

# Trail Area Health & Environment Committee



## Summary

**Meeting: February 10, 2022, 7:00 p.m. (by Zoom)**

### **Committee Members in Attendance:**

Lisa Pasin, Chair, City of Trail  
Dr. Karin Goodison, Interior Health MHO  
Cassandra Caunce, BC Ministry of Environment  
Clare North, Teck Trail Operations  
Dan Bouillon, Teck Trail Operations

Tara Bullanoff, Alternate Interior Health  
Cyra Yunkws, Village of Warfield  
Kyle Jorgenson, USW Local 480 Rep  
Ron Joseph, Community Member  
Steve Hilts, Community Member

### **Others in attendance:**

Andrea McCormick, SNC-Lavalin  
Nelson Ames, Community Member  
Cecilee Pitman, Interior Health  
Christina Yamada, Interior Health  
Colleen Delaney, BC Ministry of Environment,  
Frances Boreland, Broken Hill  
Michelle Laurie, THEC Lead Facilitator

Alexa Mathes, SNC-Lavalin  
Erynn Scaia, SNC-Lavalin  
Wendy Goodrich, SNC-Lavalin  
Jayne Garry, Teck Trail Operations  
Dave Bell, Teck Trail Operations  
Donna Haga, BC Ministry of Environment

*The Trail Area Health & Environment Committee (THEC) meets five times per year online or in-person. Members, designates and community members are welcome.*

### **WELCOME and INTRODUCTIONS**

- The meeting was opened by Mayor Lisa Pasin, THEC Chair

### **MEETING MINUTES**

- The minutes from THEC meeting, November 25, 2021 were approved.

### **PRESENTATIONS, REPORTS, DISCUSSIONS & RECOMMENDATIONS**

#### **Presentations**

##### **Home & Garden Annual Report**

**Presenter: H&G team (Alexa Mathes and Wendy Goodrich)**

- Presentation attached.

##### **Air Quality Pb Comparisons and Standards**

**Presenter: Donna Haga, Ministry of Environment and Climate Change Strategy**

- Presentation attached.

#### **Program Reports & Updates (45 mins)**

#### ***PLEASE NOTE:***

*All reports are provided in the agenda package for your review prior to the meeting. TO MAKE THE MOST OF OUR TIME TOGETHER, PLEASE BRING YOUR QUESTIONS OR ITEMS FOR FURTHER DISCUSSION.*

#### **Air Quality**

- Air Quality Report – Dan Bouillon, Teck Trail Operations
  - See attached report.

- Air Quality Working Group Update – **Lisa Pasin, Chair**
  - Thep.ca has an updated air quality section with Pb and SO<sub>2</sub> where you can get facts and FAQ on both topics.
  - The air quality presentation by Donna was the result of work brought to the Air Quality Working Group via THEC. Lisa invited more questions and suggestions from the Committee.
  - Communications on SO<sub>2</sub> is planned for the spring THEP newsletter; and presentation was given to the program team who work in the community; and further work on communications to vulnerable populations is being planned with the support of IH.

#### **Family Health Report – Cecilee Pitman, Interior Health**

- See attached report.

#### **Home & Garden Report – Andrea McCormick, SNC Lavalin**

- See attached report.
- Andrea expanded on the challenge of “hard to access” properties with respect to undertaking soil management and the commitment to explore this further in advance of the 2022 field season.

#### **Community Check-In - All community members**

- Steve Hilts provided an update on the Community Working Group and hopes to propose a plan to engage community for the April THEC meeting.

#### **Program Planning Update - Michelle Laurie, THEC Lead Facilitator**

- Michelle invited questions or comments on the items in the package:
  - Highlights from 2021 and THEP plan for 2022 (see attached)
  - Survey to homeowners receiving soil management support (see attached). She noted the survey is done by an external 3<sup>rd</sup> party and is intended to help the soil management program improve their processes each field season.

#### **Executive Report - Lisa Pasin, THEC Chair, Mayor, City of Trail**

- Lisa shared the THEC Executive met a second time to discuss the program working collaboratively to develop a two-to-five-year plan. The Executive hopes to bring forward a draft document for THEC to review this spring.

#### **2022 THEC MEETING DATES**

- April 26
- June 21
- September 22
- December 1

THEC meetings are held from 7:00-9:00pm.

# Trail Area Health & Environment Committee



## AGENDA

Meeting: February 10, 2022, 7:00 p.m.

**By Zoom:** <https://us02web.zoom.us/j/83212896815>

### Committee Members:

Lisa Pasin, Chair, City of Trail  
Sandy Santori, Alternate Chair, City of Trail  
Dr. Karin Goodison, Interior Health MHO  
Jane Power, Interior Health  
Kyle Jorgenson, USW Local 480 Rep  
Dan Bouillon, Teck Trail Operations  
Clare North, Teck Trail Operations

Linda Worley, RDKB Area B  
Cyra Yunkws, Village of Warfield  
Ali Grieve, RDKB Area A  
Cassandra Caunce, BC Ministry of Environment  
Ron Joseph, Community Member  
Steve Hilts, Community Member  
Julia Stockhausen, Community Member

*The Trail Area Health & Environment Committee (THEC) meets five times per year online or in-person. Members, designates and community members are welcome.*

### WELCOME and INTRODUCTIONS (5 min)

- Opening remarks from Mayor Lisa Pasin, THEC Chair

### MEETING MINUTES

- Approve minutes from THEC meeting, November 25, 2021 (as attached)

### PRESENTATIONS, REPORTS, DISCUSSIONS & RECOMMENDATIONS

#### Presentations

#### Home & Garden Annual Report (35 mins)

**Presenter: H&G team**

- Presentation followed by Q&A

#### Air Quality Pb Comparisons and Standards (25 mins)

**Presenter: Donna Haga, Ministry of Environment and Climate Change Strategy**

- Presentation followed by Q&A

#### Program Reports & Updates (45 mins)

#### *PLEASE NOTE:*

*All reports are provided in the agenda package for your review prior to the meeting. TO MAKE THE MOST OF OUR TIME TOGETHER, PLEASE BRING YOUR QUESTIONS OR ITEMS FOR FURTHER DISCUSSION.*

#### Air Quality

- Air Quality Report (see attached) – **Dan Bouillon, Teck Trail Operations**
- Air Quality Working Group Update – **Lisa Pasin, Chair**

**Family Health Report** – (see attached) **Cecilee Pitman/Meghan Morris, Interior Health**

**Home & Garden Report** – (see attached) **Andrea McCormick, SNC Lavalin**

**Community Check-In - All community members** (15 mins)

- Community Working Group update - Steve Hilts, Community Member
- Round table contributions & questions

**Program Planning Update - Michelle Laurie, THEC Lead Facilitator**

- Highlights from 2021 and THEP plan for 2022 (see attached)
- Survey to homeowners receiving soil management support (see attached)

**Executive Report - Lisa Pasin, THEC Chair, Mayor, City of Trail**

**2022 THEC MEETING DATES**

- April 26
- June 21
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THEC meetings are held from 7:00-9:00pm.



# **Presentations**

Home and Garden Annual Report



# Challenges and Successes – Part II

## 2021 Home & Garden Program

Annual Report to the THEC

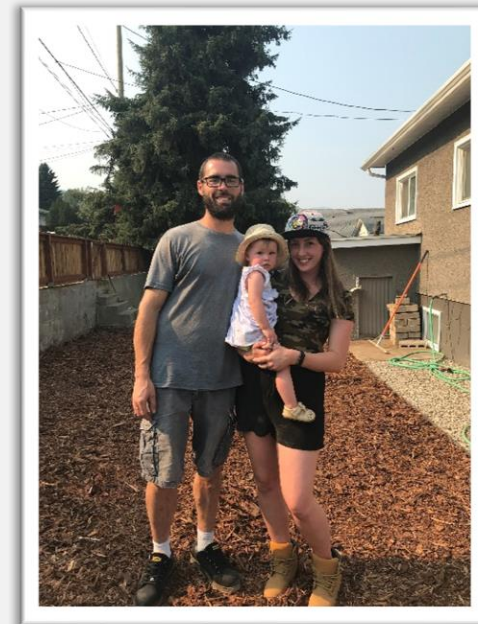
February 10, 2022

Presented by Wendy Goodrich and Alexa Matthes

# OUTLINE

## The 2021 Home & Garden Program

- › Healthy Homes & Enhanced Supports
- › Engagement & Outreach
- › Community Program Office
- › Soil Management Program
- › Home & Garden 2022



# Healthy Homes & Enhanced Support Program



# Healthy Home Visiting

## Healthy Home visits in 2021

- › 59 visits completed
- › Expansion of the program to include Area 1

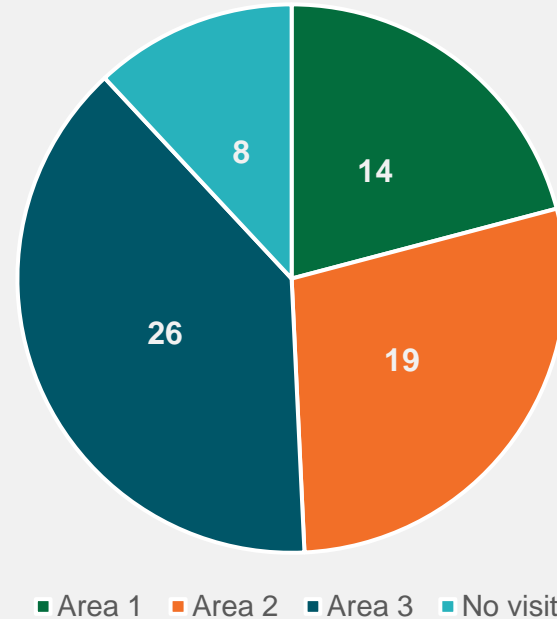
## Successes

- › Adapted Healthy Home visits to meet the needs of individual families
- › Participation remains high
- › Connecting with expectant families

## Challenges

- › Supply chain issues
- › Families report feelings of isolation

Visits in 2021



# Enhanced Supports

## Enhanced Support Cycles

2020 / 21 – 26 Children were followed

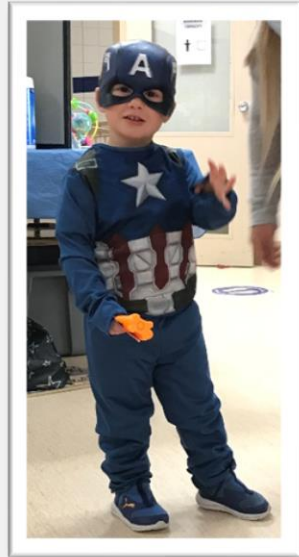
2021 /22 – 18 Children initial follow-up (winter results are scheduled)

## Successes

- › Residential Lead Inspection Pilot Program continued
- › Bi-weekly check-in meetings with Public Health following the clinic
- › Case Conference was virtual
- › Families continue to be engaged

## Challenges

- › House Cleaning delays





# Engagement & Outreach



# Engagement & Outreach

## Engagement with:

- › Family Action Network
- › Early Years Coalition
- › Navigator Table
- › Local Daycare
- › Local Realtors

## Outreach to:

- › Building Beautiful Babies
- › Trail IncrEdible Market
- › Sunningdale Daycare
- › Fall Lead Testing Clinics
- › Camp Cowabunga





# Kids Summer Day Camp



# Community Program Office



# Community Program Office

## Successes

- › Re-opened the office 3 days/wk
- › LSR supplies available again
- › Became members of the Trail & District Chamber of Commerce
- › Website updates and revisions to online forms

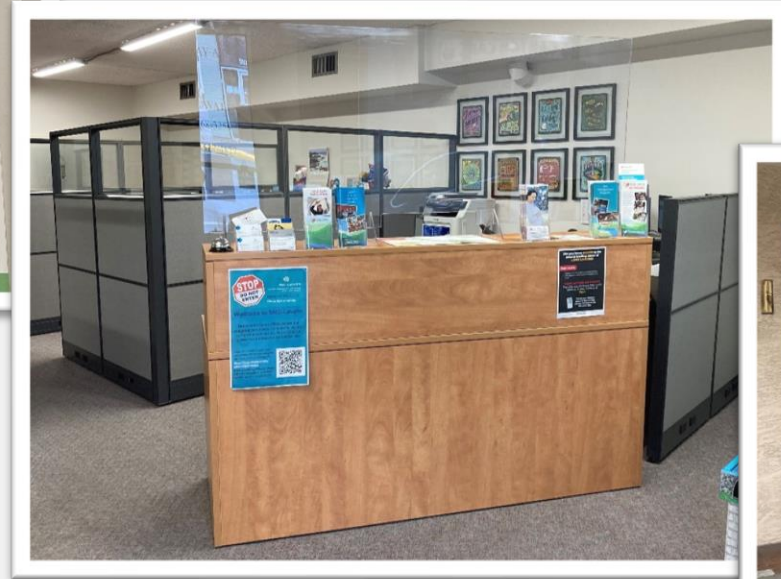


## Challenges

- › Minimal foot traffic downtown



# Updates around the office



# Soil Management Program



# Soil Assessment

## Commitment

- › Offer and complete soil sampling all properties with families and other properties as capacity allows

Task	2021 Capacity	Actual
Soil Assessment	300	214
Ground Cover Evaluation	-	219

## Successes

- › Sampled all properties that signed up before Dec.
- › Yard sampling & GCEs process streamlined
- › Increased interest in soil assessment
- › Ongoing work – crew was busy until the snow fell

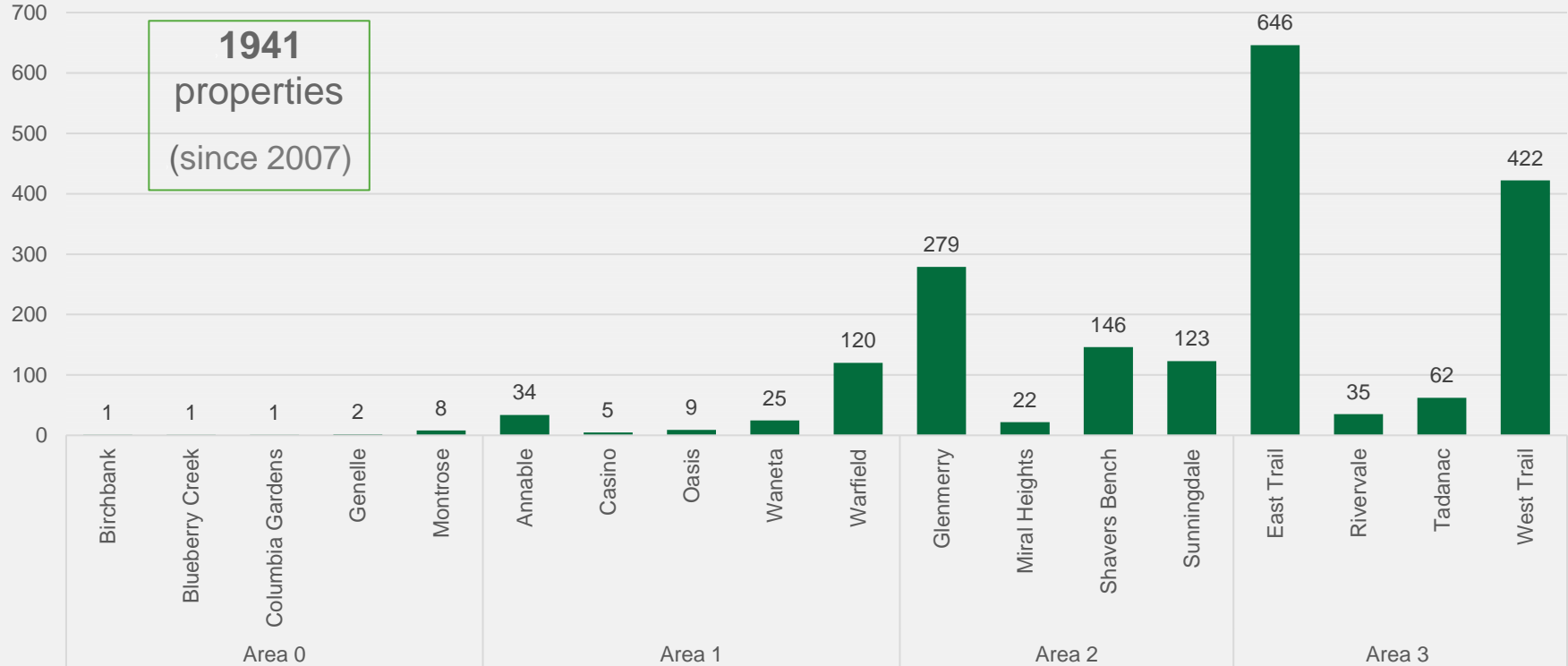
## Challenges

- › Hazards in yards
- › Weather (Smoke & Heat)
- › Equipment (XRF)

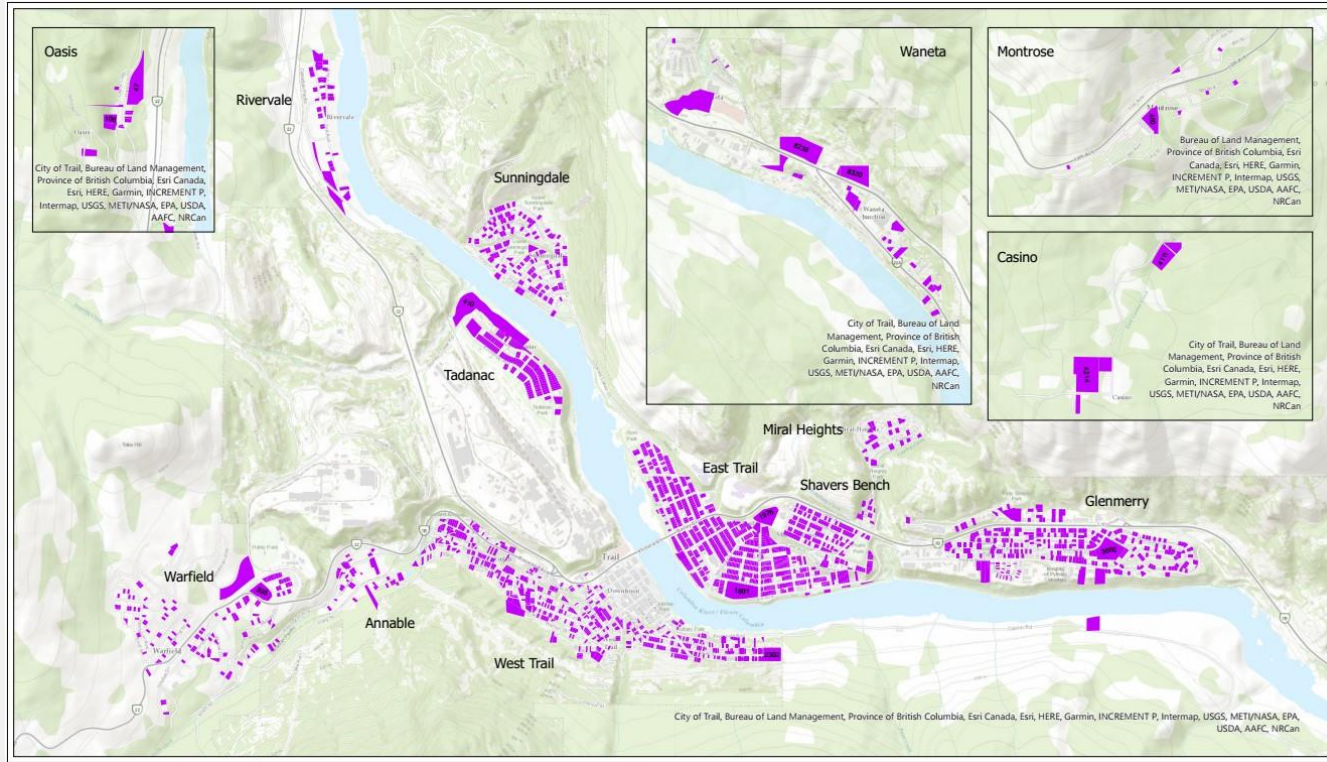




## Soil Assessments by Area and Neighborhood



# Soil Assessment Progress





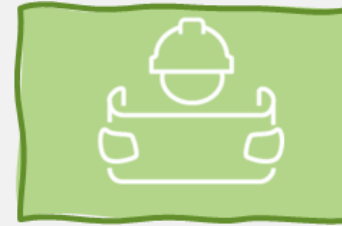
# Soil Management Summary

## Commitment

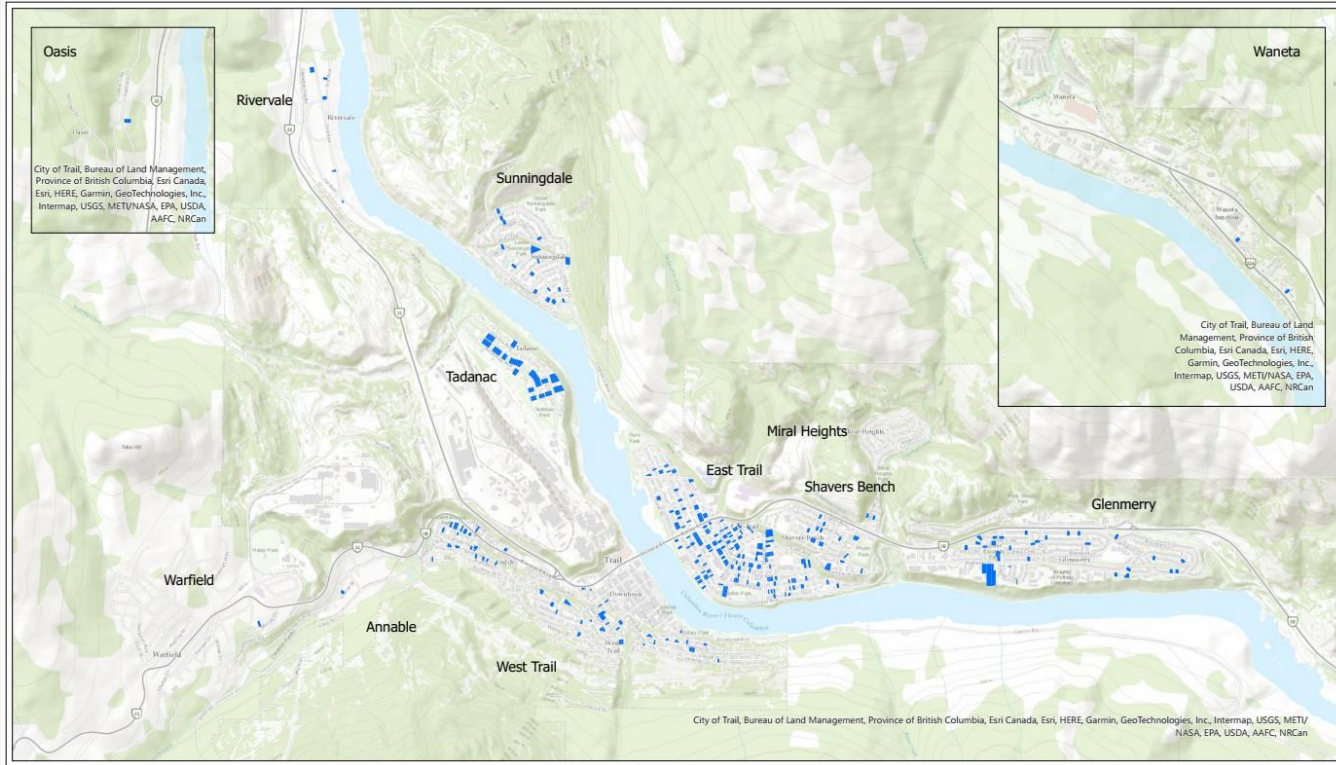
- › To provide soil management to all top priority properties
- › 136 properties received soil management

Task	2021 Initial Plan	Actuals
<b>Soil Replacement</b>		
- Child Occupied	43 full / 4 partial	53 / 5 partial
- Community	5	4 / 1 partial
- Gardens	10	4
<b>Lawn Care</b>	60	53*
<b>Yard Improvements &amp; Soil Disposal</b>	25	27

\* Note 11 properties received lawn care and other soil management



# Soil Replacement Progress



# Soil Management Program

## Successes

- › Adapting through continuing Covid challenges
- › Cohesive teams – both H&G and Contractors
- › Addressing tough access properties in new ways
- › Signs in community, new paperwork implemented

## Challenges

- › House sales and families moving
- › Owners declining
- › Tough access
- › Weather extremes



# Homeowners Guide to Soil Remediation

## ABOUT THE SOIL MANAGEMENT PROGRAM

Soil management is one way to reduce exposure to metals in your home and yard environment. Soil remediation in your home and yard management. The Trail Area Health & Environment Program (TH&E) has been completing the Soil Management Program (SMP) and expanded to the Soil Remediation Program (SRP) in 2019. All work related to soil remediation will be coordinated by a Home & Garden (H&G) representative from TH&E.

## WHAT IS SOIL REMEDIATION?

Soil remediation is delivered through the Soil Management Program and includes soil replacement and ground cover improvements. Remediation is voluntary and there is no cost to the homeowner. Soil replacement involves removing soil by excavating and disposing of soil that has been impacted by smelter metals. Following removal the property is re-landscaped with new soil. The purpose of this guide is to outline the process of remediation through soil replacement.

## AREAS OF A PROPERTY NOT INCLUDED IN SOIL REMEDIATION:

- Soil cannot be remediated under:
  - Buildings with foundations.
  - Low decks.
  - Paved areas, sidewalks, patios, or driveways.
  - Walls, ponds, or pools.
  - Drip-line or root ball of large trees or shrubs.



For more information visit [thep.ca/soil](http://thep.ca/soil)

## THE SOIL REMEDIATION PROCESS

Soil management plans are unique to each property and depend on the layout and size of the yard, lead levels in soil and ground cover. The whole process can take over a year from initial planning to completion, yards with difficult access take longer to plan and remediate.

### Soil remediation involves several steps:

1. Planning and Remediation Agreement
2. Prepare the yard
3. Soil Removal and Sampling
4. Replace Soil with Clean Backfill
5. Restore Landscaping
6. Homeowner Care for New Landscaping
7. Completion Records and Report

## TIMELINE

From start to finish soil remediation can take several years to complete. Most of the time is spent planning and scheduling and then wrapping up the reporting and documentation for the project. The onsite work typically only takes a few weeks.



		<b>POLICY FACT SHEET</b> Soil Management Program <b>PLANT REPLACEMENT</b>	No. PFD-01 Version: 1
Prepared by:	Date:	Approved by:	
Alexa Matthee	2021.03.11	Andrea McC...	

## 1 PURPOSE

This policy outlines the options for managing plants during the excavation. During site restoration, plants can be replaced.

This policy applies to the replacement of non-woody plants and shrubs and trees will follow the Policy for Tree and Shrub Replacement.

## ROLES & RESPONSIBILITIES

Roles and responsibilities for plant replacement are:

**Homeowners:** Identify existing plants in the yard and replace them prior to remediation. Select replacement plants for Home & Garden. Document existing plants on the Plant Inventory. Document plant replacement in the Remediation Plan. Provide documentation for the project. Follow the Remediation Plan and provide...

## SCENARIOS

In most cases, the pre-remediation condition of the property is documented by the Home & Garden Team (H&G) in a PROPERTY PLANT INVENTORY.

Following scenarios for Plant replacement are available:

- Scenario 1: Plants are removed & replaced with new plants as otherwise requested by the Homeowner to be replaced during soil excavation.
- Scenario 2: During yard restoration, plants are replaced by the Contractor with plants, as selected by the Homeowner, to replace plants identified in the pre-remediation inventory. Plants in good condition prior to remediation will be replaced with what is available. The time to establish. Substitutions may be made. The responsibility of the plants is the responsibility of the Homeowner.



## Soil Remediation Key Milestones and Completion Agreement

PID: \_\_\_\_\_  
Page 1 of 2

Property Address: \_\_\_\_\_  
 Homeowner: \_\_\_\_\_  
 Contractor: \_\_\_\_\_  
 H&G Site Supervisor: \_\_\_\_\_  
 H&G Site Monitor: \_\_\_\_\_

KEY MILESTONES			
<b>Remediation Kick-off Property Review</b>			
Activity	Notes	Activity	Notes
<input type="checkbox"/> HO consent for Tenant to act on behalf (if applicable)		<input type="checkbox"/> Identify/Classify other subsurface utilities and/or structures	
<input type="checkbox"/> Landscape Feature Inventory		<input type="checkbox"/> Identify/Classify drainage, pooling water or general water issues	
		Excav. Foundations	NWSE
<b>Kick - Off Meeting Date</b>			
	H&G Supervisor	Initials/sign-off Contractor Site Supervisor	Homeowner*
<b>Remediation Progress Check-in</b>			
Activity	Notes	DATE	H&G Initials
<input type="checkbox"/> Excavation & Backfill Complete?			
<input type="checkbox"/> Damages, Concerns or Deviations from Remediation Plan			
<input type="checkbox"/> Homeowner Check - In			
<b>Site Closure and Demobilization</b>			
Activity	Notes	Activity	Notes
<input type="checkbox"/> Final Grading Approved		<input type="checkbox"/> Restored Features (e.g. fences, concrete, etc.)	
<input type="checkbox"/> Contractor Demobilization Approved?		<input type="checkbox"/> Final Site Inspection (e.g. damages, concerns or deviations from Remediation Plan?)	
<input type="checkbox"/> Landscaping	Soil Plants Other (scree/s)	<input type="checkbox"/> Final Credits Set up at Supplier (e.g. plants, fences)?	
<b>Date Completed</b>		Initials/sign-off Contractor	Homeowner*
	H&G Team		

\*Tenant initials if the Homeowner has officially designated them to sign-off and has been documented by H&G.

Community Program Office | 1310 Bay Avenue, Trail, BC V1R 4A7 | 250-368-3256 | [www.thep.ca](http://www.thep.ca)



# Home & Garden 2022





# 2022 - Looking Ahead and Staying on Course

## Healthy Homes, Enhanced Support & Outreach

- › Continue to offer Healthy Home visits
- › Staying connected and visible in the community
- › Support colleagues in Public Health

## Program Office

- › Looking to open the doors by Spring
- › LSR Intake & Outreach

## Soil Management

- › Reaching those looking for soil assessment
- › Offering soil management in priority order
- › Property developments



# Thank You!

## Questions?

REACH US ANYTIME AT:  
[programs@thep.ca](mailto:programs@thep.ca)



# **Presentations**

Air Quality Pb Comparisons and Standards



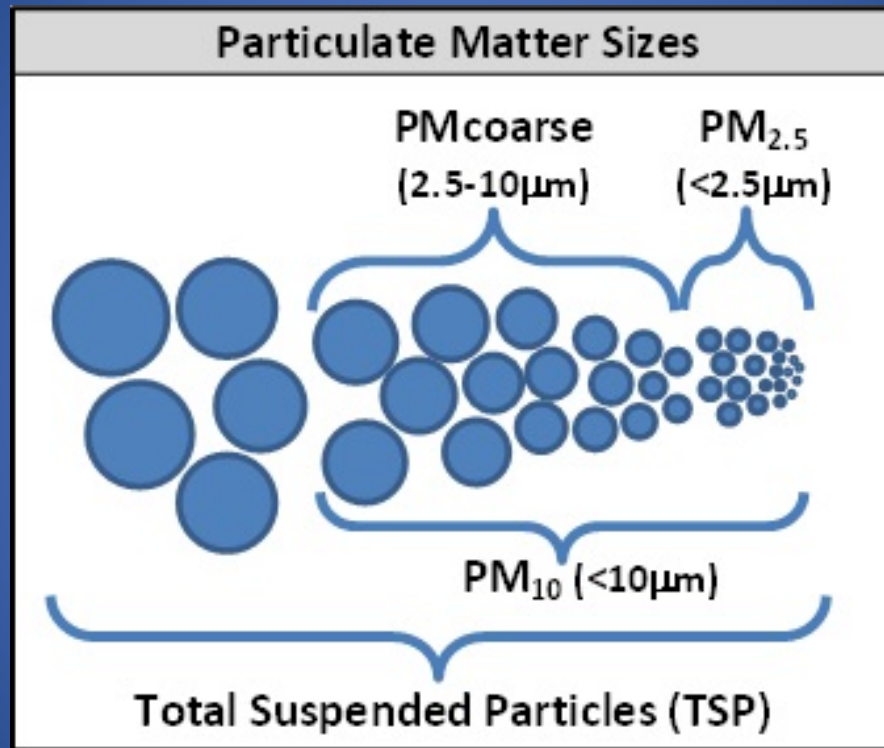
# Lead in Air – Trail and Elsewhere

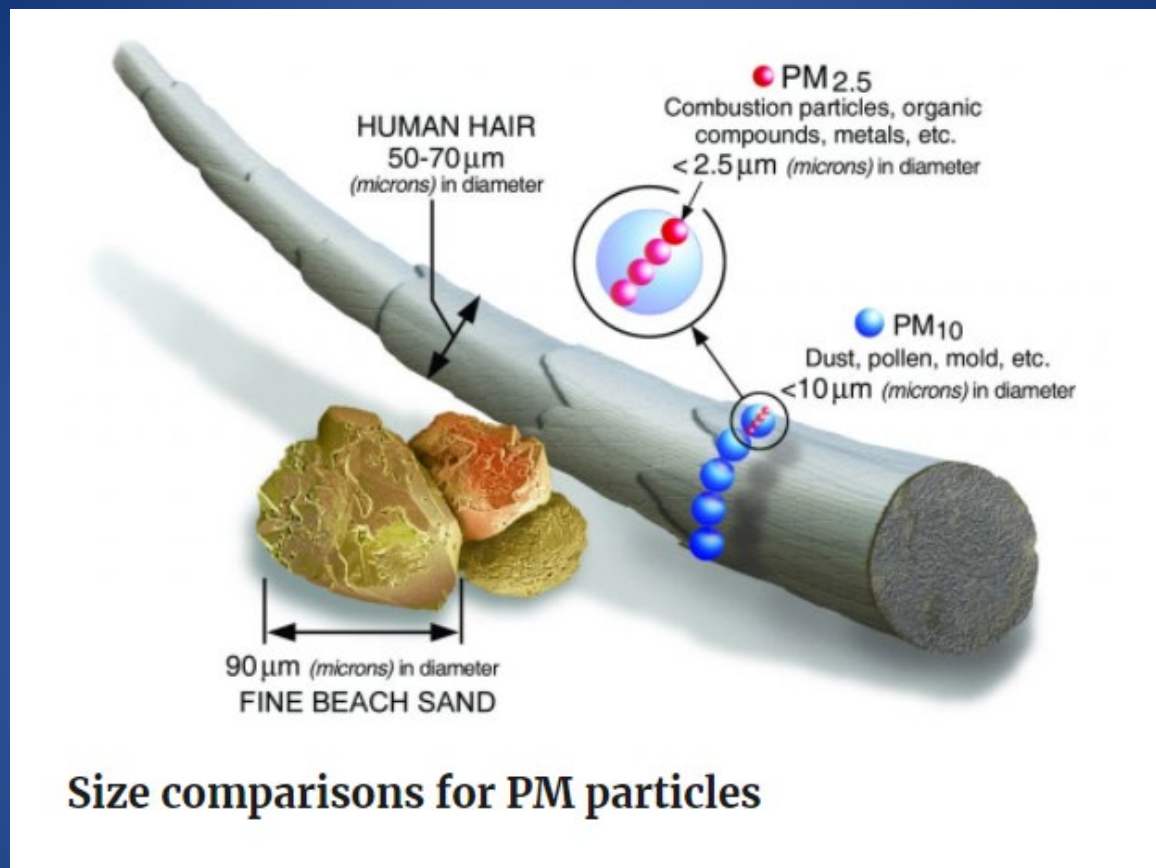
Donna Haga

Sr. Air Quality Meteorologist

February 10, 2022

## Lead is Measured in Different Sized Particles





<https://www.epa.gov/pm-pollution/particulate-matter-pm-basics>

## Lead is Measured on Different Time Scales

- 1-hour
- 24-hour (daily)
- 30-day (monthly)
- 3-month
- Yearly





To compare Trail and other places, the levels must be:

-for the same particle size, and

-over the same time scale.



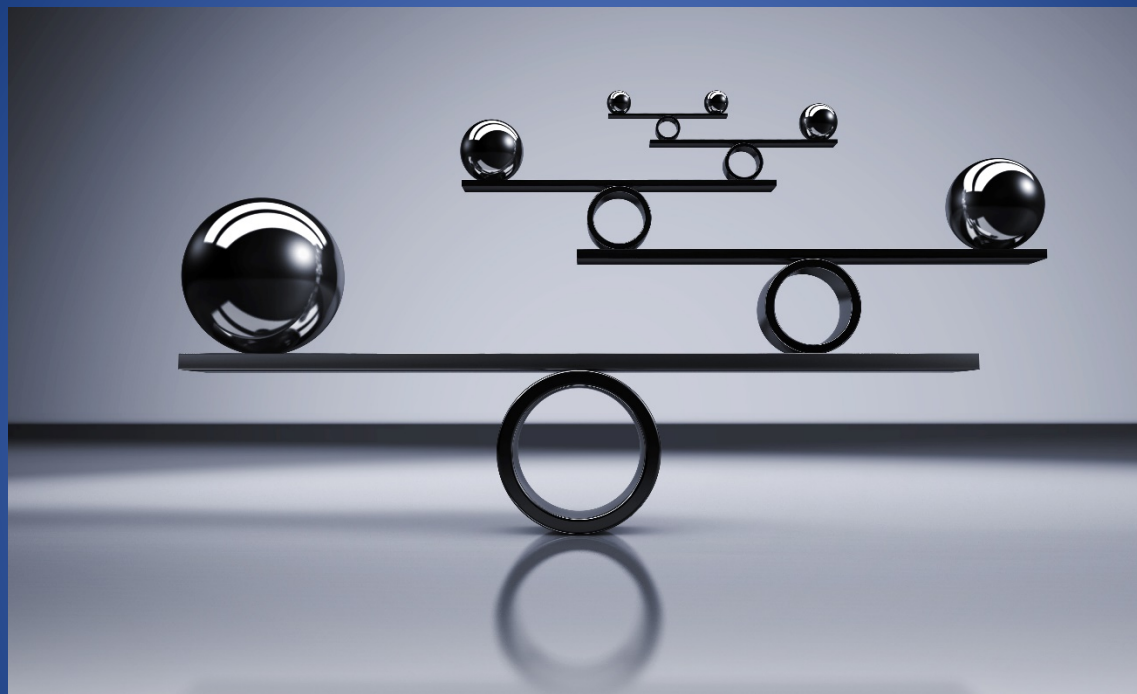
## Benchmarks for Lead in Air



## Benchmarks for Lead in Air

Jurisdiction	Concentration ( $\mu\text{g}/\text{m}^3$ )	Time Scale
Alberta	1.5	1-hour
Ontario	0.5 0.2	24-hour 30 day
California	1.5	30 day
US EPA NAAQS	0.15	3-month
Australia	0.5	Annual

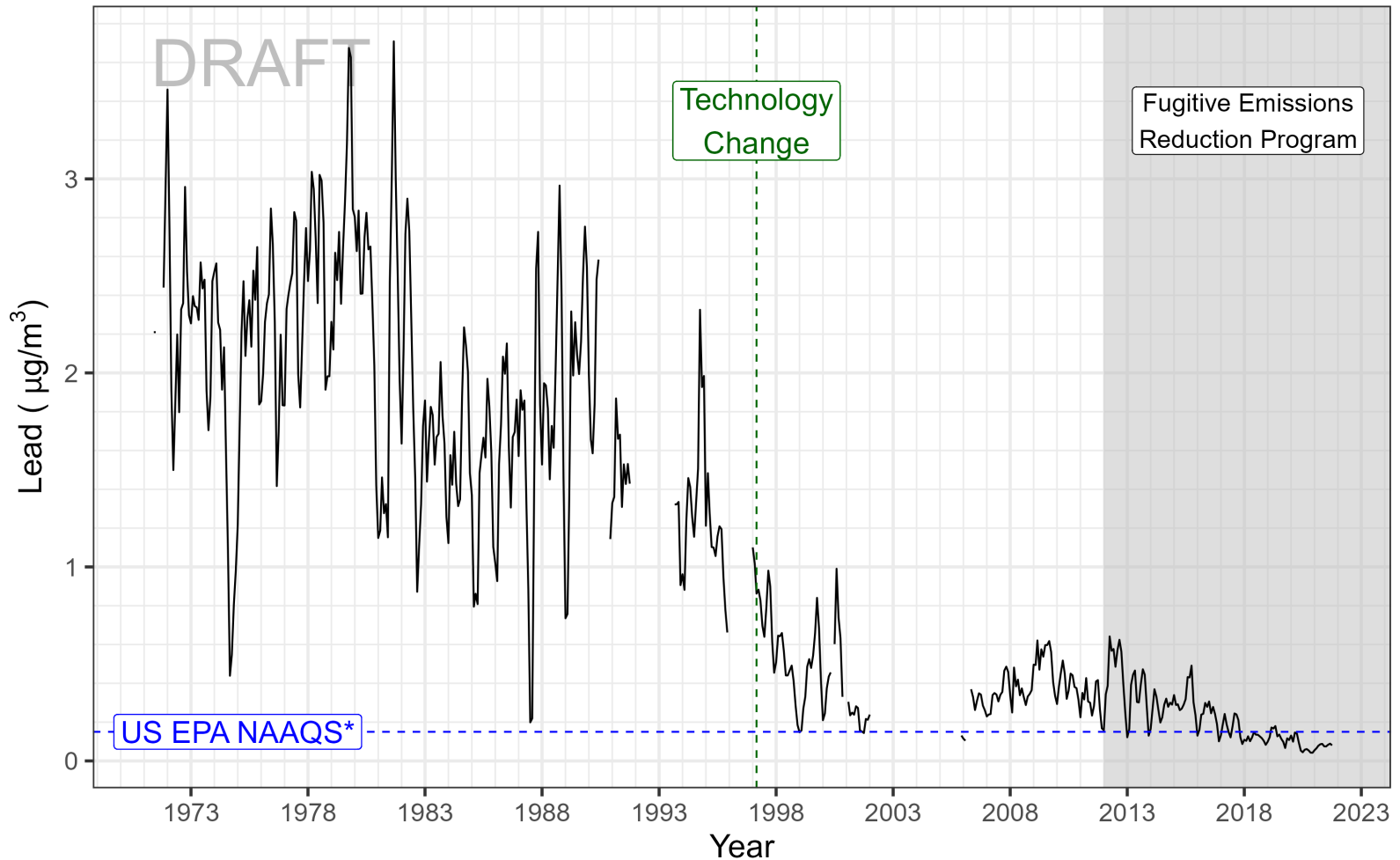
# Lead in Air – Trail & Elsewhere





# Lead Levels in Trail (1971-Present)

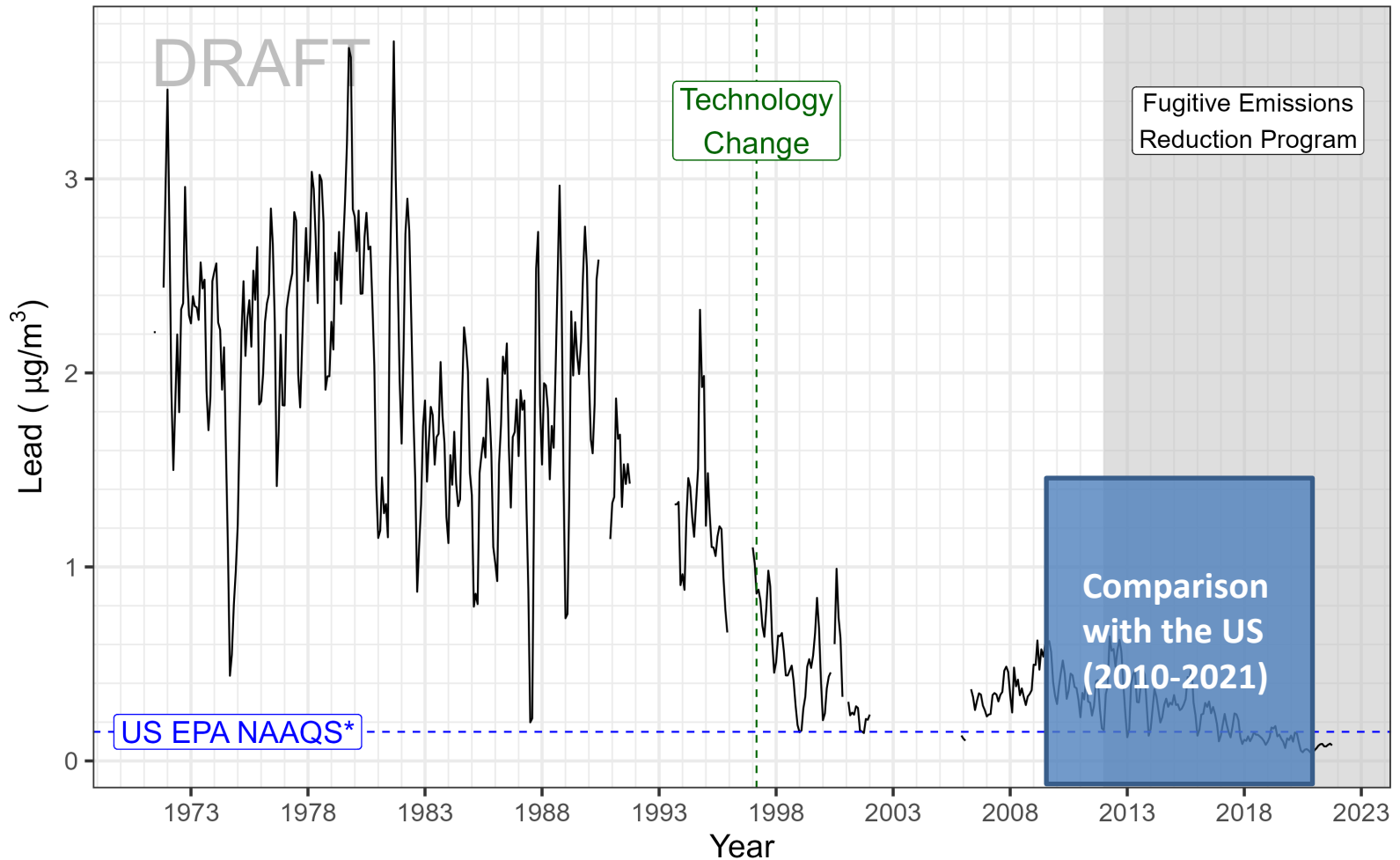
Lead in Total Suspended Particulates | 3-month Average



\*United States Environmental Protection Agency National Ambient Air Quality Standard

# Lead Levels in Trail (1971-Present)

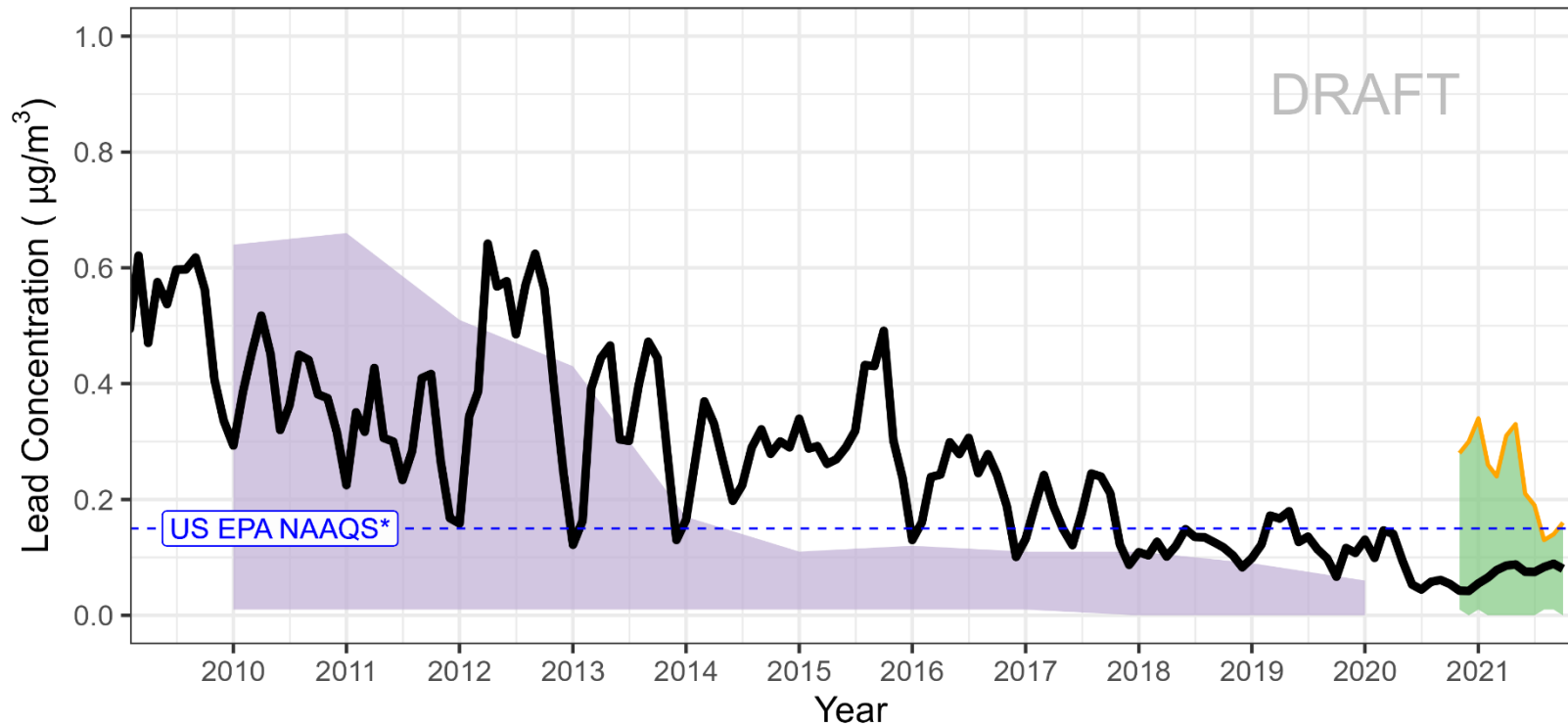
Lead in Total Suspended Particulates | 3-month Average



\*United States Environmental Protection Agency National Ambient Air Quality Standard

# Lead Levels in Trail (2009-Present)

Lead in Total Suspended Particulates | 3-month Average



- Trail Butler Park
- Herculaneum Lead Smelter Reduced Operations (Missouri)
- 83 Sites Across the US\*\*
- 19 Sites Across Missouri\*\*\*

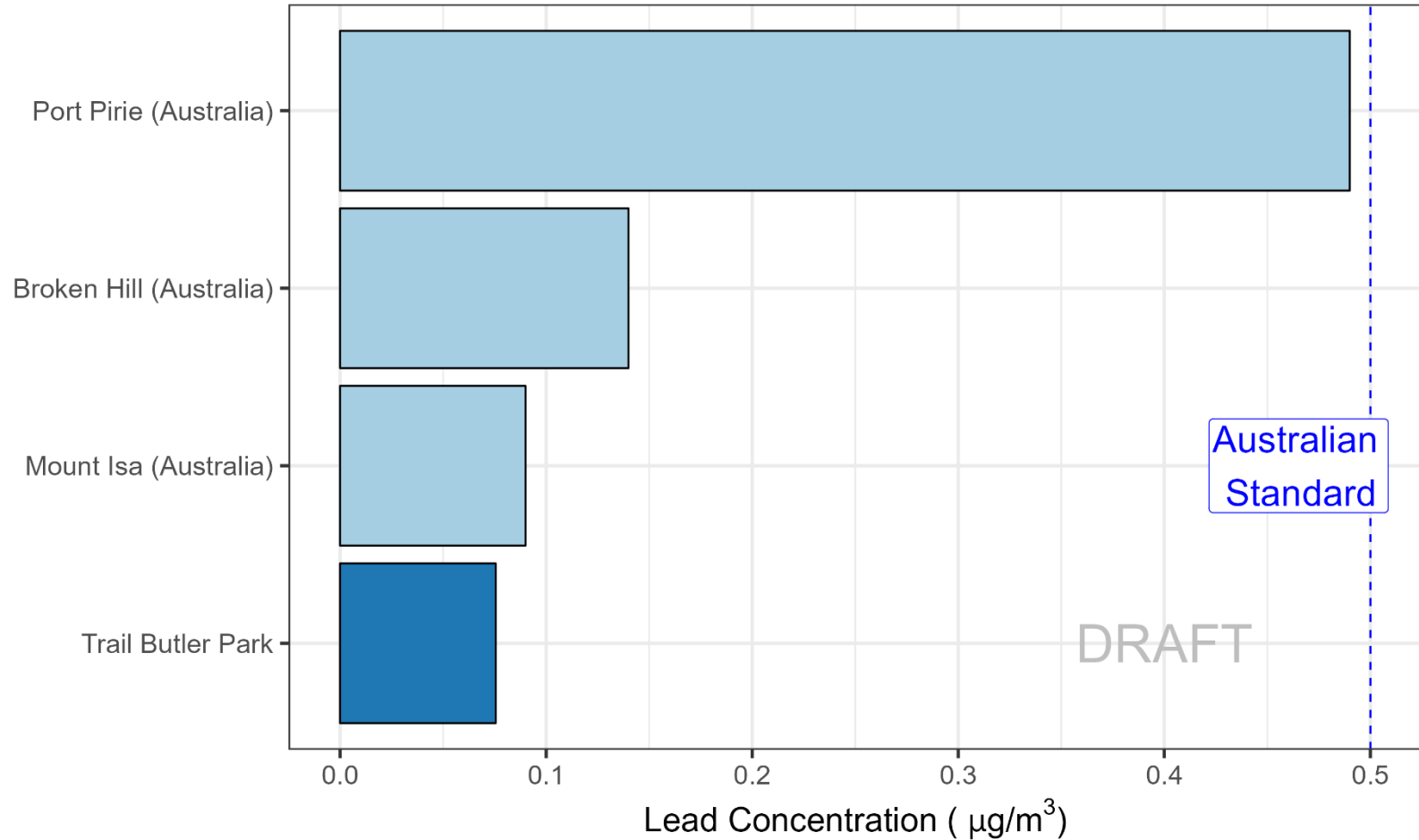
\*United States Environmental Protection Agency National Ambient Air Quality Standard

\*\*<https://www.epa.gov/air-trends/lead-trends>

\*\*\*<https://dnr.mo.gov/document-search/air-quality-analysis-lead-monthly-report>

# 2020 Average Lead in Total Suspended Particulates Monitored at Locations With Lead Smelting/Mining Facilities

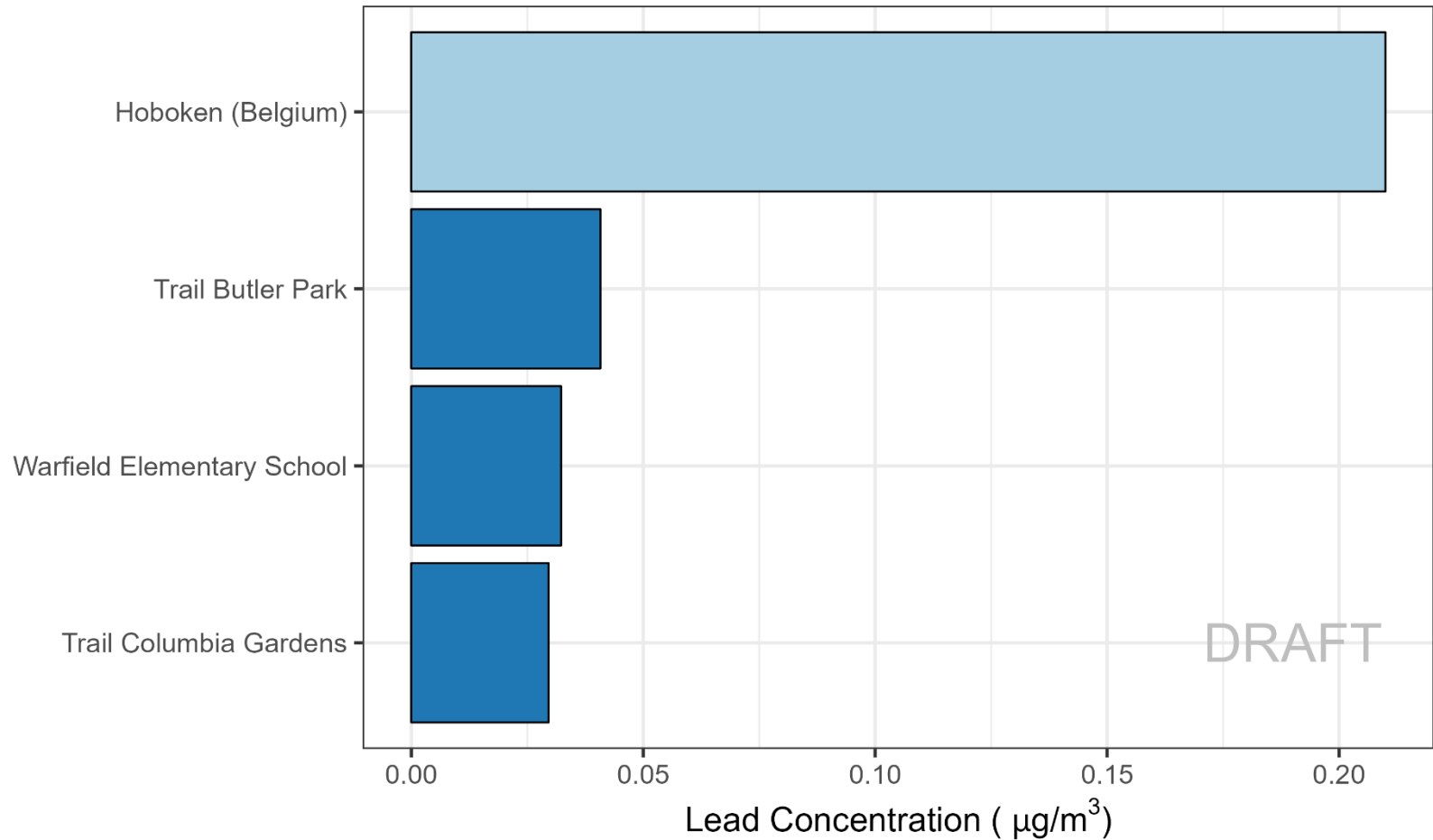
Australian Site Trail Site



# 2020 Average Lead in PM<sub>10</sub>

Monitored at Locations With Lead Smelting/Mining Facilities

Belgian Site Trail Site



DRAFT





# Extra slides

# Lead Emissions

- [https://indicators-map.canada.ca/App/CESI\\_ICDE?keys=AirEmissions\\_Pb&GoCTemplateCulture=en-CA](https://indicators-map.canada.ca/App/CESI_ICDE?keys=AirEmissions_Pb&GoCTemplateCulture=en-CA)
- <https://www.canada.ca/en/environment-climate-change/services/environmental-indicators/emissions-harmful-substances-air.html>

# **Air Quality Report**



## Air Quality Report

February 10, 2022

### 1. Lead in Air:

Fourth quarter 2021 average for lead in air at Butler Park was  $0.043 \mu\text{g}/\text{m}^3$ , and the year-to-date average of  $0.068 \mu\text{g}/\text{m}^3$  is similar to last year. As seen in the monthly averages in Figure 2, month to month variability in ambient levels remains relatively low, but the influence of abnormal weather, including temperature extremes, very low precipitation, and high frequency of winds gusts, can be seen in the data.

Further to the discussion at the November 25, 2021 THEC meeting, a new chart (Figure 3 below) presents the 3-month rolling average of the data for lead in air measured at the Butler Park station compared to the US EPA standard of  $0.15 \mu\text{g}/\text{m}^3$  (Federal and BC Provincial governments do not have ambient air quality objectives or standards for lead; however, it is reasonable to rely on standards from other jurisdictions when this is the case). Lead in air levels measured at Butler Park and Birchbank met the US EPA standard of  $0.15 \mu\text{g}/\text{m}^3$  on a 3-month average throughout 2021.

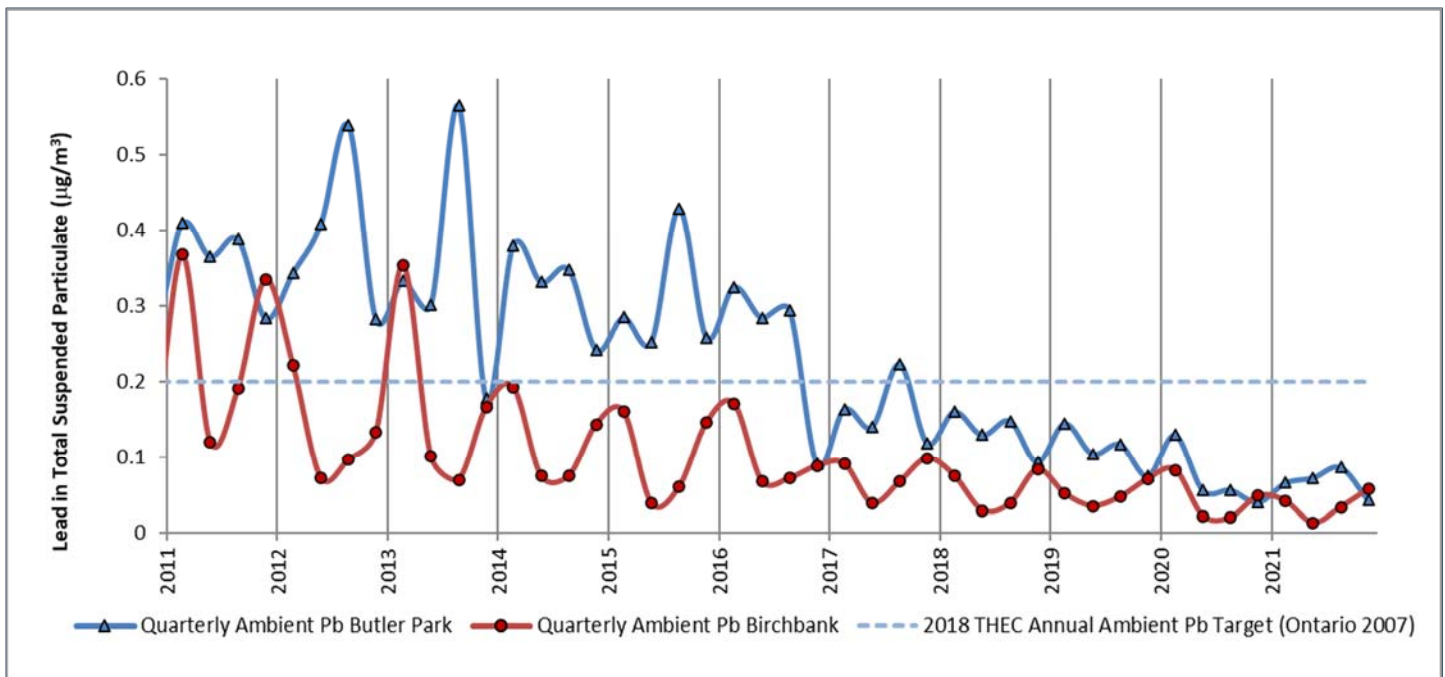


Figure 1: Quarterly monthly average lead at Butler Park and Birchbank stations (as total suspended particulate measured bi-daily)

The chart in Figure 1 shows quarterly averages for Lead in air for Butler Park (dark blue) and Birchbank (red), in comparison to the 2018 THEC Annual Ambient Lead in Air Objective (dashed line).

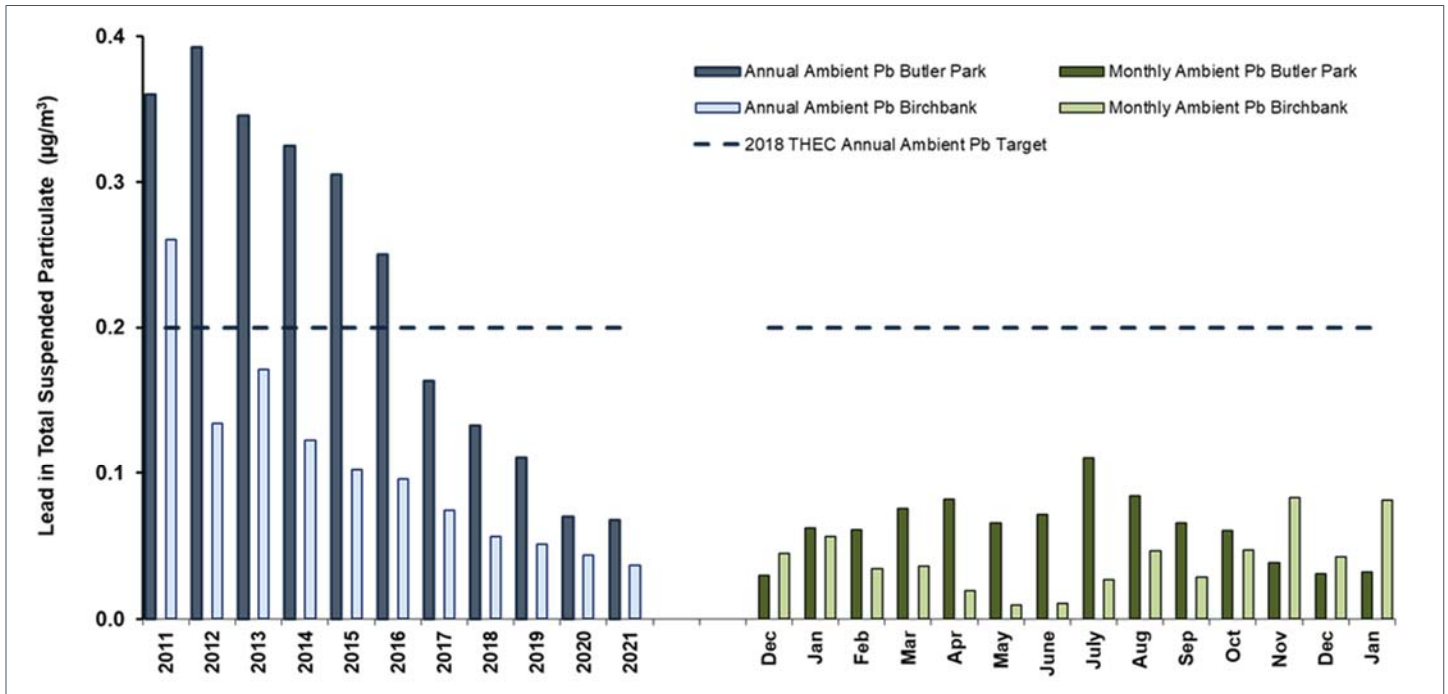


Figure 2: Annual and monthly average lead at Butler Park and Birchbank stations (as total suspended particulate measured bi-daily)

The chart in Figure 2 shows annual and monthly averages for Lead in air for Butler Park. Annual averages are shown on the left for Butler Park (dark blue) and Birchbank (light blue). Monthly averages for the past year are shown on the right for Butler Park (dark green) and Birchbank (light green). The 2018 THEC Annual Ambient Lead in Air Objective is shown as a dashed line. Monthly averages for Lead in ambient air are expected to have some variability due to season, weather, predominant wind direction and operational variance.

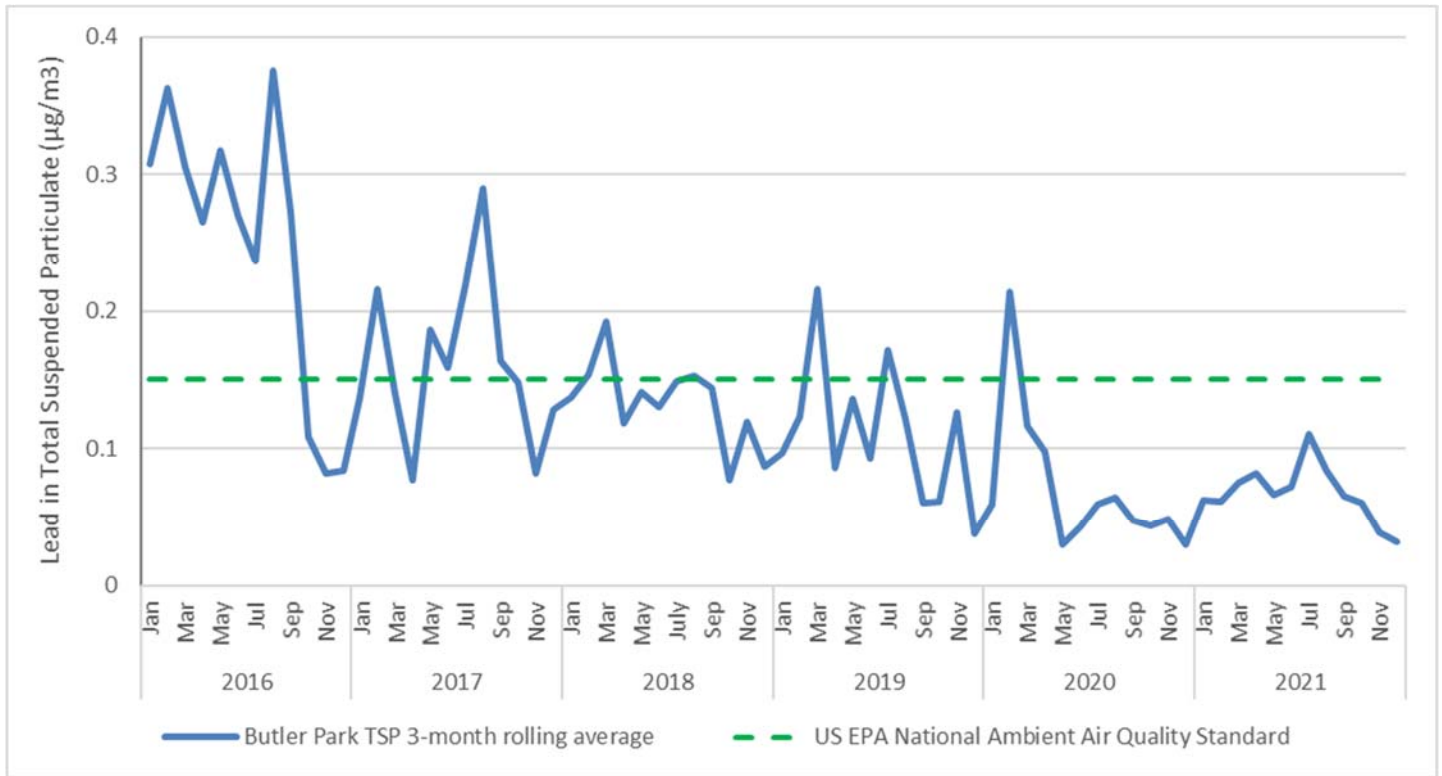


Figure 3: 3-month rolling average lead in air at Butler Park station (as total suspended particulate measured bi-daily)

The chart in Figure 3 shows the 3-month rolling average for lead in air for Butler Park (blue line), in comparison to the US EPA standard (green dashed line).



## 2. Arsenic in Air:

Fourth quarter 2021 average for arsenic in air at Butler Park was  $0.003 \mu\text{g}/\text{m}^3$ , and the year-to-date average of  $0.003 \mu\text{g}/\text{m}^3$  is similar to last year.

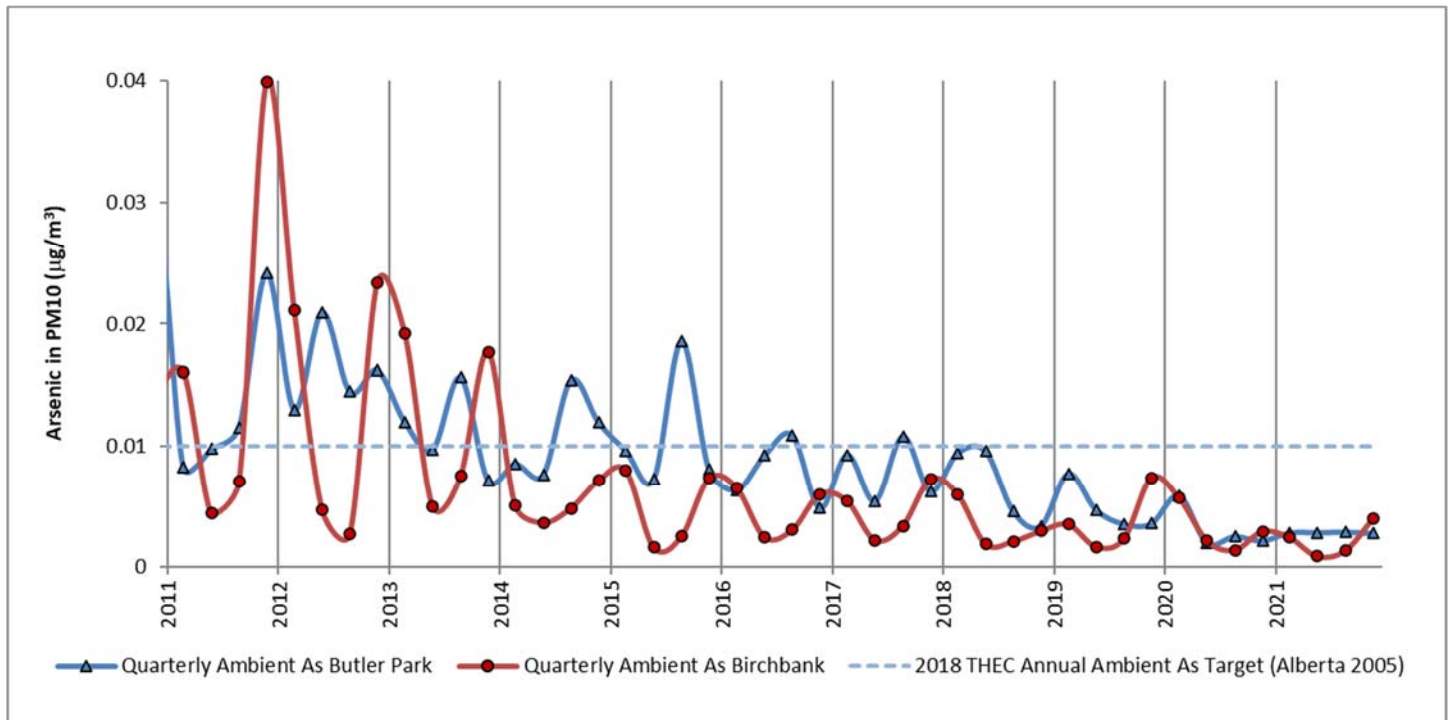


Figure 4: Quarterly average arsenic at Butler Park and Birchbank stations (as inhalable PM<sub>10</sub> fraction measured weekly)

The chart in Figure 4 shows the annual average for Arsenic in air (measured as inhalable PM<sub>10</sub> fraction) at Butler Park (blue) and Birchbank (red) in comparison to the 2018 THEC Air Quality Objective (blue line).

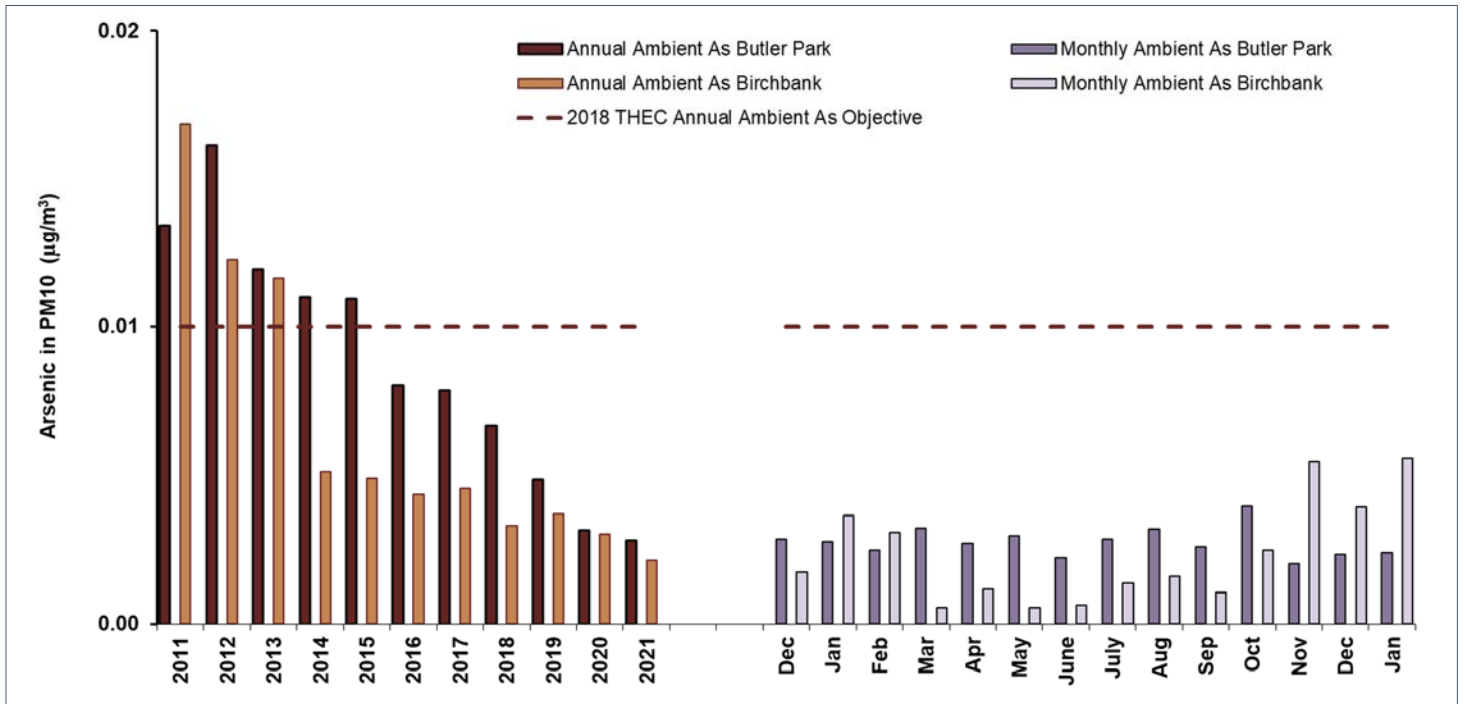


Figure 5: Annual and monthly average arsenic at Butler Park and Birchbank stations (as inhalable PM10 fraction measured weekly)

The chart in Figure 5 shows annual and monthly averages for Arsenic in air at Butler Park and Birchbank. Annual averages are shown on the left for Butler Park (dark brown) and Birchbank (light brown). Monthly averages for the past year are shown on the right for Butler Park (dark purple) and Birchbank (light purple). The 2018 THEC Air Quality Objective is shown as a dashed line. Monthly averages for Arsenic in ambient air are expected to have some variability due to season, weather, predominant wind direction, operational variance and sampling frequency.

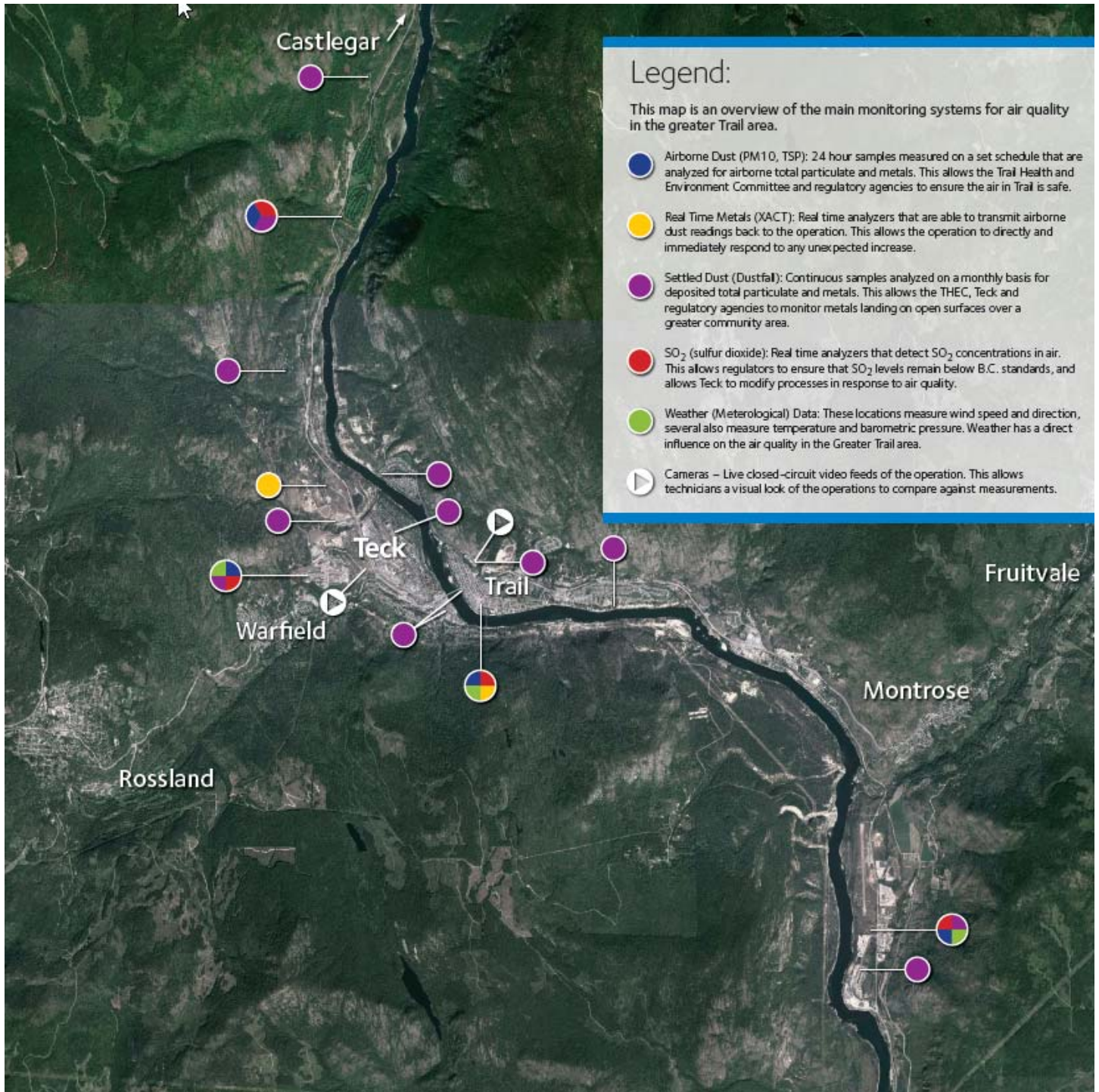


Figure 6: Teck Community Air Monitoring Stations

# Family Health Report



February 10, 2022

## RECENT HIGHLIGHTS

1. Blood Lead Clinic
2. Healthy Family Visits
3. Community Outreach

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## ADDITIONAL DETAILS

1. Blood Lead Clinic
  - Winter Clinic delayed this year, being held February 28 (9:00am -4:00pm) and March 1(1-6pm)
  - 61 Children were invited
  - Target groups for the Winter Clinic are babies currently 6-12 months of age that were too young last September and follow-up for those children above the Enhanced Support Threshold of 5ug/dL at Fall Clinic
  - Winter Clinic this year looks a bit different as some parents requested an invite as their children were unable to attend the Fall 2021 Clinic due to an increase in covid cases within the community at that time
2. Healthy Family Visits
  - 2021 Totals: 48 Visits completed, 6 visits declined
  - HF visits done from January- May were done in clinic at Kiro Wellness Centre From June- December, HF visit were done either in clinic or home visits
  - No HF visits took place in January due to Public Health capacity and increased covid cases in the community
3. Community Outreach
  - Building Beautiful Babies started back up in December and I was able to attend one day before Christmas break as a guest speaker. BBB babies did not run for the month of January and is restarting Feb 3. I am planning to attend Feb 10 and will attend one session per month as long as I have the capacity to do so.
  - Started Daycare Outreach at the end of 2021, with a handwashing education session. I did handwashing education session with Wendy in January at Sunshine Daycare and Erynn and Wendy did another session Feb 2 at Warfield Preschool.

# Home & Garden Report



February 7, 2022

1. Soil Management Program:
  - a. Reporting
    - i. Ministry of Environment & Climate Change – working on the 2021 Annual report and 2022 Workplan due at the end of March.
  - b. Planning
    - i. 45 properties are currently being offered soil management in 2022 (i.e., soil replacement or ground cover improvement).
    - ii. Developing an action plan for tough access properties
  - c. Training
    - i. SNC Lavalin – in-house annual field refresher training
2. Healthy Family Healthy Homes:
  - a. Healthy Home visits
    - i. 4 visits completed to date
  - b. Enhance Support (ES)
    - i. Residential Lead Inspections (RLI) – preliminary results have been reviewed with the 5 participants. Next steps: repeat dust sampling in summer (July – August), final reporting to participants (September).
  - c. Training: USA Healthy Homes Virtual Conference begins Feb 14<sup>th</sup>
3. Community Program Office:
  - a. Lead Safe Renovation: 6 requests
  - b. Public contact – enquiries are already starting regarding the Soil Management Program (e.g., 4 soil consents)
4. Outreach and Engagement:
  - a. Daycares – 2 outreach and handwashing events completed
  - b. Trail Market – planning is underway for 2022 season (i.e., May and September).
5. Other
  - a. Home & Garden Handbook – (in development) describes the program components. Intended audience: reference for H&G staff, training new hires.
    - i. Documentation - reviewing policies, work guides, and contractor specifications, etc.

# Program Planning Updates



2021 Highlights & 2022 Planning

# Highlights 2021

- Air Quality – lowest lead levels in community air, SO2 communications online
- Soil Management Program – produce study, soil testing uptake high, support to RDKB with soil disposal, improved communications with homeowners
- Healthy Families Healthy Homes – monitoring study, outreach to daycares, Area 1 inclusion
- Lead Safe Renovation – materials for community back in stock, forms all online
- Outreach – engaging with Chamber of commerce, lead based industries in Trail, and realtors.

Program Area	2022 Activities
Air Quality	<p>Smelter emissions reductions: Continue SO<sub>2</sub> and fugitive emissions initiatives, monitoring and reporting</p> <p>Communications materials: Phase 2 SO<sub>2</sub> communications, newsletter, presenting</p> <p>Air Quality Working Group: 4 meetings / year; ambient Pb comparisons</p> <p>Community Dust Control: City-led community dust control ongoing</p>
Family Health	<p>Blood lead clinics: Winter / Fall clinics including prep/communications and delivery</p> <p>Family Health Education: Research and communications on anemia, diet, primary prevention</p> <p>Healthy Families Healthy Homes: Resume in-person visits; review and embed lessons from best practice established elsewhere</p> <p>Enhanced HFHH Support: Follow up visits; Conference planning /delivery; Residential Lead Inspection pilot continuing</p>
Home & Garden	<p>Soil Management: 2021 report and 2022 work plan to ENV; continue soil assessments and prioritized remediation; improve communications regarding hard to reach properties, evaluate challenges with property access and soil disposal</p> <p>Lead Safe Renovation: Continue to provide supplies; consider additional Pb paint supports</p>
Parks	<p>Continue ground cover evaluations; support ground cover improvements; consider handwashing signage at playgrounds</p>
Property Development	<p>Consider communications for property development</p>
Connecting & Integrating	<p>Regular partner liaising, knowledge sharing relationships local and beyond, outreach into the community and beyond, communications plan update, program team reflection and learning, THEP knowledge base online</p>

# Homeowner Feedback Form – Results Summary 2021



## Soil Remediation of Residential Yards in Trail

The Trail Area Health & Environment Program (THEP) undertook a survey of residents who participated in the residential yard remediation program. The survey was online through Survey Monkey and open from October 27 to November 9, 2021. The survey was emailed to 78 program participants and 51 people responded. 22% of respondents lived in East Trail, 16% lived in Glenmerry, 2% lived in Gulch, 4% lived in Oasis, 6% lived in Sunningdale, 12% lived in Tadanac, 4% lived in Waneta, 20% lived in West Trail, and small minority lived in other neighbourhoods. All but two respondents were homeowners.

The vast majority of respondents were satisfied with the yard remediation program. 90% of respondents said they were either very satisfied or satisfied while 6 % said they were neutral and 4% said they were dissatisfied.

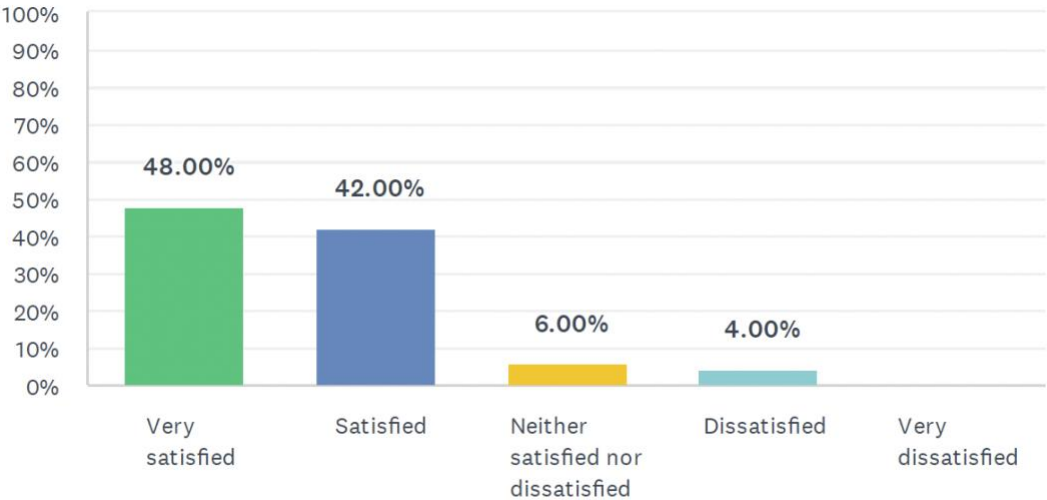


Figure 1: Respondents answers to “When telling friends and family about your experience with yard remediation, how would you rate your overall experience?”

Respondents were generally very positive about the soil remediation program. 98% of respondents said they were satisfied with the work plan they developed for their yards, 98% said they would recommend the program to friends and family, 94% thought the finished yard product was the same or better than before, 94% said that the Home & Garden team communicated well and in a timely manner, 88% said they were provided with information about health and safety considerations prior to work, 94% said that the team responded to questions in a reasonable timeframe, 90% said that their questions about the new yard and maintenance were addressed, and 76% had enough time to prepare for the remediation work. A few respondents left comments about being happy about the work, while one left a comment



about work being incomplete. One respondent was disappointed with having the work done over the summer but was happy with the team who did the work.

Most respondents were generally satisfied with the remediation contractor who worked on their yard. 57% of respondents worked with Alpine Contracting, 29% worked with Simms Excavating, and 14% didn't know which company worked on their yard. 94% of respondents said the contractors completed the work safely, 84% said the contractors contained soil and dust as it moved in and out of the yard, 78% of respondents said the contractors communicated well and in a timely manner, 86% said the contractors worked efficiently, 59% said the contractors helped prepare the yard for remediation, and 76% said the contractors provided valuable advice during planning and work. Several respondents noted that they were very happy with how efficient and professional the contractors were. A few respondents noted that the contractor made them feel rushed. Several respondents noted that communication about the start date of the work was lacking.

Results were mixed regarding satisfaction with the irrigation contractor. 35% of respondents had their sprinklers replaced. 61% of respondents thought the irrigation contractor communicated well, compared to 22% of respondents who did not think the irrigation contractor communicated well. 78% of respondents had enough time to prepare for the work. 50% of respondents thought the contractor responded in a reasonable timeframe, whereas 28% did not think the contractor responded in a reasonable timeframe. 56% of respondents were informed about sprinkler maintenance, while 33% were not. A few respondents noted that they were happy with the work, however several respondents noted that communication with the contractor was difficult.

63% of respondents participated in the Healthy Families Healthy Homes program.

This survey was also administered by THEP in 2019 and 2020. The results are quite similar, with only marginal differences between years. Like in past years, survey respondents are generally positive about the program. The biggest difference among years appears to be regarding having enough time to prepare for the remediation work – in 2019, 82% of respondents said they had enough time; in 2020, 92% of respondents said they had enough time, and in 2021, 76% of respondents said they had enough time. Another large change among years is regarding preparing the yard for remediation – in 2019, 84% of respondents said the contractors helped prepare the yard for remediation; in 2020, 86% of respondents said the contractors helped prepare the yard for remediation; and in 2021, 59% of respondents said the contractors helped prepare the yard for remediation.

A summary of the feedback results follows with comments removed to protect anonymity and maintain privacy. If you have questions, please contact the THEP community office: [programs@thep.ca](mailto:programs@thep.ca).

# Lawn Care Survey – Results Summary 2021



## Soil Remediation of Residential Yards in Trail

The Trail Area Health & Environment Program (THEP) undertook a survey of residents who participated in the residential yard remediation program and went through the lawn care option. The survey was online through Survey Monkey and open from October 27 to November 9, 2021. The survey was emailed to 52 program participants and 30 people responded. 13% of respondents lived in East Trail, 17% lived in Glenmerry, 17% lived in Sunningdale, 17% lived in Tadanac, 17% lived in Warfield, and 20% lived in West Trail. All but three respondents were homeowners.

The vast majority of respondents were satisfied with lawn care. 80% of respondents said they were either very satisfied or satisfied while 7% said they were neutral and 13% said they were dissatisfied.

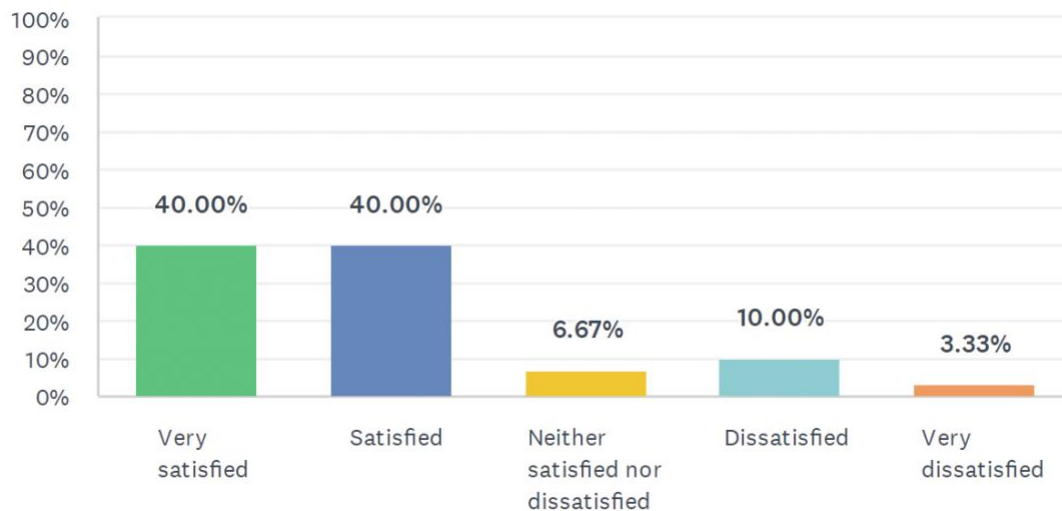


Figure 1: Respondents answers to "When telling friends and family about your experience with lawn care, how would you rate your overall experience?"

Respondents were generally positive about lawn care. 100% said they would recommend the program to friends and family, 77% said that the Home & Garden team communicated well and in a timely manner, 87% said that the team responded to questions in a reasonable timeframe, and 83% said that their questions about maintenance were addressed. One respondent noted that the program should start earlier in the year.

Most respondents were generally satisfied with the lawn care contractor who worked on their yard. 67% of respondents said the contractors communicated well and in a timely manner, 83% said the contractors worked efficiently, and 57% said the contractors provided valuable advice

during the work and for maintenance. One respondent noted that the contractor was timely and gave good notice, and another noted that they did a good job. A few respondents noted that they didn't communicate with the contractor directly. Several respondents noted that a clear timeline for remediation is needed in the future.

83% of respondents participated in the Healthy Families Healthy Homes program.

A summary of the feedback results follows with comments removed to protect anonymity and maintain privacy. If you have questions, please contact the THEP community office: [programs@thep.ca](mailto:programs@thep.ca).