

**BEFORE THE NATIONAL GREEN TRIBUNAL SITTING AT KOLKATA  
(Under Section 18(1) read with Section 16 of the National Green  
Tribunal Act, 2010)  
APPEAL No. 8 of 2024/EZ**

**Between:**

Z-Estates Private Limited & Anr.

...Appellants

Versus

State Environment Impact Assessment Authority, Odisha & Anr.

...Respondents

**I N D E X**

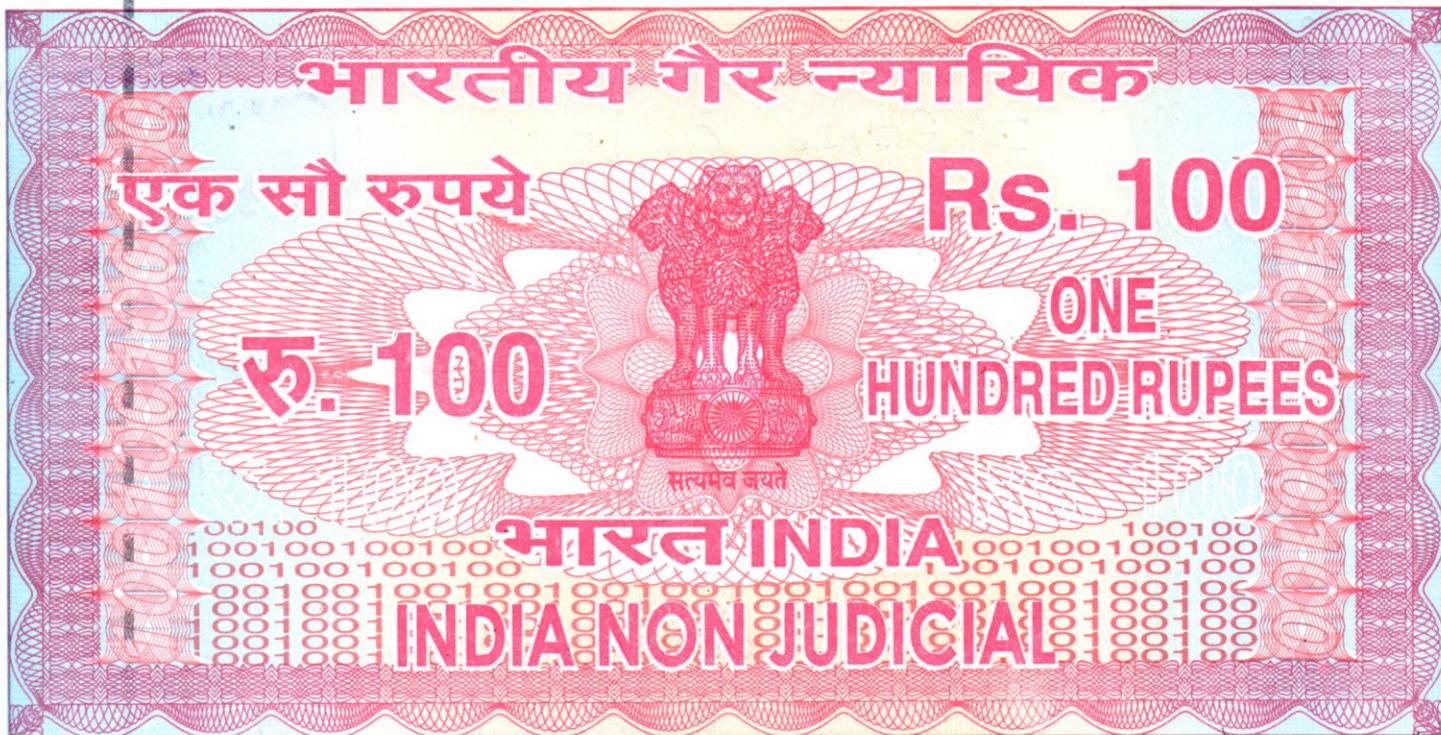
<b><u>S.NO.</u></b>	<b><u>PARTICULARS</u></b>	<b><u>ANNEXURE</u></b>	<b><u>PAGES</u></b>
1.	Affidavit-in-Rejoinder on behalf of the Appellants to the Reply Affidavit filed by the Respondent No. 2		724-740
2.	A copy of the direction dated March 7, 2016, under Memo No. B-29012/ESS(CPA)/2015-16/ passed by the Central Pollution Control Board to the Chairman of all the State Pollution Control Boards/Pollution Control Committees	A	741-797
3.	A copy of the order dated February 19, 2025	B	798
4.	A copy of the letter dated August 11, 2025, bearing reference no. 6638/SEIAA issued by the Respondent no. 1	C	799-826

Date:

Place:

Appellants/Applicants through

c/o Argus Partners  
Solicitors and Advocates  
3<sup>rd</sup> Floor, Binoy Bhawan  
27B, Camac Street,  
Kolkata - 700016



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BEFORE THE NATIONAL GREEN TRIBUNAL SITTING AT KOLKATA

R 416986

(Under Section 18(1) read with Section 16 of the National Green Tribunal Act, 2010)

APPEAL No. 8 of 2024/EZ

Z-Estates Private Limited & Anr.

...Appellants

Versus

State Environment Impact Assessment Authority, Odisha & Anr

....Respondents

**AFFIDAVIT-IN-REJOINDER ON BEHALF OF THE APPELLANTS TO THE REPLY**

**AFFIDAVIT FILED BY THE RESPONDENT NO. 2**

I, Tapan Kumar Mohanty, son of Late Bansidhar Sahoo, aged about 69 years, working for gain at Z-Estates Private Limited, having its registered office at M4/34, Acharya Vihar, Bhubaneswar - 751013, Odisha and presently camped at 27B, Camac Street, Kolkata - 700016, do solemnly affirm and say as follows:

1. That, I am a Director of Z-Estates Private Limited i.e., the Appellant No. 1 named hereinabove and am the Appellant No. 2 herein (collectively referred to as "Appellants").



2



2. I submit that I have been served with the reply affidavit filed on behalf of the Respondent No. 2 dated July 8, 2025 ("**Reply Affidavit**") and have understood the purport of the same thereof and am filing the instant affidavit in response thereto.
3. At the outset, it is respectfully submitted that the contents of the Appeal be treated as forming an integral part of the present Rejoinder. The same are not being reproduced herein for the sake of brevity; however, the contents thereof are relied upon in their entirety as if specifically set out herein.
4. It is stated that Respondent No. 2, in its Reply Affidavit, has not specifically traversed the corresponding paragraphs of the Appeal, or the contents of the Appeal in any manner. It is further stated that it is a settled principle of law that any averment not specifically denied is deemed to be admitted, in consonance with the doctrine of non-traverse.
5. Without prejudice to what has been stated hereinabove and fully relying thereon, I now proceed to deal with the said Reply Affidavit in a paragraph-wise manner:



- a. With respect to paragraphs 1 and 2 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all averments to the contrary are specifically denied and disputed. It is specifically denied and disputed that deponent to the Reply Affidavit has been authorised to depose on behalf of the Respondent no. 2.
- b. With reference to paragraphs 3 to 6 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all allegations to the contrary are specifically denied and disputed. It is denied that the conditions of the original Environmental Clearance (**EC**) dated August 16, 2011, continue to remain non-complied with. It is further denied that the State Environment Impact Assessment Authority (SEIAA) granted Environmental Clearance for the expansion of the Project despite alleged non-compliance with the original conditions. It is submitted that all conditions imposed under the original EC have been duly complied with by the Project Proponent, and the SEIAA, after being fully satisfied with such compliance, was pleased to grant EC for the subsequent phases of the Project. It is further denied that any reiteration of conditions by the SEIAA implies non-compliance as alleged or at all. It is submitted that in the EC dated March 17, 2020, it was specifically recorded that the total area for Phase I and Phase

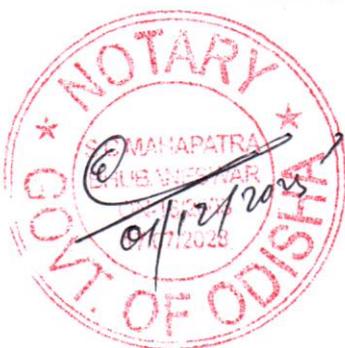


II of the Project was 1,23,717 sq. m., corresponding to a built-up area of 73,958.9 sq. m. for Phase I and 1,11,945.98 sq. m. for Phase II. It was further recorded that the total area for Phase III of the Project was 17,873.23 sq. m., corresponding to a built-up area of 2,09,960.21 sq. m. It was also noted therein that the total green belt area for Phase I and Phase II of the Project was 30,929.22 sq. m., whereas the total green belt area for Phase III was 20,922.87 sq. m. It is further submitted that the Project being a large-scale development, is to be executed in phases. As on date, the Project Proponent has successfully completed Phase I and Phase II, while Phase III is presently under execution. It is further submitted that Phase III of the Project is expected to be completed by the year 2027. It is further stated that the actions of the Appellants are in pursuance of the representations which were made before the Respondent No. 1 and the permissions granted as a consequence thereof. The Appellants have therefore made every endeavour to ensure that the mandate of the terms and conditions of the EC have not been violated, however there have been other situations where the Appellants endeavours were obstructed by factors not within the Appellant's control. It is further denied that the affidavit dated December 23, 2019, filed before SEAC, contains any admission of failure to comply with the conditions of the original Environmental Clearance as alleged or at all. It is specifically denied that the Project

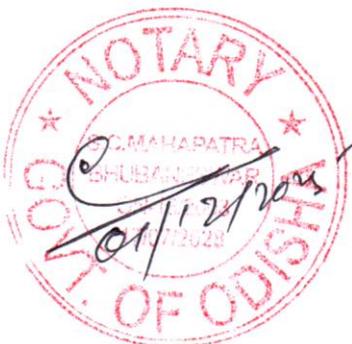


Proponent has failed to comply with the conditions of the EC or the recommendations made by the SEAC as alleged or at all. It is denied and disputed that the so-called "violation day" ought to have been reckoned from October 25, 2019, as alleged or at all. It is further denied that the inspection conducted by the SEAC Sub-Committee on October 25, 2019 revealed any non-compliance with the conditions of the EC. On the contrary, it is submitted that the observations made during the said inspection were duly addressed and complied with by the Project Proponent within the prescribed time.

- c. With reference to paragraphs 7 to 8 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all allegations to the contrary are specifically denied and disputed. It is specifically denied that there have been severe non-compliances with the original EC as has been alleged or at all.
- d. With reference to paragraphs 9 to 11 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all allegations to the contrary are specifically denied and disputed. It is denied that the Project Proponent has taken any untenable plea regarding non-compliance with the green belt condition on the ground that the boundary wall of the Project is under construction. It is further denied that the construction of the boundary wall forms an impediment to the development of the green



belt, as alleged or at all. The Project Proponent has been undertaking the green belt development in a planned and phased manner in accordance with the approved EC and project layout. It is specifically denied that the Project commenced without finalisation of the boundary or layout plan. On the contrary, all requisite approvals, including the layout and boundary plan, were duly finalised prior to commencement of construction. It is, therefore, denied that any construction was carried out in violation of the approved plan or that any ground exists to stop the Project as alleged or at all. It is denied that the Project Proponent has taken any untenable plea regarding non-compliance with the green belt condition on the ground that the boundary wall of the Project is under construction. It is further denied that the construction of the boundary wall forms an impediment to the development of the green belt as alleged or at all. The Project Proponent has been undertaking the green belt development in a planned and phased manner in accordance with the approved EC and the sanctioned layout plan. It is also pertinent to mention that the Joint Committee constituted by Respondent No. 1 visited the Project site on July 13, 2023. In its Report (***annexed @page No. 252 of the Appeal***), it was recorded that, as per the site inspection and analysis of the Google Earth Map KML file, there was no distinct physical boundary demarcating Phase I, Phase II, and Phase III of the Project. The Report further observed that the green



belt area for Phase I was approximately 9,000 sq. m., and for Phase II was approximately 11,000 sq. m., thereby reflecting a total green belt area of about 20,000 sq. m. for both phases. It is submitted that, at the time of such inspection, the Project Proponent had already completed 20,000 sq. m. of green belt development for Phase I and Phase II. The remaining portion of the green belt, as envisaged under the EC dated March 17, 2020, could not be completed temporarily owing to the ongoing construction of the boundary wall for Phase III of the Project site. It is, therefore, denied that any construction was carried out in violation of the approved plan or that any ground exists to halt the progress of the Project as alleged or at all. It is in fact stated that even if the Green Belt is developed as per the wishes of the Respondent no. 2 it would be nothing but an empty formality because it is an admitted fact that construction for Phase III of the Project is still underway. If the Green Belt is developed in the middle of the construction activity the belt will undoubtedly get damaged during the construction work and thus rendering the entire development redundant. Furthermore, from the concept of Green Belt as stated by the Respondent no. 2 at paragraph 11 of the Reply Affidavit, it would be apparent that such a concept cannot be realized at an active construction site.



a. With reference to paragraphs 12 to 16 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all allegations to the contrary are specifically denied and disputed. It is denied that the EC dated March 17, 2020, is the only active EC as alleged or at all. It is specifically denied that the previous ECs of 2011 and 2016 have been merged with the EC of 2020. It is further denied that granting different timelines for compliance of the conditions mentioned in the EC letter dated March 17, 2020, amounts to any unreasonableness, non-application of mind, or is contrary to the final EC granted in 2020. It is denied that there has been any improper or unlawful splitting of the EC into different compliance phases, as alleged or at all. The allegation that the authority is required to reconsider its order permitting the Project Proponent to continue construction is baseless, untenable, and denied in its entirety. It is denied and disputed that the green belt area earmarked for the Original Project has been compromised as alleged or at all. It is specifically denied that any direction is required to be issued to the Project Proponent to ensure maintenance of the green belt area as per the 2011 EC conditions. It is further denied that the residents of the applicant society have been or will be deprived of their right to greenery within the campus. The allegation that the Project Proponent has failed to preserve or maintain the designated green belt area is false, baseless, and devoid



of any factual or legal foundation. It is denied and disputed that the concept of Phase I and Phase II for compliance of EC conditions is inapplicable to the present case as alleged or at all. It is specifically denied that there exists only one EC for the entire project or that the Project Proponent is required to comply with all the conditions imposed under the EC dated March 17, 2020, in a uniform manner without any phase-wise distinction. The allegations are misconceived, contrary to the records, and devoid of any merit. In this regard, it is submitted that the computation of the said compensation has been carried out using an erroneous formula, inasmuch as, while assessing the environmental cost, the Pollution Index of the Project has been incorrectly fixed at 80 under the Red Category Industry by Respondent No. 1. In this context, reliance is placed on the direction dated March 7, 2016 under Memo No. B-29012/ESS(CPA)/2015-16/ passed by the Central Pollution Control Board to the Chairman of all the State Pollution Control Boards/Pollution Control Committees, clarifying the applicable categorisation and its preceding office orders and letters issued by the Central Pollution Control Board. In this context, it is again reiterated Joint Committee of the Respondent No. 1 had visited the Project area of the Appellants on July 13, 2023. In the Report, it was stated that as per the site visit and Google Earth Map KML file, it reveals that there is no separate boundary for Phase I, Phase II and



Phase III. The Green Belt area for Phase I of the Project area is approximately 9,000 Sqm area and for Phase II of the Project area is approximately 11,000 sqm. It is respectfully submitted that while passing the Impugned Order, Respondent No. 1 failed to appreciate the written submissions made by the Applicants/Appellants vide their letter dated January 11, 2024, as well as the oral submissions advanced by Appellant No. 2 during the hearing held on February 3, 2024. With regard to the issue of Green Belt Development and Non-Compliance of the EC, it is reiterated that the Project being a large, integrated developmental project undertaken in phases, the complete development of the green belt could not be carried out initially due to the absence of a permanent boundary wall, as any plantation would have been destroyed/disturbed during ongoing construction. The said green belt has, however, been duly developed by the Appellants as and when the boundary wall became available. The Appellants have consistently endeavoured to comply with all EC conditions; however, due to delays and hindrances in obtaining the requisite approval from Respondent No. 2, the same could not be implemented within the expected timeline. A copy of the direction dated March 7, 2016, under Memo No. B-29012/ESS(CPA)/2015-16/ passed by the Central Pollution Control Board to the Chairman of all the State Pollution Control Boards/Pollution Control



Committees, clarifying the applicable is annexed herewith and marked as **Annexure A**.

- e. With reference to paragraphs 17 to 24 of the Reply Affidavit, save and except those statements which are matters of record or may appear therefrom, all allegations to the contrary are specifically denied and disputed. It is pertinent to note that a Miscellaneous Application being M.A. No. 15/2024/EZ in Original Application No. 11/2022/EZ has been preferred by the Z-1 Residents' Welfare Association, wherein the Hon'ble Tribunal, by its order dated February 19, 2025 (uploaded on March 3, 2025), has been pleased to direct the SEIAA, Odisha, to revisit the project site and conduct a fresh inspection with regard to the fulfilment of EC conditions — including, inter alia, maintaining 20% green cover, proper disposal of solid waste, and other remedial measures — and to ensure that the same are duly complied with by the Project Proponent within a stipulated timeframe. In compliance of the aforementioned order dated February 19, 2025, the Appellants have received a letter dated August 11, 2025, bearing reference no. 6638/SEIAA issued by the Respondent no. 1 regarding fresh inspection of the Project. A perusal of the letter dated August 11, 2025, would indicate that the inspection was scheduled for August 14, 2025, and such inspection was duly carried out. Despite a passage of several months the report



has still not been made available by the Respondent no. 1 to the Appellant. A copy of the order dated February 19, 2025, is annexed herewith and marked as **Annexure B** and a copy of the letter dated August 11, 2025, bearing reference no. 6638/SEIAA issued by the Respondent no. 1 is annexed herewith and marked as **Annexure C**. At this juncture, I repeat and reiterate what has been stated in paragraphs 18 to 20 of the Appeal and in the preceding paragraphs of this instant rejoinder, and save what are matters of record and what may appear therefrom, all allegations to the contrary are denied and disputed. It is denied and disputed that the Respondent society has ever cooperated with the Project Proponent in relation to the installation of the solar water heater system as alleged or at all. It is specifically denied that the liability to install the solar water heater arises solely from the EC letter dated August 16, 2011, or that the same was required to be completed prior to the grant of the occupancy certificate. It is further denied that the Project Proponent has failed to comply with any of the conditions stipulated in the EC. The allegation that violations have been continuing since 2011 is baseless, misleading, and contrary to the factual position on record. The statements made by the Respondent society are false, untenable, and are denied in their entirety. It is denied and disputed that the formula applied by the Respondent No. 1 herein is correct. Furthermore, it is vehemently denied and disputed that the Project



is to be treated under the Red Category, as alleged or at all. It is stated that the Impugned Order dated 16.03.2024, the residential project of the Appellants has been treated as Red Category Unit by the Respondent No. 1 at the time of calculation of Environmental Compensation of Phase I Building of the Appellants however such treatment is contrary to the terms of the Direction dated March 7, 2016 under Memo No. B- 29012/ESS(CPA)/2015-16 passed by the Central Pollution Control Board. It is denied and disputed that the Building Plan approval for the project has expired as alleged or at all. It is specifically denied that the Project Proponent is carrying out any work at the site without a valid Building Plan approval. It is further denied that the Environmental Clearance is in any manner subject to or dependent upon the alleged expiry of the Building Plan approval. The allegations are misconceived, factually incorrect, and devoid of any legal or factual basis. It is denied and disputed that there has been any continuing non-compliance of the EC conditions as alleged or at all. It is specifically denied that the deadline as per the commitment given by the Project Proponent in the affidavit filed at the time of applying for the EC has expired in 2020 or that any such commitment remains unfulfilled. It is further denied that this Hon'ble Tribunal, by its order dated February 19, 2025, has recorded any finding of non-compliance of the EC conditions. The allegation that environmental compensation is required to be recomputed from



October 25, 2019, or that the market value of any portion of the greenbelt area diverted for construction should be included in such computation, is baseless, misleading, and contrary to the record. All such allegations are denied in their entirety.

- 6. I crave leave of this Hon'ble Tribunal to supplement, amend the above Rejoinder and/or file additional replies and documents, if so, directed by this Hon'ble Tribunal.
  
- 7. It is respectfully submitted that in view of the facts and circumstances provided hereinabove, the prayer sought by the Appellants in the instant Appeal be allowed.



VERIFICATION

I, Tapan Kumar Mohanty, son of Late Bansidhar Sahoo, aged about 69 years, resident of Jhanjirimangala Gada, Badambadi, Cuttack - 753009 and presently camped at 27B, Camac Street, Kolkata - 700016, do hereby verify

that the contents of paragraphs nos. 1 and 2 are true to my personal knowledge, the contents of paragraphs nos. 4 to 5(f) are partly matters of record and partly are my humble submissions and the vests are my humble submissions

Z ESTATES PVT. LTD.

Date: 01/12/2025

Place:

*Tapan Kumar Mohanty*  
MANAGING DIRECTOR

Signature of Applicant

*Supriya Alitjan*

Identified by me

Enrolment No.:



*01/12/2025*



SUDASH CHANDRA MAHAPATRA  
NOTARY, BHUBANESWAR  
Govt. of Odisha, India  
Regd. No. ON-18/2000  
Ph.-0674-2592700 (F), Mob. 9137031311

**BEFORE THE NATIONAL GREEN TRIBUNAL SITTING AT KOLKATA**

**(Under Section 18(1) read with Section 16 of the National Green**

**Tribunal Act, 2010)**

**APPEAL No. 8 OF 2024/EZ**

**Between:**

Z-Estates Private Limited & Anr.

...Appellants

Versus

State Environment Impact Assessment Authority Odisha & Anr.

...Respondents

**AFFIDAVIT-IN-REPLY**

Advocate-on-record:

Advocate

C/o Argus Partners, Solicitors & Advocates

27B, Camac Street,

Binoy Bhawan, 3rd Floor,

Kolkata - 700016





केन्द्रीय प्रदूषण नियंत्रण बोर्ड  
CENTRAL POLLUTION CONTROL BOARD  
(पर्यावरण एवं वन मंत्रालय, भारत सरकार)  
Central Pollution Control Board & State Pollution Control Boards

No.B-29012/ESS(CPA)/2015-16/

March 07, 2016

To

The Chairman  
All the State Pollution Control Boards / Pollution Control Committees  
( List Attached)

**SUB: MODIFIED DIRECTIONS UNDER SECTION 18(1)(b) OF THE WATER (PREVENTION & CONTROL OF POLLUTION) ACT, 1974 and THE AIR (PREVENTION & CONTROL OF POLLUTION) ACT, 1981 REGARDING HARMONIZATION OF CLASSIFICATION OF INDUSTRIAL SECTORS UNDER RED / ORANGE / GREEN / WHITE CATEGORIES.**

WHEREAS, under section 16 (2)(b) of the Water (Prevention and Control of Pollution) Act, 1974 and under Section 16 (2)(c) of the Air (Prevention & Control of Pollution) Act, 1981, one of the functions of the Central Pollution Control Board (CPCB), constituted under the Water (Prevention and Control of Pollution) Act, 1974, is to coordinate activities of the State Pollution Control Boards ( SPCBs) and Pollution Control Committees (PCCs); and

WHEREAS, under section 16 (2)(c) of the Water (Prevention and Control of Pollution) Act, 1974 and under Section 16 (2)(d) of the Air (Prevention & Control of Pollution) Act, 1981, one of the functions of the CPCB is to provide technical assistance and guidance to SPCBs and PCCs; and

WHEREAS, it was brought to the notice of CPCB, that different SPCBs /PCCs were following different criteria for classification of industrial sectors under Red/Orange/ Green category and that classification was being used by the SPCBs/PCCs for grant of consents to industries and for Inventorization / surveillance of industries.

WHEREAS, the issue regarding classification of industries was deliberated upon in the 56<sup>th</sup> Conference of Chairmen & Member Secretaries of CPCB & SPCBs/PCCs held on August 31, 2010 and a working group comprising of representatives from SPCBs & CPCB was constituted to prepare a consolidated list of industrial sectors falling under Red/Orange/Green category to bring uniformity in classification of industrial sectors across the country;

परिवेश भवन, पूर्वी अर्जुन नगर, दिल्ली-110032

Parivesh Bhawan, East Arjun Nagar, Delhi-110032

दूरभाष नं. 23066740, 23066741, 23066742, 23066743, 23066744, 23066745, 23066746

फैक्स नं. 23066747, 23066748, 23066749, 23066750, 23066751, 23066752, 23066753, 23066754, 23066755, 23066756, 23066757, 23066758, 23066759, 23066760, 23066761, 23066762, 23066763, 23066764, 23066765, 23066766, 23066767, 23066768, 23066769, 23066770, 23066771, 23066772, 23066773, 23066774, 23066775, 23066776, 23066777, 23066778, 23066779, 23066780, 23066781, 23066782, 23066783, 23066784, 23066785, 23066786, 23066787, 23066788, 23066789, 23066790, 23066791, 23066792, 23066793, 23066794, 23066795, 23066796, 23066797, 23066798, 23066799, 23066800, 23066801, 23066802, 23066803, 23066804, 23066805, 23066806, 23066807, 23066808, 23066809, 23066810, 23066811, 23066812, 23066813, 23066814, 23066815, 23066816, 23066817, 23066818, 23066819, 23066820, 23066821, 23066822, 23066823, 23066824, 23066825, 23066826, 23066827, 23066828, 23066829, 23066830, 23066831, 23066832, 23066833, 23066834, 23066835, 23066836, 23066837, 23066838, 23066839, 23066840, 23066841, 23066842, 23066843, 23066844, 23066845, 23066846, 23066847, 23066848, 23066849, 23066850, 23066851, 23066852, 23066853, 23066854, 23066855, 23066856, 23066857, 23066858, 23066859, 23066860, 23066861, 23066862, 23066863, 23066864, 23066865, 23066866, 23066867, 23066868, 23066869, 23066870, 23066871, 23066872, 23066873, 23066874, 23066875, 23066876, 23066877, 23066878, 23066879, 23066880, 23066881, 23066882, 23066883, 23066884, 23066885, 23066886, 23066887, 23066888, 23066889, 23066890, 23066891, 23066892, 23066893, 23066894, 23066895, 23066896, 23066897, 23066898, 23066899, 23066900, 23066901, 23066902, 23066903, 23066904, 23066905, 23066906, 23066907, 23066908, 23066909, 23066910, 23066911, 23066912, 23066913, 23066914, 23066915, 23066916, 23066917, 23066918, 23066919, 23066920, 23066921, 23066922, 23066923, 23066924, 23066925, 23066926, 23066927, 23066928, 23066929, 23066930, 23066931, 23066932, 23066933, 23066934, 23066935, 23066936, 23066937, 23066938, 23066939, 23066940, 23066941, 23066942, 23066943, 23066944, 23066945, 23066946, 23066947, 23066948, 23066949, 23066950, 23066951, 23066952, 23066953, 23066954, 23066955, 23066956, 23066957, 23066958, 23066959, 23066960, 23066961, 23066962, 23066963, 23066964, 23066965, 23066966, 23066967, 23066968, 23066969, 23066970, 23066971, 23066972, 23066973, 23066974, 23066975, 23066976, 23066977, 23066978, 23066979, 23066980, 23066981, 23066982, 23066983, 23066984, 23066985, 23066986, 23066987, 23066988, 23066989, 23066990, 23066991, 23066992, 23066993, 23066994, 23066995, 23066996, 23066997, 23066998, 23066999, 23067000



WHEREAS, the report prepared by the Working Group was discussed in the 57<sup>th</sup> Conference of Chairmen & Member Secretaries of CPCB & SPCBs/PCCs held in Delhi on September 15, 2011, wherein some modifications were proposed;

WHEREAS, the final report of the working group was prepared, incorporating the suggestions/observations made in the 57<sup>th</sup> Conference of Chairmen and Member Secretaries of CPCB & SPCBs/PCCs and in exercise of the powers delegated to the Chairman, CPCB under Section 18(1)(b) of the Water Act, 1974, following directions were issued for compliance to all SPCBs/PCCs to maintain uniformity in categorization of industries as red, orange and green as per list finalized by CPCB, which identified 85 types of industrial sectors as 'Red', 73 industrial sectors as 'Orange' and 86 sectors as 'Green':

a). To maintain uniformity in categorization of industries under Red/Orange/Green category, the SPCBs / PCCs shall adopt the list as finalized by CPCB based on the recommendations of that Working Group for grant of Consent, inventorization of industries under Red, Orange and Green categories and other related activities.

(b). The SPCBs/PCCs shall revise the list of Red, Orange and Green categories of industries operating in their jurisdiction based on the criteria specified in the final report of that Working Group and submit the same to CPCB within 90 days in hard copy as well as soft copy;

WHEREAS, later-on, it was observed that the process of categorization thus far was primarily based on the size of the industries and consumption of resources and pollution due to discharge of emissions and effluents and its likely impact on health was not considered as primary criteria;

WHEREAS, there have been proposals from the SPCBs / PCCs and industrial associations for categorization of the industrial sectors in a more pragmatic manner. The issue was discussed during the national level conference of the Environment Ministers of the States, held in New Delhi during April 06-07, 2015 and also during the Conference of the Chairmen and Member Secretaries of CPCB and SPCBs/PCCs held in New Delhi on April 08, 2015. Accordingly, a 'Working Group' comprising of the Members from Central Pollution Control Board and State Pollution Control Boards representing the States of Andhra Pradesh, Punjab, Tamilnadu, West Bengal, Madhya Pradesh and Maharashtra, was constituted to revisit the criteria of categorization of industries and suggest rationale based on pollution potential for categorization of industrial sectors and adopting it for implementation of pollution control plan;

WHEREAS, the Working Group has developed the criteria of categorization of industrial sectors based on the concept of Pollution Index which is a function of the emissions (air pollutants), effluents (water pollutants), hazardous wastes generated and consumption of resources. For this purpose the references are taken from the the Water (Prevention and Control



of Pollution ) Cess (Amendment) Act, 2003, Standards so far prescribed for various pollutants under Environment (Protection) Act , 1986 and Doon Valley Notification, 1989 issued by MoEFCC. The Pollution Index (PI) of any industrial sector is a number from 0 to 100 and the increasing value of PI denotes the increasing degree of pollution load from the industrial sector;

WHEREAS , based on the series of consultations with SPCBs, different Government / Non-government Institutions including industries and MoEFCC , the following criteria on 'Range of Pollution Index 'for the purpose of categorization of industrial sectors has been finalized:

- o Industrial Sectors having Pollution Index score of 60 and above - Red category
- o Industrial Sectors having Pollution Index score of 41 to 59 -Orange category
- o Industrial Sectors having Pollution Index score of 21 to 40 -Green category
- o Industrial Sectors having Pollution Index score incl. & upto 20 -White category

WHEREAS, based on the revised criteria, the 'Final Report on Revised Categorization of Industrial Sectors under Red/Orange/Green/White' has been evolved. The 'Categorization' is based on the relative pollution potential of the industrial sectors and grouping of the industrial sectors based on the use of raw materials, manufacturing process adopted and pollutants likely to be generated;

WHEREAS, based on relative Pollution Index, the number of industries in various categories are as under :

- i. The Red category of industrial sectors: 60
- ii. The Orange category of industrial sectors: 83
- iii. The Green category of industrial sectors: 63 and
- iv. The Newly introduced White category: 36

WHEREAS, there shall be no necessity of obtaining the Consent to Operate" for White category of industries and an intimation to concerned SPCB / PCC shall suffice;

WHEREAS, the purpose of categorization is to ensure that the industry is established in a manner consistent with the environmental objectives and to prompt industrial sectors to adopt cleaner technologies, ultimately resulting in generation of no or minimum pollutants.

WHEREAS the new categorization system shall also facilitate in self-assessment by industries;

Now, therefore, in exercise of the powers delegated to the Chairman, CPCB under Section 18(1)(b) of the Water (Prevention & Control of Pollution) Act, 1974 and Section 18(1)(b) of the Air (Prevention & Control of Pollution), Act , 1981 the earlier Directions issued in June 2012 in the context of categorisation of industries as Red, Orange & Green are withdrawn with immediate effect and following 'Directions' are hereby issued for compliance by all SPCBs and PCCs :



1. That the SPCBs and PCCs shall adopt the Revised Criteria of categorization of industrial sectors as detailed in table nos. F1, F2, F3 and F4 and Revised Lists of Red, Orange, Green and White categories of industrial sectors, presented at table no. G2, G3, G4 and G5 respectively, in the 'Final Report' as attached herewith immediately.
2. That all pending applications for consideration of 'Consent to Establish' and 'Consent to Operate' and future such applications shall be processed as per revised criteria.
3. That the SPCBs and PCCs will provide the list of industries identified in each category existing in the State which have been considered for grant of consents. SPCBs/PCCs will forward the list of such industries before 31.05.2016 and the same will be uploaded on the websites of respective SPCB/PCC.
4. That the 'Revised Lists of Red, Orange, Green and White category of industrial sectors' shall be used by the SPCBs and PCCs for Consent Management and inventorization of industries under Red, Orange, Green and White categories. Siting of industries shall be only in conforming areas. SPCBs / PCCs shall evolve sector specific plans for control of pollution and industrial surveillance for verifying compliance.
5. That the SPCBs and PCCs shall revise /prepare the inventory of Red, Orange, Green and White categories of industries operating in their jurisdiction based on the revised criteria specified in the Final Report and submit the same to CPCB within 90 days i.e., before 30.05.2016 in hard copy as well as soft copy.
6. That the listed category of industries or those identified later-on under different categories shall not be linked to sanction of loan / finance or bank proceedings.
7. That any further addition of any new or left-over industrial sector and their categorization which is not listed in the revised list of Red, Orange, Green and White industrial sectors, shall be done at the level of concerned SPCB /PCC following revised criteria & guidelines as detailed in the attached document and no concurrence of CPCB shall normally be required. It is further clarified that while categorizing the industries, fractional numbers shall be rounded off to nearest integer.



The SPCBs/PCCs shall acknowledge the receipt of directions and submit the 'Action Taken Report' in compliance with these directions to CPCB before 15.04.2016.

(Arun Kumar Mehta)  
Chairman

7/3/16

Copy to:

1. The Chief Secretary of all the States and UTs
2. The Secretary ,  
Ministry of Micro, Small and Medium Entrepreneurs  
Udyog Bhawan, Rafi Marg, New Delhi - 110 011
3. The Secretary ,  
Ministry of Heavy Industries  
Udyog Bhawan, Rafi Marg, New Delhi - 110 011
4. The Secretary,  
Ministry of New and Renewable Energy  
Block-14, CGO Complex,  
Lodhi Road, New Delhi-110 003,
5. The Advisor(CP Division)  
Ministry of Environment ,Forests and Climate Change  
Indira Paryavaran Bhawan  
Jor Bagh Road, New Delhi - 110 003
6. All Zonal Offices of CPCB

(A. B. Akolkar) 5.3.16  
Member Secretary



Final Document  
on  
Revised  
Classification  
of  
Industrial Sectors  
Under

Red, Orange, Green and White Categories  
(February 29, 2016)



**Central Pollution Control Board**  
Delhi



## Executive Summary

### Categorization of Industrial Sectors under Red, Orange, Green and White Category

The Ministry of Environment, Forest and Climate Change (MoEFCC) had brought out notifications in 1989, with the purpose of prohibition/ restriction of operations of certain industries to protect ecologically sensitive Doon Valley. The notification introduced the concept of categorization of industries as " Red", "Orange "and "Green" with the purpose of facilitating decisions related to location of these industries. Subsequently, the application of this concept was extended in other parts of the country not only for the purpose of location of industries, but also for the purpose of Consent management and formulation of norms related to surveillance / inspection of industries.

The concept of categorization of industries continued to evolve and as different State Pollution Control Boards interpreted it differently, a need arose to bring about necessary uniformity in its application across the country. In order to harmonize the 'Criteria of categorization', Directions were issued by CPCB under Section 18(1)(b) of the Water ( Prevention & Control of Pollution) , Act, 1974 to all SPCBs/PCCs to maintain uniformity in categorization of industries as red, green and orange as per list finalized by CPCB, which identified 85 types of industrial sectors as 'Red', 73 industrial sectors as 'Orange' and 86 sectors as 'Green'.

The process of categorization thus far was primarily based on the size of the industries and consumption of resources. The pollution due to discharge of emissions & effluents and its likely impact on health was not considered as primary criteria. There was demand from the SPCBs / PCCs and industrial associations for categorization of the industrial sectors in a more transparent manner. Accordingly, the issue was discussed thoroughly during the national level conference of the Environment Ministers of the States, held in New Delhi during April 06-07, 2015 and a 'Working Group' comprising of the members from CPCB, APPCB, TNPCB, WBPCB, PPCB, MPPCB and Maharashtra PCB is constituted to revisit the criteria of categorization of industries and recommend measures for making the system transparent and rational.

The Working Group has developed the criteria of categorization of industrial sectors based on the Pollution Index which is a function of the emissions (air pollutants), effluents (water pollutants), hazardous wastes generated and consumption of resources. For this purpose the references are taken from the the Water (Prevention and Control of Pollution ) Cess (Amendment) Act, 2003, Standards so far prescribed for various pollutants under Environment (Protection) Act , 1986 and Doon Valley Notification, 1989 issued by MoEFCC. The Pollution Index PI of any industrial sector is a number from 0 to 100 and the increasing value of PI denotes the increasing degree of pollution load from the industrial sector. Based on the series of brain storming sessions among CPCB, SPCBs and MoEFCC , the following criteria on 'Range of Pollution Index 'for the purpose of categorization of industrial sectors is finalized.



- |   |                  |
|---|------------------|
| ○ Industrial Sectors having Pollution Index score of 60 and above | - Red category   |
| ○ Industrial Sectors having Pollution Index score of 41 to 59     | -Orange category |
| ○ Industrial Sectors having Pollution Index score of 21 to 40     | -Green category  |
| ○ Industrial Sectors having Pollution Index score incl.&upto 20   | -White category  |

The newly introduced White category of industries pertains to those industrial sectors which are practically non-polluting such as Biscuit trays etc. from rolled PVC sheet (using automatic vacuum forming machines), Cotton and woolen hosiers making (Dry process only without any dyeing/washing operation), Electric lamp (bulb) and CFL manufacturing by assembling only, Scientific and mathematical instrument manufacturing Solar power generation through photovoltaic cell, wind power and mini hydel power (less than 25 MW).

The salient features of the 'Re-categorization' Exercise are as follows :

- Due importance has been given to relative pollution potential of the industrial sectors based on scientific criteria . Further, wherever possible, splitting of the industrial sectors is also considered based on the use of raw materials, manufacturing process adopted and in-turn pollutants expected to be generated.
- The Red category of industrial sectors would be 60.
- The Orange category of industrial sectors would be 83.
- The Green category of industrial sectors would be 63.
- Newly introduced White category contains 36 industrial sectors which are practically non-polluting.
- There shall be no necessity of obtaining the Consent to Operate'' for White category of industries. An intimation to concerned SPCB / PCC shall suffice.
- No Red category of industries shall normally be permitted in the ecologically fragile area / protected area.

The purpose of categorization is to ensure that the industry is established in a manner which is consistent with the environmental objectives. The new criteria will prompt industrial sectors willing to adopt cleaner technologies, ultimately resulting in generation of fewer pollutants. Another feature of the new categorization system lies in facilitating self-assessment by industries as the subjectivity of earlier assessment has been eliminated. This 'Re-categorization' is a part of the efforts, policies and objective of present government to create a clean & transparent working environment in the country and promote the Ease of Doing Business.

Other similar efforts include installation of Continuous Online Emissions/ Effluent Monitoring Systems in the polluting industries, Revisiting of the CEPI (Comprehensive Environment Pollution Index) concept for assessment of polluted industrial clusters, Revision of existing industrial Emission/Effluent discharge standards, initiation of special drive on pollution control activities in Ganga River basin and many more in coming future.

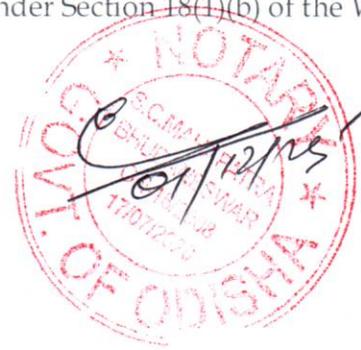


## Revised Criteria of Categorization of Industries

“Securing industrial pollution control in accordance with the Water (Prevention & Control of Pollution) Act, 1974 and Air (Prevention & Control of Pollution) Act, 1981 by linking with categorization of industries, consent management and vigilance - ‘In context of Red, Orange, Green and White categories of industries”

### A: Genesis of Categorization:

- The Ministry of Environment, Forest and Climate Change (MoEFCC) had brought out notifications, which inter-alia refers to Prohibition/ Restriction on operation of industries to protect ecologically sensitive areas or areas of specific importance. This has for the first time brought the concept of categorization of industries to “Red”, “Orange “and “Green” and restrict their operation in certain areas of importance. Therefore, it is at-once interpreted that Red, Orange and Green categorization is linked with location specific needs.
- The notification of MoEF was first brought on 2<sup>nd</sup> February, 1989 in case of “Restriction on location of industries, mining operations and other developmental activities in Doon Valley in “Uttarakhand” and thereafter another notification on 24<sup>th</sup> February 1999 regarding restriction on the setting up of industries in Dahanu Taluka in Maharashtra. The categorization had been made mainly on the basis of size of the industries, man power and consumption of resources.
- However, in other parts of the country, there have been variations in context to the classification of industries under Red, Orange and Green categories. SPCBs / PCCs were following their own criteria in different States thereby creating confusion.
- In order to harmonize the ‘Criteria of categorization’, a ‘Working Group’ was formed as per resolution passed during the 57<sup>th</sup> Conference of the Chairmen & Member Secretaries of CPCB and SPCBs. Based on the recommendations of the Working Group, Directions dated 4/6/2012 under Section 18(1)(b) of the Water



(Prevention & Control of Pollution), Act, 1974 were issued to all SPCBs/PCCs with the effects to maintain uniformity in categorization of industries as red, green and orange as per list finalized by the Working Group. This indicative list included 85 types of industrial sectors as 'Red', 73 industrial sectors as 'Orange' and 86 sectors as 'Green'. However, these identified categories have not been assigned with scores as per existing criteria/ or any new criteria

**B: Categorization criteria used by SPCBs/PCCs:**

SPCBs and PCCs use the criteria of Red, Orange and Green categories for consent management and vigilance purposes for carrying out inspections to verify compliance to the stipulated standards. However the above categorization do not emphasize on sector-specific plan for control of pollution in accordance with priority based on pollution index.

**C: Gap in the process:**

1. The categorization has been made mainly on the basis of size of the industries and consumption of resources. The pollution due to discharge of emissions & effluents and its impact on health was not considered as primary criteria.
2. Categorization was on random basis, no scoring system was adopted.

**D: Resolutions made during National Level Conferences**

The issue was discussed thoroughly during the following national level conferences held in New Delhi:

- Conference of the Environment Ministers of Central Government and State Governments during April 06-07, 2015
- 59<sup>th</sup> Conference of Chairmen & Member Secretaries of Pollution Control Boards / Pollution Control Committees held on April 08, 2015

Accordingly following resolutions were made during the Conferences:



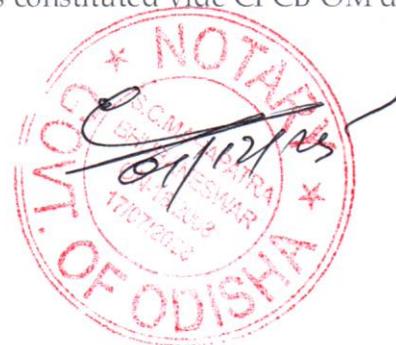
1. A 'Working Group' comprising of the members from CPCB, APPCB, TNPCB, WBPCB, PPCB, MPPCB and Maharashtra PCB is constituted.
2. This WG shall revisit the categorization of industries that is based on pollution index criteria & environmental issues such as generation of emission, effluent and hazardous wastes.
3. The categorization will be done on the basis of composite score (0-100 marks) of Pollution Index given in accordance with the following weightage.

Air Pollution Score based on parameters namely PM, CO, NO <sub>x</sub> , SO <sub>x</sub> , HMs, Benzene, Ammonia and other toxic parameters relevant to the industry.	40 Marks
Water Pollution Score based on parameters namely pH, TSS, NH <sub>3</sub> -N, BOD, Phenol and other toxic pollutants relevant to the industry.	40 Marks
Hazardous wastes (land fillable, incinerable, recyclable) as generated by the industry.	20 Marks
<p>Note :</p> <ul style="list-style-type: none"> <li>• Parameters to be decided on the basis of the nature of the wastes generating from the industrial sector.</li> <li>• Industries having only either water pollution or air pollution, the score will be normalized wrt 100.</li> </ul>	

4. Based on the score of the Pollution Index, following categorization be made :
  - Type of industries, if scores 60 and above be categorized as Red
  - Type of industries, if scores from 30 to 59 be categorized as Orange
  - Type of industries, if scores from 15 to 29 be categorized as Green
  - Type of industries, if less than 15 be categorized as White or non-polluting industry.
5. SPCBs/PCCs may issue consent to the industries
  - Red category of industries for 5 years.
  - Orange category of industries for 10 years.
  - Green category of industries for 15 years.
  - No necessity of consent for non-polluting industries.
6. No red categories of industries will be permitted to establish in eco-sensitive areas and protected areas.

### E: Follow-up Actions made on the Resolutions :-

- Accordingly, a Committee comprising the Chairmen of CPCB, APPCB, TNPCB, MPPCB, MPCB, PPCB, WBPCB and MS, CPCB was constituted vide CPCB OM dated



23.04.2015 to review & classify industrial sectors into different categories based on criteria of respective pollution potential.

- The categorization is made on the basis of following:
  - Quality of emissions (air pollutants) generated
  - Quality of effluents ( water pollutants) generated
  - Types of hazardous wastes generated
  - Consumption of resources
  
- Reference is taken from the following :
  - The Water (Prevention and Control of Pollution ) Cess Act, 1977
  - Standards so far prescribed for various pollutants under the Environment (Protection) Act , 1986
  - Doon Valley Notification, 1989 issued by MoEF.

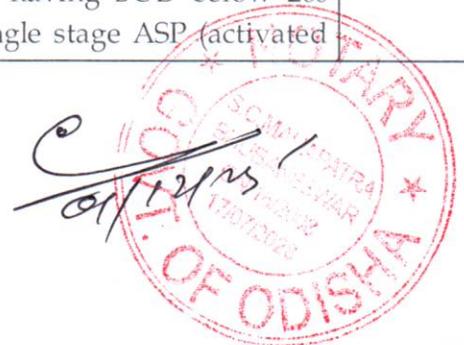
**F : Scoring Methodology :**

The details on the scoring methodology in respect of the aforesaid 3 components is presented in the following tables F-1 to F-4 .



Table F-1 : Water Pollution Scoring Methodology

Sl. No.	Activity / Types of Discharges	Score
Part A : Score W1 : Score based on types of expected criteria water-pollutants present in industrial processes waste waters. <b>Maximum of the following seven categories is to be taken.</b>		
W11	Waste-water which is polluted and the pollutants are - <ul style="list-style-type: none"> <li>• not easily biodegradable ( very high strength waste waters having BOD &gt; 5000 mg/l ); or</li> <li>• toxic; or</li> <li>• both toxic and not easily biodegradable.</li> </ul> (Presence of criteria water pollutants having prescribed standard limits up-to 10 mg/l or having BOD > 5000 mg/l). For details appendix 1 may be referred)	30
W12	Non-toxic high strength polluted waste-water having BOD in the range of 1000-5000 mg/l and the pollutants are biodegradable. <p>(Presence of criteria water pollutants having prescribed standard limits from 11 mg/l to 250 mg/l and having BOD strength in the range of 1000-5000 mg/l) . For details appendix 1 may be referred)</p>	25
W13	Non toxic- polluted waste-water having BOD below 1000 mg/l and the pollutants are easily biodegradable. <p>(Presence of criteria water pollutants having prescribed standard limits from 11mg/l to 250 mg/l and having BOD strength below 1000 mg/l) . For details appendix 1 may be referred)</p>	20
W14	Waste-water generated from the chemical processes and which is polluted due to presence of high TDS ( total dissolved solids) of inorganic nature. <p>(Presence of criteria water pollutants having prescribed standard limits more than 250 mg/l. For details appendix 1 may be referred)</p>	15
W15	Waste-water generated from the physical unit operations / processes and which is polluted due to presence of TDS (total dissolved solids) of inorganic nature and of natural origin like fresh-water RO rejects, boiler blow-downs, brine solution rejects etc. <p>(Presence of criteria water pollutants having prescribed standard limits more than 250 mg/l. For details appendix 1 may be referred)</p>	12
W16	Non-toxic polluted waste-water from those units which are: <ul style="list-style-type: none"> <li>• Having the overall waste-water generation less than 10 KLD and</li> <li>• The pollutants are easily bio-degradable having BOD below 200 mg/l which can be easily treated in a single stage ASP (activated</li> </ul>	12



	sludge process) based Effluent Treatment Plant. Note : This is a special category and is applicable to only those units having over-all liquid waste generation less than 10 KLD with low strength organic load.	
W17	Waste-water from cooling towers and cooling-re-circulation processes	10
Part B : Score W2 : Score based on huge discharges of any kind (Penalty Clause)		
W2	Industry having overall liquid waste generation of 100 KLD or more including industrial & domestic waste-water.	10
Overall Water Pollution Score $W = W1+W2$		



## Appendix 1

- **Water Pollutants covered under Group W11:**
  - ✓ Free available Chlorine , Total residual chlorine, Fluoride (as F), Sulphide (as S), Free Ammonical Nitrogen, Dissolved phosphates (as P), Free ammonia (as NH<sub>3</sub>), Nitrate Nitrogen, Mercury (As Hg), Selenium (as Se), Hexa-valent chromium (as Cr + 6), Lead (as Pb), Tin , Vanadium (as V), Cadmium (as Cd), Manganese (as Mn), Total chromium (as Cr), Copper (as Cu), Iron (as Fe), Nickel (as Ni), Zinc (as Zn), Benzene, Arsenic (as As), Benzo-a-pyrene, Cyanide (as CN), Phenolic compounds (as C<sub>6</sub>H<sub>5</sub>OH) , Adsorbable Organic Halogens (AOX), Boron and /or
  - ✓ BOD strength of waste water > 5000 mg/l
- **Water Pollutants covered under Group W12:**
  - ✓ Sodium Absorption Ratio (SAR) , Biochemical oxygen demand (3 days at 27°C), Total Kjeldahl nitrogen (TKN), Ammonical nitrogen (as N), Suspended solids, Total nitrogen (as N), Chemical oxygen demand, Oils & grease and
  - ✓ BOD strength of waste water is in the range of 1000-5000 mg/l
- **Water Pollutants covered under Group W13:**
  - ✓ Sodium Absorption Ratio (SAR), Biochemical oxygen demand (3 days at 27°C), Total Kjeldahl nitrogen (TKN), Ammonical nitrogen (as N), Suspended solids, Total nitrogen (as N), Chemical oxygen demand and
  - ✓ BOD strength of waste water is below 1000 mg/l
- **Water Pollutants covered under Group W14 and W15:**

Chlorides as Cl, Colour , Total dissolved solids (TDS - Inorganic)
- **Water Pollutants covered under Group W16**
  - ✓ BOD strength of waste water is below 200 mg/l and overall discharge is less than 10 KLD.



**Table F-2 : Air Pollution Score**

Sl. No.	Air Pollutants Group	'Range of Prescribed Standard' of criteria pollutants	Marks
Part 1 : Score A1 = Score based on types of expected criteria Air Pollutants present in the emissions . Maximum of the following seven categories is to be taken. For details appendix 2 may be referred.			
1	Group A1A	Presence of criteria air pollutants having prescribed standard limits up-to 2 mg/Nm <sup>3</sup>	30
2	Group A1B	Presence of criteria air pollutants having prescribed standard from 3 to 10 mg/Nm <sup>3</sup>	25
3	Group A1C	Presence of criteria air pollutants having prescribed standard from 11 to 50 mg/Nm <sup>3</sup>	20
4	Group A1D	Presence of criteria air pollutants having prescribed standard from 51 to 250 mg/Nm <sup>3</sup>	15
5	Group A1E	Presence of criteria air pollutants having prescribed standard from 251 mg/Nm <sup>3</sup> & above.	10
6	Group A1F	<ul style="list-style-type: none"> <li>• Generation of fugitive emissions of Particulate Matters which are:               <ul style="list-style-type: none"> <li>○ Not generated as a result of combustion of any kind of fossil-fuel.</li> <li>○ Generated due to handling / processing of materials without involving the use of any kind of chemicals.</li> <li>○ Which can be easily contained /controlled with simple conventional methods</li> </ul> </li> </ul>	10
7	Group A1G	<ul style="list-style-type: none"> <li>• Generation of Odours which are :               <ul style="list-style-type: none"> <li>○ Generated due to application of binding gums / cements /adhesives /enamels</li> <li>○ Which can be easily contained /controlled with simple conventional methods</li> </ul> </li> </ul>	10
Part 2 : Score A2 = Score based on consumption of fuels and technologies required for air pollution control :			
6	Group A2F1	<ul style="list-style-type: none"> <li>• All such industries in which the daily consumption of coal/fuel is more than 24 MT/day and the particular (Particulate/gaseous/process) emissions from which can be controlled only with high level equipments / technology like ESPs, Bag House Filters, High Efficiency chemical wet scrubbers etc.</li> </ul>	10
7	Group A2F2	<ul style="list-style-type: none"> <li>• All such industries in which the daily consumption of coal/fuel is from 12 MT/day to 24 MT/day and the particular (Particulate/gaseous/process) emissions from which can be controlled with suitable proven technology.</li> </ul>	5
Overall Air Pollution Score -A = A1 + A2			



## Appendix 2

- Air pollutants covered under Group A1A:  
Cd+Th, Dioxins & Furans, Mercury, Asbestos
- Air Pollutants covered under Group A1B:  
HF, Nickel+ Vanadium, HBr, Manganese, Lead, H<sub>2</sub>S, P<sub>2</sub>O<sub>5</sub> as H<sub>3</sub>PO<sub>4</sub>
- Air Pollutants covered under Group A1C:  
Chlorine, Pesticide compounds, CH<sub>3</sub>Cl, TOC, Total Fluoride, Hydrocarbons, NH<sub>3</sub>, HCL vapour & Mist, H<sub>2</sub>SO<sub>4</sub> Mist, SO<sub>2</sub>
- Air Pollutants covered under Group A1D:  
CO, PM, CO, NO<sub>x</sub>
- Air Pollutants covered under Group A1E:  
NO<sub>x</sub> with liquid-fuel, SO<sub>2</sub> with liquid-fuel



Table F-3: Hazardous Waste Generation Score

Sl.No.	Types of Hazardous Waste Generated as per Schedule 1 / Schedule 2 of Hazardous Waste ( Management, Handling & Trans-boundary Movement) Rules , 2008 . <b>Maximum of the following four categories is to be taken</b>	Score
HW1	<ul style="list-style-type: none"> <li>Land disposable HW which require special care &amp; treatment for stabilization before disposal.</li> </ul>	20
HW2	<ul style="list-style-type: none"> <li>Incinerable HW</li> </ul>	15
HW3	<ul style="list-style-type: none"> <li>Land disposable HW which doesn't require treatment &amp; stabilization before disposal.</li> <li>High volume low effect wastes such as fly-ash, phspho-gypsum, red-mud, slags from pyro-metallurgical operations, mine tailings and ore beneficiation rejects)</li> </ul>	10
HW4	<ul style="list-style-type: none"> <li>Recyclable HW, which are easily recyclable with proven technologies.</li> </ul>	10



**Table F-4 : Calculation Sheet**

Industrial Sector - .....

1. Water Pollution Score (W)			
Scores	Waste Water Category	Value	
Score on W1			
Score on W2			
Water Pollution Score = W1+W2			
2. Air Pollution Score (A)			
Scores	Air Pollutant Category	Value	
Score on A1			
Score on A2	-	-	
Air Pollution Score = A1+A2			
3. Hazardous Waste Score (HW)			
Score	HW Category	Value	
HW			
Grand Total = W + A + HW			

Note :

1. Any of the industrial sector having only either air pollution (A) or water pollution (W) , the score will be normalized to 100 as per the following formula -

$$\text{Normalized Score} = \{100 \times W \text{ ( or A)}\} / 40$$

2. Any of the industrial sector having air pollution (A) and water pollution (W) both but no hazardous waste generation (H) , the joint score of air & water pollution will be normalized to 100 as per the following formula -

$$\text{Normalized Score} = \{100 \times (W+A)\} / 80$$

3. Any of the industrial sector having air pollution (A) & hazardous waste generation (H) but no water pollution (W), the joint score of air pollution & hazardous waste generation will be normalized to 100 as per the following formula -

$$\text{Normalized Score} = \{100 \times (A+H)\} / 60$$

4. Any of the industrial sector having water pollution (W) and hazardous waste generation (H) but no air pollution (A), the joint score of water pollution & hazardous waste generation will be normalized to 100 as per the following formula -

$$\text{Normalized Score} = \{100 \times (W+H)\} / 60$$

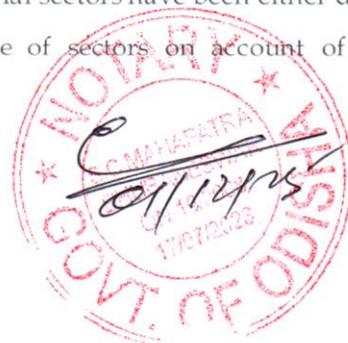


## G : Developments :

- i. The existing Red ( 85 sectors) , Orange ( 73 sectors) and Green ( 86 sectors) i.e a total of 244 industrial sectors have been assessed as per the proposed formula by the Working Group. For this purpose, concerned Engineers / Scientists from the Member SPCBs were also involved & consulted during May 28-29, 2015.
- ii. After careful examination and consideration of the suggestions of concerned stake-holders the "Draft Document on Revised Concept of Categorization of Industrial Sectors " was prepared by the Committee and circulated to all the SPCBs, PCCs and concerned Ministries for their information & comments. The ' Draft Document ' was uploaded on the website of CPCB also for information & comments of one & all.
- iii. The matter was discussed during the 170<sup>th</sup> Board Meeting also and issues raised by the Board Members pertaining to some of the industrial sectors were clarified.
- iv. Responses were received from various concerned Ministries, SPCBs, Industrial Associations including individuals.
- v. Based on the above, final meeting was convened by the Secretary , MoEFCC with CPCB and senior officers of MoEFCC on January 06, 2016 to resolve the issues appropriately and finalize the 'Re-categorization'. Accordingly , following modifications in the 'Range of Pollution Index 'for the purpose of categorization of industrial sectors were suggested :
  - Industrial Sectors having Pollution Index score of 60 and above - Red category
  - Industrial Sectors having Pollution Index score of 41 to 59 -Orange category
  - Industrial Sectors having Pollution Index score of 21 to 40 -Green category
  - Industrial Sectors having Pollution Index score incl.& upto 20 -White category
- vi. Based on the final criteria as described in v above , the final categorization is as follows :

Category of Industrial Sector	Existing Categorization	Proposed (New) categorization
Red	85	60
Orange	73	83
Green	86	63
White	---	36
Total	244	242

- vii. In the proposed categorization, some of the industrial sectors have been either deleted due to duplication or merged with similar type of sectors on account of same



characteristics of pollution generation. In a similar way, some of the industrial sectors are split into more sectors on account of variation in the raw materials / manufacturing process. As a result final totals of the existing and proposed categorization are different.

- viii. The industrial sector which doesn't fall under any of the above four categories ( Red, Orange, Green and White) , decision with regard to its categorization will be taken at the level of concerned SPCB/PCC by a committee headed by the Member Secretary , SPCB/PCC and comprising of two senior cadre Engineers / Scientists of the SPCB / PCC in accordance with the scoring-criteria specified in this document.
- ix. The summary is presented in the following Table G-1 and final lists of Red, Orange, Green and White categories of industries are presented in Tables G-2, G-3, G-4 and G-5 respectively, which are self explanatory.

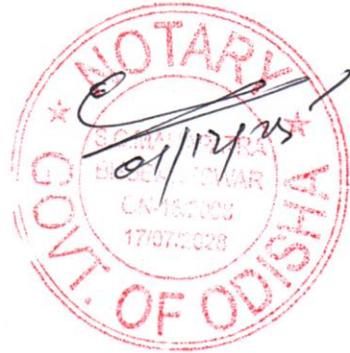


Table G-1: Final Summary Table Red , Orange, Green and White Categories of Industries (16-01-16)

Sl No.	Original Categorization	Initial Nos.	Addition by Splitting into further classes	Deletion/ Shifting to foot-note due to vague term / Merger / other reasons	Re-categorization to Red	Re-categorization to Orange	Re-categorization to Green	Re-categorization to White	Check
					1	2	3	4	
									(1+2) = (3 to 7)
1	Red	85	11	7	60	26	3	Nil	96=96
2	Orange	73	2	3	Nil	51	19	2	75=75
3	Green	86	Nil	3+2=5	Nil	6	41	34	86=86
<b>Final Categorization</b>		244	13	15	60 (Red )	83 (Orange)	63 (Green)	36 (White)	257 =257 (Total categories including in foot-note)

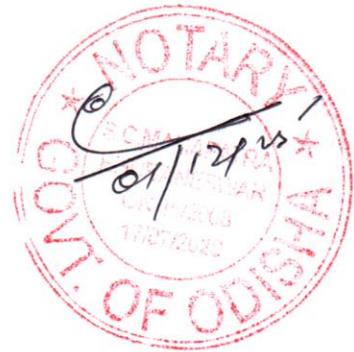


Table G-2 : Final List of Red Category of Industrial Sectors

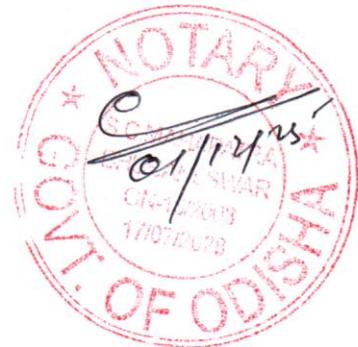
Sl No.	Orgnl Sl.No	Industry Sector	W1	W2	W	A1	A2	A	H	W+A+H	Revised Category	REMARKS
1.	38	Isolated storage of hazardous chemicals (as per schedule of manufacturing, storage of hazardous chemicals rules ,1989 as amended)									R-R	As per provisions of Rules, to be kept under Red category especially for safety purposes.
2.	4	Automobile Manufacturing (integrated facilities)	30	-	30	20	-	20	10	60	R-R	i. Such types of plants are having either one or combinations of polluting activities v.z. washing, metal surface finishing operations, pickling, plating, electro-plating , phosphating, painting , heat treatment etc. ii. Some of such plants may outsource some /all of the polluting activities. In such cases, after thorough inspection of such units by concerned SPCB, re-categorization of the industry shall be made accordingly.
3.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Spent cleared metal catalyst containing copper,, Spent cleared metal catalyst containing zinc,,	30	-	30	20	-	20	10	60	R-R	All the three types of pollutants are expected.
4.	44	Manufacturing of lubricating oils ,grease and petroleum based products	20	-	20	20	-	20	20	60	R-R	Generates all sorts of pollution.
5.	66 E	DG Set of capacity > 5 MVA	-	-	-	20	5	25	-	62.5	R-R	i. Mainly air polluting. ii. DG sets consume the diesel @ 0.21 litres/hr/KVA at full load. iii. Average running is taken @ 12 hrs / day although many of the DG sets run for more than this period.
6.	31	Industrial carbon including electrodes and graphite blocks, activated carbon, carbon black	10	-	-	20	5	25	10	62.5	R-R	Mainly air polluting. Air pollution score is normalized to 100.



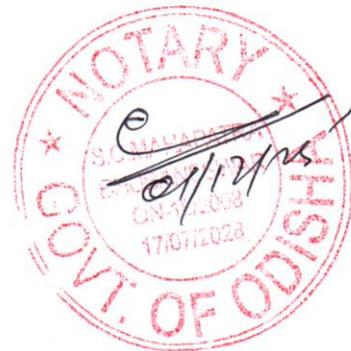
7.	39	Lead acid battery manufacturing(excluding assembling and charging of lead-acid battery in micro scale)	10	-	10	25	-	25	10	62.5	R-R	<p>i. Mainly air polluting. Air pollution scores are normalized to 100.</p> <p>ii. Lead Acid Battery manufacturing consists of various stages which broadly involve (after producing or receiving lead oxide): Paste Mixing , Grid Casting , Grid Pasting &amp; Curing , Hydro-setting, parting &amp; enveloping , Stacking, grouping &amp; inter-cell welding ,Formation.</p> <p>iii. Exposure of workmen to lead during all or any of the processes outlined above exceeds the prescribed standards if appropriate equipment in this respect is not installed at any Battery Manufacturing Unit.</p> <p>iv. All of the above processes, some more than others, involve release of lead particles or fumes into the environment. Pollution from the above processes can be grouped into two possible types, viz: (a) Lead Oxide becomes airborne and there is Particulate Pollution (b) Fumes are generated and there is Gaseous Pollution</p>
8.	62	Phosphate rock processing plant	30	-	30	20	-	20	-	62.5	R-R	<p>i. The separation of phosphate rock from impurities and non-phosphate materials for use in fertilizer manufacture consists of beneficiation, drying or caldning at some operations, and grinding. Phosphate rock from the mines is first sent to beneficiation units to separate sand and day and to remove impurities. Steps used in beneficiation depend on the type of rock.</p> <p>ii. The water &amp; air pollution scores are normalized to 100.</p>



9.	66	Power generation plant [except Wind and Solar renewable power plants of all capacities and Mini Hydel power plant of capacity <25MW]	10	-	10	15	10	25		62.5	R-R	1. Mainly air polluting. It uses a mixture of biomass (agro based) and coal (< 10 %) as a fuel. Almost, round the year operation. 2. In case of DG sets of 5 MVA & more and emissions of SO <sub>2</sub> will take place due to use of liquid fuel. Air pollution score will be =20 + 10 = 30, Normalized score will be 75. 3. In case of 'Waste to Energy Plants', water will be used for cooling and air score will be - 30+10 = 40.
10.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Spent catalyst containing nickel, cadmium, Zinc, copper, arsenic, vanadium and cobalt,	30	-	30	25	-	25	10	65	R-R	All the three types of pollutants are expected.
11.	67	Processes involving chlorinated hydrocarbons	30	-	30	20	-	20	15	65	R-R	Chlorinated hydrocarbons are used in the manufacture of insecticides, pesticides and organo chloro pesticides. Effluents & emissions are toxic in nature.
12.	74	Sugar ( excluding Khandsari)	20	10	30	15	10	25	10	65	R-R	i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. Sugar mills generate all sorts of pollution problems.
13.	22	Fibre glass production and processing (excluding moulding)	-	-	-	20	-	20	20	67	R-R	i. The use of styrene in most methods of fiberglass production causes hazardous air pollution that is harmful to breathe at excessive levels. ii. It is mainly air polluting & HW generating industry. The air pollution & HW scores are normalized to 100. iii. In case of lead containing glass, the score of A1 will be 25 and final normalized score will be 75 and shall be categorized as Red.
14.	23	Fire crackers manufacturing and bulk storage facilities	-	-	-	20	-	20	20	67	R-R	i. This is the normalized score based on air pollution & HW generation. ii. Various hazardous chemicals are used in the manufacturing process. iii. These chemicals are namely Potassium Nitrate , Potassium per-chlorate, Barium Nitrate, Aluminium compounds, Copper Chloride etc.



												iv. These chemicals are highly hazardous and cause serious diseases among the workers. especially ability of blood to carry oxygen leading to headaches, methemoglobinemia and kidney problems , skin problems, thyroid metal fume etc.
15.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Dismantlers Recycling Plants -- Components of waste electrical and electronic assembles comprising accumulators and other batteries included on list A, mercury-switches, activated glass cullets from cathode-ray tubes and other activated glass and PCB-capacitors, or any other component contaminated with Schedule 2 constituents (e.g. cadmium, mercury, lead, polychlorinated biphenyl) to an extent that they exhibit hazard characteristics indicated in part C of this Schedule.	-	-	-	30	0	30	10	67	R-R	Mainly air polluting and hazardous waste generating. Air & HW pollution scores are jointly normalized to 100.
16.	47	Milk processes and dairy products(integrated project)	20	10	30	20	5	25	-	68.75	R-R	i. Water as well as air polluting due to use of boilers. ii. Water & air pollution scores are normalized to 100.
17.	63	Phosphorous and its compounds	30	-	30	25	-	25	-	68.75	R-R	Water pollution & air pollution containing compounds of phosphorous are expected
18.	61	Pulp & Paper ( waste paper based without bleaching process to manufacture Kraft paper)	20	10	30	15	10	25	0	68.75	R-R	Mainly water & air polluting . Water & air pollution scores are normalized to 100.
19.	13	Coke making , liquefaction, coal tar distillation or fuel gas making	30	-	30	20	-	20	20	70	R-R	It is a kind of petrochemical industry.



20.	41	Manufacturing of explosives, detonators, fuses including management and handling activities	30	-	30	20	-	20	20	70	R-R	<p>i. Explosives manufacture and use contribute some measure of hazardous waste to the environment.</p> <p>ii. Nitroglycerin produces several toxic byproducts such as acids, caustics, and oils contaminated with heavy metals. These must be disposed of properly by neutralization or stabilization and transported to a hazardous waste landfill.</p> <p>iii. The use of explosives creates large amounts of dust and particulate from the explosion, and, in some cases, releases asbestos, lead, and other hazardous materials into the atmosphere.</p>
21.	45	Manufacturing of paints, varnishes, pigments and intermediate (excluding blending/mixing)	30	-	30	25	-	25	15	70	R-R	<p>i. The process may cause considerable emissions of volatile organic compounds (VOC). VOC contribute to the creation of ozone in the lower layers of the atmosphere (photochemical air pollution) and can present danger to health.</p> <p>ii. Dust and odour may also be a problem.</p> <p>iii. Washing of vessels will contribute wastewater.</p> <p>iv. Large quantity of HWs are also produced.</p>
22.	56	Organic Chemicals manufacturing	30	-	30	20	-	50	20	70	R-R	Such types of industrial sectors generate all sorts of pollution.
23.	1	Airports and Commercial Air Strips	20	10	30	-	-	-	10	75	R-R	<p>i. The Airports are generating mainly the wastewaters.</p> <p>ii. This is the water pollution normalized score for airports having discharge more than 100 KLD.</p> <p>iii. The airports / strips having discharge less than 100 KLD will have score of 50 and hence orange category.</p> <p>iv. If the score is normalized wrt water + HW both, then all the airports will come under Orange category (score - 58.33).</p>
24.	3	Asbestos and asbestos based industries	-	-	-	30	-	30	10	75	R-R	<p>i. This is mainly air polluting industry.</p> <p>ii. Final score is based on air pollution score only.</p> <p>iii. Asbestos is carcinogenic and banned in many countries.</p>
25.	5	Basic chemicals and electrochemicals and its derivatives including manufacturing of acid	30	-	30	-	-	-	10	75	R-R	<p>i. Standards prescribed for Inorganic Chemicals are adopted.</p> <p>ii. It is mainly water polluting industry having effluents which are toxic and not easily biodegradable.</p>



												iii. Water pollution score normalized to 100 is undertaken. iv. The earlier Red category industrial sector namely "Hydrocyanic acid and its derivatives" is also merged under this industrial sector.
26.	7	Cement	-	-	-	20	10	30	-	75	R-R	This is mainly air polluting industry & hence normalized air pollution score.
27.	9	Chlorates, per-chlorates & peroxides	30	-	30	-	-	-	-	75	R-R	i. It is mainly water polluting industry having effluents which are toxic and not easily biodegradable. ii. Water pollution score normalized to 100 is undertaken.
28.	10	Chlorine, fluorine, bromine, iodine and their compounds	30	-	30	-	-	-	-	75	R-R	i. It is mainly water polluting industry having effluents which are toxic and not easily biodegradable. ii. Water pollution score normalized to 100 is undertaken.
29.	16	Dyes and Dye- Intermediates	30	-	30	20	5	25	20	75	R-R	i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. Such types of industrial sectors generate all sorts of pollution.
30.	26	Health-care Establishment ( as defined in BMW Rules)	20	10	30	-	-	-	-	75	R-R	i. Mainly water polluting. ii. The water pollution score is normalized to 100 & valid for Hospitals having total waste-water generation > 100 KLD. iii. The hospitals with incinerator will be categorized as Red irrespective of the quantity of the waste-water generation. iv. The hospitals having total waste-water generation less than 100 KLD and without incinerator, the normalized water pollution score will be 50 and will be categorized as Orange category.
31.	29	Hotels having overall waste-water generation @ 100 KLD and more.	20	10	30	15	-	15	-	75	R-R	i. Mainly water polluting. Small boiler may be installed. ii. The water pollution score is normalized to 100 & valid for Hotels having waste-water generation > 100 KLD. iii. The hotels having more than 20 rooms and waste-water generation less than 100 KLD and having a coal / oil fired boiler, the pollution score will be 35/40 & are categorized as Orange. iv. The hotels having more than 20 rooms and waste-water generation less than 10 KLD and



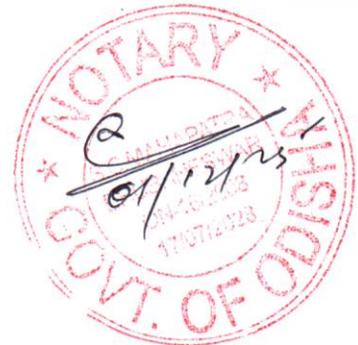
												having no-boiler & no hazardous waste generation, the pollution score will be 20 & are categorized as Green.
32.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Lead acid battery plates and other lead scrap/ashes/residues not covered under Batteries (Management and Handling) Rules, 2001. [ * Battery scrap, namely: Lead battery plates covered by ISRI, Code word "Rails" Battery lugs covered by ISRI, Code word "Rakes". Scrap drained/dry while intact, lead batteries covered by ISRI, Code word "rains".	30	-	30	25	--	25	20	75	R-R	All the three types of pollutants are generated.
33.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Integrated Recycling Plants -- Components of waste electrical and electronic assembles comprising accumulators and other batteries included on list A, mercury-switches, activated glass cullets from cathode-ray tubes and other activated glass and PCB-capacitors, or any other component contaminated with Schedule 2 constituents (e.g. cadmium, mercury, lead, polychlorinated biphenyl) to an extent that they exhibit hazard characteristics indicated in part C of this Schedule.	30	-	30	25	-	25	20	75	R-R	All the three types of pollutants are expected.
34.	43	Manufacturing of glue and gelatin	30	10	40	20	-	20	-	75	R-R	Highly water polluting & obnoxious air polluting.
35.	49	Mining and ore beneficiation	30	10	40	15	5	20	-	75	R-R	Both air and water polluting. Score is normalized with air & water pollution.



36.	52	Nuclear power plant	10	-	10	30	-	30	15	75	R-R	i. Mainly air polluting due to indnerator. Others - cooling water. ii. Air pollution score is normalized to 100.
37.	58	Pesticides (technical) (excluding formulation)	30	-	30	25	-	25	20	75	R-R	i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. Such types of industrial sectors generate all sorts of pollution.
38.	64	Photographic film and its chemicals	30	-	30	-	-	-	-	75	R-R	i. Silver salts and other chemicals are used in preparation. Slight quantity of effluents is generated. ii. Water pollution scores are normalized to 100.
39.	68	Railway locomotive work shop/Integrated road transport workshop/Authorized service centers	20	10	30	-	-	-	10	75	R-R	i. Mainly water polluting industry. Water is used in the washing of locomotives, road transport vehides during servicing. ii. This score is valid for those Centers having discharge more than 100 KLD. iii. Service Centers having waste-water generation < 100 KLD, the normalized score will be = (100*20)/40= 50.
40.	84	Yarn / Textile processing involving any effluent/emission generating processes including bleaching, dyeing, printing and colouring	30	10	40	15	-	15	20	75	R-R	In this sector all sorts of pollution are generated.
41.	8	Chlor Alkali	30	10	40	20	10	30	10	80	R-R	i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. Chlor-alkali units are having different section like NaOH, Cl <sub>2</sub> , SBP etc which are having toxic effluents. Additionally, fuel consumption is also on higher-side.
42.	70	Ship Breaking Industries	30	-	30	30	-	30	20	80	R-R	i. The ship-breaking industry creates numerous hazards for the coastal and marine environment. ii. Ship-breaking releases a large number of dangerous pollutants, including toxic waste, oil, poly-chlorinated biphenyls, and heavy metals, into the waters and sea bed. iii. While most of the oil is removed before a ship is scrapped, sand used to mop up the remaining oil is thrown into the sea. High concentrations of oil and grease are then found in the coastal waters, choking marine life.



													iv. Solid waste strewn on the shore, 45 tonnes on any given day according to a study by the Central Pollution Control Board, also finds its way into the sea. v. Adding to the stress on coastal waters, the organic load from the thousands of workers living in cramped conditions with little or no sanitary facilities results in unacceptably high levels of BOD.
43.	53	Oil and gas extraction including CBM (offshore & on-shore extraction through drilling wells)	30	-	30	-	-	-	20	83	R-R		i. Mainly water polluting & hazardous waste generating. ii. The water pollution & HW generation scores are normalized to 100.
44.	36	Industry or process involving metal surface treatment or process such as pickling/ electroplating/paint stripping/ heat treatment using cyanide bath/ phosphating or finishing and anodizing / enamellings/ galvanizing	30	-	30	-	-	-	20	83	R-R		Mainly water polluting & toxic hazardous waste generating industry. Scores are normalized to 100.
45.	80	Tanneries	30	-	30	-	-	-	20	83	R-R		Mainly water polluting & hazardous waste generating industry. Scores are normalized to 100.
46.	65	Ports and harbour, jetties and dredging operations	30	10	40	15	10	25	20	85	R-R		This category contain all sorts of pollution.
47.	77	Synthetic fibers including rayon ,tyre cord, polyester filament yarn	30	10	40	25	10	35	10	85	R-R		This sector generates all sorts of pollution problems.
48.	81	Thermal Power Plants	30	10	40	20	10	30	15	85	R-R		i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. TPP generate all sorts of pollution problems.
49.	71	Slaughter house (as per notification S.O.270(E)dated 26.03.2001)and meat processing industries, bone mill, processing of animal horn, hoofs and other body parts	25	10	35	-	-	-	-	87.5	R-R		Mainly water polluting and obnoxious odour generating industry. The water pollution score is normalized to 100
50.	2	Aluminium Smelter	30	10	40	20	10	30	20	90	R-R		i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. This sector is generating all sorts of pollution i.e. air, water and HW.
51.	12	Copper Smelter	30	10	40	20	10	30	20	90	R-R		i. This industrial sector is the one among the '17 categories of Highly Polluting Industries'. ii. Integrated Copper Smelters contain all sorts of





- Note :
- i. Under the column Revised Category, the full forms of the abbreviations are as follows :
    - a. R-R means original category was Red and revised category is also Red
    - b. R-O means original category was Red and revised category is Orange
    - c. O-O means original category was Orange and revised category is also Orange
    - d. O-G means original category was Orange and revised category is Green
    - e. O-W means original category was Orange and revised category is White
    - f. G-O means original category was Green and revised category is Orange
    - g. G-G means original category was Green and revised category is also Green
    - h. G-W means original category was Green and revised category is White
  - ii. There are specific remarks in respect of some of the industrial sectors. These sectors are either merged with other relevant sectors or deleted due to duplication. The overall details are as follows :

Sl No.	Original Sl No.	Industry Sector	Original Category	Remarks
1	14	Common treatment and disposal facilities (CETP, TSDF, E-waste recycling, CBMWTF, effluent conveyance project, incinerator, solvent/acid recovery plant, MSW sanitary land fill site)	R	i. All such facilities are classified as Red but special category projects as these are parts of pollution control facilities. ii. In case of CETP, the categorization will depend upon the category of member industries being served.
2	18	Processing of Emulsions of Oil & Water		It is a part of Petrochemical industries. Transferred and merged with the industrial sector namely 'Petrochemicals' at Sl. No. 54.
3	27	Heavy engineering including ship building (with investment on Plant & Machineries more than Rs 10 crores)	R	Most of the pollution generating processes / operations under this category are similar to the industry category namely "Automobile Manufacturing (integrated facilities)" at Sl. No. 1 and may be referred accordingly.
4	30	Hydrocyanic acid and its derivatives	R	Have been merged with the red category industrial sector namely "Basic chemicals and electro chemicals and its derivatives including manufacturing of acid" at Sl. No. 24
5	32	Industrial estates/ parks / complexes/ areas/export processing zones/ SEZs/ Biotech parks/ leather complex	R	The classification will depend upon the category(ies) of the industries operating / proposed to be permitted in the area. In this context, guidelines prescribed in EIA Notification, 2006 shall be followed.
6	33	Industrial inorganic gases namely- a) Chemical gas- Acetylene, hydrogen, chlorine, fluorine, ammonia, sulphur dioxide, ethylene, hydrogen-sulphide, phosphine b) Hydrocarbon gases- Methane, ethane, propane	R	These gases are generally secondary products and produced alongwith other main products. To be classified as per the main parent plant.
7	69	Reprocessing of used oils & waste oils	R	i. The industry generates mainly the air pollution and oil bearing hazardous wastes. The normalized (air pollution & HW generation score is 58.33). ii. To be deleted as already covered under HW Recyclers / Re-processors ( Used oils / Waste Oils) under Orange Category



Table G-3 : Final List of Orange Category of Industrial Sectors

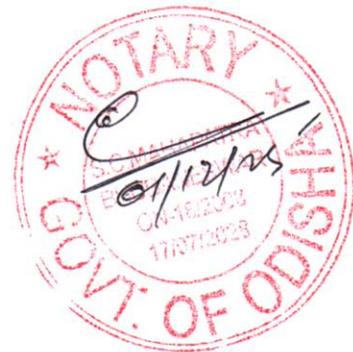
Final Sl. No.	Orgnl S.No	Industry Sector	W1	W2	W	A1	A2	A	H	W+A+H	Revised category	Remarks
1.	20	Dismantling of rolling stocks ( wagons/ coaches)	--	--	--	15	--	15	10	41.67	O-O	Emissions of dust and generation of waste oils take place during dismantling. Air pollution & HW generation scores (15+10=25) are normalized to 100.
2.	5	Bakery and confectionery units with production capacity > 1 TPD. ( With ovens / furnaces)	20	--	20	15	--	15	--	43.75	O-O	
3.	10	Chanachur and laddoo from puffed and beaten rice( muri and shira) using husk fired oven	20	--	20	15	--	15	--	43.75	O-O	Normal water and air polluting.
4.	23	Coated electrode manufacturing	15	0	15	20	0	20	0	43.75	G-O	Preparation of core wire / rod, preparation of dry mix, preparation of wet mix, application of coating by extrusion, baking of coated electrodes
5.	24	Compact disc computer floppy and cassette manufacturing / Reel manufacturing	15	0	15	20	0	20	0	43.75	G-O	Generates waste-water and process emissions.
6.	24	Flakes from rejected PET bottle	20	-	20	15	-	15	-	43.75	R-O	Normal water & air pollutions are generated.
7.	30	Food and food processing including fruits and vegetable processing	20	--	20	15	--	15	--	43.75	O-O	Normal water and air polluting.
8.	40	Jute processing without dyeing	20	--	20	15	--	15	--	43.75	O-O	CPCB has notified standards for this category. Both air and water pollutions are generated.
9.	56	Manufacturing of silica gel	15	0	15	20	0	20	0	43.75	G-O	Waste-waters containing TDS and emissions of H <sub>2</sub> SO <sub>4</sub> are generated.



10.	45	Manufacturing of tooth powder, toothpaste, talcum powder and other cosmetic items	20	--	20	15	--	15	--	43.75	O-O	Both air and water pollution are generated.
11.	55	Printing or etching of glass sheet using hydrofluoric acid	15	--	15	20	--	20	--	43.75	O-O	Both air and water pollution are generated.
12.	65	Silk screen printing, sari printing by wooden blocks	20	--	20	15	--	15	--	43.75	O-O	Wash-water and PM emissions from boilers .
13.	76	Synthetic detergents and soaps(excluding formulation)	20	-	20	15	-	15	-	43.75	R-O	i. This is the score for units having generation of waste-waters less than 100 KLD. ii. The units having waste-water generation more than 100 KLD will become mainly water polluting and accordingly normalized water pollution score will be 75 and be categorized as Red.
14.	71	Thermometer manufacturing	15	--	15	20	--	20	--	43.75	O-O	Process - making glass bulb, forming reservoir in the glass tube for fluid, inserting fluid, scale marking. Use of fuel to heat the glass tubes and hydrofluoric acid to seal the scaling. Small quantities of spent acids are generated.
15.	14	Cotton spinning and weaving (medium and large scale)	--	--	--	15	--	37.5	10	47.5	O-O	Mainly air polluting industry. Sources of air pollution (PM) are the fine particles of cotton from spinning process. Air pollution score is normalized to 100.
16.	1	Almirah, Grill Manufacturing (Dry Mechanical Process )	--	--	--	20	--	20	--	50	O-O	Air pollution due to spray painting (emissions of VOCs). Units without painting operations shall be categorized as White.



17.	2	Aluminium & copper extraction from scrap using oil fired furnace (dry process only)	--	--	--	20	--	20	10	50	O-O	i. Normalized Air pollution score. ii. Significant air pollution due to melting (emissions of SO <sub>2</sub> , PM).
18.	3	Automobile servicing, repairing and painting (excluding only fuel dispensing)	20	--	20	20	--	20	10	50	O-O	Normal water & air polluting and recyclable waste oil generating. If the waste water generation is more than 100 KLD, it will become mainly water polluting and Red category unit.
19.	4	Ayurvedic and homeopathic medicine	20	--	20	15	--	15	15	50	O-O	
20.	7	Brickfields ( excluding fly ash brick manufacturing using lime process)	--	--	--	20	--	20	--	50	O-O	Significantly air polluting.
21.	8	Building and construction project more than 20,000 sq. m built up area	20	--	20	20	--	20	--	50	O-O	1. In the pre-construction stage , it is mainly air polluting due to generation of dust ( PM ) emissions. 2. After construction, it is mainly water polluting. If the discharge is more than 100 KLD, it will be having the normalized score of 75 and be categorized as Red.
22.	6	Ceramics and Refractories	-	-	-	20	-	20	-	50	R-O	i. Mainly air polluting industry. ii. This score is for the units having coal consumption < than 12 MT/day. iii. For the units having coal consumption > 12 MT /day, the normalized air pollution score will be 62.5 and shall be categorized as Red.



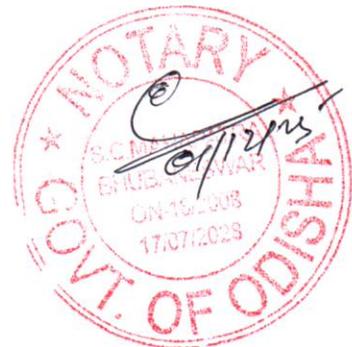
23.	11	Coal washeries	15	10	25	15	-	15	-	50	R-O	<p>i. Wet washeries are mainly water polluting industry generating effluents which are having inorganic SS &amp; TDS. Additionally, air pollution due to PM emissions is also generated.</p> <p>ii. Water &amp; air pollution scores are jointly normalized to 100.</p>
24.	16	Dairy and dairy products (small scale)	20	--	20	20	--	20	--	50	O-O	Water and air polluting both.
25.	18	DG set of capacity >1MVA but < 5MVA	--	--	--	20	--	20	--	50	O-O	Mainly air polluting. air pollution score is normalized to 100.
26.	17	Dry coal processing, mineral processing, industries involving ore sintering, pelletisating, grinding & pulverization	-	-	-	20	-	20	-	50	R-O	Mainly air polluting industry. Final score is the normalized air pollution score.
27.	19	Fermentation industry including manufacture of yeast, beer, distillation of alcohol (Extra Neutral Alcohol)	20	-	20	-	-	-	-	50	R-O	<p>i. Mainly water polluting industry. This is the normalized water pollution score for units having discharge &lt; 100 KLD.</p> <p>ii. For the units having discharge &gt; 100 KLD, the normalized water pollution score will be 75 and shall be accordingly categorized as Red.</p>
28.	21	Ferrous and Non-ferrous metal extraction involving different furnaces through melting, refining, re-processing, casting and alloy-making	-	-	-	15	5	20	10	50	R-O	<p>i. Mainly air polluting.</p> <p>ii. This score is applicable to secondary production of ferrous &amp; non-ferrous metals (excluding lead) up-to 1 MT/hour production.</p>



												<p>iii. For lead, the normalized air pollution score will be = <math>(100 \times 25) / 40 = 62.5</math> and is categorized as Red.</p> <p>iv. For Induction Furnace clubbed with AOD furnace - separate calculation shall be made based on the capacity of the furnaces. In such industries, the molten metal from induction furnace is transferred to AOD furnace where other metals like manganese and nickel are added to get the metal of desired constituents. The lime and silicon are also added for reduction of the metal oxides to the base metal. the normalized air pollution score will be = <math>(100 \times 25) / 40 = 62.5</math> and is categorized as Red.</p>
29.	26	Fertilizer (granulation / formulation / blending only)	--	--	--	20	--	20	--	50	O-O	Air polluting.
30.	27	Fish feed, poultry feed and cattle feed	--	--	--	20	--	20	--	50	O-O	Obnoxious odour , H2S etc. AP score is normalized to 100
31.	28	Fish processing and packing (excluding chilling of fishes)	20	--	20	--	--	--	--	50	O-O	Mainly water polluting. WP score is normalized to 100.



32.	31	Forging of ferrous and non- ferrous metals ( using oil and gas fired furnaces)	--	--	--	20	--	20	--	50	O-O	Heating furnace. Mainly air polluting.
33.	32	Formulation/pelletization of camphor tablets, naphthalene balls from camphor/ naphthalene powders.	--	--	--	20	--	20	--	50	O-O	Mainly air polluting. Emissions of Benzene, HC are expected.
34.	33	Glass ceramics, earthen potteries and tile manufacturing using oil and gas fired kilns, coating on glasses using cerium fluorides and magnesium fluoride etc.	--	--	--	20	--	20	--	50	O-O	Mainly air polluting. Emissions of SO2 are expected.
35.	35	Gravure printing, digital printing on flex, vinyl	20	--	20	20	--	20	10	50	O-O	Waste waters , emissions of VOCs
36.	36	Heat treatment using oil fired furnace ( without cyaniding)	--	--	--	20	--	20	--	50	O-O	Mainly air polluting and noise generating. AP Score is normalized to 100.
37.	28	Hot mix plants	-	-	-	20	-	20	-	50	R-O	Mainly air polluting. Air pollution scores are normalized to 100.
38.	37	Hotels (< 3 star) or hotels having > 20 rooms and less than 100 rooms.	20	--	20	20	--	20	--	50	O-O	Mainly water polluting. WP score is normalized to 100.
39.	38	Ice cream	20	--	20	20	--	20	--	50	O-O	Wash-water and boilers / oven for pasteurization.
40.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Paint and ink Sludge/residues	-	-	-	20	0	20	0	50	R-O	Mainly air polluting. Air pollution score is normalized to 100
41.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely - Brass Dross ,, Copper Dross,, Copper Oxide Mill Scale,, Copper Reverts, Cake & Residues,, Waste Copper and copper alloys in	10	-	10	20	-	20	10	50	R-O	Mainly air polluting.



		dispersible form,, Slags from copper processing for further processing or refining ,, Insulated Copper Wire,, Scrap/copper with PVC sheathing including ISRI-code material namely "Druid" ,, Jelly filled Copper cables ,, Zinc Dross-Hot dip Galvanizers SLAB,, Zinc Dross-Bottom Dross,, Zinc ash/Skimming arising from galvanizing and die casting operations,, Zinc ash/Skimming/other zinc bearing wastes arising from smelting and refining,, Zinc ash and residues including zinc alloy residues in dispersible from,,										
42.	35	Industry or processes involving foundry operations	-	-	-	20	-	20	-	50	R-O	i. This score is valid for the foundries having capacity < 5 MT/hr as such units require the coal/coke @ < 500 kg/hr. ii. The units having capacity of 5 MT/hr and more, the coal/coke consumption will be more than 500 kg/hr and the normalized score will be 62.5 and classified accordingly as Red.
43.	40	Lime manufacturing (using lime kiln)	-	-	-	20	-	20	-	50	R-O	Mainly air polluting
44.	41	Liquid floor cleaner, black phenyl, liquid soap, glycerol mono-stearate manufacturing	20	--	20	20	--	20	--	50	O-O	Both air and water pollution are generated.



45.	42	Manufacturing of glass	10	-	-	20	-	20	-	50	R-O	<p>i. Mainly air polluting (melting at 1500°C and refining).</p> <p>ii. In case of lead glass, the score of A1 will be 25 and accordingly the normalized scores will be 62.5 i.e. Red.</p>
46.	43	Manufacturing of iodized salt from crude/raw salt	12	--	12	20	--	20	--	50	O-O	Boiling in Evaporators (multiple effect evaporators), centrifuging, iodization with KIO <sub>3</sub> mixing. Mainly air polluting. Air pollution score is normalized to 100.
47.	42	Manufacturing of mirror from sheet glass	--	--	--	20	--	20	--	50	O-O	Evaporator & furnace for heating the metal to be applied as reflector on mirror. Mainly air polluting.
48.	44	Manufacturing of mosquito repellent coil	--	--	--	20	--	20	--	50	O-O	Mainly air polluting. Toxic fumes are expected.
49.	46	Manufacturing of Starch/Sago	25	-	25	15	-	15	-	50	R-O	<p>i. Water and air polluting industry. Boiler is used for steam generation.</p> <p>ii. Water &amp; air pollution scores are normalized to 100.</p>
50.	46	Mechanized laundry using oil fired boiler	20	--	20	20	--	20	--	50	O-O	Both air and water pollution are generated.
51.	47	Modular wooden furniture from particle board, MDF < swan timber etc, Ceiling tiles/ partition board from saw dust, wood chips etc., and other agricultural waste using synthetic adhesive resin, wooden box making (With boiler)	--	--	--	20	--	20	--	50	O-O	1. Mainly air polluting. Boiler as well as VOCs from use of adhesives. 2. Without boiler, it will be a Green category industry.
52.	50	New highway construction project	-	-	-	20	-	20	-	50	R-O	Mainly air polluting project.



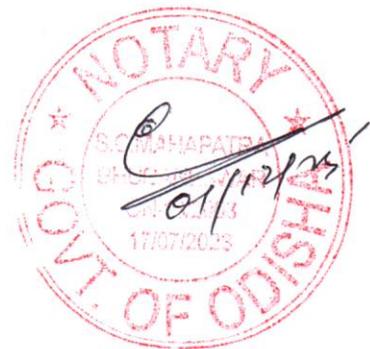
53.	51	Non-alcoholic beverages(soft drink) & bottling of alcohol/non alcoholic products	20	-	20	15	5	20	-	50	R-O	i. Both air and water polluting. Score is normalized with air & water pollution. This score is valid for industries having waste-water generation < 100 KLD. ii. For the units having waste-water generation > 100 KLD the , normalized score would be 62.5 and categorized as Red.
54.	49	Paint blending and mixing (Ball mill)	20	--	20	20	--	20	10	50	O-O	Both air and water pollution are generated.
55.	62	Paints and varnishes (mixing and blending)	20	0	0	20	0	20	0	50	G-O	Waste-waters as well as fumes of VOCs due to solvents, pigments, varnishes.
56.	51	Ply-board manufacturing( including Veneer and laminate) with oil fired boiler/ thermic fluid heater(without resin plant)	0	--	0	20	--	20	--	50	O-O	Mainly air polluting because of use of boiler. AP score is normalized to 100
57.	52	Potable alcohol ( IMFL) by blending, bottling of alcohol products	20	--	20	--	--	--	--	50	O-O	Mainly water polluting. WP score is normalized to 100.
58.	54	Printing ink manufacturing	20	--	20	20	--	20	--	50	O-O	1. Pigments, binders and solvents are used. 2. Boiler is also used. 3. Emissions of VOCs take place.
59.	70	Printing press	20	0	20	20	0	20	0	50	G-O	Colored waste-waters containing dyes and VOC emissions are generated.
60.	59	Reprocessing of waste plastic including PVC	20	--	20	20	--	20	--	50	O-O	Large quantities of wash-water and fugitive emissions are generated.
61.	61	Rolling mill (oil or coal fired) and cold rolling mill	10	--	10	20	--	20	--	50	O-O	Mainly air polluting. Air pollution score is normalized to 100. Others - cooling water and recyclable waste oils etc. are generated.
62.	67	Spray painting, paint baking, paint shipping	--	--	--	20	--	20	10	50	O-O	Mainly air polluting. Emissions of VOCs and HC are generated.



63.	72	Steel and steel products using various furnaces like blast furnace /open hearth furnace/induction furnace/arc furnace/submerged arc furnace /basic oxygen furnace /hot rolling reheated furnace	10	-	10	20	-	20	10	50	R-O	i. Mainly air polluting. In the emissions, oxides of manganese, nickel etc. are also present. ii. Air pollution score is normalized to 100.
64.	73	Stone crushers	-	-	-	20	-	20	-	50	R-O	Mainly air polluting. Air pollution score is normalized to 100.
65.	75	Surgical and medical products including prophylactics and latex	20	-	20	20	-	20	-	50	R-O	Both air as well as water polluting. Air and water pollution scores are normalized to 100.
66.	85	Teflon based products	0	0	0	20	0	20	0	50	G-O	Due to spraying applications, emissions (HC) are generated
67.	70	Thermocol manufacturing ( with boiler)	--	--	--	20	--	20	--	50	O-O	Polystyrene is heated. Mainly air polluting with boiler.
68.	82	Tobacco products including cigarettes and tobacco/opium processes	20	-	20	20	-	20	-	50	R-O	Such industries generate both air as well as water pollution. These scores are normalized to 100.
69.	72	Transformer repairing/ manufacturing ( dry process only)	--	--	--	20	--	20	10	50	O-O	Mainly air polluting because of ovens, shot-blasting etc.
70.	73	Tyres and tubes vulcanization/ hot retreating	10	--	10	20	--	20	--	50	O-O	Mainly air polluting . Emissions of PM, VOCs and obnoxious odour are generated.
71.	83	Vegetable oil manufacturing including solvent extraction and refinery /hydrogenated oils	20	-	20	15	5	20	10	50	R-O	i. All sorts of pollution are generated. ii. This score is valid for plants having waste-water generation < 100 KLD. iii. If the waste-water generation is more than 100 KLD, the unit shall be classified as Red.
72.	74	Wire drawing and wire netting	20	--	20	--	--	--	--	50	O-O	Mainly water polluting. WP score is normalized to 100.



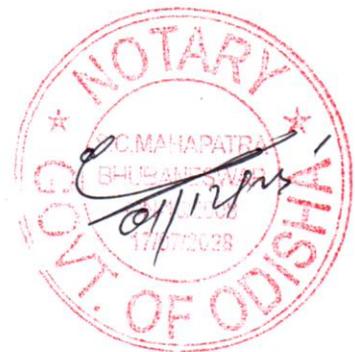
73.	21	Dry cell battery (excluding manufacturing of electrodes) and assembling & charging of a lead battery on micro scale	30	--	30	15	--	15	10	55	O-O	Water and air polluting both.
74.	50	Pharmaceutical formulation and for R & D purpose ( For sustained release/ extended release of drugs only and not for commercial purpose)	20	--	20	20	--	20	15	55	O-O	i. All sorts of pollution are generated. ii. R&D activities are to be shifted to Red category.
75.	78	Synthetic resins	20	-	20	20	-	20	15	55	R-O	All sorts of pollution are generated.
76.	79	Synthetic rubber excluding molding	20	-	20	20	-	20	15	55	R-O	i. Most synthetic rubber is created from two materials, styrene and butadiene. Both are currently obtained from petroleum. ii. Process is similar to a part of Petrochemical plants.
77.	9	Cashew nut processing	25	--	25	20	--	20	--	56	O-O	Normal water and air polluting.
78.	12	Coffee seed processing	25	--	25	20	--	20	--	56	O-O	Normal water & air polluting industry.
79.	57	Parboiled Rice Mills	25	-	25	20	-	20	-	56	R-O	i. Rice Mills are generating both air and water pollution. Waste-waters are having high strength in respect of BOD. ii. This is the normalized air & water pollution score for units having waste-water generation < 100 KLD and fuel consumption less than 12 MTD. iii. For units having waste-water generation > 100 KLD or fuel consumption > 12 MTD or both, the unit shall be classified as Red.



80.	29	Foam manufacturing	--	--	--	20	--	20	15	58	O-O	i. Raw material is polyurethane, latex etc. ii. Emissions of VOCs and HAPs. CH <sub>3</sub> Cl <sub>2</sub> and similar compounds as blowing agents. iii. Outdated raw materials and spoiled slots are discarded as HW.
81.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely Used Oil - As per specifications prescribed from time to time.	10	0	10	20	0	20	15	58.33	R-O	Mainly air polluting and hazardous waste generating industry. Air pollution & HW scores are normalized to 100
82.	34	Industries engaged in recycling / reprocessing/ recovery/reuse of Hazardous Waste under schedule iv of HW( M, H& TBM) rules, 2008 - Items namely Waste Oil ---As per specifications prescribed from time to time.	-	-	-	20	0	20	15	58.33	R-O	Mainly air polluting and hazardous waste generating industry. Air pollution & HW scores are normalized to 100.
83.	56	Producer gas plant using conventional up drift coal gasification ( linked to rolling mills glass and ceramic industry refectories for dedicated fuel supply)	--	--	--	20	--	20	15	58.33	O-O	Mainly air polluting & tar (HW) generating. SO <sub>2</sub> , CO, NO <sub>x</sub> are generated. Tar is the by-product and utilized by other industries in co-processing.

Note :

- i. Under the column Revised Category, the full forms of the abbreviations are as follows :
- R-R means original category was Red and revised category is also Red
  - R-O means original category was Red and revised category is Orange
  - O-O means original category was Orange and revised category is also Orange
  - O-G means original category was Orange and revised category is Green
  - O-W means original category was Orange and revised category is White
  - G-O means original category was Green and revised category is Orange
  - G-G means original category was Green and revised category is also Green
  - G-W means original category was Green and revised category is White



- ii. There are specific remarks in respect of some of the industrial sectors. These sectors are either merged with other relevant sectors or deleted due to duplication / vague category. The overall details are as follows:

Sl No.	Origin of Sl No.	Industry Sector	Original Category	Remarks
1	24	Excavation of sand from the river bed (excluding manual excavation)	0	Since such types of activities cause ecological disturbances, the instructions issued by the government from time to time be followed. To be categorized by MoEF&CC.
2	39	Infrastructure Development Project	0	Vast variety of such projects come under such category. This is to be decided by the concerned SPCB in line of EIA Notification, 2006.
3	53	Power press	0	Very vague term hence deleted. Such types of general engineering units have already been covered.

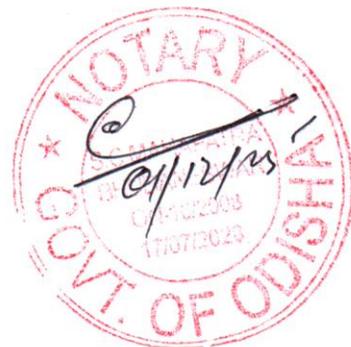


Table G-4 : Final List of Green Category of Industrial Sectors

Sl. No.	Orgnl Sl. No.	Industry Sector	W1	W2	W	A1	A2	A	H	W+A+H	Revised Category	Remarks
1.	2	Aluminium utensils from aluminium circles by pressing only (dry mechanical operation)	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from buffing operations.
2.	6	Ayurvedic and homeopathic medicines (without boiler)	10	--	10	--	--	--	--	25	G-G	Small quantities of waste-waters are generated from washing operations.
3.	8	Bakery /confectionery /sweets products (with production capacity <1tpd (with gas or electrical oven)	10	--	10	--	--	--	--	25	G-G	Small quantities of waste-waters are generated from washing operations.
4.	6	Bi-axially oriented PP film along with metalizing operations	10	--	10	--	--	--	--	25	O-G	Mainly extrusion process involving Cooling water recirculation
5.	10	Biomass briquettes (sun drying) without using toxic hazardous wastes	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from pulverization / mixing operations.
6.	13	Blending of melamine resins & different powder, additives by physical mixing	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from pulverization / mixing operations.
7.	15	Brass and bell metal utensils manufacturing from circles(dry mechanical operation without re-rolling facility)	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from buffing operations.
8.	16	Candy	10	--	10	10	--	10	--	25	G-G	Small quantities of waste-water and minor



												PM emissions are generated.
9.	17	Cardboard or corrugated box and paper products (excluding paper or pulp manufacturing and without using boilers)	--	--	--	10	--	10	--	25	G-G	This score is valid with Small gas / electricity operated oven / furnace for making glue.
10.	18	Carpentry & wooden furniture manufacturing (excluding saw mill) with the help of electrical (motorized) machines such as electrical wood planner, steel saw cutting circular blade, etc.	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from cutting operations.
11.	19	Cement products (without using asbestos / boiler / steam curing) like pipe ,pillar, jafri, well ring, block/tiles etc.(should be done in closed covered shed to control fugitive emissions)	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions from mixing operations.
12.	20	Ceramic colour manufacturing by mixing & blending only (not using boiler and wastewater recycling process)	--	--	--	10	--	10	--	25	G-G	Minor air pollution due to some fugitive PM emissions.
13.	11	Chilling plant, cold storage and ice making	10	--	10	--	--	--	--	25	O-G	Cooling water recirculation only.
14.	13	Coke briquetting ( sun drying)	--	--	--	10	--	10	--	25	O-G	Mainly air polluting industry. Sources of air pollution (PM) are pulverizes and mixers. Air pollution score is normalized to 100.
15.	28	Cotton spinning and weaving (small scale)	--	--	--	10	--	10	--	25	G-G	Minor PM emissions from spinning process.
16.	17	Dal Mills	--	--	--	10	--	10	--	25	O-G	Some fugitive emissions of PM.



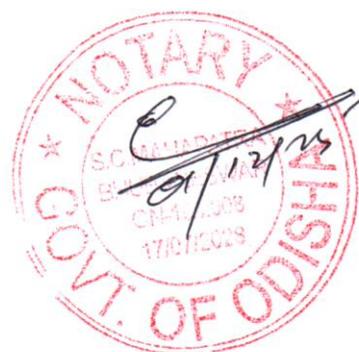
17.	29	Decoration of ceramic cups and plates by electric furnace	--	--	--	10	--	10	--	25	G-G	Fumes of enamels. Minor air pollution.
18.	19	Digital printing on PVC clothes	--	--	--	10	--	10	--	25	O-G	Minor emissions / odour generations are expected.
19.	25	Facility of handling, storage and transportation of food grains in bulk	--	--	--	10	--	10	--	25	O-G	Some fugitive emissions of PM during handling of grains.
20.	36	Flour mills (dry process)	--	--	--	10	--	10	--	25	G-G	Fugitive dust emissions.
21.	41	Glass , ceramic, earthen potteries, tile and tile manufacturing using electrical kiln or not involving fossil fuel kiln	--	--	--	10	--	10	--	25	G-G	Minor fugitive emissions only.
22.	34	Glue from starch (physical mixing) with gas / electrically operated oven /boiler.	--	--	--	10	--	10	--	25	O-G	Some fugitive emissions of PM during mixing of raw materials.
23.	42	Gold and silver smithy (purification with acid smelting operation and sulphuric acid polishing operation) (using less or equal to 1 litre of sulphuric acid/ nitric acid per month)	--	--	--	10	--	10	--	25	G-G	Minor fumes from cleaning process.
24.	36	Heat treatment with any of the new technology like ultrasound probe , induction hardening , ionization beam, gas carburizing etc.	10	--	10	10	--	10	--	25	O-G	<ul style="list-style-type: none"> <li>Cooling waters and minor heat fumes.</li> <li>Finalization of categorization subject to field verification.</li> </ul>
25.	46	Insulation and other coated papers (excluding paper or pipe manufacturing)	--	--	--	10	--	10	--	25	G-G	Minor fumes due to application of poly-urethane
26.	49	Leather foot wear and leather products (excluding tanning and hide processing except cottage scale)	--	--	--	10	--	10	--	25	G-G	Minor fumes due to use of adhesives / gums.



27.	50	Lubricating oil, greases or petroleum based products (only blending at normal temperature)	--	--	--	10	--	10	--	25	G-G	Minor fumes at the time of transfers from one container to other.
28.	54	Manufacturing of pasted veneers using gas fired boiler or thermic fluid heater and by sun drying	--	--	--	10	--	10	--	25	G-G	1. Minor fumes due to application of gums / adhesives / pastes etc. 2. This score is valid only for gas fired boiler.3. The units having coal fired boilers shall be categorized as Orange.
29.	59	Oil mill Ghani and extraction ( no hydrogenation / refining)	10	--	10	--	--	--	--	25	G-G	Small quantities of floor washings & equipments washings are generated.
30.	48	Packing materials manufacturing from non asbestos fibre, vegetable fibre yarn	--	--	--	10	--	10	--	25	O-G	Some fugitive emissions of PM are expected.
31.	65	Phenyl/toilet cleaner formulation and bottling	--	--	--	10	--	10	--	25	G-G	Minor fumes of VOCs in the work zone
32.	67	Polythene and plastic processed products manufacturing (virgin plastic)	10	--	10	10	--	10	--	25	G-G	Cooling water & emissions due to mixing of raw materials.
33.	68	Poultry, Hatchery and Piggery	--	--	--	10	--	10	--	25	G-G	Obnoxious odour containing H <sub>2</sub> S, CH <sub>4</sub> etc. and fugitive PM emissions
34.	69	Power looms (without dye and bleaching)	--	--	--	10	--	10	--	25	G-G	Minor emissions of PM.
35.	71	Puffed rice (muri) (using gas or electrical heating system)	--	--	--	10	--	10	--	25	G-G	Minor emissions of PM.
36.	57	Pulverization of bamboo and scrap wood	--	--	--	10	--	10	--	25	O-G	Some fugitive emissions of PM are expected.
37.	72	Ready mix cement concrete	--	--	--	10	--	10	--	25	G-G	PM emissions.
38.	73	Reprocessing of waste cotton	--	--	--	10	--	10	--	25	G-G	PM emissions.
39.	60	Rice mill (Rice hullers only)	--	--	--	10	--	10	--	25	O-G	PM emissions are generated. Mainly air



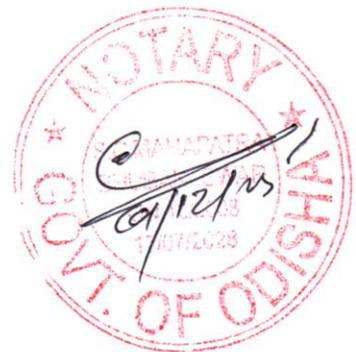
													polluting. AP score is normalized to 100
40.	62	Rolling mill ( gas fired) and cold rolling mill	10	--	10	10	--	10	--	25	O-G		Mainly air polluting. AP score is normalized to 100
41.	75	Rubber goods industry (with gas operated baby boiler)	--	--	--	10	--	10	--	25	G-G		Some PM emissions and obnoxious odour.
42.	63	Saw mills	--	--	--	10	--	10	--	25	O-G		Mainly air polluting. PM and noise are generated.
43.	77	Soap manufacturing (hand made without steam boiling / boiler)	10	--	10	--	--	--	--	25	G-G		Small quantities of waste-water are generated.
44.	80	Spice grinding (upto-20 HP motor)	--	--	--	10	--	10	--	25	G-G		Small quantities of fugitive emissions of raw materials.
45.	66	Spice grinding (>20 hp motor)	--	--	--	10	--	10	--	25	O-G		Mainly air polluting. Fugitive emissions of PM.
46.	81	Steel furniture without spray painting	--	--	--	10	--	10	--	25	G-G		Obnoxious gases from welding as well as noise pollution.
47.	82	Steeping and processing of grains	10	--	10	--	--	--	--	25	G-G		Washing waters are generated.
48.	86	Tyres and tube retreating (without boilers)	--	--	--	10	--	10	--	25	G-G		Due to applications of binding gum / adhesives / cement, some obnoxious fumes may generate.
49.	22	Chilling plant and ice making without using ammonia	12	--	12	--	--	--	--	30	G-G		Cooling water and brine water circuits. Spillages / blow down may take place
50.	26	CO2 recovery	12	--	12	--	--	--	--	30	G-G		Normal water pollution from scrubbing action
51.	32	Distilled water ( without boiler) with electricity as source of heat	12	--	12	--	--	--	--	30	G-G		TDS as distillation residues



52.	45	Hotels (up to 20 rooms and without boilers)	12	--	12	--	--	--	--	30	G-G	This score is valid for hotels having overall waste-water generation less than 10 KLD.
53.	53	Manufacturing of optical lenses (using electrical furnace)	12	--	12	--	--	--	--	30	G-G	Small quantities of waste-waters containing TDS, SS are generated.
54.	58	Mineralized water	12	--	12	--	--	--	--	30	G-G	RO Rejects.
55.	68	Tamarind powder manufacturing	12	--	12	15	--	15	--	33.75	O-G	<ul style="list-style-type: none"> <li>Dried tamarind fruits - cleaned and after soaking them in water they are boiled in steam jacketed kettle for about 40-45 minutes. Then pulp is extracted in pulper and dried in drum type drier and on cooling, the final product is packed.</li> <li>Generates small quantities of waste waters and air emissions. Joint score is normalized to 100.</li> </ul>
56.	15	Cutting, sizing and polishing of marble stone	15	--	15	--	--	--	--	37.5	O-G	Mainly water polluting . Water pollution score is normalized to 100.
57.	22	Emery powder ( fine dust of sand) manufacturing	--	--	--	15	--	15	--	37.5	O-G	Air polluting. PM emissions take place during various stages of grindings of naturally occurring minerals.
58.	25	Flyash export, transport & disposal facilities	-	-	-	15	-	15	-	37.5	R-G	<ul style="list-style-type: none"> <li>This is mainly air polluting activity.</li> <li>This is the normalized score based on air pollution.</li> </ul>
59.	48	Mineral stack yard / Railway sidings	15	-	15	15	-	15	-	37.5	R-G	<ul style="list-style-type: none"> <li>Mainly air pollution due to loading, unloading, storage and transportation of the minerals.</li> </ul>



													<ul style="list-style-type: none"> <li>Waste-water generation mainly during rains only.</li> </ul>
60.	54	Oil and gas transportation pipeline	-	-	-	10	5	15	-	37.5	R-G	<ul style="list-style-type: none"> <li>Contains small gas based power plants up-to 5 MWs.</li> <li>Air pollution score is normalized to 100.</li> <li>In case , if these power plants are bigger / liquid fuel / oil based, scores will be calculated accordingly.</li> </ul>	
61.	64	Seasoning of wood in steam heated chamber	--	--	--	15	--	15	--	37.5	O-G	Air pollution due to use boiler for supply of steam. Air pollution score is normalized to 100.	
62.	84	Synthetic detergent formulation	--	--	--	15	--	15	--	37.5	G-G	<ul style="list-style-type: none"> <li>This score is valid for the industries which are not manufacturing LABSA. It is procured from outside.</li> <li>Small quantities of emissions are generated from mini boiler.</li> <li>Air pollution score is normalized to 100.</li> </ul>	
63.	69	Tea processing ( with boiler)	--	--	--	15	--	15	--	37.5	O-G	With boiler, it is an orange category industry. Without boiler, it will be green category industry.	



Note :

- i. Under the column Revised Category, the full forms of the abbreviations are as follows :
- R-R means original category was Red and revised category is also Red
  - R-O means original category was Red and revised category is Orange
  - O-O means original category was Orange and revised category is also Orange
  - O-G means original category was Orange and revised category is Green
  - O-W means original category was Orange and revised category is White
  - G-O means original category was Green and revised category is Orange
  - G-G means original category was Green and revised category is also Green
  - G-W means original category was Green and revised category is White
- ii. There are specific remarks in respect of some of the industrial sectors. These sectors are either merged with other relevant sectors or deleted due to duplication. The overall details are as follows :

Sl No	Original Sl No.	Industry Sector	Original Category	Remarks
1	47	Jobbing and Machining	G	Vague category to be deleted, as such activities have already been covered in other categories.
2	66	Reel manufacturing	G	Already covered in other categories. Hence, deleted
3	1	Assembling of acid lead batteries (up to 10 batteries per day excluding lead plate casting)	G	Already covered in Orange category. Hence, deleted
4	5	Automobile fuel outlets (only dispensing)	G	Minor air pollution due to some fugitive emissions during fuel filling operations. May be exempted from the purview of Consent management.
5	30	Diesel generator sets (15 KVA to 1 MVA)	G	<ul style="list-style-type: none"> <li>Normal operation – 12 hrs a day.</li> <li>Consumption of diesel = 1680 litres for 1 MVA DG set at full load @ 0.21 litres / KVA / hr.</li> <li>Stand-alone DG Sets having total capacity 1 MVA or less and equipped with acoustic enclosures alongwith adequate stack height may be exempted from the purview of Consent management. Higher capacity DG sets have already been covered under Red / Orange categories .</li> </ul>

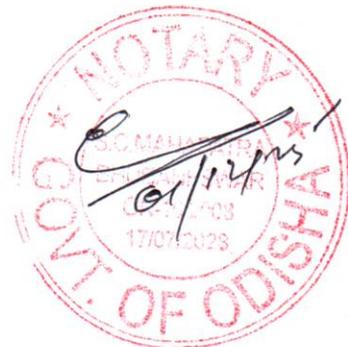


Table G-5: Final List of White Category of Industries

Sl. No.	Orgnl Sl. No.	Industry Sector	W1	W2	W	A1	A2	A	H	W+A+H	Revised Category
1.	3	Assembly of air coolers /conditioners ,repairing and servicing	--	--	--	--	--	--	--	--	G-W
2.	4	Assembly of bicycles ,baby carriages and other small non motorizing vehicles	--	--	--	--	--	--	--	--	G-W
3.	7	Bailing (hydraulic press)of waste papers	--	--	--	--	--	--	--	--	G-W
4.	9	Bio fertilizer and bio-pesticides without using inorganic chemicals	--	--	--	--	--	--	--	--	G-W
5.	11	Biscuits trays etc from rolled PVC sheet (using automatic vacuum forming machines)	--	--	--	--	--	--	--	--	G-W
6.	12	Blending and packing of tea	--	--	--	--	--	--	--	--	G-W
7.	14	Block making of printing without foundry (excluding wooden block making)	--	--	--	--	--	--	--	--	G-W
8.	21	Chalk making from plaster of Paris ( only casting without boilers etc. ( sun drying / electrical oven)	--	--	--	--	--	--	--	--	G-W
9.	25	Compressed oxygen gas from crude liquid oxygen ( without use of any solvents and by maintaining pressure & temperature only for separation of other gases)	--	--	--	--	--	--	--	--	G-W
10.	27	Cotton and woolen hosiers making (Dry process only without any dyeing / washing operation)	--	--	--	--	--	--	--	--	G-W
11.	31	Diesel pump repairing and servicing ( complete mechanical dry process)	--	--	--	--	--	--	--	--	G-W
12.	33	Electric lamp ( bulb) and CFL manufacturing by assembling only	--	--	--	--	--	--	--	--	G-W



13.	34	Electrical and electronic item assembling ( completely dry process)	--	--	--	--	--	--	--	--	G-W
14.	23	Engineering and fabrication units (dry process without any heat treatment / metal surface finishing operations / painting)	--	--	--	--	--	--	--	--	O-W
15.	35	Flavoured betel nuts production/ grinding ( completely dry mechanical operations)	--	--	--	--	--	--	--	--	G-W
16.	37	Fly ash bricks/ block manufacturing	--	--	--	--	--	--	--	--	G-W
17.	38	Fountain pen manufacturing by assembling only	--	--	--	--	--	--	--	--	G-W
18.	39	Glass ampules and vials making from glass tubes	--	--	--	--	--	--	--	--	G-W
19.	40	Glass putty and sealant ( by mixing with machine only)	--	--	--	--	--	--	--	--	G-W
20.	43	Ground nut decorticating	--	--	--	--	--	--	--	--	G-W
21.	44	Handloom/ carpet weaving ( without dyeing and bleaching operation)	--	--	--	--	--	--	--	--	G-W
22.	48	Leather cutting and stitching (more than 10 machine and using motor)	--	--	--	--	--	--	--	--	G-W
23.	51	Manufacturing of coir items from coconut husks	--	--	--	--	--	--	--	--	G-W
24.	52	Manufacturing of metal caps containers etc	--	--	--	--	--	--	--	--	G-W
25.	55	Manufacturing of shoe brush and wire brush	--	--	--	--	--	--	--	--	G-W
26.	57	Medical oxygen	--	--	--	--	--	--	--	--	G-W
27.	60	Organic and inorganic nutrients ( by physical mixing)	--	--	--	--	--	--	--	--	G-W
28.	61	Organic manure (manual mixing)	--	--	--	--	--	--	--	--	G-W
29.	63	Packing of powdered milk	--	--	--	--	--	--	--	--	G-W
30.	64	Paper pins and u clips	--	--	--	--	--	--	--	--	G-W
31.	58	Repairing of electric motors and generators ( dry mechanical process)	--	--	--	--	--	--	--	--	O-W
32.	74	Rope (plastic and cotton)	--	--	--	--	--	--	--	--	G-W



33.	76	Scientific and mathematical instrument manufacturing	--	--	--	--	--	--	--	--	G-W
34.	78	Solar module non conventional energy apparatus manufacturing unit	--	--	--	--	--	--	--	--	G-W
35.	79	Solar power generation through solar photovoltaic cell, wind power and mini hydel power (less than 25 MW)	--	--	--	--	--	--	--	--	G-W
36.	83	Surgical and medical products assembling only (not involving effluent / emission generating processes)	--	--	--	--	--	--	--	--	G-W

Note : Under the column Revised Category, the full forms of the abbreviations are as follows :

- a. R-R means original category was Red and revised category is also Red
- b. R-O means original category was Red and revised category is Orange
- c. O-O means original category was Orange and revised category is also Orange
- d. O-G means original category was Orange and revised category is Green
- e. O-W means original category was Orange and revised category is White
- f. G-O means original category was Green and revised category is Orange
- g. G-G means original category was Green and revised category is also Green
- h. G-W means original category was Green and revised category is White



## Annexure B



केन्द्रीय प्रदूषण नियंत्रण बोर्ड  
CENTRAL POLLUTION CONTROL BOARD  
(पर्यावरण एवं वन मंत्रालय, भारत सरकार)  
(MINISTRY OF ENVIRONMENT & FORESTS, GOVT. OF INDIA)

No. B-29012/ESS/CPA/2015-16

19.08.2015

Sub: "Harmonization of Classification of industries under Red / Orange / Green / White Categories".

During the Conference of the Environment Ministers of States held in New Delhi during April 06-07, 2015, it was resolved to adopt pollution potential criteria for categorization of Red, Orange & Green categories of industries and that a Committee be constituted with State representatives. Further, in the 59<sup>th</sup> Conference of Chairmen & Member Secretaries of Pollution Control Boards/PCCs held in New Delhi on April 08, 2015, it was agreed to constitute a Committee to look into categorization system of industries based on their respective pollution potential index.

2. Accordingly, a Committee comprising the Chairmen of CPCB, APPCB, TNPCB, MPPCB, MPCB, PPCB, WBPCB and MS, CPCB was constituted vide CPCB OM dated 23.04.2015 to review & classify industrial sectors into different categories based on criteria of respective pollution potential indices.
3. The existing Red ( 85 sectors) , Orange ( 73 sectors) and Green ( 86 sectors) industrial sectors have been assessed as per the proposed formula by a group of Scientists from CPCB . For this purpose , concerned Engineers / Scientists from the Member SPCBs of the Committee were also involved & consulted during May28-29, 2015.
4. After careful examination and consideration of the suggestions of concerned stake-holders the "Draft Document on Revised Concept of Categorization of Industrial Sectors " is prepared by the Committee .

In this context, the Undersigned is directed to forward a copy of the " Draft Document on Revised Concept of Categorization of Industrial Sectors to all the SPCBs, PCCs and concerned Ministries for their comments. Accordingly, the same is enclosed herewith and all the SPCBs, PCCs and concerned Ministries are, hereby requested to provide their comments by 04.09.2015. The comments may kindly be sent through hard copy as well as soft copy at e-mail: [nkgupta.cpcb@nic.in](mailto:nkgupta.cpcb@nic.in) , [nkgpcb@hotmail.com](mailto:nkgpcb@hotmail.com) .

Encl : As above

  
[N.K. Gupta]  
Incharge - ESS

To:

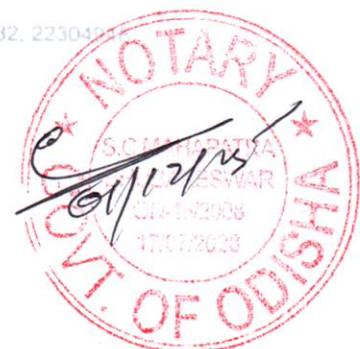
1. All the State Pollution Control Boards / Pollution Control Committees
2. The Secretary, Ministry of Micro Small and Medium Enterprises, New Delhi
3. The Secretary, Ministry of Heavy Industries & Public Enterprises, New Delhi
4. The Advisor & Incharge , CP Division, MoEFCC, New Delhi
5. CPCB Website

परिवेश भवन पूर्वी अर्जुन नगर, दिल्ली-110032

'Parivesh Bhawan', East Arjun Nagar, Delhi - 110032

दूरभाष / Tel : 43102030, फेक्स / Fax : 22305793, 22307078, 22307079, 22301932, 22304193

ई-मेल / e-mail : [cpcb@nic.in](mailto:cpcb@nic.in) वेबसाइट / Website : [www.cpcb.nic.in](http://www.cpcb.nic.in)





**STATE ENVIRONMENT IMPACT ASSESSMENT AUTHORITY, ODISHA**

5RF-2/1, Unit-IX, Bhubaneswar-751022. Tel: 0674-3512840. Email:

seiaaodisha@gmail.com

(A statutory body constituted by Ministry of Environment, Forest & Climate Change under Environment (Protection) Act, 1986)

No. 6638/SEIAA

Dt. 11.08.2025

To

The Deputy Director General of Forests (C)  
MoEF & CC, Integrated Regional Office,  
A/3, Chandrasekharpur, Bhubaneswar-751023

.....  
The Regional Officer, Bhubaneswar  
State Pollution Control Board, Odisha

.....  
The Secretary  
State Expert Appraisal Committee (SEAC), Odisha

Sub: Inspection of the Z1- Apartment Complex, Kalarahanga, Patia, Bhubaneswar in regard to comply the direction of Hon'ble NGT order dated 03.03.2025 of MA No.15/2024/EZ in O.A. 11/2022/EZ, Kolkata in the matter of Z1 Resident's Welfare Association Vrs Z Estates Private Limited & Ors.-reg.

Sir/Madam,

With reference to the above cited subject, I am directed to inform you that the Hon'ble NGT/EZ, Kolkata after hearing the above said case matter has disposed of the M.A. No. 15/2024/EZ on 03.03.2025 with direction to SEIAA, Odisha to comply the following:

- (i) **Para-25 of the order:** - *We direct the State Environment Impact Assessment Authority (SEIAA), Odisha to revisit the site in question and carry out fresh Inspection with regard to fulfillment of the conditions given in the Environmental Clearance such as 20% green cover, disposal of solid waste etc. and remedial measures and ensure that the same is duly complied with by the Project Proponent within a given time span.*

In order to comply the direction of Hon'ble NGT order dated 03.03.2025, a joint committee has been formed and decided for site inspection schedule to be held on **14.08.2025 at 11.00AM** by the Joint Committee consisting the following members:

1. Prof. (Dr.) B.K. Satapathy (Member, SEAC)
2. Dr. Sohan Giri, Regional Officer, SPCB, Bhubaneswar
3. Shri M. Prasad, Scientist 'C', MoEF & CC, Govt. of India, IRO, Bhubaneswar
4. Dr. Pradeepta Kumar Nayak, Environmental Scientist, SEIAA, Odisha



Therefore, the said Committee Members, the representative of Z1-Apartment Complex and Z1-Builder Estates Pvt. Ltd. are requested to remain present on above mentioned date and time at Z1-Apartment Premises, Kalarahanga, Patia, Bhubaneswar.

This is for your kind information and necessary response.

Yours faithfully,

*Rono* 11/08/2025

Environmental Scientist



Item No.07

Court No.1

**BEFORE THE NATIONAL GREEN TRIBUNAL  
EASTERN ZONE BENCH, KOLKATA  
(THROUGH PHYSICAL HEARING WITH HYBRID MODE)**

Miscellaneous Application No.15/2024/EZ

In

Original Application No.11/2022/EZ

Z1 Resident's Welfare Association Applicant(s)  
Versus  
Z Estates Private Limited & Ors. Respondent(s)

Date of hearing : 19.02.2025

Date of uploading : 03.03.2025

**CORAM: HON'BLE MR. JUSTICE B. AMIT STHALEKAR, JUDICIAL MEMBER  
HON'BLE DR. ARUN KUMAR VERMA, EXPERT MEMBER**

For Applicant(s) : Mr. Sankar Prasad Pani, Adv. a/w  
Mr. Ashutosh Padhy, Adv. (in Virtual Mode)

For Respondent(s) : Mr. Soorjya Ganguli, Adv. a/w  
Ms. Pooja Chakrabarti, Adv. and  
Ms. Devanshi Prasad, Adv. for R-1 & 2 (in Virtual Mode),  
Mr. Apurba Ghosh, Adv. for R-3 (in Virtual Mode),  
Ms. Papiya Banerjee Bihani, Adv. for R-4 (in Virtual Mode),  
Mr. Ashok Prasad, Adv. for R-5 & 6,  
Ms. Amrita Pandey, Adv. for R-7 (in Virtual Mode)

**ORDER**

1. Mr. Sankar Prasad Pani, assisted by Mr. Ashutosh Padhy, learned Counsel is present (in Virtual Mode) on behalf of the Applicant.
2. Affidavit dated 18.02.2025 has been filed on behalf of the Respondent No.3, State Environment Impact Assessment Authority (SEIAA), Odisha; the same is taken on record.
3. Affidavit dated 18.02.2025 has been filed by the Respondent No.7, Ministry of Environment, Forests and Climate Change (MoEF&CC); the same is taken on record.

***(The final order of this case shall be uploaded in the NGT Website by separate sheets of paper)***

.....  
**B. Amit Sthalekar, JM**

.....  
**Dr. Arun Kumar Verma, EM**

February 19, 2025,  
Miscellaneous Application No.15/2024/EZ  
In  
Original Application No.11/2022/EZ  
SKB



Item No.07

Court No.1

**BEFORE THE NATIONAL GREEN TRIBUNAL  
EASTERN ZONE BENCH, KOLKATA  
(THROUGH PHYSICAL HEARING WITH HYBRID MODE)**

Miscellaneous Application No.15/2024/EZ  
In  
Original Application No.11/2022/EZ

Z1 Resident's Welfare Association ..... Applicant(s)  
Versus  
Z Estates Private Limited & Ors. .... Respondent(s)  
Date of hearing : 19.02.2025  
Date of uploading : 03.03.2025

**CORAM: HON'BLE MR. JUSTICE B. AMIT STHALEKAR, JUDICIAL MEMBER  
HON'BLE DR. ARUN KUMAR VERMA, EXPERT MEMBER**

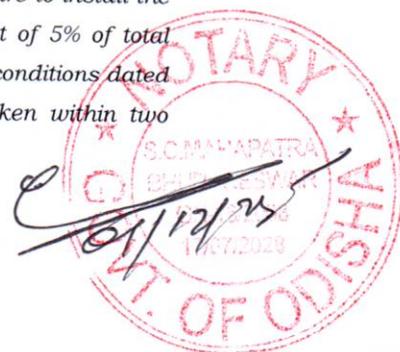
For Applicant(s) : Mr. Sankar Prasad Pani, Adv. a/w  
Mr. Ashutosh Padhy, Adv. (in Virtual Mode)  
For Respondent(s) : Mr. Soorjya Ganguli, Adv. a/w  
Ms. Pooja Chakrabarti, Adv. and  
Ms. Devanshi Prasad, Adv. for R-1 & 2 (in Virtual Mode),  
Mr. Apurba Ghosh, Adv. for R-3 (in Virtual Mode),  
Ms. Papiya Banerjee Bihani, Adv. for R-4 (in Virtual Mode),  
Mr. Ashok Prasad, Adv. for R-5 & 6,  
Ms. Amrita Pandey, Adv. for R-7 (in Virtual Mode)

**ORDER**

1. This Tribunal vide its judgment and order dated 01.05.2023 had disposed of the Original Application No.11/2022/EZ (*Z1 Residents' Welfare Association Vs. Z Estates Private Limited & Ors.*) with the following directions:-

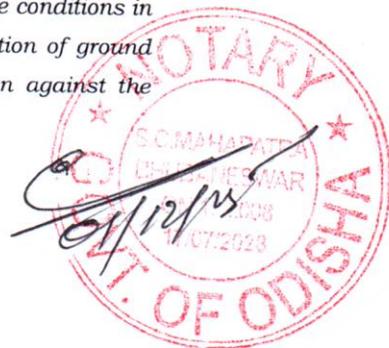
*"48. We may, therefore, summarise the directions given by us hereinabove as under:-*

- (A) *The SEIAA, Odisha, shall inspect the site in question within one month and verify whether installation of Solar Power Generation System for Phase-I and installation of Solar Water Heater which was required to be completed by 31.08.2022 as stated by the Project Proponent, has been completed and if not, appropriate penalty shall be imposed against the Project Proponent and the same shall be recovered within two months after giving him an opportunity of being heard.*
- (B) *The SEIAA, Odisha, is further directed to determine Environmental Compensation against the Project Proponent for failure to install the Solar System for energy conservation to the extent of 5% of total power as required by the Environmental Clearance conditions dated 16.08.2011 and action in this regard shall be taken within two*



months after giving the Project Proponent an opportunity of being heard.

- (C) The State Pollution Control Board, Odisha, shall verify as to whether the vent height of the D.G. set stack which is at present 6.06 meters for the ground level is adequate, considering that the Environmental Clearance requires the same to be more than the highest building height.
- (D) The State Pollution Control Board, Odisha, is also directed to compute Environmental Compensation against the Applicant's Association for violation of STP norms w.e.f. 01.04.2021 when the Phase-I was handed over to the Association by the Project Proponent within two months after giving them an opportunity of being heard.
- (E) The State Pollution Control Board, Odisha, shall also take action against the Applicant's Association for non-compliance of the Solid Waste Management regime, if any, w.e.f. 18.01.2021 when the Phase-I of the site in question was handed over to the Applicant's Association.
- (F) The Central Ground Water Board shall determine the penalty for violations with regard to recharge of borewells and their pits as committed by the Project Proponent and thereafter recover the same from the Project Proponent within two months after giving him an opportunity of being heard.
- (G) With regard to completion of Green Belt and Avenue Plantation over at least 20% of the site area as required by the Environmental Clearance conditions dated 16.08.2011, the Committee constituted by the Tribunal is directed to re-visit the premises of the Project Proponent and verify whether at least 20% of the Green Belt has been achieved by the Project Proponent and if not, appropriate Environmental Compensation shall be determined against the Project Proponent and the same shall be recovered within two months after giving him an opportunity of being heard.
- (H) The Ministry of Environment, Forests and Climate Change, shall verify as to how the Central Ground Water Board granted the NOC to the Project Proponent for extraction of ground water in violation of the Special Conditions laid down in the Environmental Clearance dated 16.08.2011 that no ground water shall be extracted for the project work at any stage during the construction phase and if the concerned officers of the Central Ground Water Board are found to have acted in violation of the Environmental Clearance conditions in granting the NOC to the Project Proponent for extraction of ground water, appropriate disciplinary action shall be taken against the



concerned officers of the Central Ground Water Board by the Appointing Authority.

- (1) The Ministry of Environment, Forests and Climate Change, shall also verify the conduct of the officers of SEIAA, Odisha, who were in position at the relevant point of time with regard to strict enforcement of the conditions laid down in the Environmental Clearance prior to granting subsequent Environmental Clearances and if dereliction in discharge of their duties is found, appropriate adverse entries shall be given to the concerned officers of SEIAA, Odisha, in their ACRs by the Appointing Authority.

49. With the observations and directions made hereinabove, the Original Application No.11/2022/EZ is accordingly disposed of."

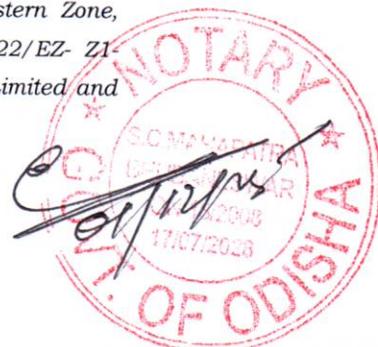
2. The present M.A. has been filed by the Applicant, Z1 Residents' Welfare Association, seeking the following reliefs:-

- a) "Direct the Respondents to show cause why the criminal proceedings shall not be initiated for violation of the order of the Hon'ble Tribunal dated 1<sup>st</sup> May 2023 paragraph 48 (except point D&E).
- b) Direct the Respondent to show cause what steps they have taken to implement the order of Hon'ble NGT dated 1<sup>st</sup> May 2023 paragraph 48 (except point D&E).
- c) Direct SEIAA and CGWA to file their compliance report.
- d) Failure to provide satisfactory explanation the Hon'ble Tribunal may direct for the appropriate proceedings as provided under Section 26 and 28 of the NGT Act, 2010.
- e) Pass such order/s as this Hon'ble Tribunal may deem fit and proper in the facts and circumstances of this case."

3. The State Environment Impact Assessment Authority (SEIAA), Odisha has filed its affidavit dated 01.05.2024 bringing on record an Inspection Report of the Joint Committee of an inspection carried out on 13.07.2023 which reads as under :-

**"Inspection report of the Joint Committee visited on 13.07.2023, in the matter on violation of conditions stipulated in the EC by the Builders Z-Estates Pvt. Ltd on Construction of Housing colony and shopping mall (Phase-I) at Kalarahanga, Patia, Bhubaneswar.**

As per the direction of the Hon'ble NGT, Eastern Zone, Kolkata order dated 01.05.2023 in O.A. No. 11/2022/EZ- Z1 Residents' Welfare Association Vrs Z- Estates Private Limited and



Ors, a joint committee has been constituted comprising of the following members and the committee visited the project site on 13.07.2023:

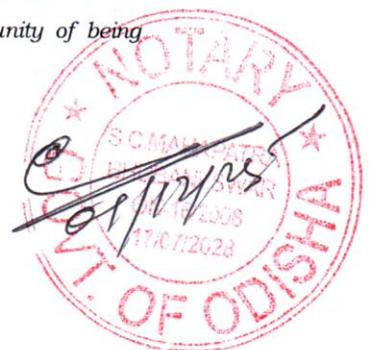
1. Prof. (Dr.) B.K. Satapathy (Member, SEAC)
2. Dr. Rebati Kanta Mishra, Environmental Scientist, SPCB, Odisha
3. Dr. Chittaranjan Panda (Member, SEAC)
4. Dr. Pradeept Kumar Nayak, Environmental Scientist, SEIAA, Odisha

In addition to the above committee members, the following representatives and villagers were also present during the site visit: -

1. Sri Ashok Kumar Tripathy, IAS (Rtd.)  
Member/Representative, Z1-Welfare Apartment Society
2. Sri Malay Panigrahi, Member/Representative, Z1-Welfare Apartment Society
3. B. N. Panda Member/Representative, Z I-Welfare Apartment Society
4. Sri Partha Sarathi Panda, Representative Z- Estates Private Limited
5. Sri Radhaprasad Das Representative Z- Estates Private Limited

As per direction, the Joint Committee to visit the site and examine the facts and submit report on the following points:

- i. The SEIAA, Odisha, shall inspect the site in question within one month and verify whether installation of Solar Power Generation System for Phase-I and installation of Solar Heater which was required to be completed by 31.08.2022 as stated by the Project Proponent, has been completed and if not, appropriate penalty shall be imposed against the Project proponent and the same shall be recovered within two months after giving him an opportunity of being heard.
- ii. The SEIAA, Odisha, is further directed to determine Environmental Compensation against the Project Proponent for failure to install the Solar System for energy conservation to the extent of 5% of total power as required by the Environmental Clearance (EC) conditions dated 16.08.2011 and action in this regard shall be taken within two months after giving the Project Proponent an opportunity of being heard.

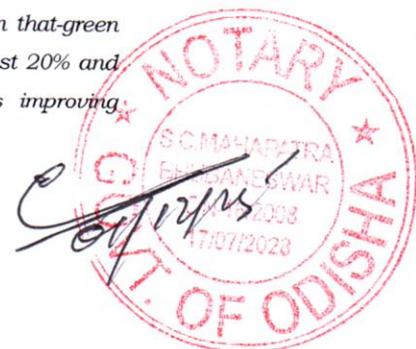


- iii. With regard to completion of Green Belt and Avenue Plantation over at least 20% of the site area as required by the Environmental Clearance dated 16.08.2011, the Committee constituted by the Tribunal is directed to re-visit the premises of the Project Proponent and verify whether at least 20% of the Green Belt has been achieved by the Project Proponent and if not, appropriate Environmental Compensation shall be determined against the Project Proponent and the same shall be recovered within two months after giving him an opportunity of being heard.

Accordingly, the Joint Committee comprising of the above-mentioned official had visited the site on 13.07.2023 and observed the following after details assessment:

**Overall Observation:**

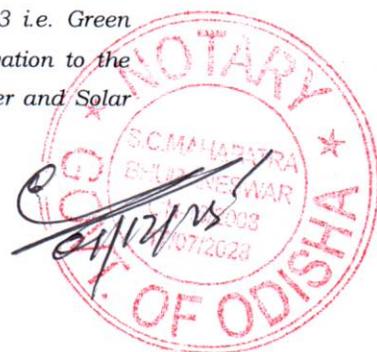
1. During site inspection the Committee has observed that the Phase-I project had already been completed and people are staying there, and Phase-II project also completed and people are staying there but the Phase-III project is under construction. The Phase-I, II & III projects are integrated project in the same campus with single boundary.
2. There is no use of Solar Power Generation System for Phase-I building only installation of Solar Heater which were under process (i.e. some equipment's for connection of Solar Heaters are installed in the roof top but not completed and not operational during the time of visit) which was required to be completed by 31.08.2022 as committed by the Project Proponent, and not completed as verified by the committee during the joint visit.
3. As the Project Proponent has not installed any Solar Power Generation System i.e Solar streetlight and Solar Heater etc and nothing operational, the Solar System for energy conservation to the extent of 5% of total power as required by the Environmental Clearance (EC) conditions dated 16.08.2011 is not complied by the Project Proponent as observed by the Joint Committee.
4. Initially, EC was issued by SEIAA, Odisha vide letter no. 433/SEIAA dt. 16.08.2011 where it was mentioned that the plot area is 1,05,962.07 sqm, total built-up area 2,44,092.73 sqm and condition given in EC letter for plantation that-green belt & avenue plantation of trees should be at least 20% and shall be done using native tree species/plants improving.



- greenery. EC obtained for entire project and nowhere, it is mentioned that EC granted for Phase-I or Phase-II etc.
5. The EC amended by SEIAA; Odisha vide letter no. 827/SEIAA dt. 23.02.2016 where the plot area was revised 1,05,962.07 sqm to 1,23,717 sqm (i.e. Phase-I + Phase-II) and built-up area revised to 2,44,092.73 sqm to 1,85,904.880sqm. (i.e. for phase-I + Phase-II).
  6. Finally, EC obtained from SEIAA, Odisha vide letter no. 7991/SEIAA dt. 17.03.2020 where it was mentioned that the plot area for Phase-I & Phase —II is 1,23,717 sqm and total built-up area is 73,968.9 sqm (Phase-I) and 1,11,945.98 sqm (Phase-II), provision for green belt-30,929.22 sqm (i.e. for Phase-I & Phase-II). Similarly, total plot area for Phase-III is 17,873.23 sqm and Built-up area 2,09,960.21 sqm, green belt area provision is 20,922.87 sqm.
  7. As per the site visit and Google earth map KML file it reveals that there is no separate boundary for phase-I, Phase-II and Phase-III. The green-belt of Phase-I is approximately 9000 sqm. area Phase-II it is approximately 11000 sqm. area and in together it is 20,000 sqm. (Phase-I & Phase-II). But in EC letter issued vide letter no. 7991/SEIAA dt. 17.03.2020 was mentioned that the green belt- area shall be 30,929.22 sqm (i.e. for Phase-I & Phase-II) which is not complied by the Project Proponent. The Green belt and Avenue Plantations are available and shown by the Project Proponent during joint visit revealed that the tree species are planted only adjacent to boundary wall of project area and rest of the area with lawns and some decorated plant. Tree species are very less with comparison to lawns area including ornamental and decorated plant. During joint visit Z1-Residents' Welfare Association members informed that they want to remove some tree species planted in the lawn area as there is an underground basement parking and green belt i.e. lawn was developed over the underground basement parking thus, there may be chances of cracking the basement, so they want to remove the planted tree.

#### **Environmental Compensation**

Overall, the committee observed that this is a case of violation of EC conditions and the project proponent has failed in their commitments to comply EC conditions on 31.08.2023 i.e. Green belt/Plantation and Solar System for energy conservation to the extent of 5% of total power through solar water heater and Solar



Power Generation System for its use etc. Hence, the environmental compensation has been calculated as below:

**Environment Compensation to be levied for various violation by Industrial Units: -**

In absence of any formula for calculation of Environment Compensation due to violation of EC conditions for building and construction project. The committee adopted the CPCB formula applicable for environmental compensation for the industries is calculated, following below formula:

$$EC = PI \times N \times R \times S \times LF$$

$$EC = 80 \times 377 \times 250 \times 1.5 \times 1.25 = \text{Rs. 1,41,37,500/-}$$

Where,

EC is Environmental Compensation in ₹

PI = Pollution Index of industrial sector (taken 80 red category industries)

N = Number of days of violation took place (377 days i.e. 31.08.2022 to 13.07.2023)

R = A factor in Rupees (₹) for EC (Taken Rs.250/- as per CPCB recommendation)

S=Factor for scale of operation (Taken 1.5 a= for large category)

LF = Location factor (Taken 1.25)

**Pollution Index (PI)**

The range of Pollution Index for Red, Orange and Green is 60 to 100, 41 to 59 and 21 to 40, respectively.

The following values of PI have been suggested in the CPCB report: —

Category	Red	Orange	Green
PI	80	50	30

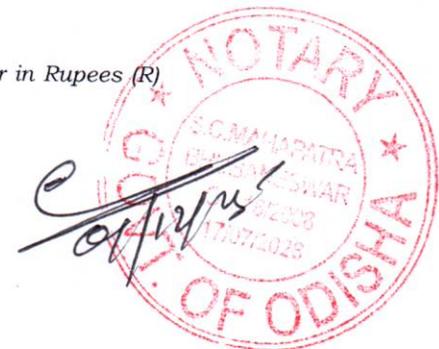
Wastewater generation is 602 KLD and it will be treated in 650 KLD STP Capacity, so it is considered as Red category project as per CPCB guidelines.

**Number of days (N)**

N, number of days for which violation took place is the period between the day of violation observed/due date of direction's compliance and the day of compliance verified by Regional Office.

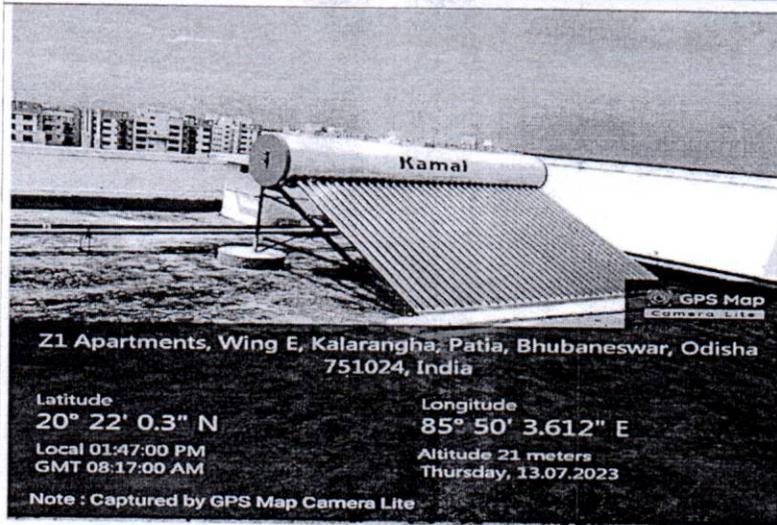
**Factor in Rupees (R)**

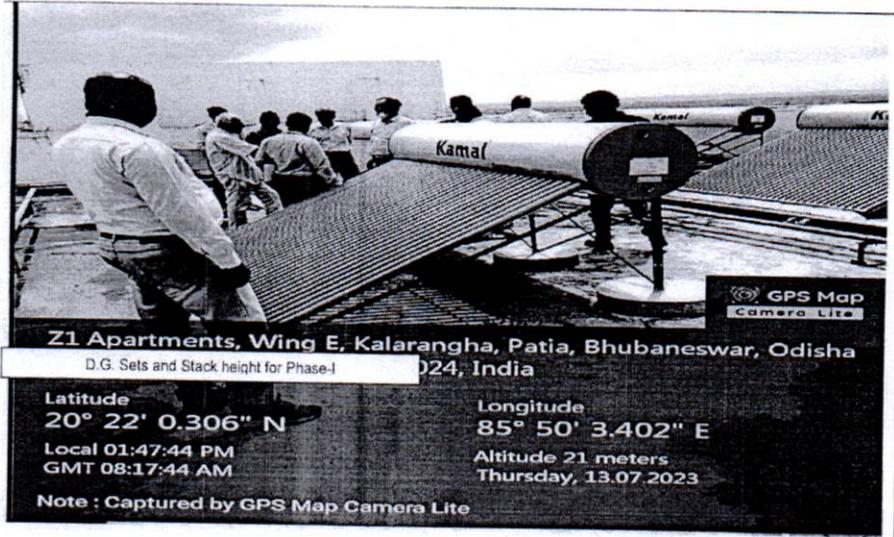
The minimum of 100 and maximum of 500 of factor in Rupees (R) mentioned in report of CPCB.

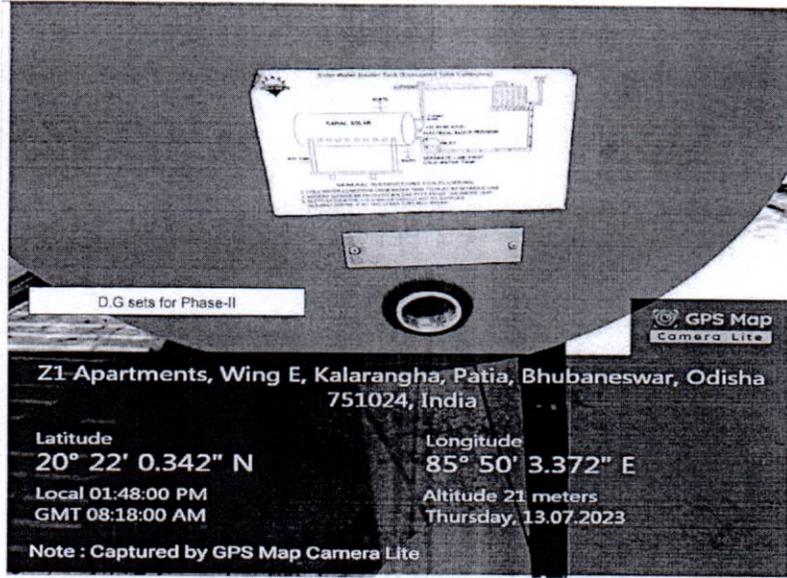


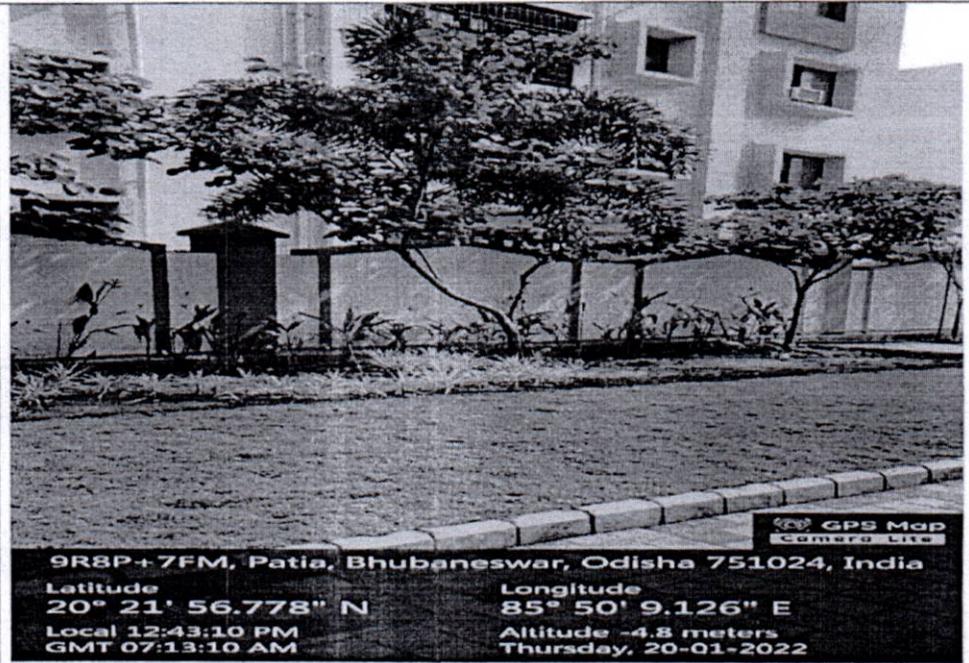
**Recommendation of the Committee**

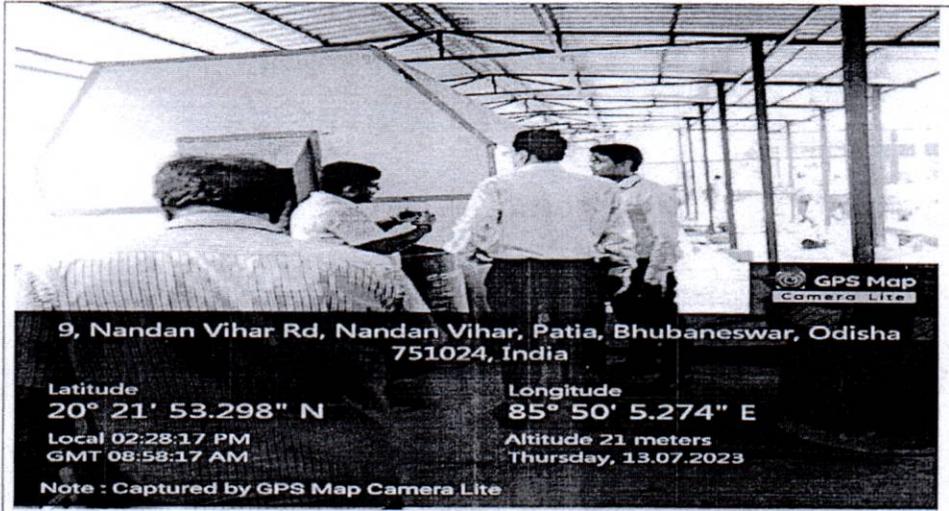
The Project proponent shall deposit the above-mentioned amounting of Rs. 1.41,37,500/-to Forest, Environment & CC Dept., Govt. Odisha and that amount to be used for remedial measure for Plantation and installation of Solar light & Solar Heater of Z-1 Building.











9, Nandan Vihar Rd, Nandan Vihar, Patia, Bhubaneswar, Odisha 751024, India

Latitude 20° 21' 53.298" N

Longitude 85° 50' 5.274" E

Local 02:28:17 PM  
GMT 08:58:17 AM

Altitude 21 meters  
Thursday, 13.07.2023

Note : Captured by GPS Map Camera Lite



Flat 231, Northern Heights, Kalarangha, Patia, Bhubaneswar, Odisha 751024, India

Latitude 20° 21' 53.862" N

Longitude 85° 50' 5.718" E

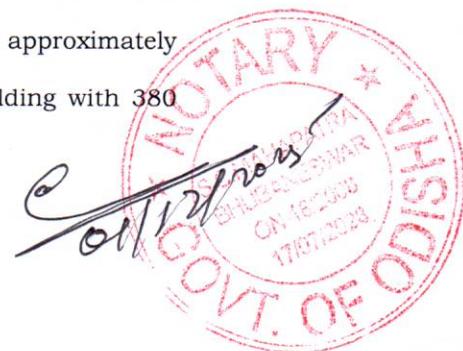
Local 02:29:14 PM  
GMT 08:59:14 AM

Altitude 21 meters  
Thursday, 13.07.2023

Note : Captured by GPS Map Camera Lite



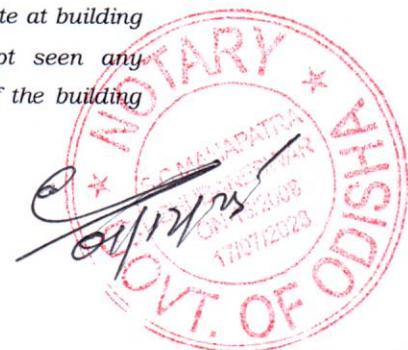
4. It is stated that this is a case of violation of Environmental Clearance conditions and the Project Proponent (PP) has failed in their commitment to comply Environmental Clearance conditions by 31.08.2023 i.e. green belt/plantation and Solar System for energy conservation to the extent of 5% of total power through solar water heater and Solar Power Generation System for its use. It is stated that the Inspection Committee heard one Mr. Tapan Kumar Mohanty, Chief Managing Director, Z Estates Private Limited and the Project Proponent agreed that 20% green belt has not been achieved for Phase-I as there is no permanent boundary of Phase-I for plantation in boundary area and only avenue plantation was there. He also stated that the entire project is an integrated and interlinked building and construction project of Phase-I, Phase-II and Phase-III of Z1 Estates Pvt. Ltd.; Phase-I and Phase-II have already been completed and Phase-III is under construction.
5. It is informed that the Z1 Estates Pvt. Ltd. has completed all setup for roof top Solar Heater but the same is not working as the Z1 Resident's Welfare Association is not allowing to operate it due to some issues for pipeline connection from their side. Accordingly, SEIAA, Odisha decided that the PP has not installed Solar Power Generation System (SPGS) for Phase-I and installation of Solar Heater operation is incomplete which was required to be completed by 31.08.2022 and therefore, for overall violations of the conditions of the Environmental Clearance noted by the Committee. Environmental Compensation amounting to Rs.1,41,37,500/- has been computed as on 13.07.2023 and the Builder was intimated by the SEIAA, Odisha to deposit the same within 15 days.
6. The Odisha State Pollution Control Board has filed its affidavit and it is stated that three D.G. sets have been installed approximately 48 to 50 mtrs. away from the nearest dwelling building with 380



KVA capacity each and with well protected cover shed and acoustic closure ; the stack height of each is 6.06 mtrs. from the upper part of the D.G. set. It is stated that as per the guidelines of the Central Pollution Control Board (CPCB), the stack height of each D.G. set is not adequate taking into consideration that all the D.G. sets have been placed at a safe zone from the building distance but as per CPCB guidelines the stack height has to be raised upto 48.89 mtrs. from the ground level with respect to the wall height of the residential/tower with all safety arrangements.

7. With regard to malfunctioning of Sewage Treatment Plant (STP), it is stated that since the unit was handed over to the Residential Association w.e.f. 01.04.2021, Environmental Computation has been computed at Rs.2,23,50,000/- (Rupees two crore twenty three lakh fifty thousand only). It is stated that the actual number of violations days comes to 894 days.
8. As regards non-compliance of the Solid Waste Management regime w.e.f. 18.01.2021, it is stated that when Phase-I of the site was handed over to the Applicants Association, the Board has relied on the Joint Committee Inspection carried out on 20.01.2022, para 9 of which reads as under :-

*“9. Solid Waste Management: PA showed a copy of agreement letter on dated 08.06.2020 with authorized party of M/s. Clean Mart Facility Services, Plot No.78, Rasulgarh Square, Bhubaneswar-10, Odisha for collection of solid waste from the premise of Z-Estate for the period 1<sup>st</sup> May 2020 to 31<sup>st</sup> March 2021. It was informed by PA that initially internal collection of solid waste was managed by them systematically till handover the Z-1 building to the Association and then it was managed by them. Now they are not aware of renewal of any such contact by the association. The PA has not installed any composting machinery for decomposition and reuse of bio-degradable waste at building premises of Phase-I. The Committee has not seen any community dustbin has been placed outside of the building*





- (1) The Z Estate Pvt. Ltd., who is the Builder cum Developer of Z1 Project, was managing and maintaining all activities of Z1 Advait (Phase I) till 31<sup>st</sup> March 2021. Therefore, Z1 Estate Pvt. Ltd. is accountable for providing information on this issue during the period from 2016 to 31<sup>st</sup> March 2021.
- (2) Although the Builder handed over the management of Z1 Advait Block comprising 8 towers of 444 flats on 01.04.2021, there was no infrastructure created by him like installation of compost machine of appropriate capacity for disposal of biodegradable wet waste.
- (3) Z1RWA continued disposing the wet and dry waste by engaging one contractor on payment basis who collected the waste daily and get them disposed of in the BMC collection site.
- (4) It may be pertinent to put on record that this complex of Z1 was part of Kalarahanga Panchayat and only from 24.03.2021 it came under Bhubaneswar Municipal Corporation.
- (5) The builder intimated us vide letter dtd : 2.06.2023 that, it had installed the compost machine near phase II (VYOM) of Z1 Project. But we were allowed to use the same w.e.f. 16.07.2023 after finalization of per month charge amounting to Rs.66,981/- after lots of communications and deliberations.
- (6) Unfortunately the Builder could not maintain the compost machine properly and the machineries have been removed and composting activity was stopped by the Builder w.e.f 20.08.2023.
- (7) As Z1 premises under Kalarahanga Panchayat were already come under the ambit of BMC, we are collecting the segregated waste from the flats and commercial establishment in phase I and handing over the wastage to BMC w.e.f 28.10.2023 after a negotiation.
- (8) A detailed information was also provided to regional office, vide our letter No.Z1RWA/Aug23/014 dt.27.08.2023.

## II. Stack Height of DGs:

Regarding stack height, it is hereby informed that no further step has been taken by the Builder to increase the height from the existing 06 Mtrs to 52.75 Mtrs as required as per EC norm. Therefore, the violation by the Builder continues in terms of the stack height of DGs.

This is for your kind information and necessary action.

Yours faithfully  
For Z1RWA  
SECRETARY"



10. It is stated that vide letter dated 29.12.2023, addressed to the Central Ground Water Board, the following information was sought but it is stated that till date in spite of reminder letter dated 22.07.2024, no reply has been received from the Central Ground Water Board (CGWB) :-
- i. *The background in the Order states that PP are accused of operating without NOC from CGWB while direction (H) states that CGWB NOC was granted. Please confirm the status of NOC for the project from CGWB.*
  - ii. *Did the CGWB verify the EC condition w.r.t NoC granted to the project for extraction of ground water?*
  - iii. *Is there any SOP or checklist for granting NOC by CGWB for projects which require EC?"*
11. The Odisha State Pollution Control Board (OSPCB) in its affidavit dated 20.08.2024 has stated that the Board vide its letter dated 12.07.2024 has directed the Respondent No.1 to install the Retrofit Emission Control Device (RECD) at the exhaust muffler of the D.G. set to minimize the particulate emission by 70% as per circular dated 06.10.2023 issued by the Respondent No.4 Board. It is also stated that the Respondent No.1 Unit has submitted its reply dated 19.07.2024 stating that the Applicant's Association insisted on increasing the stack height as the Unit has already handed over the Project to the RWA Z1 Advait since 01.04.2021.
12. The Central Ground Water Board in its affidavit dated 11.08.2024 has stated that recharge structures constructed by the Project Proponent are not maintained properly and has imposed a penalty of Rs.2,00,000/- (Rupees two lakh only) under Section 5 of the Environment (Protection) Act 1986 and directed the same to be deposited within two months and the Project Proponent has deposited the penalty on 13.07.2024.



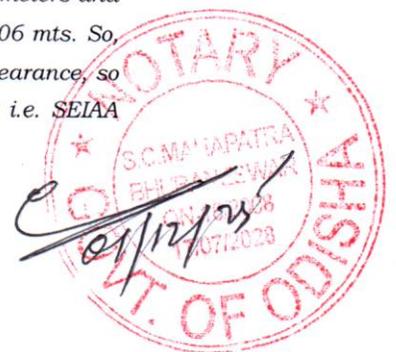
13. The OSPCB in its affidavit dated 30.11.2024 has further stated that the Unit has failed to comply the conditions of Environmental Clearance dated 16.08.2011 accorded by the SEIAA, Odisha and the Board has requested SEIAA, Odisha vide its letter dated 12.11.2024 to initiate appropriate action for violation of the condition of Environmental Clearance against the Project of the Applicant. The relevant extract of the letter dated 12.11.2024 at page 254 and 255 of the paper book reads as under :-

*“Taking into cognizance of the above, a letter was sent to M/s Z Estate Private Limited vide LNo.2531 dated 12.07.2021 for necessary compliance regarding the height of the stack connected to the DG sets (3 Nos) to more than 48.89 m from Ground level. In response to the said letter, the builder has submitted a letter to this office citing various reasons that the height of the stack is adequate & it has already handed over the society of Phase I to RWA Z1 Advait. A letter was then again sent to Z1 RWA (Phase-I) from this office to comply the Hon’ble NGT order vide Letter No.2886 dated 17.08.2024. But no response has been received from RWA end. Affidavit has been already filed on dated 20.08.2024 regarding this matter by SPCB and Hon’ble NGT has also been taken in records as per the Hon’ble NGT order dtd 23.08.2024 in relation to the MA No.15/2024/EZ.*

*It is to mention that while granting Environmental Clearance for Phase I Project of Z1 Estate Pvt. Ltd. by SEIAA vide Reference No. 133/SEIAA dated 16.08.2011 it has been mentioned in the stipulated conditions under “Operational Phase” (Point No. V) in relation to the height of the DG set common stack that:-*

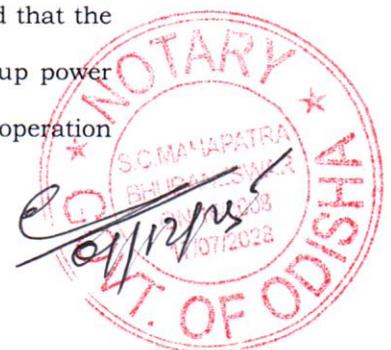
***“The height of the stack of the DG sets should be equal to the height needed for the combined capacity of all the proposed DG sets put together and should be more than the highest building height.”***

*The height of the nearest building is more than 40 meters and the height of the stack connected to DG sets is 6.06 mts. So, as this is a gross violation of the Environmental Clearance, so direction may be given to action taking authority i.e. SEIAA*



*through proper channel for the said non-compliance and intimation regarding it may kindly be acknowledged to Hon'ble NGT as the matter is going to be placed in the next date of hearing which is on 13.11.2024."*

14. The SEIAA, Odisha in its affidavit dated 18.02.2025 has stated that Environmental Compensation amounting to Rs.1,41,37,500/- has been calculated and intimated to the Builder vide letter dated 16.03.2024 to deposit the same with the Forest, Environment and Climate Change Department, Government of Odisha within 15 days but instead of depositing the Environmental Compensation, the ZI Builder has filed an Appeal before the Tribunal being Appeal No.08/2024/EZ and the same is still pending.
15. It is further stated that Environmental Clearance was issued by the SEIAA, Odisha to the Project Proponent on 16.08.2011 for construction of Housing Colony and Shopping Mall for Block B+G+12, 6 B+G+14, 17 B+G+19, 2 B+G+24 and 1 over plot area 1,05,962.07 sqm. for total built up area of 2,44,092.73 sqm. at Kalarahanga, Bhubaneswar, District – Khordha.
16. It is further stated that an amended Environmental Clearance was issued on 23.02.2016 for modernization-cum-expansion for construction of Housing Colony and Shopping Mall (Phase-I and Phase-II) with total built up area of 2,75,042 sqm. located at Kalarahanga ; Environmental Clearance letter was issued vide letter dated 17.03.2020 for expansion of Housing Colony and convenient shopping (Phase-III) over plot area of 17873.23 sqm. and Built up area 2,09,960.21 sqm. at Kalarahanga, Bhubaneswar to M/s Z Estates Pvt. Ltd.
17. It is stated that the conditions given in point B(v) in the Environmental Clearance letter dated 16.08.2011 provided that the diesel power generating sets proposed as source of backup power for lift elevators and common area illumination during operation



phase, should be of enclosed type and conform to Environmental Protection (EP) Rules, 1986. It was stated that *the height of the stack of D.G. set should be equal to the height needed for the combined capacity of all proposed D.G. sets put together and should be more than the highest building height* ; Lower Sulfur Diesel should be used ; the locations of the D.G. set may be decided in consultation with the OSPCB ; care may be taken to avoid disposal of smoke/pollutants from D.G. sets in the residential area. It is stated that during issue of Environmental Clearance for Phase-III, a Sub-Committee of State Expert Appraisal Committee (SEAC) visited the project site on 25.10.2019 and observed that the stack height of Phase-I and Phase-II were inadequate and negligible and it was opined that the Project Proponent must submit a design as applicable for such Housing Project as per Ministry of Environment, Forests and Climate Change (MoEF&CC)/Central Pollution Control Board (CPCB) guidelines and it was also directed that Project Proponent must replace/correct the stack height as necessary for the existing area and for Phase-II and Phase-III. It is stated that based on the SEAC recommendations, the condition given in point 37 in the Environment Clearance letter dated 17.03.2020 that gaseous emission from D.G. sets shall be dispersed through adequate stack height as per CPCB standards ; Acoustic enclosure shall be provided to D.G. Sets to mitigate the noise pollution ; lower sulfur diesel shall be used ; locations of D.G. set and exhaust pipe height shall be as per the provisions of the CPCB guidelines.

18. It is stated that nowhere has the SEIAA, Odisha mentioned in the Environmental Clearance letter dated 16.08.2011, 23.02.2016 and 17.03.2020 for the stack height that the stack height of the D.G. set should be 6.06 mtrs. It is stated that the Regional Office of MoEF&CC, Bhubaneswar has submitted certified Compliance

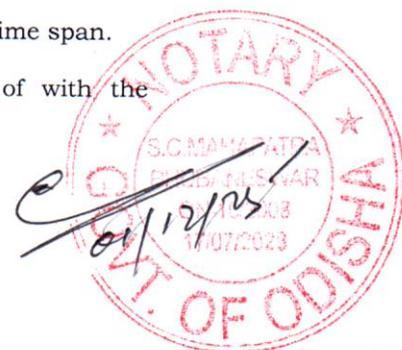


Report on 26.03.2015 and 13.12.2018 of the Environmental Clearance letter dated 16.08.2011 and 23.02.2016 respectively mentioning that point No.B(v) in the Environmental Clearance letter dated 16.08.2011 is complied with also mentioning that the height of the common stack of 380 KVA D.G. sets is 6.06 mtrs. and the fuel used in D.G. sets is low Sulphur type.

19. It is stated that State Expert Appraisal Committee (SEAC) verified the certified Compliance Report of the Integrated Regional Office of MoEF&CC, Bhubaneswar dated 26.03.2015 and 13.12.2018 and recommended Environmental Clearance subsequently for building project and therefore, there was no negligence of any Officer of the SEAC Committee member during consideration of recommendations for grant of Environmental Clearance for the building and construction project.
20. Mr. Apurba Ghosh, learned Counsel for SEIAA, Odisha has referred to the relevant paragraphs of the affidavit of SEIAA, Odisha referred to hereinabove and submitted that in view of the averments made, the direction given in the order of the Tribunal dated 20.12.2024 for taking action against the Officer concerned of SEIAA, Odisha be recalled.
21. Considering the averments in the affidavit, we recall our order dated 20.12.2024 in so far as it directs action to be taken against the Officer of SEIAA, Odisha in view of the averments made in the affidavit of SEIAA, Odisha referred to hereinabove. However, the SEIAA, Odisha is cautioned to be very careful and alert in future and not to grant any Environmental Clearance for a Project or expansion thereof without first verifying whether the Environmental Conditions granted by it previously have been fully complied with or not.



22. Considering that Environmental Compensation has already been determined for violation of the Environment Clearance conditions, nothing further remains for adjudication in the present case except directing the Odisha State Pollution Control Board and State Environment Impact Assessment Authority to ensure that the D.G. sets height is as per the CPCB guidelines and is higher than the nearest building.
23. We also find that since Environmental Compensation has already been determined and an Appeal against the same has been filed by the aggrieved party, it is not necessary to make any observation in that regard which might prejudice the case of the Appellant.
24. The Applicant has filed rejoinder affidavit dated 20.02.2025 reiterating the contents of his Original Application as well as the directions given by the Tribunal in its order dated 01.05.2023 disposing of the Original Application and it is stated that the Project Proponent has a mandate to have a green belt in an area of 20% of the area of Phase-I of the project which he has failed to carry out. It is also stated that as of now the society is handing over the solid waste of the society to a third party agency and biodegradable waste to the composter installed in Phase-II project but the composter has stopped working and no remedial measures have been taken by the Project Proponent.
25. We direct the State Environment Impact Assessment Authority (SEIAA), Odisha to revisit the site in question and carry out fresh Inspection with regard to fulfillment of the conditions given in the Environmental Clearance such as 20% green cover disposal of solid waste etc. and remedial measures and ensure that the same is duly complied with by the Project Proponent within a given time span.
26. The present Miscellaneous Application is disposed of with the aforesaid observation.



27. There shall be no order as to costs.

.....  
**B. Amit Sthalekar, JM**

February 19, 2025,  
Miscellaneous Application No.15/2024/EZ  
In  
Original Application No.11/2022/EZ  
SKB

.....  
**Dr. Arun Kumar Verma, EM**





**STATE ENVIRONMENT IMPACT ASSESSMENT AUTHORITY, ODISHA**

5RF-2/1, Unit-IX, Bhubaneswar-751022, Tel: 0674-3512840, Email:

seiaaodisha@gmail.com

(A statutory body constituted by Ministry of Environment, Forest & Climate Change under Environment (Protection) Act, 1986)

No. 6638/SEIAA

Dt. 11.08.2025

To

The Deputy Director General of Forests (C)  
MoEF & CC, Integrated Regional Office,  
A/3, Chandrasekharpur, Bhubaneswar-751023

.....  
The Regional Officer, Bhubaneswar  
State Pollution Control Board, Odisha

.....  
The Secretary  
State Expert Appraisal Committee (SEAC), Odisha

Sub: Inspection of the Z1- Apartment Complex, Kalarahanga, Patia, Bhubaneswar in regard to comply the direction of Hon'ble NGT order dated 03.03.2025 of MA No.15/2024/EZ in O.A. 11/2022/EZ, Kolkata in the matter of Z1 Resident's Welfare Association Vrs Z Estates Private Limited & Ors.-reg.

Sir/Madam,

With reference to the above cited subject, I am directed to inform you that the Hon'ble NGT/EZ, Kolkata after hearing the above said case matter has disposed of the M.A. No. 15/2024/EZ on 03.03.2025 with direction to SEIAA, Odisha to comply the following:

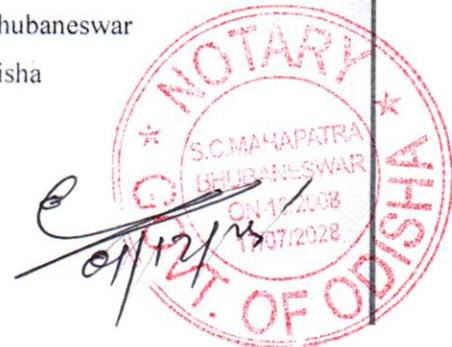
- (i) **Para-25 of the order:** - *We direct the State Environment Impact Assessment Authority (SEIAA), Odisha to revisit the site in question and carry out fresh Inspection with regard to fulfillment of the conditions given in the Environmental Clearance such as 20% green cover, disposal of solid waste etc. and remedial measures and ensure that the same is duly complied with by the Project Proponent within a given time span.*

In order to comply the direction of Hon'ble NGT order dated 03.03.2025, a joint committee has been formed and decided for site inspection schedule to be held on **14.08.2025 at 11.00AM** by the Joint Committee consisting the following members:

1. Prof. (Dr.) B.K. Satapathy (Member, SEAC)
2. Dr. Sohan Giri, Regional Officer, SPCB, Bhubaneswar
3. Shri M. Prasad, Scientist 'C', MoEF & CC, Govt. of India, IRO, Bhubaneswar
4. Dr. Pradepta Kumar Nayak, Environmental Scientist, SEIAA, Odisha

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Therefore, the said Committee Members, the representative of Z1-Apartment Complex and Z1-Builder Estates Pvt. Ltd. are requested to remain present on above mentioned date and time at Z1-Apartment Premises, Kalarahanga, Patia, Bhubaneswar.

This is for your kind information and necessary response.

Yours faithfully,

*Rono* 11/08/2025

Environmental Scientist

