
ArcGIS Business Analyst - 2023 Canada Data Update

Last revised September 2023

Contents

Contents

2023 Canada Data Update	1
Overview	1
2023 Boundaries	1
2023 Demographic Data	1
CensusPlus 2021	1
2023 HouseholdSpend	3
2023 Daytime Population	4
2023 Data Collections	6
2023 Business Listings.....	6
2023 Shopping Centre Listings	6
Data Structures	7
Geodatabases	7
MXD Layer Groups	7
Leveraging PRIZM Data	9
Within the Target Marketing tool	9
By Dissemination Area within your Table Data	9

US GOVERNMENT RESTRICTED/LIMITED RIGHTS

Any software, documentation, and/or data delivered hereunder is subject to the terms of the License Agreement. The commercial license rights in the License Agreement strictly govern Licensee's use, reproduction, or disclosure of the software, data, and documentation. In no event shall the US Government acquire greater than RESTRICTED/LIMITED RIGHTS. At a minimum, use, duplication, or disclosure by the US Government is subject to restrictions as set forth in FAR §52.227-14 Alternates I, II, and III (DEC 2007); FAR §52.227-19(b) (DEC 2007) and/or FAR §12.211/12.212 (Commercial Technical Data/Computer Software); and DFARS §252.227-7015 (DEC 2011) (Technical Data—Commercial Items) and/or DFARS §227.7202 (Commercial Computer Software and Commercial Computer Software Documentation), as applicable. Contractor/Manufacturer is Esri, 380 New York Street, Redlands, CA 92373-8100 USA.

The information contained in this document is subject to change without notice.

@esri.com, 3D Analyst, ACORN, Address Coder, ADF, AML, ArcAtlas, ArcCAD, ArcCatalog, ArcCOGO, ArcData, ArcDoc, ArcEdit, ArcEditor, ArcEurope, ArcExplorer, ArcExpress, ArcGIS, arcgis.com, ArcGlobe, ArcGrid, ArcIMS, ARC/INFO, ArcInfo, ArcInfo Librarian, ArcLessons, ArcLocation, ArcLogistics, ArcMap, ArcNetwork, ArcNews, ArcObjects, ArcOpen, ArcPad, ArcPlot, ArcPress, ArcPy, ArcQuest, ArcReader, ArcScan, ArcScene, ArcSchool, ArcScripts, ArcSDE, ArcSdl, ArcSketch, ArcStorm, ArcSurvey, ArcTIN, ArcToolbox, ArcTools, ArcUSA, ArcUser, ArcView, ArcVoyager, ArcWatch, ArcWeb, ArcWorld, ArcXML, Atlas GIS, AtlasWare, Avenue, BAO, Business Analyst, Business Analyst Online, BusinessMAP, CityEngine, Community, Community Analyst, CommunityInfo, Community Maps, Database Integrator, DBI Kit, EDN, Esri, esri.com, Esri—Team GIS, Esri—*The GIS Company*, Esri—The GIS People, Esri—The GIS Software Leader, FormEdit, GeoCollector, GeoEnrichment, GeoEvent, Geographic Design System, Geography Matters, Geography Network, geographynetwork.com, Geoloqi, GeoPlanner, Geoportal, Geotrigger, GIS by Esri, gis.com, GISData Server, GIS Day, gisday.com, GIS for Everyone, Insights, JTX, MapIt, Maplex, MapObjects, MapStudio, ModelBuilder, MOLE, MPS—Atlas, PLTS, Rent-a-Tech, SDE, SML, Sourcebook•America, SpatialLABS, Spatial Database Engine, Story Map Countdown, Story Map Journal, Story Map Playlist, Story Map Shortlist, Story Map Spyglass, Story Map Swipe, Story Map Tabbed, Story Map Tour, StreetMap, Tapestry, the ARC/INFO logo, the ArcGIS Explorer logo, the ArcGIS logo, the ArcPad logo, the Esri globe logo, the Esri Press logo, The Geographic Advantage, The Geographic Approach, the GIS Day logo, the MapIt logo, The World's Leading Desktop GIS, *Water Writes*, and Your Personal Geographic Information System are trademarks, service marks, or registered marks of Esri in the United States, the European Community, or certain other jurisdictions. CityEngine is a registered trademark of Procedural AG and is distributed under license by Esri.

Other companies and products or services mentioned herein may be trademarks, service marks, or registered marks of their respective mark owners.

2023 Canada Data Update

Overview

This release contains the annual update to the Environics Analytics datasets. The 2023 data release reflects the impacts of the pandemic which resulted in more change than typically expected year over year:

The most notable change within DemoStats (current year estimates) is the build off the 2021 Canadian Census (There are some unreleased Census variables that have not been released by Statistic Canada, in these instances the DemoStats variables are based on the 2016 Census but published in the 2021 Census grid).

With the transition to working from home due to COVID-19, there is an observable change in the population working from home instead of their usual place of work. This will still have an impact on the 2023 DaytimePop variables.

2023 Boundaries

All 2023 Canadian geographic boundaries are provided by TomTom, clipped to shorelines, and generalized based on the display level.

For this update, streets are provided by HERE (formerly NAVTEQ) and are based on the StreetMap™ Premium for ArcGIS® HERE 2023 Update.

2023 Demographic Data

The demographic data for this update is provided by Environics Analytics, comprising the CensusPlus, DemoStats, HouseholdSpend, DaytimePop and PRIZM Segmentation data sets. Detailed documentation for these datasets is appended to this document. Additional documentation can be found on Environics Analytics web site: www.environicsanalytics.ca

All demographic data is aggregated to the 2023 geographies and FSA boundaries.

CensusPlus 2021

The CensusPlus database is an enhanced version of Statistics Canada's **2021 National Household Survey (NHS) and Canadian Census**¹. Environics Analytics enhances the Statistics Canada data to add missing values and eliminate random rounding (by Statistics Canada) that existed in both NHS and Census data, resulting in a significantly more comprehensive set of demographic data.

The CensusPlus database contains 808 variables. There are no changes to the CensusPlus variable and category types for this update. The CensusPlus data aggregation to the other administrative boundaries has been changed from the previous release to reflect the new 2021 Census Grid and updates to 2023. Refer to the CensusPlus documentation for a detailed listing of all CensusPlus 2016 variables.

¹ For those DemoStats variables based on Census variables not currently released for the 2021 Census will be based on the 2016 Census and published to the 2021 Census grid.

2023 DemoStats for Current Year, 3yr, 5±yr and 10yr

The DemoStats database consists of current year estimates for 764 variables grouped into approximately 42 demographic and socioeconomic categories. A smaller subset of 497 variables representing the core dimensions of the Canadian population is available for each of the historical and projection years, covering approximately 23 of the 42 DemoStats categories.

Demographic variables not projected Environics Analytics determined there are not enough data available to reliably project beyond the current year. The below table lists the major data categories.

DemoStats Category	Years Variables Estimated/Projected				
	2018	2023	2026	2028	2033
Basics	x	x	x	x	x
Total Population by Age	x	x	x	x	x
Male Population by Age	x	x	x	x	x
Female Population by Age	x	x	x	x	x
Total Household Population by Age	x	x	x	x	x
Male Household Population by Age	x	x	x	x	x
Female Household Population by Age	x	x	x	x	x
Households by Maintainer Age	x	x	x	x	x
Households by Size of Household	x	x	x	x	x
Households by Household Type	x	x	x	x	x
Population 15 Years or Over by Marital Status	x	x	x	x	x
Census Families by Family Structure	x	x	x	x	x
Census Family Households by Family Structure	x	x	x	x	x
Total Children at Home by Age	x	x	x	x	x
Household Population by 5-Year Mobility		x			
Occupied Private Dwellings by Tenure	x	x	x	x	x
Occupied Private Dwellings by Period of Construction	x	x	x	x	x
Occupied Private Dwellings by Structure Type		x			
Occupied Private Dwellings by Condo Status, Tenure & Structure		x			
Occupied Private Dwellings by Band Status, Tenure & Structure		x			
Households by Income (Constant Year 2015)	x	x	x	x	x
Households by Income (Current Year)	x	x	x	x	x
Household Population 15 Years or Over by Income		x			
Household Population 15 Years or Over by Educational Attainment	x	x	x	x	x
Household Population 25 to 64 Years by Educational Attainment		x			
Household Population 15 Years or Over by Labour Force Activity	x	x	x	x	x
Household Population 15 Years or Over by Class of Worker	x	x	x	x	x
Household Population 15 Years or Over by Occupation		x			
Household Population 15 Years or Over by Industry		x			
Household Population 15 Years or Over by Place of Work		x			
Household Population 15 Years or Over by Method of Travel to Work		x			
Household Population by Religion		x			
Household Population by Visible Minority Status	x	x	x	x	x
Household Population by Aboriginal Identity		x			
Household Population by Knowledge of Official Language		x			
Household Population by Mother Tongue	x	x	x	x	x
Household Population by Language Spoken Most Often at Home		x			
Household Population by Total Immigrants & Place of Birth	x	x	x	x	x
Household Population by Recent Immigrants & Place of Birth		x			
Household Population by Period of Immigration		x			
Household Population by Age at Immigration		x			
Household Population by Generation Status		x			
Household Population by Citizen Age		x			
Household Population by Non-Citizen Age		x			

New, changed or removed variables for this update:

Variable Name	Description	Status
ECYPOC1115	Built Between 2011 and 2015	New
ECYPOC1621	Built between 2016 and 2021	New
ECYPOC22P	Built after 2021	New
ECYPOC1116	Built between 2011 and 2016	No Longer Available
ECYPOC17P	Built after 2016	No Longer Available

Refer to the DemoStats documentation for a detailed listing of all 2023 DemoStats variables.

2023 HouseholdSpend

The HouseholdSpend database by Environics Analytics provides current estimates of annual expenditures for 463 variables spanning 20 categories of goods and services used by Canadian households. These categories are:

HouseholdSpend Categories
HouseholdSpend Basics
Household Expenditures (Category Summary)
Shelter
Food
Household Operation
Health Care
Household Furnishings & Equipment
Transportation
Recreation
Personal Care
Clothing
Education
Reading Materials & Other Printed Matter
Tobacco & Alcohol
Games of Chance
Miscellaneous Expenditures
Personal Insurance & Pension
Gifts of Money & Contributions
Real Estate
Goods & Services by Purchase Method

There are no variable changes for this update.

HouseholdSpend variables are estimated for the current year only.

Refer to the HouseholdSpend documentation for a detailed listing of all 2023 HouseholdSpend variables.

2023 Daytime Population

The Daytime Population database is Environics Analytics' estimate for the population that's reachable in any geographic area during daytime hours, grouped by 10 variable types. The 2023 Daytime Population database variables are:

DaytimePop Database	
Variable	Variable Description
ECYTOTPOPD	Total Household Population for Daytime
ECYDAYPOP	Total Daytime Population
ECYHOMEPOP	Total Daytime Population at Home
ECYHOM014	Total Daytime Population at Home Aged 0-14
ECYHOM1564	Total Daytime Population at Home Aged 15-64
ECYHOM65P	Total Daytime Population at Home Aged 65 and over
ECYWORKPOP	Total Daytime Population at Work
ECYWKPU SP	Total Daytime Population at Work at Usual Place
ECYWKPMOB	Total Daytime Population at Work Mobile
ECYWKPHOM	Total Daytime Population at Work at Home

Daytime Populations variables are estimated for the current year only. There are no variable changes for this update.

2023 DemoStats Trends

The DemoStats Trends database consists of estimated and projected average household income, total population, household population and households count encompassing over 463 variables. The database provides estimated counts all variables from 2016 to 2023 and projects values from 2023 to 2043. DemoStats Trends variables are available at the dissemination area (DA) level and all higher levels of geography. When using demographic trends, consider the differences between DemoStats Trends and DemoStats based on your business objectives:

	DemoStats Trends	DemoStats
Number of Variables	413	763
Historical Years	2016-2023	2018, 2023
Projected Years	2024-2043	2026, 2028, 2033
Base Geography	DA	DA

The areas in which business service change over time. A population trend analysis using DemoStats Trends can show how population and household counts are expected to evolve in their trade areas over the next 20 years, enabling long term planning. DemoStats provides in depth demographic and socioeconomic category estimates and projections, supporting current and shorter-term detailed planning.

Note there have been over one-hundred variables removed from the DemoStats Trends. These variables include all population, households, and income values and percent changes that referenced years between 2006 and 2016. The chart on the next page only references the new variables added to the DemoStats Trends for 2023.

New, changed variables for this update:

Variable Name	Description	Status
Y43BASHHD	2043 Total Households	New
C4243HHD	2042 to 2043 Percentage Change Total Households	New
Y43BASHPOP	2043 Total Household Population	New
C4243HPOP	2042 to 2043 Percentage Change Total Household Population	New
Y43BASPOP	2043 Total Population	New
C4243POP	2042 to 2043 Percentage Change Total Population	New
Y43RINCAGG	2043 Constant Dollar Household Income	New
C4243RINC	2042 to 2043 Percentage Change Constant Dollar Household Income	New
Y43NINCAGG	2043 Current Dollar Household Income	New
C4243NINC	2042 to 2043 Percentage Change Current Dollar Household Income	New
Y43RINCAVG	2043 Constant Dollar Household Average Income	New
C4243RAVG	2042 to 2043 Percentage Change Constant Dollar Household Average Income	New
Y43NINCAVG	2043 Current Dollar Household Average Income	New
C4243NAVG	2042 to 2043 Percentage Change Current Dollar Household Average Income	New

Refer to the DemoStats Trends documentation for a detailed listing of all 2023 DemoStats Trends variables.

2023 PRIZM – New LDU Distributions at the DA level

The 2023 PRIZM segmentation system database from Environics Analytics, classifies Canada's neighbourhoods into 7 unique lifestyle segments, grouped by population and household. PRIZM consists of 67 segments that capture current demographics, lifestyles, consumer behaviour and settlement patterns in Canada. Note: The PRIZM segmentation system is separate from the Esri, USA specific Tapestry segmentation system.

The PRIZM segmentation system provides 14 segments specific to the Francophone community and 16 segments that represent large populations within Canada that do not speak either official language.

Refer to the PRIZM documentation for a detailed listing of all 2023 PRIZM variables.

PRIZM variables can also link to optionally purchased Canadian marketing surveys and databases, including Environics Research's Social Values, PMB, Numeris RTS Canada, NADbank, Canadian Financial Monitor, AskingCanadians™, and WealthScapes™. (Please contact Esri Canada for more information on these optional add-ons.)

PRIZM variables are estimated for the current year only.

Refer to the PRIZM documentation for a detailed listing of all 2023 PRIZM variables.

2023 Data Collections

Data Collections are thematically grouped sets of demographic and spending variables. Most Data Collections usually encompass variables of similar types that are used together in specific reports or infographics. 77 Data Collections, grouped into the following categories are included in this Data Update:

Category	Data Collections	Description
Age	2	Population counts by age and 5-year age groups and sex
Education	1	Totals by educational attainment
Households	8	Total household counts for various breakdowns
Housing	4	Totals for various physical housing statistical breakdowns
Income	4	After tax, current and constant year income breakdowns
Jobs	6	Population counts for populations in the workforce
Key Facts	2	Two collections of basic statistical demographic facts
Language & Immigration	10	Breakdowns by identity, immigration, birth, and language
Marital Status	3	Households and families by marital status
Population	3	Population totals for basic facts, age breakdowns, during the day and religion
Segmentation	2	Social categorizations by housing and populations
Spending	18	Total spending expenditures breakdowns
Trends	16	Trend estimates for population and income covering 2016 to 2043

Refer to the Data Collections documentation for a detailed listing of all 2023 Data Collections and Variables.

2023 Business Listings

The 2023 Business Listings database is derived from a comprehensive list of business listings, licensed from the DataAxle®. The business listings database contains data on more than 1.2 million Canadian businesses--including the business name, location, franchise code, industry classification code, number of employees, and sales volume--that is current as of October 2023.

Business Listings are valid for the current year only.

2023 Shopping Centre Listings

The Shopping Centres database comprises most shopping malls in Canada, listing over 3,100 shopping centre records, along with data on the number of stores, floor area, anchor tenants, food courts and parking spaces based. This database is provided by Environics Analytics' and based on Rogers Publishing data.

Shopping Centre Listings are valid for the current year only.

Data Structures

Geodatabases

The Business Analyst Desktop 2023 Canada Data update is delivered in File Geodatabase format (FGDB). The data is stored in five (5) databases. Due to limitations of the File Geodatabase format, the Demographic variables are stored in two Geodatabases. Business and Shopping Centre listings are stored in one FGDB each and the Street Map Premium basemap in another.

- CAN_BUS_2023.GDB
 - 2023 Business variables
- CAN_SHC_2023.GDB
 - 2023 Shopping Centre variables
- CAN_ESRI_2023.GDB
 - 2021 DemoStats variables
 - 2023 DemoStats variables
 - 2028 DemoStats variables
 - 2023 DaytimePop variables
 - 2023 HouseholdSpend variables
 - 2023 PRIZM variables
- CAN_CPY_2023.GDB
 - 2021 CensusPlus variables
 - 2026 DemoStats variables
 - 2033 DemoStats variables
- NorthAmerica.GDB

Access to the business and demographic databases is locked until a valid data license (e.g.: CAN_2023_Standard_National.sdlic) is received from Esri or Esri Canada and applied using the ArcGIS Administrator application.

MXD Layer Groups

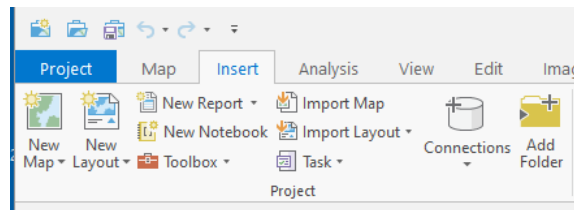
The 2023 Business Analyst Canada.mxd, Web.mxd and FastMap.mxd are pre-structured to display the 2023 data, based on predefined Layer Groups:

- Business Analyst Network Barriers (*an empty group required for BA analysis*)
- Business and Shopping Centres
 - Businesses
 - Shopping Centres
- Demographic Layers - 2018, 2023, 2028, Daytime, Spending, PRIZM (Base)
 - Block Points
 - Dissemination Areas
 - Aggregated Dissemination Areas
 - Forward Sortation Areas
 - Census Tracts
 - Census Metropolitan Areas
 - Census Subdivisions
 - Census Divisions
 - Federal Electoral Districts
 - Provinces & Territories

- Demographic Layers - 2021 Census, 2026, 2033 (CPY)
 - Dissemination Areas (CPY)
 - Aggregated Dissemination Areas (CPY)
 - Forward Sortation Areas (CPY)
 - Census Tracts (CPY)
 - Census Metropolitan Areas (CPY)
 - Census Subdivisions (CPY)
 - Census Divisions (CPY)
 - Federal Electoral Districts (CPY)
 - Provinces & Territories (CPY)
- Street Map Premium (*desktop mxd*) -or- World Street Map (*Web mxd*)

The Business, Demographic and Street Map Premium “layer groups” provide access to the data stored in their respective BA FGDBs (refer to the **Geodatabase Structure** section for details), summarized at each of the geographic boundary levels.

The predefined mxds can be opened directly in Business Analyst for ArcGIS Desktop. For Business Analyst for ArcGIS Pro it is necessary to first create a project and then import the desired mxd using the Import Map wizard.



For more details on using Business Analyst for ArcGIS Pro, refer to the online documentation at: <https://pro.arcgis.com/en/pro-app/help/analysis/business-analyst/what-is-business-analyst-pro.htm>

For more details on using Business Analyst for ArcGIS Desktop, refer to the online documentation at: <https://desktop.arcgis.com/en/arcmap/latest/extensions/business-analyst/whats-business-analyst.htm>

Leveraging PRIZM Data (BA Standard License required)

Within the Target Marketing tool

When leveraging the PRIZM segments within the Target Marketing tool in Business Analyst for Desktop (Canadian Edition) Standard, the Profiles of the Customer and Geographies are based on the Dominant segment which has been assigned to the Dissemination Area.

The Dissemination Area is represented by a single assigned PRIZM segment with all population and/or households count being associated to the single PRIZM segment.

The Dominant segment for the Dissemination Area is utilized for the Target Marketing tool, for the creation of various market and consumer profiling models, including the Four Quadrant (Game Plan) Chart which analysis Core, Niche, Development, and Non-Target markets of opportunity.



Figure 7: The above illustrates the Dominant PRIZM segment associated to the Dissemination Area. In this instance, there is only one PRIZM segment associated to the Dissemination Area.

By Dissemination Area within your Table Data

The PRIZM segments within the BDS (Business Data Source) for household and population show all PRIZM segments within a Dissemination Area. The PRIZM segments have been generated at the full 6-digit Postal Code level and pushed up to the associated Dissemination Area in which they area captured.

Now users will see the breakdown of the population or household by all PRIZM segments that reside within the Dissemination Area and not a single dominant segment cluster. This will give users more granularity into their analysis.

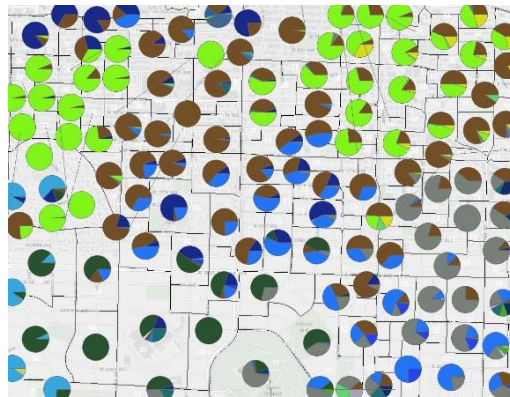


Figure 8: The above illustrates the new granularity in the PRIZM5 segment data release at the Dissemination Area. Instead of a single dominant segment representation, the Dissemination Area will show all PRIZM5 segments represented in the Dissemination Area.

NOTES: In some instances, the Dominant PRIZM segment may not be represented at the Dissemination Area when comparing the grouping of PRIZM segments of the same Dissemination Area from the Postal Codes which fall within the Dissemination Area. This is in part, due to the methodology utilized in the creation of the PRIZM segment assigned to the Dissemination Area, to that of the PRIZM segments assigned to the Postal Code.