

## Canadian Energy Use Intensity by Property Type

### OVERVIEW

This reference table is designed to help you to compare your property's energy use intensity (EUI) to the national median (or mid-point) energy use of similar properties.

#### Benchmarking Your Property

When benchmarking in Portfolio Manager, we recommend that you focus on the primary function (or main activity) in your building(s). Begin by selecting your primary function from the table below and then enter as few additional use types as possible. Benchmarking your building using a single use type will most closely approximate how your building would have been recorded in the reference data survey, and therefore yield the most accurate comparisons to median performance. In some cases, buildings may have multiple distinctly different uses. For example, an office and a hotel that share a common building. In these mixed-use settings, it is appropriate to enter multiple use types. Definitions of all property types are available at: [www.energystar.gov/PMGlossary](http://www.energystar.gov/PMGlossary).

#### Using Median Site and Source Energy Use Intensity (EUI)

The **national median source EUI** is a recommended benchmark metric for all buildings. The median value is the middle of the national population—half of buildings use more energy, half use less. The median works better than the mean (arithmetic average) for comparing relative energy performance, because it more accurately reflects the mid-point of energy use for most property types and removes the effect of high-value outliers that may skew the data.

The table presents the median in both **site EUI** and **source EUI**. Site EUI is what you may be familiar with from your utility bills. Site EUI contains a mixture of what is called primary energy (i.e. a raw fuel like natural gas) and secondary energy (i.e. a converted product like electricity or district steam). Source energy converts secondary energy types into a unit that is comparable to primary energy which considers all transmission, delivery and production losses, limiting credits or penalties based on energy source or utility. You can learn more about source energy and the way it is computed at [www.energystar.gov/SourceEnergy](http://www.energystar.gov/SourceEnergy).

While almost all commercial building types have a national Median Source EUI, some (**presented in cyan with an asterisk**) will also have a 1–100 ENERGY STAR Score. The score evaluates a building relative to its peers, similar to the median energy use values, and also adjusts for climate and business activity. You can learn more about the score at: [www.energystar.gov/ENERGYSTARScore](http://www.energystar.gov/ENERGYSTARScore).

#### Understanding Reference Data

The rightmost column in the table indicates the reference data source we use to determine the median performance for your peer group. To compute the national median, we always rely on nationally representative data.

For Canadian values, we primarily reference four surveys:

- Survey of Energy Consumption of Multi-Unit Residential Buildings – 2018 (SECMURBs)  
<https://oee.nrcan.gc.ca/corporate/statistics/neud/dpa/menus/murb/2018/tables.cfm>
- Survey on Commercial and Institutional Energy Use – 2019 (SCIEU)  
<https://www150.statcan.gc.ca/n1/daily-quotidien/220805/dq220805c-eng.htm>
- Survey on Energy Consumption of Arenas – 2014 (SECA)  
<http://www.statcan.gc.ca/daily-quotidien/160830/dq160830d-eng.htm>

An additional survey was conducted for Mailing Centers/Post Offices. Information on this survey can be found in the technical reference document.

## Canadian National Median Reference Values for All Portfolio Manager Property Types

Broad Category	Primary Function	Further Breakdown (where needed)	Source EUI (GJ/m <sup>2</sup> )	Site EUI (GJ/m <sup>2</sup> )	Reference Data Source - Peer Group Comparison	
Banking / Financial Services	<b>Bank Branch*</b>		1.55	0.94	SCIEU 2019 - B - Bank Branch	
	<b>Financial Office*</b>		1.25	0.87	SCIEU 2019 - B - Office space - Excluding medical	
Education	Adult Education		1.19	0.84	SCIEU 2019 - E - Other post-secondary buildings	
	College/University		1.47	1.04	SCIEU 2019 - B - University	
	<b>K-12 School*</b>		0.97	0.70	SCIEU 2019 - B - Primary or secondary school	
	Pre-school/Daycare		0.97	0.71	SCIEU 2019 - B - Preschool or daycare	
	Vocational School		1.19	0.84	SCIEU 2019 - E - Other post-secondary buildings	
	Other - Education		1.19	0.84	SCIEU 2019 - E - Other post-secondary buildings	
Entertainment / Public Assembly	Convention Centre		1.66	1.07	SCIEU 2019 - B - Food or beverage store	
	Movie Theatre		1.19	0.86	SCIEU 2019 - B - Others Inscope	
	Museum		0.65	0.41	SCIEU 2019 - B - Museum	
	Performing Arts		1.19	0.86	SCIEU 2019 - B - Others Inscope	
	Recreation	<b>Ice/Curling Rink*</b>		1.10	1.10	SCIEU 2019 - B - Ice/Curling Rink
		Bowling Alley		1.19	0.86	SCIEU 2019 - B - Others Inscope
		Fitness Centre/Health Club/Gym		0.95	0.68	SCIEU 2019 - B - Recreation Center
		Roller Rink		0.95	0.68	SCIEU 2019 - B - Recreation Center
		Swimming Pool		0.95	0.68	SCIEU 2019 - B - Recreation Center
		Other - Recreation		0.95	0.68	SCIEU 2019 - B - Recreation Center
	Social/Meeting Hall		1.19	0.86	SCIEU 2019 - B - Others Inscope	
	Stadium	Indoor Arena		2.49	1.65	SECA - Indoor Arenas
		Race Track		1.19	0.86	SCIEU 2019 - B - Others Inscope
		Stadium (Closed)		1.19	0.86	SCIEU 2019 - B - Others Inscope
		Stadium (Open)		1.19	0.86	SCIEU 2019 - B - Others Inscope
Other - Stadium		0.95	0.68	SCIEU 2019 - B - Recreation Center		

Broad Category	Primary Function	Further Breakdown (where needed)	Source EUI (GJ/m <sup>2</sup> )	Site EUI (GJ/m <sup>2</sup> )	Reference Data Source - Peer Group Comparison
Entertainment / Public Assembly	Other	Aquarium	1.19	0.86	SCIEU 2019 - B - Others Inscope
		Bar/Nightclub	1.19	0.86	
		Casino	1.19	0.86	
		Zoo	1.19	0.86	
		Other - Entertainment/Public Assembly	1.19	0.86	
Food Sales & Service	Convenience Store	<b>Convenience Store with Gas Station*</b>	1.66	1.07	SCIEU 2019 - B - Food or beverage store
		<b>Convenience Store without Gas Station*</b>	1.66	1.07	
	Restaurant/Bar	Bar/Nightclub	1.19	0.86	SCIEU 2019 - B - Others Inscope
		Fast Food Restaurant	1.84	1.28	SCIEU 2019 - B - Restaurant
		Restaurant	1.84	1.28	
		Other - Restaurant/Bar	1.84	1.28	
	<b>Supermarket/Grocery Store*</b>	1.66	1.07	SCIEU 2019 - B - Food or beverage store	
	<b>Wholesale Club/Supercentre*</b>	1.20	0.85	SCIEU 2019 - B - Retail - non-food	
	Other	<b>Food Sales*</b>	1.66	1.07	SCIEU 2019 - B - Food or beverage store
		Food Service	1.84	1.28	SCIEU 2019 - B - Restaurant
Health Care	Ambulatory Surgical Centre		2.96	2.20	SCIEU 2019 - E - Hospital
	Hospital	<b>Hospital (General Medical &amp; Surgical)*</b>	2.96	2.20	SCIEU 2019 - E - Hospital
		Other/Specialty Hospital	2.96	2.20	
	<b>Medical Office*</b>	1.03	0.74	SCIEU 2019 - B - Office space - medical	
	Outpatient Rehabilitation/Physical Therapy	1.03	0.74		
	<b>Residential Care Facility*</b>	1.72	1.21	SCIEU 2019 - B - Assisted Living Facility	
	<b>Senior Living Community*</b>	1.72	1.21		
	Urgent Care/Clinic/Other Outpatient		1.03	0.74	SCIEU 2019 - B - Office space - medical

Broad Category	Primary Function	Further Breakdown (where needed)	Source EUI (GJ/m <sup>2</sup> )	Site EUI (GJ/m <sup>2</sup> )	Reference Data Source - Peer Group Comparison
Lodging / Residential	Barracks		1.19	0.87	SCIEU 2019 - B - Hotel, motel, hostel, or lodge
	<b>Hotel*</b>		1.19	0.87	
	<b>Multifamily Housing*</b>		1.14	0.82	SECMURBs - Multi-Unit Residential Buildings
	Prison/Incarceration		1.19	0.86	SCIEU 2019 - B - Others Inscope
	Residence Hall/Dormitory		1.19	0.87	SCIEU 2019 - B - Hotel, motel, hostel, or lodge
	<b>Residential Care Facility*</b>		1.72	1.21	SCIEU 2019 - B - Assisted Living Facility
	<b>Senior Living Community*</b>		1.72	1.21	
Other - Lodging/Residential		1.19	0.87	SCIEU 2019 - B - Hotel, motel, hostel, or lodge	
Mixed Use	Mixed Use Property		1.16	0.82	SCIEU 2019 - B - Mixed Use Property
Office	<b>Medical Office*</b>		1.03	0.74	SCIEU 2019 - B - Office space - medical
	<b>Office*</b>		1.25	0.87	SCIEU 2019 - B - Office space - Excluding medical
	Veterinary Office		1.19	0.86	SCIEU 2019 - B - Others Inscope
Parking	Parking		N/A	N/A	N/A
Public Services	Courthouse		1.25	0.87	SCIEU 2019 - B - Office space - Excluding medical
	Drinking Water Treatment & Distribution		N/A	N/A	N/A
	Fire Station		1.21	0.66	SCIEU 2019 - B - Public Safety - Police and fire station
Public Services	Library		1.89	1.03	SCIEU 2019 - B - Library or Archives
	<b>Mailing Centre/Post Office*</b>		1.45	0.94	SCIEU 2019 - B - Post Office Data set
	Police Station		1.21	0.66	SCIEU 2019 - B - Public Safety - Police and fire station
	Prison/Incarceration		1.19	0.86	SCIEU 2019 - B - Others Inscope
	Social/Meeting Hall		1.19	0.86	
	Transportation Terminal/Station		1.19	0.86	
	Wastewater Treatment Plant		N/A	N/A	N/A
Other - Public Services		1.19	0.86	SCIEU 2019 - B - Others Inscope	
Religious Worship	<b>Worship Facility*</b>		0.94	0.56	SCIEU 2019 - B - Place of Worship

Broad Category	Primary Function	Further Breakdown (where needed)	Source EUI (GJ/m <sup>2</sup> )	Site EUI (GJ/m <sup>2</sup> )	Reference Data Source - Peer Group Comparison	
Retail	Automobile Dealership		1.25	0.92	SCIEU 2019 - B - Vehicle dealership, repair, or storage	
	Convenience Store	Convenience Store with Gas Station*	1.66	1.07	SCIEU 2019 - B - Food or beverage store	
		Convenience Store without Gas Station*	1.66	1.07		
	Mall	Enclosed Mall		1.16	0.82	SCIEU 2019 - B - Mixed Use Property
		Lifestyle Centre		1.20	0.85	SCIEU 2019 - B - Retail - non-food
		Strip Mall		1.16	0.82	SCIEU 2019 - B - Mixed Use Property
		Other - Mall		1.16	0.82	SCIEU 2019 - B - Mixed Use Property
	Retail Store*		1.20	0.85	SCIEU 2019 - B - Retail - non-food	
	Supermarket/Grocery Store*		1.66	1.07	SCIEU 2019 - B - Food or beverage store	
Wholesale Club/Supercentre*		1.20	0.85	SCIEU 2019 - B - Retail - non-food		
Technology / Science	Data Centre		N/A	N/A	N/A	
	Laboratory		1.19	0.86	SCIEU 2019 - B - Others Inscope	
	Other - Technology/Science		1.19	0.86		
Services	Data Centre		N/A	N/A	N/A	
	Personal Services (Health/Beauty, Dry Cleaning, etc.)		1.19	0.86	SCIEU 2019 - B - Others Inscope	
	Repair Services (Vehicle, Shoe, Locksmith, etc.)		1.25	0.92	SCIEU 2019 - B - Vehicle dealership, repair, or storage	
	Other - Services		1.19	0.86	SCIEU 2019 - B - Others Inscope	
Utility	Drinking Water Treatment & Distribution		N/A	N/A	N/A	
	Energy/Power Station		N/A	N/A	N/A	
	Wastewater Treatment Plant		N/A	N/A	N/A	
	Other - Utility		N/A	N/A	N/A	
Warehouse / Storage	Self-Storage Facility*		0.99	0.72	SCIEU 2019 - B - Warehouse	
	Warehouse/Distribution Centre	Distribution Centre*	0.99	0.72		
		Non-Refrigerated Warehouse*	0.99	0.72		
		Refrigerated Warehouse*	0.99	0.72		
Other	Other	Uncategorized buildings	1.19	0.86	SCIEU 2019 - B - Others Inscope	