



# PDS Data Optimization User Manual

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# Introduction

This application efficiently identifies and catalogs terms in PDF documents, scanning around 500 publicly available PDF files from the City of Vancouver website for user-defined terms and related terms. It then outputs an Excel file containing detailed information about each occurrence, including document titles, section numbers, and reference paragraphs. Moreover, it proposes updates to documents based on user-defined prompts, processing amendments with suggested updates. Additionally, the application extracts and organizes data from PDF documents for database integration, fetching selected files, and allowing users to define data fields.

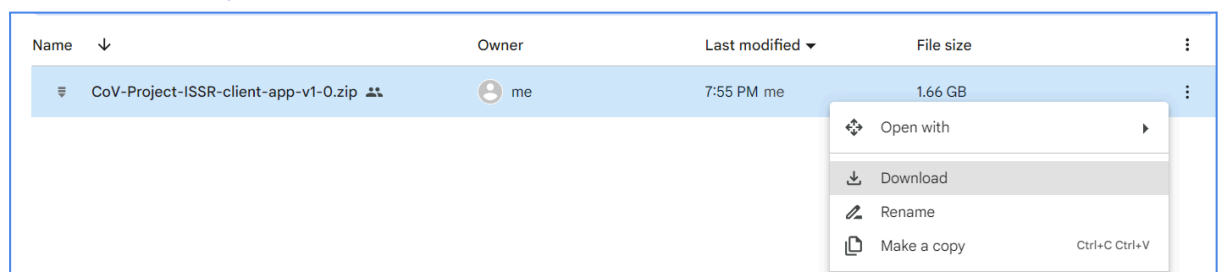
## System Requirements

Operating System	Windows
Web Browser	Google Chrome, Mozilla Firefox, Microsoft Edge

## Installation

### Download

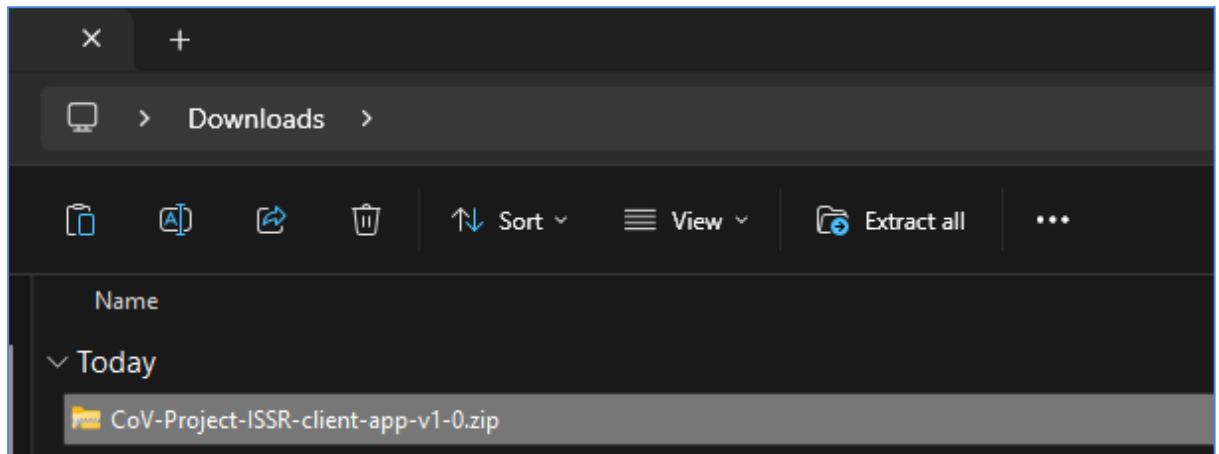
1. User can download the application zip file from our Google Drive with following link (may change after 31 May 2024):  
[https://drive.google.com/file/d/1Jg\\_SKR\\_NK9GSSHa2GEgOKNTvWXn4QRkr/view?usp=drive\\_link](https://drive.google.com/file/d/1Jg_SKR_NK9GSSHa2GEgOKNTvWXn4QRkr/view?usp=drive_link)



*Note: The file is approximately 1.7 GB and may take up to 5-10 minutes to download.*

## Setup

2. Unzip the CoV-Project-ISSR-client-app-v(x).zip file in any non-restricted folder.



3. The following list of files should appear after unzipping.

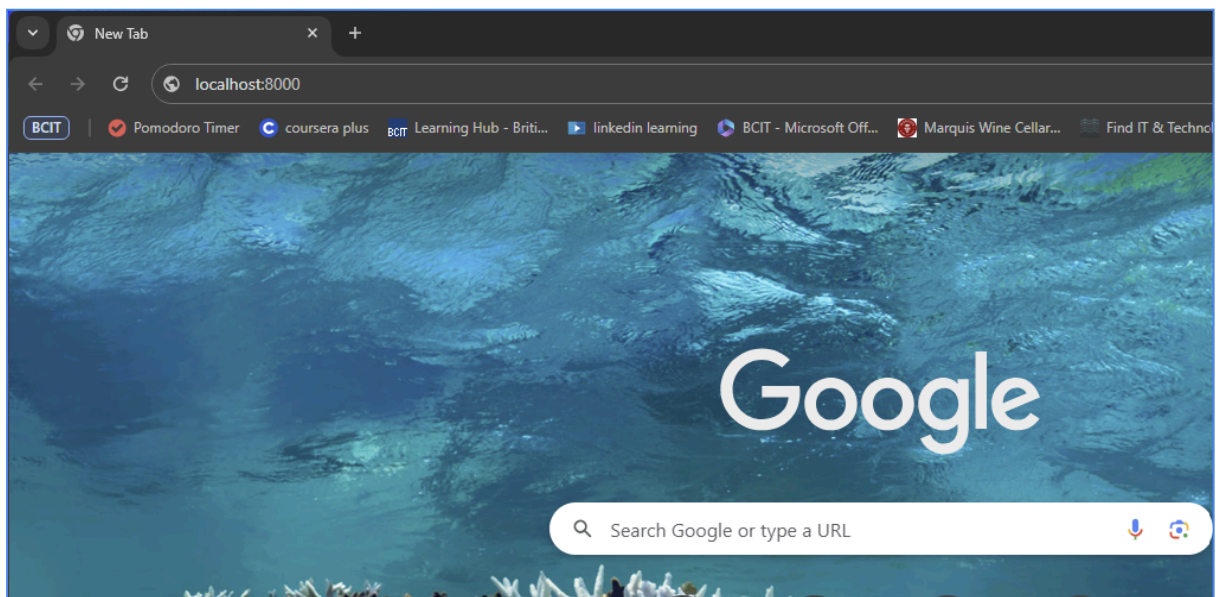
Name	Date modified	Type	Size
downloaded_pdfs	28/5/2024 3:10 pm	File folder	
credential.ini	28/5/2024 1:22 pm	Configuration sett...	1 KB
development.ini	27/5/2024 6:16 pm	Configuration sett...	1 KB
doc_type.json	25/5/2024 12:58 am	JSON File	253 KB
processed_final.json	22/5/2024 10:51 pm	JSON File	25,689 KB
server.exe	29/5/2024 12:16 am	Application	439,489 KB

## Start Application

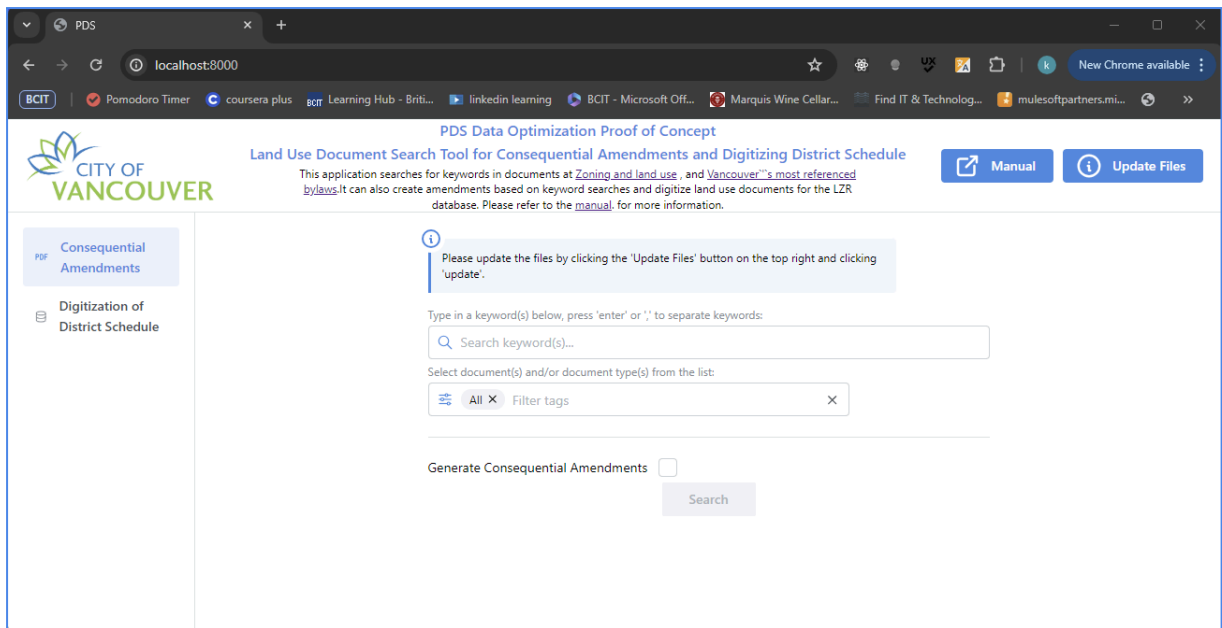
4. Double-click the server.exe file to start the application. A window will open.
5. After 3-5 minutes, the following screen will show. Indicating the application is ready to access.

```
C:\Users\kevin\Downloads\te: X + v
* Serving Flask app 'server'
* Debug mode: on
WARNING: This is a development server. Do not use it in a production deployment. Use a production WSGI server instead.
* Running on http://127.0.0.1:8000
Press CTRL+C to quit
* Restarting with stat
* Debugger is active!
* Debugger PIN: 180-185-503
```

6. From any browser, type localhost:8000 or 127.0.0.1:8000 and press Enter to access the application.



7. When you see the screen below, the application has successfully started.



*Note: Do not close the black screen application Windows until you decide to exit the application*

## Exit Application

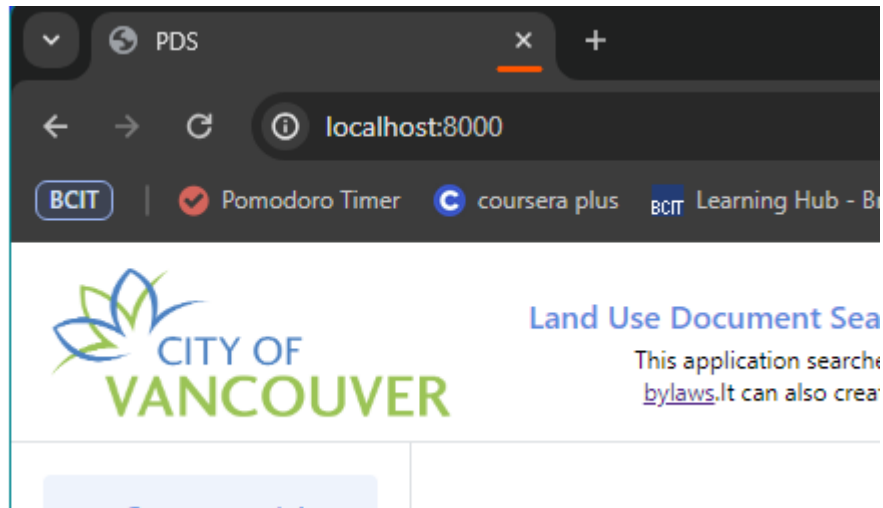
1. Click the close button (X) on the top right-handed corner to terminate the program. The application is now completely stopped.

```

C:\Users\kevin\Downloads\te X + v
* Running on http://127.0.0.1:8000
Press CTRL+C to quit
* Restarting with stat
* Debugger is active!
* Debugger PIN: 180-185-503
[2024-05-29 00:38:06,263] INFO in server: A request is received for loading home page
127.0.0.1 - - [29/May/2024 00:38:06] "GET / HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/css/c196650da8e3275d.css HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/css/4c8d1ee479f99e2d.css HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/city_vancouver_logo.png?w=256&q=75 HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/chunks/webpack-d91acff6684edb66.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/chunks/fd9d1056-009d2d77d7923481.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/chunks/69-fc-fab5d03f85bc33.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:06] "GET /static/chunks/main-app-802dac5169098e0b.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/987-840aca4991a01090.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/747-8cf0b916c915bbb5.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/423-0d590daff5094182.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/app-page-3217292ee015c91a.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/723-a2dc065f9de2807e.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/chunks/app/layout-a04ea41aed4a098b.js HTTP/1.1" 200 -
127.0.0.1 - - [29/May/2024 00:38:07] "GET /static/css/4c8d1ee479f99e2d.css HTTP/1.1" 304 -
127.0.0.1 - - [29/May/2024 00:38:08] "GET /static/css/c196650da8e3275d.css HTTP/1.1" 304 -
[2024-05-29 00:38:08,407] INFO in server: /search/info: received a request
[2024-05-29 00:38:08,407] INFO in server: /search: finished scrapping and return response
127.0.0.1 - - [29/May/2024 00:38:08] "GET /search/info HTTP/1.1" 200 -
[2024-05-29 00:38:08,408] INFO in server: /data: received a request
[2024-05-29 00:38:08,415] INFO in server: /data: return 589 files response
127.0.0.1 - - [29/May/2024 00:38:08] "GET /data HTTP/1.1" 200 -

```

2. (Optional) Close the webpage on your Browser by clicking the (X) on the tab of the page.



## Usage


### Consequential Amendments

1. Click on “Consequential Amendments” on the left hand navbar.


2. Enter keyword(s) into the search box by pressing “Enter”, or separated by a comma.

3. Select filters as needed. The application will search all documents by default.

Type in a keyword(s) below, press 'enter' or ',' to separate keywords:

 parking X Search keyword(s)... X

Select document(s) and/or document type(s) from the list:


 All X Filter tags X

Categories


Zoning and Development By-law  
Official development plan by-laws  
Policies  
Guidelines  
City-owned or leased facility guidelines

4. Click on "Search".

Type in a keyword(s) below, press 'enter' or ',' to separate keywords:

 parking X Search keyword(s)... X

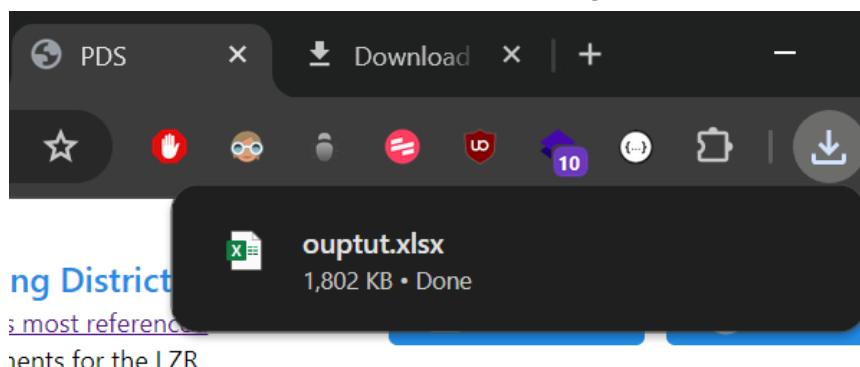
Select document(s) and/or document type(s) from the list:

 All X Filter tags X

Generate Consequential Amendments ☐

Search

5. After a moment, an Excel file will be generated.





6. Below is the Excel output for the previous configurations.

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
Document	File name	Title	AI Title	Section #	Section Title	Search Term	Link	Page Number	Reference	Used	Amend	Rationale											
Guideline: B001.pdf	900 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu1">https://gu1</a>	50	City of No	Amenc	No	Rationale											
Guideline: B001.pdf	900 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu6">https://gu6</a>		City of Var	No	Amenc	No	Rationale										
Guideline: B001.pdf	900 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu7">https://gu7</a>		City of Va	No	Amenc	No	Rationale										
Guideline: B002.pdf	1601 Wes	No AI Title	Unknown	Unknown	parking		<a href="https://gu1">https://gu1</a>		Page 1 A	No	Amenc	No	Rationale										
Guideline: B002.pdf	1601 Wes	No AI Title	Unknown	Unknown	parking		<a href="https://gu10">https://gu10</a>		3.10 Parki	No	Amenc	No	Rationale										
Guideline: B002.pdf	1601 Wes	No AI Title	Unknown	Unknown	parking		<a href="https://gu10">https://gu10</a>		Commerci	No	Amenc	No	Rationale										
Guideline: B002.pdf	1601 Wes	No AI Title	Unknown	Unknown	parking		<a href="https://gu18">https://gu18</a>		City of Va	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu2">https://gu2</a>		Page 1 A	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu10">https://gu10</a>		The lower	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu10">https://gu10</a>		3.8 Parkin	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu10">https://gu10</a>		Garbage s	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu13">https://gu13</a>		City of Va	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu17">https://gu17</a>		City of Va	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu22">https://gu22</a>		(a) Portion	No	Amenc	No	Rationale										
Guideline: B004.pdf	201 Burrai	No AI Title	Unknown	Unknown	parking		<a href="https://gu28">https://gu28</a>		2A (Burrai	No	Amenc	No	Rationale										
Bulletins	bulletin-ar	Animal Gr	No AI Title	Unknown	Unknown	parking	<a href="https://by1">https://by1</a>		Backgrou	No	Amenc	No	Rationale										
Bulletins	bulletin-bi	Building G	No AI Title	Unknown	Unknown	parking	<a href="https://by2">https://by2</a>		Requirem	No	Amenc	No	Rationale										
Bulletins	bulletin-cc	Communit	No AI Title	Unknown	Unknown	parking	<a href="https://by1">https://by1</a>		Should the	No	Amenc	No	Rationale										
Bulletins	bulletin-cc	Communit	No AI Title	Unknown	Unknown	parking	<a href="https://by2">https://by2</a>		When mal	No	Amenc	No	Rationale										
Bulletins	bulletin-d	Developm	No AI Title	Unknown	Unknown	parking	<a href="https://by5">https://by5</a>		DCLs appl	No	Amenc	No	Rationale										
Bulletins	bulletin-d	Developm	No AI Title	Unknown	Unknown	parking	<a href="https://by7">https://by7</a>		There are	No	Amenc	No	Rationale										
Bulletins	bulletin-er	Emergenc	No AI Title	Unknown	Unknown	parking	<a href="https://by1">https://by1</a>		(a) the cor	No	Amenc	No	Rationale										
Bulletins	bulletin-fi	Calculation	No AI Title	Unknown	Unknown	parking	<a href="https://by3">https://by3</a>		Areas use	No	Amenc	No	Rationale										

Note: For section number/title, “Unknown” indicates an error occurred, while “Not found” indicates the AI responded, but the section does not exist.

7. To generate amendments, click on the “Generate Consequential Amendments” checkbox.

Type in a keyword(s) below, press 'enter' or ',' to separate keywords:

Select document(s) and/or document type(s) from the list:

Generate Consequential Amendments ☐

Search

8. Enter the AI prompt for changes needed. Then, click on “Search”.

#### Generate Consequential Amendments

Please type your AI prompt to identify regulations in need of change and to propose a consequential amendment.

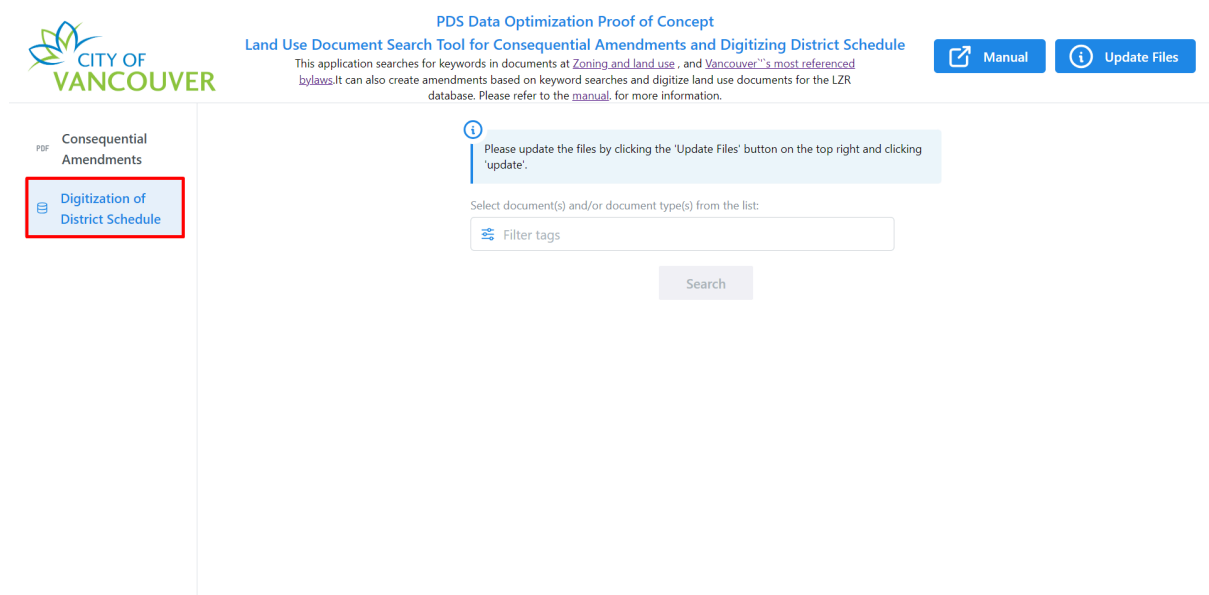
Example: If there is any mention of parking space size or the number of parking spots, replace it with 'See parking by-law'. Do not replace mentions of parking access or location. Do not replace if the parking by-law is already mentioned.

Search

*Note: For section number/title, there will be a 60 second timeout every 5 search results. For amendments, there will be a 60 second timeout every 20 search results. This is due to the free AI model limitations.*

## Digitization of District Schedule

1. Click on “Digitization of District Schedule” on the left hand navbar.



**CITY OF VANCOUVER**

**PDS Data Optimization Proof of Concept**

**Land Use Document Search Tool for Consequential Amendments and Digitizing District Schedule**

This application searches for keywords in documents at [Zoning and Land Use](#), and [Vancouver's most referenced bylaws](#). It can also create amendments based on keyword searches and digitize land use documents for the LZR database. Please refer to the [manual](#) for more information.

[Manual](#) [Update Files](#)

**Consequential Amendments**

**Digitization of District Schedule**

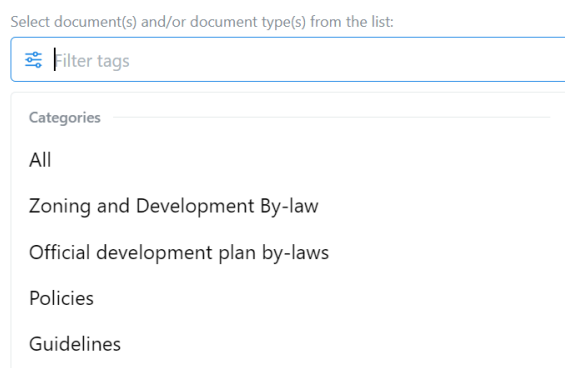
Please update the files by clicking the 'Update Files' button on the top right and clicking 'update'.

Select document(s) and/or document type(s) from the list:

Filter tags

Search

2. Apply filters as necessary, then click on “Search”.



Select document(s) and/or document type(s) from the list:

Filter tags

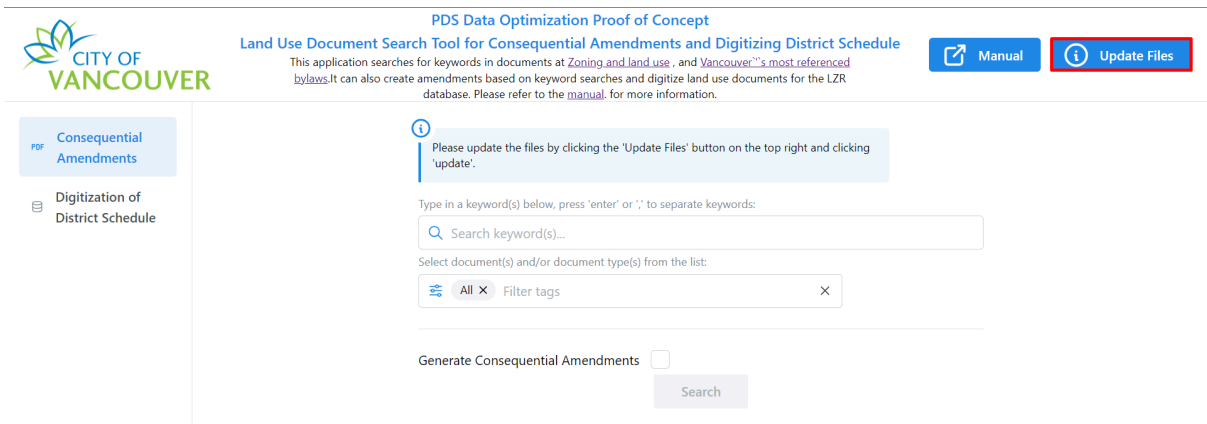
Categories

- All
- Zoning and Development By-law
- Official development plan by-laws
- Policies
- Guidelines

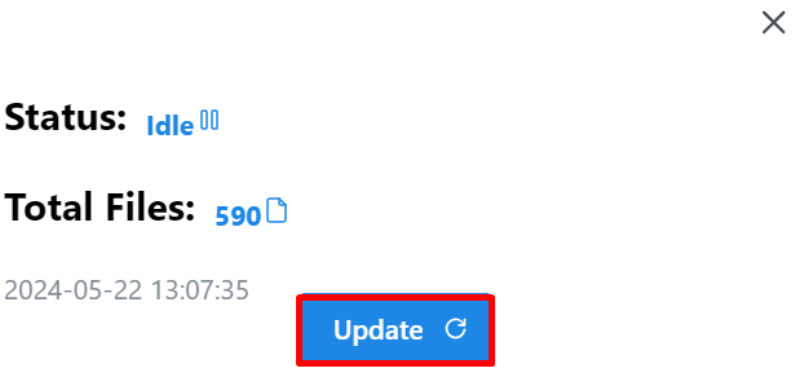
3. (excel output)

# Update Documents

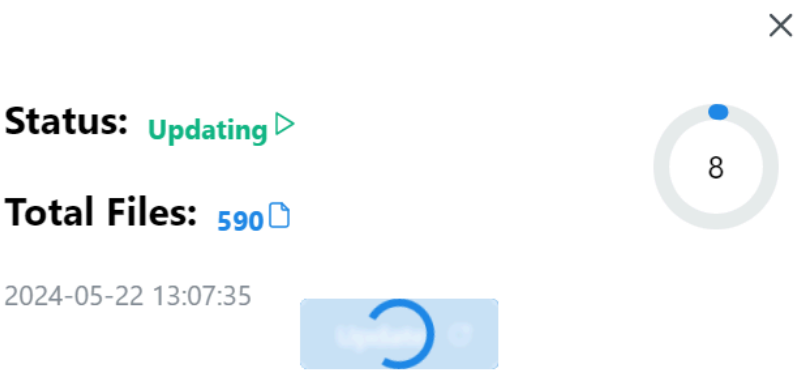
- 1. To update documents, click on the "Update Files" button in the top right corner.



- 2. A popup window will appear. Click on "Update".



- 3. The same popup window will show the update progress.



- 4.