1.88 average on 0 to 4 scale, 34% okay - If there is no on-street parking permitted.

    Comments on results: There is good support in the community for changes to streets that have limited impact on on-street parking for areas that have off-street parking available. There is little support for facilities that completely eliminate on street parking. Those not interested in cycling offered less support for all three options.

    Do you have any other comments on how changes to the road may affect your feelings about bike facilities?

    Key trends in open ended response were:

    - 16% highlighted that safety was a big issue
    - 18.5% mentioned some form of dedicated facility separate from vehicle traffic
    - 7.8% mentioned education and enforcement
    - 13.7% mentioned the importance of encouraging cycling
    - 4.4% noted that parking needs to be accommodated

    Comments on results: Most comments in this response were not directly related to the question being asked. The most relevant responses mentioned that some parking does need to be available for visitors or tradespeople.

4. **8.38/10** How safe and comfortable do you feel on a multi-use trail (such as T'Railway or along Columbus Drive)? [0 to 10 scale]




5. **4.90/10** How safe and comfortable do you feel on a bike lane (such as on Mundy Pond Road)? [0 to 10 scale]



6. **3.85/10** How safe and comfortable do you feel using sharrows (such as on Larkhall Street)? [0 to 10 scale]



7. **3.29/10** How safe and comfortable do you feel on a signed only route (such as on Merrymeeting)? [0 to 10 scale]



8. **2.74/10** How safe and comfortable do you feel using a regular street with no cycling facilities? [0 to 10 scale]

   Comments on results: There was extremely strong support for multi-use trails across the board. Bike lanes were somewhat satisfying for regular cyclists but folks looking to cycle more, or not interested in cycling did not feel safe and comfortable on regular bike lanes. Other facility types were not attractive to many people at all. This response mirrors the feedback the City has had from the facilities constructed as a result of the 2009 Cycling Master Plan.

9. Do you have any ideas on what is needed for children to be able to cycle safely in our community?

   Key trends in open ended response were:

   - 48% mentioned some form of dedicated facility separate from vehicle traffic
   - 37% mentioned education and enforcement
   - 5% mentioned building traffic calming features into our communities

   Comments on results: Here we see very strong support for separate facilities such as multi-use trails. Education of both drivers and cyclists, and enforcement of the rules of the road were also mentioned frequently. The City has less ability to deliver on these needs than it does with infrastructure.

10. Are you a parent
    - **51%** parents
    - **49%** non-parents

    Comments on results: An even split of parents and non-parents in the survey pool is great to ensure a diverse mix of opinions. Generally the difference in response between these groups was very small. The one exception was that the parents in the survey tended to be in the older age groups, as would be expected.

11. **2.22/10** On a scale of 0-10 how satisfied are you with the City's existing bike network?

Comments on results: There is very little satisfaction with the current cycling network across the board. Especially with those who have experience cycling in the City.

12. **2.93/10** On a scale of 0-10 how safe do you feel on the City's existing bike network?

    Comments on results: People of all groups tend to not feel very safe at all on the existing cycling network.

13. **90% Yes** Does St. John's need more bicycle trails?

    Comments on results: There was strong agreement with this need which mirrors the high response of 73% in the Recreation and Parks Master Plan Survey (2008). Those who were not interested in cycling had a more mixed response with 47% in favour and 53% opposed. Other groups all had over 96% of responses in favour of more bicycle trails.

14. **7.47/10** One option to improve cycling infrastructure is to use existing walking trails and make them multi-use (walking and cycling). One a scale of 0-10, how supportive would you be of this option as part of a broader overall plan?

    Comments on results: Most people strongly supported this use of our existing walking trails. As with the previous question the opinion of people not interested in cycling was split (5.54/10) and other groups were much more in favour.

15. Please indicate your age range

This survey	Age	Demographic Profile for St. John's

0.5%	<18	20.9%
6.2%	18-24	8.6%
27.0%	25-34	9.7%
36.9%	35-49	45.6% (35 -64)
24.3%	50-64	
5.1%	≥65	6%

Comments on results: The most underrepresented group in this survey were those under the age of 18 with only a few filling out the survey. Young adults (18-24) and seniors (65 or over) both responded at about the right level for the demographics. Those in the 25-34 bracket were most overrepresented followed by a large, but lower, overrepresentation for those in the 35 - 64 bracket. While the opinions of these two groups will come through stronger in the results of this survey this is acceptable from a policy perspective. These groups are most likely to be both paying for, and enjoying the benefit from, any changes to the transportation network over the coming years. All age groups were about evenly divided among the different groups of interest in cycling. The one exception to this was that those 65 and older were more likely to be in the group that is not interested in cycling.

16. Please indicate your gender
    - 37% Female
    - 58% Male
    - 5% Prefer not to answer or Other

    Comments on results: Industry research has indicated that those who identify as female will often feel less safe and comfortable while cycling than those who identify as male. This trend was born out in several of the questions in this survey. Women were, in particular: more likely to state they would cycle more if they had safe comfortable and convenient routes; less likely to feel safe today; very much less satisfied with the existing network; and, most likely to desire new trails. An adage in the industry is that by building a bicycle network that is attractive to women and children you can satisfy the needs of nearly all users. This seems to be supported by the variation displayed in this survey.

17. Do you live or work in St. John's?
    91% Yes

7% No, but I used to or I visit often

Comments on results: This question was included to ensure that response were received from those who would be impacted by the decisions made. This strong response from locals meets this goal very well.

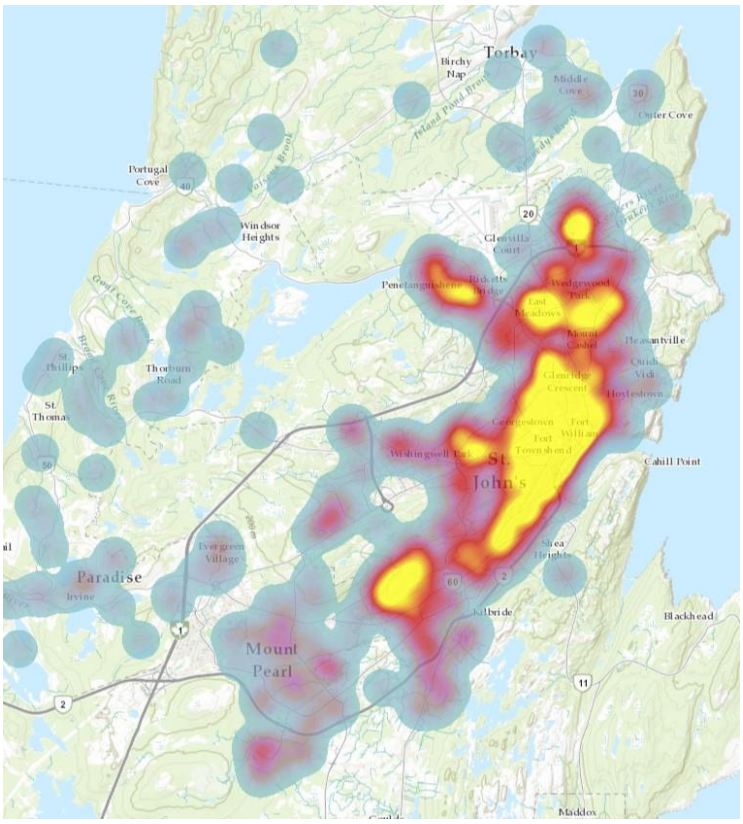
What is your postal code?

Comments on results: Out of the 1,893 complete responses received 1,373 provided a valid postal code that could be used to help understand where our respondents live. The table below highlights the percentage of valid postal codes received from each ward. This represents an excellent spread of responses. As expected, more responses were received from denser neighbourhoods across the City. This likely reflects that concerns and awareness about cycling are more prevalent in areas where our streets see more activity and the demands we place on them are higher.

Ward	Responses
1	18%
2	28%
3	12%
4	22%
5	7%

This shows that about 87% of all surveys responses received are St. John's residents. This compares to the 98% in the previous question that have personal or professional ties to St. John's.

The heatmap below shows from where the most responses were received.



18. If Council focused on ONE thing for cycling, what would it be?

    Key trends in open ended response were:

    - 41% mentioned some form of dedicated facility separate from vehicle traffic
    - 21% mentioned education and enforcement
    - 11% mentioned a well connected cycling network
    - 15% mentioned the importance of encouraging safe cycling

    Comments on results: It is clear from these results that a well connected network of separated cycling facilities where interaction with drivers is minimized would be the ideal scenario for most respondents.

4. Industry Guidance on Cycling as a Public Priority

A connected network of well designed cycling facilities would offer residents and visitors with a viable and competitive option for their daily transportation needs. This additional option in the transportation system encourages more cycling in the community and improves transportation equity. *Increased cycling improves the health of the population, decreases the reliance on personal vehicles, reduces air pollution, improves performance of adjacent businesses, provides a cycling tourism attraction, and reduces overall spending on transportation infrastructure.*

A wide selection of research is shown below providing more concrete values to the benefits described above. Overall, the importance of providing for and promoting cycling is clear.

An OECD report[2] on cycling and safety stated that "bicycles are an essential part of the urban mobility mix." This report identifies the possibility of improving both cycling rates and safety by focusing on both when setting policy. It highlights the net health benefits of cycling and recommends a safe systems design approach which considers functionality, homogeneity, predictability, and forgiveness.

A Montreal study comparing punctuality and energy levels by mode of commuting, shows that cyclists are most likely to be punctual and energized when they arrive at work or school, compared to drivers, transit users and pedestrians.[3]

A European study found that the health benefits of cycling outweigh the risks associated with cycling.[4] A study of inactivity in Canada found that $6.8 billion worth of Canadian health care costs in 2009 could be attributed to inactivity.[5] An Australian study found that incidental exercise such as active forms of transportation led to both economic savings and lives saved.[6] Research out of MUN shows that a concerted effort must be made by the provinces to focus on the prevention of obesity in Canada to avoid the increased burden on our health care system.[7]

---

[2] ITF (2013) "Cycling safety: Key messages and recommendations" in Cycling, Health and Safety, OECD Publishing, Paris. http://www.keepeek.com/Digital-Asset-Management/oecd/transport/cycling-health-and-safety/cycling-safety-key-messages-and-recommendations_9789282105955-1-en#page1

[3] Loong et al 2017. "On time and Ready to Go: An Analysis of Commuters' punctuality and energy levels at work or school." http://www.sciencedirect.com/science/article/pii/S136984781630571X

[4] Benefit vs risk analysis of cycling for individual health: de Hurtig, et al. 2010. "Do the Health Benefits of Cycling Outweigh the Risks?" https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2920084/

[5] Ian Jannsen, 2012 on the healthcare costs of physical inactivity in Canada: http://www.nrcresearchpress.com/doi/full/10.1139/h2012-061#.WGLCwZKoUfI

[6] Study finds lives and money to be saved from incidental exercise http://www.deakin.edu.au/about-deakin/media-releases/articles/study-finds-lives-and-money-to-be-saved-from-incidental-exercise

[7] Twells, et al. 2014. "Current and Predicted Prevalence of Obesity in Canada: A Trend Analysis." http://cmajopen.ca/content/2/1/E18.full

Active commuting to school was found in the US to have a significant relationship with measures of obesity. The results showed benefits for those who used an active mode of transportation to commute to school.[8]

The Atlantic Magazine's City Lab reviewed 12 major studies on the economic impact of converting street parking to bike lanes.[9] They found that cyclists tended to visit businesses more often but spend less on each individual visit. The net result is that cycling facilities typically result in on par, or better, sales for local businesses. A study in Toronto[10] found that visitors to the study area spent more per month if they arrived on foot or by bike than those who arrived by car. They also found that the merchants greatly overestimated the number of visitors who arrived by car and perceived a much greater vehicle parking shortage than their patrons.

The UK Department for Transportation assessed the value of infrastructure spending on cycling facilities. They found that for each dollar spent on cycling infrastructure approximately $5.50 was returned in social benefit.[11] This benefit was made up mainly of physical fitness, trip quality, and reduced congestion with some additional benefits including safety, GHG emissions, and absenteeism.

5. Fat Bike Sundays

The City continues to work with those interested in being active to accommodate their needs. On a trial basis the City has provided access to Fat Bikers to use the groomed trails in Pippy Park. This is currently being done on Sunday evenings from 19:00-21:00. The first ride took place on Sunday, January 22 and initial indications are positive. Staff are on site assessing the impact on the trails. During these times trails remain open and are shared with skiers and those snow shoeing.

6. Parking Occupancy

In response to the concerns raised over on-street parking impacts the Task Force conducted a parking occupancy study in Cowan Heights and in Airport Heights with the help of the Traffic Division and the Parking Services Division.

---

[8] Mendoza et al. 2011 on the benefits of active commuting to school for youth: https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3115568/

[9] The Complete Business Case for Converting Street Parking Into Bike Lanes http://www.citylab.com/cityfixer/2015/03/the-complete-business-case-for-converting-street-parking-into-bike-lanes/387595/

[10] Bike Lanes, On-Street Parking and Business: A Study of Queen Street West in Toronto's Parkdale Neighbourhood http://www.tcat.ca/knowledge-centre/bike-lanes-on-street-parking-and-business_-a-study-of-queen-street-west-in-torontos-parkdale-neighbourhood/

[11] UK Department for Transportation Value for Money assessment of grants for cycling infrastructure: https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/348943/vfm-assessment-of-cycling-grants.pdf

These studies were conducted on a Thursday and Friday evening in the fall. Two nights of data for approximately 30 blocks in these two neighbourhoods were collected. Another two nights of data at these locations was collected after the bike lane parking ban was lifted in November.

The results of these surveys showed that there was a significant amount of parking available throughout the study area. In addition the parking behaviour was very similar before and after the parking ban was lifted. This leads to the conclusion that issues associated with a reduction of parking in areas where off-street parking is available are rare and isolated. It is unlikely for any resident or visitor in these areas to be unable to find on-street parking within a short distance from their destination under normal circumstances.

Future Priorities

Two site visits were conducted that specifically looked forward to the challenges of implementing new routes to help understand what priorities should be recommended. These visits complemented the existing facility site visit discussed above.

1. ***Prince Philip (Site Visit #2)***

   A site visit to the MUN, Health Sciences and Prince Philip Drive area was conducted to explore the challenges of developing a new cycling route. Discussion along the way touched on the following points:

   - A road network had priorities from traffic movement to property access that can compete with different cycling facilities.
   - Multi-use trails are more comfortable and feel safer
   - Cross section boulevards have many benefits including separation from adjacent traffic. Especially on higher speed roads.
   - The importance of proper connection points at the transitions between facilities and at intersections. For example, an unpaved boulevard at a street crossing creates a subtle but important barrier in the network.
   - Design of a successful cycling route needs to consider many things including: grades, connectivity, directness, facility type, comfort, destinations. Grades are a particular challenge in a City with our topography and need to be carefully considered.
   - The considerations of converting paths to multi-use trails such as sight lines, widths, user volume, amenities, and signage.

2. MacDonald – Downtown (Site Visit #3)

A site visit from MacDonald Jr. High School to the downtown area was conducted to explore the challenges of developing a cycling route along a desire line that is not served by a direct on-road route. The unique challenges presented by older and more mature neighbourhoods were also discussed. Key points of discussion along the way included:

- The competing priorities of providing direct routes vs. usage of quieter side streets
- The trade-off of using busier streets vs. adding turns on and off quieter streets
- Changes to intersection configurations that could permit new use patterns for cyclists
- Differences in route planning for "high end" facilities (like multi-use trails) vs. "low end" facilities (like signed only routes)
- The impact that including difficult/complex maneuvers on routes will have on perceived safety, comfort and convenience
- The need for parking in downtown residential areas
- The potential to make larger traffic pattern changes as part of a strategy to more efficiently use space in the road right of way
- The merits of routes that parallel dispersed activity centers when direct connections are more difficult. For example a route along Lemarchant/Harvey/Military could provide an access point to downtown without the need to construct infrastructure to overcome the difficult grades present as you enter down. Cyclists would be able to get as close as possible on a convenient route and then descend to their final destination.

3. Overall Themes

A key theme throughout the Task Force review of the current status of cycling, the feedback received and the commentary in the public opinion survey is safety. A key goal as the City moves forward should be to *support opportunities for safe cycling*. This includes both providing safe cycling infrastructure and establishing supportive programs and policies for safe cycling in our community. It also means fostering public awareness that cycling is a legitimate and welcome way of getting around in the city.

An example of a program promoting safe cycling are the CAN-BIKE education courses that the City has provided in the past. Policies promoting safe cycling would be proactive consideration of cycling routes in the development process or lobbying the provincial government for safe cycling legislation such as the "1 metre passing rule".

Another key theme that has been prevalent through the review is the value of taking action to *foster a cultural change in attitudes toward cycling*. This change in attitude would serve to improve safety for cyclists, improve the health of the population as more people start cycling

in our community, and contribute to the economy through local businesses and vibrant cycling tourism market. Economic benefits were also discussed above.

By fostering a healthy cycling culture we can build an active City for the next generation. One where children have a safe and legal place to ride their bikes. One where residents have healthy active transportation options available to them.

The third key theme that was identified is to *ensure cycling is a viable transportation option* for most residents. By providing cycling as a transportation option the City can reduce congestion, reduce greenhouse gas emissions, contribute to transportation equity, improve the health of our community, and contribute to better safety for people using active transportation modes. Reduced congestion also means that those who don't choose to cycle will benefit from an investment in cycling infrastructure. Further vehicle emissions can trigger asthma and other health problems so the health benefit comes from both increased activity and fewer respiratory impacts.

Finally, a theme developed around the concept of efficiency. The Task Force found that there should be a strong push toward *efficient and effective use of existing resources and future investments*. This has several implications on how the City should move forward with cycling projects. We have an excellent walking trail network with the Grand Concourse Trail that can, in many locations, be enhanced to develop high quality multi-use facilities at a cost far below that required to develop new routes. In Phase 2 of the 2009 Cycling Master Plan the upper portion of the Virginia River Trail was converted in this way. The T'Railway also operates like this. Both have been great success stories from a cycling and active lifestyles perspective. An effective use of future investment means targeting funds toward high quality projects that are expected to show great benefit to the community rather than attempting to do the largest quantity of projects.

4. User Groups

The Task Force discussed several major different groups of people who cycle. The different needs and preferences of each. And how these opinions inform the types of infrastructure that should be provided.

Those who cycle as a hobby or for recreation vary widely. A recreational cyclist could be: a child on a park trail; a road racer on a training run; a fat biker out enjoying the winter weather; a family taking advantage of the T'Railway; a mountain biker on the East White Hills; a tourist seeing the sites across the City; or, any number of other activities.

Among these groups preferences include long uninterrupted bike lanes or shoulders that a road racer might use, through a multi-use trail that is more family friendly, to steep single track trails that more adventurous mountain bikers enjoy.

Those who cycle purposefully are a more homogeneous group. Whether you are travelling to the corner store, making a social call, going to work, or enjoying a meal out, when you are using your bicycle as your mode of transportation your concerns are more focused. For these people, what typically matters more is a direct route that is safe and comfortable. Bike parking at either end of the journey is important. The terrain is also an important factor, especially in St. John's. If you need to get somewhere on a schedule a steep grade can be a real impediment, doubly so if you are headed to work.

The Task Force also discussed how different levels of experience will inform the type of facilities that a person feels comfortable and safe using. For example, a strong and confident cyclist may feel that a standard bike lane is all that is required in most cases but someone less confident may prefer greater separation from motor vehicle traffic. Similarly, those who are not interested in cycling may view the available cycling infrastructure more in the light of what else could have been provided that better serves their needs.

No single type of facility will serve all these people. By developing a cycling system that is flexible and captures the needs of our most vulnerable cyclists we can ensure that the safety and comfort of cyclists is prioritized in infrastructure decisions.

5. Facility Types

The Task Force considered two major categories of cycling facilities and what they mean for the general public in terms of impacts and quality of route provided.

On-road facilities are those that make use of the same asphalt surface as general motor vehicle traffic. These facilities include a signed-only route, sharrows, a standard bike lane, and some types of enhanced bike lanes. The survey conducted shows that these types of facilities do not tend to be very attractive to the majority of St. John's residents.

Off-road facilities may be parallel to a street, or not, but are separated from motor vehicle traffic. At a minimum this separation is a standard roadside curb. At the other end of the spectrum this separation means that the facility is not in proximity to a roadway at all. Off road facilities include many forms of cycling tracks and trails.

There are also three key terms that are used when describing how a cycling facility interacts with other user types. These are:

- Shared - a facility where cyclists and other share the same physical space. This is the case for a signed-only route and a sharrow route (the space is shared with motor vehicles). It is also the case for a multi-use trail (the space is shared with pedestrians). Examples of these are shown below.





- Separate - a facility where cyclists and other users are on the same surface but are operating in their own defined space. For example, a bike lane is on the road with motor vehicles but both cyclists and motor vehicles operate within their own separate lanes. An examples of this is shown below. These facilities can also include those separated by a curb or barrier but are still on-road.



- Exclusive - a facility where cyclists are the only permitted users. Exclusive facilities are typically some form of cycle track and may be adjacent a street or following a dedicated cycling alignment. These facilities are less common as they typically require high cycling numbers to justify the dedication of space and infrastructure spending. We do not currently have these types of facilities in St. John's.

6. Material Types

The three most common materials used for cycling facilities are asphalt, concrete, and stone dust. Each has different benefits and drawbacks in terms of performance, cost, maintenance, and user preference.

Generally in a more natural environment a stone dust trail is well regarded. Maintenance of these trails is generally not an issue. However, a wet environment, especially in a flood prone area, the effort required to repair and rebuild a stone dust trail can be cumbersome. Crushed stone or rail bed ballast does not well serve the needs of most users of trails and is not recommended.

Asphalt is the most common material type for cycling facilities as it balances capital and maintenance costs. In our climate it is important to carefully design the base structure to ensure that freeze thaw action does not prematurely damage the surface.

Concrete is typically used in high use areas or where a distinct look is desired. It has the highest capital cost but can last with little maintenance cost for a very long time.

7. Network Design

The Task Force considered how different routes serve different user groups. Loop trails such as those that circle many local ponds generally serve a purely recreation function. Children or families take advantage of these routes as a recreational resource. However, they serve little use for people travelling longer distances or with a specific destination in mind.

Linear routes, on the other hand, can provide a recreational purpose but can also connect attractive destinations such that they are useful for both recreational and purposeful users.

A network of linear routes was found to be the ideal way to develop a cycling network to ensure that it serves the broadest number of people possible.

Many suggestions were made in the survey to provide wider sidewalks for use by cyclists. This would, in essence, replace some sidewalks with multi-use trails. This is a viable option in many cases but does require more right of way width. Excluding the cost of land, it often costs a similar amount to construct a typical concrete sidewalk compared to a typical asphalt multi-use trail.

Overcoming obstacles like stairs and steep grades is always a challenge in network design. Upgrading a trail with stairs to be suitable for cyclists can both leverage existing

infrastructure that is available and make the trail more accessible to users with limited mobility.

8. ***Active Transportation***

   The Task Force identified the need for the City to think more broadly and promote all forms of active transportation. There are many shared interests between different active modes and these can be promoted at the same time. For example, a multi-use trail serves a wide variety of active uses, not just walking or just cycling.

   By considering all active modes holistically synergies can be achieved on capital and operating expense to develop these networks. General transportation choice and accessibility can be greatly improved by focusing resources on facilities that serve this wider user base.

   Some aspects of facility design that serve cycling well also serve the needs of wheelchair, or other assistive device, users. Strollers, inline skates and other "wheeled" items also benefit from the choice to use a hard surfacing material. Asphalt as a trail surface is a great example of a choice made for the benefit of cyclists that has an enormous benefit to system accessibility.

   While this is clearly not a zero sum game of competing active transportation interests the Task Force did find that there should, at least in the short term, be a focus on cycling to ensure that efforts remain effective and are not spread too thin.

   The Task Force also found that broadening the goals of this work to include all of active transportation should be seriously considered in the future.

Next Steps

Three key next steps have been identified by the Task Force. First, a broad strategic direction needs to be established, second two major initiatives have been identified, and finally a selection of quick win projects has been identified to allow for immediate action. Each of these is described in more detail below.

1. ***Strategic Direction***

   In order to proceed on the Bike St. John's initiative a clear directive is required from Council. The fundamental question here is whether the City should commit to developing safe, comfortable, and convenient cycling infrastructure, policies, and programs.

   If the decision of Council is to not move forward with support for cycling initiatives then the next step will be to consider which existing cycling facilities will be maintained and which will be discontinued. This would take the form of a follow up Decision Note outlining the facilities currently in place and their benefits/drawbacks.

   If the decision of Council is to support cycling initiatives moving forward then the next step would be to develop a formal policy or guideline that would be the foundation of future

cycling related decisions, priorities, and efforts. In this case it is recommended that existing infrastructure be left in place until a long term plan can be developed as it would be premature to assume any individual link has no value to a future network.

It is proposed that key aspects of this policy or guideline would include:

1. Develop a City wide cycling network that is safe, comfortable, and convenient. When developing this cycling network prioritize:
    a. the needs of less experienced cyclists over strong, confident, and experienced cyclists
    b. well connected linear routes that serve both recreational and commuting purposes over loop routes that are purely recreational (take advantage of existing loop trails as part of linear route design where appropriate)
    c. facilities that are physically separated[12] from motor vehicle traffic (including multi-use trails) over facilities that are separated by paint[13]
    d. facilities that have separate space for the use of cyclists over facilities that share space[14] with motor vehicles
2. Recognize that there are trade-offs in how we allocate the public resource of our streets
3. When possible, leverage other road development, or infrastructure work to construct cycling facilities more efficiently
4. With respect to on-street parking
    a. On residential streets with no off-street parking maintain historic level of on-street parking for the residents
    b. On residential streets where off-street parking is available minimize any impact to on-street parking, typically, maintain on-street parking on at least one side of the road for the convenience of residents
5. Include in all non-emergency street reconstruction and street rehabilitation projects consideration for how part of the right of way may contribute to the City wide cycling network
6. Include in all new development projects consideration for how streets, trails, and connections may contribute to the City wide cycling network

[12] Physically separated means that a curb or other barrier runs between the cycling route and vehicle traffic. Examples would be a multi-use trail (either adjacent a street or through a natural area) or a dedicated cycle track.
[13] Separated by paint means that a painted line or hatched area is the only buffer between motor vehicles and cyclists. An example of this is a traditional bike lane.
[14] In this context "shared space" means a facility that both motor vehicles and bicycles use. For example, the use of sharrows or a signed-only bicycle route that has no other bicycle facility.

2. Major Initiatives

Bicycle Advisory Committee

A bicycle advisory committee would allow City Council to have an ongoing resource that is focused on cycling issues. If approved a committee mandate would be developed to outline what tasks the committee would take on and how they would interact with the public, staff and council. Many ideas have been considered that could be included in the mandate including:

- Work as steering committee to guide master plan – ensuring that decisions are driven by citizens, committee, and council and that the consultant provides technical support
- Review of major development applications
- Review of streets rehab and construction project lists
- Review city policies and practices to ensure that consideration for cycling is included where appropriate
- Work as steering committee to complete approved bicycle projects
- Identify and propose possible bicycle projects
- Work as steering committee to guide implementation of master plan
- Consultation through online/collaborative means rather than in person meetings
- Mix of online work with fewer traditional meetings
- Administer a fixed annual budget for cycling projects

A bicycle advisory committee would likely have overlapping areas of interest with other committees that would need to be addressed in a Terms of Reference for the new committee. These possible overlaps include the:

- Accessibility & Inclusion Advisory Committee
- Downtown Advisory Committee
- Environmental Advisory Committee
- Municipal Advisory Committee on Youth
- Seniors' Advisory Committee

No fixed budget is required to establish a bicycle advisory committee. However, some mandate options include a budget allocation to complete small cycling projects each year.

Comprehensive Bicycle Strategy and Master Plan

A comprehensive bicycle strategy and master plan would allow the priorities identified by the Task Force to be reflected in an updated guiding document. This plan would identify the infrastructure, policies, and programs that would best serve the needs of the City based on findings of the Task Force.

Guided by the advisory committee suggested above this plan would formalize the priorities identified in this report. It would also apply these priorities to a design of a cycling network for the City. This network would be evaluated for feasibility and projects planned in order to best develop connectivity, usage, and success.

It is estimated that $125,000 would be required to complete this comprehensive plan. $90,000 has previously been allocated for this work and is available should council proceed with this item. Completion of this work would be over the course of 2017 and into 2018. It is estimated that $75,000 would be used in 2017 and as such there are no new funds required in the 2017 budget to complete this plan.

3. Quick Wins

1. The T'Railway between the Railway Museum and Bowring Park is an excellent multi-use resource for the City. A project has been identified to upgrade this trail with improved signage, automated usage monitoring equipment, and perform other minor repairs. This project is estimated to cost in the vicinity of $15,000 to $20,000.

2. Create a "Car Free Sunday Event" on Water Street. Many municipalities dedicate one or more Sundays in the summer to a street festival where the road is closed to motor vehicle traffic and people are permitted to walk and bike along the road to visit the businesses and festival attractions. This event should be conducted in partnership with community groups to ensure success. This event would require an organizing champion and funding for emergency personnel.

3. Dedicate a day or weekend to a cycling education event in Bannerman Park, Bowring Park, or around Quidi Vidi Lake. This program could be provided to educate both cyclists and the general population on proper behaviour when cycling or when interacting with a cyclist. Funding would be required to staff an event like this. Attendance perks such as a bike helmet discount would help this become a successful event but would also require a funding commitment.

4. Develop a bike rack design competition to raise awareness and provide a prize in support of local artists. The resulting pieces would serve as functional public art. Prizes totalling approximately $10,000 would be appropriate.

Bike St. John's Task Force – Final Report

Bike St. John's Public Opinion Poll (2016)



Please help us better understand how people in St. John's feel about cycling in our City by filling out this survey.

Feel free to share it widely to help us reach as many people as possible: surveymonkey.com/r/BSJ-Opinion

1. In the past year did you use a bike... [choose one]
    a. recreationally (just for fun or exercise/training)
    b. purposefully (to get to work, the corner store, visit a friend, etc)
    c. both recreationally and purposefully
    d. neither (you have not cycled in the last year)

2. How would you describe yourself with respect to cycling [choose one]:
    a. You are a strong, confident cyclist
    b. You often or regularly use a bike to get somewhere you need to be, to exercise, or just to enjoy the ride.
    c. You don't bike much, or at all, but would try it more if you had a convenient route that felt safe and comfortable.
    d. You are not interested in cycling or have limitations that mean you can't bike.

3. If you had a driveway and/or garage, how would you feel about bike facilities that require changes to the road in front of your home? [0 - This is not acceptable, 2 - I don't have strong feelings one way or the other, 4 - This is okay with me, see below]
    a. If the road becomes narrower but all on-street parking and lanes are maintained.
    b. If on-street parking on only one side of the road is permitted.
    c. If there is no on-street parking permitted.

Do you have any other comments on how changes to the road may affect your feelings about bike facilities?

	0 - This is not acceptable.	1	2 - I don't have strong feelings one way or the other.	3	4 - This is okay with me.	N/A
If the road becomes narrower but all on-street parking and lanes are maintained.	○	○	○	○	○	○
If on-street parking on only one side of the road is permitted.	○	○	○	○	○	○
If there is no on-street parking permitted.	○	○	○	○	○	○

Do you have any other comments on how changes to the road may affect your feelings about bike facilities?

4. How safe and comfortable do you feel on a multi-use trail (such as T'Railway or along Columbus Drive)? [0 to 10 scale]





5. How safe and comfortable do you feel on a bike lane (such as on Mundy Pond Road)? [0 to 10 scale]



6. How safe and comfortable do you feel using sharrows (such as on Larkhall Street)? [0 to 10 scale]



7. How safe and comfortable do you feel on a signed only route (such as on Merrymeeting)? [0 to 10 scale]



8. How safe and comfortable do you feel using a regular street with no cycling facilities? [0 to 10 scale]

9. Do you have any ideas on what is needed for children to be able to cycle safely in our community? [Free form text]

10. Are you a parent [Yes/No]

11. On a scale of 0-10 how satisfied are you with the City's existing bike network?

12. On a scale of 0-10 how safe do you feel on the City's existing bike network?

13. Does St. John's need more bicycle trails? [Yes/No]

14. One option to improve cycling infrastructure is to use existing walking trails and make them multi-use (walking and cycling). One a scale of 0-10, how supportive would you be of this option as part of a broader overall plan?

15. Please indicate your age range. [choose one]
    a. <18
    b. 18-24
    c. 25-34
    d. 35-49
    e. 50-64
    f. ≥65

16. Please indicate your gender
    a. Female
    b. Male
    c. Prefer not to answer
    d. Other (specify if you wish)

17. Do you live or work in St. John's?
    a. Yes
    b. No, but I used to or I visit often
    c. No

    What is your postal code?

18. If Council focused on ONE thing for cycling, what would it be? [Free form text]

Bicycle Lane Parking Adjustment

Bicycle Lane Parking Adjustment

During the Community Services and Housing Standing Committee meeting on January 31, 2017 Council expressed the wish to modify the existing parking regulations of bicycle facilities in select areas where the greatest impact on local residents is perceived. These areas are:

1. Cowan Heights, including:
    a. Frecker Drive
    b. Canada Drive
    c. Cowan Avenue (between Frecker Drive and Canada Drive)
2. Airport Heights
    a. Airport Heights Drive
    b. Viscount Street
3. Wicklow Street
4. Campbell Avenue
5. Anspach Street
6. Cowan Avenue (between Topsail Road and Waterford Bridge Road)

In these areas the following waiver would apply:

> *All parking restrictions associated with on street bicycle facilities on the street segments identified above will be removed immediately. Parking restrictions on these facilities will be revisited as part of a Comprehensive Bicycle Strategy and Master Plan.*

This waiver is in addition to the decision of council to lift cycling facility parking restrictions during the winter months (SJMC2015-099-28/451R).