CRD Regional Trails Visitor Use Survey – 2019

Regional Parks

Capital Regional District | January 2021



Table of Contents

Executive Summary	3
Survey Methodology	4
Summary Report Results	4
Summary of Survey Responses	7
Section 1: Demographics	7
Section 2: Trail Values	9
Section 3: Visitation Trends	12
Section 4: Trails Navigation	15
Section 5: Dogs	16
Section 6: Carnivores	18
Section 7: Visitor Satisfaction	20
Section 8: Trails Management	23
Section 9: Communication	28
Section 9: Additional Comments	29
Appendix	30

Prepared by:

Capital Regional District, Regional Parks Office

Executive Summary

The Capital Regional District (CRD) has developed a broad survey program aimed at documenting public opinion regarding regional parks and trails. The survey program supports the 2019-2022 CRD Corporate Plan Board Priority 6a-1 by providing a better understanding of park user groups and demands on park infrastructure. The program aligns with the 2012-2021 Regional Parks Strategic Plan strategic priorities of performing resident and visitor use surveys to strengthen community involvement and partnerships.

Visitor use surveys enable CRD Regional Parks staff to understand what is happening on individual regional trails and identify emerging visitor use trends. The visitor use surveys offer a point-in-time snapshot of visitor use patterns. This document summarizes the results of the visitor use surveys conducted in the summer of 2019 at the following regional trails:

- Galloping Goose Regional Trail
- Lochside Regional Trail
- E&N Rail Trail-Humpback Connector

This report provides a summary of park user values, characteristics, use patterns, level of satisfaction, sightings of carnivores, and opinions about regional trails management. It also offers qualitative insights provided by respondents in regard to their use of, and experiences in, the regional trails surveyed.

SURVEY METHODOLOGY

A survey with a standardized set of questions was administered to visitors of the three regional trails canvassed in 2019. Data collection was performed on randomly selected days and times at key locations along the regional trails. Data collection took place from May 27, 2019 to September 15, 2019 on weekdays and weekends. This methodology was chosen to maximize the diversity of respondents for the survey because it allows engagement with people using the trails on different days and at different times. A detailed description of the methodology used is provided in Appendix 1.

This report represents the views of those who visited the regional trails listed and who were willing to participate in the survey. People not visiting the regional trails system are not represented in this data sample. Due to the methodology used to conduct this survey, the data obtained are not statistically representative and cannot be generalized to a broader population, hence the need to consider the results cautiously.

SUMMARY REPORT RESULTS

There were 854 questionnaires completed by trail visitors in 2019:

• Galloping Goose Regional Trail: 378 surveys

• Lochside Regional Trail: 249 surveys

• E&N Rail Trail-Humpback Connector: 227 surveys

- ➤ Socio-demographics: Respondents to the survey tended to be in an older age distribution (45 to 65+) in all three regional trails. Respondents to the survey tended to live in Saanich, Victoria and Langford for the Galloping Goose Regional Trail; in Saanich and Victoria for the Lochside Regional Trail; and Victoria and View Royal for the E&N Rail Trail-Humpback Connector.
- ➤ Reasons for use: Respondents used the Galloping Goose and Lochside regional trails mostly for commuting, and the E&N Rail Trail-Humpback Connector for fitness. Respondents mainly biked on the three trails, followed by walking and running.

Value of regional parks and trails system: Nearly all respondents agreed that the regional parks and trails system is of value for its own sake, offers a sense of peace and well-being, and needs to be protected for future generations. The majority of respondents also agreed that the primary purpose of the regional parks and trails system is for both outdoor recreation and environment/species protection, that outdoor recreation opportunities should be maximized, and some areas should be set aside for conservation purposes. About half of the respondents agreed that the regional parks and trails system generates regional financial benefits and jobs, and that outdoor recreation should not be allowed if it negatively affects natural environments and species. A five-point scale ranging from "strongly agree" to "strongly disagree" was used to measure respondents' value orientations toward regional parks and trails. Few respondents agreed that visitors should be limited in the regional parks and trails system for conservation purposes; that parks and trails have no value without people; and that outdoor recreation is more important than environment/species.

- > Use patterns: The most common time spent on the three trails ranged from less than one hour to up to two hours per visit. Respondents were mostly frequent users, using the three trails year-round. Half or more of respondents used their experience and/or knowledge to navigate the three trails. The majority of respondents had increased their use of all three trails over the past five years. Changes in use were due to the construction on the Galloping Goose Regional Trail, the lack of pavement in some sections of the Lochside Regional Trail, and the recent completion of the E&N Rail Trail-Humpback Connector. Respondents also specified that proximity to home or work was the most influential factor in determining use frequency and which regional trail they accessed, followed by improved fitness, which resulted in respondents' ability to access regional trails more frequently and for longer durations, having acquired an e-bike (which allowed for faster commuting), and commitment toward active transportation. Users of all three trails stated that increased connectivity between regional trails and municipal trail networks in the past five years encouraged them to access all three trails more frequently, as travelling through the downtown core was perceived to be safer on the trails.
- ➤ Dogs: Most respondents did not own a dog. Those who did had one to two dogs. Most respondents expressed a neutral opinion when asked if dogs affected their experiences on the trails. The most observed dog-related behaviour by respondents was dog owners not collecting their dog's waste on the trails, followed by dogs on the wrong side of the trails. Many respondents noted that the majority of dog owners have their dog on-leash, per the regional trail regulations.

- ➤ Carnivores: The majority of respondents had not observed carnivores on the regional trails, were aware of what causes human-carnivores conflicts and had not prepared for a possible encounter with such species.
- ➤ Satisfaction: Most respondents were satisfied with experiences, safety, outdoor recreation, and other visitors' use of the trails. For facilities, about half of respondents were satisfied with the benches, drinking water fountains and garbage cans provided. Less satisfaction was expressed with parking lots and toilets for all trails. For services, satisfaction with maintenance scored the highest for all three trails, and enforcement of bylaws and education/park nature program the lowest. Regarding information about trails, about half or more respondents were satisfied with signs, maps and the regional trails content on the CRD website.
- ➤ Management: For the Galloping Goose Regional Trail, the main perceived impacts were dog waste and garbage/litter. For the Lochside Regional Trail, the main perceived impacts were horse manure and lack of facilities. For the E&N Rail-Trail Humpback Connector, the main perceived impacts were lack of facilities and dog waste. When specifically asked about what issue they experienced on the trails, respondents pointed out for all three trails: traffic and speed, lack of separation between trail users, poor trail etiquette, e-bikes and other motorized transportation methods, dog-user conflicts, unsafe road crossings, lack of signage and lighting, illegal activity and limited facilities. Respondents offered the following suggestions to address those issues: expanding the regional trails network, improving regional connectivity, widening the trails or twinning the trails, strengthen trail use etiquette, establishment and enforcement of a speed limit, improve dog management, improve road crossings, provide additional lighting, facilities and signage, and develop a mobile app of the CRD Bike Map.
- > Communication: Respondents used mostly Google, word-of-mouth from family and friends, and the CRD website to get information about the three regional trails.
- ➤ Additional Comments: Respondents described the regional trails as one of the most important aspects of the region in regards to the impact these corridors had on their life, including physical and emotional well-being, improved accessibility and the fostering of environmental values and appreciation of nature. Respondents expressed the desire for more recreation and active transportation opportunities in the CRD.

The results reported above parallel the 2013 Regional Trails Survey results, showing consistency in user patterns and trends, and reaffirming visitor experiences in, and service demand for, the three regional trails.

Summary of Survey Responses

Section 1: Demographics

QUESTION: IN WHICH AGE CATEGORY DO YOU FALL?

Respondents to the survey tended to have an older age distribution in all three regional trails (Figure 1). This result is especially evident for the Lochside Regional Trail, where 37% of respondents were over 65 years of age.

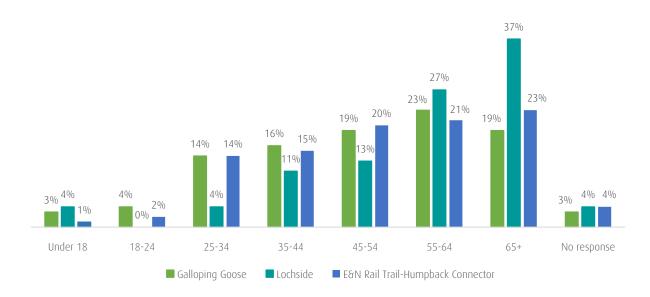


Figure 1: Age distribution of those who took the survey

QUESTION: WHERE DO YOU LIVE?

Respondents to the survey tended to live in varied locations based on the regional trails they were using (Table 1):

- Galloping Goose Regional Trail: Saanich, Victoria and Langford
- Lochside Regional Trail: Saanich and Victoria
- E&N Rail Trail-Humpback Connector: Victoria and View Royal.

 Table 1: Residency of those who took the survey

Municipality of Residence	Galloping Goose	Lochside Regional Trail	E&N Rail Trail- Humpback
	Regional Trail		Connector
Central Saanich	3%	7%	1%
Colwood	4%	1%	3%
Esquimalt	4%	2%	12%
Highlands	1%	0%	0%
Juan de Fuca Electoral	1%	0%	0%
Area			
Langford	12%	1%	12%
Metchosin	2%	0%	1%
North Saanich	1%	1%	1%
Oak Bay	4%	3%	4%
Saanich	24%	50%	9%
Sidney	3%	0%	0%
Sooke	5%	0%	1%
Victoria	17%	15%	27%
View Royal	7%	1%	22%
Other	11%	12%	3%

Section 2: Trail Values

QUESTION: WHAT IS YOUR MAIN REASON FOR USING THIS TRAIL?

Respondents to the survey used the Galloping Goose and Lochside regional trails mostly for commuting, and the E&N Rail Trail-Humpback Connector for fitness (Figure 2).

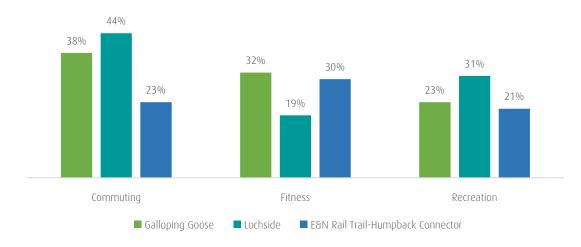


Figure 2: Percentage breakdown of respondents' reasons to use the regional trails

QUESTION: WHAT IS THE PRIMARY ACTIVITY YOU ARE DOING ON THIS TRAIL TODAY? Respondents mainly biked on the three trails, followed by walking (Figure 3).

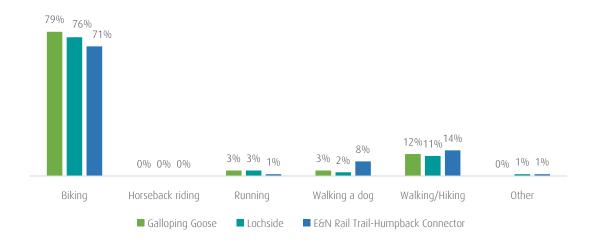


Figure 3: Percentage breakdown of respondents' primary activity on the regional trails

QUESTION: TO WHAT EXTENT DO YOU AGREE OR DISAGREE WITH EACH OF THE FOLLOWING VALUE STATEMENTS FOR THE REGIONAL PARKS AND TRAILS SYSTEM?

A value orientation scale was developed for the regional parks and trails system. Nearly all respondents agreed that the regional parks and trails system is of value for its own sake, offers a sense of peace and well-being, and needs to be protected for future generations (Figure 4). The majority of respondents also agreed that the primary purpose of the regional parks and trails system is both outdoor recreation and environment and/or species protection. Additionally, they agreed that outdoor recreation opportunities should be maximized in some areas, and some areas should be set aside for conservation purposes. About half of the respondents agreed that the regional parks and trails system generates regional financial benefits and jobs, and that outdoor recreation should not be allowed if it negatively affects natural environments and species. A five-point scale ranging from "strongly agree" to "strongly disagree" was used to measure respondents' value orientations toward regional parks and trails. Few respondents agreed that visitors should be limited in the regional parks and trails system for conservation purposes; that parks and trails have no value without people; and that outdoor recreation is more important than environment/species.

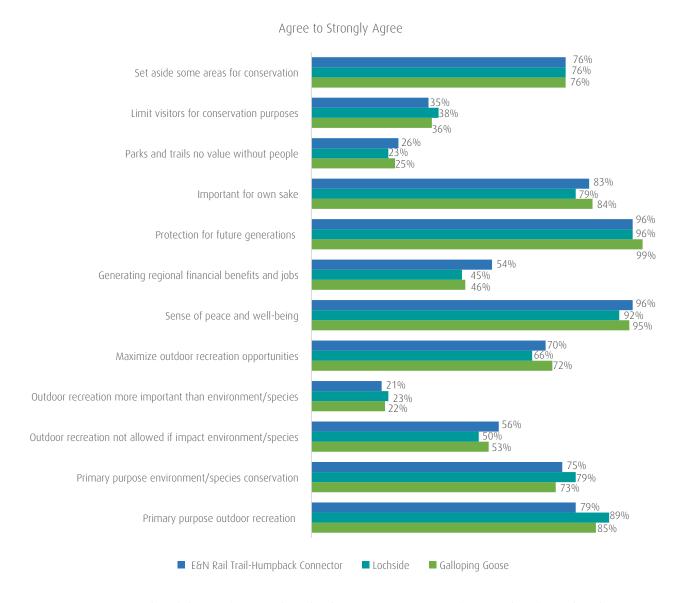


Figure 4: Percentage breakdown of respondents' value orientation toward regional parks and trails

Section 3: Visitation Trends

QUESTION: APPROXIMATELY HOW LONG WILL YOU BE ON THIS TRAIL?

Respondents to the survey used the three regional trails mostly for less than 1 hour to 1-2 hours per visit (Figure 5). Users spent less time on the E&N Rail Trail-Humpback Connector, a pattern most likely related with the length and location of the trail.

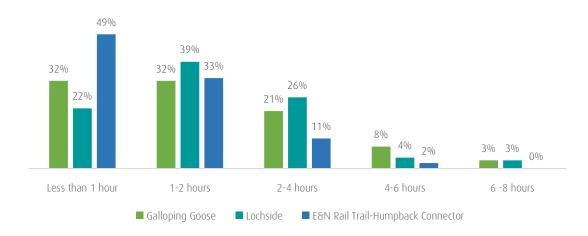


Figure 5: Percentage breakdown of respondents' time spent on the regional trails per visit

QUESTION: APPROXIMATELY HOW OFTEN DO YOU USE THIS TRAIL BETWEEN OCTOBER-APRIL? Most respondents used the regional trails more than 10 times between October and April (Figure 6).

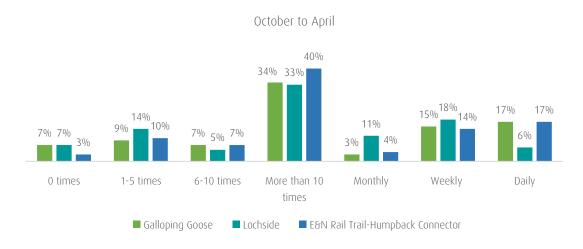


Figure 6: Percentage breakdown of respondents' frequency of use of the regional trails between October and April

QUESTION: APPROXIMATELY HOW OFTEN DO YOU USE THIS TRAIL BETWEEN MAY-SEPTEMBER? Most respondents used the regional trails more than 10 times between May and September (Figure 7).

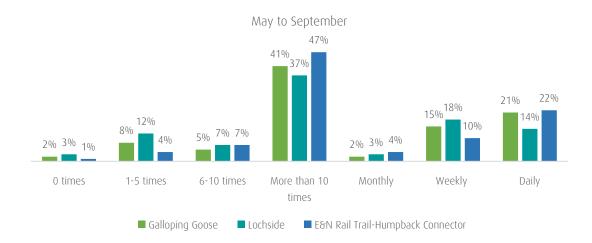


Figure 7: Percentage breakdown of respondents' frequency of use of the regional trails from May to September

QUESTION: HAVE YOU CHANGED HOW OFTEN YOU USE THE REGIONAL TRAILS OVER THE PAST 5 YEARS?

Most respondents stated they have increased their use of the three regional trails over the past five years (Figure 8).

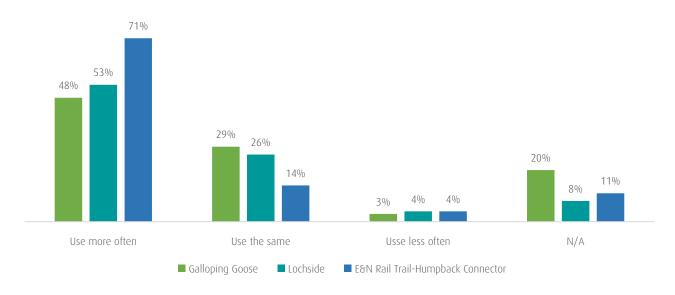


Figure 8: Percentage breakdown of respondents change in use frequency of the regional trails over the past five years

OUESTION: WHY HAVE YOU CHANGED HOW OFTEN YOU USE THE REGIONAL TRAILS?

Respondents specified that proximity to home or work was the most influential factor in determining use frequency and which regional trails they accessed. The second most influential factor was improved fitness, which resulted in increases in the respondent's ability to access regional trails more frequently and for longer durations. Third, some respondents indicated that having acquired an e-bike allowed for faster commuting. Lastly, respondents indicated a conscious commitment toward active transportation, motivating their increased use of the regional trails. Users of all three trails stated that increased connectivity between regional trails and municipal trail networks in the past five years encouraged them to access all three trails more frequently, as travelling through the downtown core was perceived to be safer on the trails. Specific comments on use patterns for each of the three trails are listed below.

- Galloping Goose Regional Trail users stated that the highway construction had dissuaded them to access this trail and, when possible, they preferred using the E&N Rail Trail-Humpback Connector to access the Western Communities. Some users felt that the Galloping Goose Regional Trail was too close to the highway and consequently less scenic and/or relaxing than the E&N Rail Trail-Humpback Connector.
- Lochside Regional Trail users pointed out that the lack of paving on some sections of this trail dissuaded some participants from using it for commuting. However, most users still preferred the Lochside Regional Trail over cycling along Highway 17, due to safety concerns.
- **E&N Rail Trail-Humpback Connector** users stated that the recent completion of some sections of the trail increased accessibility and convenience for users who previously did not access regional trails or who previously used the Galloping Goose Regional Trail to access the Western Communities. Users describe the E&N Rail Trail-Humpback Connector as more scenic, more direct and in better condition than the Galloping Goose Regional Trail.

Section 4: Trails Navigation

QUESTION: ONCE ON THE TRAIL, WHAT DO YOU USE TO NAVIGATE THE TRAIL?

Half or more respondents used their experience/knowledge to navigate the three trails (Figure 9).

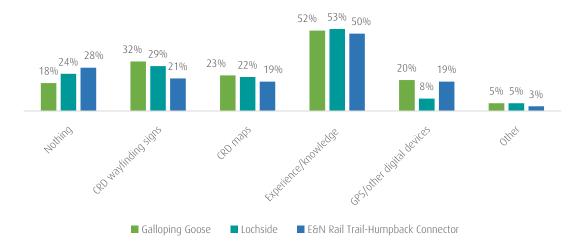


Figure 9: Percentage breakdown of the tools used to navigate the regional trails

Section 5: Dogs

QUESTION: ARE YOU VISITING THIS TRAIL WITH A DOG TODAY?

Most respondents did not own a dog. Those who did own a dog, had one to two dogs (Figure 10).

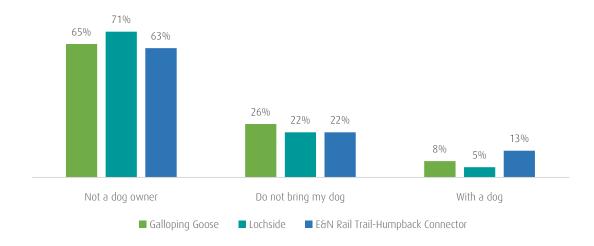


Figure 10: Percentage breakdown of respondents with and without dogs on the regional trails

QUESTION: IS YOUR EXPERIENCE AFFECTED BY THE PRESENCE OF DOGS ON THE TRAIL?

Most respondents expressed a neutral opinion when asked if dogs affected their experiences on the trails (Figure 11).

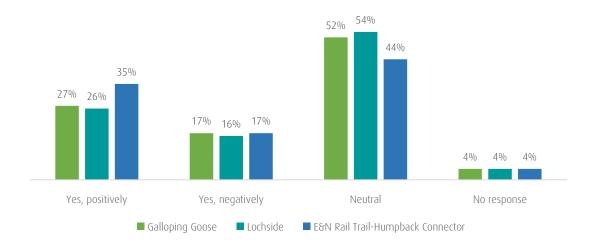


Figure 11: Percentage breakdown of respondents experience with dogs on the trails

QUESTION: HAVE YOU OBSERVED ANY OF THE FOLLOWING DOG-RELATED BEHAVIOURS ON THIS TRAIL?

Most respondents observed dog owners not collecting their dog's waste on the trails, followed by dogs on the wrong side of the regional trails (Figure 12).

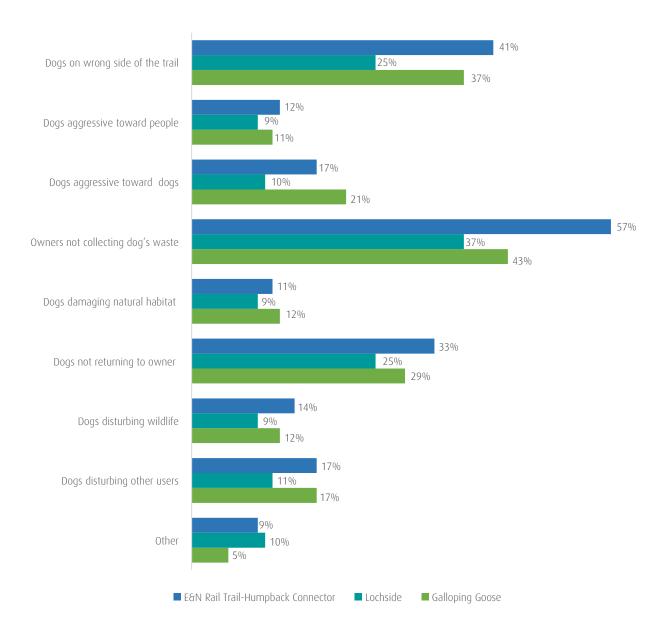


Figure 12: Percentage breakdown of respondents' observations about dog-related behaviours on the trails

Section 6: Carnivores

QUESTION: HAVE YOU EVER SEEN A COUGAR, BEAR AND/OR WOLF ON THIS REGIONAL TRAIL? The majority of respondents had not observed cougars, bears and/or wolves on the regional trails (Figure 13).

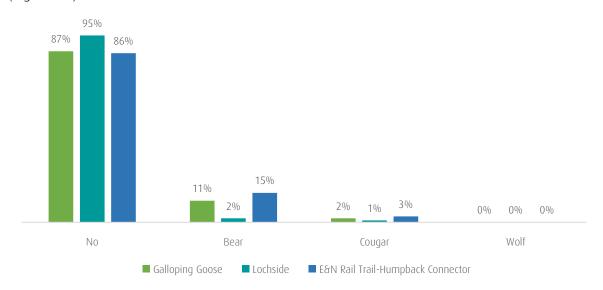


Figure 13: Percentage breakdown of respondents sighting of carnivores on the trails

QUESTION: WHAT ARE THE ACTIVITIES YOU THINK CAN CAUSE HUMAN-WILDLIFE CONFLICT ON THIS REGIONAL TRAIL?

Respondents were aware of most of the activities causing human-carnivore conflicts (Figure 14).

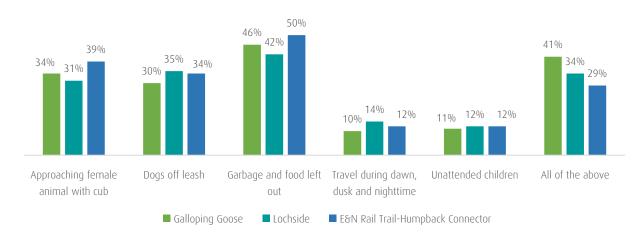


Figure 14: Percentage breakdown of respondents' perceptions of what causes human-carnivore conflicts

QUESTION: WHAT HAVE YOU DONE TO PREPARE FOR POSSIBLY ENCOUNTERING COUGARS, BEARS AND WOLVES?

Most respondents did not prepare for the possibility of encountering cougars, bears and/or wolves on the regional trails (Figure 15).

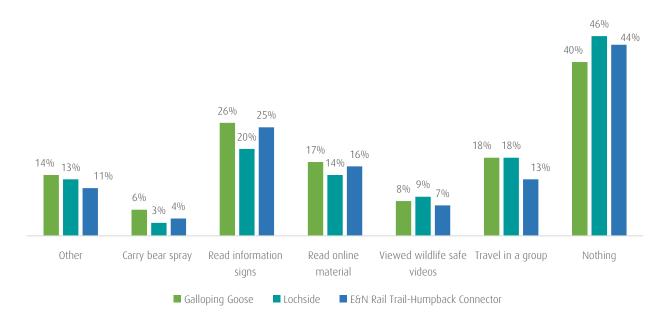


Figure 15: Percentage breakdown of respondents' preparedness to encounter carnivores on the regional trails

Section 7: Visitor Satisfaction

QUESTION: OVERALL, HOW SATISFIED ARE YOU WITH THE TRAIL?

The majority of respondents were very to completely satisfied with their experience, safety while using the regional trails, outdoor recreation opportunities, and how other visitors used the three regional trails (Figure 16).

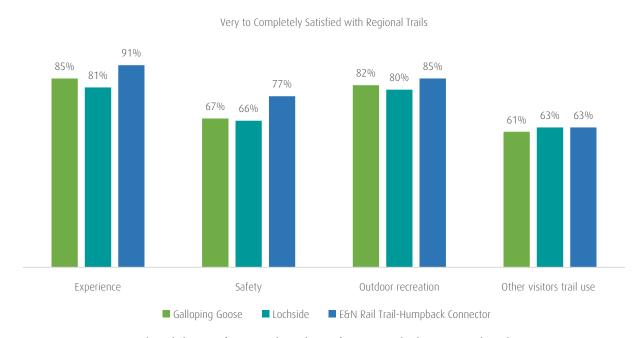


Figure 16: Percentage breakdown of respondents' satisfaction with the regional trails

QUESTION: OVERALL, HOW SATISFIED ARE YOU WITH TRAIL FACILITIES?

Respondents' satisfaction varied when asked about facilities, with toilets scoring the lowest on all three regional trails (Figure 17).

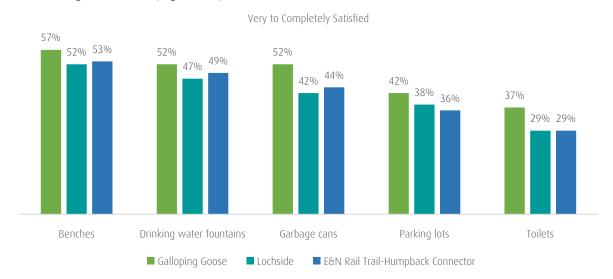


Figure 17: Percentage breakdown of respondents' satisfaction in regard to facilities on the regional trails

QUESTION: OVERALL, HOW SATISFIED ARE YOU WITH THE SERVICES OFFERED ON THE TRAIL? Respondents' satisfaction varied when asked about services, with overall maintenance scoring the highest in all three regional trails, and enforcement of bylaws and education/park nature program the lowest (Figure 18).

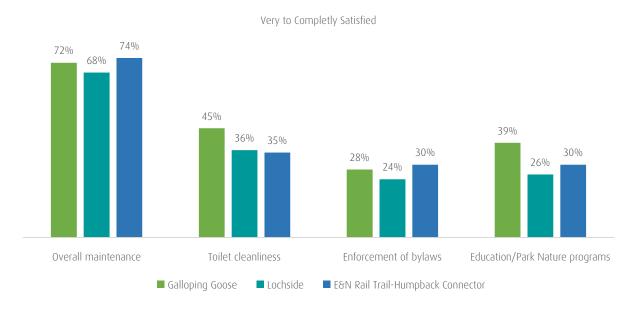


Figure 18: Percentage breakdown of respondents' satisfaction in regard to services offered on the regional trails

QUESTION: OVERALL, HOW SATISFIED ARE YOU WITH THE INFORMATION OFFERED ON THE TRAIL?

Around half of the respondents were very to completely satisfied with the information offered on all three regional trails (Figure 19).

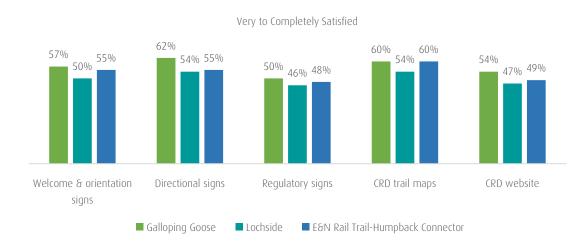


Figure 19: Percentage breakdown of respondents' satisfaction in regard to information offered on the regional trails

Section 8: Trails Management

QUESTION: WERE YOU NEGATIVELY IMPACTED BY ANY OF THE FOLLOWING EVENTS ON THE TRAIL?

Respondents were impacted by different events on the regional trails (Figure 20). For the Galloping Goose Regional Trail, the main perceived impacts were dog waste and garbage/litter. For the Lochside Regional Trail, the main perceived impacts were horse manure and lack of facilities. For the E&N Rail-Trail Humpback Connector, the main perceived impacts were lack of facilities and dog waste. Many respondents pointed out that the majority of dog owners had their dog on-leash as per the regional trails regulation.

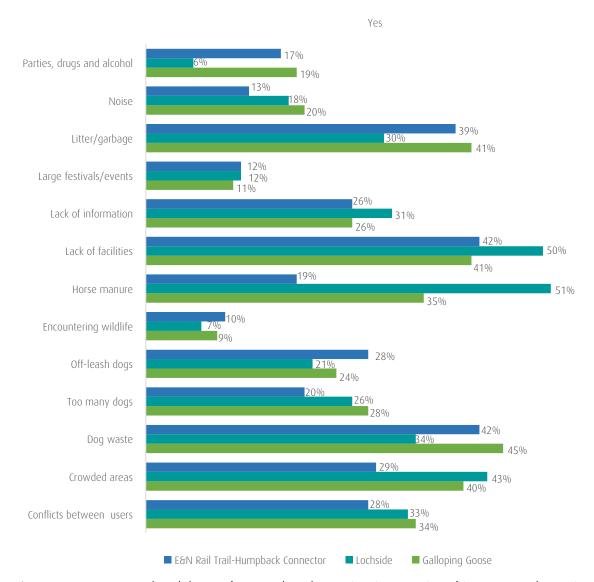


Figure 20: Percentage breakdown of respondents' experiencing a series of impacts on the regional trails

OUESTION: WHAT ARE THE MOST SIGNIFICANT ISSUES YOU EXPERIENCE ON THIS TRAIL?

Respondents' perceptions of issues affecting the three trails can be summarized in the following themes, which were consistent among all three trails:

- ➤ Increase in regional trails traffic and speed: Respondents reported that the regional trails are increasingly busy and there are cycling 'rush hours' due to the number of active commuters using them. Another significant issue identified by users was the high speeds that cyclists, including commuters, athletes, and e-bike users, reached on all three regional trails. High speeds were described as exceeding roughly 20 km per hour.
- ➤ Lack of separation between trail uses: Maintaining the regional trails as shared-use trails is perceived as unsafe, as recreational users are described as slower moving and desiring a more relaxed trail experience, while commuters are described as speeding and enjoying a more tightly-controlled flow of traffic to efficiently navigate the trail corridors. Some respondents specified they feel unsafe when sharing the trail with cyclists travelling at high speeds, as any collisions that occur at that speed could result in serious injury.
- ➤ Poor trail etiquette: Respondents pointed out that other users did not adhere to trail right-of-way etiquette. Cyclists were described as passing pedestrians in risky ways, quickly and without warning, sometimes splitting the lane. Some bikers were described as aggressive and overbearing, especially when commuting or training. Pedestrians were described as distracted, since they were wearing headphones and using both the right and left lanes. Several respondents described situations of trail obstruction, with users blocking oncoming traffic, and/or not accommodating oncoming traffic to allow for safe passing distances.
- ➤ Increase of e-bikes: Speeding was the most common issue mentioned by respondents in relation to e-bikes, along with passing too closely and without warning. E-bikes were perceived as allowing cyclists to achieve speeds beyond their skill level and without having developed the necessary safety skills. Also, the potential impact of a crash with these heavier and faster bikes was seen as significantly higher.
- ➤ Other motorized transportation methods: The presence of motorized bikes/motorcycles/ scooters that do not require active pedaling in order to engage the motor were identified as an issue. Speed seemed to contribute the most to respondents concern, though noise and the smell of fuel was also mentioned as a drawback caused by these motorized bikes/motorcycles/scooters.
- ➤ **Dog-user conflicts:** Several respondents specified that they enjoyed encountering on-leash dogs that were under control, behaved safely near cyclists and other users, and were properly

cleaned-up after. Dogs were also described as enhancing their owners' physical and mental well-being through active and regular outdoor activities and socialization. Yet two main dog management-related concerns were expressed by survey respondents: hazardous off-leash and/or out-of-control dogs and uncollected dog waste. Off-leash and/or out-of-control dogs were defined as dogs not clearly restrained by a leash, not staying within the trail or on the right side of the trail, and approaching other trail users without being encouraged to do so. Off-leash dogs were perceived as a concern on all three regional trails, with users specifying their support for the on-leash policy. It is important to acknowledge that most users recognized that owners, not the dogs themselves, were at fault for dog-user conflicts.

- ➤ Unsafe road crossing: Respondents noted that some road crossings lack clear right-of-way signage, crossing indicators (including flashing lights and/or zebra lines on the pavement), or sightlines for vehicles and cyclists when approaching road crossings. Respondents noted that some intersections are difficult to navigate, and that it is not clear where the regional trails connect on the other side of the intersection.
- ➤ Limited signage: Signage clearly outlining trail etiquette was perceived as missing, as well as additional road signage for vehicles to increase awareness about the presence of the regional trail crossings.
- ➤ Limited lighting: Lack of visibility was reported as increasing the chance of collisions, and detracted from overall feelings of safety while on the trail. While headlights on bikes helped slightly, some users reported that oncoming headlights can cause temporary blindness and may actually increase the chance of collision.
- > Illegal activity: Several respondents reported encountering illegal camping or other activities on the regional trails on a semi-regular basis.
- ➤ Facilities: Respondents suggested adding rest stations with washrooms or water fountains at key access points. Cyclists felt that most bridges/trestles located along regional trail routes had an uncomfortable and bumpy surface that was difficult to ride and damaged bikes, especially in icy winter conditions. While users recognized that ongoing trail maintenance required significant effort, they still wished to see the trails consistently cleared and de-iced in the winter, and repaired from tree roots or other damaging elements.

QUESTION: BASED ON YOUR RESPONSES ABOVE, WHAT ACTIONS WOULD YOU SUGGEST THE CRD UNDERTAKE IN THE NEXT 5 YEARS TO MAINTAIN OR IMPROVE YOUR SATISFACTION?

Respondents' perceptions of actions to be undertaken on the three regional trails over the next 5 years can be summarized in the following themes, which were consistent among all three trails:

- **Expanding the regional trail network, and improving regional connectivity:** Via trail networks, was a popular suggestion to address traffic and trail crowding.
- ➤ Widening the trails or twinning the trails: Particularly along the busiest sections of the trails, was also frequently suggested to allow recreational users and commuters to use the trail separately. Such an approach would facilitate separation of high-speed traffic and lower-speed traffic.
- > Strengthen trails etiquette: In addition to the current trail etiquette guidelines, respondents suggested banning the use of headphones or other sound-blocking devices. Users also recommended adding signage inviting people to walk or ride in single file during peak periods. Additional education about, and enforcement of, trail regulations, especially related to speed limits, dogs on-leash, and motorized vehicles, was also suggested.
- ➤ Establishment and enforcement of a speed limit: On the regional trails of roughly 20-25 km/h. Trail users would like to see this speed limit and other trail regulations clearly posted.
- ➤ Improve dog management: During peak periods of high traffic, trail users suggested that owners should maintain strict control over their dogs, including keeping them on a shorter leash and ensuring that they remain clearly on the right-hand boundary side of the trail. Some users suggested providing additional garbage cans along the trails in order to facilitate dog waste removal, and additional education and enforcement to ensure conflicts between dog owners and other trail users are minimized in the future.
- ➤ Improve road crossing: Where possible, overpasses or underpasses were suggested to reduce vehicle/trail interactions. Where road crossings were not avoidable, users recommended clearly marking and signing crossings, and developing crossing standards, in conjunction with other jurisdictions (e.g., zebra stripes or similar markings, clear right-of-way signage, clearly marked bike lines, pedestrian-activated lights and cautionary signage).
- ➤ **Provide additional lighting:** Additional lighting was recommended by some respondents along the regional trails to ensure visibility is adequate in the evenings.
- ➤ Provide additional facilities: Trail users recommended upgrading trail and bridge surfaces to ensure safe and comfortable use. Some users suggested to improve maintenance in winter

- for trails to remain a viable active transportation route in snowy or icy conditions. Respondents suggested the addition of washrooms, garbage cans and water stations, where possible.
- ➤ Provide additional signage: Additional navigational signage was suggested, including full-sized maps with details and distances between facilities.
- ➤ Develop a mobile app: Development of a mobile app version of the CRD Bike Map was proposed.

Section 9: Communication

QUESTION: WHAT IS THE MAIN SOURCE OF INFORMATION YOU USE TO FIND OUT ABOUT THE REGIONAL TRAILS YOU VISIT?

Respondents used mostly Google, word-of-mouth, the CRD website and family and friends to get information about the three regional trails (Figure 21).

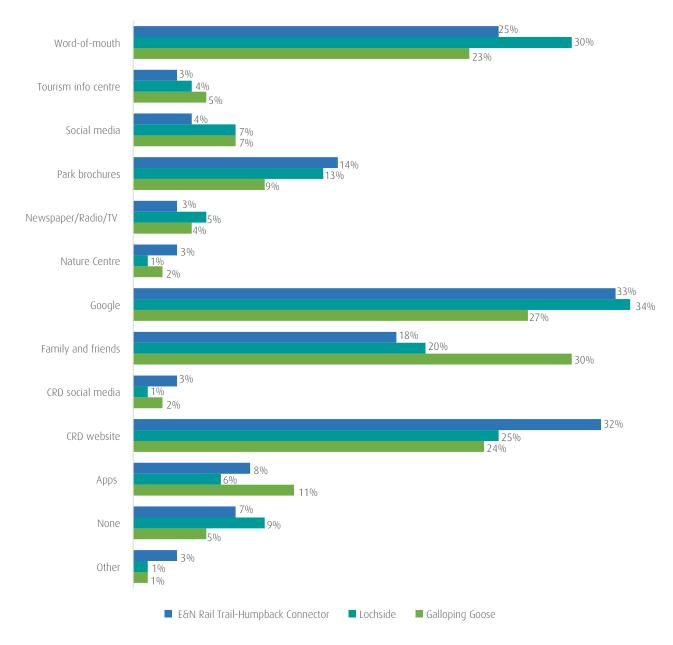


Figure 21: Percentage breakdown of respondents' information sources used to learn more about the regional trails

Section 10: Additional Comments

QUESTION: DO YOU HAVE ANY OTHER COMMENTS ABOUT YOUR REGIONAL TRAILS?

Survey respondents were thankful to CRD staff for the upkeep of regional trails, and for seeking public feedback on regional trails. A number of respondents described the regional trails as one of the most important aspects of the region, and stressed the quality-of-life improvements facilitated by accessible trails. Many respondents described the impact that the trails experience had on them, including improvement of physical and emotional well-being, and the fostering of environmental values and appreciation for nature. Respondents wished for more recreation and active transportation opportunities in the CRD.

Appendix 1

SURVEY METHODOLOGY

A structured questionnaire was administered by an interviewer or self-completed online by visitors who used the Galloping Goose Regional Trail, Lochside Regional Trail and E&N Rail Trail-Humpback Connector from May 27 to September 15, 2019. Both in-person and online opportunities were provided. Details about how this methodology was implemented are described below.

SAMPLING STRATEGY

Surveys were administered to people visiting the regional trails (Table 2). Survey site selection was premised on the assumption that these areas may provide somewhat different experiences for visitors and that visitors of these areas may be somewhat unique, and reflected previous survey locations for consistency.

 Table 2: Data collection location chosen along the Galloping Goose Regional Trail, Lochside Regional Trail

and E&N Rail Trail-Humpback Connector

Regional Trail	Code	Name	Latitude (N)	Longitude (W)
Galloping Goose		Roche Cove		
Regional Trail	GGRT1	Regional Park 48.37446		-123.633214
	GGRT2	Luxton – Fairground 48.429221		-123.530923
		Atkins Road		
	GGRT3	Parking Lot	48.45988	-123.457347
Lochside	LSRT1	Switchbridge	48.45645	-123.377875
Regional Trail	LSRT2	Blenkinsop	48.475962	-123.359664
	LSRT3	Fowler Park	48.53498	-123.377469
	Bevan Ave at Mary			
	LSRT4	Whisper Centre	48.648473	-123.406289
	Mount Newton			
	LSRT5	Crossroad	48.593467	-123.397754
E&N Rail Trail –	ENRT1	Veterans	48.447388	-123.49477
Humpback	ENRT2	Portage Park	48.451997	-123.431444
Connector	ENRT3	Hereward	48.434274	-123.394019

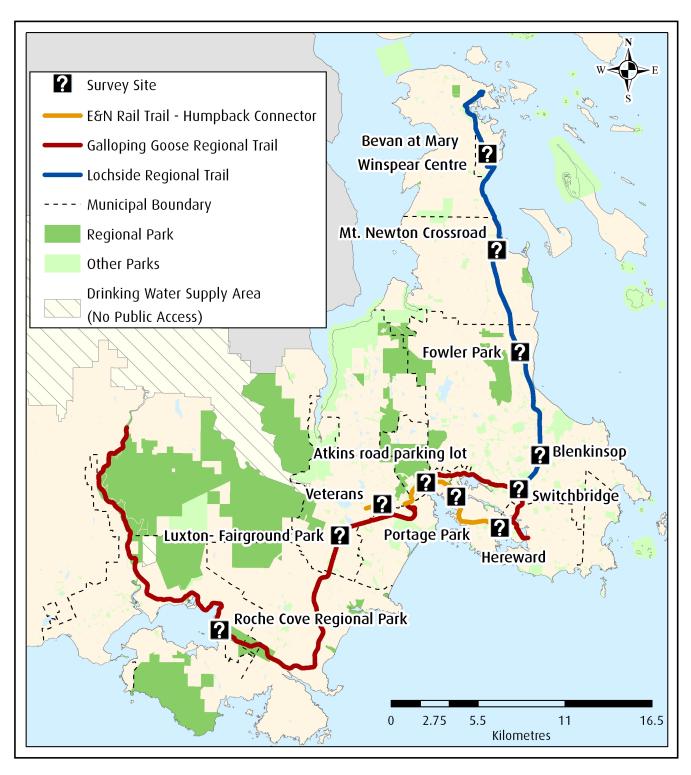


Figure 22: 2019 Regional Trail Survey sites

The sampling strategy employed a "balanced randomization" method that allowed for sampling to occur on randomly selected days and at randomly selected times between May 27 and September 15, 2019. Since data collection was being conducted simultaneously at three regional trails, each area received 19-20 four-hour sampling sessions over this period. Sampling sessions were divided into three time slots: 8:30-12:30, 12:30-16:30 and 16:30-20:30. This technique allowed for reasonable coverage between the different sites at different times of day and on different days of the week (Table 3). Differences in the randomized sampling outcomes were due to rearranging data collection based on weather or other conditions (i.e., wildfire smoke) that made some time periods unsuitable for data collection.

Table 3: Balanced randomization sampling method overview

			E&N Rail Trail-	
	Galloping Goose	Lochside	Humpback	
Times slots	Regional Trail	Regional Trail	Connector	
8:30-12:30	5	6	5	
12:30-16:30	10	10	11	
16:30-20:30	4	4	4	
Total	19	20	20	
Weekdays	11	12	12	
Weekends	8	8	8	
Total	19	20	20	

SAMPLING METHOD

For all sampling areas, the intercept survey method was used. This method involves the surveyor interacting with participants at their home address or in a public space, requesting the selected individual to participate in the survey (Vaske et al 2008). In this case, people were interviewed as they passed through the data collection locations. Because of the high interest shown for the survey and trail users being in transit while passing the data collection station, participants were not intercepted by the interviewer, rather they approached the data collection station voluntarily. Participants were also offered the opportunity to take the survey online. A postcard with the URL of the survey was provided to visitors to allow them to fill out the survey at their convenience.

QUESTIONNAIRE DESIGN

A survey with a standardized set of questions was administered to visitors to the study area. The main areas of focus for the questionnaire were: values, attitudes, use patterns, satisfaction and

management. Questions about participants' demographic characteristics (i.e., age, residency) were also added to the questionnaire to better understand who visits regional parks and trails. Due to the similarity between the Regional Trails Visitor Use Survey 2019 and the survey conducted in 2013 (see https://www.crd.bc.ca/docs/default-source/parks-pdf/regionaltrailssurveyreportmarch2014.pdf?sfvrsn=4d96cca_2), no pre-test of the questionnaire was performed.

The survey consisted of closed-ended quantitative questions and open-ended qualitative questions. Closed-ended questions were used to reduce the response burden for participants. Open-ended questions were included to allow respondents to offer additional comments and clarify their responses if they wished. All responses in the survey were voluntary, thus participants had the freedom to skip any question they did not wish to answer. All information was collected in compliance with the *Freedom of Information and Protection of Privacy Act* (see https://www.crd.bc.ca/freedom-of-information).

QUANTITATIVE VERSUS QUALITATIVE DATA

Quantitative and qualitative data are collected through this survey for different purposes. Quantitative data are collected to measure a specific fact in a numerical form that can be reported in categories, rank orders or measured in units (Dillman et al 2014). Such data allow for quantifiable patterns and trends of a behavior to be documented, such as how long visitors spend in a park, what type of activities they do, etc. Qualitative data are non-numerical in nature and are used to characterize a behavior and/or patterns (Dillman et al 2014). They are collected to develop an initial or in-depth understanding of such behavior and/or patterns. For example, why are visitors spending that amount of time in the park and why are they doing that specific activity? Hence, quantitative data defines a behavior and/or patterns, whereas qualitative data describes it.

COMPLETION TIME

The survey included 28 questions, many of which had multiple statements to be answered. The survey was designed to take 10 to 15 minutes to complete.

DATA ENTRY AND ANALYSIS

Upon retrieval of each survey, the surveyors reviewed the questionnaire to ensure completeness of data and all hard copy surveys were entered and coded. Providing an identifying code on the hard copy allowed for the checking of errors or the entering of missing data when necessary. Responses on each questionnaire were entered directly onto an Excel spreadsheet in numeric

form. Open-ended responses were typed in as text, quoting directly the response provided. This dataset was merged with the data obtained through the online survey and exported to the IBM SPSS 20 software for analysis. Qualitative data were coded to identify the main themes mentioned by participants and to reduce the possibility of respondents to be recognized through personal information. For more information about the statistical approach used, please consult the following source: "Survey Research and Analysis. Application in Parks, Recreation and Human Dimension" by Jerry J. Vaske (2008)

REFERENCES

Dillman D.A., Smyth J.D., & Christian L.M (2014). Internet, phone, mail, and mixed-mode (4th Eds). Hoboken, NJ: John Wikey & Sons.

Vaske J. J. (2008). Survey research and analysis: Applications in parks, recreation and human dimensions. Pennsylvania: Venture Publishing Inc.