

# Bathing Plan

The SIAAP's  
initiatives



[siaap.fr](http://siaap.fr) |   

**SIAAP**

Service public de l'assainissement francilien

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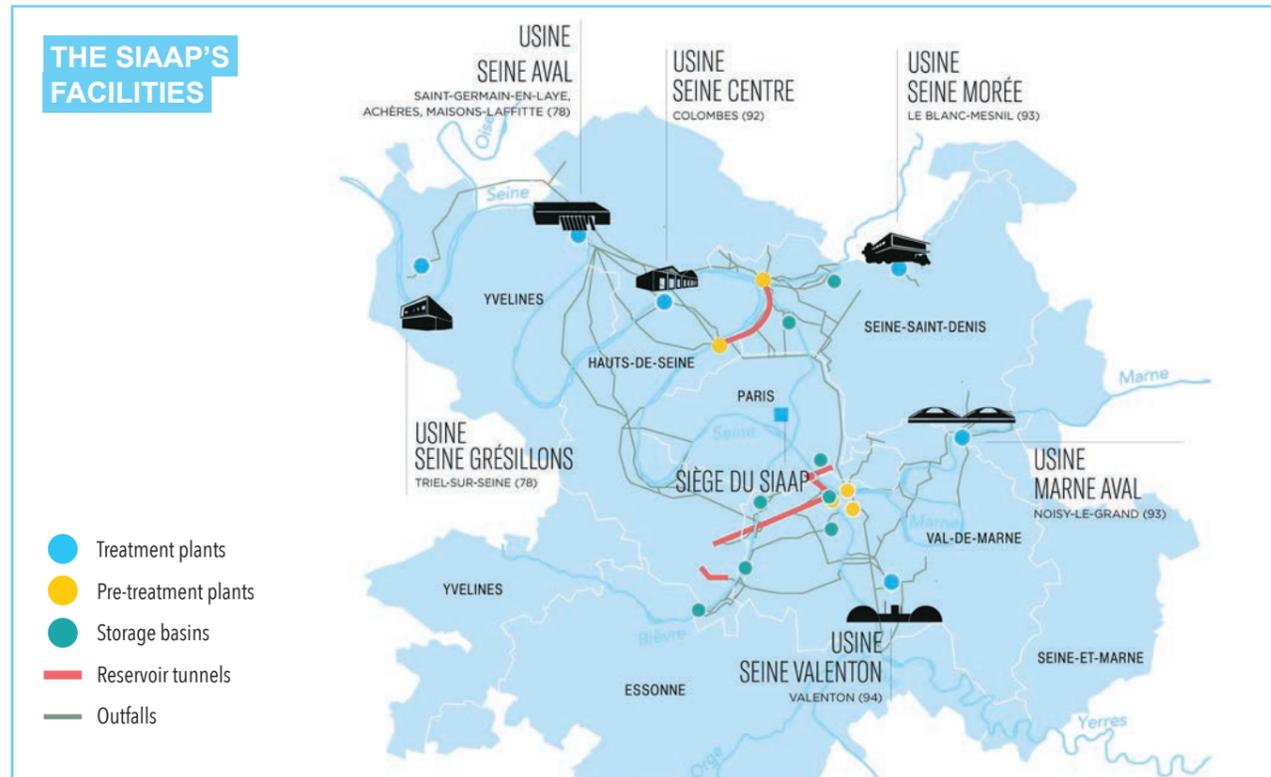
"For over 50 years, the SIAAP has been responsible for treating the wastewater from people of Ile-de-France. It accomplishes the essential task of preserving the natural environment, since it returns clean water to the Marne and the Seine.

The issue of bathing in the Seine is not a new one. This collective challenge is currently becoming a reality thanks to strong government and local authorities' engagement. Although the announcement of the Paris bid to host the 2024 Olympic and Paralympic Games served as an accelerator, the SIAAP had already been engaged in this process for several decades."

**François-Marie Didier**  
*President of the SIAAP*

# 1. The SIAAP, a key player in biodiversity

## An industrial public service



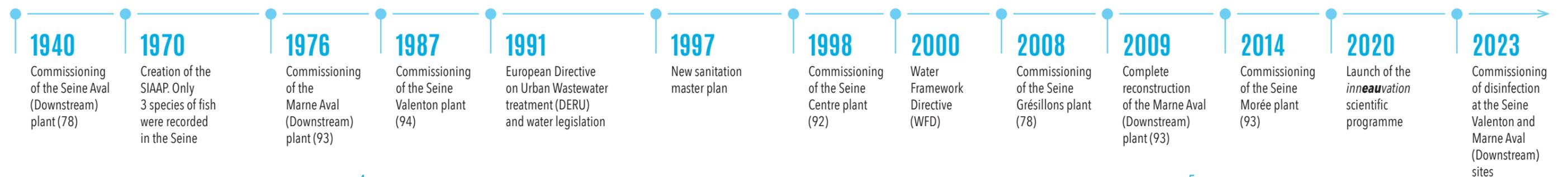
The Syndicat Interdépartemental pour l'Assainissement de l'Agglomération Parisienne (Greater Paris Sanitation Authority) is a public service that, through the activities of its 1,800 agents, transports and treats the wastewater of over 9 million Ile-de-France residents, as well as rainwater and industrial wastewater, in order to return water to the Marne and the Seine that is conducive to the development of biodiversity.

To accomplish its task, the SIAAP operates an outstanding industrial-scale sanitation system, unique in France and Europe. This system relies on 6 depollution plants, 5 pre-treatment plants, 8 storage basins and 4 tank tunnels with a total capacity of 930,000 m<sup>3</sup>, and 472 kilometres of pipes for transporting water to the treatment plants. This fine mesh across the Ile-de-France region combined with its plants' technological performance and its agents' skills, allows the SIAAP to provide 24/7 operational, robust and efficient sanitation management for the 2.5 million m<sup>3</sup> of wastewater that arrives at its plants every day.

**It is important to note that the SIAAP does not clean the Seine or the Marne waters. The SIAAP's plants treat the wastewater (domestic, industrial and rainwater) supplied by its treatment networks. The treated water is then returned to the Seine and the Marne.**



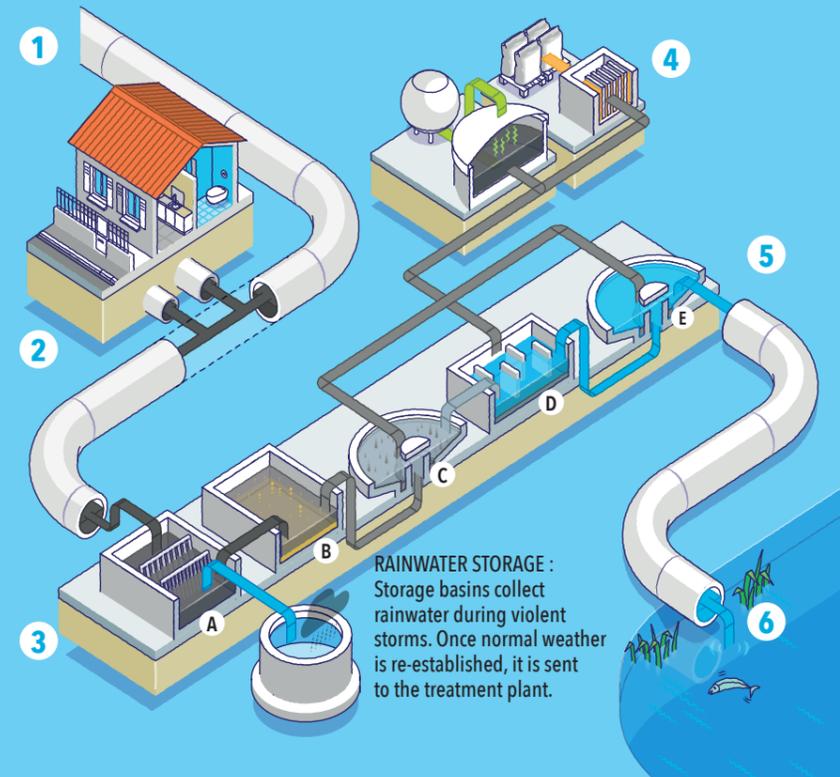
### KEY DATES



## WASTEWATER TREATMENT DIAGRAM

### How does sanitation work?

This generic diagram shows the main stages in the treatment of wastewater. At the SIAAP, such methods of treatment may vary from one plant to another.



#### 1 WATER USE AND POLLUTION

#### 2 WASTEWATER COLLECTION AND TRANSPORT

Wastewater is collected in sewers connected to large pipes called outfalls. Located at depths of up to 100 metres, they transport the water to the treatment plants.

#### 3 WASTEWATER TREATMENT

**A SCREENING:** Wastewater passes through increasingly fine screens that capture bulky waste (bottles, cans, leaves, etc.).

**B SAND AND GREASE REMOVAL:** The water is allowed to rest. Sand then settles at the bottom of the basin, whilst slight aeration enables grease to rise to the surface. The sand and grease are subsequently recovered.

**C DECANTING:** Suspended solids settle on the bottom of the facility simply through gravity, in the form of sludge which is subsequently collected by downhole pumping.

**D BIOLOGICAL TREATMENT:** By blowing air into the basins, non-pathogenic bacteria that are naturally present in the water multiply and consume invisible pollution: carbon, nitrogen and phosphates.

**E CLARIFICATION:** The bacteria are removed from the water before it is returned to the river.

#### 4 TREATING SLUDGE

#### 5 DISINFECTION OF TREATED WASTEWATER

Fecal bacteria are eliminated until water quality compatible with bathing is attained.

#### 6 DISCHARGE OF TREATED WATER INTO THE RIVER

### THE SIAAP'S KEY FIGURES

- **1,800** agents
- **9** million Ile-de-France users
- **2,5** million m<sup>3</sup> of wastewater treated every day
- **6** wastewater treatment plants
- **8** storage basins and 4 tank tunnels for storing rainwater
- **1,800** km<sup>2</sup> of collection area
- **472** km of networks and outfalls
- France's **leading** producer of biogaz
- **37** species of fish recorded in the Marne and **36** the Seine
- **26** floating barriers for the interception of waste in the Seine and the Marne

## The SIAAP's Board of Directors

The SIAAP's Board of Directors is composed of 33 département-level councillors appointed by the 4 constituent départements: 12 Councillors from Paris and 21 Councillors from the départements of the Hauts-de-Seine, Seine-Saint-Denis and Val-de-Marne.

### 75 PARIS

**Jean-Didier Berthault**  
3<sup>rd</sup> Vice-president  
Councillor for Paris'  
17<sup>th</sup> Arrondissement

**Colombe Brossel**  
6<sup>th</sup> Vice-president  
Councillor for Paris'  
19<sup>th</sup> Arrondissement

**Rachida Dati**  
Board member  
Councillor for Paris'  
7<sup>th</sup> Arrondissement

**Jean-Philippe Daviaud**  
Councillor for Paris'  
18<sup>th</sup> Arrondissement

**Inès de Raguanel**  
Board member  
Councillor for Paris'  
15<sup>th</sup> Arrondissement

**François-Marie Didier**  
President of the SIAAP,  
Councillor for Paris'  
20<sup>th</sup> Arrondissement

**Nelly Garnier**  
Councillor for Paris'  
11<sup>th</sup> Arrondissement

**Jean-Philippe Gillet**  
Councillor for Paris'  
19<sup>th</sup> Arrondissement

**Jérôme Gleizes**  
9<sup>th</sup> Vice-president  
Councillor for Paris'  
20<sup>th</sup> Arrondissement

**Raphaëlle Primet**  
Councillor for Paris'  
20<sup>th</sup> Arrondissement

**Delphine Terlizzi**  
Councillor for Paris'  
11<sup>th</sup> Arrondissement

**Karim Ziady**  
Board member  
Councillor for Paris'  
17<sup>th</sup> Arrondissement

### 92 HAUTS-DE-SEINE

**Pierre-Christophe Baguet**  
Vice-president of the  
département-level Council

**Grégoire de la Roncière**  
5<sup>th</sup> Vice-president  
département-level Councillor

**Josiane Fischer**  
Board member départem-  
ent-level Councillor

**Vincent Franchi**  
Département-level  
Councillor

**Denis Larghero**  
Vice-president of the  
département-level Council

**Nadia Mouaddine**  
2<sup>nd</sup> Vice-president  
département-level  
Councillor

**Rémi Muzeau**  
Vice-president of the  
département-level Council

### 93 SEINE-SAINT-DENIS

**Belaïde Bedreddine**  
7<sup>th</sup> Vice-president  
Vice-president of the  
département-level Council

**Hamid Chabani**  
Board member départem-  
ent-level Councillor

**Emmanuel Constant**  
Vice-president of the  
département-level Council

**Philippe Dallier**  
1<sup>st</sup> Vice-president  
département-level Councillor

**Frédérique Denis**  
Board member départem-  
ent-level Councillor

**Pascale Labbé**  
Vice-president of the  
département-level Council

**Azzédine Taïbi**  
Département-level  
Councillor

### 94 VAL-DE-MARNE

**Nicolas Bescond**  
Département-level  
Councillor

**Chantal Durand**  
4<sup>th</sup> Vice-president  
Vice-president of the  
département-level Council

**Hervé Gicquel**  
Département-level  
Councillor

**Kristell Niasme**  
Département-level  
Councillor

**Déborah Münzer**  
8<sup>th</sup> Vice-president  
Vice-president of the  
département-level Council

**Marion Martin**  
Département-level  
Councillor

**Germain Roesch**  
Board member  
département-level  
Councillor

## Innovation that supports biodiversity

Since its creation, the SIAAP has been driven by a culture of innovation. This constitutes a lever for progress both for its industrial tool and for the men and women who are leading it on a daily basis. In 2020, the SIAAP structured its *inneauvation* initiative. Surrounded by its scientific and technical partners, the SIAAP is developing an industrial public innovation policy for generating solutions, addressing current issues and supporting the world of sanitation in its future evolutions. More than a programme, *inneauvation* is an initiative for knowledge-sharing and the implementation of innovative solutions on industrial sites.

The SIAAP also has a scientific board that contributes to the direction of its scientific programming and helps it achieve efficient and sustainable sanitation.

Thanks to its MeSeine river observatory and its network of sensors, the SIAAP also monitors – on a real-time basis – the evolution of the Seine and its tributaries' water quality, is aware of its oxygenation levels and assesses its biodiversity.



Explore  
[inneauvation.fr](https://inneauvation.fr)



### A RECENT AND EVOLVING REGULATORY FRAMEWORK

- Under the European Directive of 21 May 1991 relating to the treatment of urban wastewater (UWW), the 1992 water legislation requires municipalities to be equipped with a sanitation system that collects and treats wastewater.
- In order to meet environmental objectives, the Water Framework Directive (WFD) of 22 December 2000 requires Member States to return surface water and groundwater to good chemical and ecological status; the non-deterioration of such status where it already exists; and the elimination of discharges of "priority" hazardous substances.
- The European Directive of 15 February 2006 on the management of bathing water quality requires EU Member States to monitor and classify bathing water quality, manage the quality of such water, and provide the public with information.
- Since 30 December 2006, French Law on Water and Aquatic Environments (LEMA) has enhanced the right of access to drinking water and sanitation under "economically acceptable conditions for all". It has organised the "balanced and sustainable management of water resources" in order to meet the objectives set by the WFD.
- The Law of 26 March 2018 relating to the organisation of the 2024 Olympic and Paralympic Games requires barge owners to be connected to the city's wastewater network.
- The Climate and Resilience Law of 24 August 2021 on the obligation to complete the work within 2 years, in the event of non-compliance following an analysis of connections to the public sanitation network.

## 2. The water quality and bathing plan, a catalyst for the recovery of the seine and the marne

For 50 years, the SIAAP has been carrying out its treatment mission, with proven results as regards the quality of the Seine and the Marne. The SIAAP has invested over six billion euros during the last thirty years, to improve the sanitation system's performance.

This constant effort has helped make swimming possible at the Paris 2024 Olympic and Paralympic Games, and also, ultimately, for all Ile-de-France residents.

### KEY DATES

#### • 1923

Bathing in the Seine was prohibited

#### • 4 April 2016

Meeting of the Seine\* Committee and presentation of the Interdepartmental and Inter-service Water and Nature Mission for Paris and its surrounding area's 2016-2018 Action Plan which aimed to improve the water quality of the Seine and its tributaries

#### • June 2016

Creation of a State-City of Paris working group, and creation of four sub-groups :

- "prioritisation of waste", piloted by the SIAAP;
- "poor connections", piloted by the Val-de-Marne département-level Council;
- "rainwater management", piloted by the Seine-Saint-Denis département-level Council;
- "boats and floating establishments", piloted by Paris Ports

#### • 26 April 2017

Validation of the Action Plan

#### • 13 September 2017

Paris was selected by the 115 members of the International Olympic Committee (IOC), to organise the 2024 Olympic and Paralympic Games

#### • 26 March 2018

Legislation relating to the organisation of the 2024 Olympic and Paralympic Games, which obliges boats moored in their ports of origin to be connected to the wastewater network

#### • 18 October 2018

Definition of the bathing sites (23 sites)

#### • 9 October 2019

Signing of a protocol committing the State and communities to making the Seine and the Marne suitable for bathing

#### • 16 September 2020

1<sup>st</sup> COPIL "Water Quality and Bathing in the Marne and the Seine"

#### • 12 April 2021

Launch of the monbranchement.fr website

#### • 21 May 2021

2<sup>nd</sup> COPIL "Water Quality and Bathing in the Marne and the Seine"

#### • 4 July 2022

3<sup>rd</sup> COPIL "Water Quality and Bathing in the Marne and the Seine"

#### • 10 March 2023

4<sup>th</sup> COPIL "Water Quality and Bathing in the Marne and the Seine"

#### • Spring 2023

Commissioning of the two disinfection units at the SIAAP's treatment plants (Marne Aval (Downstream) Plant in Noisy-le-Grand and Seine Valenton Plant in Valenton)

#### • 17 - 20 August 2023

Paris 2024 OPG test event

#### • 26 July 2024

Paris 2024 OPG opening ceremony

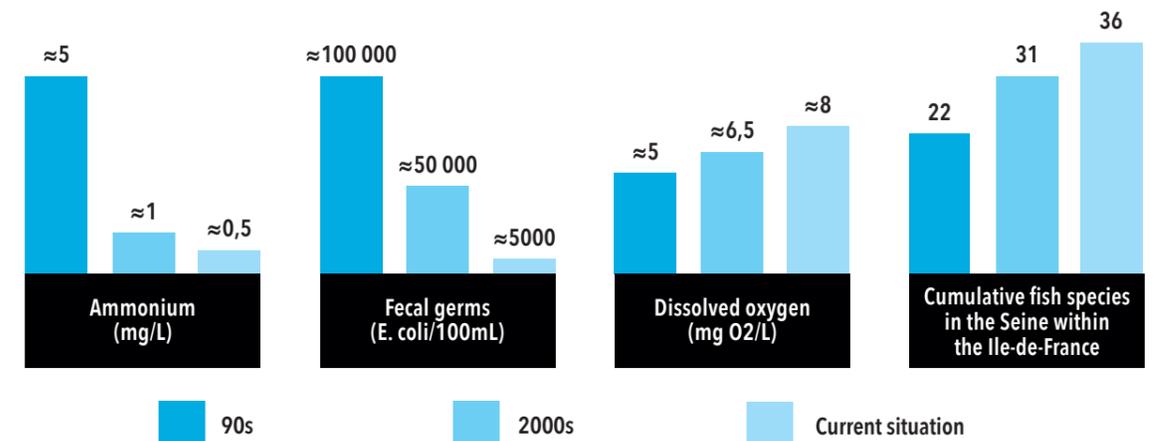
- 30, 31 July and 5 August: triathlon events in the Seine
- 8 and 9 August: marathon swimming events in the Seine
- 1 and 2 September: para-triathlon events in the Seine

#### • Summer 2025

Bathing authorised at the city's 23 sites

*\* composed of representatives of the City of Paris, the port municipalities (Vitry and Gennevilliers), the département-level Councils (92, 93 and 94), the State's services and its public institutions (Ports of Paris and VNF), as well as the Seine-Normandy Water Agency and the Regional Health Agency.*

### BIODIVERSITY QUALITY OF THE SEINE EXITING THE PARIS URBAN AREA



### The Bathing Plan: a collective challenge

Launched in 2016, a steering committee – co-chaired by the Prefect of the Île-de-France region, the Prefect of Paris and the mayor of Paris – helped put together the Water Quality and Bathing Plan which aims to improve water quality in the Seine and the Marne, strengthen biodiversity and make swimming possible in time for the 2024 Olympic and Paralympic Games.

The many stakeholders who make up this committee each have a specific role to play; these were established under the Commitment Protocol signed in October 2019.

### THE BATHING PLAN'S STAKEHOLDERS

- The State, through the Île-de-France Region's Prefecture,
- The City of Paris,
- The SIAAP,
- Local public institutions: Vallée Sud Grand Paris, Est Ensemble, Grand Paris Grand Est, Paris Terre d'Envol, Plaine Commune, Paris Est Marne et Bois, Grand Paris Sud Est Avenir, Grand Orly Seine Bièvre, and Grand Paris Seine Ouest,
- The Greater Paris Metropolis,
- The Hauts-de-Seine, Seine-Saint-Denis and Val-de-Marne départements,
- The Syndicat Marne Vive (Marne Vive Utility),
- The Syndicat mixte du bassin versant de la Bièvre (Bièvre Catchment Area Joint Utility, SMBVB),
- The Syndicat mixte pour l'assainissement des eaux du bassin versant de l'Yerres (Yerres Catchment Area Water Treatment Joint Utility, SYAGE),
- The Syndicat des eaux d'Île-de-France (Île-de-France Water Utility, SEDIF),
- HAROPA PORT,
- Voies Navigables de France (French Inland Waterways, VNF),
- The Seine Normandy Water Agency (the State and local authorities' project finance operator),
- The Regional Health Agency (for the water's sanitary quality),
- The Direction Régionale et Interdépartementale de l'Environnement, de l'aménagement et des transports Île-de-France (Île-de-France Regional and Interdepartmental Directorate for the Environment, Planning and Transport, DRIEAT),
- The Atelier Parisien d'Urbanisme (Paris Urban Planning Workshop),
- Its scientific partners.

## An ambitious plan in which the SIAAP is playing a major role

On an unprecedented scale, the Bathing Plan aims to:

- improve the disinfection of treated waters released from wastewater treatment plants upstream of Paris;
- eliminate the direct discharge of raw wastewater into the rivers when it is not raining;
- reduce discharges from treatment networks during rainy weather;
- treat local sources of pollution, by eliminating the discharge of wastewater from boats.

On average, over the course of a year, neither the Seine nor the Marne complies with the European Directive's bacteriological quality thresholds (see box). The water quality varies greatly, depending on the weather and the sampling area:

- in the event of a storm, its quality declines due to the mixing of rainwater spills with wastewater;
- water quality is poorer downstream of the Paris urban area.

The Water Quality and Bathing Plan is therefore composed of two main categories of measures to ensure the water's sanitary quality during dry weather and improve it during rainy weather.

### Actions to be taken to ensure water quality during "dry weather"

The disinfection of water discharged from the SIAAP's wastewater treatment plants (Marne Aval (Downstream) and Seine Valenton) so as to lower its bacteria concentration to reach the bathing quality threshold;

The collection of wastewater (connection or storage) from boats, barges and floating establishments on the Seine and the Marne;

The correction of "poor connections" in houses and buildings with poor connections to the sanitation network, that discharge their untreated wastewater into the rainwater network and consequently directly into the rivers.

### Actions to be taken to improve water quality during "rainy weather"

In the event of heavy rain, the aim is to limit the impact of rainwater collected in the sanitation network through flood prevention, by storing it and subsequently returning it to our plants for treatment.

### MONITORING BACTERIOLOGICAL QUALITY

To define whether a site is "suitable for bathing", the water, river or sea's bacteriological quality is examined (its escherichia coli (EC) and intestinal enterococci (IE) levels; these are fecal bacteria). The SIAAP monitors its bacteriological quality all the year, and on a weekly basis during summer.

Should the bathing be a temporary affair – for a sporting event for example – and following advice from the State's services responsible for water quality and navigation [including the ARS, Agence Régionale de Santé (Regional Health Agency) regarding the sanitary aspect], the Prefect of the département or Paris Police Prefecture decides whether to authorise swimming.

Should the bathing be a permanent affair, then the water quality is examined according to the European Directive. The municipality announces that the site is open for bathing. The ARS carries out health checks throughout the bathing season.

So, for the Seine and the Marne to be suitable for bathing, the minimum quality according to the European Directive must be achieved.

CLASSIFYING A SAMPLE	ESCHERICHIA COLI (EC) (CFU/100 ML)	INTESTINAL ENTEROCOCCI (IE) (CFU /100 ML)
Good	≤ 100	≤ 100
Average	>100 et ≤ 1800	>100 et ≤ 660
Bad	>1800	>660

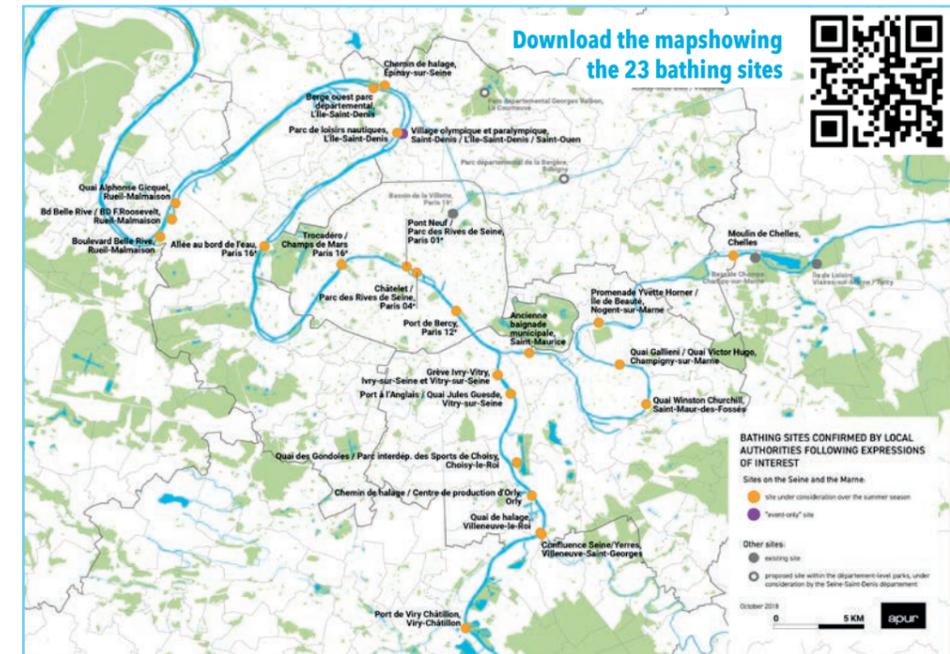


Access all the reports on the quality of the Seine and the Marne

All these actions should allow swimming events to be organised in the Seine during the 2024 Olympic and Paralympic Games (marathon swimming - 10km - for the Olympic Games and Olympic and Paralympic triathlon swimming events), but above all pave the way for "legacy heritage" bathing.

Indeed, from the summer of 2025, the Île-de-France's residents will be able to swim in the Seine and its tributary the Marne. 23 bathing sites will gradually be created throughout the Île-de-France, including 3 in Paris: at the Bras Marie and the Bras de Grenelle and in Bercy.

Remember: in 1923 bathing in the Seine was prohibited by Prefectural order, and in 1970 it was prohibited in the Marne.



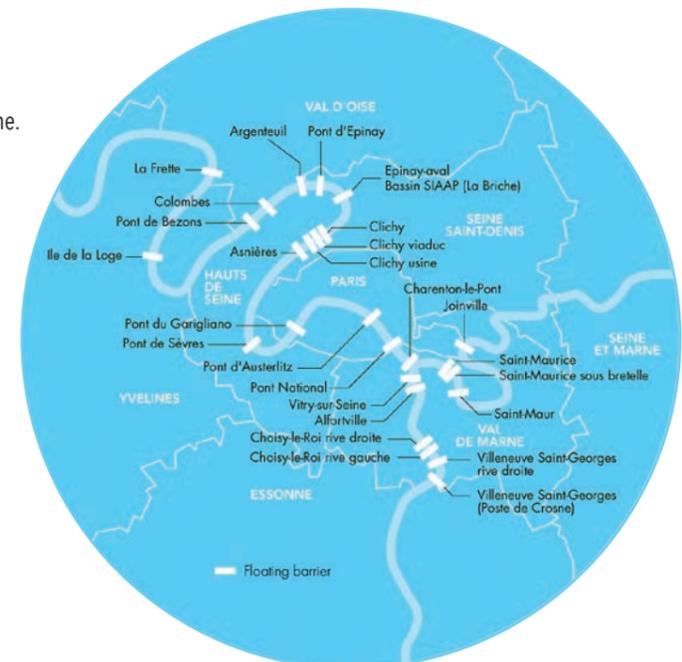
### 26 floating barriers to eliminate waste

In 1993, the SIAAP installed 26 floating barriers on the Marne and the Seine.

The aim: to capture waste drifting in the water. Once or twice a week, two specially-equipped boats come to empty them and transport the waste to appropriate treatment facilities.

#### Key figures

- 10 upstream of Paris
- 3 in Paris
- 13 downstream from Paris
- 2,000 tonnes of waste recovered per year
- Annual budget: 1.5 million euros



Access the map showing the floating barriers

### 3. The SIAAP in action to make bathing possible

#### Works for which SIAAP has 100% project management responsibility

5 major investments are entirely led by the SIAAP in order to ensure the Seine's suitability for bathing.

##### Investment 1: construction of the VL8 collector

**Aim** To provide an additional collector to handle wastewater mainly from the Orge Utility (SYORP) and the Syndicat mixte pour l'Assainissement et la Gestion des eaux du bassin versant de l'Yerres (Yerres Catchment Area Water Management and Treatment Joint Utility, SyAGE) in order to transport it to the Seine Valenton treatment plant, thus reducing the risk of discharge of untreated waters into the natural environment in the event of rain.

plying the SESAME utility upstream of the Seine Valenton plant.

##### Schedule

- 2019: start of works
- 2<sup>nd</sup> quarter of 2024: commissioning

**Cost** 315 million euros

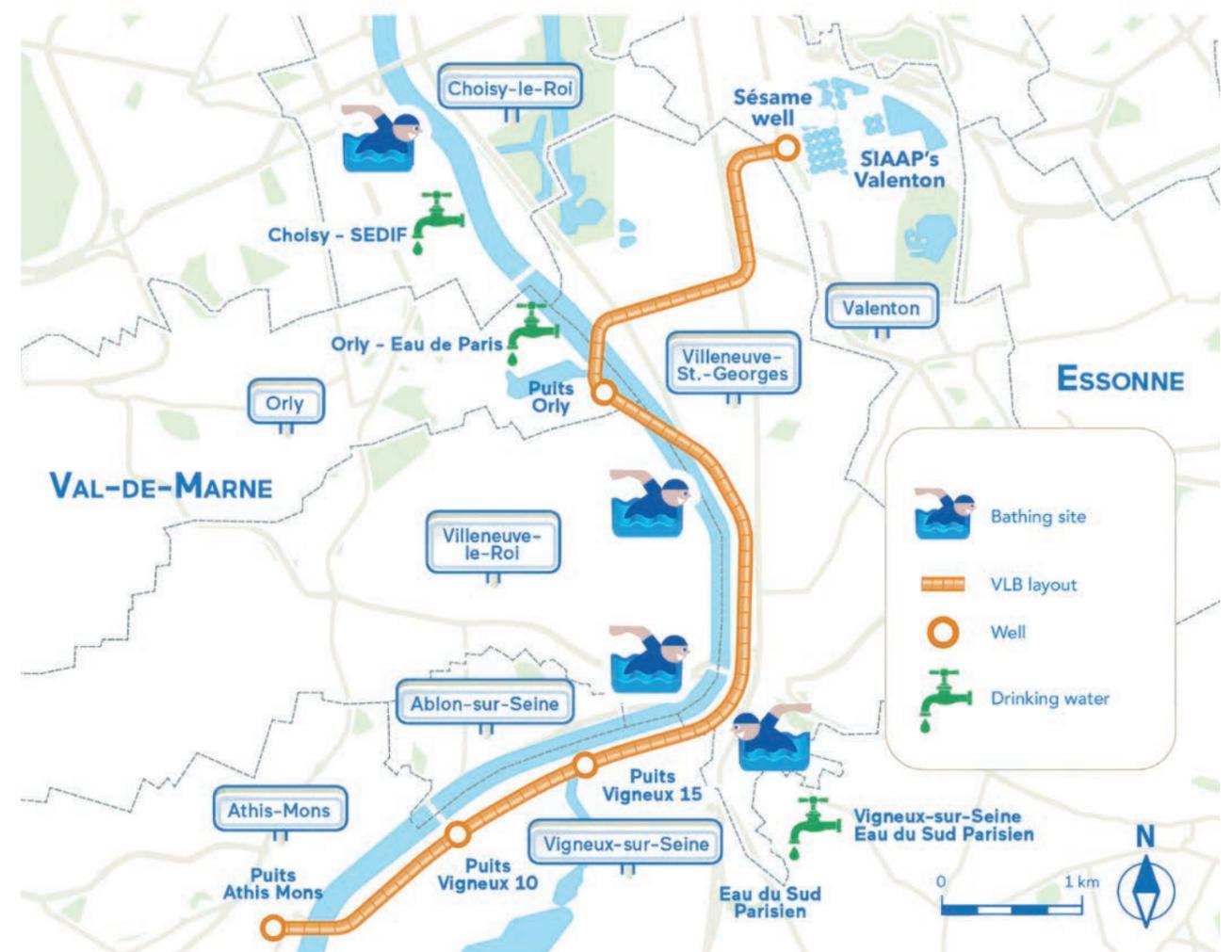
**Facility** Using micro-tunnelling and tunnelling machines to build a collector measuring 2.5 to 3 m in diameter over 8.5 km, with an even slope and no siphon, and 5 associated and equipped wells, and a conduit sup-

#### The SIAAP's financial investments in the Bathing Plan

From studies through to projected plans, the SIAAP has played the key roles of coordinator, adviser and financier. It finances one third of the allocated budget, i.e. 506 million euros.

#### SUMMARY OF SIAAP INVESTMENTS IN CONNECTION WITH THE BATHING PLAN

	BATHING FACILITIES AND STUDIES	REVISED COST 2023 (€M)
100% FINANCING	VL8 collector (91 and 94)	315
	Siphon under the Marne between Neuilly-sur-Marne (93) and Noisy-le-Grand (93)	42
	Marne Aval (Downstream) buffer tank (Noisy-le-Grand, 93)	21
	Disinfection of Marne Aval (Downstream) (Noisy-le-Grand, 93) and Seine Valenton (Valenton, 94) plant discharges	13
	Camille Thomoux gate (Neuilly-sur-Marne, 93)	7
	Various studies	3
FINANCIAL CONTRIBUTION	Solidarity grant awarded by the SIAAP	30
	Ru de la Lande rainwater de-pollution plant (Champigny-sur-Marne, 94)	20
	Moulin de Berny Park basin (Fresnes, 94)	17
	Ru Saint-Baudile retention basin (Gagny, Neuilly-sur-Marne, 93)	15
	Austerlitz basin (Paris)	13
	Optimisation management of 4 combined stormwater overflows	10
<b>TOTAL</b>		<b>506</b>



## Investment 2: the performic acid disinfection process at Seine Valenton (94)

**Aim** Increase the level of disinfection of water treated at the Valenton plant and reduce its impact on the natural environment.

**Facility** Installation of a performic acid disinfection unit at the Valenton plant, in order to eliminate intestinal enterococci and escherichia coli-type bacteria.

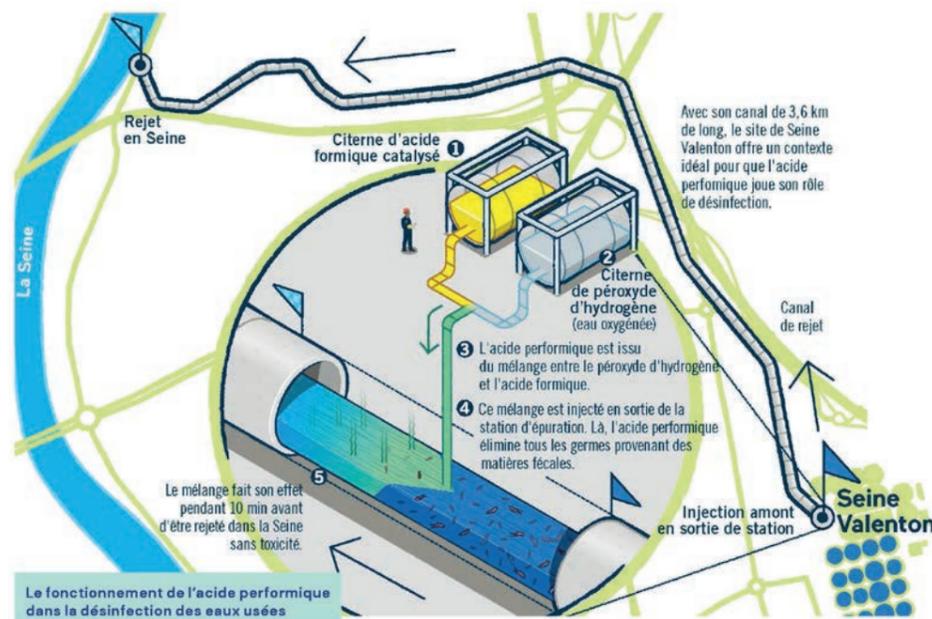
### Schedule

- 31 May 2021: submission of the operating licence application
- 17 July 2023: facility in operation 24/7

**Cost** 8.5 million euros

### THE PERFORMIC ACID DISINFECTION PROCESS

Obtained through the reaction between oxygenated water and formic acid, this process is used to disinfect wastewater treatment plant discharges.



As part of the Inneavation scientific programme led by the SIAAP and its partners, more than fifteen researchers have conducted 3-year laboratory and industrial-scale experiments at the Seine Valenton plant, with very conclusive results. They have demonstrated its greater effectiveness in the elimination of fecal indicator bacteria, compared to other low-dose chemical disinfectants, and the disinfectant's rapid disappearance within the environment. These studies have also demonstrated that it has no impact on the environment (flora and fauna).

## Investment 3: Ultraviolet (UV) treatment at Marne Aval (Downstream) (93)

**Aim** Increase the level of disinfection of water treated at the Marne Aval (Downstream) plant.

**Facility** Installation of a UV disinfection unit at the plant, in order to eliminate intestinal enterococci and escherichia coli-type bacteria.

### Schedule

- November 2021: start of works
- May 2023: commissioning

**Cost** 4.3 million euros

### ULTRAVIOLET DISINFECTION

Within the Marne Aval plant, prior to its discharge into the Marne, treated water undergoes additional disinfection via ultraviolet lamps which were modernised in November 2022. The water flows through a channel equipped with UV lamps. The UV radiation absorbed by the micro-organisms permanently modifies their DNA. The micro-organisms are inactivated and are no longer infectious or capable of reproducing.

## Investment 4: constructing the siphon under the Marne between Neuilly-sur-Marne and Noisy-le-Grand (93)

**Aim** In rainy weather, the sanitation networks will collect and transport a mixture of wastewater and rainwater. So as not to overload these networks and avoid overflows onto the roads or into private property, some of this water may be directly discharged into the Marne via the "Ru Saint-Baudile" and "Neuilly Gagny" facilities.

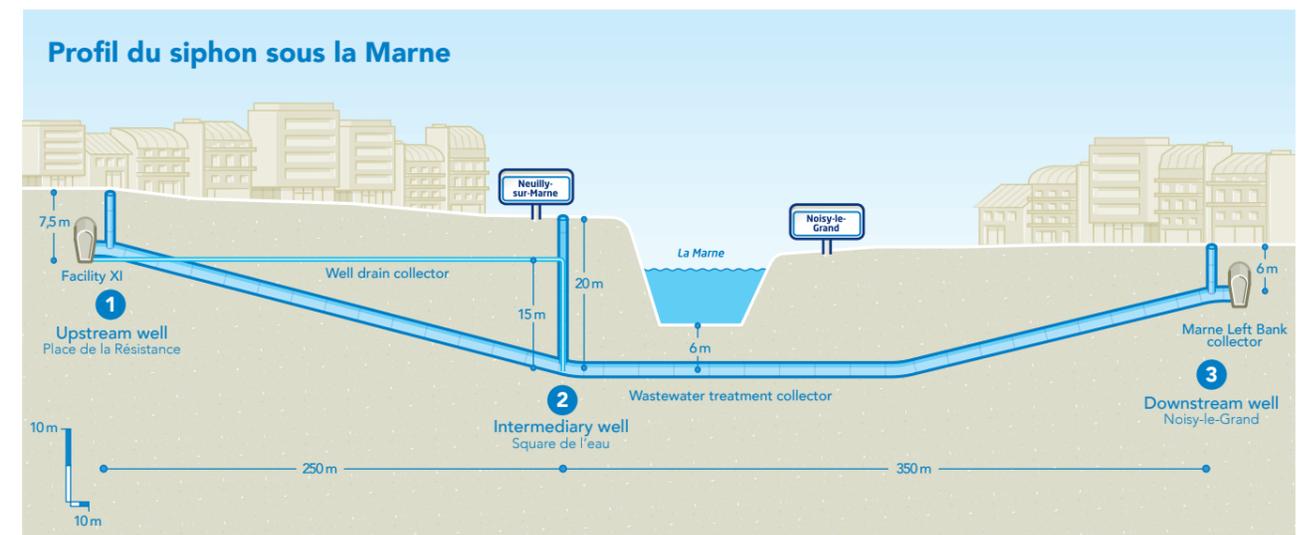
**Facility** Construction of a hydraulic sanitation (siphon) facility under the Marne between the municipalities of Neuilly-sur-Marne and Noisy-le-Grand in order to channel and transport wastewater and excess rainwater to the Marne Aval (Downstream) plant, to be treated before being discharged into the Marne.

The construction of this siphon forms part of a more comprehensive hydraulic system that also includes the automation of the Camille Thomoux gate, the creation of the "Ru Saint Baudile" storage basin (by the Seine Saint Denis département) and the buffer tank constructed at the Marne Aval (Downstream) plant site which is described in the next section.

### Schedule

- From 2022 to the 1<sup>st</sup> quarter of 2024

**Cost** 42 million euros



## Investment 5: the storage-restitution basin at the Marne Aval (Downstream) site (93)

**Aim** To provide a storage capacity for smoothing the flows delivered by the siphon under construction, to allow them to be treated by the Marne Aval (Downstream) plant.

**Project** Construction of a storage-restitution basin with a capacity of 5,000m<sup>3</sup>.

### Schedule

- 2021: design research
- January 2023: start of works on the two basins
- 2<sup>nd</sup> quarter of 2024: commissioning of the basins

**Cost** 21 million euros



## SIAAP's contributions to the other works

### Ru de la Lande rainwater de-pollution plant (SDEP) in Champigny-sur-Marne

**Aim** To store and de-pollute rainwater prior to its discharge into the Marne. The construction of this facility and its two water intakes will conclude the development of the Ru de la Lande catchment area.

#### Schedule

- 2020 – 2<sup>nd</sup> quarter of 2024

**Facility** The SDEP consists of:

- 2 water intakes on rue de la Plage and Place Lénine (hydraulic facilities that direct rainwater towards the de-pollution plant);
- 1 bi-lobe underground structure (one lobe allows the storage of up to 8,000 m<sup>3</sup> and the water is treated in the other lobe);
- 1 km of sewers

#### Cost

45.6 million euros, co-financed by the Val-de-Marne département, the Seine-Normandy Water Agency and the SIAAP (with a contribution of 20 million euros).

### The Ru Saint-Baudile retention basin

**Aim** To limit flooding, notably within Gagny's Villa Dalloz district and Avenue des Bouleaux in Neuilly-sur-Marne.

#### Schedule

- Delivery: 2<sup>nd</sup> quarter of 2024

**Facility** With a storage capacity of 30,000 m<sup>3</sup>, the facility will be equipped with 3 supply and drain lines, and 2 water supply intakes. The project's management and execution will be provided by the Seine-Saint-Denis département.

#### Cost

The total cost of the works amounts to 54 million euros, with a contribution from the SIAAP of 15 million euros.

### Austerlitz storage basin in Paris

**Aim** To improve the sanitary quality of the water in the Seine by collecting excess water during major storms so as to prevent rain from saturating the sanitation network.

#### Schedule

- August 2020 – 2<sup>nd</sup> quarter of 2024

**Facility** The construction of a water storage-treatment-restitution basin, a water intake facility or drop well (the Valhubert well), a water intake facility (the Tournaire well), and a collector linking these 3 facilities, which will be completed by micro-tunnelling under the Seine.

#### Cost

82 million euros, co-financed by the City of Paris, the Seine Normandy Water Agency and the SIAAP (with a contribution of 13 million euros).

## The animation tools

### The solidarity grant

The SIAAP has introduced the "prime solidaire" (solidarity grant) scheme which aims to redistribute 30 million euros over 3 years (2021–2023) to various sanitation stakeholders (local public institutions, départements, and the City of Paris) to support their connection works.

This budget will, in particular, allow a reduction of the potential "balance due" that individuals would be obliged to pay in the event of a correction to their connection.

### The Parapluie (Umbrella) tool

"Parapluie" (Pour un Aménagement RAisonné Permettant L'Utilisation Intelligente de l'Eau, For a Rational Development Allowing the Intelligent Use of Water) is a tool for urban development stakeholders; it assists the design of rainwater source development projects, and can be accessed on the <https://parapluie-hydro.com/siaap> website



Explore the Parapluie tool

### The monbranchement.fr website

It has been estimated that there are almost 35,000 "bad connections" within the bathing basin\* area, i.e. homes connected to the rainwater network but not to the sanitation network, where untreated wastewater therefore empties directly into the Seine or the Marne. Such connection errors have a direct impact on the water quality of our rivers, and therefore their suitability for bathing.

To remedy this situation, in 2021 the SIAAP and its partners launched the monbranchement.fr website, which summarises essential information and provides a link between individuals and their sanitation network operator. A communications kit is also provided for all the area's stakeholders and partners.

Please note that since the Climate and Resilience Law was passed in 2021, the owners of properties within 71 Ile-de-France municipalities are now obliged to provide an analysis of their connection's compliance when selling their property.

*\* areas where the discharge of wastewater and rainwater have an impact on the water quality for Olympic freestyle swimming and triathlon events in the Seine.*



Explore the monbranchement.fr website



# SIAAP

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