

Vancouver Port Authority



**Real Estate Administration at the
Vancouver Port Authority (VPA)**

**Presentation by
Ron McMillan - GIS/LIS Coordinator
December 13, 2004**

Introduction

- Overview of the Vancouver Port Authority (VPA)
- How CAD and GIS are used
- How VPA uses GIS to administer Real Estate
- Q & A

History of the VPA

- 1864 - Operated informally as a harbour
- 1913 - Vancouver Harbour Commission
- 1924 - “Six Harbours Agreement” established the Port of Vancouver as a Federal Port
- 1936 - National Harbours Board
- 1983 - Vancouver Port Corporation
- 1999 - Vancouver Port Authority

About the VPA

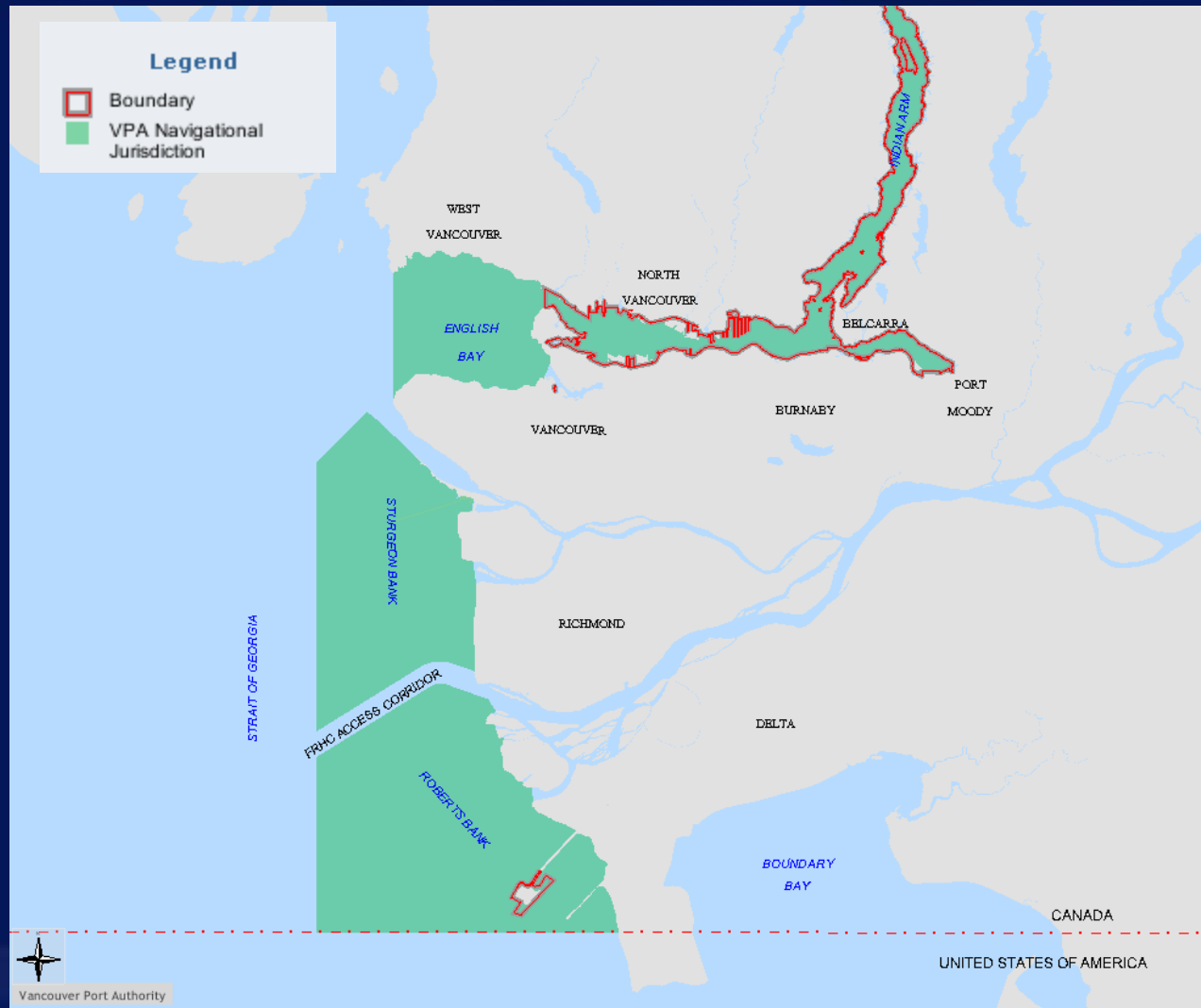
Areas

- Proprietary jurisdiction of 65 sq km
- Navigational jurisdiction of 392 sq km

Length of Coastline

- Proprietary – 161 km
- Navigational – 247 km

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VPA Navigational and Proprietary Jurisdictions

About the VPA

Bordering Municipalities:

- Vancouver
- District of North Vancouver
- City of North Vancouver
- District of West Vancouver
- Burnaby
- Belcarra
- Delta
- Port Moody
- Other
 - Province of BC (east side of Indian Arm)

About the Port of Vancouver

- #1 in Canada in Total Cargo handled
- #3 on West Coast full foreign containers
- Cruise Industry contributes \$508 million to regional economies
- Create 27,500 direct job across Canada
- \$620 million in taxes to governments
- \$55.5 million in PILT and property tax to 8 municipalities

How the VPA Operates

- *Canada Marine Act, Payments in Lieu of Taxes Act* and others federal laws define how the VPA operates.
- VPA operates as an Agent of Her Majesty in right of Canada and reports to the federal Minister of Transport.
- *Canada Marine Act* gives VPA the authority to lease or licence Federal Real Property in it's defined jurisdiction.
- VPA's Letters Patent issued in terms of the *Canada Marine Act*, identifies VPA's jurisdiction.

Management of VPA Land Records

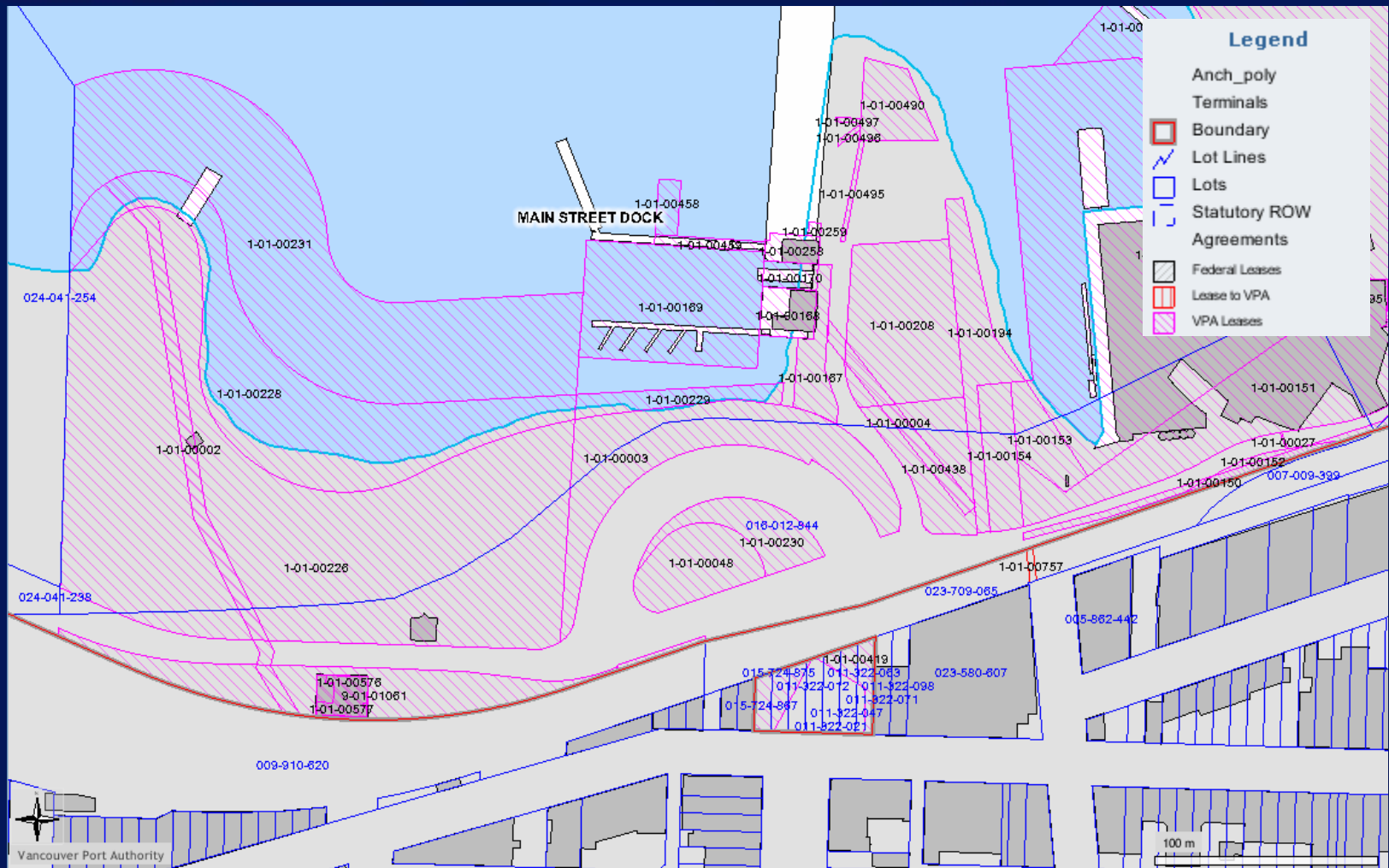
- VPA does not subscribe to the Provincial Land Titles Office (LTO) for recording leases or licences*.
- Some areas within the VPA jurisdiction are registered in the LTO, but those boundaries often do not correspond to the lease or licence parcels.
- VPA operates it's own private land registry system, using a combination of GIS and LIS (NovaLIS) systems.

*With the exception of residential waterfront licences

Management of VPA Land Records

- In effect, VPA operates two distinct boundary systems.
- LTO Parcels identified by a unique number
 - PID (e.g.: 016-012-844)
- VPA Parcels identified by a unique number
 - LID (e.g.: 1-01-00762)

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VPA parcels and LTO registered parcels

Uses of CAD at VPA

- Use AutoDesk:
 - Map
 - Raster Design
 - Land Desktop

- Allows compatibility with our contractors, surveyors, consultants and tenants.

Uses of CAD at VPA

- Real Estate
 - Mapping, cadastral parcels, surveys, VPA parcels
- Engineering
 - Structures, utilities, soundings
- Planning
 - Land use

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NOTES:
Date of Photography: September 22, 2002

PROJECTION:
Universal Transverse Mercator
GK 1237 | Zone: 10
Datum: NAD 83
Scale: 1:11000



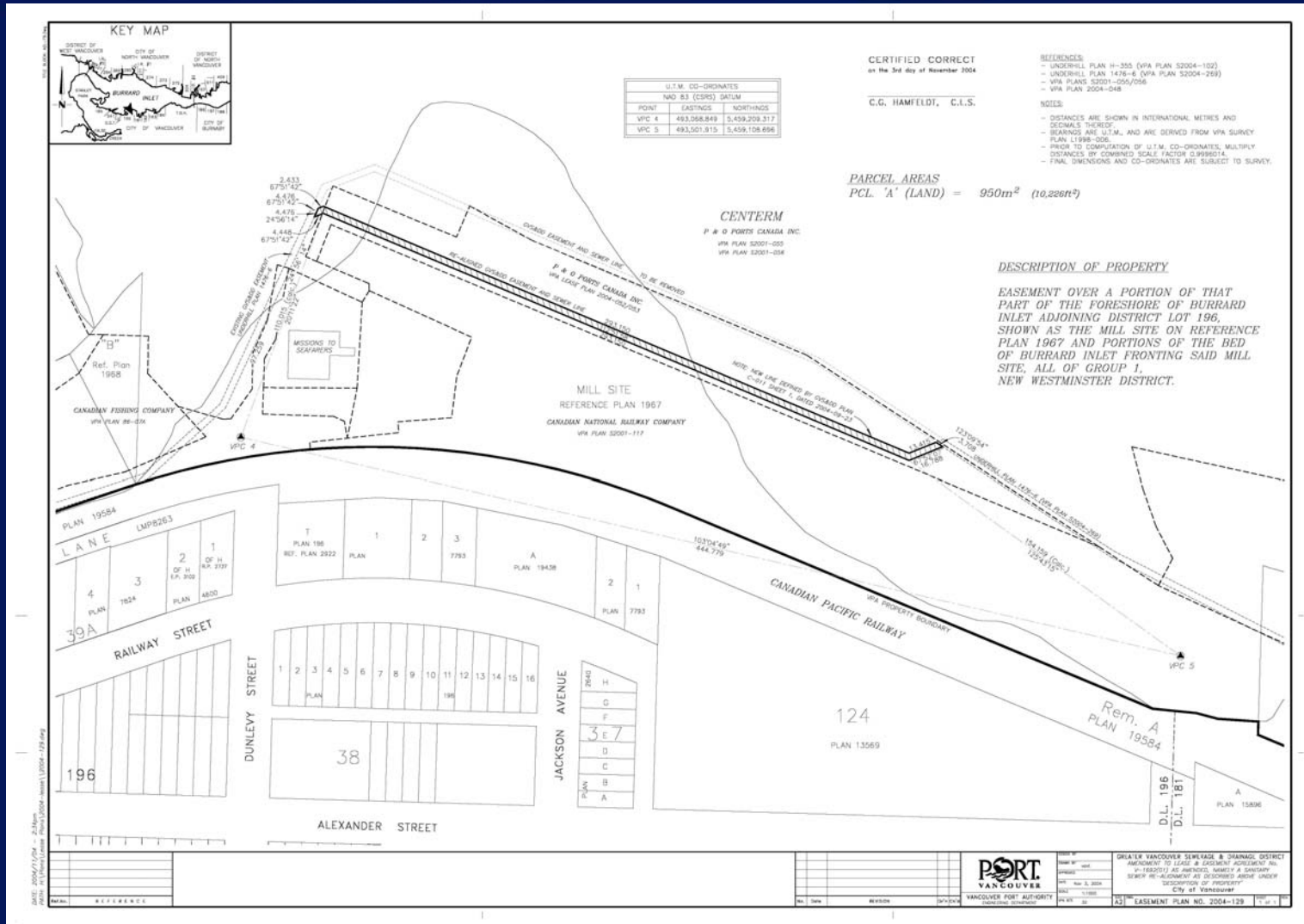
ENGINEERING DEPARTMENT
3900 Granville Square
300 Granville Street
Vancouver, B.C., Canada
V6C 3P9

SOUNDINGS

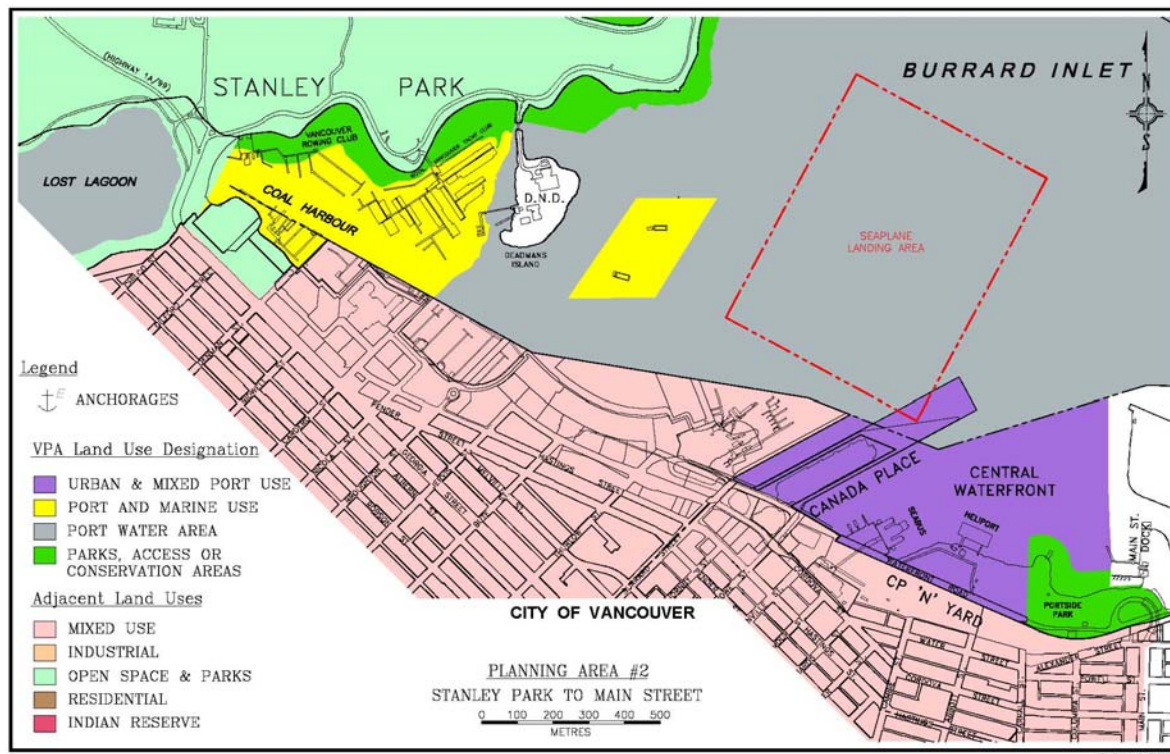
DELTAPORT - BERTH 2

10-394
SHEET 34

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AutoDesk Examples

CAD to GIS

- All Design work done in CAD
 - E.g.: Negotiations with tenants to lease/licence areas
- Data added to DWG source files:
 - Finalized VPA agreement & unoccupied parcels
 - Assigned unique LID number by our NovaLIS system known as [*PORTfolio*](#)
 - Current and historical parcels
 - Current mapping and provincial cadastral information

CAD to GIS

- Source DWG files contain:
 - Object data
 - Topology
 - Database (MS SQL Server)
 - Link templates

CAD to GIS

- Source DWG files are the basis of VPA's GIS
- Source DWG files are:
 - Queried into other CAD files
 - Used in design work in CAD
 - Exported out to use in ESRI SHP files

CAD to GIS

- **Types of Source DWG data**

- **Agreements – VPA lease/licence agreements, unoccupied property**

- **Cadastral – lots, easements, SROW, district lots, VPA, Harbour Headline, municipal, indian reserves, native land claims**


- **Natural Environment – land, water, bathymetry, reclaimed land**

- **Spatial Framework - monuments**

CAD to GIS

- **Types of GIS data (continued)**
 - **Infrastructure – electrical, water, sewer, telephone, fibre, communications, gas, hydro, structures, road, rail**
 - **Socio-Economic – electoral districts**
 - **World Data – Canada, USA, Mexico, Europe, World**

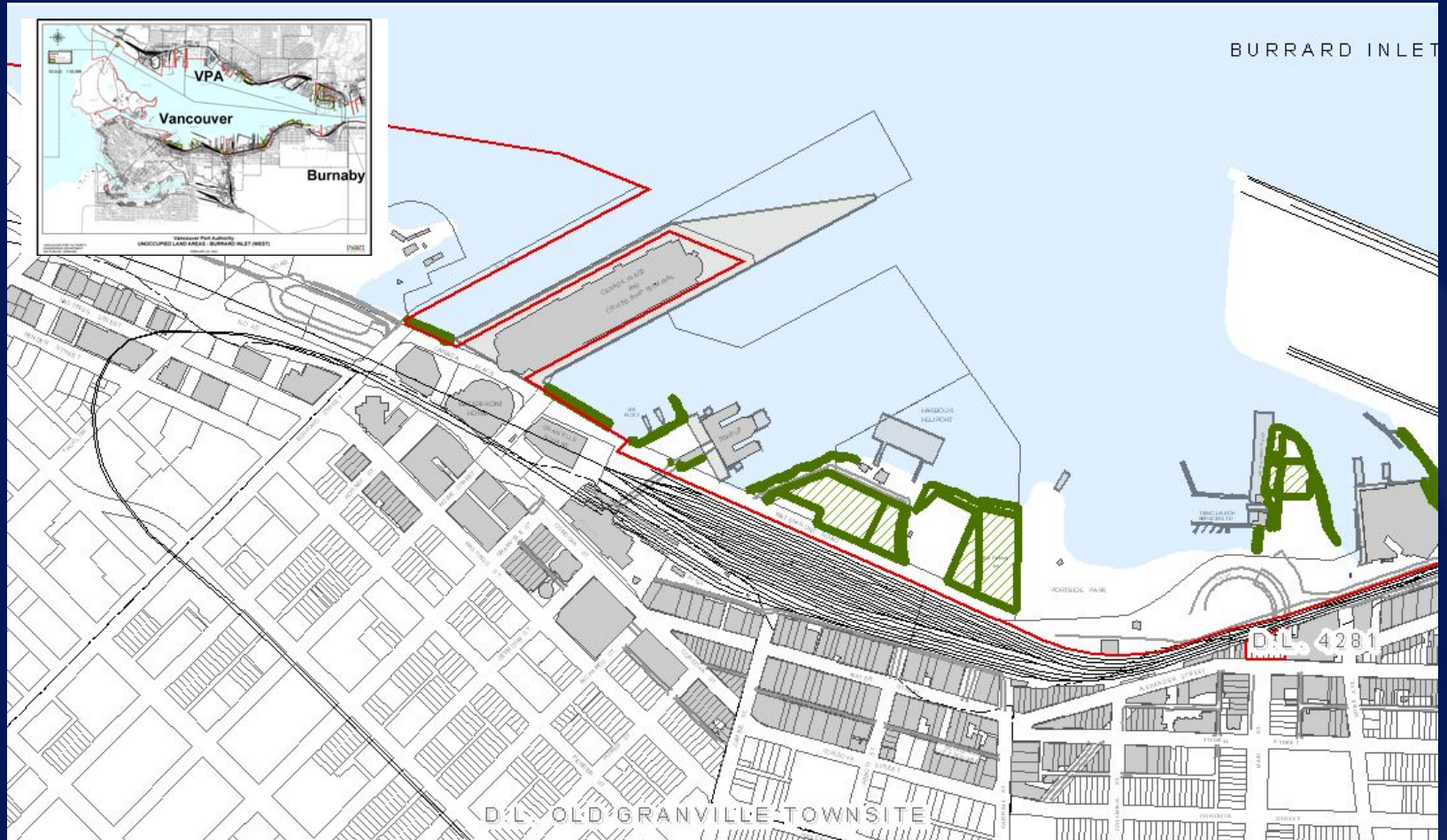
GIS Systems

- SHP files used in a number of VPA systems
 - Various projects
 - [PORTfolio](#) – ArcView 3.2a + NovaLIS Land Titles Framework
 - Maps on Request  – ArcIMS application

Real Estate GIS Projects

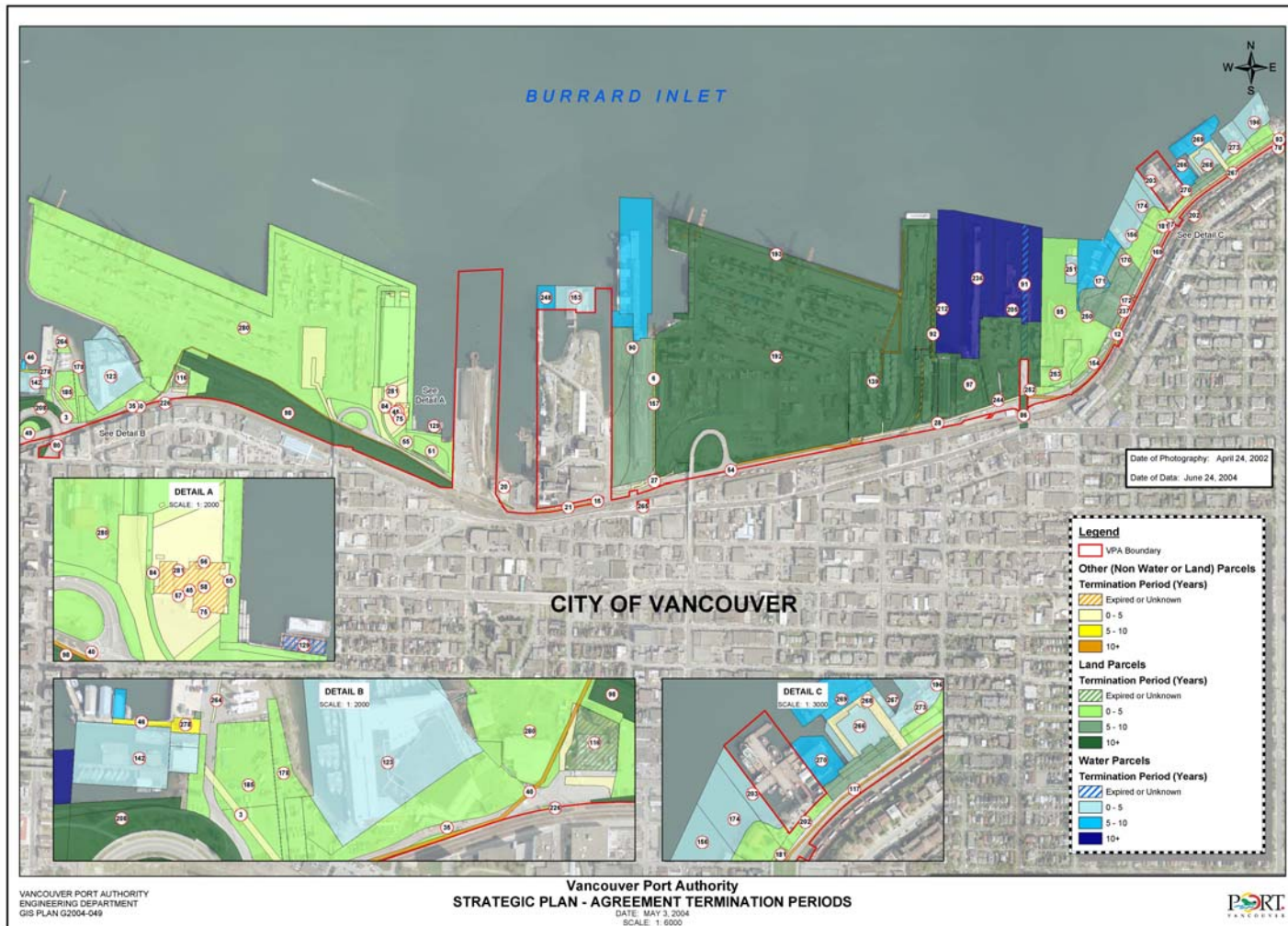
- Maps to better utilize Port Real Estate
- Maps to provide information on taxation

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Unoccupied Land Areas

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Strategic planning for future growth - Map

STRATEGIC PLAN - AGREEMENT TERMINATION PERIODS

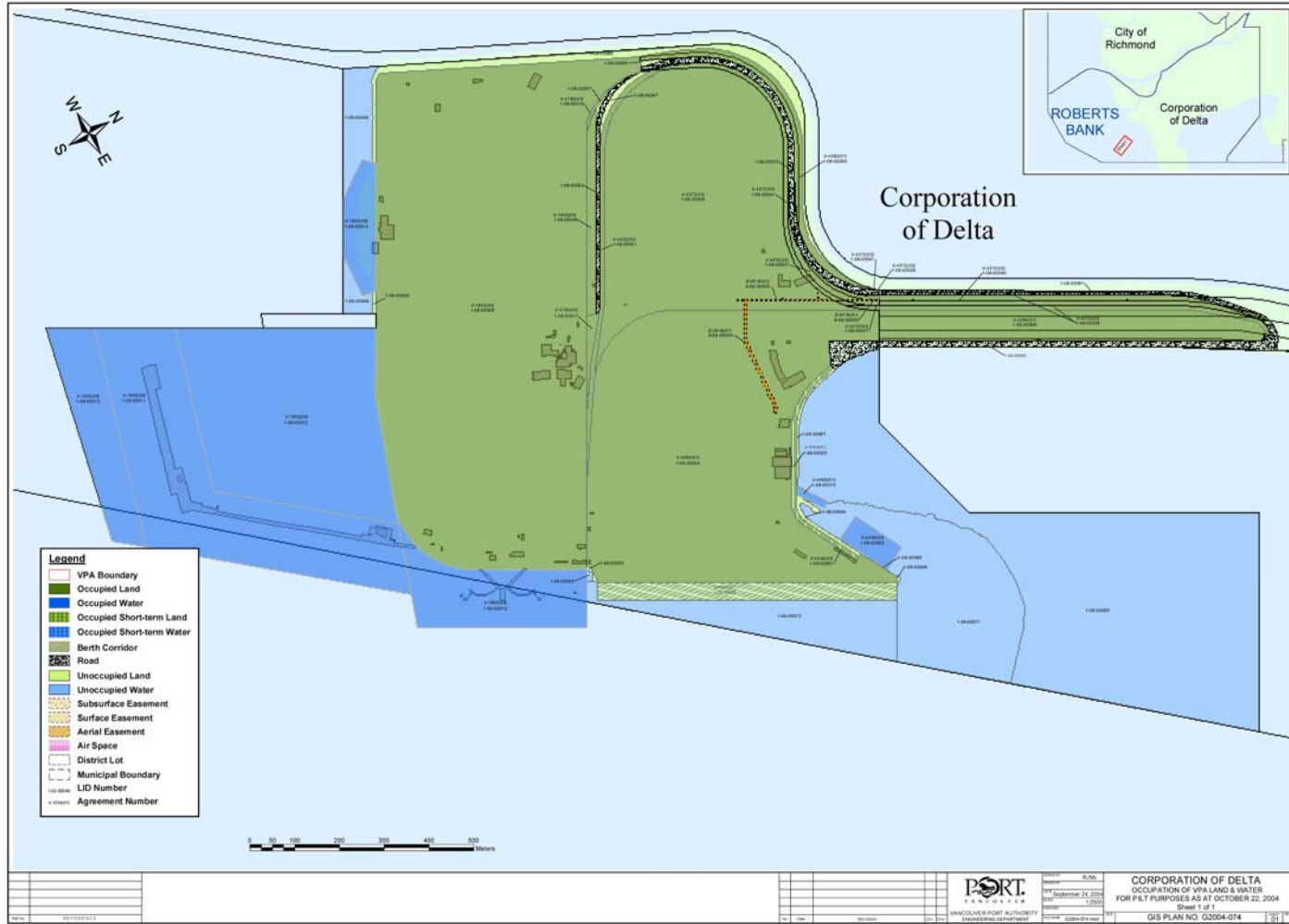
Attach to Plans G2004-047 to G2004-067

Data Date: June 24, 2004

Sorted by ID

<u>ID</u>	<u>Agreement Number</u>	<u>Tenant Name</u>	<u>Termination Date</u>	<u>Renewal End Date</u>
Agreements that expire in the next 0 - 5 years				
3	E-0004(01)	TYMAC LAUNCH SERVICE LTD.	31-Dec-2005	
4	E-0007(01)	CITY OF PORT MOODY	31-Dec-2007	
7	E-0013(01)	THE CORPORATION OF THE DISTRICT OF NORTH VANCOUVER	28-Feb-2006	
10	E-0020(02)	B.C. GAS UTILITY LTD.	30-Nov-2005	
13	E-0024(01)	YOUNG MEN'S CHRISTIAN ASSOCIATION OF GREATER VANCOUVER	30-Nov-2004	
15	E-0026(01)	UNITED GRAIN GROWERS LTD. ATTN: ALLAN TABLIZO	31-Jul-2006	
16	E-0027(02)	POLYGON DEVELOPMENT 141 LIMITED	27-Oct-2005	
20	E-0031(01)	TELUS COMMUNICATIONS (B.C.) INC.	30-Nov-2005	

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PILT Map for Delta

Real Estate Application -

Maps on Request (MOR)



- ESRI ArcIMS application
- Used by all VPA staff
- Only system at VPA that uses all available GIS data

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Maps on Request

Navigation Selection/Analysis Output Help

Layer List

- Base Map
- Infrastructure
- Crown Cadastre
- Agreements
- Sites
- Spatial Framework
- Ortho Photos

Active Layer: Crown Cadastre/Registered Parcels/Lots

Toogle:

Maps on Request

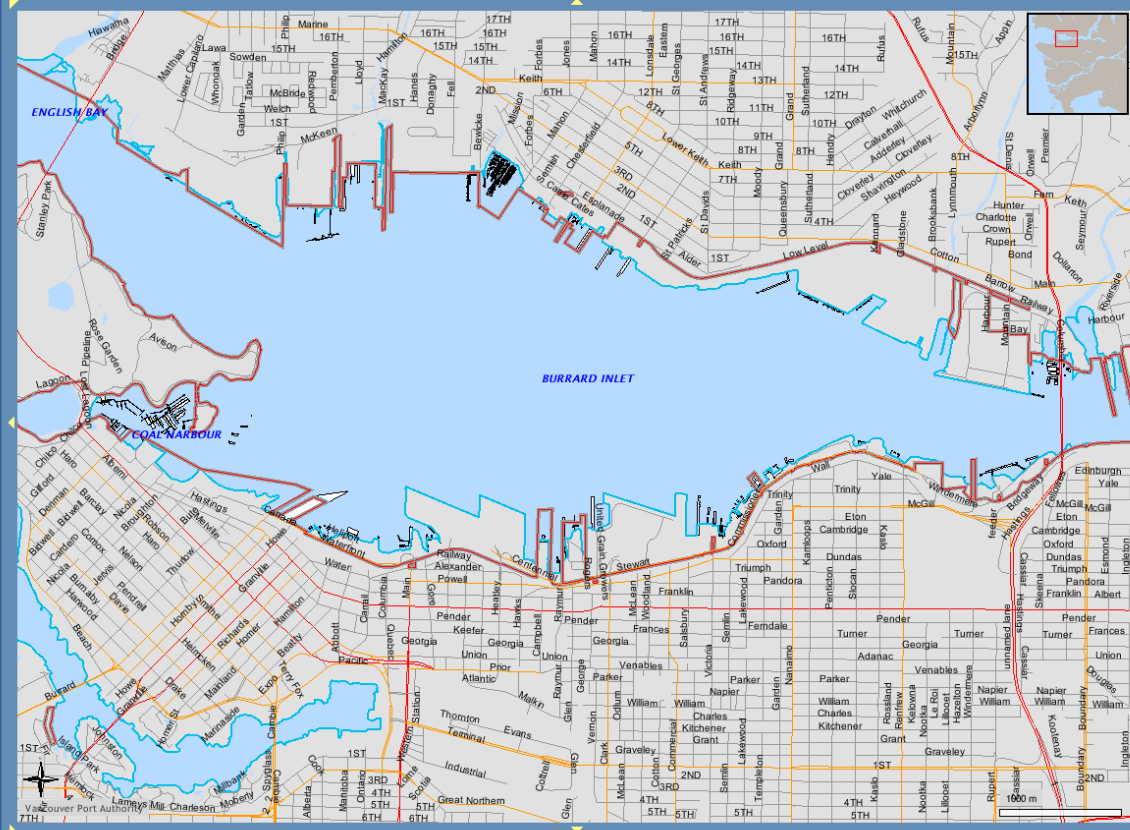
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PORT VANCOUVER Maps on Request

Navigation Selection/Analysis Output Help

- Select a query:
- PID
 - PID
 - UD
 - Tenant Name
 - Agreement Number
 - Business Type
 - Property Owner Name
 - Railway Owner Name
 - Electrical Services
 - Sanitary Sewer Services
 - Storm Sewer Services
 - Water Services
 - Location/Site ID
 - District Lot
 - Road Intersection
 - WARE ID



- Layer List
- Base Map
 - Infrastructure
 - Crown Cadastre
 - Agreements
 - Sites
 - Spatial Framework
 - Ortho Photos

Active Layer: Crown Cadastre/Registered Parcels/Lots

Toggles: [Icons]

Maps on Request – Query's

Maps on Request

Navigation Selection/Analysis Output Help


Select a query:
Agreement Number

Enter an Agreement No:
V 4291(01)

Agreements
6 selected record(s)

Zoom to record:	1
LID	1-06-00139
FICODE	AR15950000
LAYER_NAME	Current-Lease
PLAN_AREA	1102
FLOOR	0
TENANTNAME	WESTERN STEVEDORING COMPANY LTD. (LYNNTERM)
AGRENO	V-4291(01)
ASSIGNEDPA	Raymond Tsow
AGREPLANO	2004-008
AGRETYPE	Lease - Std. Long Form
TAXORGRANT	Taxable
PARCELTYPE	Land
PARCEL	D
BUSINES_TYP	Breakbulk
LID_ADDRESS	
LID_CITY	
LID_PROV	
LID_PSTCDE	
LID_COUNTR	
EFF_DATE	01/07/1994
EXP_DATE	31/12/2021
ACTIVE	T
OCCSTATUS	T
LAND_USE	Marine Use and Port Service
ENTRY_DATE	25/11/2004

Zoom to record:	2
LID	1-05-00314
FICODE	AR15950000
LAYER_NAME	Current-Lease
PLAN_AREA	284586
FLOOR	0
TENANTNAME	WESTERN STEVEDORING COMPANY LTD. (LYNNTERM)
AGRENO	V-4291(01)
ASSIGNEDPA	Raymond Tsow
AGREPLANO	2004-008
AGRETYPE	Lease - Std. Long Form
TAXORGRANT	Taxable



Layer List

- Base Map
- Infrastructure
- Crown Cadastre
- Agreements
- Agreements
- Unoccupied
- Sites
- Spatial Framework
- Ortho Photos

Active Layer: Agreements/Agreements

Toggles: [Icons]

Maps on Request – Query selection of an agreement

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Maps on Request

Navigation Selection/Analysis Output Help

Select a query: Agreement Number

Enter an Agreement No: 4291(01)

Agreements 6 selected record(s)

Zoom to record:	1
LID	1-06-00139
FCODE	AR15950000
LAYER_NAME	Current-Lease
PLAN_AREA	1102
FLOOR	0
TENANTNAME	WESTERN STEVEDORING COMPANY LTD. (LYNNTERM)
AGRENO	V-4291(01)
ASSIGNEDPA	Raymond Tsow
AGREPLANO	2004-008
AGRETYPE	Lease - Std. Long Form
TAXORGRANT	Taxable
PARCELTYPE	Land
PARCEL	D
BUSNES_TYP	Breakbulk
LID_ADDRES	
LID_CITY	
LID_PROV	
LID_PSTCDE	
LID_COUNTY	
EFF_DATE	01/07/1994
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BUSNES_TYP	Breakbulk
LID_ADDRES	
LID_CITY	
LID_PROV	
LID_PSTCDE	
LID_COUNTY	
EFF_DATE	01/07/1994
EXP_DATE	31/12/2021
ACTIVE	T
OCCSTATUS	T
LAND_USE	Marine Use and Port Service
ENTRY_DATE	25/11/2004

LYNNTERM (WEST GATE)

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Active Layer: Crown Cadastre/Registered Parcels/Lots

Toggles: [Icons]

Layer List

- Base Map
- Infrastructure
 - Sanitary Sewer
 - Storm Sewer
 - Water System
 - Process Sewer
 - Electrical Services
 - Communication Services
 - Fibre Optic Services
 - Gas Service
 - Telephone
 - Dockface Features
 - Water Transport
 - Rail Transport
 - Miscellaneous Structures
 - Crown Cadastre
 - Agreements
 - Sites
 - Spatial Framework
 - Ortho Photos

Maps on Request – Review LID parcel and relevant utilities

Real Estate Application - *PORTfolio*

- Parcel centric system (Land Information System)
- Contains information relating to:
 - VPA Parcels – LID numbers
 - Agreements
 - Contacts
 - Environment
 - GIS

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Parcel Viewer: Prod. v. 1.0 : 3

File Edit View Data Tools Document Management ViewerReports DbReports Help

Commit Rollback ? Clone

LID: 1-01-00762 Parcel: A SID: 138

Status: Active

Active Date: 01 Nov 2003 Canceled Date:

VPA Description: LICENCE AREAS FOR THREE SEA WATER INTAKE PIPES AND ONE DISCHARGE PIPE COMPRISING PORTIONS OF

Municipality: Vancouver

Civic Address:

Parcel Type: Water

Area (m2): 890.00

Area (ft2): 9,579.8799 Rental Area (ft2):

On-Site Services* Land Access* Reverter* Vesting*

Improvements* Water Access* Unregistered Interests* Grantable* Occupied*

Current Use:

Future Use:

VPA Purchase Price:

Total Purchase Costs:

Purchase Date:

Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
LID	Parcel	Parcel Type	Status	Area (m2)	Area (ft2)	Current Use	Future Use					
1-01-00762	A	Water	Active	890.00	9,579.8799							
1-01-00763	B	Water	Active	565.00	6,081.60915							
1-01-00764	C	Water	Active	1,012.00	10,893.07692							
1-01-00765	D	Water	Active	45.60	490.8343							

Ready V RJM 29Nov2004 08:45:16 S 1/4 (0M)

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Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
Agreement #	Tenant				Commencement		Termination		Agreement Type		Status	
L-0673(01)	VANCOUVER AQUARIUM MARINE SCIENCE CENTRE				01 Nov 2003		31 Oct 2015		Licence - Commercial		Active	

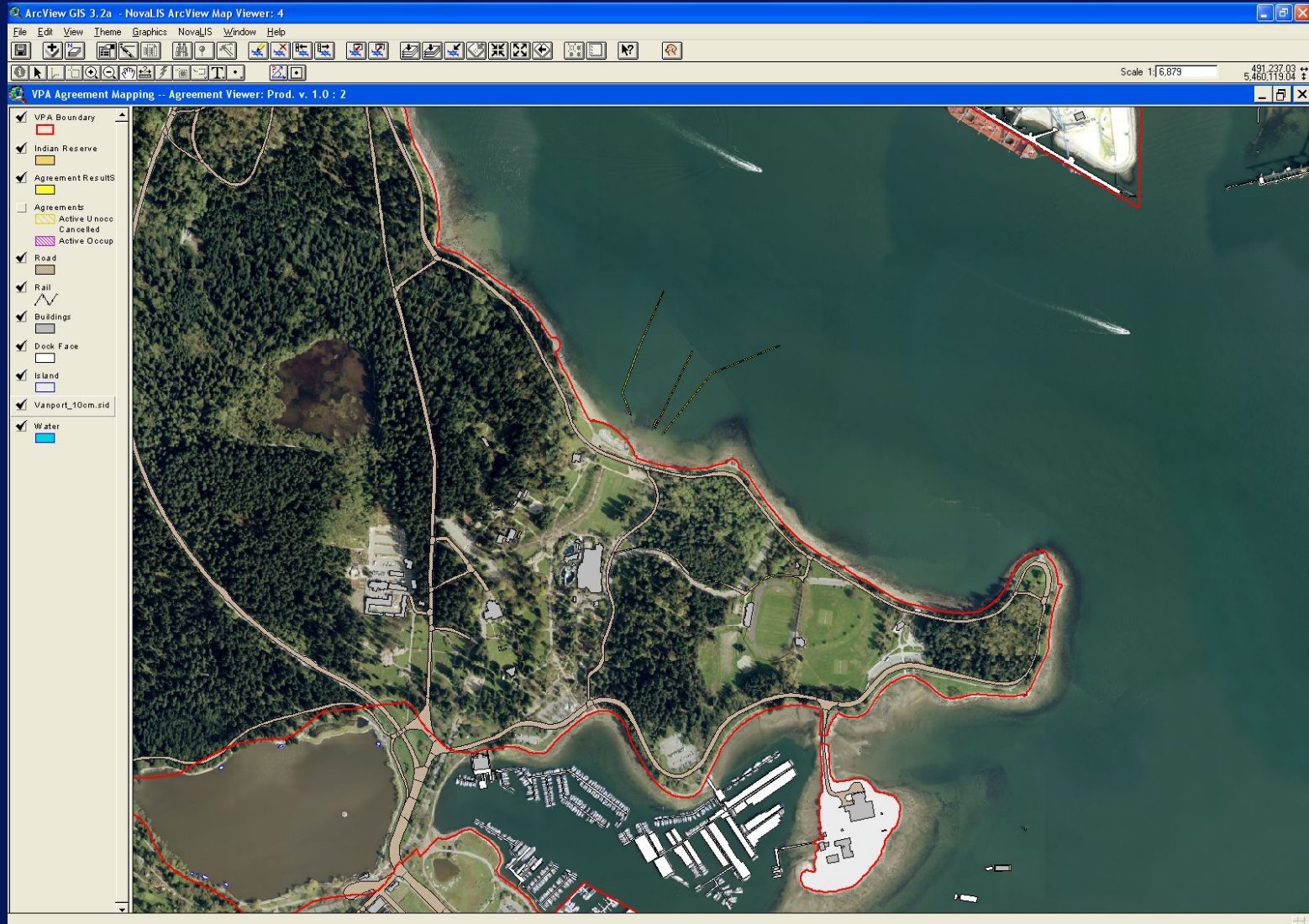
Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
FCODE	Layer Name				Floor			GIS Agreement				
VLA1000	Current-License				0			L-0673(01)				

Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
LID	Parcel	Parcel Type	Area (m2)	Area (ft2)	Current Use			VPA Description				
1-01-00729	A	Water - Harbour Wa	6,794,253.00	73,132,727.80923				A PORTION OF THE BED OF BURRARD INLET LYING FRONTIN				

Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
Parcel							PID	016-012-844				
<ul style="list-style-type: none"> PID 016-012-844 <ul style="list-style-type: none"> Ownership Her Majesty in right of Canada LTO Title # BL100097 							LTO Legal	Lot 6 (Reference Plan 10341) of the Public Harbour of Burrard Inlet				
							Notes					
							Author					

Results	Agreement	Appraisal	GIS	Improvements	On-Site Services	Parcel History	PILT	Provincial Info	Rent	SID	VPA Plan	Notes
VPA Plan #	Source		Type		Active		Plan Date		LTO Plan #			
2003-096	VPA		Licence Plan		Yes		02 Dec 2003					

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*PORT*folio – Map Viewer

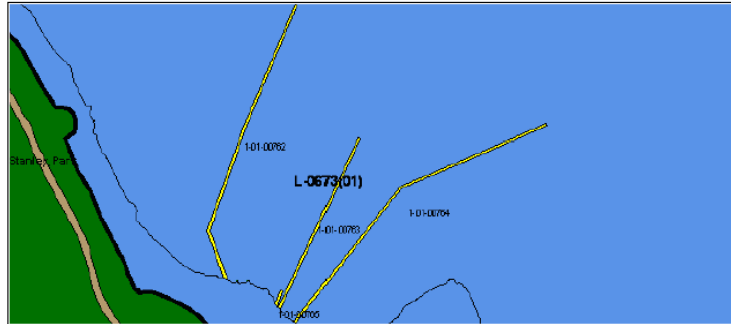
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Agreement Synopsis Report

DATE: 20-November-2014
 Sorted by: Agreement No.
 PORTFOLIO Report No. R1002-004

L-0673(01) VANCOUVER AQUARIUM MARINE SCIENCE CENTRE



Agreement No.: L-0673(01) Agreement Status: Active
 Tenant Name: VANCOUVER AQUARIUM MARINE SCIENCE CENTRE
 Agreement Type: Licence - Commercial Business Type: Pipe Line
 Commencement: 01-Nov-2003 Termination: 31-Oct-2015

Legal Description: Licence areas for three sea water intake pipes and one discharge pipe comprising portions of the Bed of Burrard Inlet fronting Stanley Park, Group 1, NWD, in the City of Vancouver, Province of BC

Purpose: Operation, maintenance, inspection, repair and replacement of THREE (3) sea-water intake pipes and ONE (1) effluent discharge pipe connected to the Vancouver Aquarium fish tanks, mammal pods and filters, located within, upon and along the Licence Area...

YPA Plan

2003-096 Licence Plan

LID	Parcel	Type	Area ft ²	Area m ²	Rental Area ft ²	Rental Rate ft ²	Rent
Period:	01-Nov-2003 to 31-Oct-2015						
1-01-00762	A	Water	9,579.88	890.00			\$0.00
1-01-00763	B	Water	6,081.61	565.00			\$0.00
1-01-00764	C	Water	10,893.08	1,012.00			\$0.00
1-01-00765	D	Water	490.83	45.60			\$0.00
			27,045.40	2,512.60			

Other Income

Type	Period	Amount
N/A		

Real Estate Administration at the Vancouver Port Authority (VPA)

- GIS used in a number of Real Estate related systems
- Tool used for administration of VPA Real Estate assets
- Our systems are flexible and they will continue grow with the GIS in the future.

- Questions?