



THE WATER POLLUTION RULES, 2019
THE ENVIRONMENTAL MANAGEMENT ACT CHAPTER 35:05

**APPLICATION FOR A WATER POLLUTION PERMIT TO DISCHARGE
WATER POLLUTANTS FROM SEWAGE TREATMENT FACILITIES**

GENERAL INSTRUCTIONS:

- This form must be completed in **Print or Type**.
- **All fields must be completed.** Tick (✓) the appropriate box where provided and mark N/A (not applicable) in fields that do not apply. Any form with blank fields will be considered incomplete [Rule 11(1)] and may result in refusal of this application [Rule 11(3) and Rule 12(1)].
- **Refer to instructional booklet and sample completed application form for detailed item descriptions and instructions**
- **One hard copy and one soft copy (in PDF format)** of the completed form must be submitted along with the proof of payment. The hard copy should be delivered by hand to the EMA's Office and soft copy emailed to: WaterUnitAdmin@ema.co.tt **SEE INSTRUCTIONAL BOOKLET**
- This form must be signed by the **Principal Executive Officer** where the application is with respect to a company and in other instances by the person owning or operating the facility in respect of which the permit is being sought.

NOTE: According to the Water Pollution (Fees) Regulations, 2019, the Permit Fee payable is subject to Rule 3 and therefore, the Environmental Management Authority reserves the right to determine the facility type and effluent discharge volume and therefore the amount payable based on the Rule.

Certification/ Declaration

"I hereby certify that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that competent personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that the submission of any information which is false, which I know or believe to be false or do not believe to be true is an offence of law."

Name of Parent Facility: ISLAND SEWAGE COMPANY

Principal Executive Officer (last,first): SMITH, JOHN (PRINT NAME)

Official Position: CHIEF EXECUTIVE OFFICER

Mailing Address (number, street, city, village and country): P.O Box XYZ, PORT OF SPAIN

Phone No.: 000-0001 Fax No.: 000-0001

Mobile No.: 000-0001 Email: abc@xyz.com

Date Application Signed: 21/04/2009
Principal Executive Officer Signature _____ (DD/MM/YYYY)

FOR OFFICIAL USE ONLY												
Date Application Received:							EMA Personnel Received by					
	(Day/Month/Year)											
Payment Received:	YES	NO	Amount Received:									
Permit Reference Number:	W	P	R	-				/				
Facility Type:	Micro/Mini	<input type="checkbox"/>	Small	<input type="checkbox"/>	Medium	<input type="checkbox"/>	Large	<input type="checkbox"/>				

DISCLAIMER: Please note that this document watermarked "SAMPLE" does not represent any real facility or real data from any known facility. This document is intended for use as GUIDANCE ONLY for applicants when completing this permit application for their facility and to be used with the Instructional Booklet.



SECTION I. APPLICANT AND FACILITY DESCRIPTION

1. Application Type.

Type of Permit for which application is to be made (Please tick):

Initial Renewal. For renewal give Permit No.: **WPR** _____

2. Name of Facility Site **CLARITY WASTEWATER TREATMENT PLANT** _____

3. Provide a Description of the Facility's Operations (attach additional sheets if necessary to provide further details such as flow charts, process maps etc.): **SEE ATTACHMENT 1** _____

4. Facility Type (based on effluent discharge volume- m³/day)

Micro/mini (<10) Small (10-100) Medium (100-500) Large (>500)

5. Number of Employees at the Facility Site.

Permanent: 5 Temporary: 40

6. Facility Location (ref. Item 3a)

Number and Street: 1234 MAIN HIGHWAY

Town /Village/City: CHAGUANAS

Lot No: NA

Regional Corporation / Parish: CHAGUANAS

Universal Transverse Mercator (UTM) Eastings (mE): 678456

Universal Transverse Mercator (UTM) Northings (mN): 1234560

7. Age of Facility.

Give the exact date that this facility began operations: 22/01/1979
DD/ MM/ YYYY

Approximate age in years: 40 (Where exact date of commencement is unknown)



8. Facility Contact.

Name (*last, first*): STONE, JANE

Official Title: ENVIRONMENTAL OFFICER

Mailing Address (*number, street, city, village and country*): ISLAND SEWAGE COMPANY, 1234 MAIN ROAD CHAGUANAS

Email address: <u>j.stone@isc.com</u>	Fax No.: <u>000-0000</u>
Phone No. (office): <u>000-0002</u>	Phone No. (mobile): <u>000-0003</u>

9. Facility Ownership:

Ownership type (*Please tick*)

Individual Corporation Governmental Entity Partnership Institution

Other (*please specify*) _____

Name of Owner: GOVERNMENT OF TRINBAGO

10. Does the Owner of the Facility also own the Property on which the Facility is Located?
(*Please tick*)

Yes No

If **No**, what is the nature of the facility owner's interest in the property? Please attach supporting documents justifying your claim (e.g. lease).

11. Property Ownership (if not owned by facility owner): NA

Ownership Type (*Please tick*)

Individual Corporation Governmental Agency Partnership

Other (*specify*) _____

Name of Owner: _____

Address: _____

Contact Person: (Name) _____

Email address:	Fax No.:
Phone No. (office):	Phone No. (mobile):



12. Name(s) and Address(es) of Adjoining Property Owners:

FACILITY IS SURROUNDED BY STATE LANDS, ROADWAYS AND A MAJOR WATERBODY (I.E. ON THE EAST – THE MAIN HIGHWAY, ON THE NORTH – WHITE RIVER, ON THE SOUTH – RAMSAR SWAMP (STATE LANDS) AND ON THE WEST – GULF OF TRINBAGO)

13. Corporate Data.

Date of Incorporation or Continuance: NA
DD/ MM/YYYY

Please ensure Registrar’s Certificate of Incorporation/Continuance, furnished by the Registrar of Companies, is attached to this application.

Corporate Officers: NA

Official Title	Name	Business Address

Directors:

Name of Director	Term of Office (Yrs)
<u>MS D. SMITH</u>	<u>3</u>
<u>MRS Z. JONES</u>	<u>4</u>
<u>MR N. SINGH</u>	<u>4</u>
<u>MR S. ALI</u>	<u>5</u>

Identify below any individual, corporation or other business organization having ownership or controlling interest in the facility. If applicable, the chain of ownership should be traced to the parent company. N/A

NAME:

ADDRESS:

NATURE OF CONTROL:

14. Other Permits/Certificates/Licenses/Approvals.

List all Permits, Certificates, Licenses and Approvals granted by the Authority or any other government entity in relation to the facility that are currently in effect or have been in effect at any time in 5 years prior to the date on which this form has been submitted. N/A

Issuing Agency	Type of Permit, Certificate or License	ID No.	Date Issued DD/MM/YYYY	Expiration Date DD/MM/YYYY
<u>N/A</u>				



SECTION II – TREATMENT PROCESS DESCRIPTION

1. Plant Description.

a. What levels of treatment are provided? Check all that apply.

Primary Secondary Tertiary/Advanced
 Other Describe N/A

b. How is the sludge treated and disposed? The sludge is dewatered and sent to a drying bed, then disposed of in a landfill.

c. Provide information on the plant's design flow rate (give rates for dry and wet season separately), areas and population served. Also provide information on the type of collection system (i.e. whether storm- and blackwater are combined or separate). Attach additional pages if necessary.

Design Flow Rate (m ³ /day or other)	Geographic Area Served	Actual Population Served (# persons)	Type of Collection System
Wet Season – 150,000 Dry Season – 60,000	Chaguanas	100,000	Combined

d. Indicate the following removal rates (as applicable):

Design 5-day Biological Oxygen Demand removal 60 %
 Design Chemical Oxygen Demand removal NA %
 Design Total Suspended Solids removal NA %
 Design Phosphorous removal NA %
 Design Nitrates removal NA %
 Other (specify) : NA NA %

e. Describe what type of disinfection (if any) is applied to the plant's effluent: NA

If disinfection is by chlorination, is dechlorination used? Yes No NA

f. Does the treatment plant have post aeration? Yes No

2. Inflow Rates.

Provide average daily inflow rate and maximum daily inflow rate this year and for each of the last two years. Each year's data must be based on a 12-month time period.

Inflow Rate (m ³ /day)	Two Years Ago	Last Year	This Year
Annual average daily rate	100,000	120,000	80,000
Maximum daily rate	135,000	140,000	120,000





3. Discharges and Other Disposal Methods.

a. Does the treatment plant discharge effluent into the environment? Yes No

If yes, please complete the following table:

Type of Discharge	Discharge Number	Discharge Name	Receiving Environment (i.e, surface impoundment, land application site, municipal drain, river, wetland, coastal nearshore, marine offshore etc. Provide names where applicable)	UTM Co-ordinates of Discharge Outfall Point	
				Eastings	Northings
Discharges of Treated Effluent	DP1	Outfall from Treatment Plant	White River	679876	1234560
Discharges of Untreated/ Partially Treated Effluent	DP2	WAS to sewage Lagoons	Surface Impoundment	678765	1234560
	DP3	Effluent from Sewage Lagoons	Ramsar Swamp	679843	1234560
Constructed Emergency Overflows (prior to headworks)	DP4	Bypass to Sewage Lagoons	Surface Impoundment	679432	1234560
Other (please specify)	NA	NA	NA	NA	NA





b. Complete the following Table for the discharges to basins, ponds or other surface impoundments listed in Section II, Table 3a:

Discharge Number	Discharge Name	Size of Impoundment (m ³)	Average Volume Discharged Daily (m ³)	Frequency of Discharge (Tick applicable)		Does Impoundment have an Outlet for Discharge into the Environment? (Y/N)
				Continuous	Intermittent	
DP2	WAS to Sewage Lagoons	350,000	10,000	✓		Y
DP 4	Bypass to Sewage Lagoons	(see above)	110,000 (this is averaged over 4 days - see Section III, Table 1c)		✓	(see above)

c. Complete the following for each of the outfall points listed in Table 3a that represent land-application of treated wastewater:

Discharge Number	Discharge Name	# Acres	Average Daily Volume Discharged to Land Application Site (m ³)	Frequency of Application (Tick applicable)	
				Continuous	Intermittent
NA	NA	NA	NA	NA	NA

d. Does the treatment plant discharge or transport treated or untreated wastewater/sludge to another treatment plant? Yes No

If Yes, describe the mean (s) by which the wastewater/sludge from the treatment plant is discharged or transported to the treatment plant (e.g. tank-truck, pipe).

NA

If transport is by a party other than the applicant, provide:

Name: _____ NA _____

Mailing Address: _____ NA _____

Contact Person: _____ NA _____

Title: _____ NA _____

Telephone No. : _____ NA _____

For each treatment plant that receives this discharge/sludge, provide the following:

Name: _____ NA _____

Mailing Address: _____ NA _____

Contact Person: _____ NA _____

Title: _____ NA _____

Telephone No. : _____ NA _____



Provide the Water Pollution Permit number of the treatment works that receives this discharge where applicable: **NA**

Provide the average daily effluent flow rate from the treatment plant to the receiving facility (m³/day). **NA**

Provide the average daily effluent volume sent from the treatment plant to the receiving facility (m³). **NA**

Provide the average daily sludge flow rate from the treatment plant to the receiving facility (m³/day). **NA**

Provide the average daily sludge volume sent from the treatment plant to the receiving facility (m³). **NA**

e. Does the treatment plant discharge or dispose of its wastewater through underground percolation or well injection?

Yes No

If Yes, provide the following for each disposal method:

Description of method (including location and size of site(s) if applicable): Use additional sheets if necessary.

Average daily volume disposed of by this method (m³): **NA**

Is disposal through this method: continuous intermittent **NA**

4. Process Flow Diagram or Schematic.

Attach to this application a diagram showing the processes of the treatment plant, including all by-pass piping, backup power sources and all unit processes including disinfection. Also show on the diagram average flow rates at influent and discharge points and approximate flow rates between treatment units. Include a brief narrative description of the diagram.

5. Operation/Maintenance Performed by Contractor(s).

Are any operational or maintenance aspects (related to wastewater treatment and effluent quality) of the treatment works the responsibility of a contractor? Yes No

If Yes, list the names, address, telephone number and status of contractor and describe the contractor's responsibilities (attach additional pages if necessary).

Name: **Claire Waters, Plant Manager**

Mailing Address: **Clean Waters Company, 1234 Central highway, Chaguanas**

Telephone No. : **000-0001**

Responsibilities of Contractor: **Daily Operations and maintenance of the wastewater treatment plant.**





SECTION III SITE MAP AND DISCHARGE CHARACTERISTICS

1. Site Map.

A detailed site map must accompany this application. You must complete this section for each existing or proposed intake and discharge structure. Discharges to wells from this facility must also be stated. For multiple intakes and discharges, separate descriptions must be submitted. For proposed intakes or discharges, values should reflect best engineering estimates.

2. Outfall Location.

a. Complete the following table for each discharge outfall into the coastal nearshore or marine offshore environment listed in Section II, Table 3a:

Discharge Outfall Point (Name & #)	Distance from Shore (m)	Depth Below Surface (m)	Average Daily Flow rate (m ³ /day)	Is outfall equipped with a diffuser? (Y/N)	Frequency of Outfall (Tick)	
					Continuous	Intermittent / Periodic
NA	NA	NA	NA	NA	NA	NA

b. Wherever applicable, complete the following information for each outfall into a river/stream, wetland or municipal drain identified in Section II, Table 3a:

Discharge Outfall Point (Name & #)	Name of receiving water	Critical low flow of receiving stream (m ³ /s)	Frequency of Outfall	
			Continuous	Intermittent
DP1 – Outfall from Treatment Plant	White River	10.0	✓	
DP 3 – Effluent from Sewage Lagoons	Ramsar Swamp	NA		✓

c. For intermittent/periodic discharges identified in the Tables 1a and b above, please provide the following:

Discharge Outfall Point (Name & #)	Number of times per year discharges occurs	Average duration of each discharge (hours)	Months in which discharge occurs (name)
DP 3 – Effluent from Sewage Lagoons	2-4 times	6 hours	Wet Season (July-December)



3. Discharge Characteristics

Read instructions before proceeding – Complete one set of tables for each discharge point or outfall identified in Section II Table 3a - Annotate the discharge number in the space provided.

Section II Table 3a - Annotate the discharge number in the space provided.

If you have analytical data you must report it. Complete one table for each discharge point or outfall leaving the facility – Annotate the outfall or discharge number in the space provided. See instruction booklet for additional details.					
DISCHARGE DESCRIPTION		2. EFFLUENT DATA			
No.	1	PERIOD OF SAMPLING FROM: OCTOBER 19, 2019 TO: OCTOBER 20, 2019			
Name	OUTFALL FROM TREATMENT PLANT				
(UTM) <i>mE</i>	678996				
(UTM) <i>mN</i>	123456				
1. PARAMETER/SUBSTANCE		a. Daily Value*	b. Grab Value (if available)	c. No. of Analyses (if averaged)	3. UNITS
i. Five day Biological Oxygen Demand (BOD ₅ at 20°C)	163.4			mg/L	
ii. Chemical Oxygen Demand (COD)	856.7			mg/L	
iii. Total Suspended Solids (TSS)	43.5			mg/L	
iv. Total Oil and Grease (TO&G) or n-Hexane Extractable Material (HEM)	NA			mg/L	
v. Ammoniacal Nitrogen (as NH ₃ -N)	18.0			mg/L	
vi. Total Phosphorus (as P)	11.1			mg/L	
vii. Total Residual Chlorine (as Cl ₂)	NA			mg/L	
viii. Faecal Coliforms	900.0			Counts / 100ml	
ix. Temperature	27.3			°C	
x. Hydrogen ion (pH)	7.61			Standard units	
xi. Dissolved Oxygen Content (DO)	1.03			mg/L	
xii. Flow rate	69,874 (M ³ /day)			m ³ /day	
xiii. Sulphide (as H ₂ S)	NA			mg/L	
xiv. Chloride (as Cl ⁻)	NA			mg/L	
xv. Dissolved Hexavalent Chromium(Cr ⁶⁺)	NA			mg/L	
xvi. Total Chromium (Cr)	NA			mg/L	
xvii. Dissolved Iron (Fe)	NA			mg/L	
xviii.Total Petroleum Hydrocarbons (TPH)	NA			mg/L	
xix.Total Nickel (Ni)	NA			mg/L	
xx. Total Copper (Cu)	NA			mg/L	
xxi. Total Zinc (Zn)	NA			mg/L	
xxii. Total Arsenic (As)	NA			mg/L	
xxiii. Total Cadmium (Cd)	NA			mg/L	
xxiv. Total Mercury (Hg)	NA			mg/L	
xxv. Total Lead (Pb)	NA			mg/L	
xxvi. Total Cyanide (as CN ⁻)	NA			mg/L	
xxvii. Phenolic Compounds (as phenol)	NA			mg/L	
xxviii. Radioactivity	NA			βq/L	
xxix. Toxicity	NA			Toxic unit	

Daily Value is an average of four grab samples taken at equal intervals over an operational daily cycle. E.g. 4 grab samples (one (1) every two (2) hours) over an eight hour cycle.



4. Scheduled Improvements and Schedules of Implementation.

Provide information on any uncompleted implementation schedule or uncompleted plans for improvements that will affect the wastewater treatment, effluent quality, or design capacity of the treatment plant. If the treatment plant has several different implementation schedules or is planning several improvements, submit separate responses.

a. List the outfall number for each outfall that is covered by this implementation schedule.

N/A

b. Are the planned improvements or implementation schedule required by government agencies?

Yes No

c. Provide dates imposed by any compliance schedule or any actual dates of completion for the implementation steps listed below, as applicable. For improvements planned independently of government agencies, indicate planned or actual completion dates, as applicable. Indicate dates as accurately as possible.

Implementation Stage	Schedule (DD/MM/YYYY)	Actual Completion (DD/MM/YYYY)
Begin Construction	N/A	
End Construction	N/A	
Begin Discharge	N/A	
Attain Operation Level	N/A	

5. Chemical Usage

Use the space below to list any of the toxic chemical(s) or products stored on site, which you know or have reason to believe is stored and/or used or discharged or may be discharged from any outfall. For every toxic chemical or product you list, briefly describe the reason you believe it to be present and report any analytical data in your possession (**use additional sheets if necessary**).

1. Toxic Chemical / Products	2. Reason
N/A	

6. Laboratory Analysis Information

a. Does your facility have an in house laboratory?

(Please tick) Yes No



Please list the substances / parameters that the in house laboratory is capable of analysing and indicate which parameter(s) have certification and name the certifying body.

A. Substance/Parameter	B. Certification	
	Yes/No	Certifying Body
Five day Biological Oxygen Demand at 20° C	No	
Chemical Oxygen Demand	No	
Total Suspended Solids	No	
Ammoniacal Nitrogen	No	
Total Phosphorous	No	
Temperature	No	
pH	No	
Dissolved Oxygen	No	
Faecal Coliforms	No	

b. Were any of the analyses reported in Section III, Table 3 performed by a contract laboratory or consulting firm?
 (Please tick) Yes No

In each case, list the name, address, telephone number and parameters analysed of each such laboratory or firm and indicate which parameter(s) analysed have been certified and name the certifying body.

A. Name	B. Address	C. Telephone No.	D. Substance/Parameter Analyzed (<i>list</i>)	E. Certification	
				Yes/No	Certifying Body

7. Data Records

Attach records describing all the procedures used in obtaining the monitoring data provided in Section III, Table 3 and Item 6. At a minimum the document should cover sample records, chain of custody records, quality control sample records, general field procedures, sample data, sample management records, test methods, quality assurance/quality control reports, competence of personnel / testing laboratory and data handling records.

SEE A3 INSTRUCTIONAL BOOKLET



8. Confidentiality Claim

If any information provided is considered to be a trade secret, confidential business information and/or if disclosed, will be contrary to the public interest: attach a Confidentiality Claim (Form M) and proof of payment of the prescribed fee.

Confidentiality Claim (Form M) and proof of payment are attached:

Yes No

9. List of attachments

In the table below, list all the attachments included with the application, the number of pages in each attachment and the number of copies.

Attachment Name/Description	Number of Pages	Number of Copies
1. ATTACHMENT 1: PROCESS DESCRIPTION	22	1
2. ATTACHMENT 2: LOCATION MAP	1	1
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		

