A greene H201/ GU

Taking action **today** for a better **tomorrow**





Aujourd'hui pour demain

Introduction

In 2022, Ville de Saint-Lazare launched its very first water consumption awareness campaign.

To mark the occasion, the City implemented the Blue Patrol, created a water consumption guide and openly shared weekly consumption numbers.

In doing so, our mandate was to make the population aware of the best ways to reduce drinking water consumption and inform them of the changes in municipal by-laws.

This year, we are pleased to present our revamped guide, created to answer the questions and comments we gathered in 2022.

We also address some lingering myths, most notably related to lawn care. Septic systems, private wells, pools and by-laws will be the focus of this 2023 edition, with the goal of helping you to make informed decisions about your water use habits.

Awareness is the best tool we have to protect our natural resources and reach the consumption target set by the Government of Québec. The more people are made aware of the importance of saving water - our most precious resource - the better off we will be as a community.

Happy reading!

Let's work together to better protect our water resources!



What's new for 2023	P.4
Water in Saint-Lazare	P.5-7
Grass	P.8
Pesticides	P.9
Myths and realities	P.10
Septic systems	P.11
Current regulation	P.12

References:

- INSPQ
- MELCC, 2020 : Bilan de ventes de pesticides au Québec
- *Code de Gestion de pesticides du Québec*

• Gouvernement du Québec, 2015, Stratégie québécoise sur les pesticides 2015-2018 • Pimentel, 1995, Amounts of Pesticides Reaching Target Pests: Environmental Impacts and EthicsINSPQ

- Gouvernement du Québec, Stratégie québécoise d'économie d'eau potable. Horizon 2019-2025
- Gouvernement du Québec, À propos de la Stratégie

What's new for 2023

MRC:

The MRC is joining forces with the 23 municipalities of Vaudreuil-Soulanges. The preservation of drinking water is an unavoidable regional issue. Stay tuned — there is more information to come in the next few weeks!

Green Squad:

The Blue Patrol will be back in 2023 — but will now be known as the Green Squad. This new name better reflects our vision regarding all major environmental issues, while still considering our precious drinking water. This squad is made up of students who will be visiting residents between May and August to raise awareness about various issues.

Eco-friendly landscaping contest

The Ville de Saint-Lazare is launching its first green landscaping contest which will run from June 15 to August 31, 2023! The goal is to highlight and encourage landscaping that reduces water consumption, helps pollinating insects and promotes biodiversity. Keep an eye out for the City's announcements regarding the contest rules and prizes to be won.

Workshop-conference on alternative forms of landscaping and lawn care

This information and awareness session will help you learn how to grow your lawn differently. Discover alternative and ecological practices that allow for minimal maintenance of your property. Enjoy your landscaped spaces while saving time and money. Stay posted for more details in the City's announcements.

Your City is taking action:

In addition to conservation and sustainable development plans and an Environmental Policy that sets the framework for its actions, your City is taking action in many ways, including by:

- adhering to the Engagement de Montréal pour la biodiversité;
- adhering to the déclaration d'engagement "Unis pour le climat" of the Union des municipalités du Québec (UMQ);
- being a Ville amie des monarques;
- meeting the Défi pissenlits.



They will be back in 2023!

Have you noticed them?

The consumption barometers were displayed throughout the territory and in the City's communications from May to October 2022.

The City's level of water consumption was also updated weekly on its web site.

The objective was to demonstrate that, even with the same population, consumption of drinking water is considerably lower in the winter months.

ville.saint-lazare.gc.ca/en/services-to-residents/public-works-roads/drinking-water#barometre

Water in Saint-Lazare

Every drop of water that is consumed — whether through the City's distribution system or from artesian wells — comes from the same source, namely groundwater reserves.

In Saint-Lazare, water is sourced exclusively from groundwater sources, which are currently tapped by 14 wells in three sectors. The Sainte-Angélique sector alone has 10 wells and supplies close to 16,500 people.

Contamination of groundwater

In urban areas, groundwater can guickly become vulnerable to overexploitation and contamination. In fact, groundwater vulnerability reports* conducted in Saint-Lazare show that certain human activities have a direct impact on water quality and quantity. *The reports are available on the Citys Web site under Studies and reports/Underground hydrology.

These activities include:

- Poorly maintained or non-compliant septic systems:
- Horse manure, when poorly managed (By-law. 771);
- Pesticides, despite being prohibited (See Pesticides section);
- Fertilizers:
- Overuse of water, most notably during the summer months.

Porous soils, such as the ones we have in Saint-Lazare, composed of sand and gravel, also contribute to a wider dispersion of contaminants. Even bedrock aquifers are not protected from contaminants since the rock is often fractured and can be very porous as a result.

What is the City doing to protect water?

A lot! And we will continue to do so. As it stands, we are already committed to: increasing the community patrol's surveillance hours;

- ramping up information and awareness campaigns;
- reducing permitted watering periods;
- · limiting the issuance of watering permits to September and October only;
- focusing on eco-friendly landscaping that requires little or no watering.

The City has made changes to By-law 667 in an effort to better control water use. Consult the overview of this by-law on Page 12 and keep it handy! It may very well prevent you/from getting a fine.









Let yourself be inspired by the City's eco-friendly creations.

Water in Saint-Lazare Our consumption

The City closely monitors drinking water consumption levels year after year to ensure adequate water supply and sustainability of the resource.

The Québec government's drinking water conservation strategy target is 184 litres per person per day, a threshold that was reached by Ontarians in 2017. This target will be lowered to 177 litres by 2025. We still have a long way to go!

Changes in household water consumption In number of litres/person/day



*It should be noted that, in 2020 and 2021, the City was forced to implement watering bans during the summer due to excessive consumption.

If your lawn has turned yellow, it is simply in a dormant state and will turn green once again when it rains. Watering during this period does nothing more than waste water!

If you water your lawn when it is sunny, almost half of the water is wasted due to evaporation!

Winter vs summer

In the summer, consumption

increases by up to 110 %

on a monthly basis compared

to the winter.

At times, summer water consumption can be up to

2.5 time greater than it is

in the winter...

This is mainly due to lawn watering.

Water is a fragile resource that must be protected and conserved.

Behavioural changes and the adoption of good sustainable water use practices will help prevent shortages, reduce pollution, lower water treatment costs and help preserve aquatic environments.

- Government of Québec

There is no doubt we can do better!



Water distributed in 2022 for the whole city In cubic meters (m³) per month

Jan.	Feb.	March	April	Мау	June	July	August	Sept.	Oct.	Nov.	Dec.
5,783	5,824	5,601	6,329	8,552	7,836	8,440	8,002	6,671	5,819	5,377	5,305

Did you know?

Québec is one of the largest consumers of water in the world, and even in Canada.

This is clearly not something to be proud of. We can do better — let's do it together!



Grass

Did you know that grass is not native to North America? It was actually imported from Europe and North Africa in the 17th century to feed livestock. Over time, however, grass has become a symbol of social success.

The not-so-pretty reality of a perfect lawn:

- It harms pollinating insects, which we depend upon for 1/3 of our food supply;
- It is a biological wasteland which leads to the depletion of plant diversity and to a decline in invertebrate populations;
- Its presence encourages the use of fertilizers and pesticides, despite the fact that the latter are prohibited. Consult the Pesticides section to learn about their impact;
- Lawn maintenance is strongly correlated with greenhouse gas emissions, even if your tools are electric or battery powered;
- It causes insect infestations, unlike diversified lawns which have the opposite effect;
- Large amounts of water are wasted on grass lawns, which are not water-retaining.

There are many alternatives to grass — why not dare to be different?

1. Plant or seed groundcover and other plants that:

- work well with the soil found in Saint-Lazare;
- are trample-resistant;
- require little watering.

Useful low maintenance plants:

Ground cover: periwinkle, thyme,

Diversified lawn plants: grasses,

dandelions, ribwort plantain, clover,

beds (medicinal or edible plants):

everlastings, millepertuis (St. John's

Agastache, marshmallow (Althaea

officinale), aromatic perennial herbs, etc.

Eco-friendly flower and plant

2. Create eco-friendly gardens or flower beds:

• require little maintenance and water.

3. Opt for a diversified lawn with a wide variety of plants that:

- grow naturally throughout your lawn;
- are surprisingly beautiful and beneficial;
- resist harsh weather conditions (drought, heavy rainfall);
- naturally prevent insect infestations.



Eco-friendly landscaping = more time to enjoy life!

Pesticides

Saint-Lazare was one of the first cities to adopt a by-law prohibiting the use of pesticides — and that was way back in 2000!

Pesticides are not harmless!

(even low-impact pesticides or biopesticides)

Even in small doses, pesticides can adversely affect water quality, air quality, human health, animals and pollinator populations. Some pesticides can even leach into groundwater (see page 5).

Pesticides spread everywhere and can indiscriminately destroy species that are beneficial to us and our environment. The same applies to synthetic fertilizers.

Herbicides, insecticides and fungicides are all considered pesticides.

Did you know?

Only 10% of pesticides actually reach their targeted plant or organism. The rest is dispersed into the surrounding environment! It's almost like trying to kill a fly with a rocket launcher!

Knowing the risks:

that we would otherwise want to eliminate.

Effects on	Carcinogenic (leukemia, brain tumour).
human health	Endocrine disruptors with adverse effects
M.	Exposure to certain pesticides has adve
П П Ж	Adverse effects on the nervous system
	Adverse effects on untargeted species Pesticides end up in the environment ar
Effects on the environment	Major decline of pollinators such as bees,
	Soil degradation due to the destructio mushrooms, insects and earthworms).
	Pesticides affect a very wide area surrol
	Pesticides, biopesticides and fertilizer sp

1. Tips for being well-informed:

- 2. Choose your landscaping company carefully: insist that maintenance be done either without pesticides or by using slow-release fertilizer.
- 3. Choose your products carefully: research their brand names, active ingredients and approval numbers.
- 4. Be smart: when a manufacturer recommends the use of personal protective equipment when applying the product, there is clearly a risk!

violets. etc.



Being better informed of the risks associated with pesticide use makes us more tolerant of organisms

on reproduction (infertility, early menstruation).

erse effects on fetus development during pregnancy.

(Parkinson's, Alzheimer's).

s (fish, birds, bees, etc.), which has the effect of reducing biodiversity. Ind contaminate the food chain.

, which are essential to the production of fruits and vegetables.

on of the microflora responsible for soil health and fertility (bacteria,

ounding the spot where they are spread.

spread everywhere: into the air, soil and water.

Let's change our negative views of weeds and insects!

It's important to learn the difference between a harmful weed such as poison ivy and diversified plants which, on the contrary, are very useful to us.

- Ribwort plantain helps soothe insect bites;
- Violets are edible;
- Clover provides pollen and nutrients.

If you find any of these in your grass, it's a sure sign that it is healthy!

Myths and realities

Thanks to the visits conducted by the Blue Patrol in 2022, we were able to gather comments and identify some long-held myths related to water consumption and landscaping practices in Saint-Lazare. In this section, we will focus on debunking some of these deeply rooted myths!

If we don't take small steps to reduce our water consumption, groundwater will not be able to regenerate at the same rate as our consumption — and we will all suffer the consequences!

Mvth 1

The increase in water consumption is due to the excessive number of construction permits issued.

False. Despite the growing population in our beautiful city, Saint-Lazare's rigorous monitoring clearly indicates that drinking water consumption remains relatively stable during the winter months.

This means that household water consumption is not the cause of the increase in our use of drinking water. See the Our Consumption section on Page 6 to learn more about our summer water consumption.

Mvth 2

I pay taxes, so I have the right to consume as much water as I want!

False. Using water is not a right. In fact, water is a limited resource that we must all use responsibly to help protect it over the long term.



The portion of the taxes that you pay for drinking water goes towards the latter's treatment and distribution, thereby ensuring that the drinking water provided by the Town meets the highest standards of quality. This is one of the most expensive services the City provides, and excessive use of water radically increases the costs associated with this service.



Mvth 3

I have a private well, so this doesn't concern me.

False. The water from your private well comes from the same groundwater. We all draw from the same source! See the Water in Saint-Lazare section on page 5.

Did you know? The construction of a private well is now prohibited in all areas of the city connected to the water network.

Myth 4

Getting rid of dandelions reduces my seasonal allergies.

False. Dandelions are not the culprit. Their pollen is actually heavy, which means that it is not airborne. The most common seasonal allergies are related to certain types of hardwood (elm, birch, poplar, oak, maple, etc.) and ragweed.

Septic systems

In Saint-Lazare, there are over 5,000 private septic systems.

It is important to know how they work in order to better understand the issues related to poor maintenance or an outdated system!

A septic system is a wastewater treatment system that works by collecting wastewater from your toilets and drains. It holds the solids and scum in a tank before sending the liquids to the leach field where they are filtered and released into the soil. Once in the soil, micro-organisms complete the decomposition process and eliminate residual impurities. This is the last step before the water filters back into the groundwater.



How do septic systems impact our water?

When the performance and watertightness of a septic system is compromised, it becomes a source of bacterial contamination, particularly due to fecal coliforms, which can lead to public health problems.

If runoff from poorly maintained septic systems leaks into the ground, it can reach groundwater, which is particularly sensitive to seeping contaminants. See the Groundwater Contamination section on page 5.

What are your obligations as a property owner?

As a property owner, it is your responsibility to ensure that your septic system does not cause environmental or public health issues.

As a reminder, your system must be:

- completely watertight;
- functioning at optimum levels at all times;
- emptied at least once every two (2) years.

Keep an eye out for any defects!

At home:

- Overflowing of toilets;
- Water that drains more slowly down the drains (toilets, sink);
- · The results of your well water analysis or those of your neighbour indicate bacterial or nitrate contamination.

If your septic system is equipped with an advanced disinfection filter, you must take samples of the water emissions every six (6) months.

At or near the septic system site:

- Abundant and very green grass;
- Unpleasant odours;
- Soil that is constantly humid and spongy;
- The appearance of blackish-coloured liquid;
- Visible traces of overflow.

Outdoor use of (potable) water distributed by a municipal water supply network

Changes to the by-law in force

Watering is prohibited during rainy periods

Watering		Oni	ly permitted				
	From May 1 to August 31 inclusively Watering is prohibited from September 1 to April 30						
Existing vegetation (any vegetation 15 days or older – lawn, hedges, etc.)	Turne	Even-number	ed addresses	Odd-numbered addresses			
	Туре	Monday	Thursday	Sunday	Wednesday		
	Automatic (underground)	2 a.m. to 4 a.m.	2 a.m. to 4 a.m.	2 a.m. to 4 a.m.	2 a.m. to 4 a.m.		
	Mechanical (aboveground)	8 p.m. to 10 p.m.	8 p.m. to 10 p.m.	8 p.m. to 10 p.m.	8 p.m. to 10 p.m.		
	Manual Anytime, as long as the hose is equipped with an automatic s and as long as it is held by hand at all times.						
New	For a period of fifteen (15) consecutive days starting on the day the new vegetation is planted.						
	With a per from September 1 to		Pro	Prohibited – no permits issued the rest of the year			
voratation	Туре	1 st day of	planting	the following 14 days			
(any vegetation that is less than 15 days old – sod, sowing, hedges, etc.)	Automatic (underground)	1 Without interruption		2 a.m. to 4 a.m.			
	Mechanical (aboveground)	Without in	terruption	8 p.m. to 10 p.m.			
	Manual	Anytime, as lon		pped with an automatic shut-off nozzle, eld by hand at all times.			
		Oni	ly permitted				
Cars, walls and windows	Anytime, for washing purposes only, as long as the hose is equipped with an automatic shut-off nozzle, and as long as it is held by hand at all times.						
Driveways and access alleys	Prohibited EXCEPT to apply a sealer, a protective filler, coat or paint—in these cases only, and only if the hose is equipped with an automatic shut-off nozzle and as long as it is held by hand at all times.						
Pool Complete filling	Prohibited. Residents must use the filling services provided by a tanker truck. No permit will be issued for this purpose.						

Since March 18, 2020, an automatic watering system must be equipped with an automatic moisture detector or an automatic shut-off device in case of rain, a backflow valve, an electric valve activated by an electric control mechanism and a handle or gate valve accessible from the exterior.

Permit request:

72 hours in advance at Saint-Lazare's City Hall (1960 Chemin Sainte-Angélique) from Monday to Friday, during opening hours.

Important: to take full advantage of the 15-day period, plan to apply for your permit at least 17 business days before the end of the chosen period to consider the 72 hours required for issuance.

Only the property owner can sign the permit. The owner may, however, appoint another person to sign through a written proxy. This proxy must be provided with the request.

In case of discrepancy between this document and the full FRENCH text of By-law 667, the latter shall prevail. *ville.saint-lazare.qc.ca/doc/reglements/pdf/667.pdf*

Watering ban:

City Council can order a watering ban when water table levels are low or potable water tanks have reached critical thresholds to protect the basic human needs supplies (drinking, eating, washing), equipment integrity and fire safety reserves.

Fines:

Offenders are subject to a minimum fine of \$250 and up to \$4,000, depending on the circumstances.

Questions: 450-424-8000, extension 242 <u>ville.saint-lazare.qc.ca/en/eau</u>

