

KULERDARI GRAM PANCHAYAT

DAULATPUR, P.O.: PAILAN, BLOCK - BISHNUPUR -1,
SOUTH 24 PARGANAS.

Memo No.:



Date: 13/9/22

209, A.J.C Bose Road, Karnani Estate,

5th floor, Room No.192.

P.S. - Beniapukur, P.O. - Circus Avenue,

Kolkata 700 017

Sub : NOC Regd. drainage system of treated sewage and storm water for your proposed Residential Building at D. H. Road, L.R. Dag Nos. -125, 126, 127, 128, 129, 130, 133, 137, J.L. No.- 17, Touzi No.-351/B. Mouza - Sarmastr Chak, P.S.- Bishnupur, Dist.-24 Parganas (South), West Bengal.

Ref No. : Your letter dated 30/08/22

Dear Sir,

With reference to the above, we would like to inform you that we have noted that your project is coming in the above said address.

You have to install your own STP within the project area and reuse the treated wastewater as much as possible. Roof top rain water to be harvested as per norm. You can discharge storm water and excess treated wastewater in the Panchayat drain in front of your project. Treated wastewater quality should conform to the WBPCB standard.

All the expenses will be borne by developer. Panchayat has no financial involvement in this. The charges for the above said facilities will be intimated to you in due course, that is after completion of the project.

This is for your information.

Thanking You,

Yours Faithfully,

Pradhan

Raskar
Kulerdari Gram Panchayat 13/9/22

Pradhan
KULERDARI GRAM PANCHAYAT
Bishnupur-1, South 24 Parganas

MUNICIPAL SOLID WASTE MANAGEMENT PROPOSAL
FOR PANCHAYAT

SWM for Gram Panchayat (GP)

Generation from Gram Panchayat population (Assuming population of GP= 24000)
= $24000 * 250\text{gms/head/day} = 6000 \text{ kg/day}$
Add for floating population of 6000 @ $100\text{gm/head/day} = 6000 * 100 \text{ gm/c/day} = 600\text{kg/day}$
Total generation from GP – population = 6000 + 600 = 6600 kg/day = 6.6 MT/day

The general characteristics of solid waste generation indicate organic part as 40%, inorganic recyclables as 20% & inorganic inert material as 40%(Ref : NBC 2016- VOL 2, PART 9, Section 3, Page No.-9, Clause 5).

Organic waste (40%) = 2640 kg/day.
Non-recyclable inorganic (40%) = 2640 kg/day.
Recyclable inorganic (20%) = 1320 kg/day.

Pedal tricycle will be used for primary collection.
Each Pedal tricycle will make 2 trips/day.
In each trip Pedal tricycle will carry 160 kg solid waste
Therefore, No of Pedal tricycle required including Standby (25%)= $[6600/(2*160)]*1.25= 26 \text{ Nos.}$

Storage and Segregation of waste

The total waste generated will be segregated into organic, inorganic recyclables and inorganic inert material at the MSW management site of GP.

The organic waste will be decomposed on site by Mechanical Composter, i.e. OWC. As well as Organic waste composter (OWC) will be installed within each project site. The inorganic solid waste will be segregated to separate recyclable and non - recyclable parts. The recyclables will be sold to the recyclers. The remaining Part of inorganic solid waste (inert material) will be disposed at secured landfill site

Volume required for Solid Waste segregation @ 200 kg / cum = $6600 / 200 = 33 \text{ cum}$
Considering Storage depth = 0.5 m

Area required for Solid Waste segregation for the entire project = $(33.0/0.5) = 66.0\text{sqm}$
Say total segregation area = 1.25 times of $66\text{sqm} = 82.5 \text{ sqm}$
Considering additional 20% space for movement.
Total area for storage and segregation of waste = $82.5 * 1.20 = 99.0\text{sqm}$

Organic waste management

Risk on
12/9/22

PROGRAM
MULBARI GRAM PANCHAYAT
Bismillah-1, South 2A Perquans

Area required for composting organic waste by OWC method @ 50 sqm/MT of raw solid waste = 1320 sqm

Total area requirement for organic waste composting = 1320.0 sqm,

inorganic waste management

The inorganic recyclable waste generated = 20% of 6600 kg/day = 1320 kg/day
The recyclable waste will be disposed off in regular manner.

Total inorganic waste disposed of in secured landfill site of Gram Panchayat = 150 kg /day
(maximum value taken)

Area required inert waste to be disposed in secured landfill :-

Non-recyclable inorganic from GP = 2640 kg/day
Rejects from compost plant of GP = 264 kg/day (10% of 2640 kg/day)
Quantity of non-recyclable inorganic and rejects from composting from 6 nos. of similar Projects (assuming) = 3000 kg/day (6 * 500 kg/day)
Total = 5904 kg/day, Say 6000 Kg/day

Considering density = 500kg/m³
Compaction = 50%
Final Earth cover = 60 cm
Depth of fill = 6 m

Area Requirement = $(6000 * 365 * 30 * 0.5 * 1.1) / (500 * 6) = 12,045 \text{ sqm}$.
Adding 10% area more to take care of population rise,
Actual area required for landfilling = 13,249.5 sqm., Say 13250 sqm

TOTAL AREA REQUIRED FOR MUNICIPAL SOLID WASTE MANAGEMENT BY THE PANCHAYAT :-

Sl. No.	Component	Area (sqm)
1	Storage and Segregation	99.00
2	Organic waste Composting	1320.00
3	Secured Landfilling	13250.00
	TOTAL	14669.00
	Say	15000.00

We are in the process for procuring land for MSW management in association with the developers in the Panchayat area.



Pradhan
KULERDARI GRAM PANCHAYET
Bishnuour-1, South 24 Parganas