



Metro Vancouver 2020 Regional Industrial Lands Inventory: Technical Report

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Executive Summary

The Metro Vancouver 2020 Regional Industrial Lands Inventory ('Inventory') provides a comprehensive summary of the quantity and quality of industrial and associated lands in the Metro Vancouver region as of mid-2020. It provides information about the amount of land that is developed for industrial and other uses, and identifies lands that are vacant by type of activity and other attributes.

The objective for the 2020 Inventory is to systematically categorize industrial lands in the Metro Vancouver region using a consistent and clear set of rules. This work continues the ongoing monitoring of the region's industrial land base and supports implementation of the regional growth strategy and the Regional Industrial Lands Strategy, and associated objectives to protect and intensify industrial lands, and provide data for further analysis of industrial lands matters.

As context, Metro Vancouver is a high growth region and industrial lands are critical to trade and transportation functions that serve Canada and also serve as important locations for industry and other activities supporting a prosperous and growing regional economy. Industrial lands in the Metro Vancouver region comprise only 4% of the land base, but accommodate about 27% of the region's jobs and 30% of GDP. If accounting for direct, indirect, and induced impacts, the region's industrial lands support over 40% of the region's jobs, which have average wages that are over 10% higher than the regional average. Furthermore, business and employment activities on industrial lands contribute approximately \$9 billion in tax revenues to various levels of governments.¹

Building on past Inventories completed for 2005, 2010, and 2015, the 2020 Regional Industrial Lands Inventory quantifies the Metro Vancouver region's lands as follows, noting that the qualitative attributes (e.g. location, access, size) of the lands are as important in terms of functionality. (Note: Current land use classifications are different and independent of future-oriented land use designations.)

Inventory of Lands as of 2020

- In mid-2020 there were 11,502 hectares (28,422 acres) of lands within the Inventory study universe, as defined².
- 82% (9,387 ha) of lands were 'Developed' and 18% (2,115 ha) were 'Other / Vacant', as defined.
- Despite industrial lands being earmarked in municipal plans / policies for 'industrial use', the notion of 'Developed' does not imply all are (fully) developed and used for 'industrial purposes'. 'Other / Vacant' includes lands that have non-industrial uses. These uses impact the industrial capacity of the lands.
- Most of the lands in the Inventory are located in the southern and eastern parts of the region: 22% in Surrey, 15% in Richmond, and 14% in Delta / Tsawwassen First Nation.
- 40% of lands were classified as 'Building Intensive Industrial' use, with a range of industrial uses, along with associated accessory uses.

¹ Source: Metro Vancouver Industrial Lands: Economic Impact and Future Importance, InterVISTAS, 2019.

² The scope of lands included in the Inventory are all lands that are municipally designated (Official Community Plans, sub-area / neighbourhood plans, or equivalent) industrial, plus lands that are both zoned (or equivalent) industrial and used for industry, as of the date of the Inventory.

- 25% of the lands were used for 'Large Scale Infrastructure / Transportation' (utilities, port, airport, rail yards), which are not tracked by the market. The Inventory also included lands with non-industrial uses such as 'Retail' (4%) and 'Commercial' (4%).
- Of the 'Other / Vacant' lands in the Inventory, 3% were used for 'Resource Extraction', 2% for 'Residential', 1% for 'Agriculture', and 11% were undeveloped or fully vacant. These lands will serve as the future supply of industrial development.
- In terms of site sizes, 24% of 'Other / Vacant' lands were on sites larger than 20 ha (50 ac), which are often associated with trade-oriented uses, although some sites may not be well-located for trade-oriented uses. The available site size impacts the types of industrial users that can be accommodated.
- Long-term protection in the form of regional and/or municipal policy for industrial lands varies, with 89% of the Inventory regionally designated as either 'Industrial' (67%) or 'Mixed Employment' (22%). At the municipal level, 82% were both zoned industrial and designated industrial. Of the 'Developed' lands, most (85-95% depending on the land use) were protected with both municipal industrial designation and industrial zoning. Some 3% (390 ha) of the Inventory had municipal industrial zoning but not municipal industrial designation, thus are at greater risk for conversion into non-industrial use in the coming years.

Change in Inventory Universe Size Between 2015 and 2020

- In terms of inclusion (additions) or exclusion (removals) from the Inventory universe (which is separate from 'vacant' or 'developed' land use status) between 2015 (revised)³ and 2020: 323 ha (798 ac) of land were added, and 70 ha (174 ac) were removed. These two sets of changes resulted in a net increase of 252 ha (624 ac) of land over the five-year period.
- Most of the Inventory additions occurred in: Maple Ridge, Delta, and Port Coquitlam. Notable removals from the Inventory occurred in: Still Creek in Burnaby, Queensborough in New Westminster, Campbell Heights in Surrey, and Willoughby in Langley.

Industrial Lands Absorption Between 2015 and 2020

- In terms of absorption (vacant lands becoming developed, or vice versa) over the 2015 to 2020 period, 507 ha (1,253 ac) went from 'Other / Vacant' to 'Developed' status, while 23 ha (58 ac) of lands went from 'Developed' to 'Other / Vacant' status. This yielded a net absorption of 484 ha (1,196 ac) of lands over the five-year period, for an annual average of 97 ha (239 ac).
- The amount of 'Other / Vacant' lands decreased by 531 ha (1,311 ac) during the 2015-2020 period: 507 ha (96%) became 'Developed' via absorption, while 23 ha (4%) were entirely removed from the Inventory (due to municipal designation changes or land use changes).

Key Findings Profiled in the Report

Inventory methodology limitations are important considerations - The land use classification definitions reference the predominant or primary use of the site, including normally associated on-site accessory / ancillary uses. The classification process cannot be perfectly accurate, given the variety of different data sources and currency.

Qualitative attributes of lands matter - The Inventory comprises lands used and intended for industrial. The Inventory includes traditional and new types of industrial activities, quasi-industrial

³ The revised 2015 Inventory numbers referred to in this report reflect adjustments to noted inconsistencies, and are thus more comparable with the 2020 Inventory results.

functions, and non-industrial uses on the lands, which have different user needs. The quality of lands, such as attributes like size, location, and site features, are as important as quantity of lands.

Increasing amounts of industrial lands are used for non-industrial purposes - Conversion of industrial lands can occur in different ways. Some industrial lands are re-designated and removed from the Inventory as per municipal plans, while other lands with flexible industrial designations are rezoned to allow for non-industrial uses. Some of these other types of uses support industrial activities, while others may threaten industrial areas, such as commercial and retail beyond those accessory or supporting industrial uses.

Continued competing priorities for limited lands - The Metro Vancouver regional growth strategy and Regional Industrial Lands Strategy include industrial and other long range regional planning goals. Because of these multiple objectives, at both the regional and local levels, there are in some cases competing or even conflicting policy priorities.

Most but not all industrial lands are secured for long-term protection - Municipal policies (land use designations and zoning) and regional land use designations secure the long-term industrial use of industrial lands. Lands that do not have such policy protection are more likely to convert and redevelop to other uses, particularly lands located in Urban Centres.

Lands added to and removed from the Inventory have different locational and site attributes - During the 2015-2020 period, 323 ha of land were added to the Inventory, mostly in Surrey, Langley, and Maple Ridge, and 70 ha were removed from throughout the region. Lands were removed from the Inventory due to a number of reasons, but mostly due to municipal policy changes. Much of the lands added to the Inventory were in locations not well served relative to the region's major transportation infrastructure networks / goods movement corridors nor have other key attributes desired by the market, whereas some of the lands removed had good accessibility.

Few available large sites for 'trade-oriented' logistics uses - There are few vacant sites available for 'trade-oriented' logistics users, namely large sites with minimal constraints and close to major transportation infrastructure.

More industrial land intensification is expected over time - Most of the developed lands are substantially used, with limited immediate opportunity for redevelopment and intensification. Nevertheless, as these lands redevelop, there will be potential to densify and intensify.

The industrial land absorption rate declined due to limited raw land supply - The net land absorption (lands changing from 'Other / Vacant' to 'Developed' status) was 484 ha over the 2015-2020 period, or 97 ha per year on average. Although recorded development / absorption activity is a reflection of industrial demand, it is in fact limited by the amount of land supply, so it is not a true reflection of total demand.

Difficult to estimate lifespan of available vacant lands - The amount of development will be impacted not just by demand but also increasingly by the limited supply of available vacant industrial lands that can be brought to market, as well as redevelopment and intensification activity. Using a theoretical absorption forecast model, the 'Other / Vacant' industrial land supply might be substantially absorbed in the 2030s.

Further Study Topics - The Regional Industrial Lands Inventory can be considered and analyzed through different 'lenses' or 'filters' from different perspectives. Accordingly, building on the Inventory results, further study is possible, such as: industrial intensification, market readiness, regional land use assessment, industrial typologies, and other topics related to industrial lands, employment, economy, and transportation.

1 Introduction

1.1 Overview and Intended Outcome

The Metro Vancouver 2020 Regional Industrial Lands Inventory ('Inventory') provides a comprehensive picture of the amount and type of industrial and associated lands in the region. The Inventory contains detailed information about the quantity, use, status, and attributes of the lands in Metro Vancouver as of mid-2020. The 2020 Inventory, with 30 detailed land use classifications, also allows for a comparison with the past Inventory (namely 2015, as revised) to track change over time, land development / absorption patterns, and inform possible further work.

1.2 Objectives

The purpose of the Inventory is to report the status of the quantity and quality of industrial lands in the region with an aim to improve the understanding of the different types of lands and uses, and inform decision-makers and further studies and policy work. The Inventory provides accurate and nuanced information about the amount of land that is used for industrial and other associated lands, and types of activities on the lands, as well as other attributes.

The objectives of the Inventory and this report are to:

- provide information about the region's supply of industrial lands as of mid-2020;
- illustrate changes between the 2015 (revised) and 2020 Inventories;
- inform dialogue and policies about industrial lands issues in the region;
- support further actions to advance industrial lands protection and intensification; and
- inform regional planning performance measuring and reporting.

1.3 Application

The Inventory provides detailed information about the region's industrial land supply, and allows for focused analysis on particular areas of interest (geographic, industrial sectors, type of land uses, etc.). The 2020 (and 2015 revised) Inventory methodology includes a range of land use classifications to portray the region's functional industrial land supply.

As further explained in Appendix 10, the revised 2015 Inventory numbers referred to in this report reflect adjustments to noted inconsistencies, and are thus more comparable with the 2020 Inventory results. These 2015 numbers replace the previously published numbers in the 2015 Inventory report.

The Inventory documents the type of use occurring on lands, and informs the potential to accommodate additional industrial activities. Industrial land uses can be compared between different areas of the region to assess differences and similarities, as well as areas with potential under-utilized lands or areas at risk of conversion. It can inform regional and municipal planning processes and work, as well as infrastructure investments by agencies and private sector decisions, such as supporting:

- refinement of municipal and regional industrial plans and policies;
- refinement of municipal zoning bylaws;

- preparation of area plans and employment projections;
- preparation of tools to encourage the development and intensification of industrial lands;
- the development community with information about available industrial lands; and
- appropriate economic and employment growth.

The Inventory sets the stage for -- as separate studies -- the assessment of lands based on their potential industrial development in terms of redevelopment or intensification / densification, reflecting features and criteria such as area opportunities / constraints, proximity to transportation infrastructure, and other key factors. This analysis can estimate the amount of vacant industrial lands in the region that could likely be developed over time and also which types of industrial activities could be accommodated on them. (Note: Current land use classifications are different and independent of future-oriented land use designations.)

Identifying specific lands that have the greatest potential for industrial (re)development and intensification will also inform other planning initiatives, including municipal and sub-area / neighbourhood plans, policies to advance industrial land redevelopment in specific areas, and exploration of appropriate regulations and incentives to encourage industrial investment.

Further work on the industrial lands portfolio may relate to industrial land demand, documenting the land needs of industrial users by sector or typology, considering alternative means to accommodate anticipated industrial growth in the region, efficient goods movement options, market readiness of lands, and intensification / densification potential.

1.4 Policy Context

Metro Vancouver 2040: Shaping Our Future ('Metro 2040'), the regional growth strategy, adopted in 2011 (and being reviewed and updated in 2020-2022), includes regional land use designations and policies to protect industrial lands, encourage industrial intensification, and coordinate efficient goods movement infrastructure to serve industry.

Metro 2040 provides a policy response to a number of challenges, including both the need to ensure an adequate supply of space for industry and commerce as well as the importance of protecting the natural and agricultural land base in the region. The Inventory supports the goals of *Metro 2040*, specifically providing information to protect the supply of industrial lands and encourage industrial intensification.

The *Metro 2040* regional land use designations identify regionally significant industrial lands. Industrial activities (along with some accessory uses) are mostly accommodated on lands designated 'Industrial' and 'Mixed Employment'. *Metro 2040* 'Industrial' lands, followed by 'Mixed Employment' lands, have the greatest level of importance for industry and thus level of policy protection. 'General Urban' designated lands, with various municipal designations and zoning, also accommodate industrial activities, but the level of policy protection is much less.

Metro 2040 has six regional land use designations. These designations are parcel-based and apply to the entire region. Two of these designations are for industrial related uses, described as follows:

- *Industrial areas are primarily intended for heavy and light industrial activities, and appropriate accessory uses. Limited commercial uses that support industrial activities are appropriate. Residential uses are not intended.*
- *Mixed Employment areas are intended for industrial, commercial and other employment related uses to help meet the needs of the regional economy. They are intended to continue to support industrial activities, and complement and support the planned function of Urban Centres and Frequent Transit Development Areas. Mixed Employment areas located within Urban Centres and Frequent Transit Development Areas provide locations for a range of employment activities and more intensive forms of commercial development.*

Mixed Employment areas located outside of Urban Centres and Frequent Transit Development Areas are primarily intended for industrial and commercial uses that would not normally be attracted to these locations. Mixed Employment areas located outside of Urban Centres and Frequent Transit Development Areas may contain office and retail uses provided that they are at lower densities than typically higher density Urban Centres and Frequent Transit Development Areas and in locations well served by transit or have committed expansions to transit service. Residential uses are not intended in Mixed Employment areas.

The precise types of industrial activities intended and permissible are explained in regional context statements, which are prepared by member municipalities and accepted by the Metro Vancouver Board, as well as municipal land use plans and zoning bylaws.

Metro 2040 also supports other long range regional planning goals, such as accommodating population and employment growth, focusing commercial and housing development in Urban Centres, protecting agricultural and environmental lands, and supporting sustainable transportation.

The Regional Industrial Lands Strategy, completed in 2020, establishes a vision for the future of industrial lands across Metro Vancouver to the year 2050, and provides a set of recommendations to guide a broad range of stakeholder actions to achieve that vision.

As identified in the Strategy, the four main challenges facing Metro Vancouver's industrial lands are:

1. A constrained land supply
2. Pressures on industrial lands
3. Site and adjacency issues
4. A complex jurisdictional environment

In response to these challenges, the Strategy contains 34 recommendations with 10 priority actions, organized around four 'Big Moves':

1. Protect remaining industrial lands
2. Intensify and optimize industrial lands
3. Bring the existing land supply to market & address site issues
4. Ensure a coordinated approach

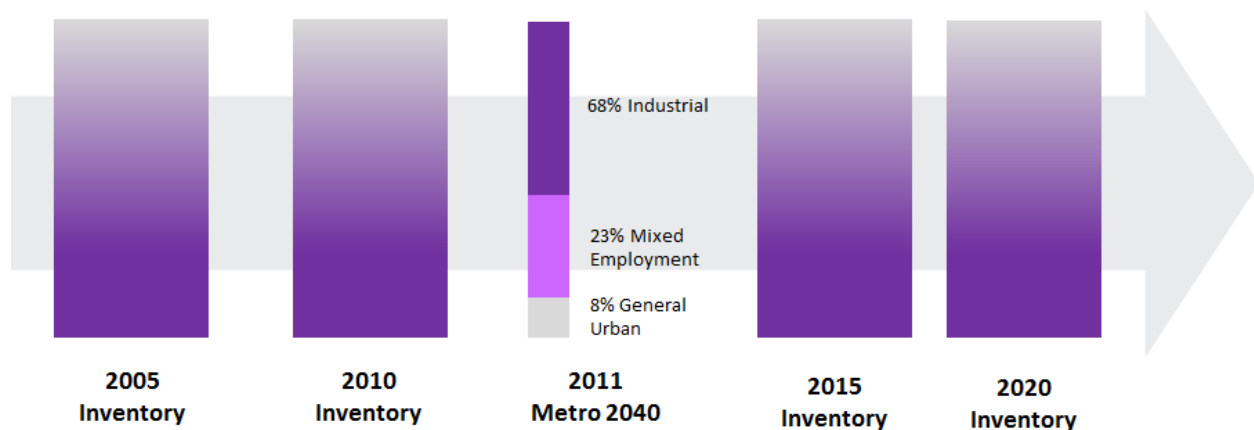
2 Industrial Lands Supply

2.1 Universe of Regional Industrial Lands Inventory

Metro Vancouver’s regional interest in industrial lands emerged in the early 2000s. At that time, concern about the ongoing conversion of industrial lands to other uses became more prevalent and the scale of conversion, coupled with concern about a dwindling supply of available industrial land, led to the creation of a regional industrial lands taskforce, comprised of municipal members, that guided the completion of the first of the Regional Industrial Lands Inventories.

The types of lands included in the series of Regional Industrial Lands Inventories were based on municipal designation and zoning. This definition of industrial lands or the universe of the Inventory has remained consistent for the Inventories, which allows for comparison over time and tracking of lands (with some limitations, because of changing interpretation of municipal policies and data availability). The Inventory can also be analyzed relative to regional land use designations, as illustrated in the below figure.

Figure 2.1: Metro Vancouver Regional Industrial Lands Inventories



Scope of inventory remains consistent; *Metro 2040* provides a new filter.

The Inventories include ‘Developed’ industrial lands, spanning various industrial uses, quasi-industrial activities, and non-industrial uses, as well as ‘Other / Vacant’ lands that are vacant of industrial uses.

The universe or scope of lands included in the Regional Industrial Lands Inventory are all lands that are municipally designated (Official Community Plans, sub-area / neighbourhood plans, or equivalent) industrial, plus lands that are both zoned (or equivalent) industrial and used for industry, as of the date of the Inventory. Specifically, the Inventory universe consists of the lands that have one or more of the attributes listed in the below table. There are also smaller-scale industrial activities occurring on other lands not included in the Inventory.

Table 2.1: Lands Included in the Regional Industrial Lands Inventory

		MUNICIPAL LAND USE DESIGNATION	
		Designated Industrial	Designated Non-Industrial
DEVELOPED INVENTORY	Zoned Industrial	✓	✓
	Zoned Non-Industrial	✓	X
VACANT INVENTORY	Zoned Industrial	✓	X
	Zoned Non-Industrial	✓	X

✓ = included in Industrial Lands Inventory X = not included in Industrial Lands Inventory

Properties that were not designated industrial, but were zoned industrial (or zoned as comprehensive development with allowable industrial uses) and developed / used as industrial, were included and classified as ‘Developed’ (see definitions in Appendix 9).

The Inventory incorporates the Port of Vancouver, Vancouver International Airport (YVR), and Metro Vancouver’s respective plan land use designations. All airport and port lands were included within their respective local host municipality. Known industrial lands on First Nation Reserves were included in the Inventory, and lands within the Tsawwassen First Nation were included.

The Inventory is generally considered at the parcel level. In some cases, it was appropriate to combine multiple legal parcels and associated data that are a functional industrial operation / business into a single ‘site’. Only in unique or exceptional circumstances are properties ‘split’ into two sites for Inventory purposes (e.g. sites having more than one designation).

More particularly, ‘Developed’ and ‘Other / Vacant’ lands are defined as follows, as of the date of the Inventory:

- **‘Developed’** lands are those with industrial and quasi-industrial uses. They also include lands with some non-industrial uses that are building intensive and not likely to redevelop to industrial uses. These uses include stand-alone retail and office, as well as media production, banquet hall / assembly, education / training, and recreation. These commercial uses are included in the Inventory because they are located on lands that are municipally designated industrial. Lands with visible outdoor storage are deemed to be ‘Developed’. Lands with construction activity are also classified as ‘Developed’.
- **‘Other / Vacant’** includes lands that are totally vacant, as well as lands that have non-industrial holding uses that are likely to (re)develop to industrial uses. Specifically, this includes lands that are municipally designated Industrial, but are used for agriculture, residential, or resource extraction.

Some lands were at different stages of the development approval or permitting process at the time of the Inventory ‘snapshot’ date. If lands are undeveloped at that time, they were classified as ‘Vacant’ or as a non-industrial use, even if there is an active development application in process,

indicating imminent development. The development may be for a specific tenant, or built on speculation for an as-yet identified tenant.

2.2 Geographic Areas

Metro Vancouver (the Metro Vancouver Regional District) has 23 member jurisdictions, although only 16 have industrial lands. There are 9 geographic sub-regions for the purposes of reporting Inventory results. The following table and map show the sub-regions and municipalities .

The Inventory data was compiled at the site level and summarized by municipalities, sub-regions, and for the region as a whole. The majority of the Inventory data in the body of the report is presented at the regional and sub-regional levels; municipal level data is in Appendices 2 - 8.

Table 2.2: Geographic Sub-Regions and Municipalities

Sub-Region:	Municipalities included:
North Shore	City of North Vancouver, District of North Vancouver, <i>District of West Vancouver, Village of Lions Bay</i>
Vancouver	City of Vancouver, <i>University of British Columbia / University Endowment Lands (within the Electoral Area)</i>
Burnaby / New Westminster	City of Burnaby, City of New Westminster
North-east Sector	City of Port Moody, City of Coquitlam, City of Port Coquitlam, <i>Village of Anmore, Village of Belcarra</i>
Richmond	City of Richmond (including Vancouver International Airport)
Delta / TFN	City of Delta, Tsawwassen First Nation
Surrey / White Rock	City of Surrey, <i>City of White Rock</i>
Langleys	City of Langley, Township of Langley
Ridge – Meadows	City of Maple Ridge, City of Pitt Meadows

The municipalities in the table noted with *italics* do not contain any industrial lands as defined in this report.

Map 2.1: Geographic Sub-Regions



2.3 Factors Affecting Industrial Lands Capacity

Industrial lands are not all equally appropriate or viable for different types of industrial users, and location and site features are important factors for industrial users. There are various constraints that can affect the development capacity of industrial lands, for example location and site features. It is important to note that the lands inventoried and amounts reported are gross areas; various types of constraints or limitations will reduce the net developable amount of land.

Some lands have site-specific constraints, or pre-existing uses that may make it difficult to (re)develop with intensive industrial uses. Additionally, environmental constraints and natural hazards may reduce the amount of land that is potentially developable for industrial uses. Other constraints include: location and accessibility, established non-industrial uses, the availability of needed infrastructure for development, ownership patterns affecting land assembly, and smaller sites that may not be adequate for certain types of industrial development.

Some types of industries are better able to be accommodated in a wider range of locations, whereas other industries must have direct and reliable access to transportation infrastructure and other features. For example, businesses involved in trade, transportation, and logistics, proximity to highways, port terminals, and rail yards are of vital importance. Accordingly, poorly-located industrial lands are not an option for these types of users; other industries have less specific needs and can be accommodated in a wider range of locations.

Also of note, some lands may have legal / tenure or use limitations, such as lands owned by the airport authority which are restricted to airport related uses or port lands restricted to port related activities, but can still accommodate some forms of industry. Further, because of site constraints or land ownership patterns, as well as location and market factors, some lands may not be developed for some time. All of these factors will affect the potential for the industrial land supply to meet demand.

3 Lands Inventory Methodology

3.1 Approach

Metro Vancouver regional planning staff developed the methodology for the 2020 Inventory, building on past Inventories (2015, 2010, 2005), which was informed through discussions with municipalities, industry, and other stakeholders. The objective for the methodology is to create a clear set of rules that can be consistently applied using available information to systematically categorize industrial lands in the Metro Vancouver region.

While parts of the 2020 Inventory classification system are designed to be comparable with past Inventories to enable the measure of change over time, changes in the interpretation of municipal policies between Inventories have limited such comparisons. The 2015 Inventory was revised to permit comparison to the 2020 Inventory; the ability to compare with the earlier 2005 and 2010 Inventories have greater limitations.

The methodology outlines the sources from which data has been compiled, the scope or universe of lands included in the Inventory, and the definitions of the land use classifications. The ownership of the land, municipal zoning, municipal designation, regional designation, and other attributes, which may impact use and utilization, were also collected. Appendix 10 includes the details of the Inventory methodology and Appendix 11 includes the data collected.

3.2 Inventory Data Sources

Available data from multiple sources was linked together with an internal GIS system to create the database. Information used in the 2020 Inventory included:

- Parcel Map BC (2020 property parcels)
- BC Assessment Authority property information (2020)
- Municipal Business Licenses (2019-2020)
- Municipal Zoning and OCP Designation GIS files
- Orthophoto image (flown in 2018)
- Google Earth orthographic image (2018-2019)
- Industrial Brokerages (industrial site information)
- Draft review and guidance from municipal planning staff, industrial brokerage firms, plus YVR and Port representatives

Metro Vancouver would like to thank participants for their input and contribution throughout this process.

3.3 Improved Methodology for 2020 Inventory

In 2005 and 2010, Metro Vancouver completed Inventories of the industrial lands in the region. For those earlier Inventories, Metro Vancouver considered only whether the land was 'Developed' or

‘Vacant’ (as defined in those publications). In actuality, industrial lands have different types of uses, levels of utilization, and (re)development potential due to various site and area factors or characteristics.

With the availability of better information and additional technical work, the 2015 and 2020 Inventories include an enhanced data collection and classification system to address limitations inherent in earlier Inventories (2005 and 2010). Building on further work, the 2020 Inventory (as well as the revised 2015 Inventory) provides enhanced information about the industrial land supply through land use classifications, which provides fine-grain detail of the different types of uses on the lands.

3.4 Land Use Classifications and Definitions

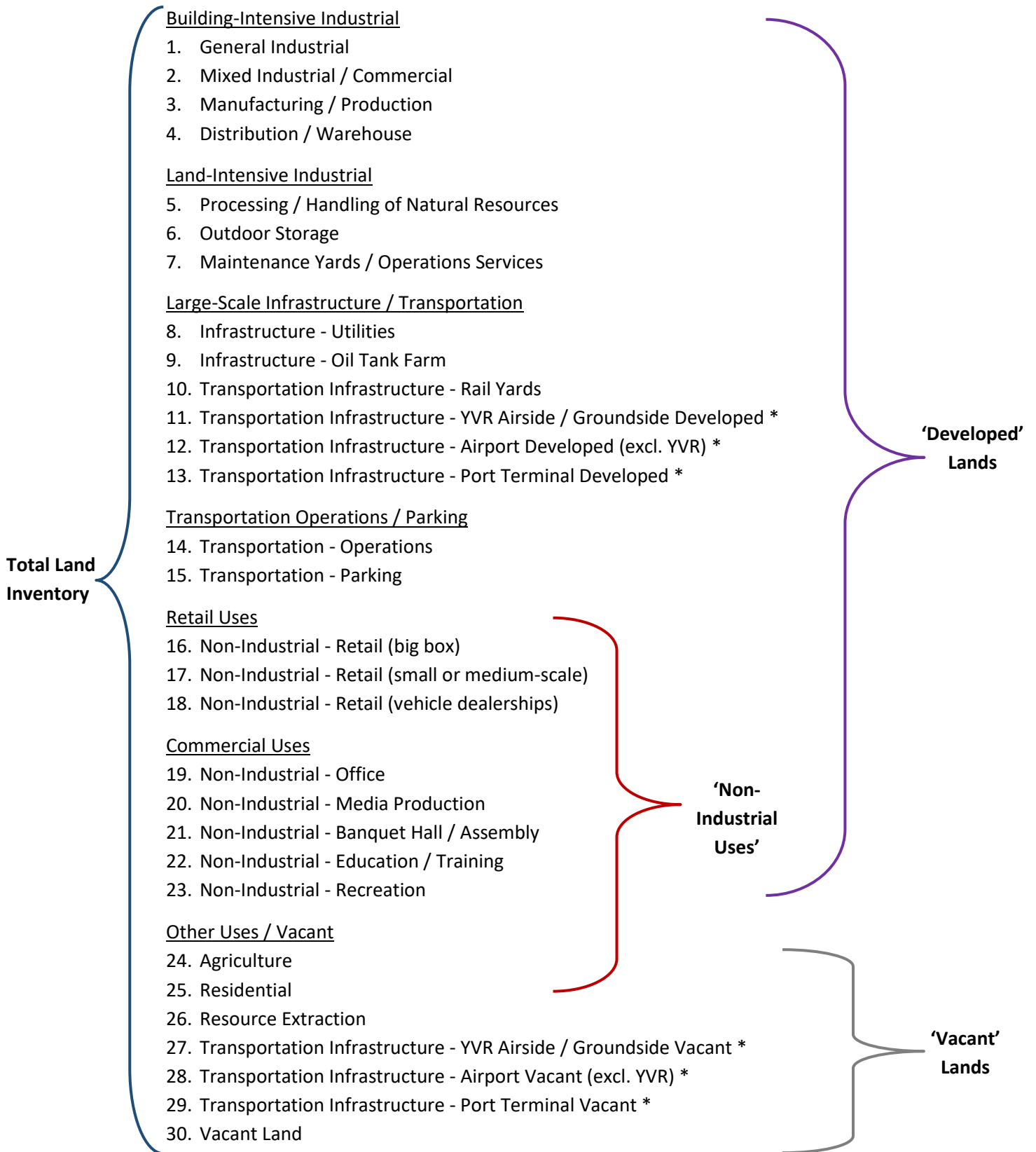
On the following page is the list of 30 land use classifications for the 2020 Inventory (full definitions are provided in Appendix 9), which provide a detailed and nuanced understanding of the industrial lands supply. For reporting purposes, these detailed land use classifications have in some cases been consolidated into 7 categories, as organized in the following figure.

The land use classification definitions reference the predominant or primary use of the site, including normally associated on-site accessory / ancillary uses (including parking and loading areas), as of mid-2020. Properties may include multiple or overlapping and non-discrete uses, in which case the predominant use is considered for the classification.

The process of classifying land uses was based on available information ranging from orthographic photos, business records, municipal permits, etc. It is acknowledged that the classification process cannot be perfectly accurate, given the variety of different data sources and currency. This limitation of selecting a single classification for each site is particularly acute in cases where there is a wider range of uses on lands or multiple level buildings. (In 2015, nearly half (47%) were within the broad category of ‘Building Intensive - General Industrial’, whereas for 2020, new land use classification categories were created, so as to reduce the amount of lands classified as ‘General Industrial’ to 40%).

* Note: These lands may have restrictions on tenure, use, and development and not available for general market industrial, but permit uses that are port or airport compatible. For more detailed information, refer to the YVR Master Plan or Port of Vancouver Land Use Plan, as applicable.

Figure 3.1: List of Detailed and Consolidated Land Use Classifications



3.5 Unique Types of Lands

There are a number of unique types of industrial and associated lands and uses in the region. These lands may have special attributes such as limitations on use, tenure, or development. For example, restrictions may apply to Vancouver International Airport and Port of Vancouver lands. Additionally, airport and port lands, as well as those on Tsawwassen First Nation and First Nation Reserves, are only available to tenants as lease tenure rather than fee simple ownership. There may also be lands used for rail yards and infrastructure / utilities that are not 'market' lands. These types of lands may not necessarily be available to develop as all forms of industrial, but still support industrial and associated economic and transportation functions.

The below text explains some unique types of lands included in the Inventory.

Airports

Airports are a unique land use, and facilitate the transport of people and goods. Airport facilities and associated operations may have some industrial components, and other semi-related uses and activities. For the airports in the region (YVR, Pitt Meadows, Delta, and Langley), the runways and airfields are not included in the Inventory, nor are the terminal buildings / lands. Airside and groundside industrial lands ('Developed' or 'Other / Vacant') are included in the Inventory. Most of the developed industrial lands are used for airport maintenance and storage hangers.

Specifically for YVR Vancouver Airport Authority on Sea Island, it is important to note that these lands are distinct in terms of ownership, use, and development potential. These airport lands are neither municipally designated nor zoned, and not intended necessarily for conventional industrial purposes. YVR's Master Land Use Plan indicates how these lands are to be used; some to support the transportation gateway function, some to generate non-aeronautical revenue, and some for industrial type purposes associated with airport activities. Aeronautical restrictions may render some of the land inappropriate for development with restrictions to some degree.

Ports

Ports are a unique, water-dependent use that facilitate the import and export of goods by ship through different types of terminals, as well as people by way of cruise ship terminals. Port lands include a variety of different types of industrial and quasi-industrial uses and marine related activities, as well as lands owned by the port and leased to tenants with port-associated activities. The Port of Vancouver Land Use Plan indicates how these lands are to be used.

For the various port facilities fronting the ocean and river, the port terminal and docks are included in the Inventory as 'Transportation Infrastructure – Port Terminal', either 'Developed' or 'Vacant'. Surrounding non-port lands are classified according to their predominate use. Water lots do not have any land use classification and are not included in the Inventory.

3.6 Methodology Notes

It is also important to note the following when reviewing the Inventory results:

- All references to land areas are gross calculations – net developable areas are less;
- All references to land areas are in hectares (ha), unless otherwise noted;
- All references to land areas are as of the middle of the noted year;
- Classifications reflect actual use of the lands, as of mid-2020, not necessarily the zoning, designation, nor potential use of the lands;
- Current land use classifications are independent of future-oriented land use designations;
- The revised 2015 Inventory numbers in this report replace the previously published numbers in the 2015 Inventory report;
- Classification definitions reference the primary or predominant use of the site, including normally associated on-site accessory / ancillary uses, such as parking and loading areas;
- Properties may include multiple or overlapping and non-discrete uses, in which case the predominant use is considered for the classification;
- Although some lands do not have large buildings, they are still substantially utilized with outdoor activities;
- A 'site' may represent multiple separate legal properties consolidated for the purposes of the Inventory analysis;
- Only in unique circumstances are properties 'split' into two sites for Inventory purposes;
- Unassociated abutting properties could be consolidated to create larger developable sites to potentially accommodate larger industrial users; and
- Not all lands in the Inventory are viable for all types of industrial uses.

3.7 Report Limitations

During the course of preparing the Inventory, a number of limitations were identified and addressed as best as possible. These included: imperfect data; varying interpretations coupled with a desire to maintain consistency; multiple uses on a single site; 'shades of gray' between different types or levels of uses; type of use not always clear; and municipal plans that include 'mixed employment' designations / zoning that allow for a range of uses, both industrial and non-industrial. Also, data sources are from different periods, and accuracy cannot be confirmed in all cases.

This Inventory and report should not be relied upon to make site specific planning or development decisions or investments.

4 Regional Industrial Lands Inventory Results

The Metro Vancouver 2020 Regional Industrial Lands Inventory data was analyzed in several ways: by geography (regional, sub-regional, municipal), land use classification (detailed, consolidated), regulatory overlay (regional designation, municipal designation, municipal zoning), ownership (private, public, other), tenure (strata, fee simple), and site size. Further reporting about the development potential of the lands in the Inventory, such as proximity to transportation infrastructure and other features, and site physical constraints, may be explored in future studies.

This section begins by describing the Inventory at regional and sub-regional levels, with figures, tables, and maps. Detailed maps at the sub-regional level are in Appendix 1. Detailed tables at the sub-regional and municipal level are in Appendices 2-8. All land areas, unless otherwise stated, are in hectares (HA) and gross areas.

4.1 Industrial Lands Inventory

The Inventory (as defined further in this report) consists of 11,502 hectares (28,422 acres) of land.

4.1.1 Sub-Regions

The below figure and table show the amount and distribution of the Inventory lands among the nine sub-regions. The majority of the lands are located in the South of Fraser municipalities. Specifically, the largest areas and markets were:

- 2,534 ha in Surrey (22% of the Inventory)
- 1,741 ha in Richmond (15% of the Inventory)
- 1,655 ha in Delta / Tsawwassen First Nation (14% of the Inventory)

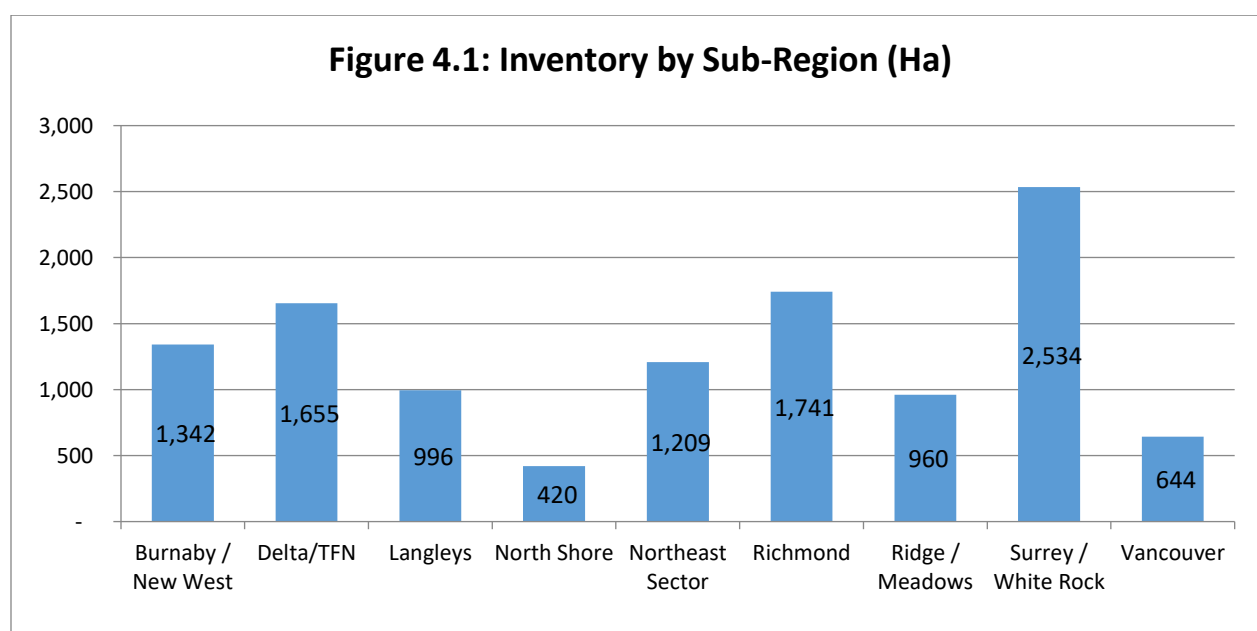


Table 4.1: Inventory by Sub-Region and Municipality

Sub-Region / Municipality	# of Land Area		Avg Parcel Size - HA	% of Total Lands
	Parcels	HA		
Burnaby/New West	1,317	1,342	1.0	12%
Burnaby	1,164	1,144	1.0	10%
New West	153	198	1.3	2%
Delta/TFN	720	1,655	2.3	14%
Delta	701	1,527	2.2	13%
TFN	19	128	6.7	1%
Langleys	809	996	1.2	9%
Langley City	133	85	0.6	1%
Langley Twp	676	912	1.3	8%
North Shore	444	420	0.9	4%
North Van City	129	136	1.1	1%
North Van Dist	315	284	0.9	2%
Northeast Sector	582	1,209	2.1	11%
Coquitlam	256	326	1.3	3%
Port Coquitlam	249	439	1.8	4%
Port Moody	77	444	5.8	4%
Richmond	1,118	1,741	1.6	15%
Richmond	1,118	1,741	1.6	15%
Ridge/Meadows	306	960	3.1	8%
Maple Ridge	275	735	2.7	6%
Pitt Meadows	31	226	7.3	2%
Surrey/White Rock	1,823	2,534	1.4	22%
Surrey	1,823	2,534	1.4	22%
Vancouver	1,450	644	0.4	6%
Vancouver	1,450	644	0.4	6%
Total	8,569	11,502	1.3	100%

4.1.2 Developed and Vacant Inventory

The 11,502 hectares of land in the Inventory have been categorized using 30 detailed land use classifications, which can be consolidated into seven groups, and further reported as two main categories, as was done in past Inventories:

- **‘Developed’** (23 categories) – 9,387 ha (82% of the Inventory)
- **‘Other / Vacant’** (7 categories) – 2,115 ha (18% of the Inventory)

By sub-region, the following table shows the distribution of ‘Developed’ and ‘Other / Vacant’ lands. The proportion of lands by sub-region varies greatly, with few ‘Other / Vacant’ lands in Vancouver and the North Shore, and more ‘Other / Vacant’ lands in the southern and eastern parts of the region.

Of all the ‘Other / Vacant’ lands in the region, 29% were in Surrey and 28% in Ridge-Meadows, however much of the latter lands were located far away from transportation infrastructure. See below figure and table for greater detail.

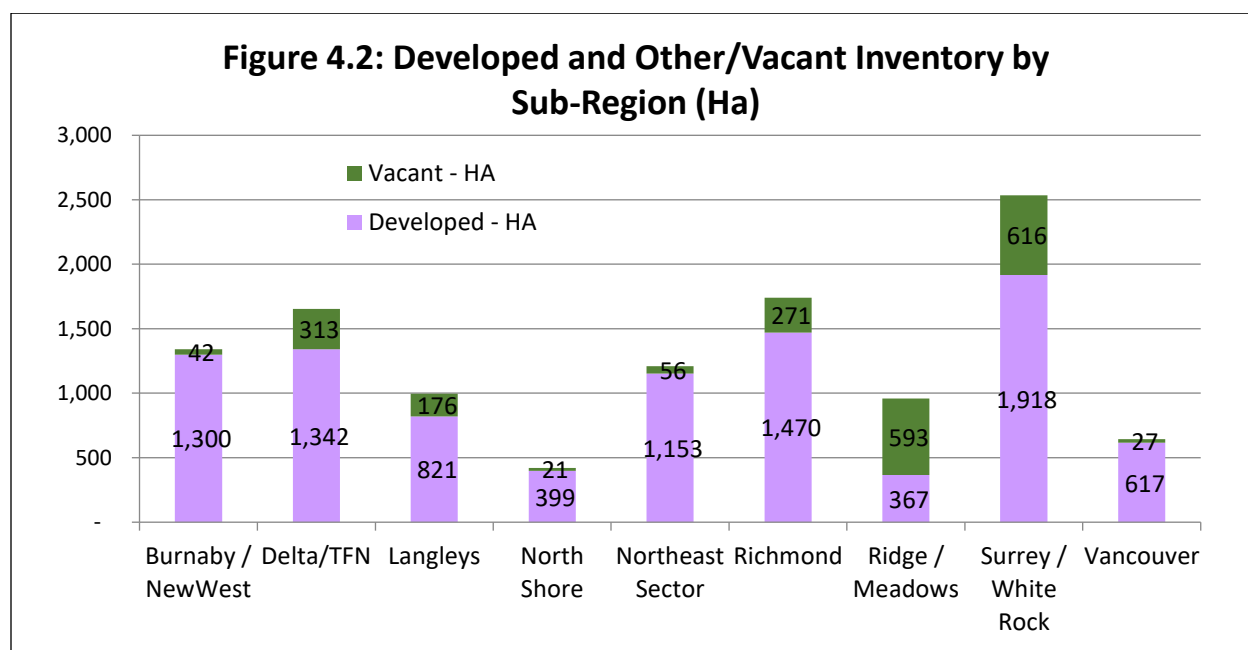


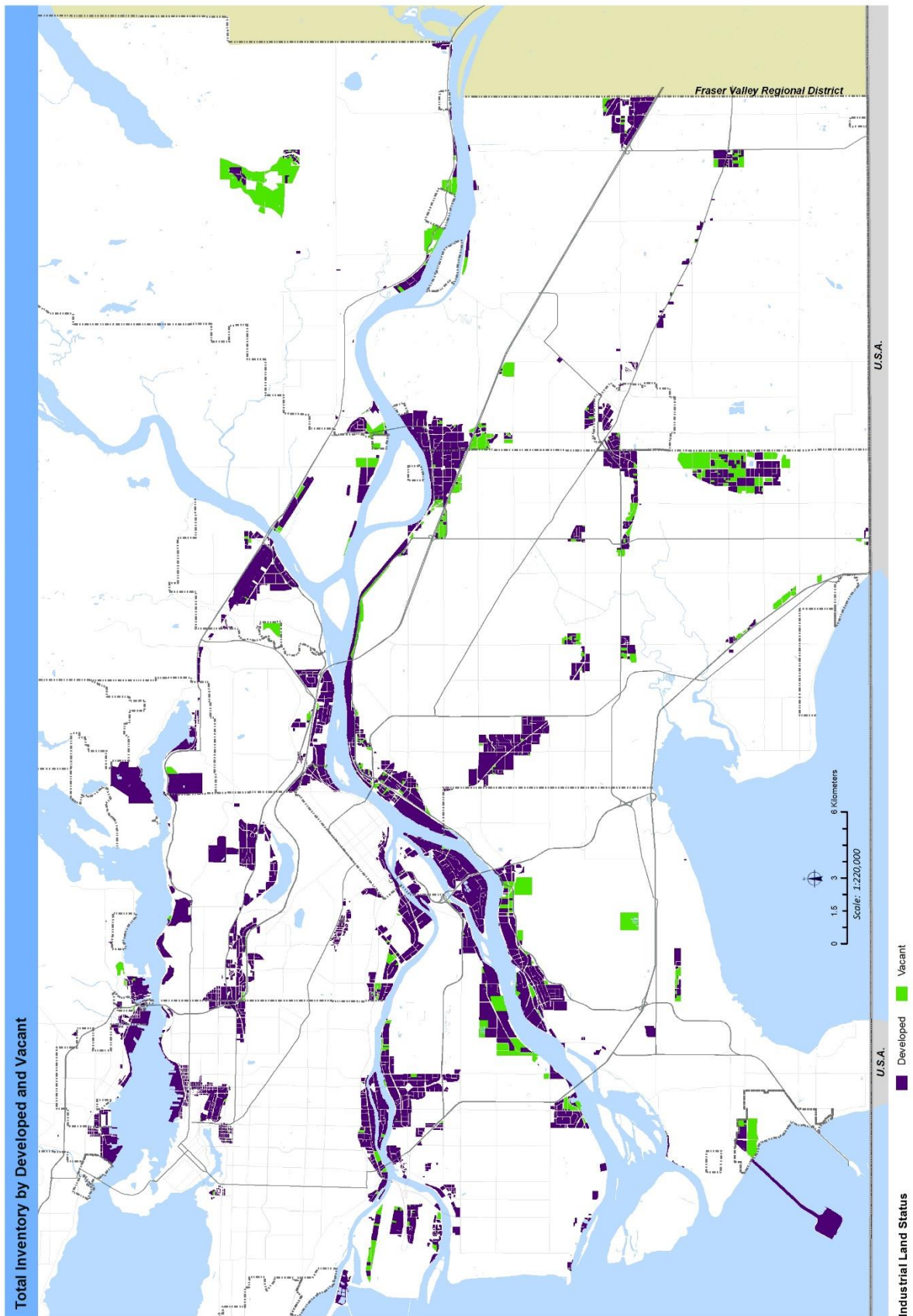
Table 4.2: Percentage Share of Other/Vacant Lands by Sub-Region

Sub-Regions	Developed - HA	Vacant - HA	Total Area - HA	% of Sub-Region's Lands Vacant	% Share of Region's Vacant Lands
Burnaby / NewWest	1,300	42	1,342	3%	2%
Delta/TFN	1,342	313	1,655	19%	15%
Langleys	821	176	996	18%	8%
North Shore	399	21	420	5%	1%
Northeast Sector	1,153	56	1,209	5%	3%
Richmond	1,470	271	1,741	16%	13%
Ridge / Meadows	367	593	960	62%	28%
Surrey / White Rock	1,918	616	2,534	24%	29%
Vancouver	617	27	644	4%	1%
Total	9,387	2,115	11,502	18%	100%

The following map shows the 'Developed' and 'Other / Vacant' lands in the region. Significant parts of the Inventory are located along the Fraser River, including Tilbury and Annacis Island in Delta, South Westminster in Surrey, south Coquitlam, as well as lands in Port Coquitlam and Port Kells in Surrey / Langley. Other notable areas are on the north and south sides of the Fraser River in Richmond and Vancouver, the North Shore, and Port Moody. Also, there are many industrial sites located throughout Burnaby, Surrey, and Langley.

The largest areas of 'Other / Vacant' lands can be found in south-east Surrey (Campbell Heights), north-east Maple Ridge, and on the Tsawwassen First Nation lands (by Roberts Bank Terminal), as well as some large sites in Delta.

Map 4.1: Inventory by Developed and Vacant Status



4.1.3 Land Use Classifications

Inventory lands are classified into 7 land use categories as shown in the following figure and table by sub-region. The largest category was ‘Building Intensive - General Industrial’ (40% of total), followed by ‘Large Scale Infrastructure / Transportation’ (25%). Other types of land uses, some of which are non-market industrial uses, make up smaller parts of the Inventory. Approximately 8% of the Inventory lands were used for ‘Retail’ and ‘Commercial’ (4% each) occurring on lands designated industrial, which puts further pressure on the limited industrial land base. The lands that were ‘Other / Vacant’ represent 18% of the Inventory.

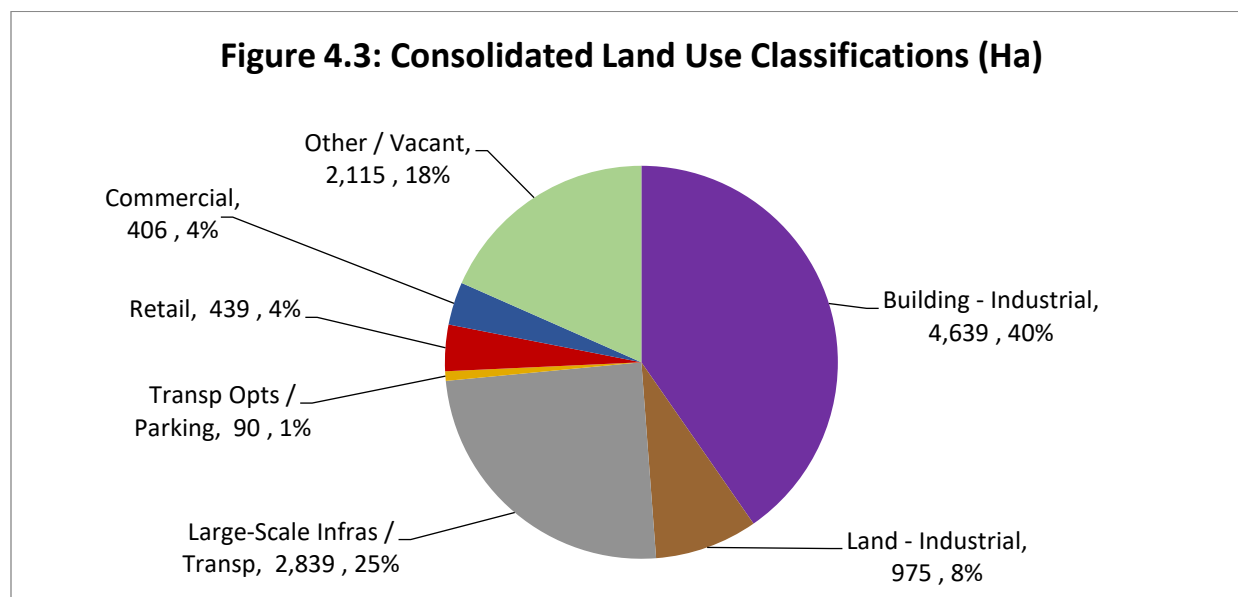
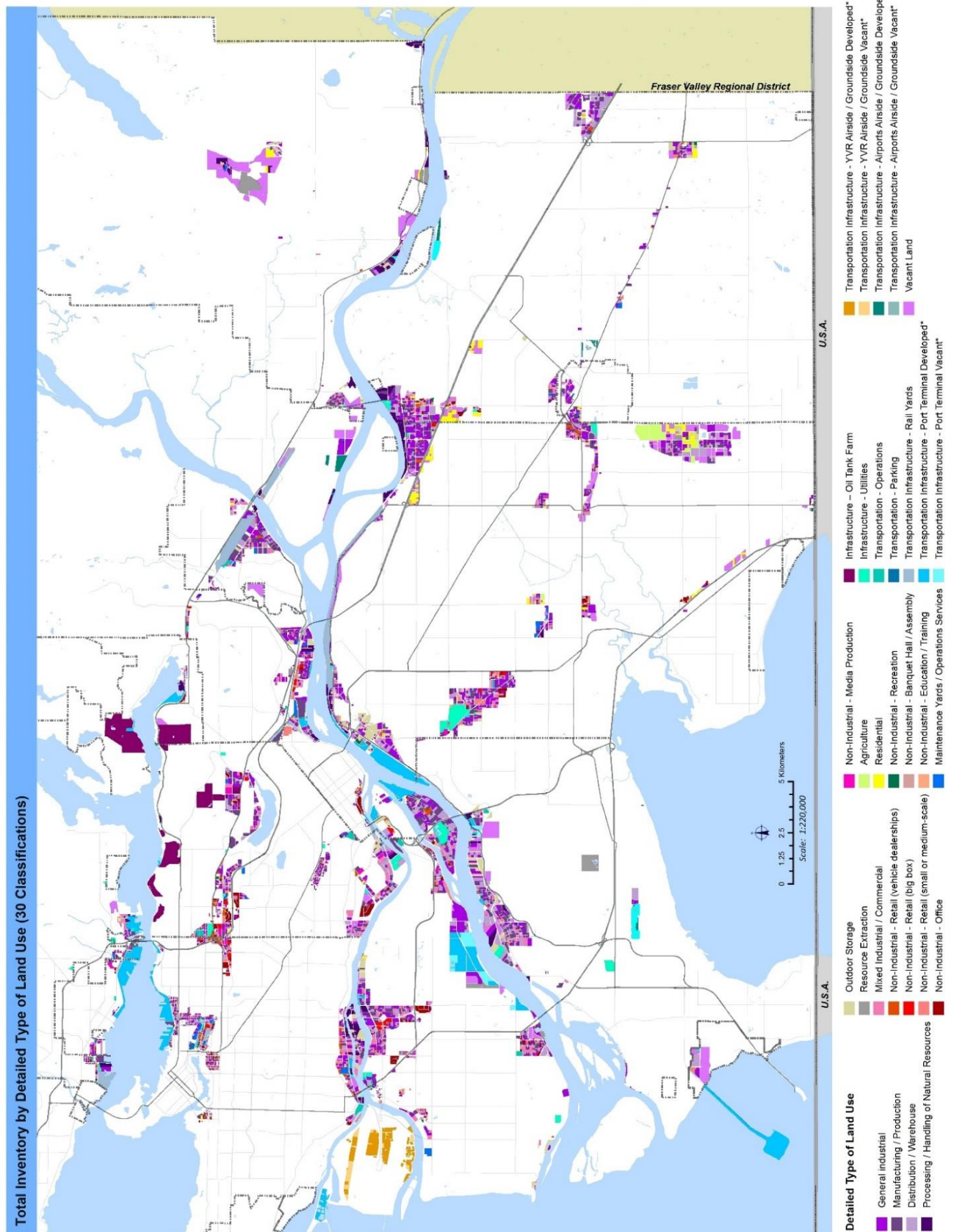


Table 4.3: Inventory by Consolidated Land Use Classifications

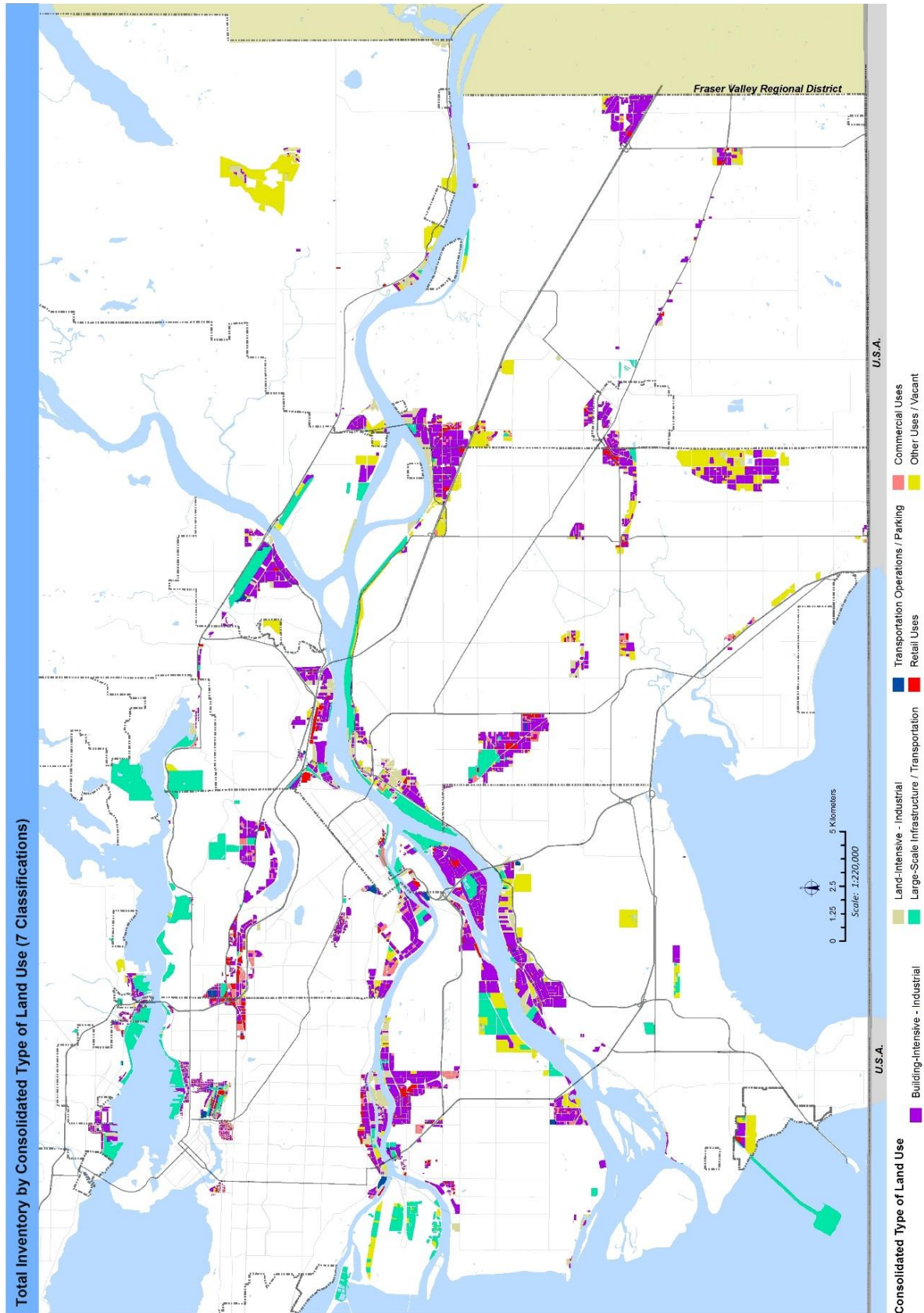
Land Use Category	# of Parcels	Area - HA	Avg Parcel	% of Total Lands
Building - Industrial	5122	4,639	0.9	40%
Land - Industrial	648	975	1.5	8%
Large-Scale Infrass / Transp	429	2,839	6.6	25%
Transp Opts / Parking	63	90	1.4	1%
Retail	629	439	0.7	4%
Commercial	583	406	0.7	4%
Other / Vacant	1095	2,115	1.9	18%
Total	8569	11,502	1.3	100%

The following two maps show the detailed and consolidated land use classifications for the region, respectively. The largest category is ‘General Industrial’, shown as a shade of dark purple on the map.

Map 4.2: Inventory by Detailed Type of Land Use (30 Classifications)



Map 4.3: Inventory by Consolidated Type of Land Use (7 Classifications)



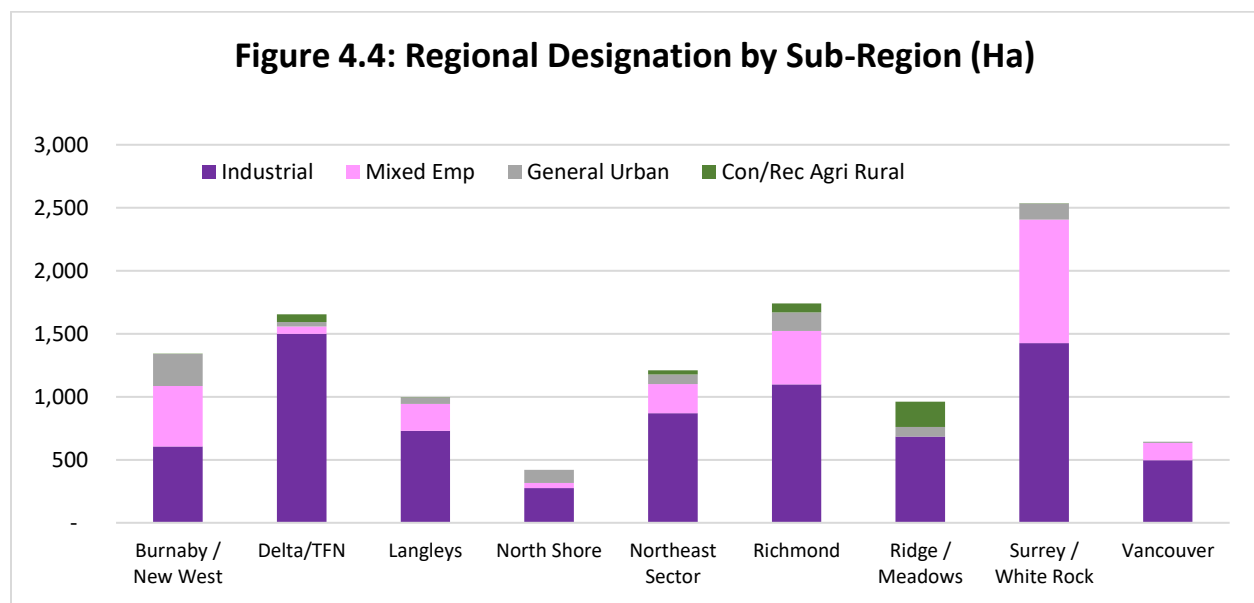
4.1.4 Policy Protection and Future Intent for Industrial Lands

Properties have different land use designations and zoning due to a variety of reasons, some reflecting historical uses and others reflecting forward-looking policy intent. In some cases, municipalities may have policies in place to protect long-term industrial uses, whereas in other situations the plan may be to allow for change. Accordingly, industrial lands have a range of policy ‘protections’ (land use designations and zoning) from conversion to other uses.⁴

Industrial lands that are designated in regional (*Metro 2040*) and municipal (OCP, area plans, or equivalent) plans as industrial and also municipally zoned (or equivalent) industrial have the greatest policy ‘protection’ and are most likely to remain industrial for the long-term. Conversely, lands that are used for industry and zoned industrial, but not designated industrial, are more likely to, or are intended to, redevelop to a non-industrial use reflecting the applicable land use designation.

Regional Land Use Designations

Metro 2040, the regional growth strategy, provides for parcel-based land use designations for the region. In preparing the 2011 *Metro 2040* land use designations, most municipal industrial lands were designated either *Metro 2040* ‘Industrial’ or ‘Mixed Employment’, however there were exceptions. As shown in the following figure and table, as of 2020, 89% of lands in the Inventory were regionally designated either ‘Industrial’ (67%) or ‘Mixed Employment’ (22%).



⁴ Zoning generally reflects current land use (zoning bylaw), and designations generally reflect future land use (municipal, regional). Zoning does not typically reflect forward-looking policy intent, and designations do not reflect historic uses.

Table 4.4: Developed and Other/Vacant Lands by Regional Designation

RGS Designation	Developed	Vacant	Total	% of Total
Con Rec	119		119	1%
Rural	18	183	202	2%
Agricultural	19	31	50	0%
General Urban	756	125	880	8%
Mixed Emp	1,971	597	2,569	22%
Industrial	6,503	1,179	7,681	67%
Total	9,387	2,115	11,502	100%

Metro 2040 'Industrial' lands are intended for heavy and light industrial activities and appropriate accessory uses, while 'Mixed Employment' lands have more flexibility in terms of use and are intended for industrial, commercial, and other employment related uses to help meet the needs of the growing regional economy. As the 'Mixed Employment' designation permits a broader range of uses, industrial uses on these lands face competition from commercial-oriented uses. Similarly, industrial uses on 'General Urban' lands, which comprised 8% of the Inventory, and are intended for all land use types, will likely convert to other uses over the long-term, which will lead to displacement of existing industrial users on those lands.

Metro 2040's multiple goals and objectives result in competing policy priorities. For example, both the protection of industrial lands and the development of lands in Urban Centres and near rapid transit stations for housing and jobs are regional priorities. In cases where industrial lands are located within Urban Centres, achieving both objectives may be a challenge.

5% of the Inventory lands were located within defined Urban Centre overlays. More particularly, 25% of the Inventory lands regionally designated 'General Urban' were located in Urban Centres. Most regionally designated Industrial and Mixed Employment lands were located outside of Urban Centres, as shown in the following table.

Table 4.5: Inventory by Urban Centre Overlay and Regional Designation

RGS Designation	RGS Urban Centre	RGS Non Centre	Total
Con Rec		119	119
Rural		202	202
Agricultural		50	50
General Urban	220	661	880
Mixed Emp	90	2,479	2,569
Industrial	253	7,428	7,681
Total	563	10,939	11,502

Conversely, as shown in the following table, a higher proportion of Retail, Commercial, and Transportation Operations / Parking uses were located on industrial lands in Urban Centres.

Table 4.6: Inventory by Urban Centre Overlay and Consolidated Land Use Classification

Consolidated Land Use Classification	RGS Centre	Non Centre	Total
Building - Industrial	285	4,354	4,639
Land - Industrial	34	941	975
Large-Scale Infra / Transp	109	2,730	2,839
Transp Opts / Parking	24	65	90
Retail	61	378	439
Commercial	36	370	406
Other / Vacant	15	2,100	2,115
Total	563	10,939	11,502

Even though the policy tools, in the form of land use designations and zoning, most often reflect the intent of the local government, the conversion of these industrial lands to other uses reduces the supply of industrial lands and displaces industrial tenants / users.

Municipal Land Use Designations and Zoning

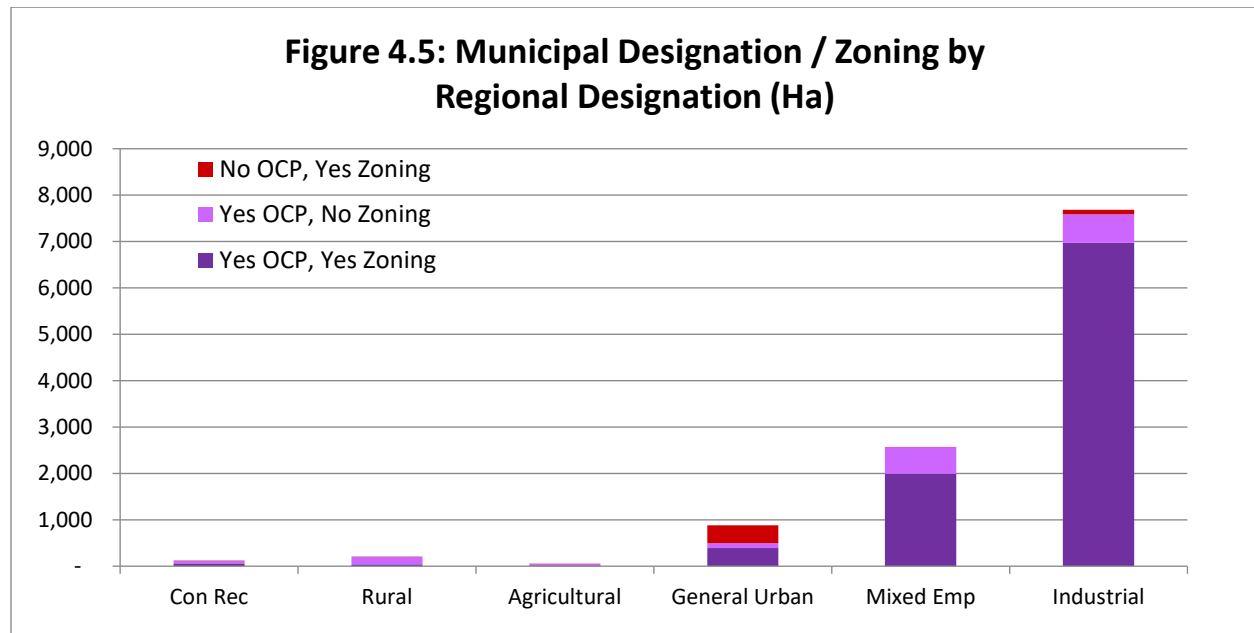
The following section with tables and figures shows the distribution of lands by municipal designation and municipal zoning, by regional designation, and by consolidated land use classification.

82% (9,470 ha) of lands in the Inventory were both municipally designated and zoned industrial. These municipal policies (designation and zoning), along with applicable regional designations, secure the long-term industrial use of the lands. Of these lands, 6,971 ha (74%) were regionally designated 'Industrial', 1,989 ha (21%) 'Mixed Employment', and 391 ha (4%) 'General Urban', as shown in the following table.

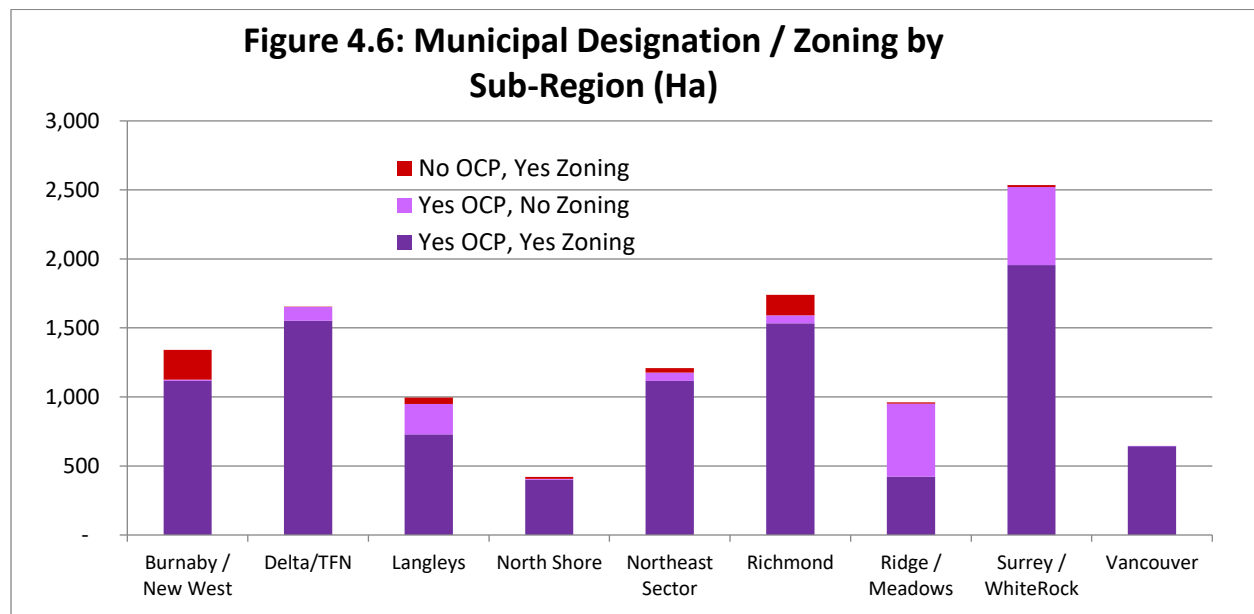
Table 4.7: Regional and Municipal Policy Designations

RGS Designation	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total - HA
Con Rec	58	58	4	119
Rural	43	159	0	202
Agricultural	18	30	2	50
General Urban	391	105	385	880
Mixed Emp	1,989	577	3	2,569
Industrial	6,971	619	92	7,681
Total	9,470	1,548	484	11,502

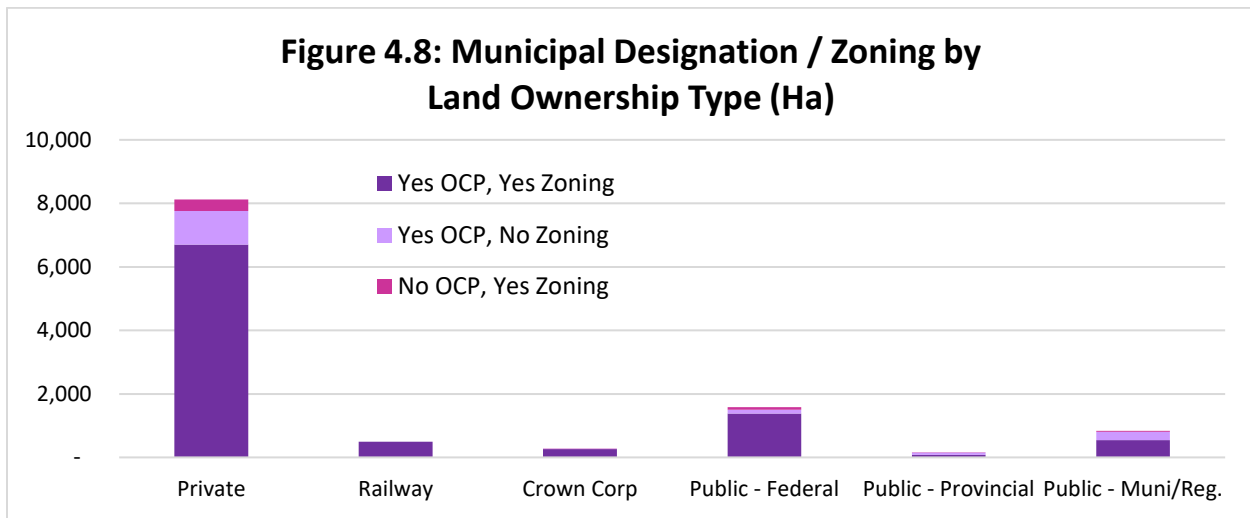
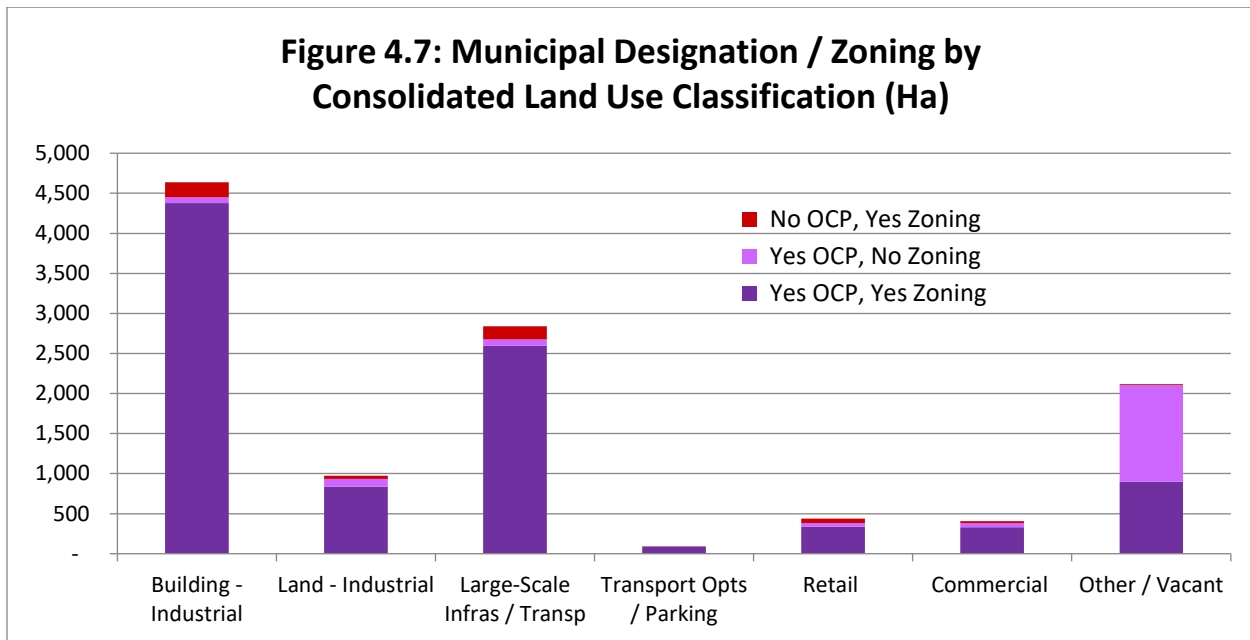
13% (1,548 ha) of the Inventory was municipally designated industrial but not zoned industrial, generally meaning it is not used for industrial, but is envisioned to be in the future. 484 ha (4%) had industrial zoning but not a municipal industrial designation, which results in diminished ability to ensure the long-term industrial use of the lands. The lands represented in red in the following figures (No OCP Industrial designation, Yes Industrial zoning), are most likely to be redeveloped to other uses in the future. These lands were mostly regionally designated 'General Urban'.



In terms of the lands that were zoned industrial but not designated industrial, they were distributed by sub-region as follows: 45% were located in Burnaby / New Westminster, and 31% in Richmond. Over a third each of lands that were municipally designated industrial but not zoned industrial were located in Surrey (37%) and Ridge / Meadows (34%), much of this was 'Other / Vacant'.



Most of the industrial lands were protected with both municipal industrial designation and municipal industrial zoning (approximately 85-95%, depending on the land use), while the lands with 'Commercial' and 'Retail' uses were less likely to be designated industrial and/or zoned industrial. The following figures show the lands with the level of policy protection.



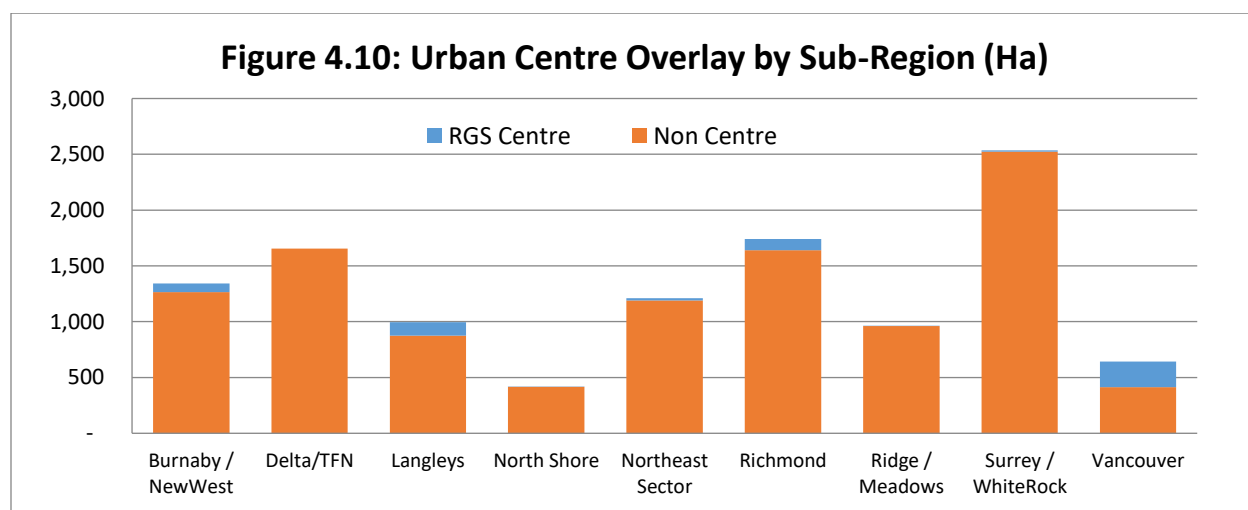
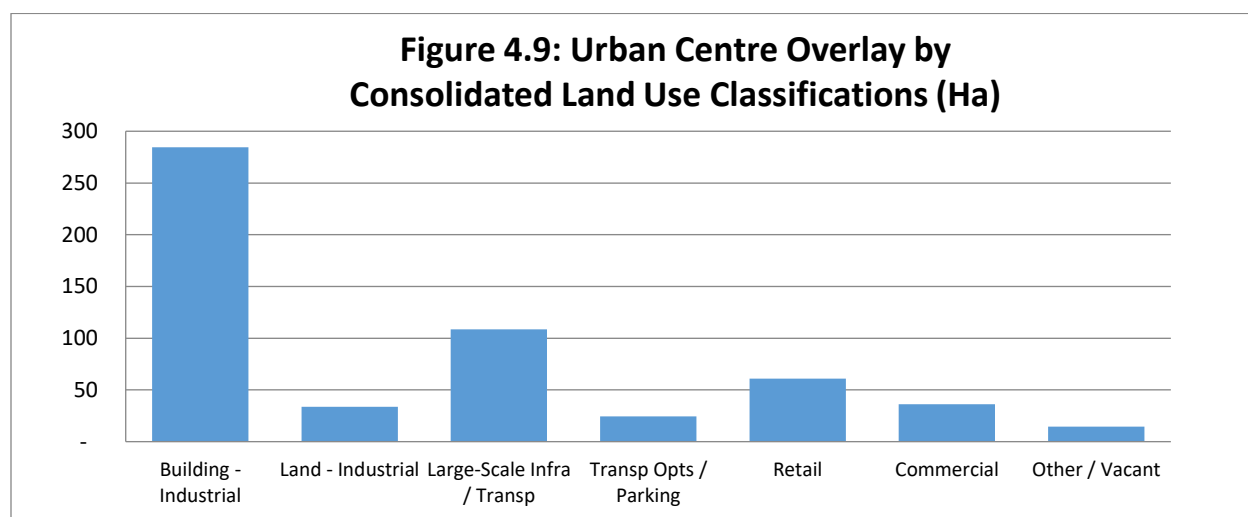
Industrial Lands in Urban Centres

The region’s 26 Urban Centres are identified in the regional growth strategy as targeted locations for population and job growth. As shown in the following table, there were 563 ha of lands in the Inventory located in the Urban Centres (overlays). Of these lands, 76% had municipal Industrial designations. In terms of regional designations, 45% were ‘Industrial’, 16% were ‘Mixed Employment’, and 39% were ‘General Urban’.

Table 4.8: Lands in Urban Centres by Regional Designation

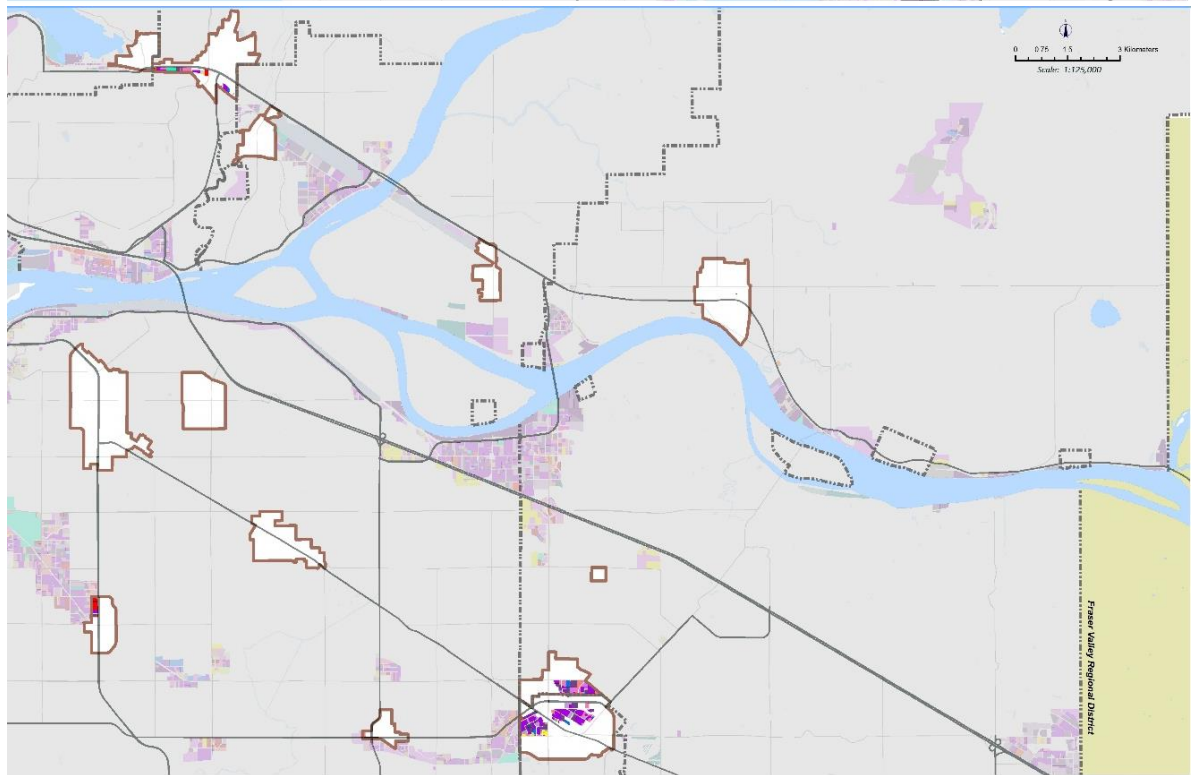
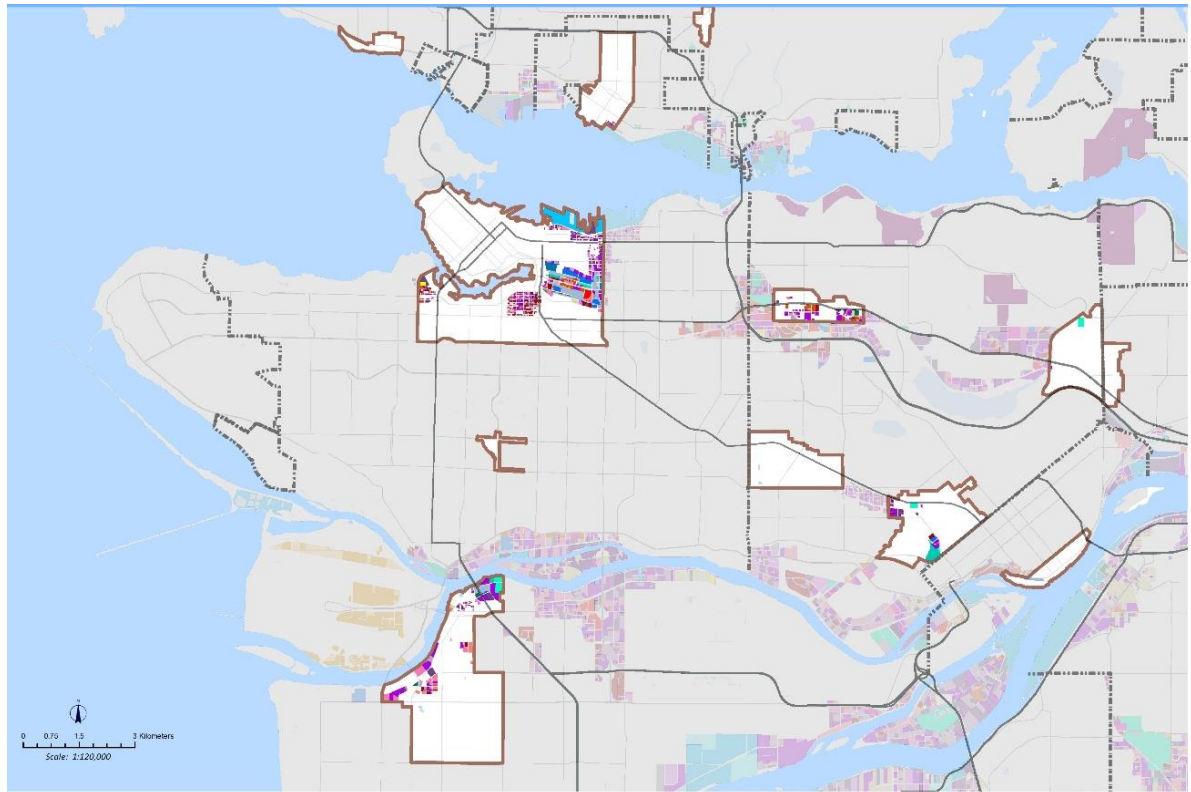
RGS Designation	RGS Urban Centre	RGS Non Centre	Total
Con Rec		119	119
Rural		202	202
Agricultural		50	50
General Urban	220	661	880
Mixed Emp	90	2,479	2,569
Industrial	253	7,428	7,681
Total	563	10,939	11,502

The following figures show that while most Inventory lands were located outside of Urban Centres, some ‘Building Intensive Industrial’, ‘Retail’, and ‘Large-Scale Infrastructure / Transportation’ uses were located within Urban Centre overlays. A higher proportion of industrial lands in the City of Vancouver were located within Urban Centres (i.e. the large Metro Core).



The following map profiles Inventory lands located within regional Urban Centres.

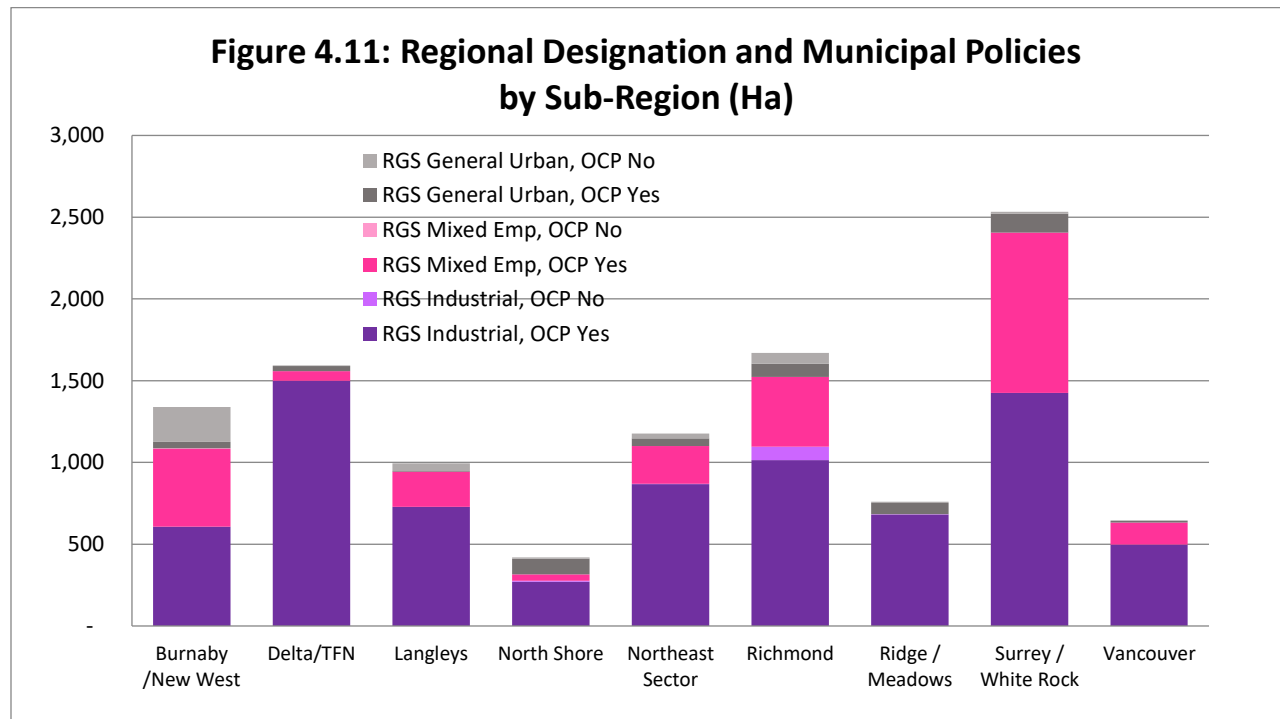
Map 4.4: Inventory within Regional Urban Centres



Detailed Type of Land Use	
General Industrial	Outdoor Storage
Manufacturing / Production	Resource Extraction
Distribution / Warehouse	Mixed Industrial / Commercial
Processing / Handling of Natural Resources	Non-Industrial - Retail (vehicle dealerships)
Non-Industrial - Office	Non-Industrial - Retail (big box)
Non-Industrial - Media Production	Non-Industrial - Retail (small or medium-scale)
Agriculture	Non-Industrial - Recreation
Residential	Non-Industrial - Banquet Hall / Assembly
Infrastructure - Oil Tank Farm	Non-Industrial - Education / Training
Infrastructure - Utilities	Maintenance Yards / Operations Services
Infrastructure - Operations	Infrastructure - Port Terminal Developed*
Infrastructure - Parking	Infrastructure - Port Terminal Vacant*
Infrastructure - Rail Yards	Transportation Infrastructure - YVR Airstide / Groundside Developed*
Transportation Infrastructure - Port Terminal Developed*	Transportation Infrastructure - YVR Airstide / Groundside Vacant*
Transportation Infrastructure - Port Terminal Vacant*	Transportation Infrastructure - Airports Airstide / Groundside Developed*
	Transportation Infrastructure - Airports Airstide / Groundside Vacant*
	Vacant Land
	Metro2040 Urban Centres

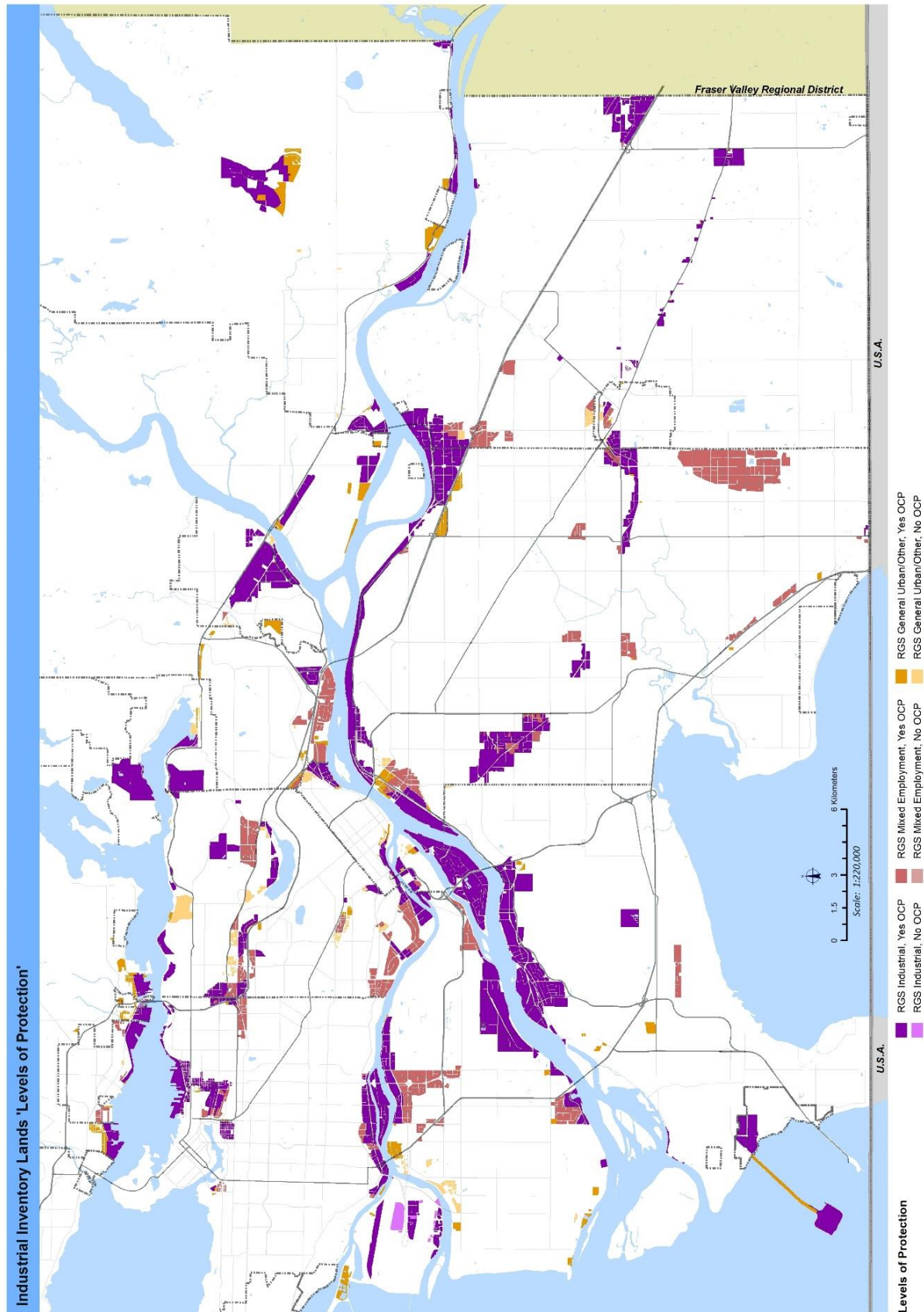
Regional and Municipal Land Use Designations

The following figure shows both regional and municipal land use designations, independent of zoning. Notably, most of the lands in Delta / Tsawwassen First Nation were regionally designated 'Industrial' and also municipally designated industrial; whereas 45% of the lands in Burnaby / New Westminster and 39% in Surrey were regionally designated 'Mixed Employment'.



The following map shows the Inventory by regional and municipal land use designations. The lands with the greatest level of land use designation policy protection are shown in dark purple, while the lands in pink and orange are intended or are at greater likelihood to convert to other uses.

Map 4.5: Inventory Level of Policy Protection



Vacant Lands

Specifically for the ‘Other / Vacant’ component of the Inventory (2,115 ha), 56% were regionally designated as ‘Industrial’ and 28% as ‘Mixed Employment’. Over half (57%) of the ‘Other / Vacant’ lands had municipal industrial designations, but did not have industrial zoning, as shown in following figure and associated tables.

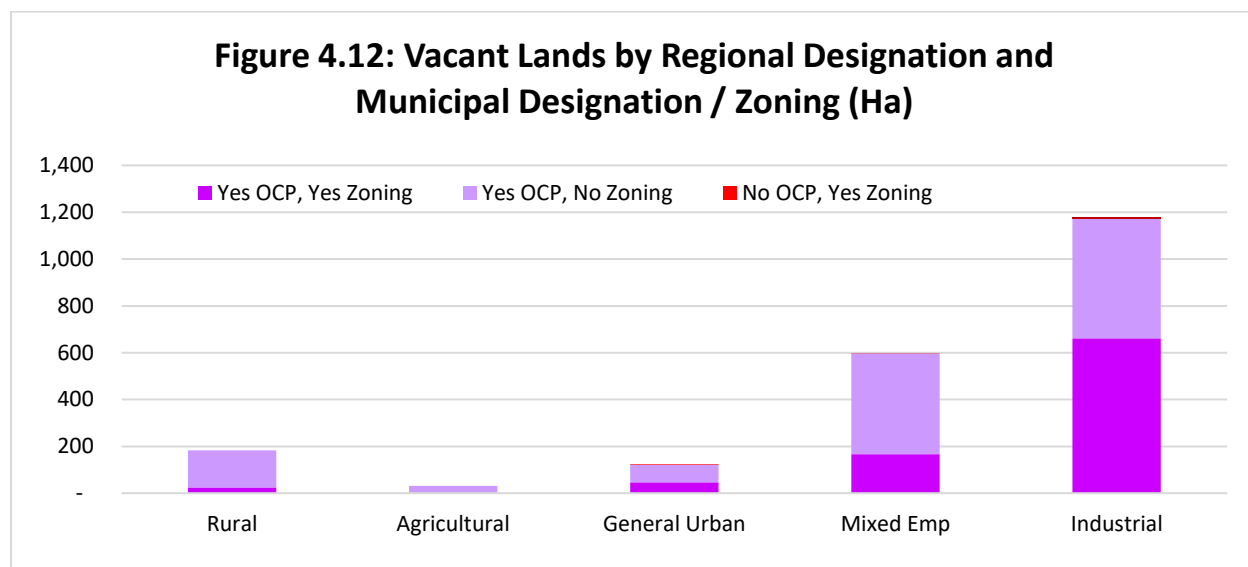


Table 4.9: Developed and Other/Vacant Lands by Regional Designation

RGS Designation	Developed	Vacant	Total	% of Total Land
Con Rec	119		119	1%
Rural	18	183	202	2%
Agricultural	19	31	50	0%
General Urban	756	125	880	8%
Mixed Emp	1,971	597	2,569	22%
Industrial	6,503	1,179	7,681	67%
Total	9,387	2,115	11,502	100%

Table 4.10: Other/Vacant Lands by Regional Designation and Municipal Designation / Zoning

RGS Designation	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total
Rural	25	159		183
Agricultural	1	30		31
General Urban	46	76	3	125
Mixed Emp	166	431	1	597
Industrial	662	510	7	1,179
Total	899	1,205	10	2,115

Table 4.11: Other/Vacant Lands by Municipal Designation / Zoning by Sub-Region

Sub Region	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total
	Burnaby/New West	35	7	
Delta/TFN	228	84		313
Langleys	25	149	2	176
North Shore	20	1		21
Northeast Sector	23	33	0	56
Richmond	264		6	271
Ridge/Meadows	83	510	1	593
Surrey/White Rock	194	421	1	616
Vancouver	27			27
Total	899	1,205	10	2,115

Table 4.12: Other/Vacant Lands by Detailed Land Use Classification and by Sub-Region

Sub Region	Burnaby /			North			Ridge /	Surrey /		Total
	New West	Delta/TFN	Langleys	Shore	Northeast S	Richmond	Meadows	White	Vancouver	
Agriculture	0		4					135		139
Residential	5	1	74	1	2	4	27	102	6	223
Resource Extraction		66		1	5	41	106	13		232
YVR Vacant						62				62
Airports Vacant (excl. YVR)		21	10							31
Port Terminal Vacant	4	12		1		97		1	3	118
Vacant Land	33	212	88	18	48	66	460	365	18	1,309
Total	42	313	176	21	56	271	593	616	27	2,115

Table 4.13: Other/Vacant Lands by Detailed Land Use Classification and Regional Designation

RGS Designation	General					Total
	Rural	Agricultural	Urban	Mixed Emp	Industrial	
Agriculture				133	6	139
Residential	19		42	115	47	223
Resource Extraction	9		5	18	200	232
YVR Vacant					62	62
Airports Vacant (excl. YVR)				21	10	31
Port Terminal Vacant			8		109	118
Vacant Land	154	31	69	310	744	1,309
Total	183	31	125	597	1,179	2,115

4.1.5 Land Ownership Type

71% of the lands in the Inventory were privately owned, with an additional 4% owned by railways. The balance of lands (25%) were owned by various levels of government:

- 14% federal government (including port and airport lands);
- 2% provincial government; and
- 7% local government (municipal, regional, and TransLink).

This is illustrated in the following two figures and table.

Figure 4.13: Inventory by Land Ownership Type (Ha)

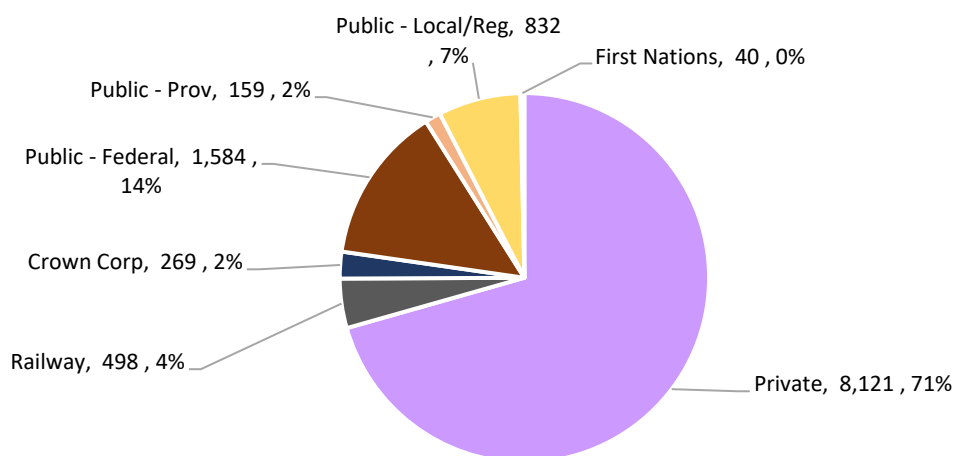


Figure 4.14: Land Ownership Type by Sub-Region (Ha)

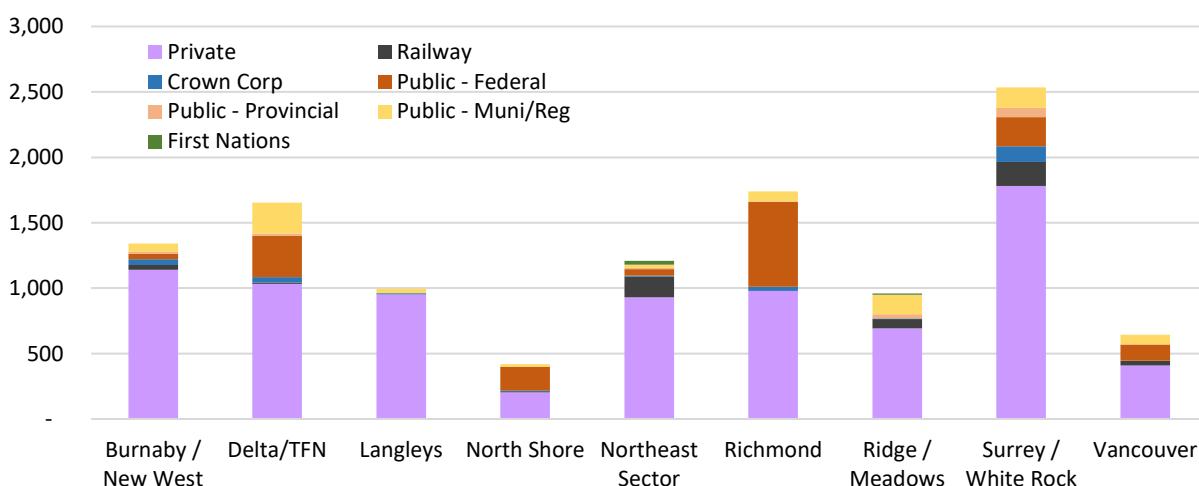
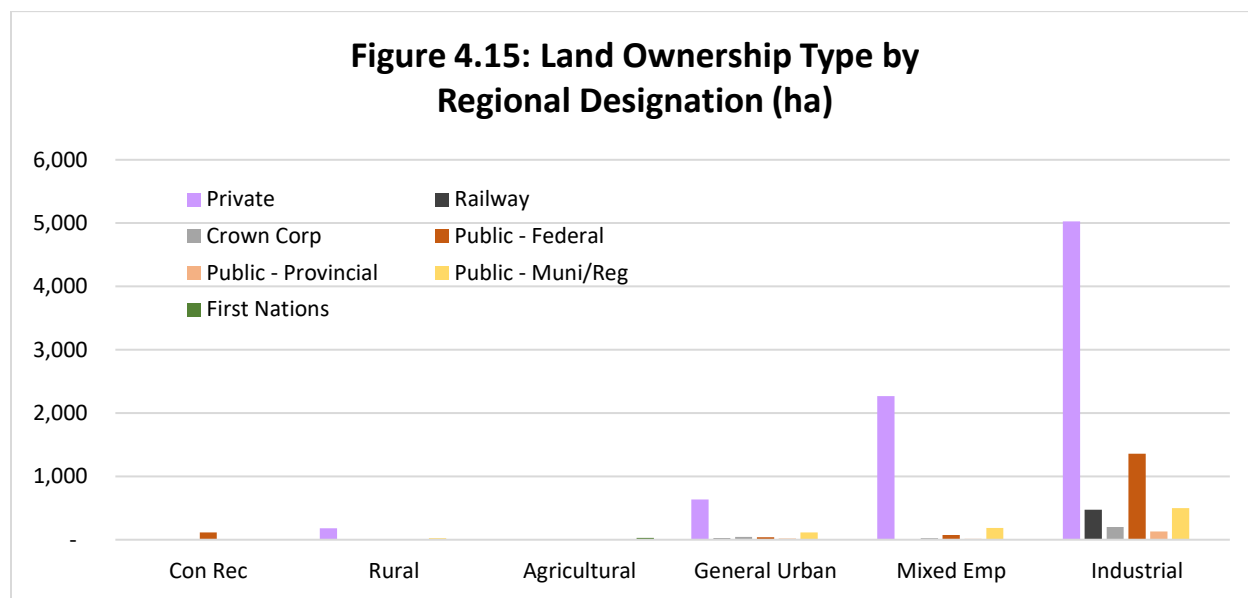


Table 4.14: Land Ownership Type by Consolidated Land Use Classification

Ownership Type	Building - Industrial	Land - Industrial	Large-Scale Infra / Transp	Transp Opts / Parking	Retail	Commercial	Other / Vacant	Total
Private	4,443	808	729	20	425	383	1,312	8,121
Railway	17	2	462				16	498
Crown Corp	29	13	198			7	22	269
Public - Federal	49	20	1,270		6	3	237	1,584
Public - Prov	8	20	2	12	0	2	115	159
Public - Local/Reg	93	110	178	58	8	12	374	832
First Nations							40	40
Total	4,639	975	2,839	90	439	406	2,115	11,502

The following figure shows the Inventory by land ownership type relative to regional designation. Virtually all federal and railway owned lands were regionally designated as ‘Industrial’ (noting that local government regulations do not apply to lands under federal jurisdiction), whereas a significant proportion of the privately owned lands were designated ‘Mixed Employment’ or ‘General Urban’.



The following map shows the Inventory by land ownership type. Most of the Inventory was privately owned, shown in light pink. On the subsequent map, federal lands (such as the port and airport) are shown in dark pink, and private rail yards shown in green.

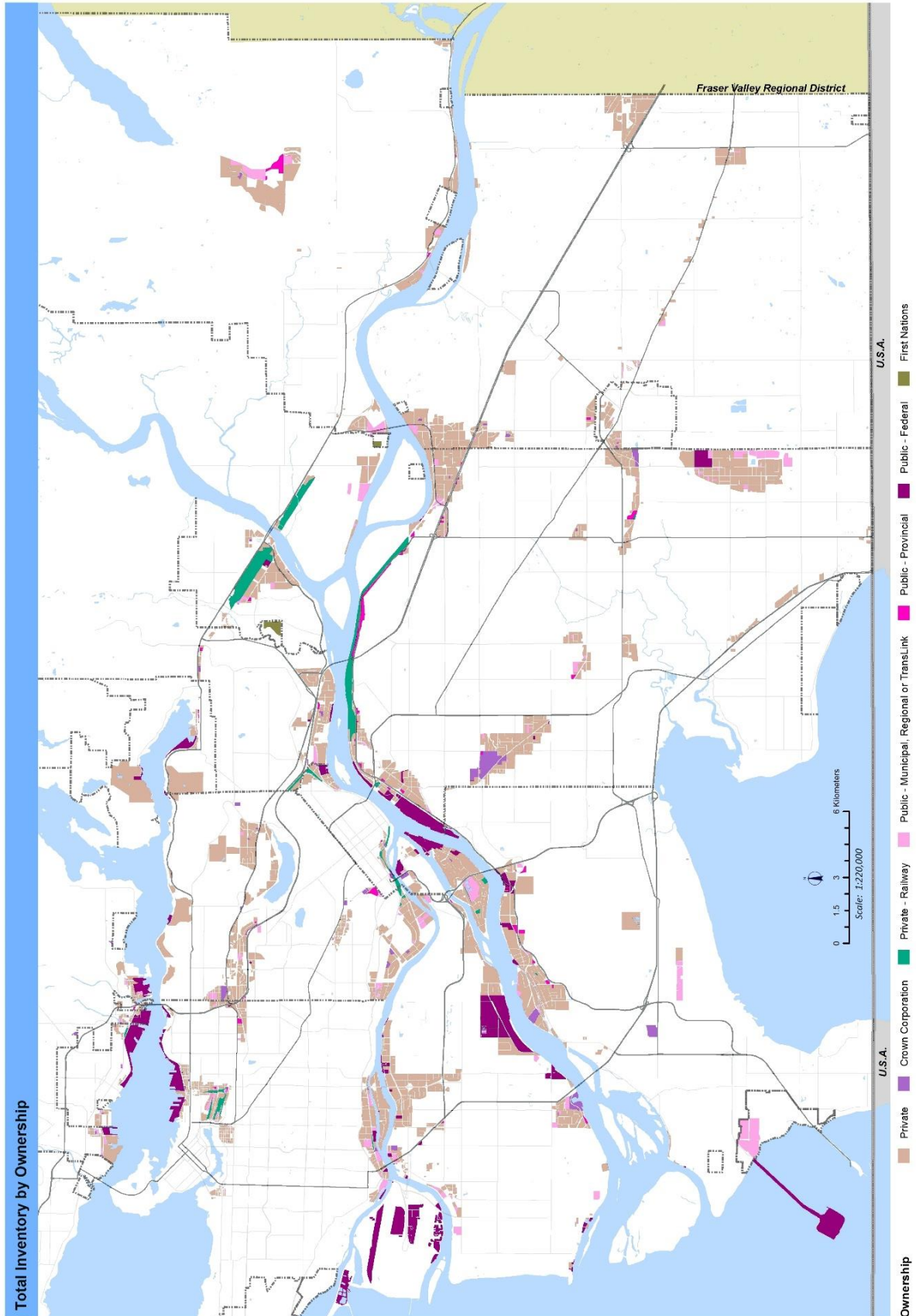
Details of the Inventory lands by ownership are shown in the following figure and maps, notably:

- 71% of the Inventory was privately owned;
- 14% was owned by the federal government (including various agencies such as port and airport);
- nearly all (97%) rail lands were ‘Developed’; and
- most (84%) privately owned lands were ‘Developed’.

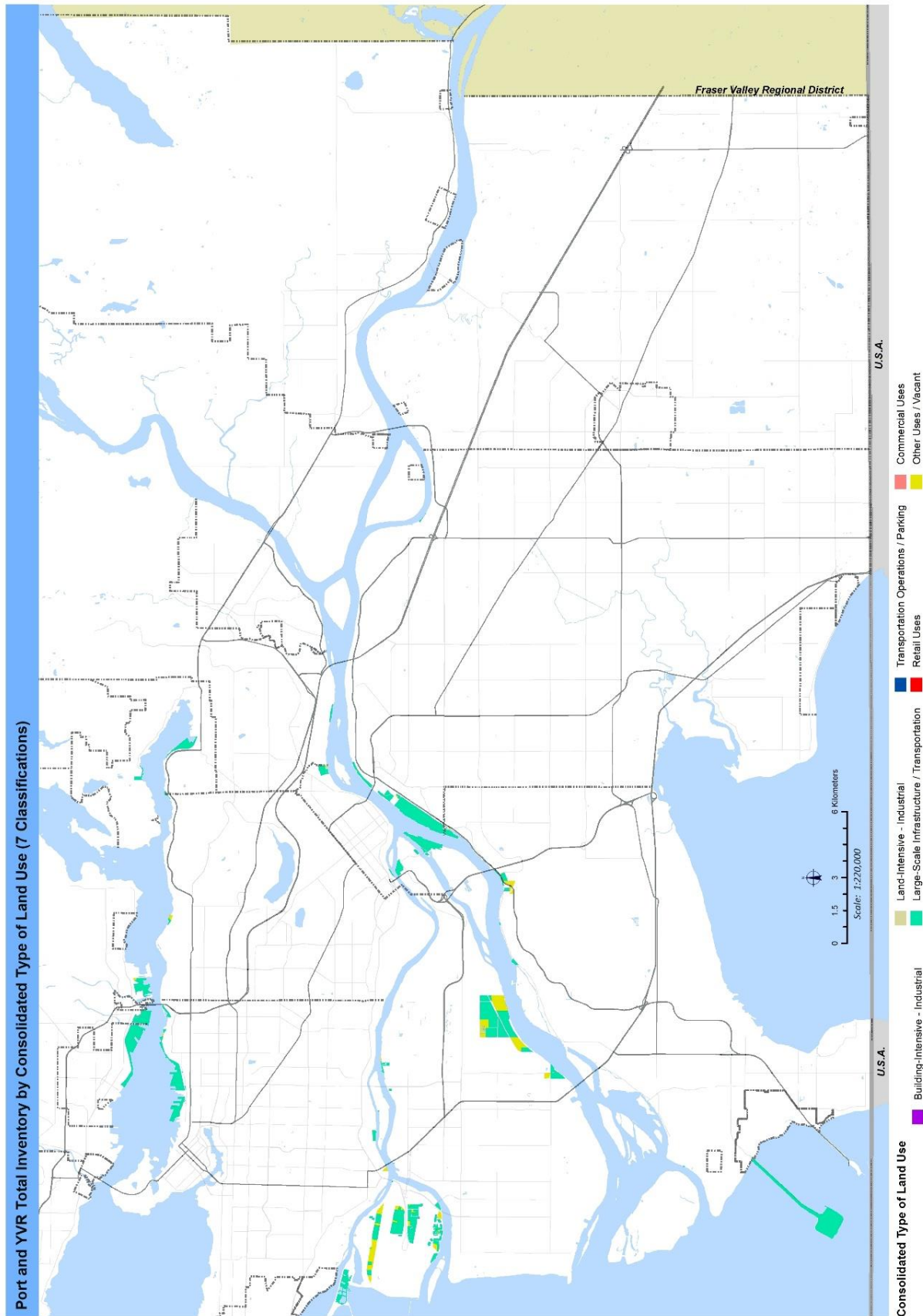
Table 4.15: Developed and Other/Vacant Lands by Land Ownership Type

Ownership Type	Developed	Vacant	Total	% of Total Lands
Private	6,808	1,312	8,121	71%
Railway	482	16	498	4%
Crown Corp	248	22	269	2%
Public - Federal	1,348	237	1,584	14%
Public - Prov	44	115	159	1%
Public - Local/Reg	458	374	832	7%
First Nations		40	40	0%
Total	9,387	2,115	11,502	100%

Map 4.6: Inventory by Land Ownership Type



Map 4.7: YVR and Port Lands by Consolidated Type of Land Use

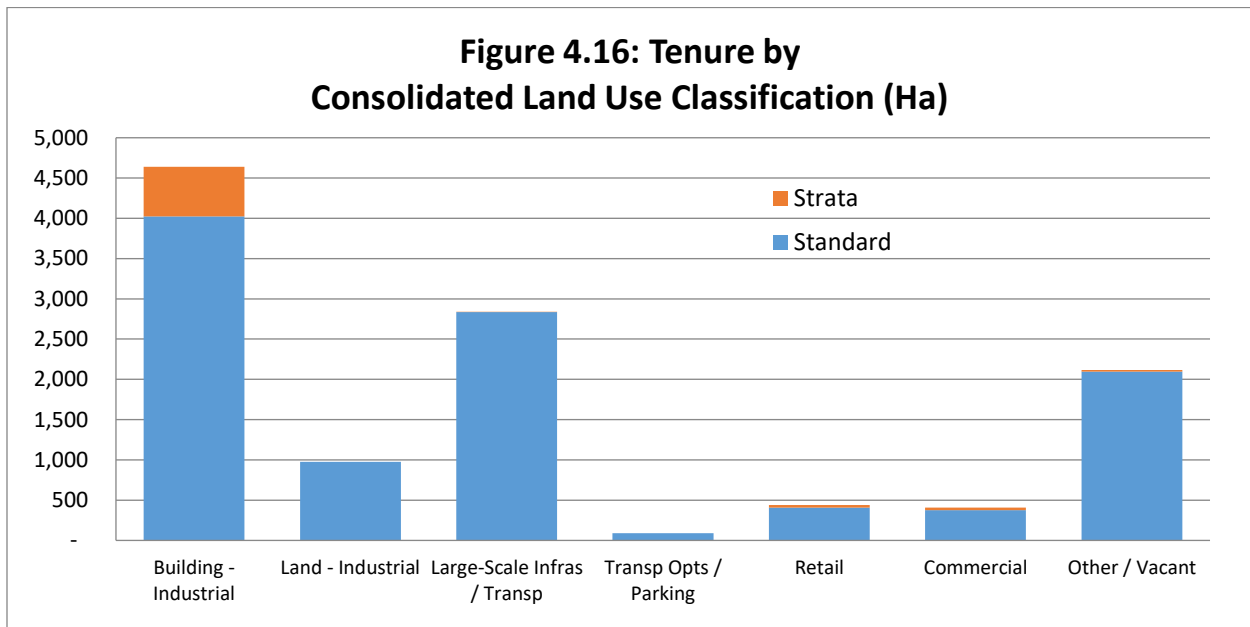


4.1.6 Land Tenure

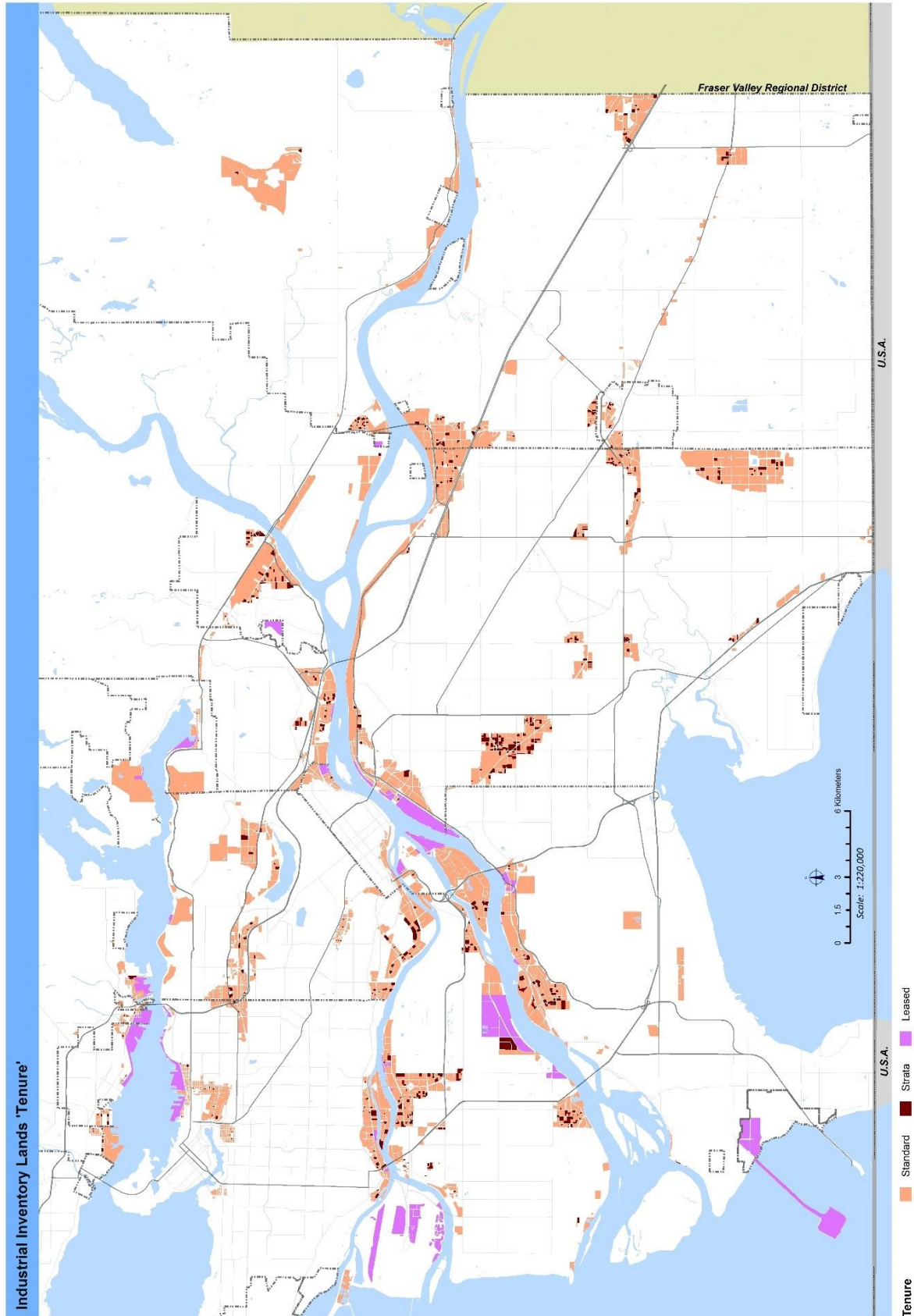
In terms of land tenure, 700 ha or 6% of the Inventory was strata tenure, with a higher rate of 10% for ‘Mixed Employment’ designated lands. The balance was ‘standard’ tenure, which includes both fee simple and lease lands. Multiple ownership of properties can impact future redevelopment potential of the sites. Details are shown in the following table, figure, and map.

Table 4.16: Land Tenure Type by Regional Designation

RGS Designation	Standard	Strata	Total
Con Rec	119		119
Rural	200	2	202
Agricultural	50		50
General Urban	848	32	880
Mixed Emp	2,302	267	2,569
Industrial	7,282	399	7,681
Total	10,802	700	11,502



Map 4.8: Inventory by Tenure



4.1.7 Site Sizes

Of the Inventory, 34% of the lands were within sites under 2 ha in size, and 22% within sites over 20 ha. The rest of the Inventory (44%) was within sites 2-20 ha in size. In some cases, abutting sites could be consolidated to create larger developable sites to accommodate larger industrial users. Details by site size category are shown in the following tables.

Table 4.17: Site Size Distribution of Inventory by Vacancy Percentage

Site Size	Developed	Vacant	Total	% of Total	% of Lands
				Lands	Vacant
less than 1 HA	1,880	210	2,090	18%	10%
1 to 1.99 HA	1,574	225	1,798	16%	13%
2 to 4.99 HA	2,037	330	2,367	21%	14%
5 to 9.99 HA	1,146	380	1,525	13%	25%
10 to 19.99 HA	734	469	1,204	10%	39%
20 HA and over	2,016	501	2,517	22%	20%
Total	9,387	2,115	11,502	100%	18%

The Inventory of larger sites (both ‘Developed’ and ‘Other / Vacant’) over 20 ha (50 ac) was geographically distributed as follows:

- 24% in North East Sector
- 18% in Delta / Tsawwassen First Nation
- 16% in Surrey / White Rock
- 14% in Ridge / Meadows

Table 4.18: Site Size Distribution of Inventory by Sub-Region

Site Size	Burnaby /		Northeast			Ridge -	Surrey /		Total	
	New West	Delta / TFN	Langleys	North Shore	Sector	Richmond	Meadows	White Rock		Vancouver
less than 1 HA	291	192	251	73	154	301	81	510	235	2,090
1 to 1.99 HA	248	220	239	37	136	269	48	513	89	1,798
2 to 4.99 HA	329	364	307	45	150	403	109	551	109	2,367
5 to 9.99 HA	178	261	121	38	99	259	155	330	83	1,525
10 to 19.99 HA	81	162	78	42	70	290	222	221	37	1,204
20 HA and over	214	455		185	601	218	345	408	91	2,517
Total	1,342	1,655	996	420	1,209	1,741	960	2,534	644	11,502

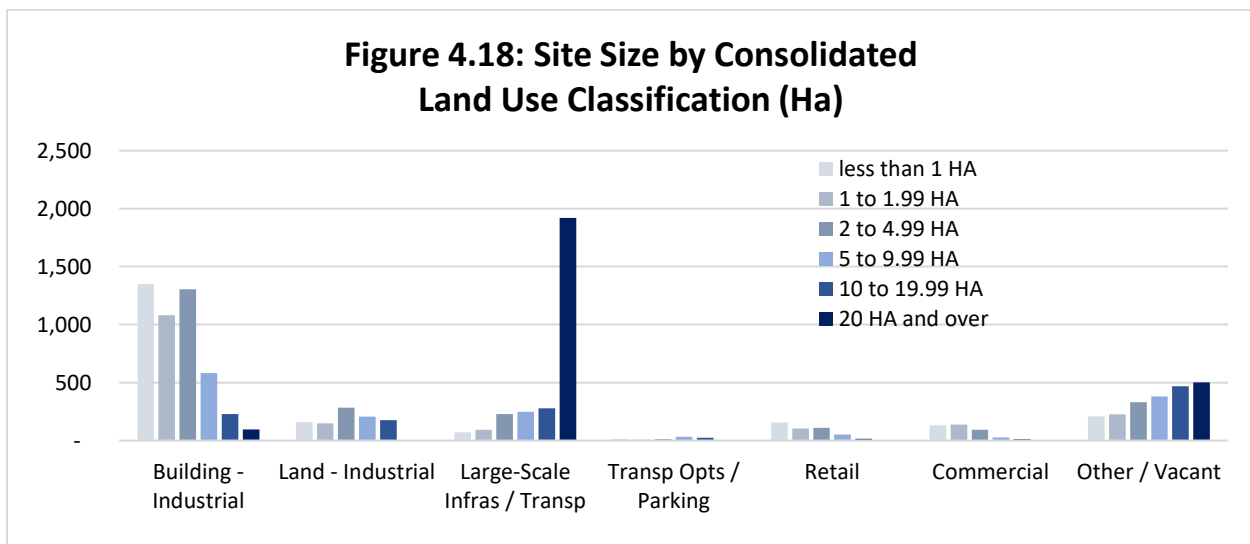
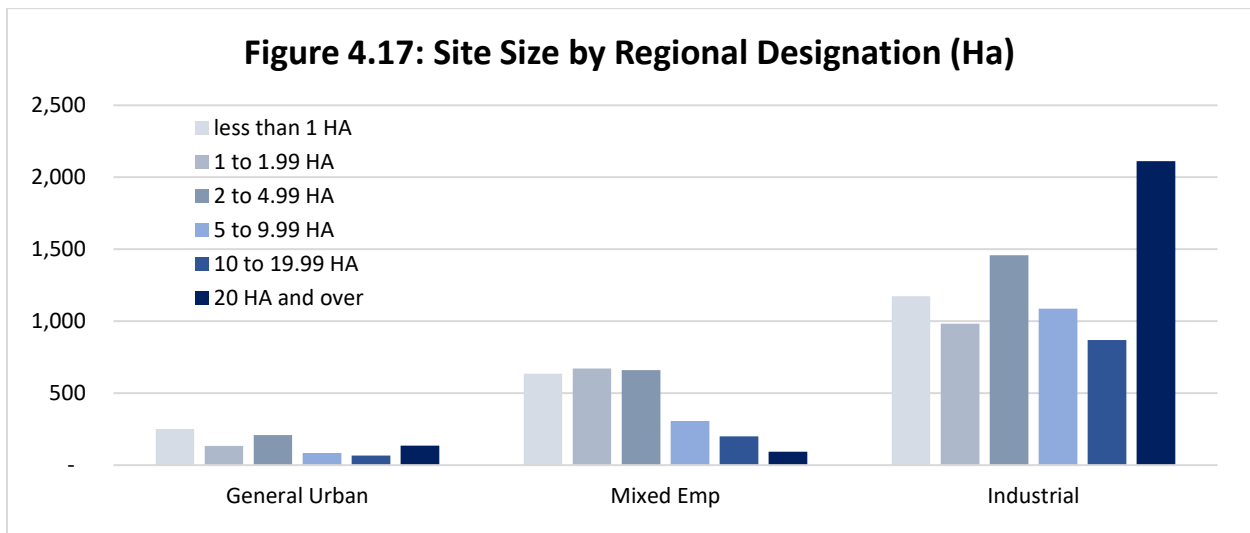
Table 4.19: Site Size Distribution of Inventory by Consolidated Land Use Classification

Site Size	Large-Scale					Retail	Commercial	Other / Vacant	Total
	Building - Industrial	Land - Industrial	Infras / Transp	Transp Opts / Parking					
less than 1 HA	1,348	159	72	12	157	132	210	2,090	
1 to 1.99 HA	1,081	148	93	8	105	138	225	1,798	
2 to 4.99 HA	1,306	284	228	14	111	94	330	2,367	
5 to 9.99 HA	581	207	246	33	50	28	380	1,525	
10 to 19.99 HA	228	175	279	23	16	14	469	1,204	
20 HA and over	95		1,921				501	2,517	
Total	4,639	975	2,839	90	439	406	2,115	11,502	

Table 4.20: Site Size Distribution of Inventory by Regional Designation

Site Size	General						Total
	Con Rec	Rural	Agricultural	Urban	Mixed Emp	Industrial	
less than 1 HA	3	20	5	252	636	1,174	2,090
1 to 1.99 HA	2	9		134	671	983	1,798
2 to 4.99 HA	2	32	5	210	661	1,458	2,367
5 to 9.99 HA		37	10	84	307	1,088	1,525
10 to 19.99 HA		70		66	200	868	1,204
20 HA and over	112	34	30	135	94	2,111	2,517
Total	119	202	50	880	2,569	7,681	11,502

Site size distribution also varies by regional designation and land use classification, as shown on the following figures. Larger sites tend to be regionally designated ‘Industrial’ (84%), and used for ‘Large-Scale Infrastructure / Transportation’ (76%) activities.



The range in site sizes is also illustrated through the calculation of average site sizes. Average sizes (consolidated properties, where applicable) vary greatly by sub-region and by sector classification, as illustrated by these observations, supposed by the following tables:

- By geography, most sites range from 1.0 – 2.0 ha in size, with outliers:
 - 0.4 ha in Vancouver
 - 3.1 ha in Ridge-Meadows
- By consolidated land use classification, most sites range from 0.9 - 1.2 ha in size, with outliers:
 - 6.6 ha for 'Large-scale Infrastructure / Transportation' sector
 - 1.9 ha for 'Other / Vacant' sites

Table 4.21: Average Site Size by Sub-Region

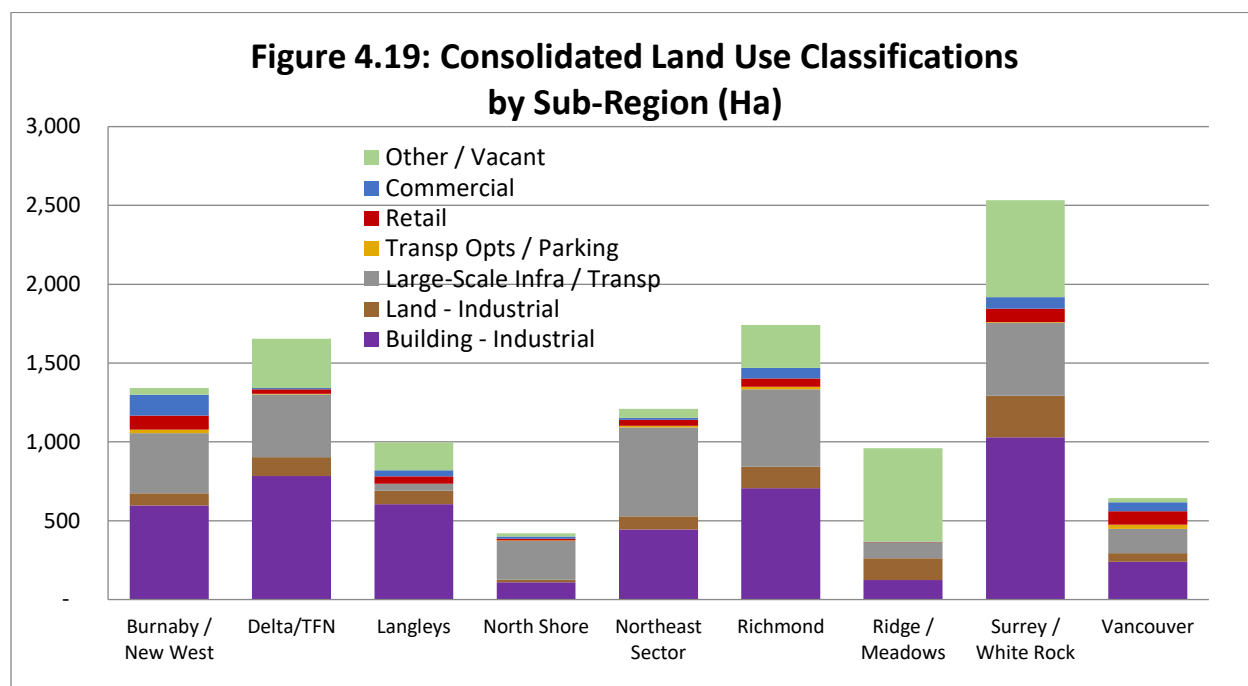
Sub-Regions	# of		Avg Parcel	% of Total
	Parcels	Area - HA	Size - HA	Lands
Burnaby/New West	1317	1,342	1.0	12%
Delta/TFN	720	1,655	2.3	14%
Langley	809	996	1.2	9%
North Shore	444	420	0.9	4%
Northeast Sector	582	1,209	2.1	11%
Richmond	1118	1,741	1.6	15%
Ridge/Meadows	306	960	3.1	8%
Surrey/White Rock	1823	2,534	1.4	22%
Vancouver	1450	644	0.4	6%
Total	8569	11,502	1.3	100%

Table 4.22: Average Site Size by Consolidated Land Use Classification

Land Use Category	# of		Avg Parcel	% of Total
	Parcels	Area - HA	Size - HA	Lands
Building - Industrial	5122	4,639	0.9	40%
Land - Industrial	648	975	1.5	8%
Large-Scale Infrac / Transp	429	2,839	6.6	25%
Transp Opts / Parking	63	90	1.4	1%
Retail	629	439	0.7	4%
Commercial	583	406	0.7	4%
Other / Vacant	1095	2,115	1.9	18%
Total	8569	11,502	1.3	100%

4.2 Findings at the Sub-Regional Level

This section provides information and commentary to characterize the nine geographic sub-regions, after the illustrative figure showing consolidated land use classifications by sub-region. The profile of industrial land uses varies significantly by sub-region, from some inner urban areas being largely built out with proportionally more ‘General Industrial’ uses, to other areas having more ‘Large-Scale Infrastructure / Transportation’ uses and ‘Other / Vacant’ lands.



The following are notable observations about the Inventory lands in each of the sub-regions.

Vancouver – 644 ha

- Mostly ‘Developed’ lands
- Many ‘General Industrial’ classified lands
- Significant port terminals
- Smallest average parcel size (0.4 ha)
- Highest proportion (99%) of lands in ‘Industrial’ or ‘Mixed Employment’ regional designation

Burnaby / New Westminster – 1,342 ha

- 391 ha of large scale industrial / transportation
- 260 ha ‘Oil Tank Farms’
- 90 ha ‘Office’
- Largest share (28%) of region’s Transportation – Operations lands

North East Sector (Coquitlam, Port Coquitlam, Port Moody) – 1,209 ha

- 150 ha rail yards – in Port Coquitlam
- 369 ha ‘Oil Tank Farms’ – in Port Moody

Pitt Meadows / Maple Ridge – 960 ha

- 460 ha 'Vacant' land; much of which are located in north-east Maple Ridge
- Smallest share (4%) of region's developed lands
- Second largest share (28%) of region's vacant lands
- Largest average parcel size (3.1 ha)
- Lowest share (2%) of their Inventory is on strata lots
- Lowest proportion (71%) of lands in 'Industrial' or 'Mixed Employment' regional designation

North Shore (North Vancouver City, North Vancouver District) – 420 ha

- 166 ha port terminals
- Limited 'Vacant' land supply
- Smallest share (4%) of region's industrial lands
- Smallest share (1%) of region's vacant lands

Richmond (including YVR Sea Island) – 1,741 ha

- Includes lands at YVR International Airport
- Includes notable retail sites within industrial areas
- 271 ha 'Other / Vacant' (97 ha vacant port lands; 62 ha vacant YVR airside / groundside lands, and 66 ha as vacant lands)
- Largest share (9%) of their Inventory is on strata lots

Delta / Tsawwassen First Nation – 1,655

- Many industrial lands on Annacis Island and River Road area / corridor
- Roberts Bank Terminal is a significant part of Inventory (282 ha) as 'Developed Port Terminal'
- 313 ha 'Other / Vacant'; 66 ha peat extraction site in central Delta
- Largest share (28%) of region's Distribution / Warehouse lands
- Largest share (20%) of region's Manufacturing / Production lands
- Largest share (26%) of region's developed Port lands

Surrey – 2,534 ha

- Surrey has the largest amount of industrial lands in the region
- Major industrial areas include: Newton (including BC Hydro electrical sub-station lands), South Westminster, Port Kells, Campbell Heights
- 616 'Other / Vacant' (365 ha vacant land; 135 ha 'Agriculture'; 102 ha 'Residential')
- Largest share (20%) of region's developed lands
- Largest share (29%) of region's vacant lands
- Largest share (38%) of region's Outdoor Storage lands

Langleys (City and Township) – 996 ha

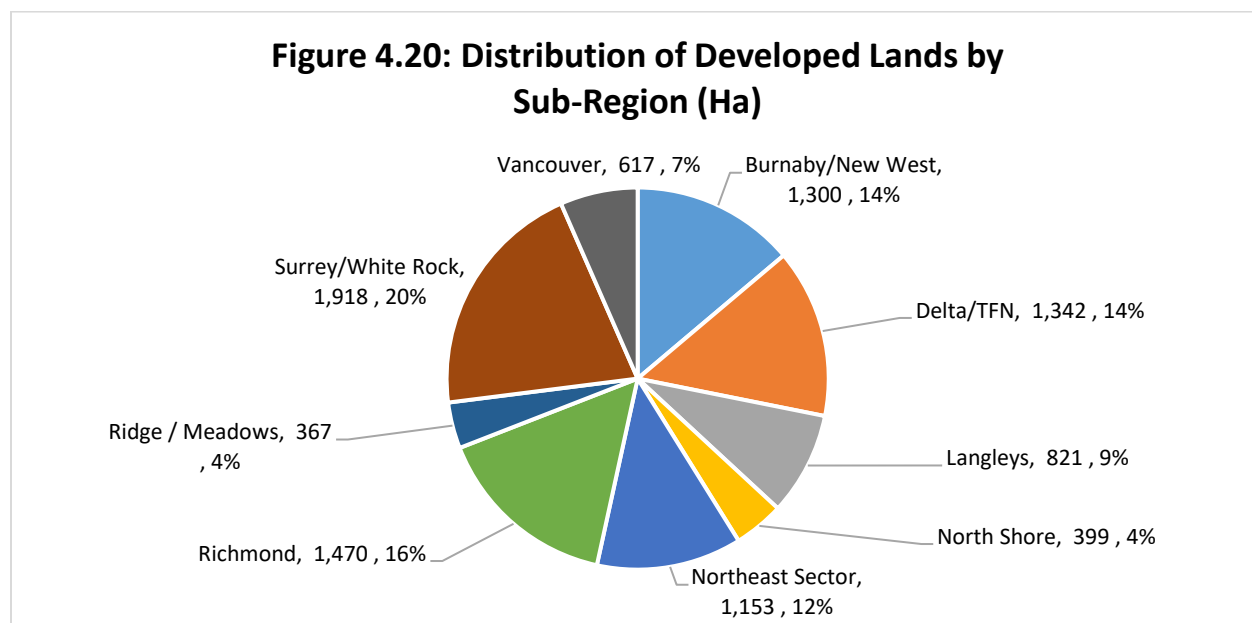
- Port Kells area mostly 'Developed'
- Gloucester Estates mostly 'Developed' as 'General Industrial'
- Smaller industrial sites along Fraser Highway
- Second largest share (20%) of region's Distribution / Warehouse lands

4.3 ‘Developed’ Inventory

This section documents the ‘Developed’ lands, which comprise 82% of the Inventory or 9,387 ha.

4.3.1 Geographic Sub-Regions

Of the ‘Developed’ lands, much are located in Surrey (20%), followed by Richmond (16%), as shown in the figure.

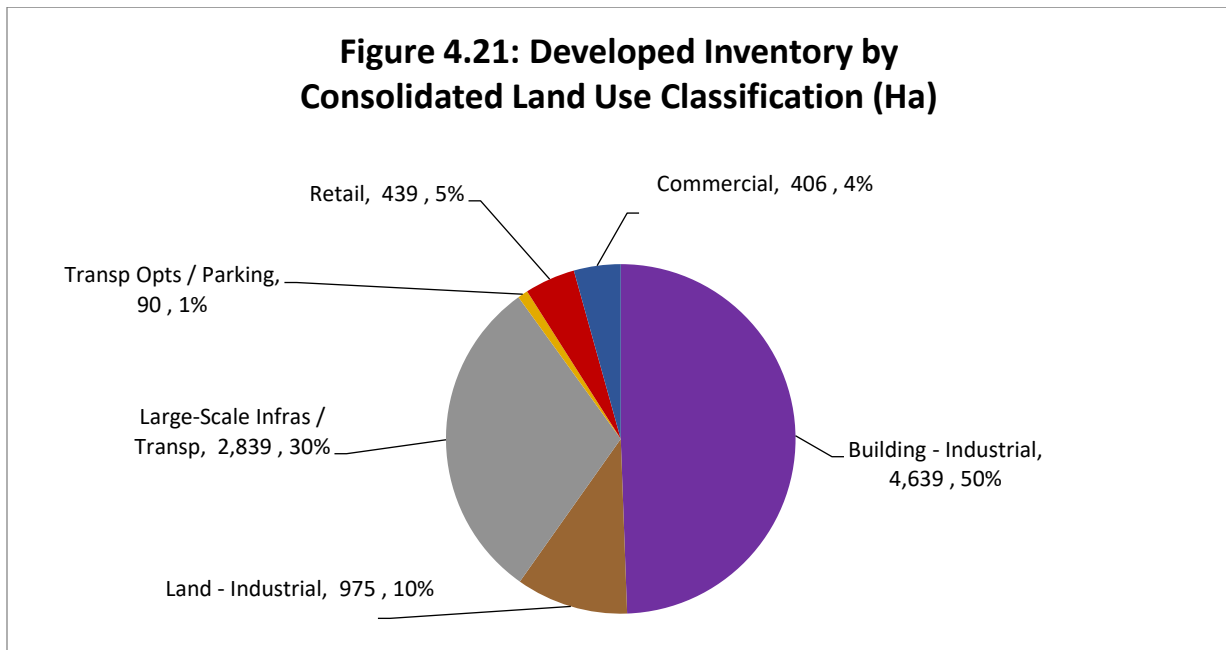


4.3.2 Land Use Classifications

Of the ‘Developed’ Inventory, the largest two land use classifications were: 40% ‘Building Intensive Industrial’ and 25% ‘Large-Scale Infrastructure / Transportation’, with more information in the following table and figure. The other land use classifications make up a relatively small part of the Inventory. The following table and figure provide this information as well as the classification by sub-region.

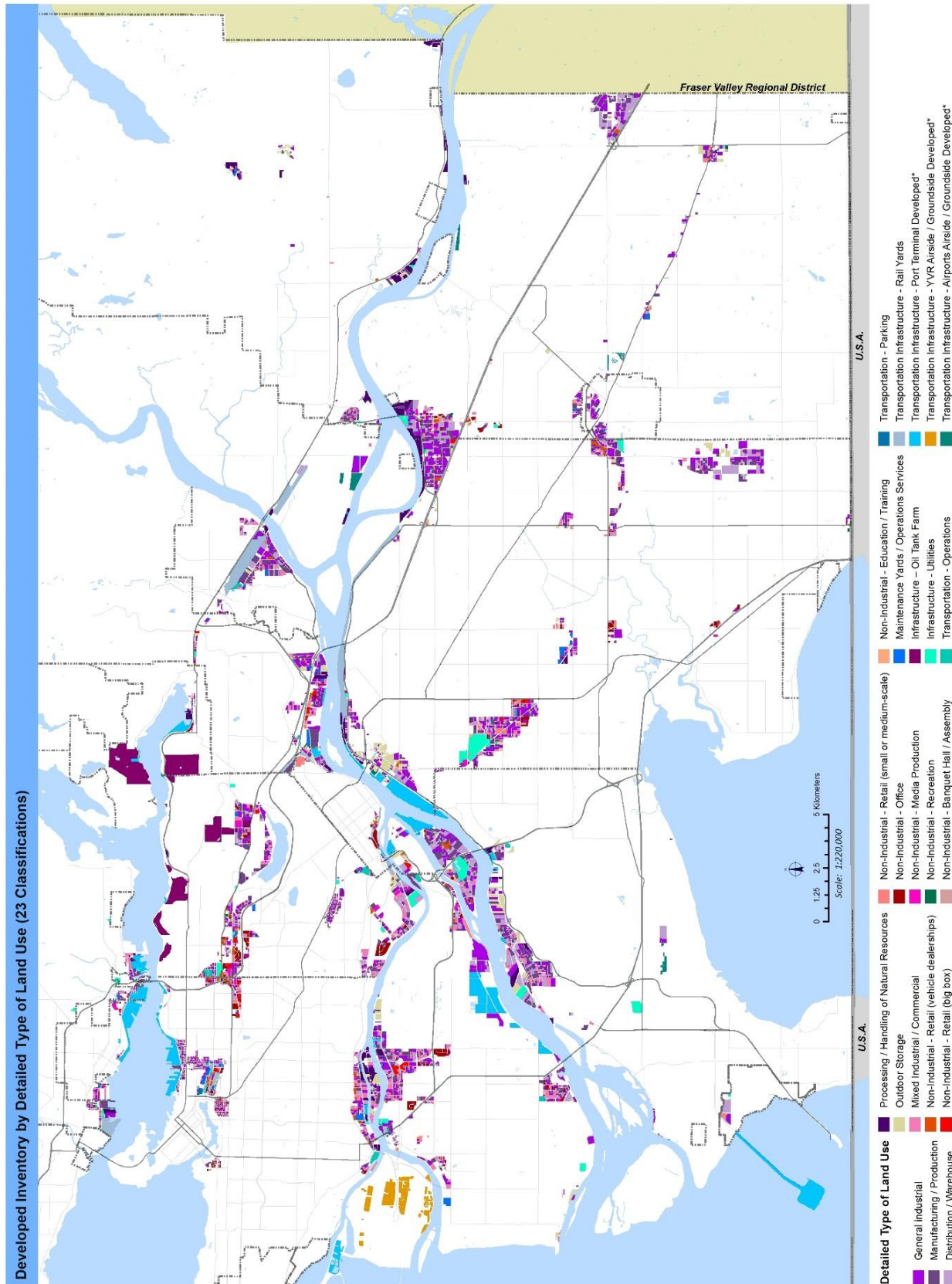
Table 4.23: Inventory by Sub-Region and Consolidated Land Use Classification

Sub-Regions	Building - Industrial	Land - Industrial	Large-Scale Infra / Transp	Transp Opts / Parking	Retail	Commercial	Other / Vacant	Total - HA	% of Total
Burnaby/NewWest	597	78	380	23	89	133	42	1,342	12%
Delta/TFN	783	120	397	5	29	8	313	1,655	14%
Langleys	605	85	44		46	40	176	996	9%
North Shore	110	16	244	5	10	14	21	420	4%
Northeast Sector	445	82	565	9	39	12	56	1,209	11%
Richmond	707	136	490	17	53	68	271	1,741	15%
Ridge/Meadows	124	138	101		3	1	593	960	8%
Surrey/WhiteRock	1,029	264	462	5	84	74	616	2,534	22%
Vancouver	239	55	155	26	85	57	27	644	6%
Total	4,639	975	2,839	90	439	406	2,115	11,502	100%
% of Total	40%	8%	25%	1%	4%	4%	18%	100%	

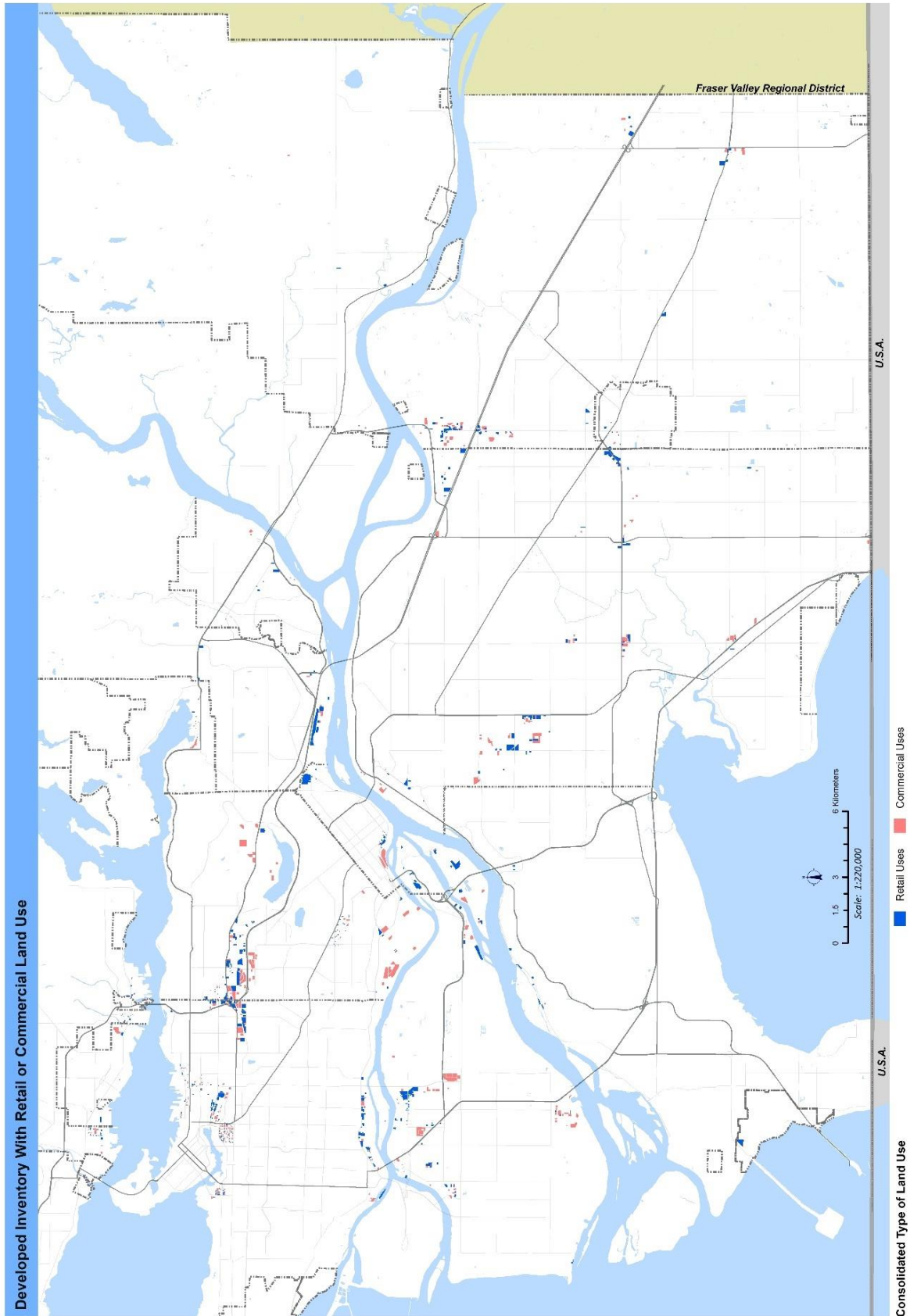


The following map shows the 'Developed' lands by detailed land use classification. Much of the Inventory was 'General Industrial', shown as dark purple, as well as large infrastructure / utility sites and port terminals. The subsequent map shows 'Commercial' and 'Retail' uses occurring on industrial lands.

Map 4.9: Developed Inventory by Detailed Type of Land Use (18 Classifications)



Map 4.10: Inventory with Retail or Office Land Use



4.3.3 Site Size

The following tables and figure analyze ‘Developed’ and ‘Other / Vacant’ lands by site size. There were many sites (comprising 20% of ‘Developed’ and 10% of ‘Other / Vacant’) between 0 and 2.0 ha in size, and also a significant amount (21% and 24% respectively) comprising sites over 20 ha in size. By sector, the larger (20 ha and over) sites were mostly in the ‘Large-Scale Infrastructure / Transportation’ land use classification.

Table 4.24: Distribution Size of Sites by Percentage of Lands

Site Size	Developed	% of Total Lands	Vacant	% of Total Lands
less than 1 HA	1,880	20%	210	10%
1 to 1.99 HA	1,574	17%	225	11%
2 to 4.99 HA	2,037	22%	330	16%
5 to 9.99 HA	1,146	12%	380	18%
10 to 19.99 HA	734	8%	469	22%
20 HA and over	2,016	21%	501	24%
Total	9,387	100%	2,115	100%

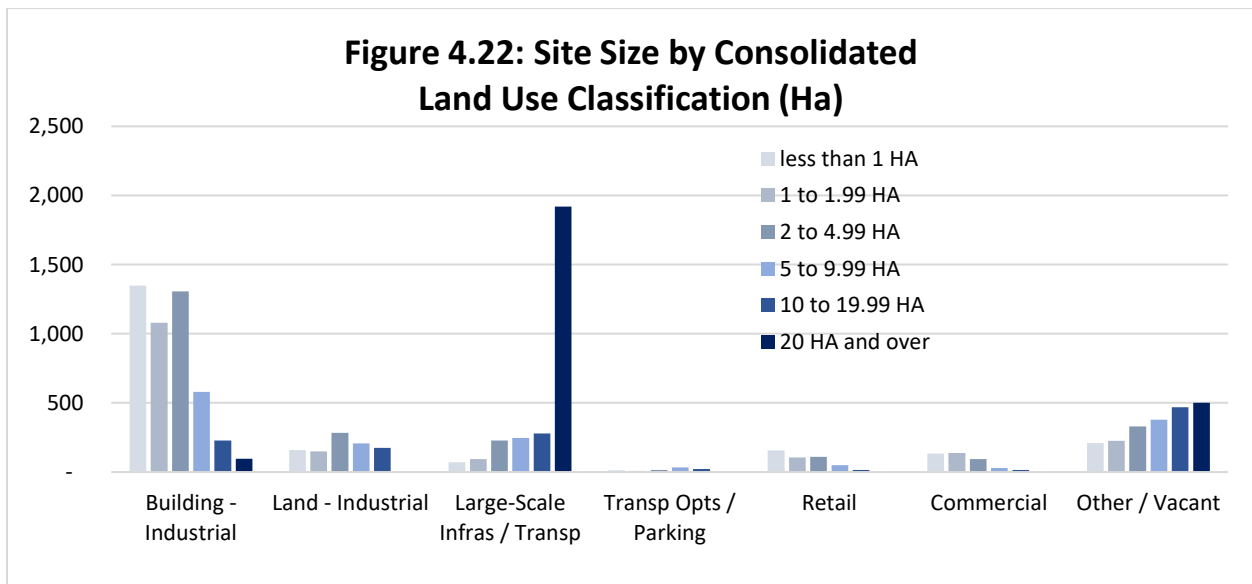


Table 4.25: Site Size Distribution of Lands by Consolidated Land Use Classification

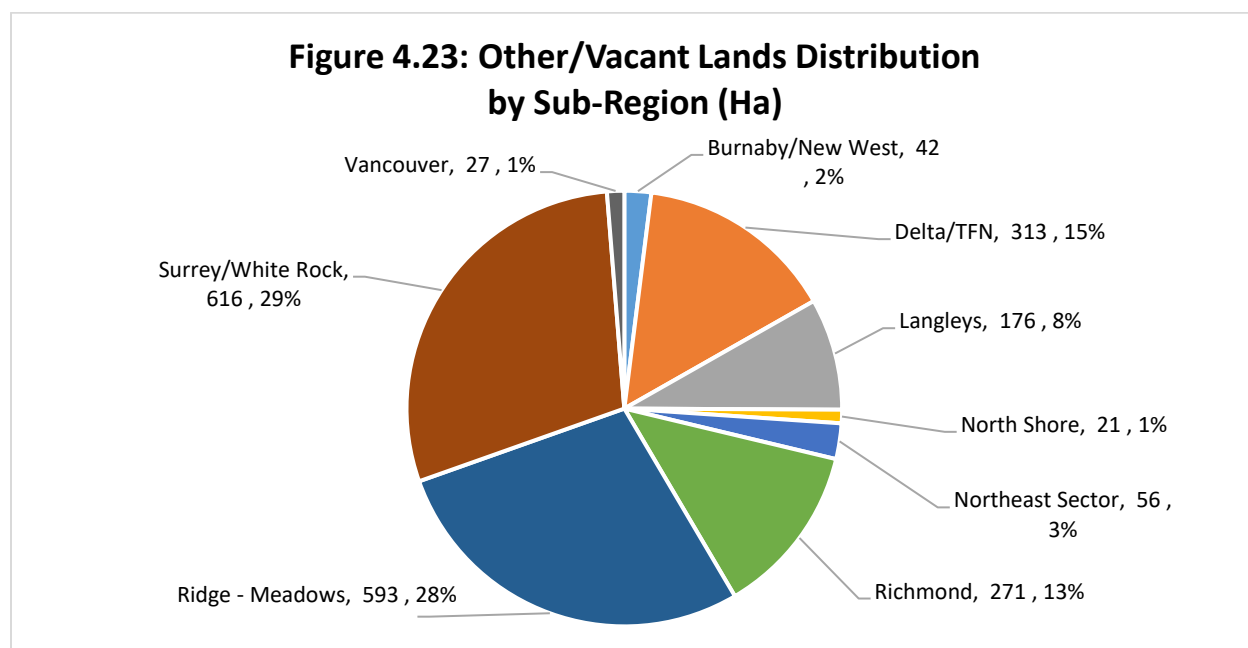
Site Size	Building - Industrial	Land - Industrial	Large-Scale		Retail	Commercial	Other / Vacant	Total
			Infras / Transp	Transp Opts / Parking				
less than 1 HA	1,348	159	72	12	157	132	210	2,090
1 to 1.99 HA	1,081	148	93	8	105	138	225	1,798
2 to 4.99 HA	1,306	284	228	14	111	94	330	2,367
5 to 9.99 HA	581	207	246	33	50	28	380	1,525
10 to 19.99 HA	228	175	279	23	16	14	469	1,204
20 HA and over	95		1,921				501	2,517
Total	4,639	975	2,839	90	439	406	2,115	11,502

4.4 'Other / Vacant' Inventory

This section documents the Inventory’s ‘Other / Vacant’ lands, which comprise 18% of the Inventory or 2,115 ha. The ‘Other / Vacant’ category includes lands that are completely vacant, as well as those that have non-industrial uses with the potential to redevelop to industrial uses.

4.4.1 Geographic Sub-Regions

By sub-region, for the ‘Other / Vacant’ Inventory, 29% was located in Surrey, 28% in Ridge / Meadows, 15% in Delta / Tsawwassen First Nation, and 13% in Richmond, as seen in the figure.

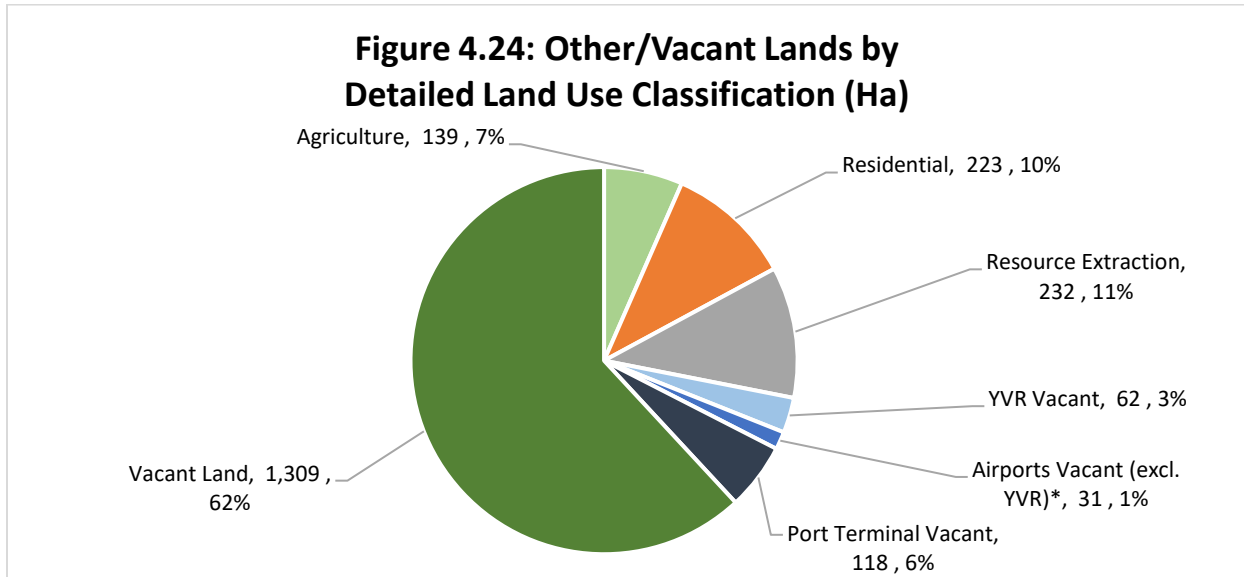


Specific notable major ‘Other / Vacant’ lands include:

- Tsawwassen First Nation lands that abut the Roberts Bank Terminal and that are accessible by the South Fraser Perimeter Road (SFPR);
- Campbell Heights in south-east Surrey;
- North-east Maple Ridge, which is located far from transportation infrastructure; and
- Some smaller sites in Richmond, Delta, Surrey, Langley, and Pitt Meadows.

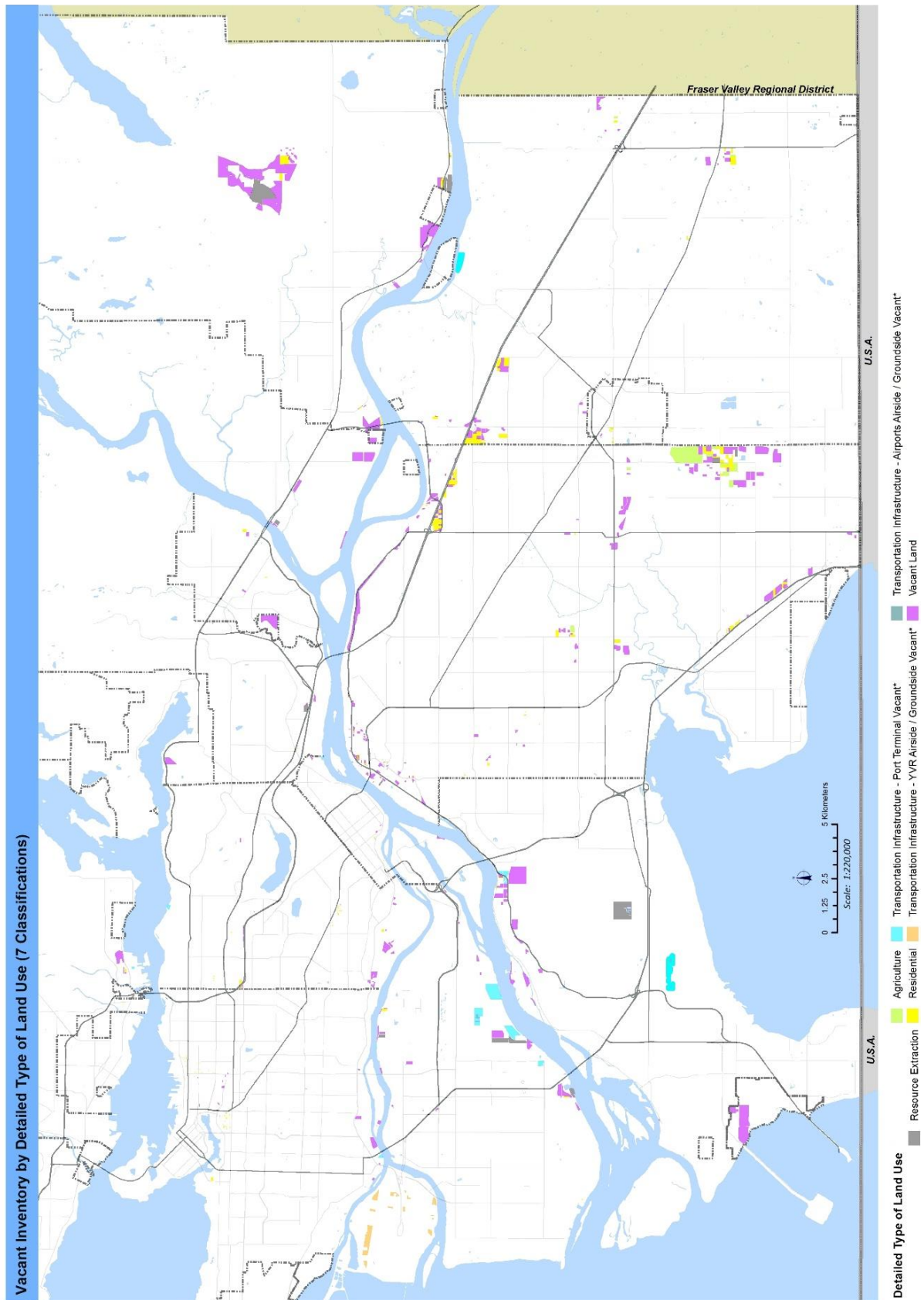
4.4.2 Land Use Classification

'Other / Vacant' lands comprise six land use categories: 62% were completely vacant, 11% 'Resource Extraction' 10% 'Residential', and 7% 'Agriculture', as seen in the figure. These lands offer future opportunities for industrial development.



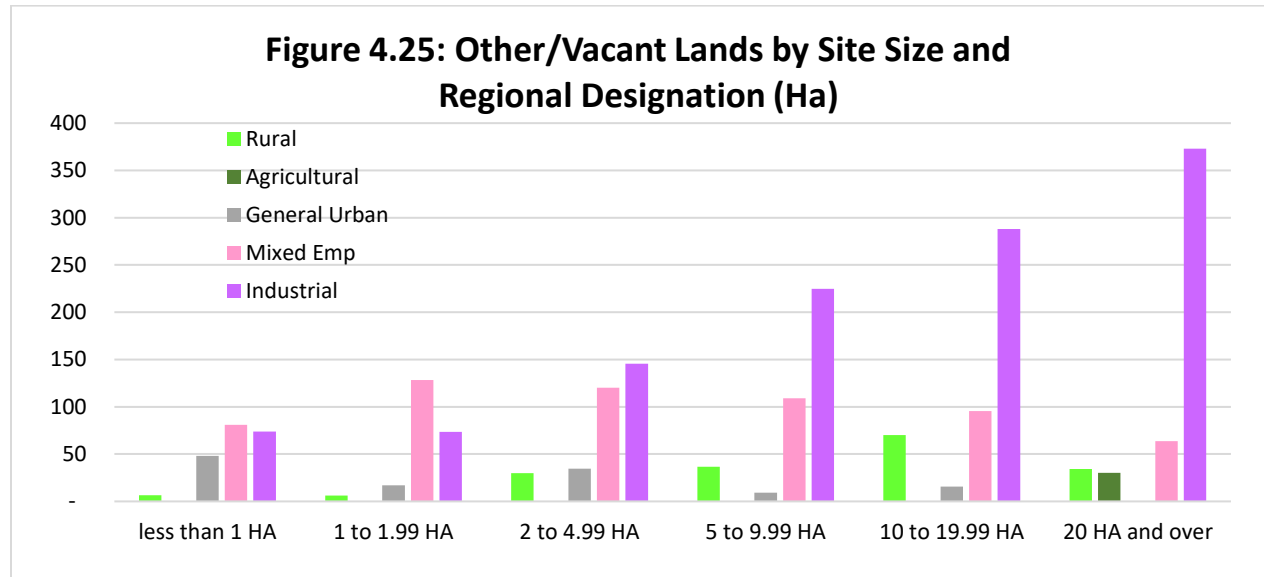
The following map shows the 'Other / Vacant' lands, by the six categories of uses. The lands were distributed throughout the region, with large resource extraction sites in Richmond, Delta, and Maple Ridge, and numerous residential uses in Surrey and Langley Township.

Map 4.11: Other/Vacant Inventory by Detailed Type of Land Use (6 Classifications)

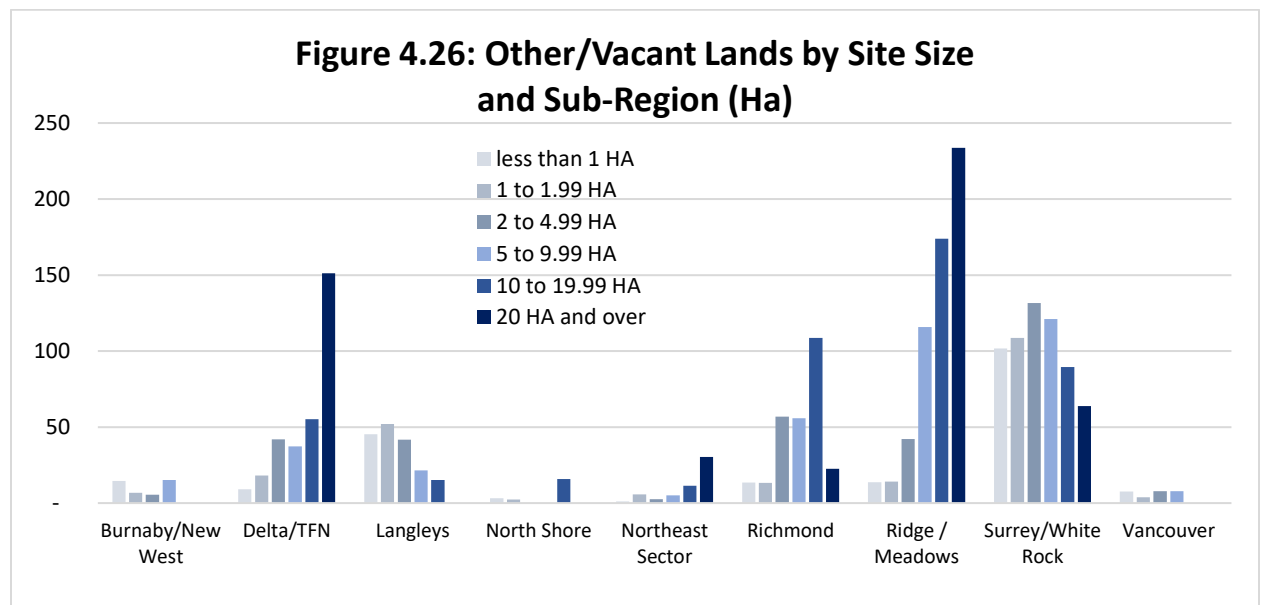


4.4.3 Site Size

For the 'Other / Vacant' lands (2,115 ha), the following figure shows the site size distribution by regional designation. Larger sites tend to be regionally designated 'Industrial', whereas many mid-sized sites were 'Mixed Employment', and smaller sites had a higher proportion of 'General Urban' designation.



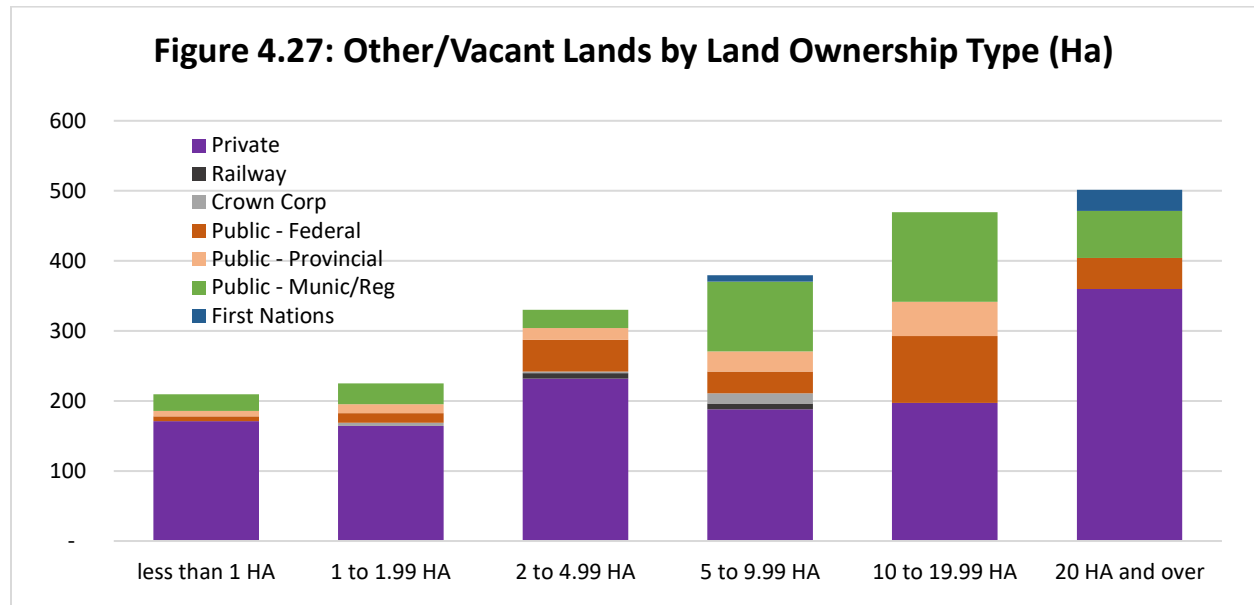
The following figure shows the distribution of 'Other / Vacant' lands by sub-region by site size. Most of the larger 'Other / Vacant' industrial sites were located in Surrey, Richmond, Delta / Tsawwassen First Nation, and Ridge / Meadows.



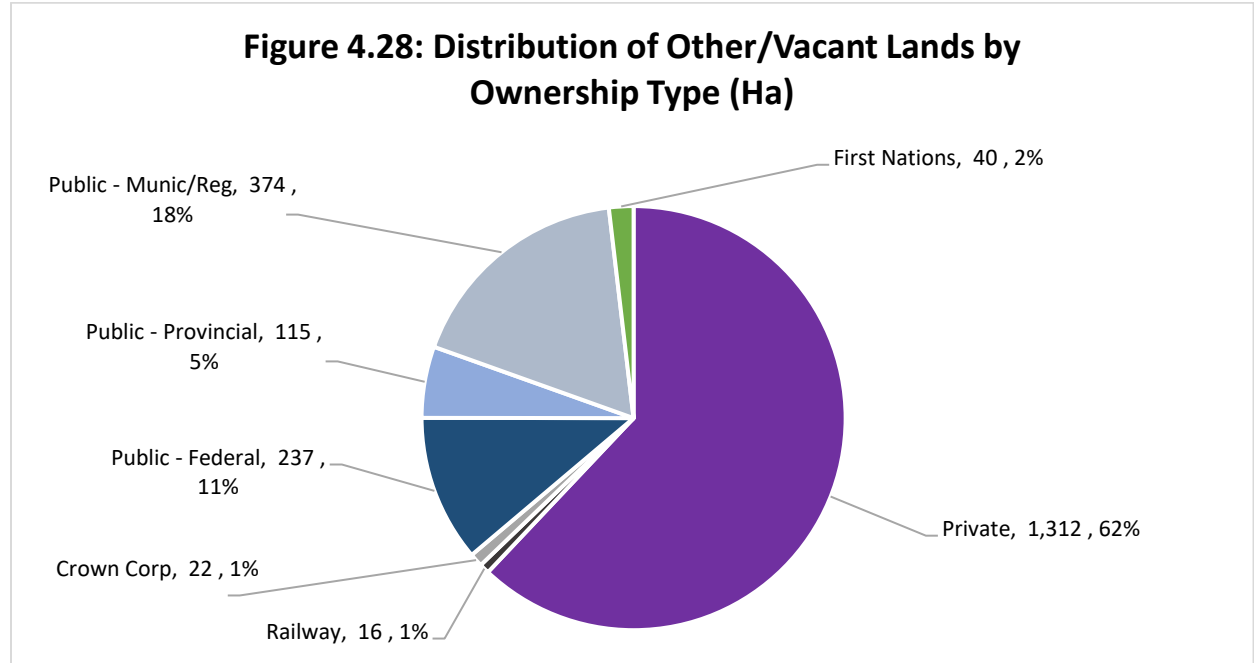
4.4.4 Land Ownership Type

In most size categories, the majority of lands were privately owned, however for the 8.0 to 20.0 ha size range, there were more municipal / regional government and federal government owned lands,

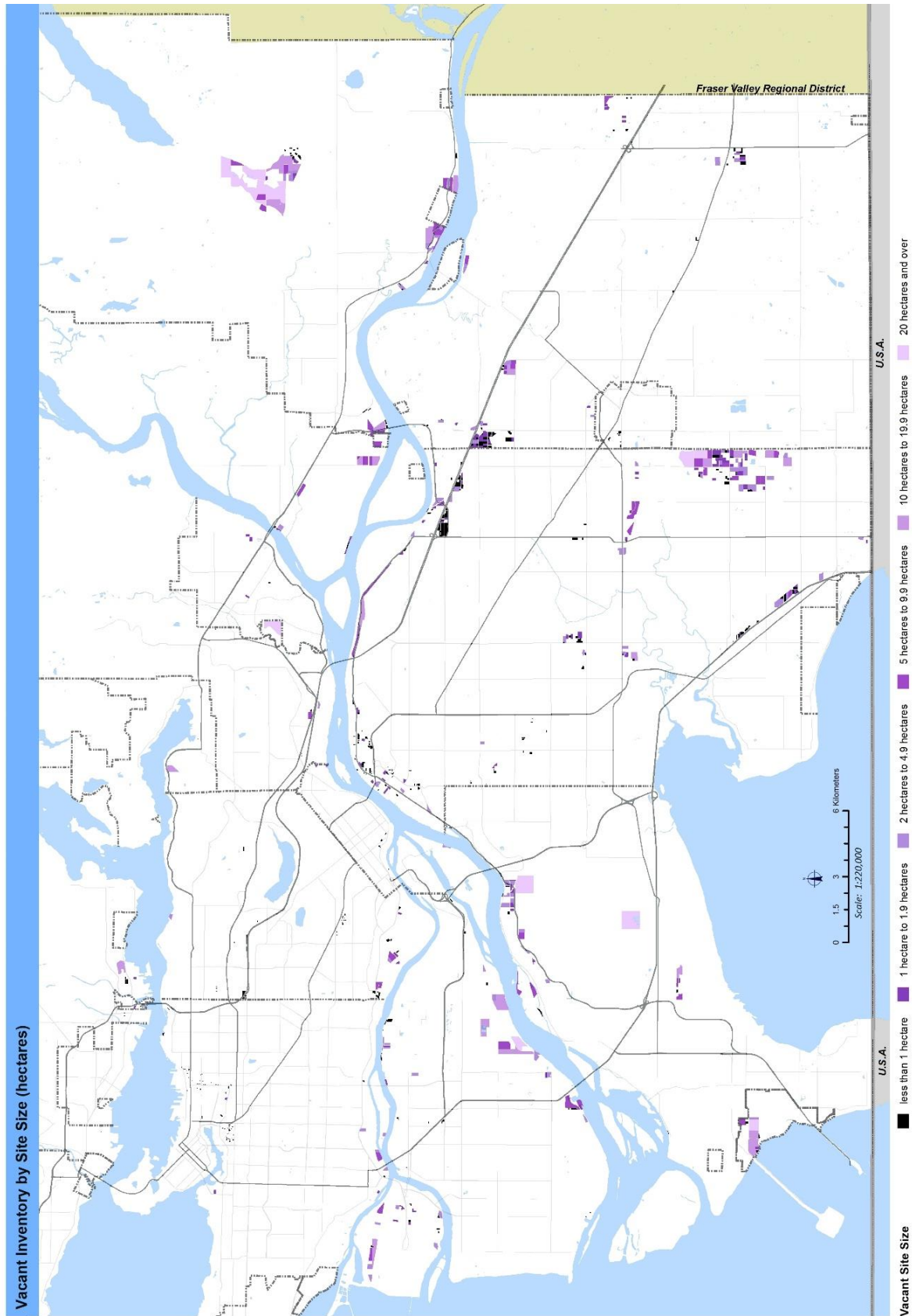
as illustrated in the figure. Particularly, of the 1,312 ha of ‘Other / Vacant’ privately owned lands, 360 ha (27%) were large sites (20+ ha).



In terms of ‘Other / Vacant’ lands, 62% were privately owned, 11% owned by the federal government, 5% by the provincial government, and 18% by municipal / regional governments, as illustrated in the following figure and map.



Map 4.12: Other/Vacant Inventory by Site Size Range



4.4.5 Detailed Vacant Inventory Analysis

The 'Other / Vacant Lands' total 2,115 ha, distributed over seven different categories. Three of the categories (totalling 212 ha) are unique in that they are associated with airports and the Port, which have different jurisdictions, tenures, and user needs. There are also lands within the Inventory used for Agriculture (139 ha), Residential (223 ha), and Resource Extraction (232 ha) that are designated for industrial uses and generally expected to convert to such cover time.

This subset of the Inventory is detailed in the following tables, with notable observations:

- 56% were regionally designated 'Industrial', and 28% were designated 'Mixed Employment'.
- 29% of the 'Other / Vacant' land were in Surrey and 25% in Maple Ridge.
- Nearly all of the lands associated with port and airport were owned by the federal government.
- Of the 1,309 ha of 'Other / Vacant Land', 60% (791 ha) were privately owned.

Table 4.26: Other/Vacant Lands by Regional Designation and Detailed Land Use Classification

	General					Total
	Rural	Agricultural	Urban	Mixed Emp	Industrial	
Agriculture				133	6	139
Residential	19		42	115	47	223
Resource Extraction	9		5	18	200	232
YVR Airside / Groundside Vacant					62	62
Airports Vacant (excluding YVR)				21	10	31
Port Terminal Vacant			8		109	118
Vacant Land	154	31	69	310	744	1,309
Total	183	31	125	597	1,179	2,115

Table 4.27: Other/Vacant Lands by Municipality and Detailed Land Use Classification

Row Labels	Agriculture	Residential	YVR Airside /		Airports	Port	Total	
			Resource Extraction	Groundside Vacant	Vacant (excl. YVR)	Terminal Vacant		Vacant Land
Burnaby	0	5				3	31	39
Coquitlam		0	5				3	8
Delta		1	66		21	12	127	228
Langley City		3					1	3
Langley Township	4	71			10		87	172
Maple Ridge		27	102				398	527
New Westminster		0				1	2	3
North Vancouver District		1	1			1	18	21
Pitt Meadows			4				62	66
Port Coquitlam		2					34	36
Port Moody		0					11	11
Richmond		4	41	62		97	66	271
Surrey	135	102	13			1	365	616
Tsawwassen First Nations							84	84
Vancouver		6				3	18	27
Total	139	223	232	62	31	118	1,309	2,115

Table 4.28: Other/Vacant Lands by Detailed Land Use Classification and Ownership Type

	Private	Private - Railway	Crown Corp	Public - Federal	Public - Prov	Public - Muni/Reg	First Nations	Total
Agriculture	86			53				139
Residential	206				1	16		223
Resource Extraction	219	4	8		1			232
YVR Airside / Groundside Vacant				62				62
Airports Vacant (excluding YVR)	10					21		31
Port Terminal Vacant				118				118
Vacant Land	791	12	14	3	113	337	40	1,309
Total	1,312	16	22	237	115	374	40	2,115

5 Inventory Change Over Time

The Metro Vancouver 2020 Regional Industrial Lands Inventory was prepared to allow for comparison with past Inventories (namely the revised 2015 Inventory). Although using a consistent methodology, it is important to note that the Inventories use various data sources as well as in some cases professional judgment to estimate the Inventory as of a specific point in time. As the 2010 and 2005 Inventories used a different methodology than the 2015 (revised) and 2020 Inventories, comparing the more recent Inventories with older Inventories is not advised.

The work associated with the 2020 Inventory included some adjustments to the 2015 Inventory. Accordingly, the revised 2015 Inventory numbers included within this report have been adjusted from the previously published report to reflect the application of the edits to the methodology, and are thus more comparable with the 2020 Inventory results (see Appendix 10 for greater details).

5.1 Components of Change

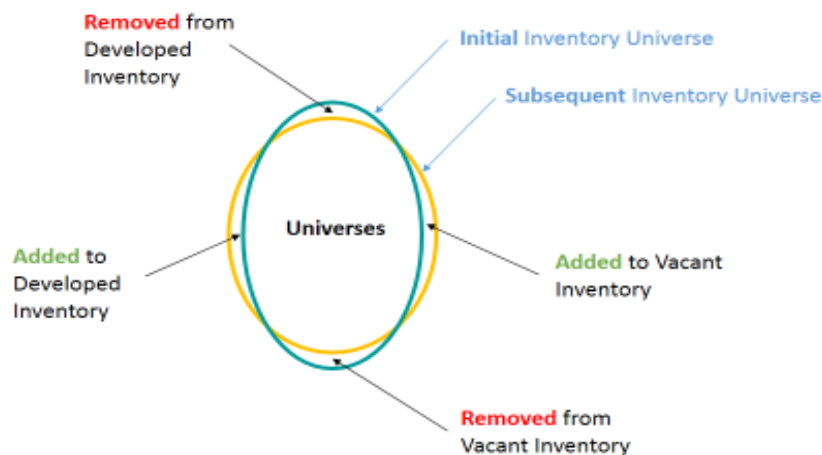
There are two sets of ‘moving parts’ associated with comparing multiple Inventories:

- Changes in total Inventory area (‘Lands Added’ and ‘Lands Removed’) between the periods; and
- Lands that became ‘Developed’ (i.e. absorbed) or became ‘Vacant’ between the periods.

In terms of net changes, there are both gross additions to the Inventory and gross removals. While 97% of the Inventory remained unchanged between 2015 and 2020, lands were added in some areas, and lands were removed in other areas.

The following figure conceptually illustrate that most of the ‘universe’ or scope of lands included in the Inventory remained constant between the 2015 and 2020 Inventories, however there were some changes. Some lands were added to, and some lands were removed from, the preceding 2015 Inventory. These land additions and removals included both ‘Developed’ and ‘Other / Vacant’ lands.

Figure 5.1: Conceptual Illustration of Changes in the Inventory Universes



In terms of changes in Inventory composition ('Developed' and 'Other / Vacant' status – as defined elsewhere in this report) between periods, the following figures conceptually illustrate that most lands retained their earlier classification, with some properties converting between developed or vacant classifications, and some properties were added or removed from the Inventory.

Figure 5.2: Conceptual Illustration of Changes in Inventory Developed and Vacant Areas

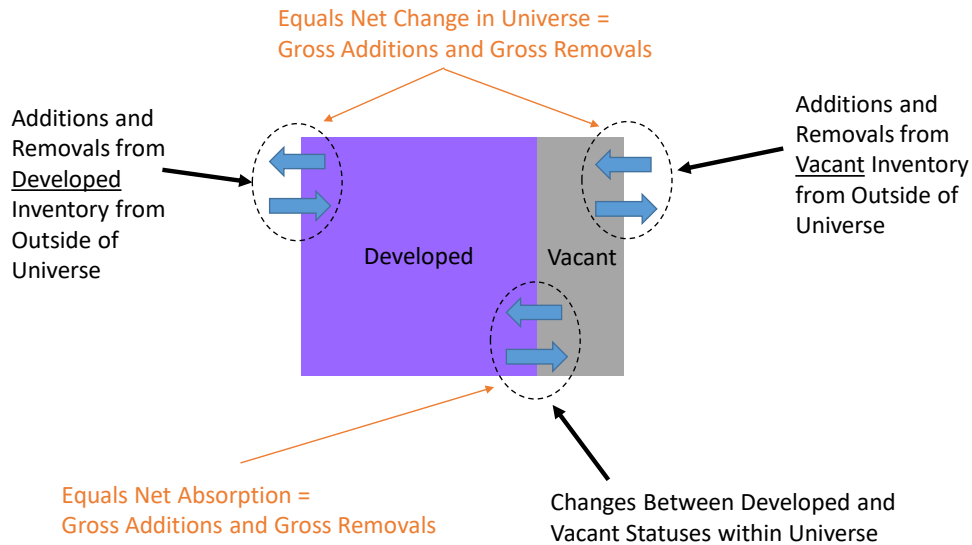
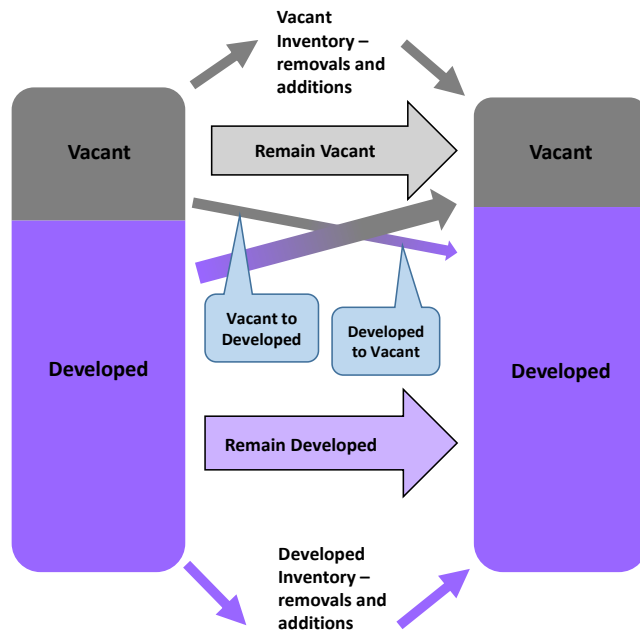


Figure 5.3: Conceptual Illustration of Changes in Inventory Composition



5.2 Revised 2015 Inventory

Along with preparation of the detailed 2020 Inventory, some refinements were made to the 2015 Inventory to maintain consistency and allow for comparison between the 2015 (revised) and 2020 results (but no changes were made to the 2010 and 2005 Inventories). The revised 2015 Inventory results reflect adjustments made to the original published Inventory that account for and neutralize varying municipal staff interpretation in comparison to the 2020 Inventory. All numbers in this report reflect the revised 2015 Inventory.

5.3 Geographic Areas of Change from 2015 to 2020

Between 2015 and 2020 there were some notable additions and removals to the Inventory. These changes in the study universe of industrial lands are independent of their land use status (i.e. 'Developed' or 'Other / Vacant'). These changes between Inventories are documented in the following series of tables.

323 ha (798 ac) of land were added to the Inventory, mostly in Maple Ridge, Delta, and Port Coquitlam, and 70 ha (174 ac) were removed from the Inventory. These two sets of changes resulted in a net increase of 252 ha (624 ac) of land over the 2015 to 2020 period.

(As an aside, since mid-2011 when *Metro 2040* was adopted to mid-2020, there has been a net reduction or conversion of 7.4 ha (18 ac) of 'Industrial' and 'Mixed Employment' regionally designated lands. Much of this change was from adjustments / refinements associated with processing municipal regional context statements received after the adoption of the regional growth strategy and was anticipated as part of the process of aligning municipal and regional plans.)

Table 5.1: Industrial Land Additions and Removals by Municipality, 2015-2020

Municipality	Lands Added		Lands Removed		NET Lands Added/Removed	
	Area (Ha)	Area (Ac)	Area (Ha)	Area (Ac)	Area (Ha)	Area (Ac)
Burnaby	0	1	13	33	-13	-32
Coquitlam	7	17	2	5	5	12
Delta	63	155	2	5	61	150
Langley City	0	0	2	4	-2	-4
Langley Township	12	29	7	18	5	12
Maple Ridge	182	449	0	0	182	449
New Westminster	0	0	11	27	-11	-27
North Vancouver City	0	0	0	1	0	-1
North Vancouver District	3	7	4	9	-1	-3
Pitt Meadows	10	26	0	0	10	26
Port Coquitlam	30	75	3	8	27	67
Port Moody	0	0	1	4	-1	-4
Richmond	6	14	4	9	2	4
Surrey	11	26	13	33	-3	-7
TFN	0	0	3	8	-3	-8
Vancouver	0	0	4	10	-4	-10
Total Added Lands	323	798	70	174	252	624

Major additions to the Inventory occurred in parts of Maple Ridge, some of which are located away from the region's major transportation infrastructure network.

Table 5.2: Notable Industrial Land Additions by Major Industrial Area, 2015-2020

Municipality	Area (Ha)	Area (Ac)
Maple Ridge (256th Street Industrial Area)	109	270
Maple Ridge (Southeast Waterfront)	70	174
Delta (Nordel)	63	155
Port Coquitlam (Mary Hill)	30	75
Pitt Meadows (Airport)	10	26
Surrey (Campbell Heights)	9	22
Langley Township (200 St Business Park)	7	18
Coquitlam (Pacific Reach/Cape Horn)	7	17
Richmond (Fraser Port)	6	14
Other	11	28
Total Added Lands	323	798

Of the 70 ha (174 ac) of lands removed from the Inventory, 19 ha (48 ac) or 27% were located within regionally identified Urban Centres. Notable additions to the Inventory occurred in parts of Burnaby (Still Creek), New Westminister (Queensborough), Surrey (Campbell Heights), and Langley Township (Willoughby).

Table 5.3: Notable Industrial Land Removals by Major Industrial Area, 2015-2020

Major Industrial Area	Area (Ha)	Area (Ac)
Burnaby (Still Creek)	11	26
New Westminister (Queensborough)	9	23
Surrey (Campbell Heights)	6	15
Langley Township (Willoughby)	5	13
North Shore	4	10
Surrey (South Westminister)	4	10
TFN	3	8
Port Coquitlam (Mary Hill)	3	7
Vancouver (Mt Pleasant)	2	6
Burnaby (Kingsway-Beresford)	2	5
Richmond (Brighouse/Van Horne)	2	5
Delta (Tilbury)	2	5
Other	16	38
Total Removed Lands	70	174

Lands were removed from the Inventory for several reasons, mostly due to municipal policy changes (such as OCP designation changes or lands being rezoned and developed for non-industrial uses), as shown in the following table.

Table 5.4: Reasons for Industrial Lands Removals, 2015-2020

Reason	Area (Ha)	Area (Ac)
Road Right-of-Way	15	36
Municipal Policy - Zoning Change	32	79
Municipal Policy - OCP Change	12	30
Municipal Policy - Zoning and OCP Change	11	28
Total Removed Lands	70	174

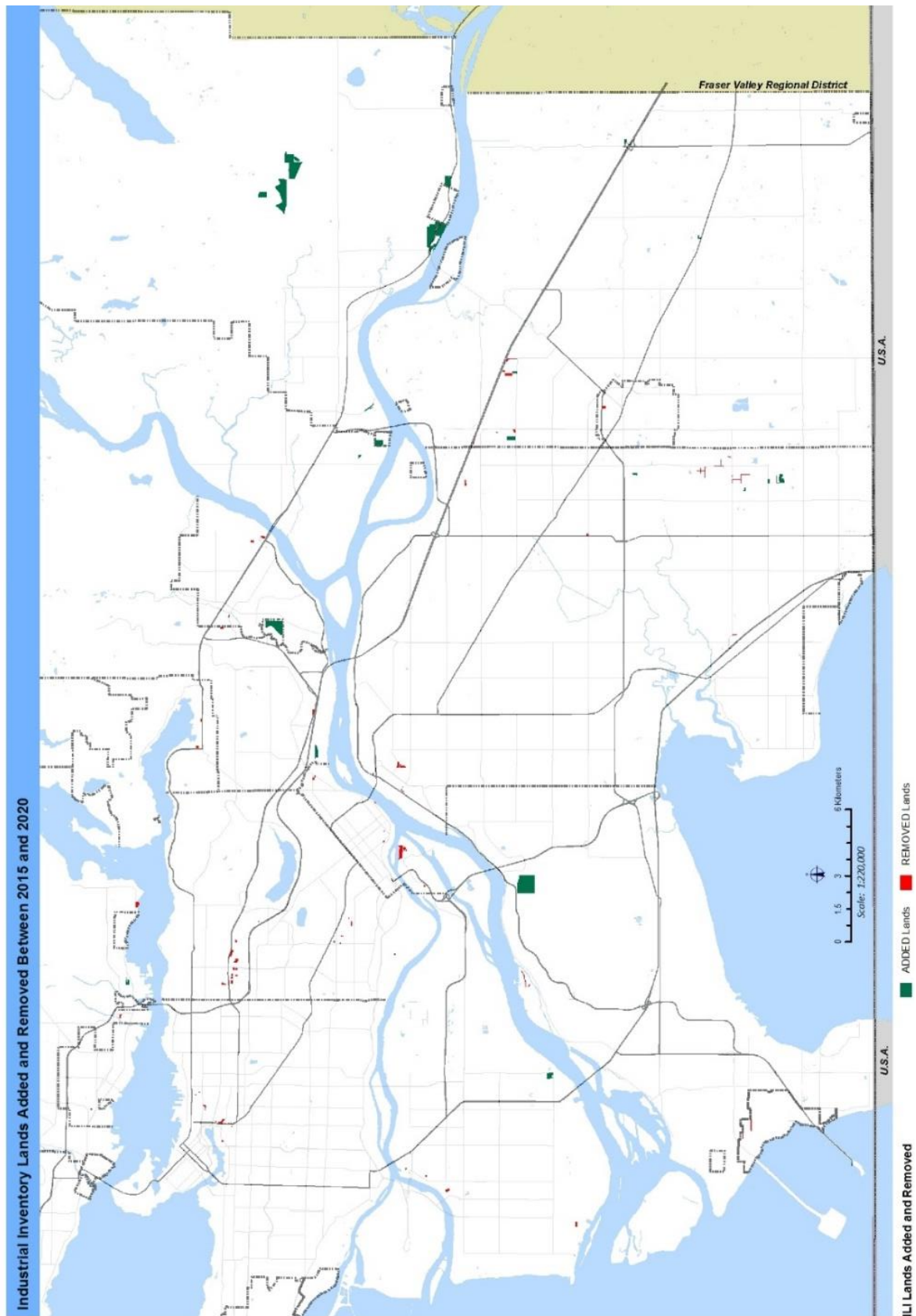
60% (43 ha) of the lands removed from the Inventory were regionally designated as ‘General Urban’, and therefore expected to turnover to a non-industrial use in the future. Unexpectedly however, 20% (14 ha) of the removals were regionally designated ‘Industrial’ and ‘Mixed Employment’, which are identified for industrial uses.

Table 5.5: Regional Designations of Industrial Lands Removals, 2015-2020

RGS Designation	Area (Ha)	Area (Ac)	Percent
Agricultural	0	0	0%
Con Rec	0	0	0%
General Urban	43	105	61%
Industrial	14	34	20%
Mixed Emp	14	34	20%
Total Removed Lands	70	174	100%

The following map shows the additions (in green) and removals (in red) to the Inventory lands between 2015 and 2020. Notable removals can be seen in Still Creek in Burnaby, Queensborough in New Westminister, Campbell Heights in Surrey, and Willoughby in Langley. Notable additions were in the 256th Street industrial area in Maple Ridge, Southeast Waterfront in Maple Ridge, Nordel in Delta, and Mary Hill in Port Coquitlam (on the Kwikwetlem Reserve).

Map 5.1: Inventory Lands Added and Removed Between 2015 and 2020



Of the 323 ha of lands added to the Inventory over the 2015-2020 period, 23 ha (7%) were 'Developed' by 2020, while 300 ha (93%) were added to the 'Other / Vacant' category (noting the different detailed categories). These newly added lands were mostly (79%) in the vacant land use classification, with an additional 9% being residential, as shown in the following table.

Table 5.6: Gross Lands Added to the 2020 Inventory by Land Use Classification

Developed Lands - Type of Use	Area (Ha)	% Share
Distribution / Warehouse	5	2%
General industrial	7	2%
Maintenance Yards / Operations Services	7	2%
Manufacturing / Production	2	1%
Outdoor Storage	1	0%
Processing / Handling of Natural Resources	2	0%
Sub-Total	23	7%
Vacant Lands - Type of Use	Area (Ha)	% Share
Agriculture	1	0%
Residential	29	9%
Resource Extraction	9	3%
Transportation Infrastructure - Port Terminal Vacant	6	2%
Vacant Land	256	79%
Sub-Total	300	93%
TOTAL	323	100%

5.4 2015 to 2020 Change in Inventories

This section compares the totals ('Developed' and 'Other / Vacant') for the 2015 (revised) and 2020 Inventories. Lands were both added to and removed from the 'Other / Vacant' and 'Developed' categories between the Inventory periods. It is important to note that this differs from 'absorption', which tracks actual lands that convert between 'Other / Vacant' and 'Developed' status over the period (see Section 5.5).

Table 5.7 shows the change between the Inventory totals, resulting in the following changes to the Inventory:

- a 5% (456 ha) increase in 'Developed' industrial lands (from 8,931 ha to 9,387 ha)
- a 9% (211 ha) decrease in 'Other / Vacant' lands (from 2,326 ha to 2,115 ha)
- a net increase of 245 ha (from 11,257 ha to 11,502 ha)

Table 5.7: Net Change in Inventories Between 2015 (revised) and 2020

Hectares	Revised 2015	2020	NET Change 2015-2020	Acres	Revised 2015	2020	NET Change 2015-2020
Developed	8,931	9,387	456	Developed	22,069	23,196	1,127
Vacant	2,326	2,115	(211)	Vacant	5,747	5,226	(521)
TOTAL	11,257	11,502	245	TOTAL	27,816	28,422	606

The following points further explain the changes in the Inventory over the 2015-2020 period:

- Of the 8,931 ha of 'Developed' lands in the 2015 Inventory, 8,674 ha (97%) remained 'Developed', 211 ha (2%) became 'Other / Vacant', and 46 ha (1%) were removed from the Inventory by 2020.
- Of the 2,326 ha of 'Other / Vacant' lands in the 2015 Inventory, 1,845 ha (79%) were still 'Other / Vacant' in 2020, 456 ha (20%) were 'Developed', and 24 ha (1%) were removed from the Inventory by 2020.

(Note: The data shown in Table 5.7 is different than the data shown in Table 5.8, where the latter only shows the lands within the Inventories converting from 'Other / Vacant' to 'Developed' (absorption) and vice versa over the 5-year period, and excludes lands added to and removed from the Inventories (both 'Other / Vacant' and 'Developed') over the 5-year period.)

5.5 2015 to 2020 Land Development / Absorption

This section explains industrial land absorption (i.e. development), which differs from additions and removals to the Inventory.

Net absorption reflects two components, for only the lands that were included in the 2015 (revised) Inventory to 2020:

- Gross lands that changed from 'Other / Vacant' status to 'Developed' status;
minus
- Gross lands that changed from 'Developed' status to 'Other / Vacant' status over the same period.

Together, these two gross components provide for a net absorption. Although most activity consists of lands going from 'Other / Vacant' to 'Developed', some 'Developed' lands do become vacant before redeveloping. It is important to note that this absorption of land represents industrial lands as defined in the report.

The Inventory does not consider lands in the process of being developed unless or until visible construction activity (i.e. buildings, improvements) has occurred at the time of the Inventory date. Accordingly, for lands that were purchased / leased with development plans but not yet built, they were classified as vacant -- including them as 'Developed' would yield a higher recorded development or land absorption over the period.

It is important to note that documented ‘absorption’ or development rates are not the same as land demand. If more lands were available, particularly large sites in desired locations, the amount of land consumed or absorbed would be greater.

The following summarizes the land absorption for the Inventory periods:

- From 2015 to 2020, there was a gross positive land absorption of 507 ha (1,253 ac), and a gross negative land absorption of 23 ha (58 ac), providing for a net of 484 ha (1,196 ac), or 97 ha (239 ac) per year on average.
- The average annual absorption in the previous periods was: 76 ha (188 ac) for 2010-2015 and 93 ha (230 ac) for 2005-2010.

Notably, the land absorption rate was lower between the 2005-2010 and 2010-2015 periods, as illustrated in the following figure and table, which is generally consistent with industrial building growth over the periods. This difference in land absorption by periods could potentially be due to significant development of large industrial areas in the former period, and in the latter period less land supply available for development, and more efficient development and use of lands.

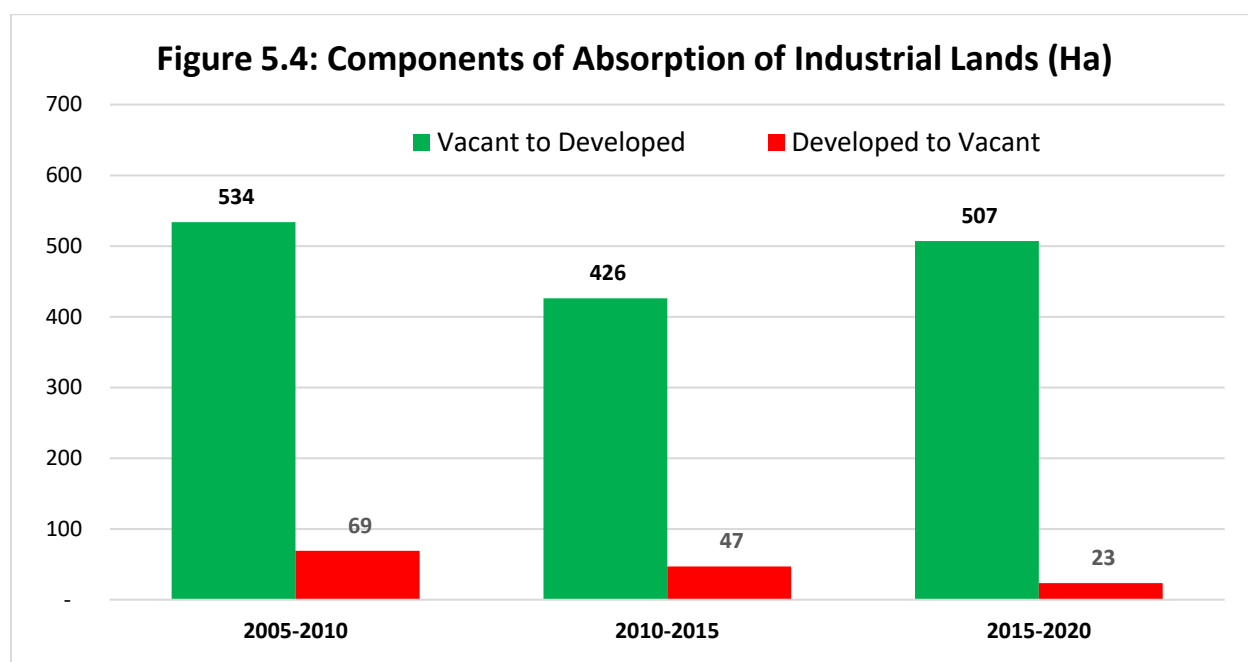


Table 5.8 shows the total lands (‘Other / Vacant’ and ‘Developed’) in both the 2015 (revised) and 2020 Inventories. The resulting difference between the 2015 and 2020 Inventories reflect two separate dynamics over the 2015-2020 period:

- Lands within the Inventories converting from ‘Other / Vacant’ to ‘Developed’ (absorption) and vice versa over the period; and
- Lands added to and removed from the Inventories (both ‘Other / Vacant’ and ‘Developed’) over the same period.

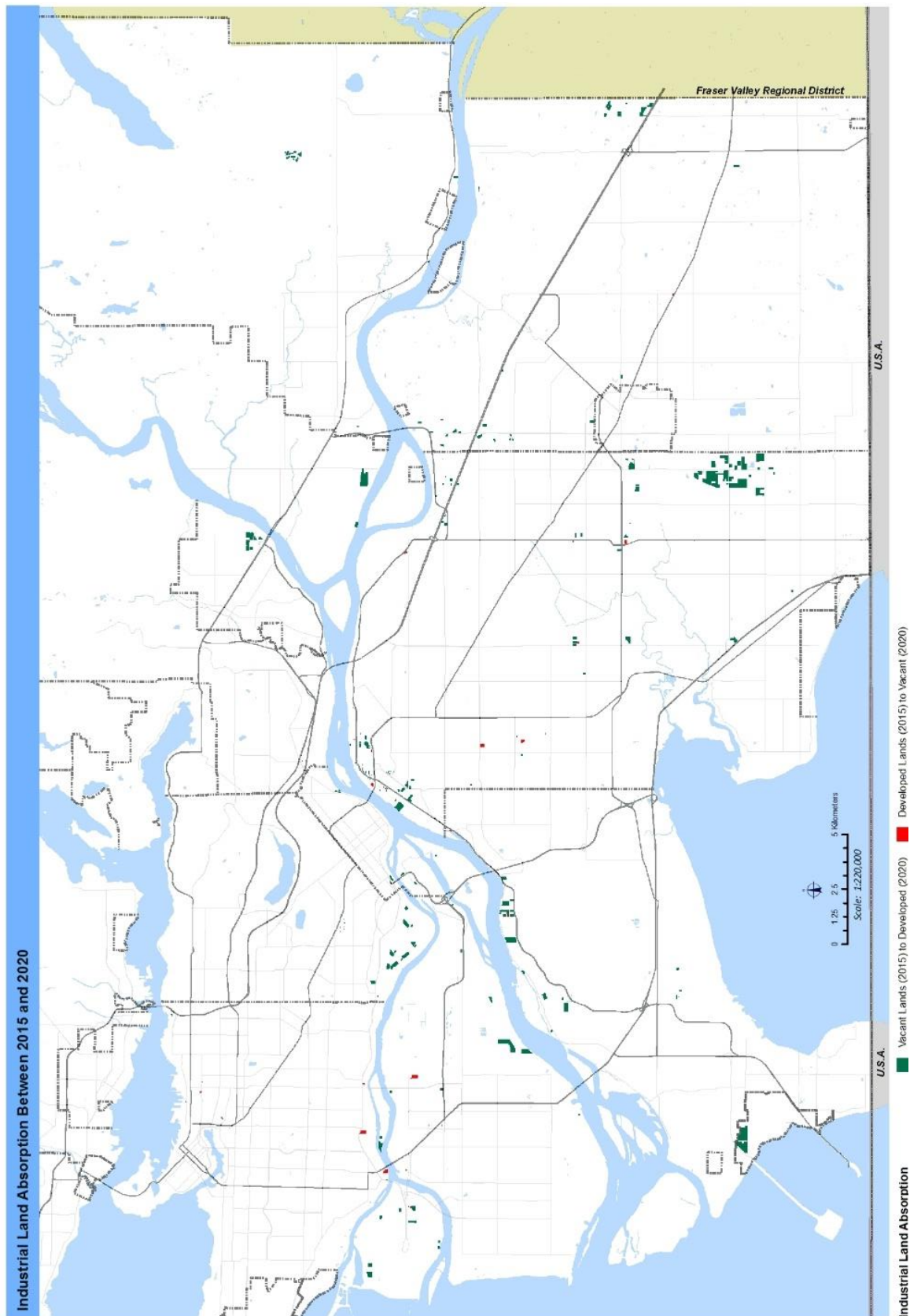
This differs from the data shown in Table 5.7, which shows the net change in Inventories between 2015 (revised) and 2020.

Table 5.8: Absorbed Inventory Lands, 2005-2010, 2010-2015, 2015-2020

<i>Hectares</i>	2005-2010	2010-2015	2015-2020
Other/Vacant to Developed	534	426	507
Developed to Other/Vacant	69	47	23
Net Absorption	465	379	484
<i>Average Annual Net Absorption</i>	93	76	97
<i>Acres</i>	2005-2010	2010-2015	2015-2020
Other/Vacant to Developed	1,320	1,054	1,253
Developed to Other/Vacant	170	116	58
Net Absorption	1,150	938	1,196
<i>Average Annual Net Absorption</i>	230	188	239

The following map shows the land absorption (positive and negative) activity between 2015 and 2020 as summarized in the above table. Absorbed lands are distributed throughout the region, most notably in Surrey (Campbell Heights and South Westminster), Langley Township (Willoughby and Gloucester), Delta (Tilbury), Burnaby (Big Bend), Port Coquitlam (Mary Hill), Maple Ridge (256th Street Industrial Area), and TFN and parts of Richmond.

Map 5.2: Inventory Lands Absorption Between 2015 and 2020



5.6 Types of Lands Absorbed between 2015 and 2020

For the purposes of the Inventory, land absorption is defined as the rate at which land is converted from 'Other / Vacant' status to 'Developed' status (as defined) for only the lands that were included in the 2015 (revised) Inventory. Over the 2015-2020 period, 507 ha (1,253 ac) of lands went from 'Other / Vacant' to 'Developed' status, while 23 ha (58 ac) of lands went from 'Developed' to 'Other / Vacant'. This yielded a net absorption of 484 ha (1,196 ac) of lands over the five-year period, for an annual average of 97 ha (239 ac).

The 507 ha of lands that were 'Developed' over the 2015-2020 period were distributed across the following land use classifications: 35% were added to the 'General Industrial' classification, followed by 20% in Distribution / Warehouse, 10% in Outdoor Storage, 8% in Mixed Industrial / Commercial, and 7% in Manufacturing / Production. The other categories, including some non-industrial uses, were smaller, as shown in the following table.

Table 5.9: Lands Developed over the 2015-2020 Period by Land Use Classification (as of 2020)

Type of Use	Area (Ha)	% Share
General industrial	178	35%
Distribution / Warehouse	99	20%
Outdoor Storage	53	10%
Mixed Industrial / Commercial	41	8%
Manufacturing / Production	38	7%
Transportation Infrastructure - Port Terminal Developed	23	5%
Transportation Infrastructure - YVR Airside / Groundside Developed	21	4%
Non-Industrial - Retail (small or medium-scale)	15	3%
Non-Industrial - Office	9	2%
Non-Industrial - Retail (vehicle dealerships)	6	1%
Processing / Handling of Natural Resources	5	1%
Infrastructure - Utilities	5	1%
Transportation Infrastructure - Rail Yards	4	1%
Transportation Infrastructure - Airports Airside / Groundside Developed (excluding YVR)	4	1%
Transportation - Parking	2	0%
Non-Industrial - Banquet Hall / Assembly	2	0%
Non-Industrial - Recreation	1	0%
Maintenance Yards / Operations Services	1	0%
TOTAL	507	100%

The amount of 2015 Inventory 'Other / Vacant' lands decreased by 531 ha (1,311 ac) during the 2015-2020 period: 507 ha (96%) became 'Developed' via absorption while 23 ha (4%) were entirely removed from the Inventory (due to municipal designation changes or land use changes).

5.7 Comparing Industrial Lands Inventory with Market Industrial Buildings Inventory

According to research from a local brokerage firm, the amount of tracked market industrial building floor space in the Metro Vancouver region was as shown in the following table for the noted years:

Table 5.10: Change in Building Floor Area Inventory

Building Inventory (mid year)	Total SQ FT	5 Year Change	Annual Average
2005	149,434,284		
2010	172,407,878	22,973,594	4,594,719
2015	186,173,719	13,765,841	2,753,168
2020	203,722,554	17,548,835	3,509,767

Source: Colliers Market Reports - End of Q2 reports.
Metro Vancouver Region, excluding Abbotsford.

The industrial building floor space growth rate for the 2005-2010 period was approximately 23.0 million sq ft; for the 2010-2015 period was 13.8 million sq ft; and for the 2015-2020 period 17.5 million sq ft. Within these five-year periods, the amount of development and absorption varied by year depending on a number of economic and market factors.

Over the period from 2015 to 2020, according to the 2020 Regional Industrial Lands Inventory there was industrial land absorption / development of 484 ha (1,195 ac).

The industrial building floor area increases over the three periods are generally in line with amount of industrial land developed for each period. These two data sets document the significant ongoing industrial development occurring in the region, along with some intensification, reflecting continued demand, on a limited land supply base.

However, it is not possible to accurately combine these two sets of numbers to calculate building/land density floor area ratios (FAR) due to a number of methodological and data limitation issues, namely:

- The growth in the amount of reported industrial building floor space is only that tracked by market reports, not all forms of industrial development.
- The growth in the amount of reported industrial building floor space occurred on both lands that were previously developed (infill / redevelopment) and newly developed lands (absorbed).
- Net land area is less than gross land area.

5.8 Possible Future Industrial Land Adsorption

This report is not intended to provide a detailed industrial land demand and development or absorption forecast. However, a general ‘theoretical’ estimate of the number of years of potential supply can be made using historical demand and absorption rates.

Past trends and input from the development and brokerage industry have generally suggested that historic rates of industrial land absorption have been between 100 and 160 ha (250 and 400 ac) per year. A 2015 study for the Port of Vancouver indicated that demand continues to be strong for industrial land, and annual demand for logistics industrial lands is forecast to increase from 40 ha (100 ac) to 65 ha (160 ac) or 85 ha (210 ac) due to increases of container throughput associated with the anticipated completion of Roberts Bank Terminal 2.

The Port’s study estimated a need for 1,000 ha (2,500 ac) of well-located developable industrial land by 2035 for Roberts Bank Terminal 2, even with dramatically improved operational efficiency, plus 1,200 ha (3,000 ac) for non-port industrial land demand. Some of the demand for industrial lands is trade related, and some is local serving or not directly dependent on the transportation network.

A 2021 report by Colliers consulting estimated industrial land demand during the 2018-2020 period at 95 ha (235 ac) per year, and noted that employment-based industrial demand forecast estimated the potential need for between 80 and 110 ha (200 - 275 ac) of industrial land per year between 2020 and 2050.

Applying estimated industrial land absorption rates to the 2020 Inventory lands can be used to estimate the hypothetical lifespan of the available lands. Using the estimated ‘Other / Vacant’ Inventory of 2,100 ha (5,220 ac), and simply assuming an annual land absorption of 100 ha (250 ac), for example, provides for slightly over 20 years of land supply.

However, a complex set of factors affect industrial land supply, demand, use, utilization, and absorption rates, and thus there are a number of important qualifiers with any estimates:

- Potential development constraints could affect the availability and development potential of the industrial land supply. The Inventory of ‘Other / Vacant’ lands includes some lands with non-industrial uses as well as site challenges that may limit their development and yield.
- The development potential of a portion of the lands will be hindered by factors such as location, current uses, accessibility, lot assembly, market considerations, soil conditions, need for pre-loading, or high development costs.
- Based on these various constraints, the possible supply of net developable lands will be lower than the theoretical gross supply and is not determined in this report. (The references in the Inventory and report are all to gross land areas, not net areas.)
- Some lands in the Inventory classified as ‘Other / Vacant’ were in the development process and are already ‘spoken for’, in some cases with specific tenants proposed or building on speculation. These allocated lands may not be available for future development.

- Industrial lands in the region have different location and site attributes, and thus potential for different types of industrial users. Thus, not all of the industrial lands are usable or available for all forms of industrial users. This is particularly the case for trade-oriented uses that need access to major transportation infrastructure.
- If future port trade activity and the volume of container traffic grows at a faster pace, the region could see stronger demand and further scarcity of industrial lands would occur sooner.
- This lifespan calculation would be further impacted if existing industrial lands are converted to other uses.
- On the other hand, if intensity and redevelopment increases, land would be needed at a slower rate.
- Similarly, if additional industrial lands were added to the Inventory, the supply of the (enlarged) Inventory could be extended.

Furthermore, a buffer of free space is required to accommodate redevelopment and vacancy and other forms of transition. As land demand and development reaches saturation or full capacity, the remaining supply will include smaller, scattered remnant parcels that may not be viable for larger industrial developments due to limited size, site constraints, and/or poor location and access.

At the same time however, land absorption rates will also be affected by the redevelopment of under-utilized properties and intensification of developed industrial areas, which could extend the lifespan of the land supply.

Further study of utilization, development, redevelopment and intensification of industrial lands, as well industrial land demand, possibly by type or sector, could be completed in separate studies.

6 Conclusion

The Metro Vancouver 2020 Regional Industrial Lands Inventory provides a comprehensive summary of the quantity and quality of industrial and associated lands in the Metro Vancouver region as of mid-2020. This work supports the implementation and objectives of the regional growth strategy and Regional Industrial Lands Strategy to protect and intensify industrial lands. Inventory highlights, key findings, and possible further work are outlined in the following sections.

6.1 2020 Inventory Highlights

Building on past Inventories completed for 2005, 2010, and 2015, the 2020 Regional Industrial Lands Inventory quantifies the Metro Vancouver region's lands as follows:

- In mid-2020 there were 11,502 hectares (28,422 acres) of lands within the Inventory study universe, as defined.
- 82% (9,387 ha) of lands were 'Developed' and 18% (2,115 ha) were 'Other / Vacant', as defined.
- Despite industrial lands being earmarked in municipal plans / policies for 'industrial use', the notion of 'Developed' does not imply all are (fully) developed and used for 'industrial purposes'. 'Other / Vacant' includes lands that have non-industrial uses. These uses impact the industrial capacity of the lands.
- Most of the lands in the Inventory are located in the southern and eastern parts of the region: 22% in Surrey, 15% in Richmond, and 14% in Delta / Tsawwassen First Nation.
- 40% of lands were classified as 'Building Intensive Industrial' use, with a range of industrial uses, along with associated accessory uses.
- 25% of the lands were used for 'Large Scale Infrastructure / Transportation' (utilities, port, airport, rail yards), which are not tracked by the market. The Inventory also included lands with non-industrial uses such as 'Retail' (4%) and 'Commercial' (4%).
- Of the 'Other / Vacant' lands in the Inventory, 3% were used for 'Resource Extraction', 2% for 'Residential', 1% for 'Agriculture', and 11% were undeveloped or fully vacant. These lands will serve as the future supply of industrial development.
- In terms of site sizes, 24% of 'Other / Vacant' industrial lands were on sites larger than 20 ha (50 ac), which are often associated with trade-oriented uses, although some sites may not be well-located for trade-oriented uses. The available site size impacts the types of industrial users that can be accommodated.
- Long-term protection in the form of regional and/or municipal policy for industrial lands varies, with 89% of the Inventory regionally designated as either 'Industrial' (67%) or 'Mixed Employment' (22%). At the municipal level, 82% were both zoned industrial and designated industrial. Of the 'Developed' lands, most (85-95% depending on the land use) were protected with both municipal industrial designation and industrial zoning. Some 3% (390 ha) of the Inventory had municipal industrial zoning but not municipal industrial designation, thus are at greater risk for conversion into non-industrial use in the coming years.

6.2 Notable Changes Between 2015 and 2020

Change in Inventory Universe Size

- In terms of inclusion (additions) or exclusion (removals) from the Inventory universe (which is separate from 'vacant' or 'developed' land use status) between 2015 (revised) and 2020: 323 ha (798 ac) of land were added, and 70 ha (174 ac) were removed. These two sets of changes resulted in a net increase of 252 ha (624 ac) of land over the five-year period.
- Most of the Inventory additions occurred in: Maple Ridge, Delta, and Port Coquitlam. Notable removals from the Inventory occurred in: Still Creek in Burnaby, Queensborough in New Westminster, Campbell Heights in Surrey, and Willoughby in Langley.
- Lands were removed from the Inventory due to a number of reasons, but mostly municipal policy changes (such as OCP designation changes or lands being rezoned and developed for non-industrial uses). Of the 70 ha (174 ac) of lands removed from the Inventory, 19 ha (48 ac) or 27% were located within regionally identified Urban Centres.

Change in Inventory 'Developed' and 'Other / Vacant' Lands Components

- Of the 8,931 ha of 'Developed' lands in the 2015 Inventory (revised), 8,674 ha (97%) remained 'Developed', 211 ha (2%) became 'Other / Vacant', and 46 ha (1%) were removed from the Inventory by 2020.
- Of the 2,326 ha of 'Other / Vacant' lands in the 2015 Inventory (revised), 1,845 ha (79%) were still 'Other / Vacant', 456 ha (20%) were 'Developed', and 24 ha (1%) were removed from the Inventory by 2020.
- Of the 323 ha of new lands added to the Inventory over the 2015-2020 period, 23 ha (7%) were 'Developed' by 2020, while 300 ha (93%) were added to the 'Other / Vacant' category (noting the different detailed categories). These newly added lands were mostly (79%) in the vacant classification, with an additional 9% being residential and 6% on Port terminal lands.
- From 2015 to 2020, there were the following changes to the Inventory:
 - a 5% (456 ha) increase in 'Developed' industrial lands (from 8,931 ha to 9,387 ha)
 - a 9% (211 ha) decrease in 'Other / Vacant' lands (from 2,326 ha to 2,115 ha)
 - a net increase of 245 ha (from 11,257 ha to 11,502 ha)

Industrial Lands Absorption

- In terms of absorption (vacant lands becoming developed, or vice versa) over the 2015 to 2020 period, 507 ha (1,253 ac) went from 'Other / Vacant' to 'Developed' status, while 23 ha (58 ac) of lands went from 'Developed' to 'Other / Vacant' status. This yielded a net absorption of 484 ha (1,196 ac) of lands over the five-year period, for an annual average of 97 ha (239 ac).
- The annual average net absorption of 97 ha during the 2015-2020 period was higher than the previous 2010-2015 and 2005-2010 periods where it averaged 76 ha and 93 ha, respectively.
- The amount of 'Other / Vacant' lands decreased by 531 ha (1,311 ac) during the 2015-2020 period: 507 ha (96%) became 'Developed' via absorption, while 23 ha (4%) were entirely removed from the Inventory (due to municipal designation changes or land use changes).

6.3 Important Considerations

Inventory methodology limitations are important considerations

The land use classification definitions reference the predominant or primary use of the site, including normally associated on-site accessory / ancillary uses (including parking and loading areas), as of mid-2020. Properties may include multiple or overlapping and non-discrete uses, in which case the predominant use is considered for the classification.

The classification process cannot be perfectly accurate, given the variety of different data sources and currency. This limitation in terms of selecting a single classification for each site is particularly acute in cases where there is a wider range of uses on lands or multiple level buildings.

The 2020 Inventory includes 30 detailed land use classifications, which are in some cases consolidated into 7 categories for reporting, spread over 9 sub-regions. Current land use classifications are independent of future-oriented land use designations / policies.

Qualitative attributes of lands matter

The Inventory comprises lands used and intended for industrial. The Inventory includes traditional and new types of industrial activities, quasi-industrial functions, and non-industrial uses on the lands. This may be in the form of various industrial uses of different types and scales; infrastructure and utilities that are not tracked by the market; commercial and retail uses that may have been pre-existing in an area or added more recently; and vacant and holding uses that may be temporary until the lands are developed for industrial as intended in the relevant land use plans.

It is important to note that the lands inventoried and amounts reported are gross areas; various types of constraints or limitations will reduce the net developable amount of land.

There is a wide range of types of industrial lands and industrial uses, which have different attributes and user needs. Industrial lands are not homogeneous and readily interchangeable or replaceable. The quality of lands, such as attributes like size, location, and site features, are as important as quantity of lands. For example, there may be vacant industrial lands available, but if they are located far away from major transportation infrastructure or have topographic constraints, it may not be viable for some or many types of industrial users. Thus, nuance is required when reviewing the statistics.

The 'Other / Vacant' lands category includes both lands that are completely vacant, and some other temporary holding uses such as agricultural, residential, and resource extraction, which may eventually be redeveloped in the form of industrial.

At the same time, 'Developed' lands have opportunity over time to redevelop to higher density / intensity forms of industrial buildings / uses. Industrial intensification / densification is a means to increase the industrial capacity of lands in a region with a limited land supply.

Increasing amounts of industrial lands are used for non-industrial purposes

Conversion of industrial lands can occur in different ways. Some industrial lands are re-designated and removed from the Inventory as per municipal plans, while other lands with flexible industrial designations are rezoned to allow for non-industrial uses. Some of these other types of uses support industrial activities, while others may threaten industrial areas, such as commercial and retail beyond those accessory or supporting industrial uses.

Some municipal plans include 'mixed employment' designations and zones that permit a wide range of industrial and commercial uses, which allows for more non-industrial uses in industrial areas, such as stand-alone retail, office, and other commercial. Allowing non-industrial uses in industrial areas reduces the land supply for industrial users and also can increase land prices and create land-use conflicts. These issues can destabilize industrial areas and compromise the ability for industrial growth.

Continued competing priorities for limited lands

The Metro Vancouver regional growth strategy and Regional Industrial Lands Strategy include industrial and other long range regional planning goals, such as accommodating population and employment growth, focusing commercial and housing development in Urban Centres, protecting agricultural and environmental lands, and supporting sustainable transportation forms. Because of these multiple objectives, at both the regional and local levels, there are in some cases competing or even conflicting policy priorities. For example, while protecting industrial lands is important, development of lands for housing and employment in Urban Centres and near rail rapid transit stations is also important.

Most but not all industrial lands are secured for long-term protection

Municipal policies (land use designations and zoning) and regional land use designations secure the long-term industrial use of industrial lands. These protective regional designations cover 82% of the lands in the Inventory. Lands that do not have such policy protection are more likely to convert and redevelop to other uses, particularly lands located in Urban Centres. Although in some cases this change may be consistent with local and regional plans, such conversions further reduce the supply of lands available for industry.

Lands added to and removed from the Inventory have different locational and site attributes

From 2015 to 2020, there was a net increase in the Regional Industrial Lands Inventory of 245 ha. During this period, 323 ha of land were added to the Inventory, mostly in Surrey, Langley, and Maple Ridge, and 70 ha were removed from throughout the region.

This figure reflects the fact that the amount of 'Other / Vacant' lands decreased by 9% (211 ha); some of which became 'Developed' (507 ha) and some of which were removed from the Inventory due to conversion to other uses (23 ha). Lands were removed from the Inventory due to a number of reasons, but mostly due to municipal policy changes (such as OCP designation changes or lands being rezoned and developed for non-industrial uses).

Much of the lands added to the Inventory were in locations not well served relative to the region's major transportation infrastructure networks / goods movement corridors nor have other key attributes desired by the market, whereas some of the lands removed had good accessibility. This reiterates the point that lands do not all have the same attributes, and quantitative as well as qualitative considerations are both important.

The conversion of industrial land reduces opportunities for industrial development and industrial business expansion, and the limited land supply and higher land prices may push some industrial activity to other jurisdictions, with transportation, economic, employment, and taxation implications for the region.

Few available large sites for 'trade-oriented' logistics uses

There are few vacant sites available for 'trade-oriented' logistics users, namely large sites with minimal constraints and close to major transportation infrastructure. Most of the 'best' sites have already been developed. More industrial development, particularly logistics related activities occurring at increasingly farther away locations relative to the port terminals due to lack of available closer lands, may create longer truck trips (drayage) and associated traffic congestion and environmental impacts.

More industrial land intensification is expected over time

Most of the developed lands are substantially used, with limited immediate opportunity for redevelopment and intensification. Nevertheless, as these lands redevelop there will be potential to densify and intensify. In some cases, abutting smaller properties can be consolidated and redeveloped in order to create larger sites for larger tenants.

The industrial land absorption rate declined due to limited raw land supply

The net land absorption (lands changing from 'Other / Vacant' to 'Developed' status) was 484 ha over the 2015-2020 period, or 97 ha per year on average. This rate was higher than the previous periods of 2005-2010 (average annual absorption rate of 93 ha) and 2010-2015 (76 ha). However, it is important to note that although recorded development / absorption activity is a reflection of industrial demand, it is in fact limited by the amount of land supply, so it is not a true reflection of total demand. If more lands were available, more lands would be developed.

Difficult to estimate lifespan of available vacant lands

Assumptions about the future absorption rate impact the calculation of the estimated lifespan of the existing supply of industrial lands. The amount of development will be impacted not just by demand but also increasingly by the limited supply of available vacant industrial lands that can be brought to market, as well as redevelopment and intensification activity. Using a theoretical absorption forecast model, the 'Other / Vacant' industrial land supply might be substantially absorbed in the 2030s. However, it is important to note that before full depletion, the remaining land supply would be small, scattered parcels that would not be viable for larger industrial development.

6.4 Further Study Topics

The 2020 Regional Industrial Lands Inventory can be considered and analyzed through different ‘lenses’ or ‘filters’ from different perspectives. Accordingly, building on the Inventory results, further study is possible, such as: industrial intensification, market readiness, regional land use assessment, industrial typologies, and other topics related to industrial lands, employment, economy, and transportation.

Intensification / Redevelopment Potential

Redevelopment and intensification are also an important way to extend the lifespan of the limited supply of industrial lands in the region. Further work can identify the lands with the greatest potential for redevelopment and intensification / densification. Specifically, this could consider and categorize the different factors that impact the potential of industrial lands to redevelop and intensify.

Market Readiness Timing

Not all ‘vacant’ lands can be readily developed in the short-term. Further work can categorize the different types of constraints / opportunities and considerations to estimate ‘market readiness’ or potential timing for the industrial development of lands.

This analysis could supplement reports that review in detail a sub-set of the Inventory in terms of site specific constraints and development potential. The methodology for the analysis consists of assessing and categorizing the development potential of ‘vacant’ industrial lands by select features.

Regional Land Use Assessment

A regional land use assessment would comprise preparing a regional ‘land budget’ model of current supply and anticipated demand by land use category, for all land uses not just industrial. The technical assessment, prepared in collaboration with member jurisdictions and other stakeholders, would look to identify the ‘best’ locations for uses / typologies based on land capacity and a set of criteria (current and future). The comprehensive regional land use assessment would further enhance the understanding of the lands in the region by attribute, use potential (current supply) and land needs criteria (long-term demand), so as to support regional growth planning. The assessment could result in identifying opportunities for more optimized locations and uses of land to support regional policy objectives, infrastructure investments, refine growth targets, and inform policy changes.

Industrial Land Typologies

Develop and define industrial land typologies and their associated characteristics to provide for a refined and nuanced understanding of the industrial lands in the region, as well as of the needs of industrial users by different sectors. By defining industrial land typologies and associated intensity measures, this work could support the development of a more accurate and realistic understanding of the industrial lands reflecting the different users of land, and how this relates to possible changes in land uses.

In some cases these typologies are somewhat linear, as in a continuum / spectrum, from 'lower intensity / density' to 'higher intensity / density', while for others there are more variables and simple singular measures do not tell the full story.

Industrial Employment

Industrial lands contain over one-quarter of the employment in the region. The form of industrial activity and associated employment types and densities are evolving with the changing economy. Some forms of industrial uses, such as modern warehouses, have efficient operations supported by automation and fewer employees, whereas other types of industry, such as manufacturing and assembly, have a much greater density of employees (per building floor space or per land area). These industry trends could be further studied to determine the implications on industrial land demand and uses.

Other Potential Topics

Other areas for potential further study include:

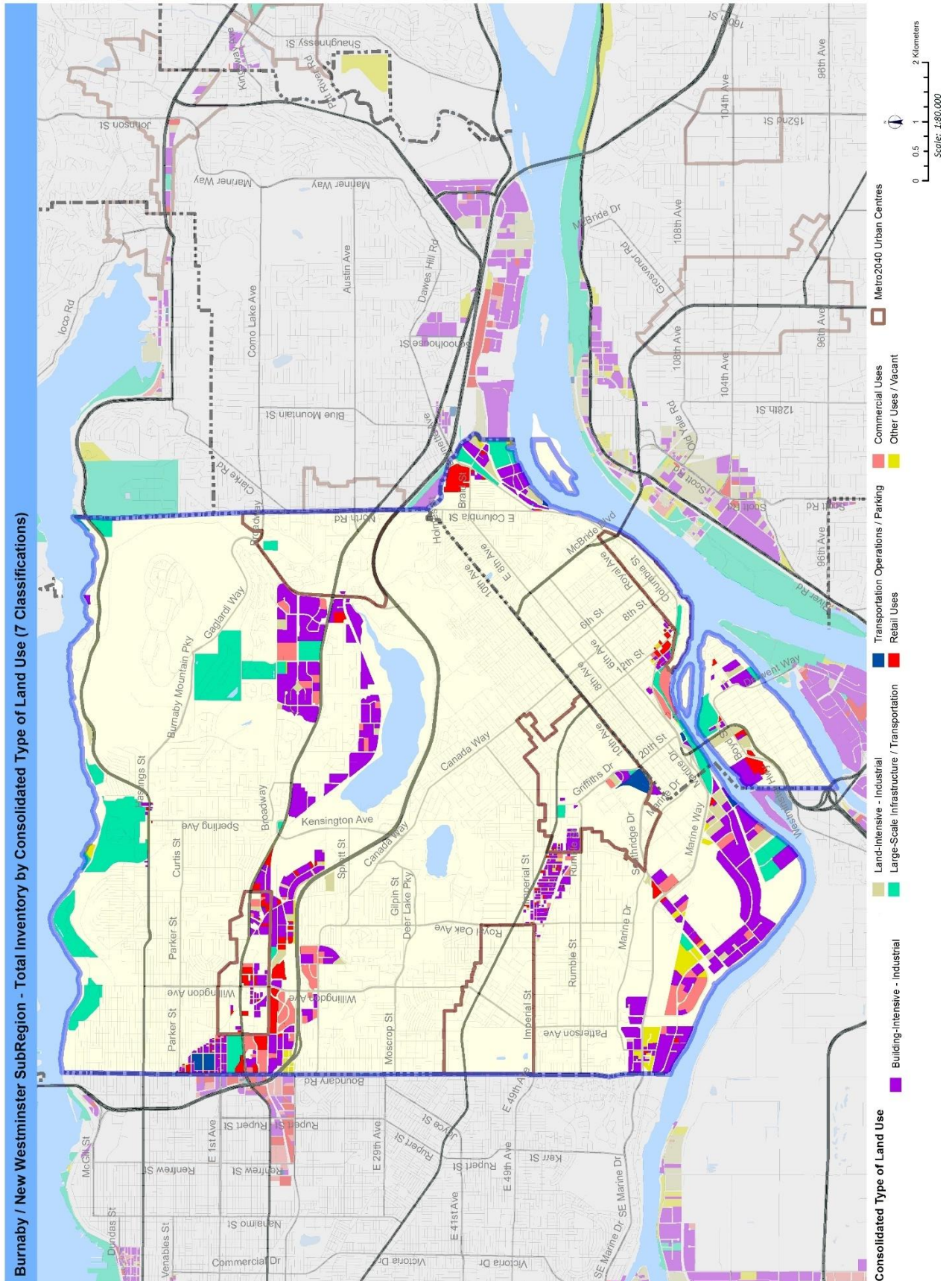
- Industrial land demand scenarios and absorption forecasts
- Quantify economic impact of industrial land development and use activities
- Industrial economic and employment activities lost to other jurisdictions
- Goods movement / logistics transportation infrastructure supporting industry
- Growth of e-commerce impacts on industrial lands
- Comprehensive study on origins and destinations to find potential efficiencies in the system
- Document employment on industrial lands to provide a better understanding of trip generation
- Industrial parking supply and demand
- Industrial lands governance experiences in other jurisdictions
- Innovative building design examples / best practices

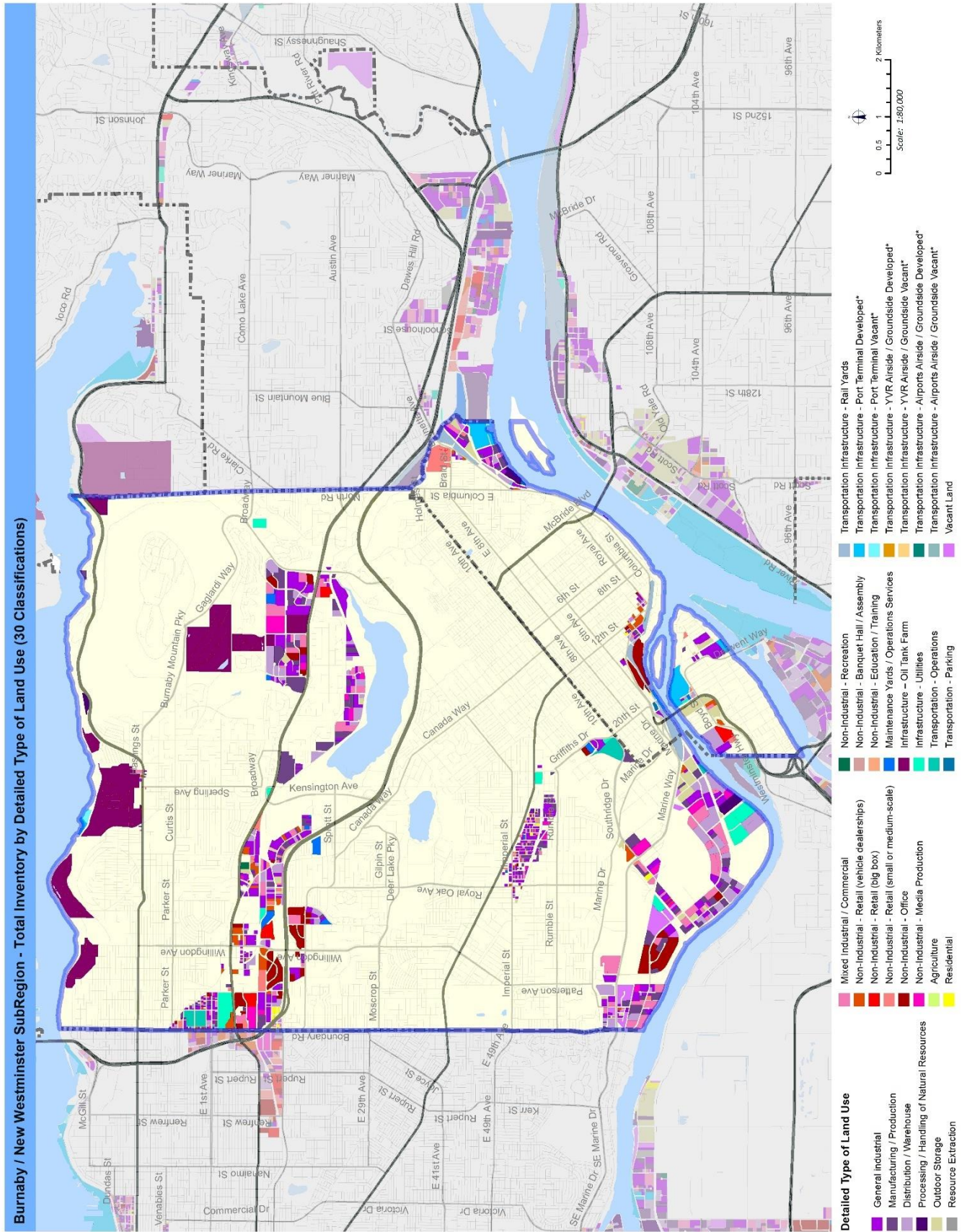
6.5 Closing

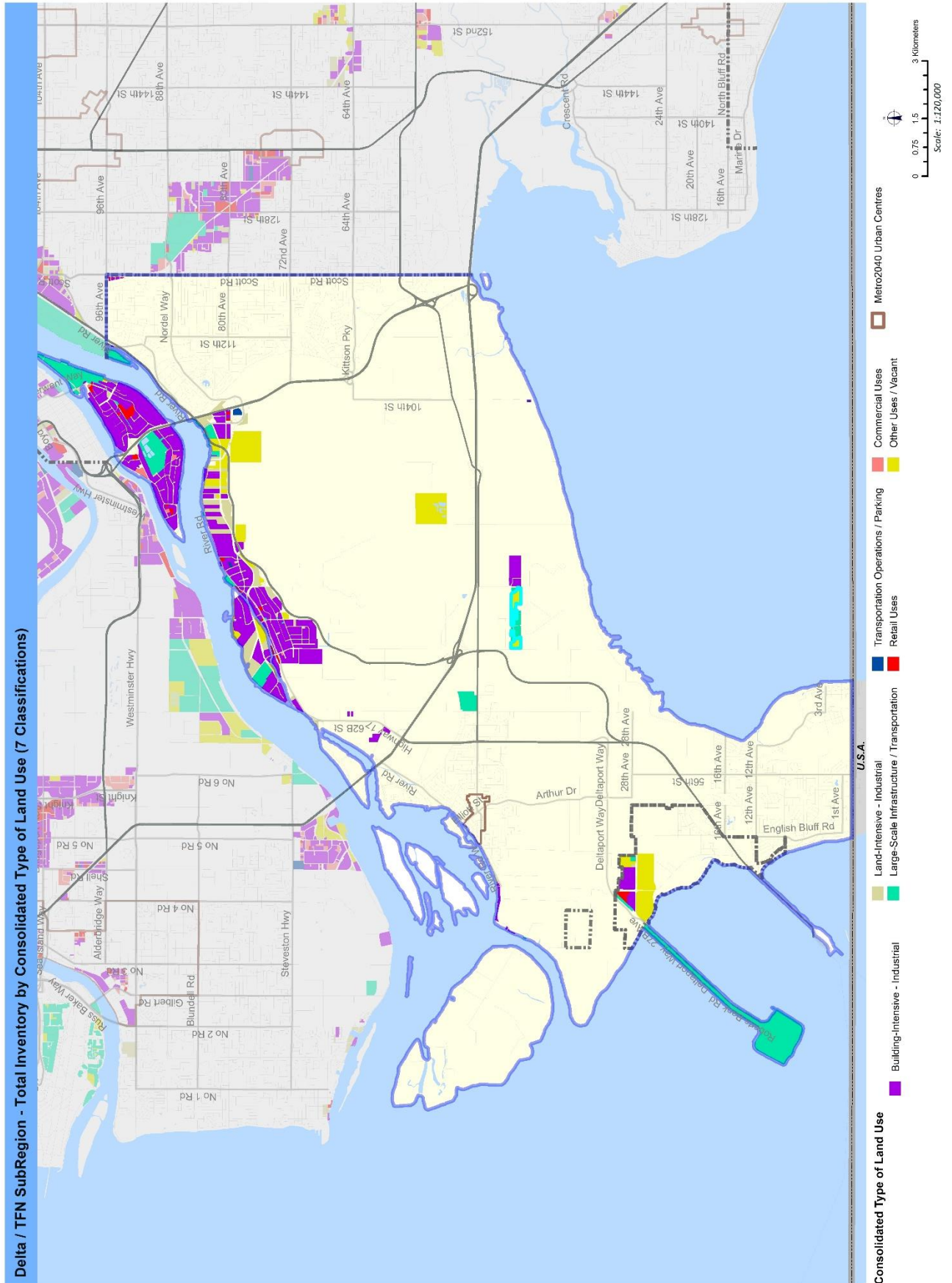
Metro Vancouver is a high growth region and the documentation and protection of industrial land is one of many important regional objectives. Undertaking the 2020 Regional Industrial Lands Inventory entailed working with member municipalities, agencies, and industry to create an updated and detailed inventory of industrial and associated lands in the region. The Inventory results can assist in advancing the implementing of the regional growth strategy and the Regional Industrial Lands Strategy, support municipalities in their efforts to protect and intensify industrial lands, and provide public agencies and the development community with additional information about available industrial lands and opportunities. The Inventory will be updated periodically and the results will be used as the basis for further analysis, information sharing, and engagement.

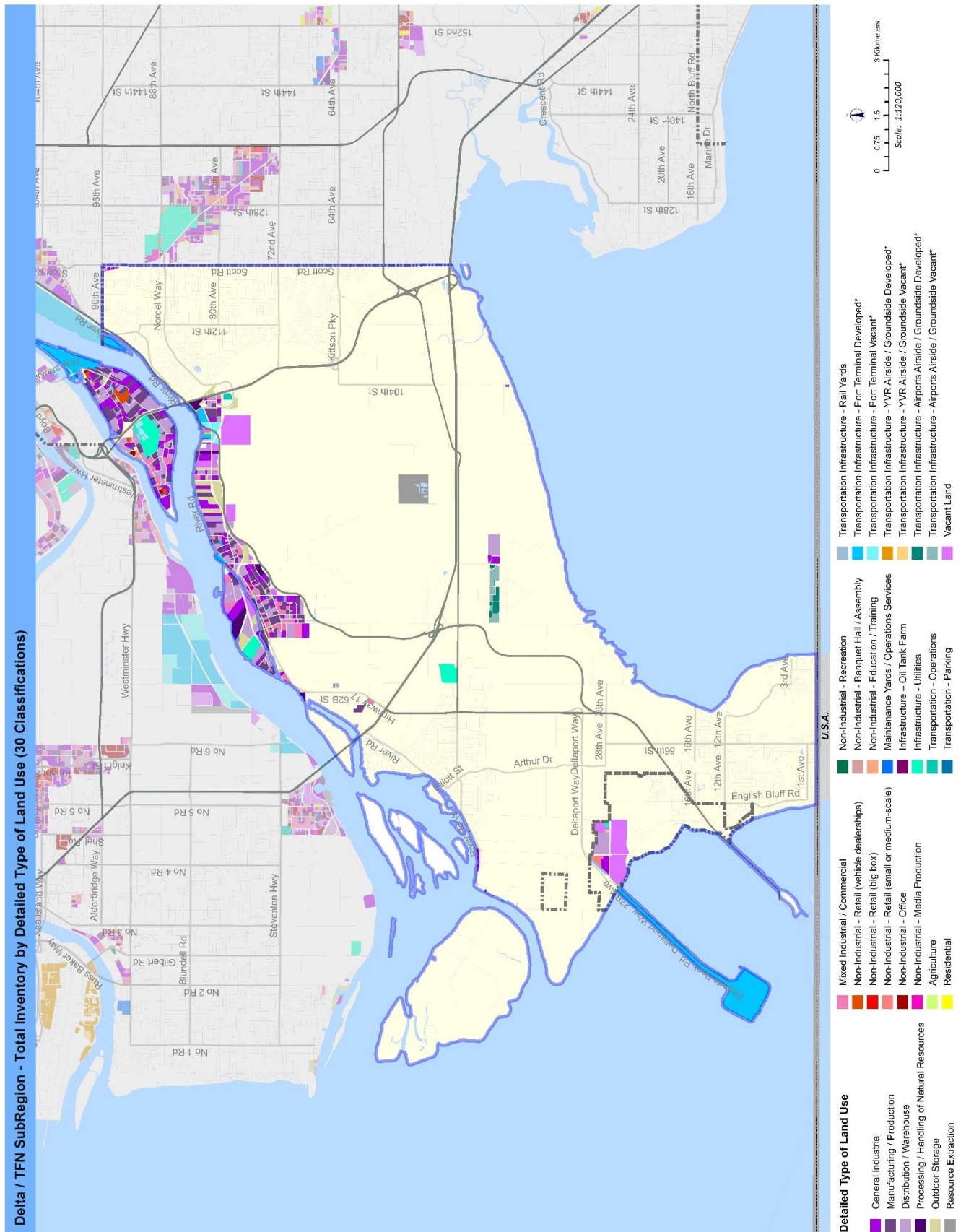
Appendix 1: Sub-Regional Inventory Maps

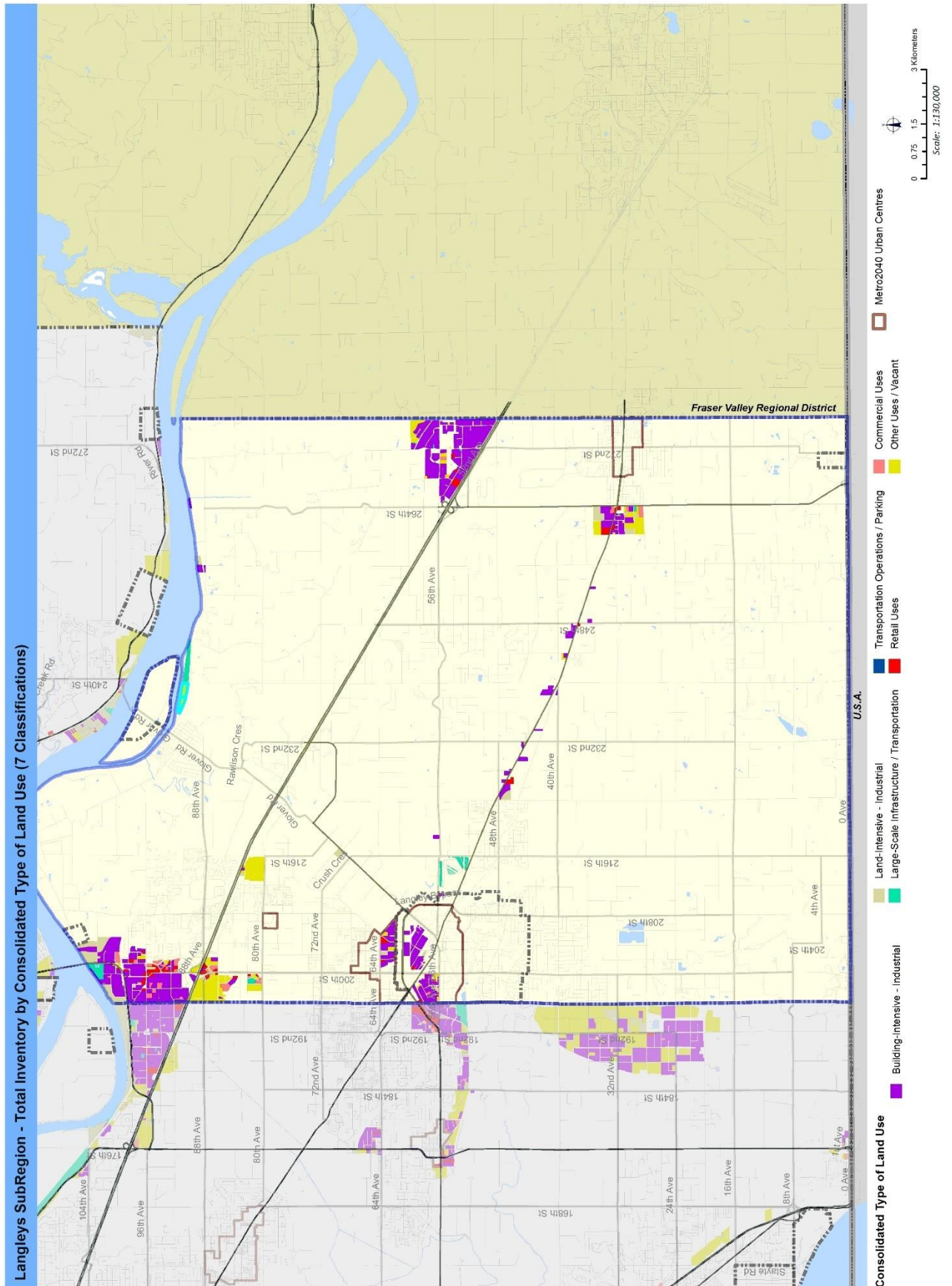
- Burnaby / New Westminster
- Delta / Tsawwassen First Nation
- Langleys (City of Langley, Township of Langley)
- North-East Sector (City of Port Moody, City of Coquitlam, City of Port Coquitlam)
- North Shore (City of North Vancouver, District of North Vancouver)
- Richmond (including YVR / Sea Island)
- Ridge / Meadows (City of Maple Ridge, City of Pitt Meadows)
- Surrey / White Rock
- Vancouver

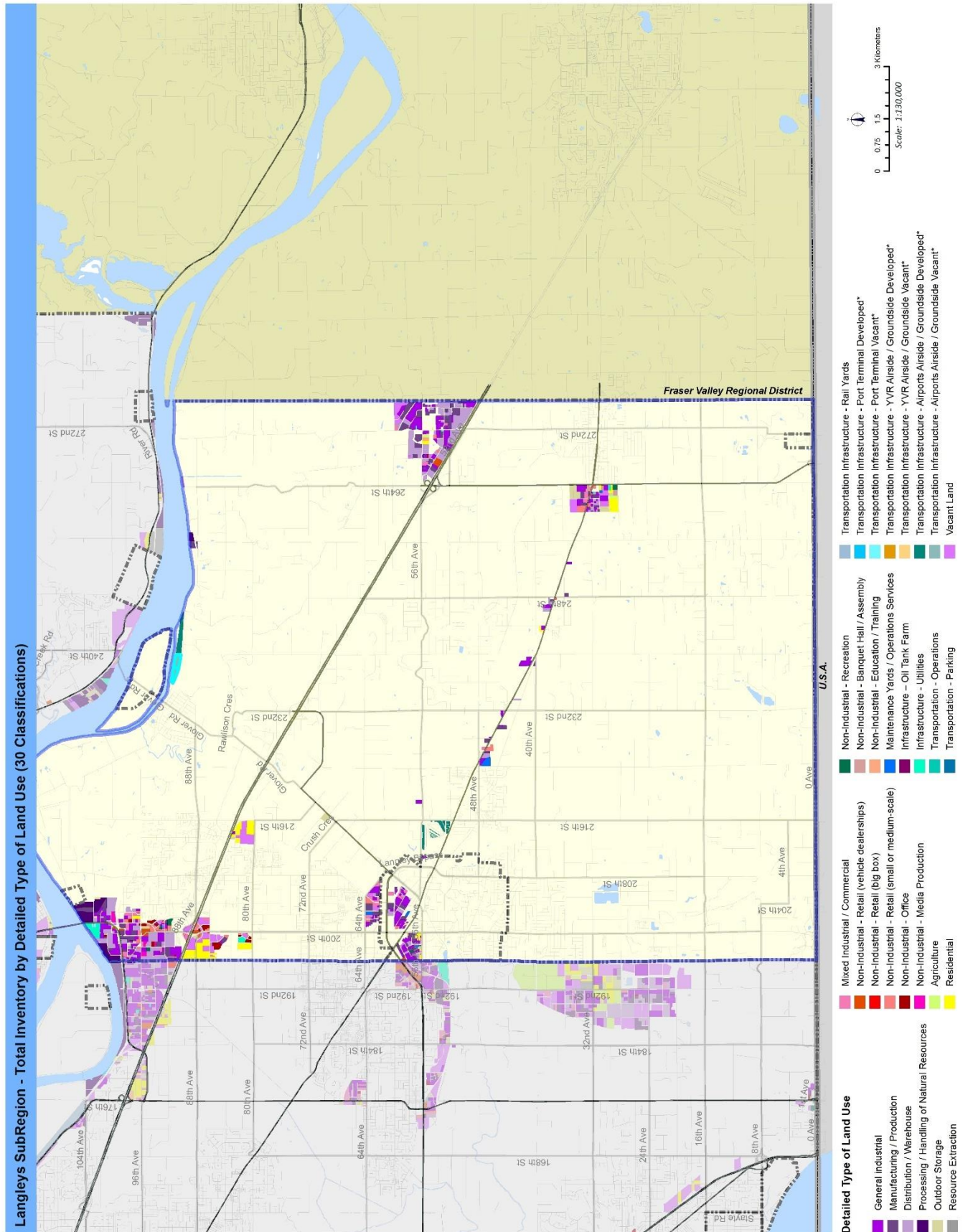


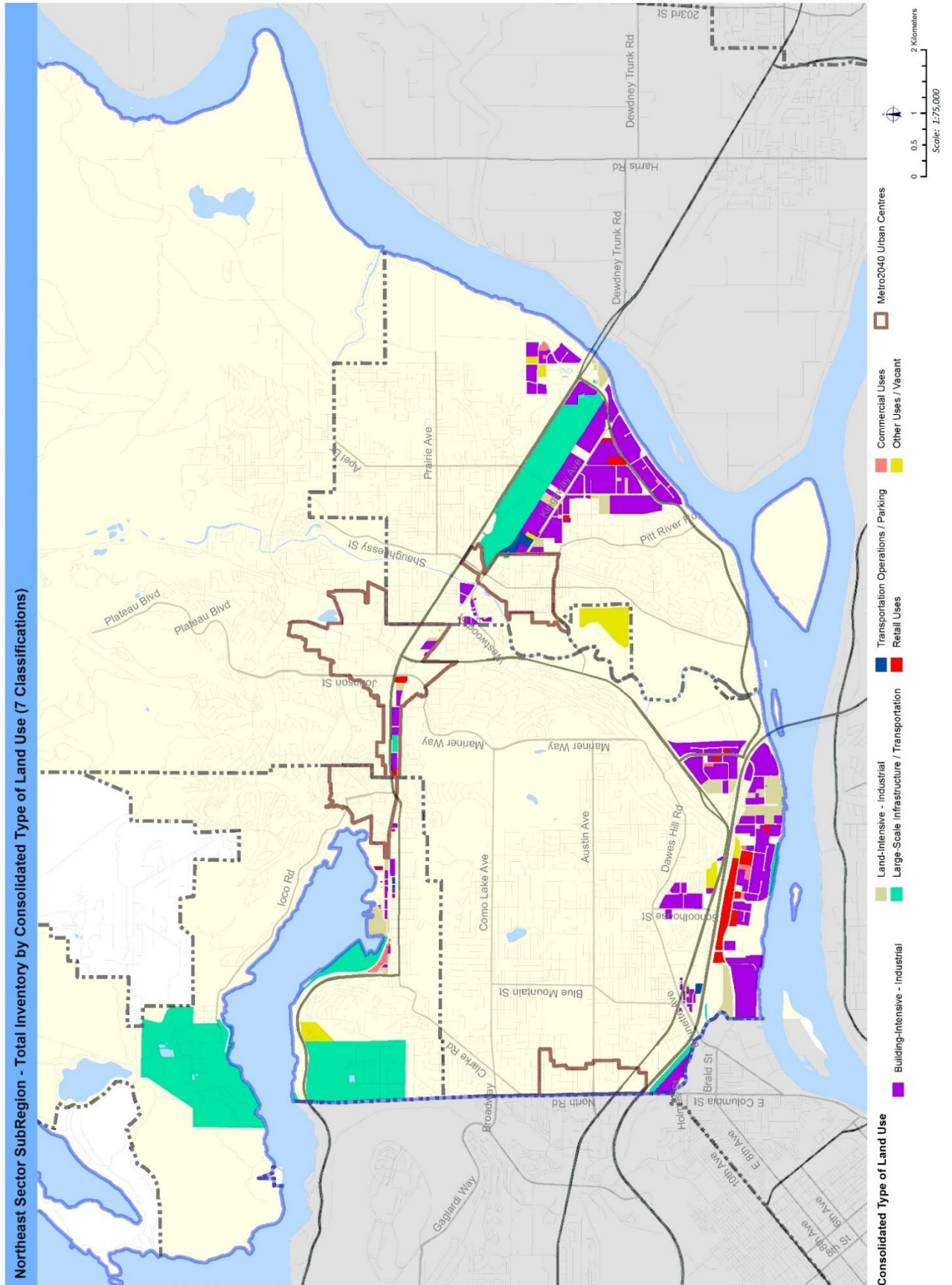


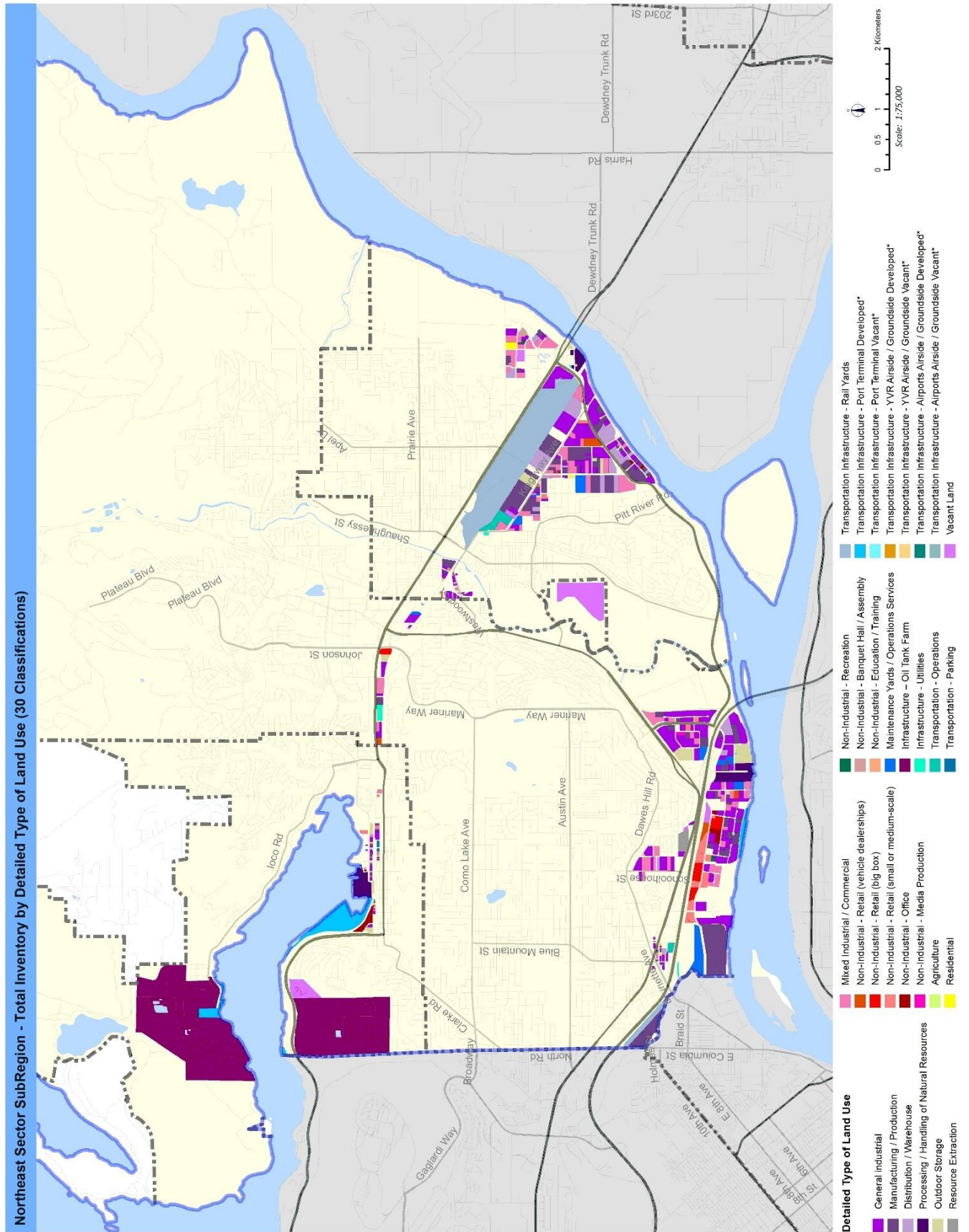




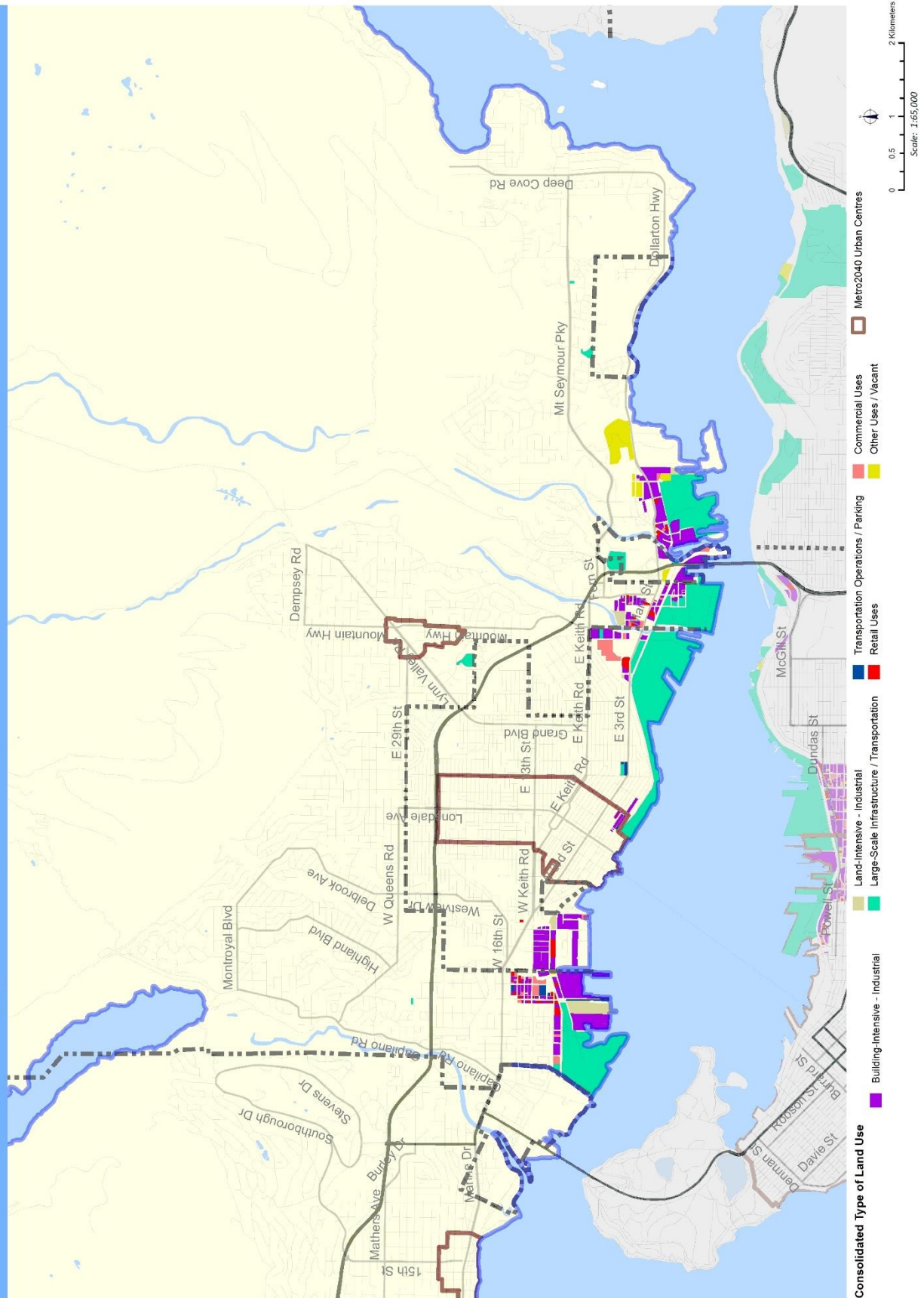


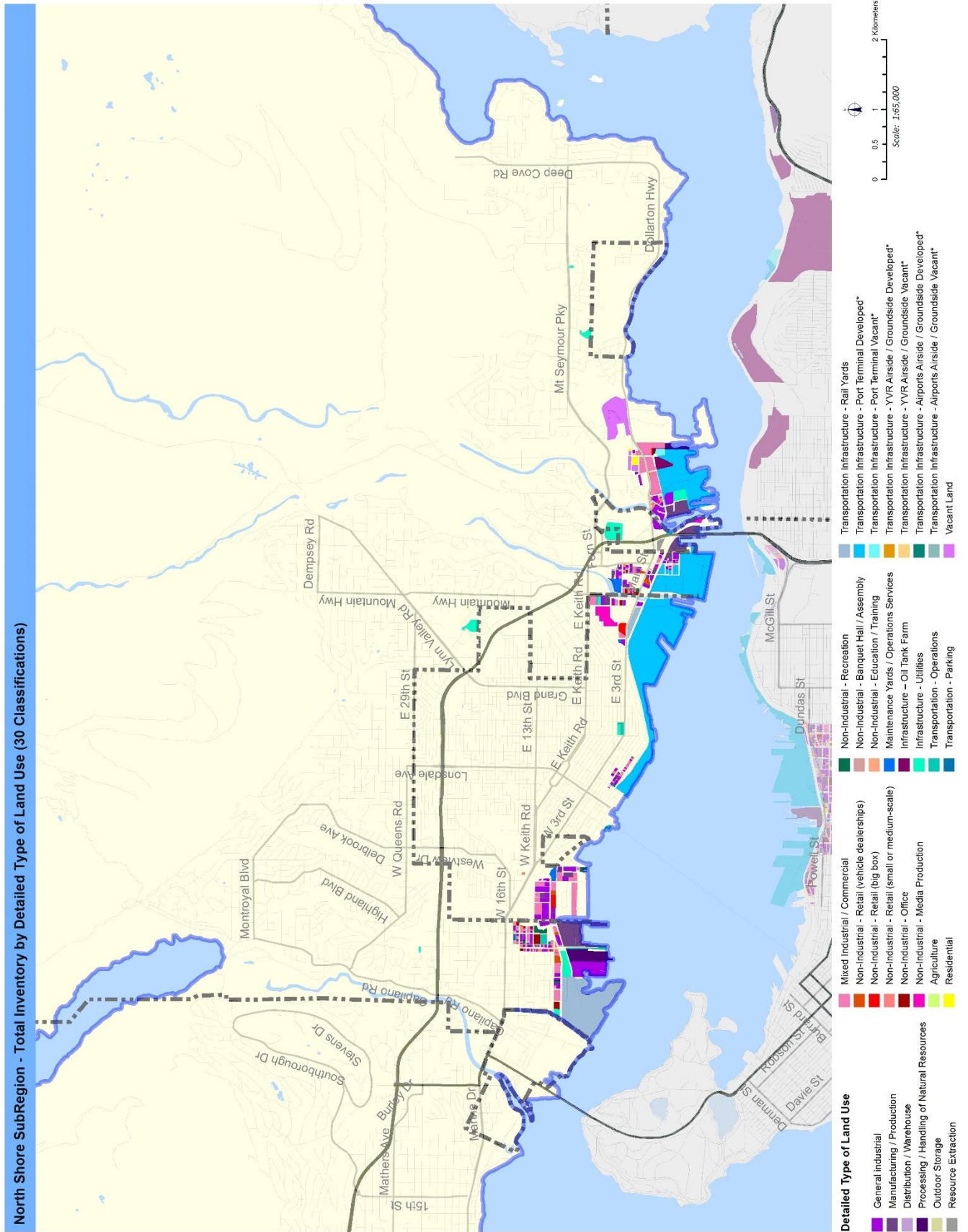


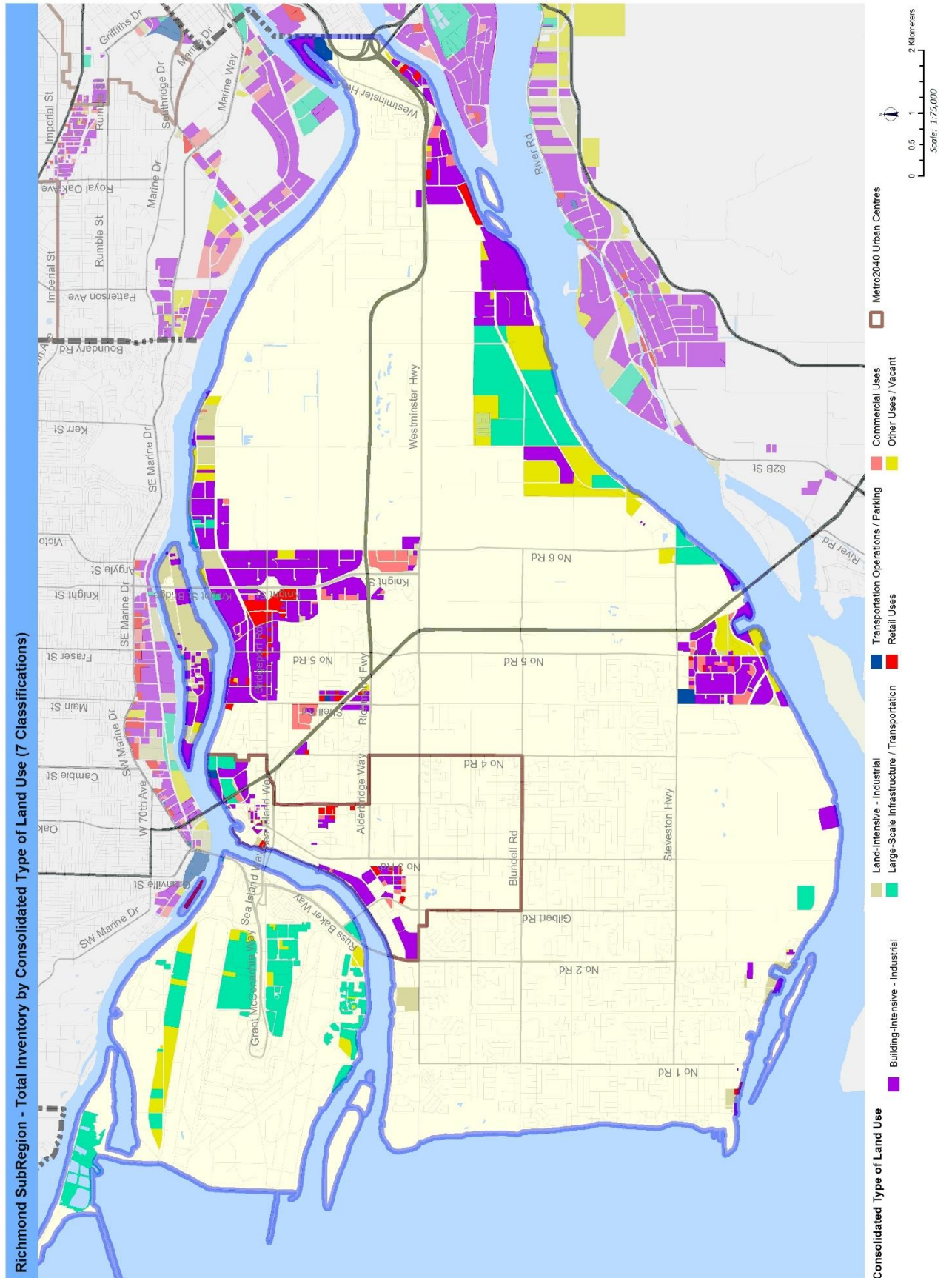


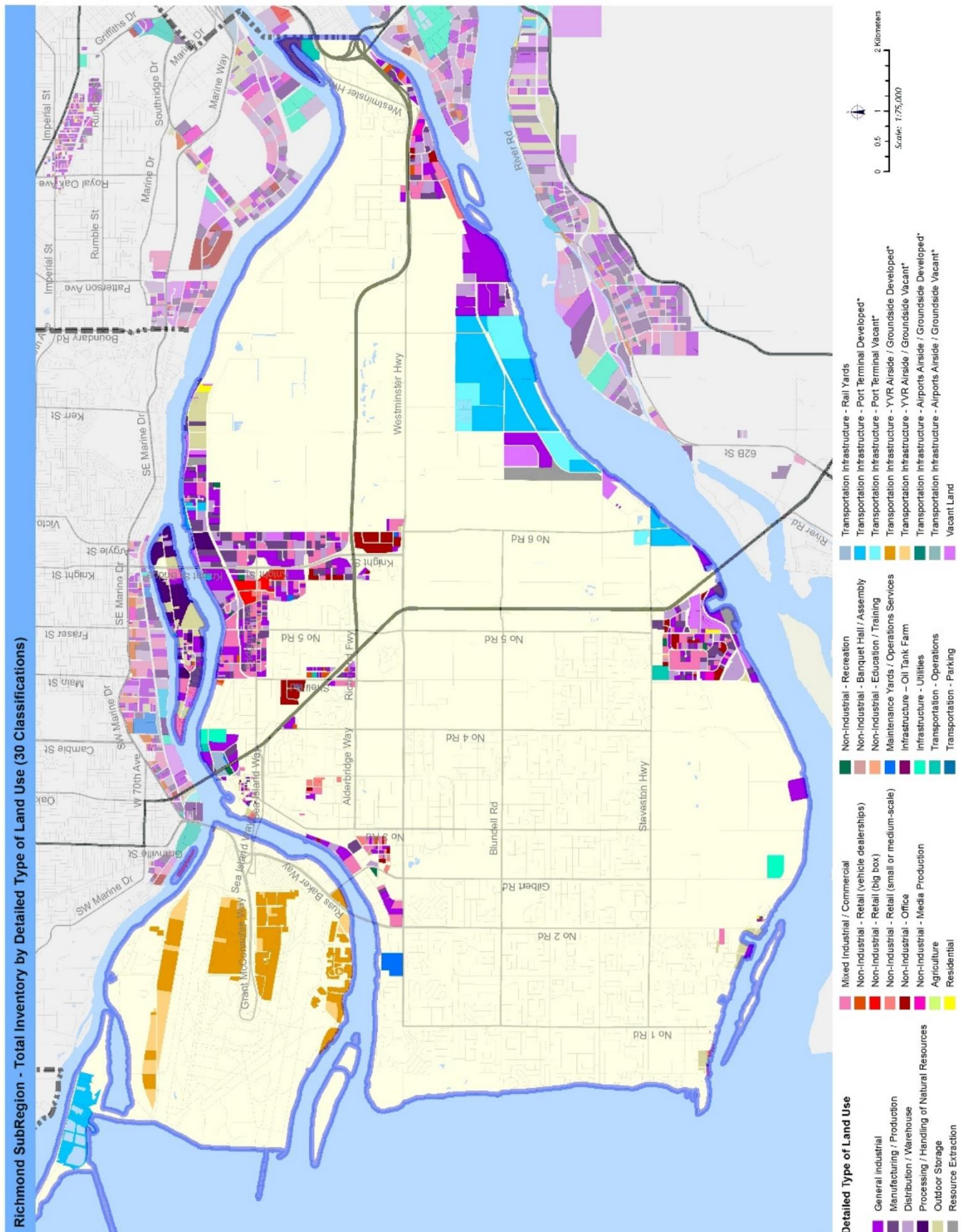


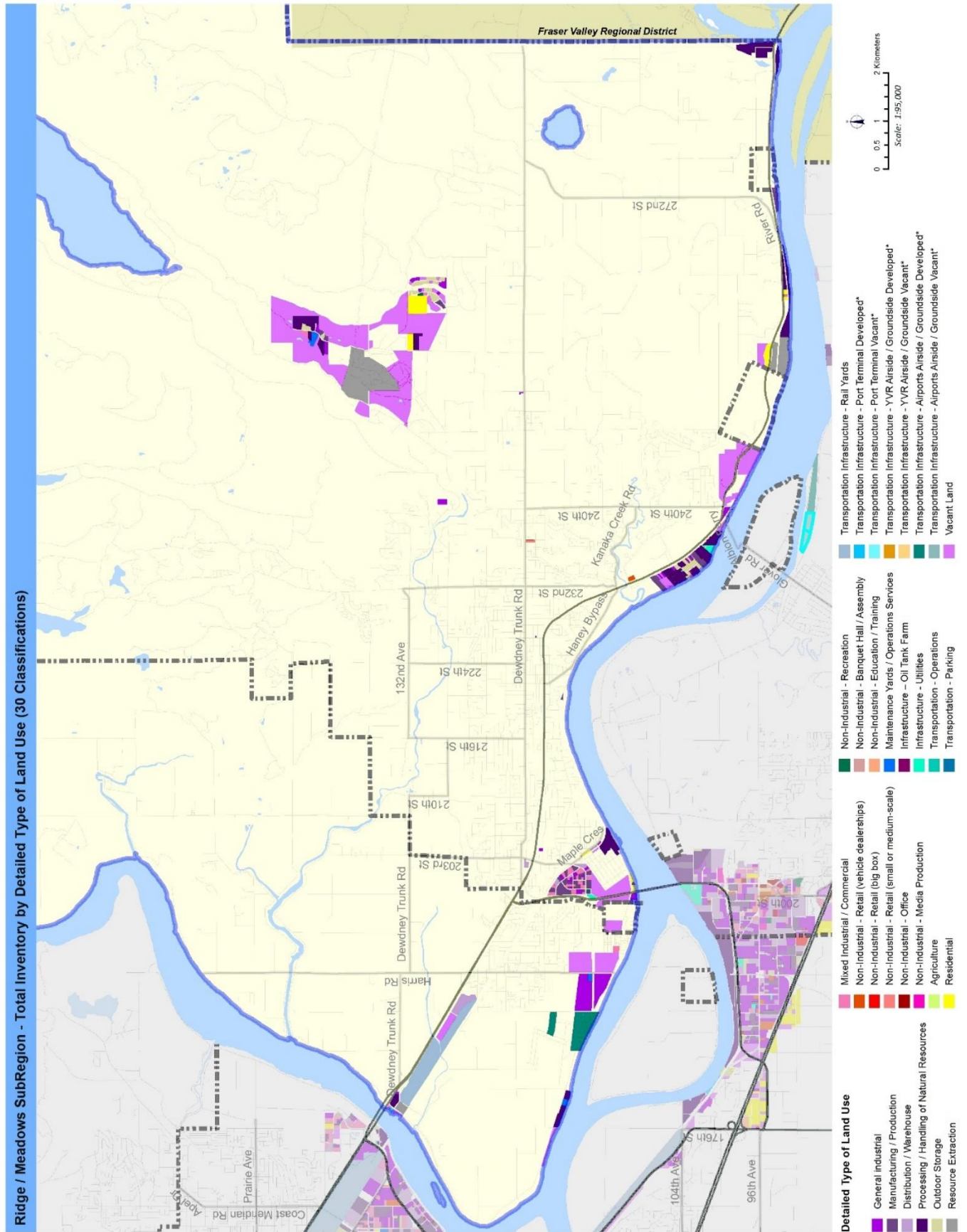
North Shore SubRegion - Total Inventory by Consolidated Type of Land Use (7 Classifications)

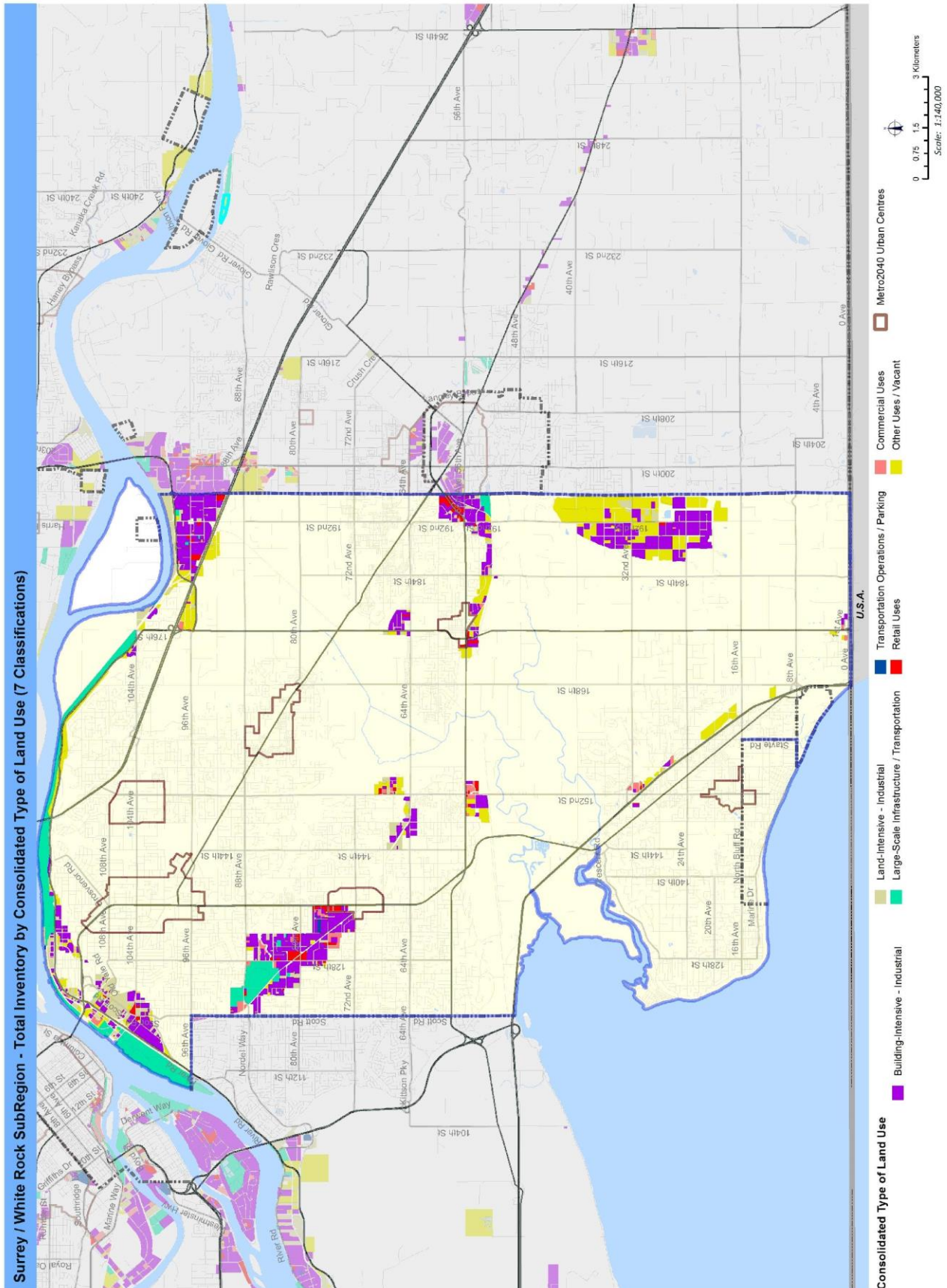


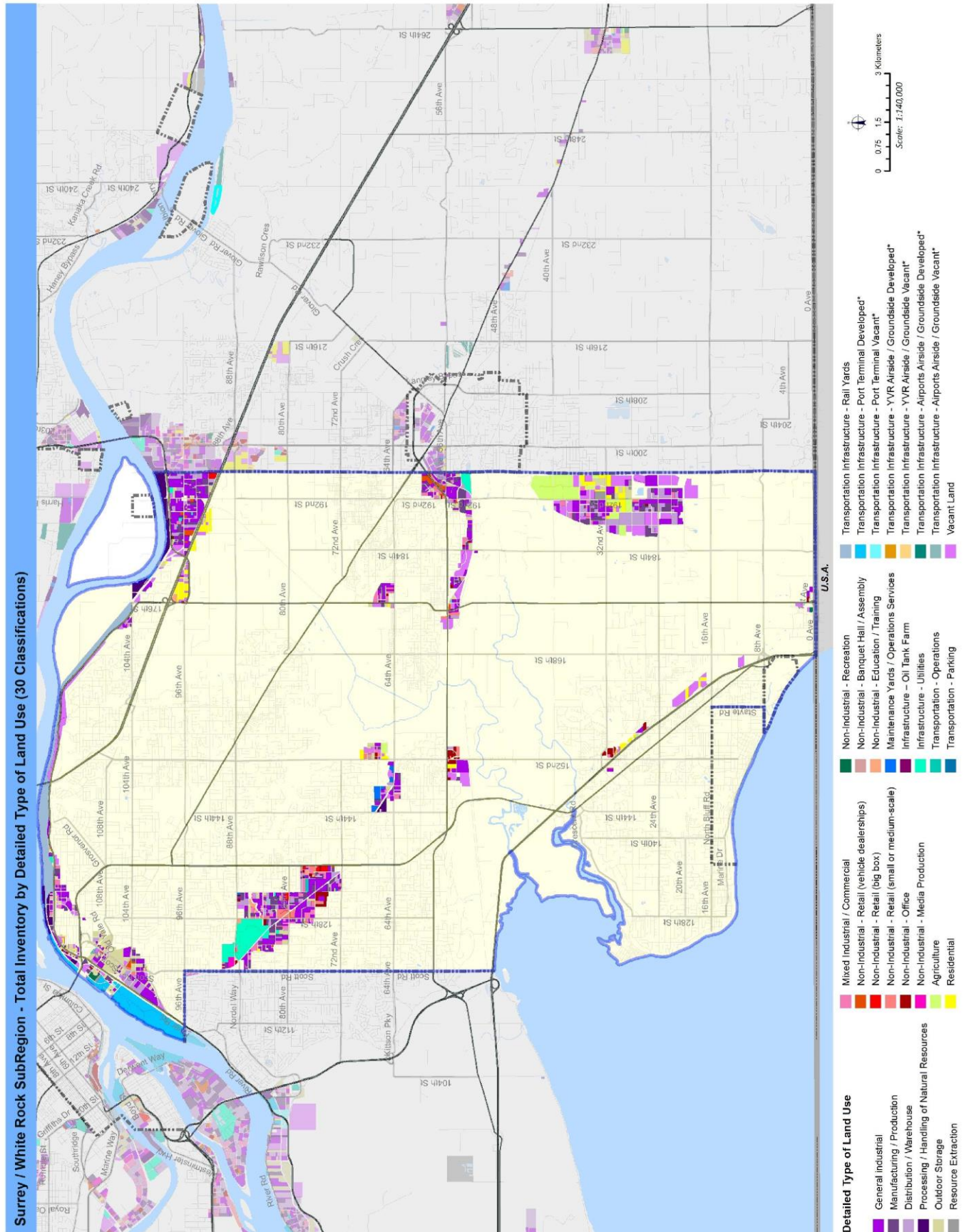


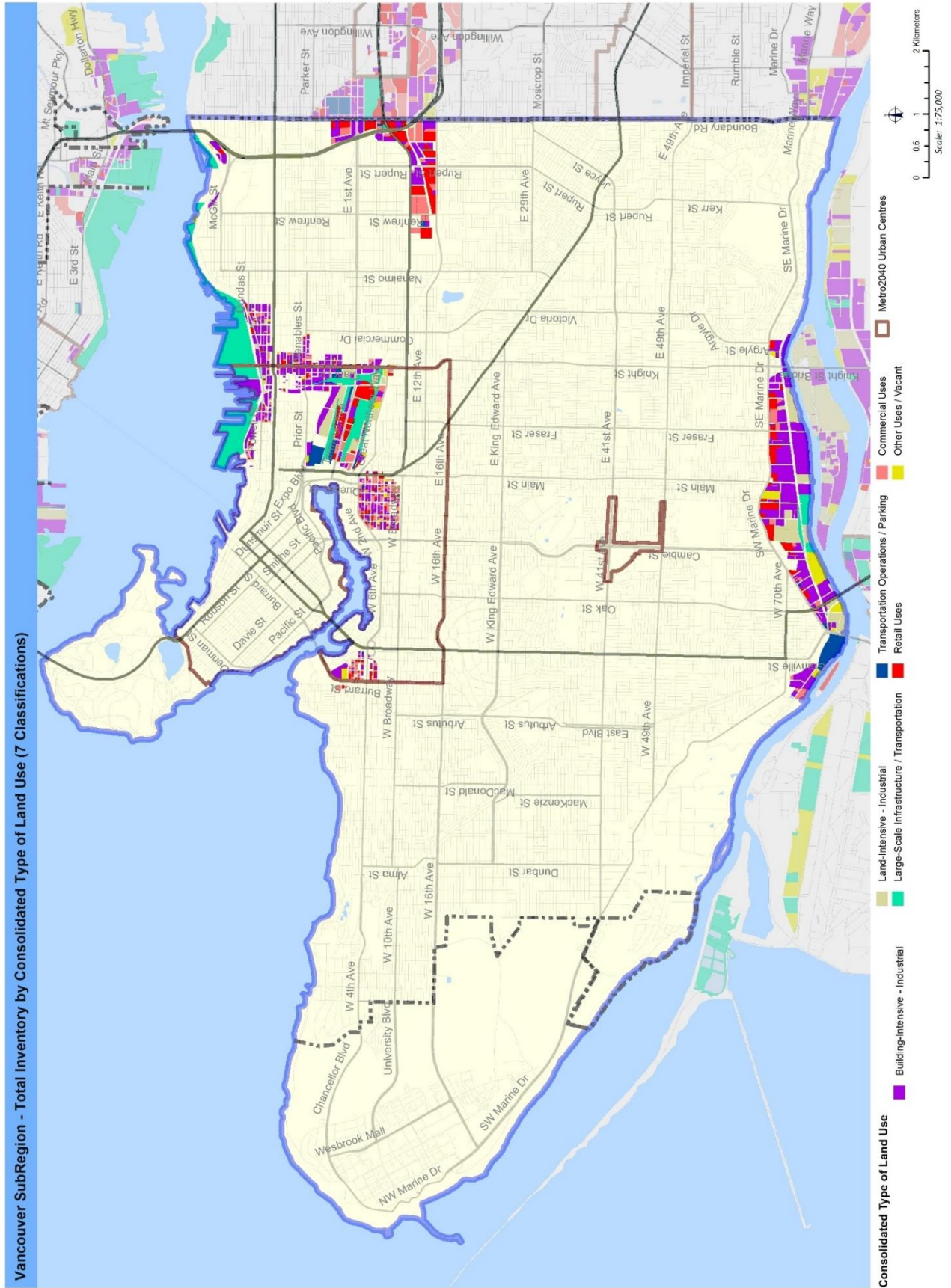


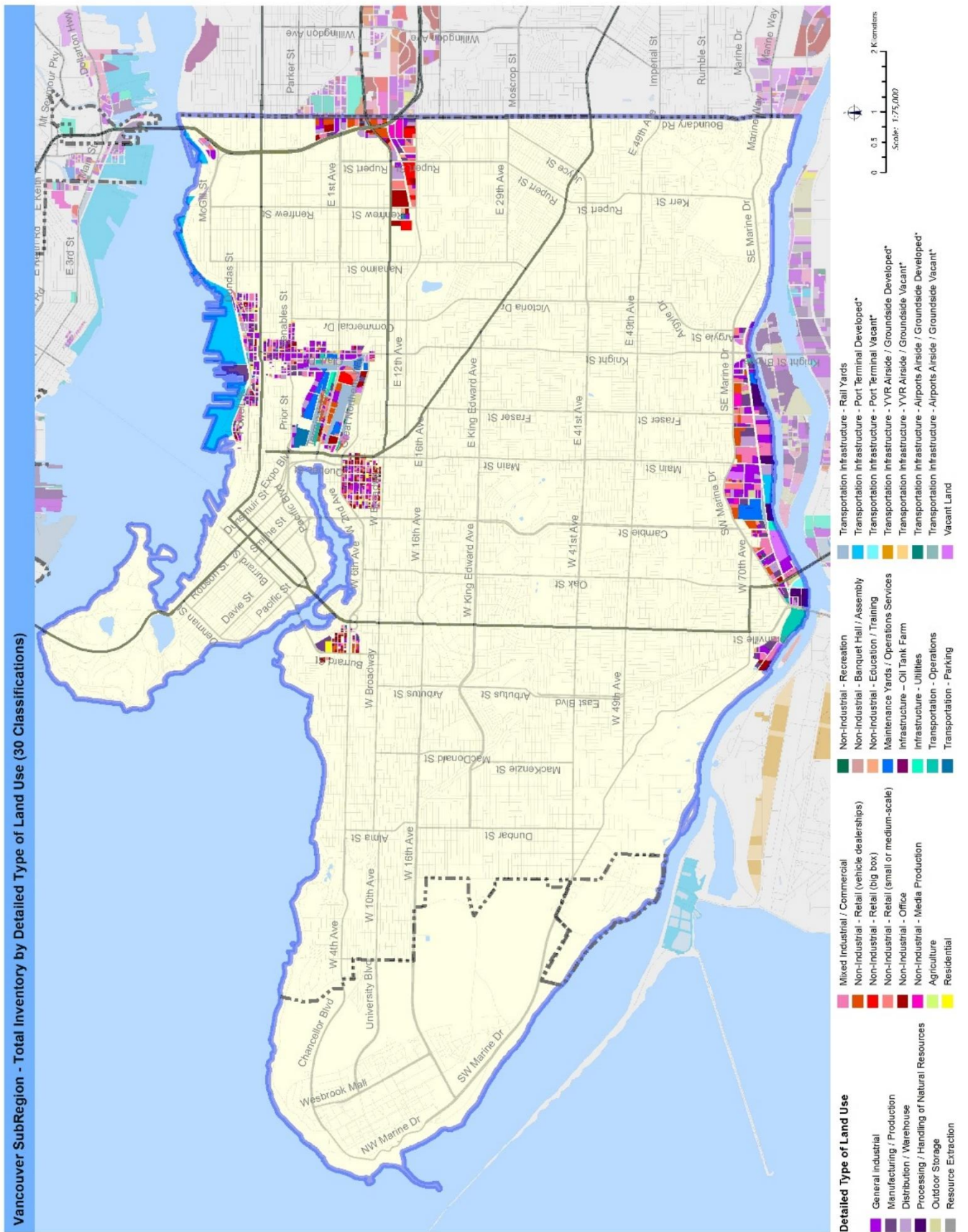












Appendix 2: Inventory Tables – Consolidated Land Use Classification

Table A2.1: Consolidated Land Use Classification by Sub-Region

	Burnaby / New West	Delta/TFN	Langleys	North Shore	Northeast Sector	Richmond	Ridge / Meadows	Surrey / White Rock	Vancouver	Total
Building - Industrial	597	783	605	110	445	707	124	1,029	239	4,639
Land - Industrial	78	120	85	16	82	136	138	264	55	975
Large-Scale Infrs / Transp	380	397	44	244	565	490	101	462	155	2,839
Transp Opts / Parking	23	5		5	9	17		5	26	90
Retail	89	29	46	10	39	53	3	84	85	439
Commercial	133	8	40	14	12	68	1	74	57	406
Other / Vacant	42	313	176	21	56	271	593	616	27	2,115
Total	1,342	1,655	996	420	1,209	1,741	960	2,534	644	11,502

Table A2.2: Consolidated Land Use Classification by Regional Designation

RGS Designation	General						Total
	Con Rec	Rural	Agricultural	Urban	Mixed Emp	Industrial	
Building - Industrial	3	7	9	307	1,278	3,035	4,639
Land - Industrial	1	11		109	152	701	975
Large-Scale Infrs / Transp	114		10	211	53	2,451	2,839
Transp Opts / Parking	1		0	18	11	61	90
Retail	0			74	222	142	439
Commercial		1		38	256	112	406
Other / Vacant		183	31	125	597	1,179	2,115
Total	119	202	50	880	2,569	7,681	11,502

Table A2.3: Consolidated Land Use Classification by Land Ownership Type

	Private	Private - Railway	Crown Corporatio	Public - Federal	Public - Provincial	Public - Muni/Reg	First Nations	Total
Building - Industrial	4,443	17	29	49	8	93		4,639
Land - Industrial	808	2	13	20	20	110		975
Large-Scale Infrs / Transp	729	462	198	1,270	2	178		2,839
Transp Opts / Parking	20				12	58		90
Retail	425			6	0	8		439
Commercial	383		7	3	2	12		406
Other / Vacant	1,312	16	22	237	115	374	40	2,115
Total	8,121	498	269	1,584	159	832	40	11,502

Appendix 3: Inventory Tables – Detailed Land Use Classification

Table A3.1: Detailed Land Use Classification

	Land HA	Land AC	% of Total Lands
Building-Intensive - Industrial	4,639	11,463	40%
General Industrial	1,914	4,729	17%
Mixed Industrial / Commercial	643	1,589	6%
Manufacturing / Production	1,060	2,620	9%
Distribution / Warehouse	1,022	2,524	9%
Land-Intensive - Industrial	975	2,408	8%
Processing / Handling of Natural Resources	387	956	3%
Outdoor Storage	461	1,138	4%
Maintenance Yards / Operations Services	127	314	1%
Large-Scale Infrac / Transp	2,839	7,015	25%
Infrastructure - Utilities	332	819	3%
Infrastructure - Oil Tank Farm	631	1,560	5%
Transp Infrac - Rail Yards	530	1,309	5%
Transp Infrac - YVR Airside / Groundside Developed	200	494	2%
Transp Infrac - Airports Developed (excluding YVR)	76	188	1%
Transp Infrac - Port Terminal Developed	1,070	2,645	9%
Transp Infrac - Operations / Parking	90	222	1%
Transportation - Operations	78	192	1%
Transportation - Parking	12	30	0%
Retail Uses	439	1,084	4%
Non-Industrial - Retail (big box)	80	198	1%
Non-Industrial - Retail (small or medium-scale)	217	536	2%
Non-Industrial - Retail (vehicle dealerships)	141	349	1%
Commercial Uses	406	1,003	4%
Non-Industrial - Office	258	637	2%
Non-Industrial - Media Production	82	203	1%
Non-Industrial - Banquet Hall / Assembly	20	51	0%
Non-Industrial - Education / Training	19	46	0%
Non-Industrial - Recreation	27	67	0%
Other Uses / Vacant	2,115	5,226	18%
Agriculture	139	344	1%
Residential	223	551	2%
Resource Extraction	232	574	2%
Transp Infrac - Airports Vacant (excluding YVR)	31	78	0%
Transp Infrac - YVR Airside / Groundside Vacant	62	154	1%
Transp Infrac - Port Terminal Vacant	118	291	1%
Vacant Land	1,309	3,235	11%
Total	11,502	28,421	100%

Table A3.2: Number of Sites and Average Site Size by Detailed Land Use Classification

	Number of Sites	Land HA	Avg Site Size HA	Land AC	Avg Site Size AC
Building-Intensive - Industrial	5,122	4,639	0.9	11,463	2.2
General Industrial	2,547	1,914	0.8	4,729	1.9
Mixed Industrial / Commercial	730	643	0.9	1,589	2.2
Manufacturing / Production	1,153	1,060	0.9	2,620	2.3
Distribution / Warehouse	692	1,022	1.5	2,525	3.6
Land-Intensive - Industrial	648	975	1.5	2,408	3.7
Processing / Handling of Natural Resources	95	387	4.1	956	10.1
Outdoor Storage	482	461	1.0	1,138	2.4
Maintenance Yards / Operations Services	71	127	1.8	314	4.4
Large-Scale Infrs / Transp	429	2,839	6.6	7,015	16.4
Infrastructure - Utilities	90	332	3.7	819	9.1
Infrastructure - Oil Tank Farm	12	631	52.6	1,560	130.0
Transp Infrs - Rail Yards	37	530	14.3	1,310	35.4
Transp Infrs - YVR Airside / Groundside Developed	86	200	2.3	494	5.7
Transp Infrs - Airports Developed (excluding YVR)	63	76	1.2	188	3.0
Transp Infrs - Port Terminal Developed	141	1,070	7.6	2,645	18.8
Transp Infrs - Operations / Parking	63	90	1.4	222	3.5
Transportation - Operations	35	78	2.2	192	5.5
Transportation - Parking	28	12	0.4	30	1.1
Retail Uses	629	439	0.7	1,084	1.7
Non-Industrial - Retail (big box)	28	80	2.9	198	7.1
Non-Industrial - Retail (small or medium-scale)	412	217	0.5	536	1.3
Non-Industrial - Retail (vehicle dealerships)	189	141	0.7	349	1.8
Commercial Uses	583	406	0.7	1,003	1.7
Non-Industrial - Office	373	258	0.7	637	1.7
Non-Industrial - Media Production	110	82	0.7	203	1.8
Non-Industrial - Banquet Hall / Assembly	44	20	0.5	51	1.1
Non-Industrial - Education / Training	24	19	0.8	46	1.9
Non-Industrial - Recreation	32	27	0.9	67	2.1
Other Uses / Vacant	1,095	2,115	1.9	5,226	4.8
Agriculture	24	139	5.8	344	14.3
Residential	493	223	0.5	551	1.1
Resource Extraction	19	232	12.2	574	30.2
Transp Infrs - Airports Vacant (excluding YVR)	21	62	3.0	154	7.3
Transp Infrs - YVR Airside / Groundside Vacant	8	31	3.9	78	9.7
Transp Infrs - Port Terminal Vacant	27	118	4.4	291	10.8
Vacant Land	503	1,309	2.6	3,235	6.4
Total	8,569	11,502	1.3	28,422	3.3

Table A3.3: Detailed Land Use Classification by Sub-Region

	Burnaby / New West	Delta/TFN	Langley's	North Shore	Northeast Sector	Richmond	Ridge / Meadows	Surrey / White Rock	Vancouver	Total
Building-Intensive - Industrial	597	783	605	110	445	707	124	1,029	239	4,639
General Industrial	223	211	226	43	181	309	60	559	100	1,914
Mixed Industrial / Commercial	112	73	40	33	81	151	14	88	52	643
Manufacturing / Production	130	212	136	33	138	139	34	188	51	1,060
Distribution / Warehouse	131	288	203	1	45	109	15	194	36	1,022
Land-Intensive - Industrial	78	120	85	16	82	136	138	264	55	975
Processing / Handling of Natural Resources	14	36	46	12	30	50	109	73	17	387
Outdoor Storage	48	81	28	1	26	72	22	174	8	461
Maintenance Yards / Operations Services	16	3	11	4	26	14	6	17	30	127
Large-Scale Infrastructure / Transportation	380	397	44	244	565	490	101	462	155	2,839
Infrastructure - Utilities	48	95	18	20	4	19	4	119	5	332
Infrastructure - Oil Tank Farm	260			3	369					631
Transp Infras - Rail Yards	34	6		56	150	7	61	181	36	530
Transp Infras - YVR Airside / Groundside Developed						200				200
Transp Infras - Airports Developed (excluding YVR)		14	26				36			76
Transp Infras - Port Terminal Developed	39	282		166	43	264		162	115	1,070
Transp Infra - Operations / Parking	23	5		5	9	17		5	26	90
Transportation - Operations	21	5		4	9	17		4	18	78
Transportation - Parking	2			1	1			1	8	12
Retail	89	29	46	10	39	53	3	84	85	439
Non-Industrial - Retail (big box)	19			3	12	18		14	15	80
Non-Industrial - Retail (small or medium-scale)	36	12	35	4	19	26	2	45	37	217
Non-Industrial - Retail (vehicle dealerships)	34	17	12	2	8	9	1	25	33	141
Commercial	133	8	40	14	12	68	1	74	57	406
Non-Industrial - Office	90	3	17	4	8	53		45	36	258
Non-Industrial - Media Production	40	1	8	7	1	5		6	15	82
Non-Industrial - Banquet Hall / Assembly	1		6	0	2	2		6	3	20
Non-Industrial - Education / Training	0	3	2	0	1	1		10	3	19
Non-Industrial - Recreation	2	0	7	2	1	6	1	7	1	27
Other / Vacant	42	313	176	21	56	271	593	616	27	2,115
Agriculture	0		4					135		139
Residential	5	1	74	1	2	4	27	102	6	223
Resource Extraction		66		1	5	41	106	13		232
Transp Infras - YVR Airside / Groundside Vacant						62				62
Transp Infras - Airports Vacant (excluding YVR)	4	12	10							31
Transp Infras - Port Terminal Vacant	33	212	88	18	48	66	460	365	18	1,309
Total	1,342	1,655	996	420	1,209	1,741	960	2,534	644	11,502

Table A3.4: Detailed Land Use Classification by Regional Designation

	Con Rec	Rural	Agricultural	General Urban	Mixed Emp	Industrial	Total
Building-Intensive - Industrial	3	7	9	307	1,278	3,035	4,639
General Industrial	1	5	2	147	488	1,271	1,914
Mixed Industrial / Commercial	1			62	247	333	643
Manufacturing / Production	1	2	6	63	276	714	1,060
Distribution / Warehouse		1	1	34	267	718	1,022
Land-Intensive - Industrial	1	11		109	152	701	975
Processing / Handling of Natural Resources	1			26	13	347	387
Outdoor Storage		11		56	113	281	461
Maintenance Yards / Operations Services	0			28	26	73	127
Large-Scale Infrs / Transp	114		10	211	53	2,451	2,839
Infrastructure - Utilities			10	53	10	259	332
Infrastructure - Oil Tank Farm				84	15	533	631
Transp Infrs - Rail Yards				25	5	499	530
Transp Infrs - YVR Airside / Groundside Developed	2					198	200
Transp Infrs - Airports Developed (excluding YVR)				36	14	26	76
Transp Infrs - Port Terminal Developed	112			13	9	936	1,070
Transp Infrs - Operations / Parking	1		0	18	11	61	90
Transportation - Operations			0	16	4	58	78
Transportation - Parking	1			1	7	3	12
Retail Uses	0			74	222	142	439
Non-Industrial - Retail (big box)				5	67	8	80
Non-Industrial - Retail (small or medium-scale)	0			44	110	62	217
Non-Industrial - Retail (vehicle dealerships)				24	45	72	141
Commercial Uses		1		38	256	112	406
Non-Industrial - Office				13	195	50	258
Non-Industrial - Media Production				10	42	31	82
Non-Industrial - Banquet Hall / Assembly				2	7	12	20
Non-Industrial - Education / Training				3	3	12	19
Non-Industrial - Recreation		1		11	10	6	27
Other Uses / Vacant		183	31	125	597	1,179	2,115
Agriculture					133	6	139
Residential		19		42	115	47	223
Resource Extraction		9		5	18	200	232
Transp Infrs - Airports Vacant (excluding YVR)					21	10	31
Transp Infrs - YVR Airside / Groundside Vacant						62	62
Transp Infrs - Port Terminal Vacant				8		109	118
Vacant Land		154	31	69	310	744	1,309
Total	119	202	50	880	2,569	7,681	11,502

Table A3.5: Detailed Land Use Classification by Land Ownership Type

	Private	Railway	Crown Corp	Public - Federal	Public - Provincial	Public - Muni/Reg	First Nations	Total
Building-Intensive - Industrial	4,443	17	29	49	8	93		4,639
General Industrial	1,834	1	17	17	3	41		1,914
Mixed Industrial / Commercial	633		1	1	0	7		643
Manufacturing / Production	1,008	1	11	25	1	16		1,060
Distribution / Warehouse	968	15	0	6	4	28		1,022
Land-Intensive - Industrial	808	2	13	20	20	110		975
Processing / Handling of Natural Resources	382					5		387
Outdoor Storage	410	2	8	20	11	9		461
Maintenance Yards / Operations Services	17		5		9	96		127
Large-Scale Infrs / Transp	729	462	198	1,270	2	178		2,839
Infrastructure - Utilities	20		198		1	112		332
Infrastructure - Oil Tank Farm	631							631
Transp Infrs - Rail Yards	56	462			1	11		530
Transp Infrs - YVR Airside / Groundside Developed				200				200
Transp Infrs - Airports Developed (excluding YVR)	21					55		76
Transp Infrs - Port Terminal Developed				1,070				1,070
Transp Infrs - Operations / Parking	20				12	58		90
Transportation - Operations	11				10	56		78
Transportation - Parking	9				1	2		12
Retail Uses	425			6	0	8		439
Non-Industrial - Retail (big box)	80							80
Non-Industrial - Retail (small or medium-scale)	204			6	0	7		217
Non-Industrial - Retail (vehicle dealerships)	141					0		141
Commercial Uses	383		7	3	2	12		406
Non-Industrial - Office	242		6	3	0	7		258
Non-Industrial - Media Production	81		1			1		82
Non-Industrial - Banquet Hall / Assembly	20					1		20
Non-Industrial - Education / Training	17				2			19
Non-Industrial - Recreation	24					3		27
Other Uses / Vacant	1,312	16	22	237	115	374	40	2,115
Agriculture	86			53				139
Residential	206				1	16		223
Resource Extraction	219	4	8		1			232
Transp Infrs - Airports Vacant (excluding YVR)				62				62
Transp Infrs - YVR Airside / Groundside Vacant	10					21		31
Transp Infrs - Port Terminal Vacant				118				118
Vacant Land	791	12	14	3	113	337	40	1,309
Total	8,121	498	269	1,584	159	832	40	11,502

Appendix 4: Inventory Tables – Sub-Regional Distribution

Table A4.1: Sub-Regional Distribution by Consolidated Land Use Classification

	Building - Industrial	Land - Industrial	Large-Scale Infras / Transp	Transport Opts / Parking	Retail	Commercial	Other / Vacant	Total
Burnaby / New West	597	78	380	23	89	133	42	1,342
Delta/TFN	783	120	397	5	29	8	313	1,655
Langley	605	85	44		46	40	176	996
North Shore	110	16	244	5	10	14	21	420
Northeast Sector	445	82	565	9	39	12	56	1,209
Richmond	707	136	490	17	53	68	271	1,741
Ridge / Meadows	124	138	101		3	1	593	960
Surrey / White Rock	1,029	264	462	5	84	74	616	2,534
Vancouver	239	55	155	26	85	57	27	644
Total	4,639	975	2,839	90	439	406	2,115	11,502

Table A4.2: Sub-Regional Distribution by Regional Designation

	Con Rec	Rural	Agricultural	General Urban	Mixed Emp	Industrial	Total
Burnaby / New West	3			253	480	607	1,342
Delta/TFN	54		7	35	59	1,499	1,655
Langley		1		51	215	729	996
North Shore				104	40	276	420
Northeast Sector	2		30	76	232	869	1,209
Richmond	60		12	147	425	1,097	1,741
Ridge / Meadows		201	0	76		683	960
Surrey / White Rock			1	127	981	1,425	2,534
Vancouver				11	136	497	644
Total	119	202	50	880	2,569	7,681	11,502

Table A4.3: Sub-Regional Distribution by Land Ownership Type

Sub Area	Private	Railway	Crown Corp	Public - Federal	Public - Provincial	Public - Muni/Reg	First Nations	Total
Burnaby / New West	1,141	36	44	43	14	65		1,342
Delta/TFN	1,032	10	42	315	19	237		1,655
Langley	953		8		2	33		996
North Shore	203	3	10	183	1	20		420
Northeast Sector	931	157	7	51	9	24	30	1,209
Richmond	980		32	648	4	77		1,741
Ridge / Meadows	692	73	4		33	149	9	960
Surrey / White Rock	1,781	184	119	223	71	156		2,534
Vancouver	408	34	4	122	6	71		644
Total	8,121	498	269	1,584	159	832	40	11,502

Appendix 5: Inventory Tables – Municipal Geographies

Table A5.1: Consolidated Land Use Classification by Municipality

Sub-Region / Municipality	Building - Industrial	Land - Industrial	Large-Scale Infras / Transp	Transport Opts / Parking	Retail	Commercial	Other / Vacant	Total
Burnaby/New West	597	78	380	23	89	133	42	1,342
Burnaby	538	54	316	22	58	118	39	1,144
New West	59	24	65	1	31	15	3	198
Delta/TFN	783	120	397	5	29	8	313	1,655
Delta	753	119	391	5	23	8	228	1,527
TFN	31	1	6		6		84	128
Langleys	605	85	44		46	40	176	996
Langley City	72	5			3	1	3	85
Langley Twp	533	80	44		44	39	172	912
North Shore	110	16	244	5	10	14	21	420
North Van City	30	2	93	1	3	7		136
North Van Dist	80	15	151	3	6	8	21	284
Northeast Sector	445	82	565	9	39	12	56	1,209
Coquitlam	213	49	16	2	33	5	8	326
Port Coquitlam	225	19	143	7	6	3	36	439
Port Moody	7	14	406	1	1	4	11	444
Richmond	707	136	490	17	53	68	271	1,741
Richmond	707	136	490	17	53	68	271	1,741
Ridge/Meadows	124	138	101		3	1	593	960
Maple Ridge	74	125	4		3	1	527	735
Pitt Meadows	49	13	97				66	226
Surrey/White Rock	1,029	264	462	5	84	74	616	2,534
Surrey	1,029	264	462	5	84	74	616	2,534
Vancouver	239	55	155	26	85	57	27	644
Vancouver	239	55	155	26	85	57	27	644
Total	4,639	975	2,839	90	439	406	2,115	11,502

Table A5.3: Regional Designation by Municipality

	Con Rec	Rural	Agricultural	General			Total
				Urban	Mixed Emp	Industrial	
Burnaby	1			203	474	465	1,144
Coquitlam				45	227	53	326
Delta	54		7	35	59	1,371	1,527
Langley City				16	22	47	85
Langley Township		1		35	193	682	912
Maple Ridge		201	0	8		525	735
New Westminster	2			49	6	141	198
North Vancouver City				5	40	90	136
North Vancr Dist				99		185	284
Pitt Meadows				68		158	226
Port Coquitlam	1		30	10	5	393	439
Port Moody	1			21		422	444
Richmond	60		12	147	425	1,097	1,741
Surrey			1	127	981	1,425	2,534
TFN						128	128
Vancouver				11	136	497	644
Total	119	202	50	880	2,569	7,681	11,502

Table A5.4: Land Ownership Type by Municipality

Municipality	Private	Railway	Crown Corp	Public -	Public -	Public -	First	Total
				Federal	Provincial	Muni/Reg	Nations	
Burnaby	1,022	7	37	7	12	59		1,144
Coquitlam	291	8	5	6	5	11		326
Delta	1,032	10	42	315	19	109		1,527
Langley City	81		1			2		85
Langley Twp	872		6		2	31		912
Maple Ridge	587		4		33	111		735
New West	119	29	7	36	2	6		198
North Van City	40	3	2	88		2		136
North Van Dist	163		9	94	1	17		284
Pitt Meadows	104	73				39	9	226
Port Coquitlam	236	150	2	7	2	12	30	439
Port Moody	405			37	2	0		444
Richmond	980		32	648	4	77		1,741
Surrey	1,781	184	119	223	71	156		2,534
TFN						128		128
Vancouver	408	34	4	122	6	71		644
Total	8,121	498	269	1,584	159	832	40	11,502

Appendix 6: Inventory Tables – Municipal Designation and Zoning

Table A6.1: Municipal Designation / Zoning by Regional Designation

RGS Designation	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total
Con Rec	58	58	4	119
Rural	43	159	0	202
Agricultural	18	30	2	50
General Urban	391	105	385	880
Mixed Emp	1,989	577	3	2,569
Industrial	6,971	619	92	7,681
Total	9,470	1,548	484	11,502

Table A6.2: Municipal Designation / Zoning by Sub-Region

Sub-Regions	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total
Burnaby / New West	1,116	10	216	1,342
Delta/TFN	1,553	99	3	1,655
Langleys	730	219	48	996
North Shore	399	7	14	420
Northeast Sector	1,117	60	32	1,209
Richmond	1,533	58	150	1,741
Ridge / Meadows	422	530	8	960
Surrey / White Rock	1,956	565	13	2,534
Vancouver	644	0		644
Total	9,470	1,548	484	11,502

Table A6.3: Municipal Designation / Zoning by Consolidated Land Use Classification

Land Use Category	Yes OCP, Yes Zoning	Yes OCP, No Zoning	No OCP, Yes Zoning	Total
Building - Industrial	4,379	72	188	4,639
Land - Industrial	838	96	40	975
Large-Scale Infrs / Transp	2,598	77	164	2,839
Transport Opts / Parking	87	0	3	90
Retail	338	43	57	439
Commercial	330	54	22	406
Other / Vacant	899	1,205	10	2,115
Total	9,470	1,548	484	11,502

Appendix 7: Inventory Tables – Inventory Site Size Distribution

Table A7.1: Site Size Distribution by Consolidated Land Use Classification

Site Size	Large-Scale					Retail	Commercial	Other / Vacant	Total
	Building - Industrial	Land - Industrial	Infras / Transp	Transp Opts / Parking					
less than 1 HA	1,348	159	72	12		157	132	210	2,090
1 to 1.99 HA	1,081	148	93	8		105	138	225	1,798
2 to 4.99 HA	1,306	284	228	14		111	94	330	2,367
5 to 9.99 HA	581	207	246	33		50	28	380	1,525
10 to 19.99 HA	228	175	279	23		16	14	469	1,204
20 HA and over	95		1,921					501	2,517
Total	4,639	975	2,839	90		439	406	2,115	11,502

Table A7.2: Site Size Distribution by Regional Designation

Site Size	General						Total
	Con Rec	Rural	Agricultural	Urban	Mixed Emp	Industrial	
less than 1 HA	3	20	5	252	636	1,174	2,090
1 to 1.99 HA	2	9		134	671	983	1,798
2 to 4.99 HA	2	32	5	210	661	1,458	2,367
5 to 9.99 HA		37	10	84	307	1,088	1,525
10 to 19.99 HA		70		66	200	868	1,204
20 HA and over	112	34	30	135	94	2,111	2,517
Total	119	202	50	880	2,569	7,681	11,502

Table A7.3: Site Size Distribution by Land Ownership Type

Site Size	Private	Railway	Crown Corp	Public -		Public -		Total
				Federal	Provincial	Muni/Reg.	First Nations	
less than 1 HA	1,933	4	16	51	16	69		2,090
1 to 1.99 HA	1,575	11	23	85	22	83		1,798
2 to 4.99 HA	1,935	42	43	207	32	109		2,367
5 to 9.99 HA	996	46	41	194	29	211	9	1,525
10 to 19.99 HA	597	13	50	270	59	214		1,204
20 HA and over	1,085	382	97	777		147	30	2,517
Total	8,121	498	269	1,584	159	832	40	11,502

Table A7.4: Site Size Distribution by Sub-Region

Site Size	Burnaby /		Langleys	North Shore	Northeast		Ridge - Meadows	Surrey /		Total
	New West	Delta / TFN			Sector	Richmond		White Rock	Vancouver	
less than 1 HA	291	192	251	73	154	301	81	510	235	2,090
1 to 1.99 HA	248	220	239	37	136	269	48	513	89	1,798
2 to 4.99 HA	329	364	307	45	150	403	109	551	109	2,367
5 to 9.99 HA	178	261	121	38	99	259	155	330	83	1,525
10 to 19.99 HA	81	162	78	42	70	290	222	221	37	1,204
20 HA and over	214	455		185	601	218	345	408	91	2,517
Total	1,342	1,655	996	420	1,209	1,741	960	2,534	644	11,502

Appendix 8: Inventory Tables – Vacant Site Size Distribution

Table A8.1: Site Size Distribution of Vacant Lands by Regional Designation

Site Size	General					Total
	Rural	Agricultural	Urban	Mixed Emp	Industrial	
less than 1 HA	6	1	48	81	74	210
1 to 1.99 HA	6		17	128	74	225
2 to 4.99 HA	30		35	120	145	330
5 to 9.99 HA	37		9	109	225	380
10 to 19.99 HA	70		16	95	288	469
20 HA and over	34	30		64	373	501
Total	183	31	125	597	1,179	2,115

Table A8.2: Site Size Distribution of Vacant Lands by Land Ownership Type

Site Size	Private	Railway	Crown Corp	Public - Federal	Public - Provincial	Public - Munic/Reg	First Nations	Total
less than 1 HA	171			7	7	24		210
1 to 1.99 HA	165		5	14	13	30		225
2 to 4.99 HA	232	8	3	45	17	26		330
5 to 9.99 HA	188	8	14	31	29	100	9	380
10 to 19.99 HA	197			95	49	128		469
20 HA and over	360			44		67	30	501
Total	1,312	16	22	237	115	374	40	2,115

Table A8.3: Site Size Distribution of Vacant Lands by Count

Site Size	Total Land HA	Total Count	Count as %
less than 1 hectare	210	741	68%
1 hectare to 1.99 hectares	225	152	14%
2 hectares to 4.99 hectares	330	107	10%
5 hectares to 9.99 hectares	380	51	5%
10 hectares to 19.99 hectares	469	32	3%
20 hectares and over	501	12	1%
Total	2,115	1,095	100%

Appendix 9: Land Use Classification Definitions

The following land use classification definitions are for the primary or predominant use of the site, including normally associated on-site accessory / ancillary uses (including parking and loading areas), as of mid-2020. Sites may include multiple or overlapping and non-discrete uses, in which case the predominant use is considered for the classification. A 'site' may represent multiple separate legal properties consolidated for the purposes of the inventory analysis. Current land use classifications are independent of future-oriented land use designations / policies.

Building-Intensive Industrial

1. **General Industrial:** Wide variety of heavy and light industrial uses of various scales including repair activities (excluding those defined in the other land use classifications), and limited industrial-related accessory uses, such as on-site retail and office.
2. **Mixed Industrial / Commercial:** A property with multiple units such as flex space, with numerous and varied industrial, quasi-industrial, and commercial uses (independent of tenure).
3. **Manufacturing / Production:** The conversion / transformation of raw materials or parts into finished goods.
4. **Distribution / Warehouse:** Specialized buildings that stock and handle products / goods to be redistributed, forming part of the supply network.

Land-Intensive Industrial

5. **Processing / Handling of Natural Resources:** Activities such as lumber, saw mills, shingle mills, aggregates, and asphalt / concrete (excludes 'Outdoor Storage' and 'Manufacturing / Production').
6. **Outdoor Storage:** Ongoing and temporary land-intensive outdoor storage of miscellaneous / scrap materials, solid waste / recyclable goods, auto-wreckers / vehicle parts, truck / chassis parking, shipping containers, construction materials, and heavy equipment / machinery (excludes: 'Resource Extraction', 'Processing / Handling of Natural Resources', and Port Terminal related storage / stockpiling).
7. **Maintenance Yards / Operations Services:** Municipal, corporate, and agency works yards involving the storage and maintenance of road, construction, and maintenance equipment and supplies, and ambulance / fire truck stations.

Large-Scale Infrastructure / Transportation

8. **Infrastructure - Utilities:** Electricity, natural gas, telephone, cable, communication towers, power sub-stations, liquid and solid waste management facilities, and other related / supporting functions.
9. **Infrastructure - Oil Tank Farm:** Facilities for petroleum products transportation, storage, or processing, including refineries, as well as associated hazard separation setback areas.
10. **Transportation Infrastructure - Rail Yards:** Rail intermodal terminals and yards (excluding individual rail lines / corridors; rail spurs located on properties are classified as per the primary use of that property).
11. **Transportation Infrastructure - YVR Airside / Groundside Developed*:** Airside lands refer to restricted industrial lands that are developed and reserved exclusively for airport-related activities (e.g. airplane maintenance and storage) requiring immediate access to runways and

taxiways and are not available for general market industrial use. Groundside lands refer to restricted industrial lands that are developed and not available for general market industrial, but permit uses that are 'airport compatible' (e.g. couriers) and are further limited by restrictions on building height and design because of adjacent flight paths. Lands available for general market industrial use are not included in this classification. Runways and airfields are not included in this classification, nor included in the Inventory.

12. **Transportation Infrastructure - Airports Airside / Groundside Developed* (excluding YVR):** Lands that are developed and reserved exclusively for airport-related activities (e.g. airplane maintenance and storage) requiring immediate access to runways and taxiways and are not available for general market industrial, but permit uses that are 'airport compatible'. Runways and airfields are not included in this classification, nor included in the Inventory.
13. **Transportation Infrastructure - Port Terminal Developed*:** Developed lands directly associated with port terminals / dock / wharf and equipment used for loading and unloading (and associated storage / stockpiling) of various types of goods (e.g. autos, bulk, breakbulk, and containers).

Transportation Operations / Parking

14. **Transportation - Operations:** Parking / storage / maintenance of transit operations (including TransLink depots) and large taxi operations located on Inventory lands.
15. **Transportation - Parking:** Properties that are used exclusively for parking of vehicles without another primary use, in the form of either surface parking lots or structured parking facilities, where ownership is not associated with adjacent properties / businesses (excludes lands used for the temporary storage of newly imported vehicles which is classified as 'Transportation Infrastructure - Port Terminal Developed').

Retail Uses

16. **Non-Industrial - Retail (big box):** Major stand-alone retail or wholesale units (chain stores or stores over 50,000 sq ft building sizes) and other commercial activities, and associated parking.
17. **Non-Industrial - Retail (small or medium-scale):** Individual or multiple retail uses (under 50,000 sq ft building sizes) and associated parking.
18. **Non-Industrial - Retail (vehicle dealerships):** New and used vehicle sales lots and business operations for showing, storing, and selling of vehicles (e.g. auto, trailer, boats) (excludes the temporary storage of newly imported vehicles which is classified as 'Transportation Infrastructure – Port Terminal Developed', and vehicle maintenance facilities which are classified as 'General Industrial')

Commercial Uses

19. **Non-Industrial - Office:** Stand-alone office building and associated parking, which may include retail uses on the ground level.
20. **Non-Industrial - Media Production:** Facilities used for production or broadcast of film / movies / videos, such as filming / recording studios, sound-stages, equipment storage / rental, however excludes software production offices.
21. **Non-Industrial - Banquet Hall / Assembly:** Assembly facilities and associated parking, used for religious or non-religious large-scale assembly / gathering activities and events.

22. **Non-Industrial - Education / Training:** Training, vocational school or other educational related facilities, which may or may not include a classroom component.
23. **Non-Industrial - Recreation:** Indoor or outdoor recreational uses, such as fitness facilities, racket clubs, and other recreational activities.

Other Uses / Vacant

24. **Agriculture:** Agricultural or farming related uses (independent of Agricultural Land Reserve designation or BCAA Farm Class status), as a possible holding use for future conversion.
25. **Residential:** Residential use, typically an older single detached house and yard, as a possible holding use for future conversion to industrial, and in some cases other forms of residential that may limit the potential to redevelop the lands to industrial uses.
26. **Resource Extraction:** Earth extraction uses, such as aggregates / gravel / sand pits, and peat.
27. **Transportation Infrastructure - YVR Airside / Groundside Vacant*:** Airside lands refer to restricted industrial lands intended for development and are reserved exclusively for airport-related activities (e.g. airplane maintenance and storage) requiring immediate access to runways and taxiways and are not available for general market industrial use. Groundside lands refer to restricted industrial lands intended for development and are not available for general market industrial, but permit uses that are 'airport compatible' (e.g. couriers) and are further limited by restrictions on building height and design because of adjacent flight paths. Lands available for general market industrial use are not included in this classification. Runways and airfields are not included in this classification, nor included in the Inventory.
28. **Transportation Infrastructure – Airport Airside / Groundside Vacant (excluding YVR)*:** Industrial lands intended for airside development and are reserved exclusively for airport-related activities (e.g. airplane maintenance and storage) requiring immediate access to runways and taxiways and / or groundside lands that are intended for 'airport compatible' activities (e.g. couriers) and are limited by restrictions on building height and design because of flight path. Lands available for general market industrial use are not included in this classification. Runways and airfields are not included in this classification, nor included in the Inventory.
29. **Transportation Infrastructure - Port Terminal Vacant*:** Vacant lands directly associated with port terminals / dock / wharf and equipment intended for use for loading and unloading (and associated storage / stockpiling) of various types of goods (e.g. autos, bulk, breakbulk, and containers).
30. **Vacant Land:** Lands that do not have any identified improvements or uses of any sort or type (either industrial or non-industrial).

**** Note: These lands may have restrictions on tenure, use, and development and not available for general market industrial, but permit uses that are port or airport compatible. For more detailed information, refer to the YVR Master Plan or Port of Vancouver Land Use Plan, as applicable.***

Appendix 10: Inventory Methodology

Project Process Steps

The Metro Vancouver 2020 Regional Industrial Lands Inventory was prepared using the following process steps, similar to that used for the 2015 Inventory.

While preparing the 2020 Inventory, staff in several municipalities reviewed and reinterpreted their original 2015 Inventory policies, which resulted in a revised 2015 Inventory. This revised 2015 Inventory is used to measure industrial land changes over the 2015 - 2020 period. It is important to emphasize that 2020 Inventory results should not be compared at face value with published results from previous 2005, 2010, and 2015 Inventories due to methodological differences, improvements in data, and various inconsistencies, including:

1. **Inventory Boundary Delineations** – Each Inventory snapshot (2005, 2010, 2015, 2020) uses a slightly different shoreline boundary that cumulatively impacts land area calculations for waterfront sites.
2. **Inventory Universe** – Industrial-serving additional lands (e.g. intermodal yards and sewerage treatment plants) were included in the 2010, 2015, and 2020 Inventories, but not the 2005 Inventory.
3. **Municipal Staff Policy Interpretation** – At times, different municipal policy requires interpretation and judgment. Despite no policy change, policy interpretation has shown to vary among the Inventories.

The 2020 Inventory attempts to account for the above methodological differences and inconsistencies (plus other minor adjustments) by neutralizing their cumulative impact through a ‘back-casting’ of the earlier 2015 published Inventory results into ‘2015 revised’ figures, thereby enabling direct comparisons and measures of ‘net’ change between 2020 results with modified results from the revised 2015 Inventory. The revised 2015 Inventory numbers referred to in this report reflect adjustments to the noted inconsistencies, and are thus more comparable with the 2020 Inventory results.

All lands that were municipally designated as Industrial (in municipal Official Community Plans and/or Neighbourhood Plans, or equivalent) were included in the Inventory. In addition, properties that were not designated Industrial, but were zoned (or equivalent) Industrial (or zoned as comprehensive development with allowable industrial uses) and developed / used as industrial were included (see definitions). As well, the Inventory incorporates the Port of Vancouver and YVR Vancouver Airport Authority land use plans.

Past Metro Vancouver Regional Industrial Lands Inventories

The 2005 and 2010 Inventories used the following definitions:

- *Industrial Land*: Lands designated by municipal Official Community Plans for industrial uses, or land zoned and utilized for industrial uses.

- *Developed Industrial Land: Industrial Land* that is wholly or partially utilized for industrial related uses, which includes properties used for outdoor storage. This also includes office, retail, or institutional uses that are allowed within municipal industrial zones.
- *Vacant Industrial Land: Industrial Land* that is not utilized for industrial related uses, which includes industrial properties that are completely vacant as well as industrial properties currently utilized for residential and agriculture uses.

For both the past 2005 and 2010 Inventories, Metro Vancouver considered only whether the land was ‘Developed’ or ‘Vacant’. In actuality, industrial lands have different types of uses, levels of utilization, and development potential due to various site and area factors or characteristics.

The previous binary Inventory classification did not reflect the on-the-ground reality that some ‘Developed’ properties are only partially utilized (and have significant redevelopment and intensification potential), nor the fact that some ‘Vacant’ properties may have significant development constraints (or are being used for other non-industrial purposes).

The past Inventories did not include the level of data to provide a detailed picture of industrial land uses and utilization level, as well as market readiness and intensification potential. Specifically, although these Inventories allowed for a tally of the industrial lands in the region (i.e., ‘Developed’ and ‘Vacant’), they did not assess the level of utilization, consider land ownership and designations, include site physical constraints, or have the ability to analyze the future capacity of the lands. Past analysis was limited to high level reporting.

Enhanced Metro Vancouver Regional Industrial Lands Inventories

The enhanced data collection and classification system addresses limitations and criticisms inherent in previous industrial lands Inventory projects. Building on past work, the more recent 2020 and 2015 Regional Industrial Lands Inventory provides enhanced detail about the industrial land supply. The 2020 and 2015 Inventory data is classified by development status, type of use, land ownership, municipal and regional designations, and other attributes, with an aim to informing municipal and regional plans and policies, and public and private sector investments. The Inventory allows for greater refinement and understanding of the industrial land use and capacity, while still allowing for comparisons of change over time.

The improvements to the 2020 and 2015 (revised) Inventory also reflected the following factors:

- Improved GIS mapping / boundaries information
- Improved consistency in terms of applying criteria for land classifications
- Improved consistency in terms of recognizing site constraints
- Removing un-developable lands due to transportation and infrastructure rights-of-way

These refinements improve the Inventory and also make it possible to directly and accurately compare the 2020 and revised 2015 Inventory to assess changes in the region’s industrial land base and changes in lands absorbed over the five-year period.

Appendix 11: Inventory Data Base

Property information collected through the 2020 Inventory, which can be used for further analysis:

Land Ownership / Tenure

- Private – fee simple, strata
- Railways
- Crown Corporations
- Public (municipal / regional – Metro Vancouver and TransLink)
- Public (Provincial)
- Public (Federal, Port, Airport)
- First Nations

Site Physical

- Site size
- Year building built / major renovation
- Assessed value of land / improvements
- Rights of Way (ROWs)
- Floodplain

Site Regulatory

- Municipal industrial zoning
- Municipal industrial designation
- Regional land use designations

