

**Bid document no: AESD/WtE/NDMC/GTE/01/2021-22**

**Selection of Concessionaire for Processing and Disposal of Municipal Solid Waste (mixed waste) by establishing Waste to Energy Plant at Ranikhera or alternate suitable municipal land, New Delhi.**

**Response to Queries received/ discussed in Pre-Bid Meeting**

**Location:** IndianOil. SCOPE Complex, New Delhi (over VC through WebEx platform)

**Date:** 29.09.2021

**Details of participants:**

IndianOil Corporation Ltd	North Delhi Municipal Corporation	Prospective Bidders
Shri. Bijay Kumar, GM (AE) Shri. Manikandan CKN, CM (AE) Shri. Faraz Farooqui, Manager (AE)	Shri. AK Gupta, Superintending Engineer Shri. Sunil Dawar, Asst. Engineer	Domestic & foreign organizations, their Indian agents

**Clarifications:**

SN	Subject	Query	Response/Clarifications
1.	Construction Agreement	Article-14: Clause 1.3.4.- Notwithstanding any approval of the Construction Plan by NORTH DMC, the Concessionaire shall, be solely liable for completing the construction of the Project Facilities by the Scheduled Construction Completion Date.  Will it be legal to complete the construction for Project facilities without the approval of the construction plan by North DMC?	Bidders are requested to refer to Clause 1.3.2 of Article 14 of the draft Concession Agreement.  In normal circumstances, as a matter of procedure, construction plans (bar chart / time schedule/ layout plans etc) shall be approved by North DMC.  In case of any undue delay beyond the periods mentioned (which is 30 days as mentioned in the draft Concession Agreement) in Clause 1.3.2 of Article 14 of Concession Agreement, necessary time extension shall be provided to the Concessionaire.

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		If objections found later, then what recourse the Concessionaire can have to remedy such objections?	
2.	Royalty on Waste	Why Royalty on Waste should be given to Municipal Corporation when globally tipping fee is given by Municipal Corporation to the Concessionaire	<p>The primary &amp; secondary collection and transportation of mixed Municipal Solid Waste (MSW) is not part of this tender and as such the question of tipping fee doesn't arise. Moreover, the mixed MSW shall be delivered at the door step of proposed waste processing facility site.</p> <p>Land parcel of approx. 50 acres will also be provided at a nominal rent for a period of 30 years.</p> <p>The Concession Period offered from North DMC is for 30 years &amp; extendable thereafter for 5 years on mutual consent.</p> <p>Off-take for products such as CBG, Ethanol etc are also offered.</p> <p>Concessionaire is free to deploy any technology, investment, manufacture / produce any product/ by products from the proposed WtE plant.</p> <p>There is no sharing of revenue streams with either North DMC or IndianOil.</p> <p>Bidders are advised to note this aspect while quoting for the royalty on mixed waste to be supplied by North DMC.</p>

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3.	General	What about Long-Term Agreement for sale of products generated other than CBG, Ethanol, Electricity	<p>Bidders are advised to refer to Clause no 2.2 (f) &amp; 2.3 (f) in page 7/8 of 119 of the Bid documents.</p> <p>As per that, for any product which is not purchased by IndianOil, IndianOil shall act as facilitator to ensure that the product like electricity, organic manure etc. made in the proposed plant is sold in the market.</p> <p>As per that, for any product which is not purchased by IndianOil, North Delhi Municipal Corporation shall act as facilitator to ensure that the product like electricity, organic manure etc. made in the proposed plant is sold in the market.</p>
4.	General	Alternate Proposal for setting up the waste to energy plant to be given by the parties	<p>It is amply clarified that bidders are free to</p> <ol style="list-style-type: none"> <li>a. deploy any technology in isolation or in combination with 2 or more.</li> <li>b. plan for capital investment as per the technology selected.</li> <li>c. manufacture / produce any product/ by products from the proposed WtE plant.</li> </ol> <p>There is no restriction on choosing a particular technology or number of products/ by-products or amount of capital investment etc.</p>

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			Bidders are advised to work out & bid to be competitive as well as to comply the various statutory & other performance, operational requirements spelt out in the bid documents.
5.	General	Is there any restriction on the number of products/technology/investment for the Waste to Energy Plant	<p>There is no restriction on the number of products/technology/investment for the Waste to Energy Plant.</p> <p>It is amply clarified that bidders are free to</p> <ul style="list-style-type: none"><li>a. deploy any technology in isolation or in combination with 2 or more.</li><li>b. plan for capital investment as per the technology selected.</li><li>c. manufacture / produce any product/ by products from the proposed WtE plant.</li></ul> <p>There is no restriction on choosing a particular technology or number of products/ by-products or amount of capital investment etc.</p> <p>Bidders are advised to work out &amp; bid to be competitive as well as to comply the various statutory &amp; other performance, operational requirements spelt out in the bid documents.</p>

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6.	Guidelines	Project proponents are required to clarify if Swachh Bharat mission guidelines are applicable for this tender.	<p>Bidders are requested to refer to clause 1.1 of Article -2 of draft concession agreement. It has been mentioned that the entire project activity shall be carried out in compliance with the EPA, the SWM Rules, the PWM Rules as amended from time to time as well as the instructions / orders / advise issued by bodies like Supreme Court, NGT, State Pollution Control Bodies or any other statutory agencies.</p> <p>Swacch Bharat Mission Guidelines / Management Manual pertaining to Solid Waste that have been issued by the MoHUA, Govt of India. The same shall also be applicable for this tender.</p>

**Note:**

- The Waste Characterization report (2 pages) is enclosed along with the pre-bid clarifications. Bidders are advised to consider the same & submit their bids accordingly.
- The above minutes shall be available in the portal link: <https://iocl.com/suppliers-notices>



# SHRIRAM INSTITUTE FOR INDUSTRIAL RESEARCH

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19, University Road, Delhi - 110007 (India)  
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E-mail id : [customercare@shriraminstitute.org](mailto:customercare@shriraminstitute.org)



## TEST CERTIFICATE

NO : C1/0000265065

**Issued To :**

**Client Code : (DLHI01N1355)**  
**NORTH DELHI MUNICIPAL CORPORATION**  
**O/O EE [SPECIAL PROJECT] ROHINI ZONE**  
**3RD FLOOR, SUB ZONAL OFFICE BUILDING**  
**SECTOR 17, ROHINI**  
**DELHI**  
**DELHI-110085**

**Date** : 31-08-2021  
**Job No** : 2106-1-421-1741  
**Booking No** : RG2122/1/1631  
**Booking Date** : 22-06-2021  
**Customer Ref No.** : NO. EE(SpPr)/RZ/2021-22/93  
**Customer Ref Dt.** : 21-05-2021

**Kind Attn: MR AJIT SINGH YADAV,EE/NORTH DMC**

**Sample Particulars:**

One sample of Fresh Municipal Solid Waste drawn by our representative on 06.07.2021 from Bhalswa Dumpsite was received.

S.No.	Tests	Results	Protocol/Test Method
I.	Physical Composition : % dry Basis		ASTM D5231-92 RA 2016
i.	Food/Green Waste	38.13	
ii.	Paper/Card Board	6.05	
iii.	Textile	7.57	
iv.	Rubber	0.57	
v.	Plastic Material	13.34	
vi.	Magnetic Material	0.19	
vii.	Glass	0.38	
viii.	Sand/Soiled/ Earth	13.06	
ix.	Stone/Bricks/Concrete/Ceramic, etc.	17.12	
x.	Wood	3.50	
xi.	Bones	0.09	

*J. S. Chatterjee*  
**AUTHORISED SIGNATORY**  
**EMPLOYEE CODE: ( 6171 )**

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E-mail id : [customercare@shriraminstitute.org](mailto:customercare@shriraminstitute.org)

TEST CERTIFICATE

NO : C1/0000265065

2.	Bulk Density, g/cc (on received basis)	0.64	ASTM E1109-2015
3.	Total Moisture, % by mass (on received basis)	47.82	ASTM E 790- 2015
4.	Total organic Carbon, % by mass (on dry basis)	6.66	Soil Testing manual of India
5.	Ash Content, % by mass (on dry basis)	83.2	ASTM D 7348 guidelines
6.	Total Nitrogen (as N), % by mass	0.43	ASTM D 5373guidelines
7.	C: N Ratio	14.3	ASTM D 5373guidelines
8.	pH ( 10 gm in 500 ml water)	8.2	IS: 10158-1982, RA 2014
9.	Total Phosphorous (as P <sub>2</sub> O <sub>5</sub> ) % by mass	0.4	Method No. 3050, 3052 of EPA SW-846
10.	Potassium (as K <sub>2</sub> O), % by mass	0.29	Method No. 3050, 3052 of EPA SW-846
11.	Zinc (as Zn), mg/kg	1078	Method No. 3050, 3052 of EPA SW-846
12.	Copper (as Cu), mg/kg	125	Method No. 3050, 3052 of EPA SW-846
13.	Cobalt (as Co), mg/kg	16	Method No. 3050, 3052 of EPA SW-846
14.	Fluoride (as F), mg/l (10 % leachate)	0.43	By Ion Meter, APHA 23 <sup>rd</sup> Edition
15.	Chlorides (as Cl), % by mass	0.17	Method No. 9253-9077 of EPA SW-846
16.	Sulphate (as SO <sub>4</sub> ), % by mass	0.16	IS:2720 (Part-27)1977, RA 2015 guidelines
17.	Gross Calorific Value (GCV) (on dry basis)	420	IS:1350 (Part-II) 2019

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DOR: 06.07.2021  
DOS: 07.07.2021  
DOC: 30.08.2021

*Assefatteju*  
AUTHORISED SIGNATORY  
EMPLOYEE CODE: ( 6171 )

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See overleaf for terms & conditions