



# एसजेवीएन लिमिटेड

मिनी-रत्न शिड्यूल 'A' पीएसयू  
निगमित पर्यावरण विभाग  
IS/ISO 9001:2015 Certified

कार्यालय:  
कार्यकारी निदेशक,  
निगमित पर्यावरण विभाग,  
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संख्या: SJVN/CHQ/ENV/27/2023-39

दिनांक: 01/06/2023

सेवा में,

अतिरिक्त प्रधान मुख्य वन संरक्षक (सी),  
पर्यावरण, वन और जलवायु परिवर्तन मंत्रालय,  
क्षेत्रीय कार्यालय (NCZ), 25, सुभाष रोड,  
देहरादून - 248001,  
ई-मेल: [moef.ddn@gmail.com](mailto:moef.ddn@gmail.com)

**Sub:** Six Monthly Monitoring Report on Compliance to Environmental Aspects (For period October, 2022 – March, 2023) i.r.o Naitwar Mori HPS (60 MW), Uttarakhand.

**Ref:** EC letter No. J-12011/16/2010/IA.I, June 16, 2016 (Issued by MoEF&CC)

Sir,

Kind reference is invited to above referred endorsement vide which Naitwar Mori Hydroelectric Project (60 MW) of SJVN in Uttarkashi District (Uttarakhand) is granted Environment Clearance. Submission of six monthly compliance report is required as per Environment Clearance conditions. Further, it is desired vide notification dated 26.11.2018 to submit half yearly compliance reports in soft copies only.

Therefore, Six Monthly Monitoring Report on compliance to Environment clearance conditions (for the period ending March 2023) is submitted for your kind information, please.

संलग्नक: यथोपरि।

सधन्यवाद,

भवदीय,  
एसजेवीएन लिमिटेड के लिए,

(कार्यकारी निदेशक)

प्रतिलिपि (केवल ईमेल के माध्यम से):

- उप महानिदेशक वन (सी), पर्यावरण, वन और जलवायु परिवर्तन मंत्रालय, क्षेत्रीय कार्यालय (NCZ), 25, सुभाष रोड, देहरादून - 248001, ई-मेल: [moef.ddn@gov.in](mailto:moef.ddn@gov.in)
- प्रभारी, केंद्रीय प्रदूषण नियंत्रण बोर्ड (सीपीसीबी), जोनल कार्यालय (उत्तर), पीआईसीयूपी भवन, विभूति खंड, गोमती नगर, लखनऊ - 226010 (यू.पी.). [mscb.cpcb@nic.in](mailto:mscb.cpcb@nic.in), [cpcb.lucknow@gmail.com](mailto:cpcb.lucknow@gmail.com)

3. सदस्य सचिव, उत्तराखण्ड पर्यावरण संरक्षण और प्रदूषण नियंत्रण बोर्ड (UEPPCB), 29/20, नेमी रोड, देहरादून - 248001 (उत्तराखण्ड). [spsubudhi@gmail.com](mailto:spsubudhi@gmail.com), [msukpcb@gmail.com](mailto:msukpcb@gmail.com)

**Six Monthly Monitoring Report on Compliance to Environmental Aspects (For Period Ending Mach, 2023)**

<b>A) Name of Project</b>	Naitwar Mori HEP (60 MW)
<b>Type of the Project</b>	Hydroelectric
<b>Location</b>	PO Mori, Tehsil Mori, District Uttarkashi, Uttarakhand.
<b>ContactAddress</b>	
<b>(a) Concerned Project Head</b>	Head of Project, PO Mori, Tehsil Mori, District Uttarkashi, Uttarakhand, PIN 249128
<b>(b) Concerned Environment Division (Project)</b>	Head (Environment), PO Mori, Tehsil Mori, District Uttarkashi, Uttarakhand, PIN 249128
<b>(c) Concerned Environment Division (Corporate)</b>	Head (Environment), SJVN Corporate Headquarters, Shanan, Shimla, HP, PIN 171006 Contact No. 0177-2660198
<b>Environment Clearance</b>	J-12011/16/2010/IA.I dated 16.06.16 and corrigendum issued vide even no. dated 07.08.18

**PART – A: Specific Conditions**

<b>S.No.</b>	<b>Condition of Environment Clearance</b>	<b>Status</b>
i.	The following Catchment Area Treatment (CAT) Plan as proposed in the EIA/EMP report (Chapter – 1 in the EMP dated February, 2011) and mentioned vide letter no. SJVN/AGM/NMHEP/PEC/11-431 dated 02.09.2011 shall be strictly implemented in consultation with Uttarakhand Forest Department. Major works shall be completed before impounding. The financial allocation of Rs. 769 lakhs for CAT plan implementation shall not be diverted for any other purpose. As per plan, the area of CAT is 3995.28 ha.	The amount, i.e. Rs.12.9666 Crores against implementation of CAT plan has been deposited by SJVN in CAMPA fund.  In this regard, about Rs. 483.8812 lakh and Rs. 461.31 lakh has been spent by Tons Forest Division and Govind Wild Life Sanctuary & NP, Purola respectively till date (total Rs. 945.19 lakh). <b>(Annexure-I)</b>
ii.	The R&R Benefits for the land losing households will be as per the National Rehabilitation and Resettlement Policy, 2010 of SJVNL as well as NRRP – 2007 whichever is higher. Adequate publicity of the compensation package of NRRP 2007/SJVNL R&R Policy 2010 shall be	R&R Plan of NMHEP is in line with the National Rehabilitation and Resettlement Policy (NRRP) – 2007.  R&R Plan of NMHEP was notified in the Official Gazette of Uttarakhand on 04.11.2017 and the same was published

	given in the affected villages. All R&R issues shall be completed before commissioning of the project.	in two daily newspapers in the local area before its implementation. Also, the same has been uploaded in the official website of District Uttarkashi. The copies of R&R Plan have also been provided in the office of SDM Purola, Tehsildar Mori, BDO Mori, Panchayat Pradhans and villagers.
iii.	A monitoring committee for R&R shall be constituted which must include representatives of project affected persons from SC/ST category and a women beneficiary.	The village-wise R&R/Grievance Redressal Committee has been constituted under the Chairmanship of ADM-cum-R&R Administrator, Uttarkashi comprising of SDM, BDO, SC/ST representative, Women representative, Panchayat Pradhan (representative of PAFs) and representatives of project management.
iv.	All the commitments made during the public hearing shall be fulfilled completely by the project proponent.	The commitments made during public hearing have been included in R&R Plan of the project which being implemented through R&R administrator (i.e. ADM-Uttarkashi) appointed by Govt.
v.	Consolidation and compilation of the muck shall be carried out only in the designated muck dumping sites as submitted in the EIA/EMP Report & in the reply submitted in February, 2011. As per the proposed muck disposal plan, out of the 7,11,240m <sup>3</sup> muck generated 30-40% will be utilized as construction material and remaining 4,29,583 m <sup>3</sup> will be dumped at the 2 designated disposal areas in 4.5 ha. The identified muck dumping sites shall be at-least 30 m horizontally away from high flood level (HFL).	Presently around 8.71 lakh M <sup>3</sup> of muck has been generated out of which around 4.33 lakh m <sup>3</sup> has been reutilized for development of construction material, roads and facility areas. Remaining 4.38 lakh m <sup>3</sup> of muck has been dumped in two dumping sites. These dumping sites are located 30 m horizontally away from HFL of river Tons.
vi.	A minimum environmental flow of 3.55 cumecs i.e. average river discharge in the 4 consecutive leanest months in the 90% dependable year shall be have to be maintained. However, 5.0 cumecs shall be maintained as environmental flow during September – October and March – April months. Monsoon flow shall be 30% of the total Monsoon discharge.	The environment flow arrangement has been built in the barrage structure and specified environment flow shall be maintained during operation stage of the project.
vii.	Continuous monitoring system for the flow rate measurement shall be installed and data be displaced at appropriate site for information of civil society and stakeholders. Six monthly results shall be	Shall be ensured during operation stage of the project.

	submitted to the concerned Regional Office of the Ministry and SPCB	
viii.	The Fishery Conservation & Management Plan as proposed in the EMP & in the reply submitted in August, 2011 shall be implemented completely in consultation with the Fisheries Department, Government of Uttarakhand. As proposed, the construction of fish ladder shall also be taken up and allocated budget of Rs. 1.00 Crore shall not be diverted for any other purpose.	Vertical slot type fish pass design has been finalized based upon recommendation of CIFRI. Accordingly, the work for construction of Fish Ladder is in progress.
ix.	Real time telemetry and data acquisition system including all weather hydro meteorological stations shall be installed for in-flow monitoring and advance flood warning. Advance flood warning and advance communication systems shall be installed in consultation with the downstream authorities.	A hydro meteorological station has been set up at the SJVN Site Office near Barrage. It measures the ambient temperature, wind speed, relative humidity, wind direction, rainfall and dew point. Further, the procurement/installation of advance flood warning system (Early Warning System) at three location in the Catchment area is under process.
x.	As proposed in the EMP, the Compensatory Afforestation Programme on 79.76 ha of land with soil binding species @3000 plants/ha and broad leaved species @ 2000 plants/ha with the help of State Forest Department in the degraded forest area shall be strictly taken-up. The allocated grants of Rs.3.74 Crores shall not be diverted for any other purpose.	As part of diversion of forest land, compensatory afforestation over 80.00 ha of civil soyam and forest land has been proposed at a cost of Rs.1,84,24,160/-. The said amount has been deposited with Compensatory Afforestation Fund (CAF) Uttaranchal as part of compensatory levies for compliance to Stage – I Forest Clearance.  The compensatory afforestation works have been completed on 80.00 hectare of land by Forest deptt. DFO, Tons Forest Division, Purola has submitted the progress report of CA for FY 2022-23 vide his letter No. 3106/3-2, dated 24.04.2023. As per the report amount of ₹ 3.73 Lakh has been spent on the 3 <sup>rd</sup> year maintenance work of CA ( <b>Annexure-I</b> ).
xi.	Greenbelt development along the approach roads, residential areas, office complex, barrage site and along the reservoir as proposed in the EIA/EMP with 50 different plant species shall be undertaken immediately and allocated grant of Rs. 44 lakhs shall not be diverted	2430 nos. of various species of tree/grass saplings like, <i>jackranda</i> , <i>gulmohar</i> , <i>alstonia</i> , <i>silver oak</i> , <i>kachnar</i> , <i>deodar</i> , <i>pomegranate</i> , <i>local bamboo</i> , etc. have been planted in consultation with State Forest Department at appropriate locations in the project area.

	for any other purpose.	Plantation of remaining saplings is being taken up in synchronization with construction work.
xii.	The Biodiversity Conservation and Management Plan shall be taken-up strictly as outlined in the EIA/EMP report and implemented in consultation with the State Forest Department. The allocated grants of Rs. 43 lakhs shall not be diverted for any other purpose. A report of implementation shall be included in the six monthly compliance report to be submitted to the Ministry.	<p>The detailed Biodiversity Conservation and Management Plan for Rs. 43.00 lakh has been prepared by CF Yamuna Circle, Dehradun &amp; DFO, Tons Forest Division, Purola. Accordingly, SJVN has deposited Rs. 43.00 lakh to DFO Tons, Forest Division, Purola on 22.10.2019 for implementation.</p> <p>DFO, Tons Forest Division, Purola vide his letter No. 3106/3-2, dated 24.04.2023 has informed that an amount of ₹ 3.81 Lakhs has been spent in FY 2022-23 against Biodiversity Conservation and Management Plan (<b>Annexure-I</b>). With this the total amount of ₹ 28.2 lakh has been spent so far against Biodiversity Conservation and Management Plan.</p>
xiii.	Equipment likely to generate high noise levels shall meet the ambient noise standards as notified under the Noise Pollution (Regulation and Control) Rules, 2000 as amended in 2010 under the Environment (Protection) Act, 1986 (EPA). For this necessary insulators etc. may be ensured.	<p>Noise level data is got monitored by SJVN from Pollution Control Research Institute, BHEL, Haridwar from 20.06.2018 onwards. The noise level data is being submitted to Regional Office, MoEF&amp;CC Dehradun as part of six-monthly monitoring report.</p> <p>All high noise generating equipment's have been provided with mufflers as per manufacture's specification.</p> <p>Noise level data monitored on 09.02.2023 to 11.02.2023 by SJVN from Pollution Control Research Institute, BHEL, Haridwar is attached as <b>Annexure-II</b>.</p>
xiv.	Any other clearance from any other organization/department, if required shall be obtained before commencing the project.	Condition is being complied with.
xv.	As outlined in the report submitted dated 29.12.2011 for an amount of Rs.6.26 crores shall be spent for the Local Area Development in the project	The Rehabilitation and Resettlement Plan of NMHEP, consisting of infrastructural and community development works is being implemented through R&R Administrator i.e. ADM Uttarkashi who is appointed by Govt. of Uttarakhand.

		<p>In this regard, a budget of Rs.1445 lacs have been deposited with R&amp;R Administrator, Uttarkashi out of which an amount of Rs. 781.77 lacs have been incurred as follows:</p> <p>a) Rehabilitation grant – Rs.163.26 lacs  b) Subsistence allowance – Rs.65.30 lacs  c) Health care – Rs.124.00 lacs  d) Educational facilities – Rs.61.19 Lacs  e) Recreational Facilities– Rs.2.35 Lacs.  f) Widow Pension: 37.69 Lacs  g) Infra &amp;Community Development activity - Rs.273.21 Lacs.  h) Income generation scheme-37.80 Lacs.  i) Subsistence allowance- 16.97 Lacs</p>
xvi.	Two openings in the dam shall be kept to ensure environmental flow. One opening shall be for minimum environmental flow of 3.55 cumecs which will be un-gated and other will be gated which will be opened during the months when higher environmental flow of 5 cumecs is released. During the months of September – October and March – April, both the openings will discharge 5 cumecs.	Suitable provisions have been made in the Barrage structure to ensure environmental flow releases.
xvii.	Besides keeping environmental flows, fish hatcheries will be developed for stocking of fingerlings, both upstream and downstream of the dam site.	State Fisheries Department had been requested to provide a plan for development of fish hatcheries for stocking of fingerlings from 2009 onwards. In this regard, Director (Fisheries) vide letter dated 12.01.2018 and 23.03.19 and Asst. Director (Fisheries) vide letter no. 422 dated 27.10.2020 has communicated that they are in process of survey of land for Fish hatchery.
xviii.	Pension for elderly widows shall be increased to Rs.1500 per month	The provision of yearly pension @Rs.18,000/- per year (Rs. 1500/- pm) has been kept in the R&R Plan of NMHEP for the vulnerable group family head residing in the affected village. In this regard, 57 widow ladies have been covered under this provision and provided monthly pension of Rs. 1500/- pm w.e.f. Nov. 2017.
xix.	The public toilets (130 nos.) with septic tanks shall be provided and maintained in	The list of beneficiaries for the construction of toilets in the Project

	each of the affected villages. A sum of Rs.61 lakhs shall be kept separately for this purpose and shall not be diverted for any other purpose.	<p>Affected Villages have been finalized through BDO Mori and further submitted to ADM-cum-R&amp;R Administrator, Uttarkashi.</p> <p>In this regard 84 nos. of eligible BPL families were benefited by constructed 84 nos of toilets in Project Affected villages i.e. Bainol, Naitwar &amp; Gainchwan gaon.</p>
xx.	System and facility for solid waste management shall also be provided in the project affected villages.	Project has provided waste collection bins in the PAV i.e. <i>Bainol, Gainchwan &amp; Naitwar</i> villages, amounting to around Rs. 1 lakh. Project had developed waste collection pits in Bainol Village (PAV) and Naitwar Village (PAV) and expenditure incurred are INR 58,000/- and INR 1,77,000/- respectively. Further, dustbins have been distributed in Project Affected Villages, Hospital, Tehsil Mori, Schools, Vendors of Mori Market, Forest Deptt. and SHO, Mori.
xxi.	Alternate sources for drinking water shall be provided to the affected villages and other villages in the vicinity, in case, natural springs are affected due to construction of the project. This shall be carried out in consultation with the State Irrigation and Public Health Department.	<p>Noted.</p> <p>If it is technically established that the drinking water resources are dried up due to project works, the same shall be restored and water supply schemes shall be provided by SJVN on instructions of State Govt./Central Govt. through State Water Supply Dept.</p> <p>Nevertheless, drinking water supply schemes have already been provided in the Project Affected Villages viz. Bainol, Naitwar and Gainchwangaon as a CSR initiative through SJVN foundation.</p>
xxii.	For planting of trees and other biological measures, indigenous and among them endemic tree species should be preferred. Turfing may be done by perennial grasses in consultation with a Horticulturist. Proponents themselves may take this responsibility under the guidance of a scientist/expert in vegetative propagation and mass multiplication (tissues culture)	<p>Construction work at project site commenced in March 2018 and work is in progress.</p> <p>Plantation and turfing activities depicted herein shall be undertaken in consultation with scientists/experts after completion of the construction activities of the Project.</p>
xxiii.	A specialist in reproduction biology of fishes, CIFRI should study the viable and feasible alternatives on the blocked migratory movement of fish species like <i>Schizothorax richardsonii</i> , <i>Tor putitora</i> ,	<p>The said study has been undertaken by CIFRI, Kolkatta.</p> <p>The final study on "<i>Viable and Feasible Alternatives on the Blocked Migratory Movement of Fish Species</i>" i.r.o. of</p>

	<p><i>Tor tor</i>, etc. due to construction of the dam so that these species would not become locally extinct.</p>	<p>NMHEP has been submitted by CIFRI and same has been shared with MoEF&amp;CC (HQ) and Regional Office, Dehradun and also intimated vide six monthly report submitted as on 01 December 2021. The recommendations of study are being adopted by the project in the fish pass design.</p>
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### **PART – B: General Conditions**

(i.)	<p>Adequate arrangement for providing free fuel like kerosene/wood/LPG shall be made at project cost for the labour engaged in the construction work so that indiscriminate felling of trees is prevented.</p>	<p>To avoid indiscriminate felling of trees, canteen facility is being provided by Contractors to the labour force engaged in construction activity of the project.</p>
(ii)	<p>Medical facilities as well as recreational facilities shall also be provided to the labourers.</p>	<p>Dispensary has been provided at Contractor facility. Further, First Aid kits along-with trained staff provided at Barrage, Adit-1 and Power house.</p>
(iii)	<p>All the labourers to be engaged for construction works shall be thoroughly examined by health personnel and adequately treated before issuing them work permit.</p>	<p>Being complied.</p>
(iv)	<p>No fugitive dust emissions should be observed at the construction sites. Water sprinkling arrangements shall be made to suppress the fugitive emissions.</p>	<p>All measures suggested in the EIA/EMP report including sprinkling of water are being undertaken at project site.</p>
(vi)	<p>Potable drinking water and proper sanitary facilities should be provided for the labour force and the local area people.</p>	<p>The provision mentioned for said activity in the EMP is being taken care by main contractor as part of the contract agreement. Drinking water supply schemes have already been provided in the Project Affected Villages viz. Bainol, Naitwar and Gainchwangaon as a CSR initiative through SJVN foundation.</p>
(vii)	<p>Restoration of construction area including dumping site of excavated materials shall be ensured by leveling, filling up of burrow pits, landscaping etc. The area should be properly treated with suitable plantation.</p>	<p>Construction work at project site has started in March 2018 and work is in progress at various locations. Restoration of construction area and dumping sites shall be done after completion of project components and in synchronization with construction activities.</p>

(viii)	Financial provision shall be made in the total budget of the project for implementation of the above suggested safeguard measures.	Financial provision of Rs. 32.48 Crores towards implementation of Environment Management Plan has been kept in the total budget of the project.
	Status on implementation of EMP? Budgetary provision on EMP for INR 32.48 crores shall be exclusively spent on the purpose.	Expenditure on EMP: INR 45.50 crores. Details on physical and financial progress on stipulated subheads of EMP is bulleted below,
	<ul style="list-style-type: none"> <li>• CAT Plan (INR 7.69 crores)</li> </ul> (Revised Cost: INR12.9666 crores)	Amount Deposited: INR 12.9666 crores. Utilization: State Forest Department has utilized approx. INR 945.19 lakhs by Uttarakhand Forest Deptt. <b>(Annexure-I)</b> .
	<ul style="list-style-type: none"> <li>• R&amp;R Plan (INR 13 crores)</li> </ul> (Revised Cost: INR14.45 crores)	Amount Deposited with ADM, Uttarkashi: INR 14.45 crores.
	<ul style="list-style-type: none"> <li>• CA and NPV for Forest Land Transfer (INR 3.74 crores)</li> </ul>	Amount deposited Against CA: INR1,84,24,160/- Against NPV: INR3,74,47,790/-
	<ul style="list-style-type: none"> <li>• Greenbelt, Landscape and Restoration Plan (INR 44 lakhs)</li> </ul>	<i>Expenditure done: INR 6.91 lakhs</i>
	<ul style="list-style-type: none"> <li>• Reservoir Rim Treatment Plan (INR 22.09 lakhs)</li> </ul>	INR 62.72 lakhs
	<ul style="list-style-type: none"> <li>• Fuel Management Plan (INR 3.5 lakhs)</li> </ul>	INR 13.821lakhs. Provided Solar Cocker to Project affected families.
	<ul style="list-style-type: none"> <li>• Fisheries Management Plan (Provision made in DPR) (INR 1 crores)</li> </ul>	Vertical slot type fish pass design has been finalized based upon recommendation of CIFRI. Accordingly, the work for construction of Fish Ladder having the contract price of Rs. 1.93 crore has been awarded on 08.09.2021.
	<ul style="list-style-type: none"> <li>• Water, Air and Noise Quality Management Plan (INR 20 lakhs)</li> </ul>	The provision mentioned for said activity in the EMP is being taken care by main contractor as part of the contract document No. II of IV, para 2.3.14.1- control of Air Pollution and para 2.3.14.2 – control of noise pollution.
	<ul style="list-style-type: none"> <li>• Muck Disposal Plan (INR 3.8780 crores)</li> </ul>	INR 8.86 crores.
	<ul style="list-style-type: none"> <li>• Health Management Plan (Provision made in R&amp;R) (INR 40 lakhs)</li> </ul>	INR 124.00 lakh (One Ambulance and miscellaneous medical aids provided to PHC Mori) under Health Management Plan of R&R provision.
	<ul style="list-style-type: none"> <li>• Dam Break Modelling &amp; Disaster Management Plan (INR 52.60 lakhs)</li> </ul>	Nil

	<ul style="list-style-type: none"> <li>• Environmental Awareness Plan (INR 9 lakhs)</li> </ul>	Expenditure done: INR 3.34 lakhs (approx.)
	<ul style="list-style-type: none"> <li>• Environmental Monitoring Plan (INR 36.50 lakhs)</li> </ul>	INR 22.35 lakhs. Details: Monitoring being done by M/s Pollution Control Research Institute (BHEL), Haridwar. Latest monitoring done in February, 2023.
	<p>The project proponent shall also submit six monthly compliance reports of the stipulated EC conditions (both in hard copies as well as by e-mail) to the respective Regional Office of MoEF&amp;CC and State Pollution Control Board. Both monitoring report and compliance report shall be up-loaded on the website of the Proponent.</p>	<p>Six-monthly compliance reports are being regularly submitted to MoEF&amp;CC Regional Office (North-Central Zone), Dehradun, CPCB Zonal Office (North), Lucknow and Uttarakhand Environment Protection and Pollution Control Board, Dehradun and also uploaded on our website <a href="http://www.sjvn.nic.in">www.sjvn.nic.in</a>.            Yes, latest six-monthly report submitted by project to MoEF&amp;CC on November 25, 2022.</p>
5.	<p>The project proponent shall provide full cooperation and all required documents/data to the officials from concerned Regional Office of the Ministry who would be monitoring the implementation of environmental safeguards.</p>	<p>Full cooperation will be provided to officials from concerned Regional office of MoEF&amp;CC during monitoring of the project.</p>
6.	<p>The responsibility of implementation of environmental safeguards rests fully with the M/s Satluj Jal Vidyut Nigam Ltd. And Government of Uttarakhand.</p>	Noted
7.	<p>Besides the above stated conditions, the project proponent and Government of Uttarakhand shall also implement all other environmental safeguards, as proposed in the EIA/EMP report and other reports from time to time.</p>	<p>All environmental safeguard measures proposed in the EIA/EMP report are being implemented.</p>
8.	<p>The Environmental Management Plan shall be strictly adhered to and a sum of Rs.32.48 crores, the budgetary provisions for implementation of EMP shall not be diverted for any other purpose.</p>	<p>A total of Rs. 45.50 crores have been spent so far on implementation of EMP.</p>
9.	<p>Any change in the scope of the project shall be intimated to the Ministry and fresh approval if required, shall be taken from the Ministry.</p>	<p>There is no change in the scope of the project.</p>
10.	<p>The Ministry reserves the right to add additional safeguard measures subsequently, if found necessary and to</p>	Noted

	take action including	
11.	This clearance letter is valid for a period of 10 years from the date of issue of this letter for commencement of construction work.	The major work for the project has been awarded on 05.12.17 and construction activities have commenced from March 2018 onwards.
12.	A copy of the clearance letter shall be sent by the proponent to concerned Panchayat, ZilaParishad/Municipal Corporation, Urban local body and the local NGO, if any, from whom suggestions/representations, if any, were received while processing the proposal. The clearance letter shall also be put on the website of the Company by the Proponent.	The condition has been complied with. The clearance letter is available on company website <a href="http://www.sjvn.nic.in">www.sjvn.nic.in</a> .
13.	A multi-disciplinary committee for monitoring the implementation of environmental safeguards during construction shall be constituted by the Proponent in consultation with the Ministry. The proponent shall suggest the members for approval of the Ministry. Proponent shall organize six monthly meetings of the Committee and submit the monitoring report to the Ministry.	A Multi-Disciplinary Committee for Naitwar Mori HE Project has been constituted vide MoEF&CC letter no. J-12011/16/2010-IA.I dated 09.07.2018. The 3 <sup>rd</sup> meeting of MDC was held on 21.08.2021.
14.	The proponent should advertise at least two local newspapers widely circulated in the region around the project. One of which shall be in the vernacular language of the locality concerned informing that the project has been accorded environmental clearance and copies of clearance letter area available with the State Pollution Control Board/Committee and may also be seen at Website of the Ministry of Environment, Forest Climate Change at <a href="http://www.envfor.nic.in">http://www.envfor.nic.in</a>	Complied
15.	After 5 years of the commissioning of the project, a study shall be undertaken regarding impact of the project on the environment and downstream ecology. The study shall be undertaken by an independent agency, decided in consultation with the Ministry.	Condition shall be complied during operation stage of the project.
16.	The proponent shall also submit six monthly reports on the status of compliance of the stipulated EC conditions including results of	Six-monthly compliance reports are being regularly submitted to MoEF&CC Regional Office (North-Central Zone), Dehradun, CPCB Zonal Office (North),

	<p>monitoring data (both in hard copies as well as e-mail) to the respective Regional office of MoEF&amp;CC and Zonal office of CPCB and the SPCB.</p>	<p>Lucknow and Uttarakhand Environment Protection and Pollution Control Board, Dehradun and also uploaded on our website <a href="http://www.sjvn.nic.in">www.sjvn.nic.in</a>.</p> <p>The last compliance report for the period ending September 2023 was submitted on 25.11.2022</p> <p>Environment Monitoring results carried out during the period of compliance are enclosed as <b>Annexure-III</b>.</p>
17.	<p>Any appeal against this environmental clearance shall lie with the National Green Tribunal, if referred, within a period of 30 days from the date of issue, as prescribed under Section – 10 of the National Green Tribunal Act, 2010.</p>	<p>To the best of our knowledge, no such appeal has been made with National Green Tribunal against Environment Clearance issued to Naitwar Mori HE Project.</p>

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# ANNEXURE -I

कार्यालय उप वन संरक्षक, टौंस वन प्रभाग, पुरोला (उत्तरकाशी)

Email- dfo\_tons@yahoo.co.in Fax:- 01373- 223328  
पत्रांक 3106 / 3-2 दिनांक, पुरोला, उत्तरकाशी 24/04/2023

सेवामें,

वरिष्ठ प्रबन्धक (पर्यावरण),  
नैटवाड-मोरी जल विद्युत परियोजना,  
पर्यावरण विभाग, बैनोल उत्तरकाशी।

विषय :- कैचमेंट उपचार योजना, जैव विविधता प्रबन्धन योजना एवं क्षतिपूरक वनीकरण की अर्द्धवार्षिक प्रगति आख्या के सम्बन्ध में।

सन्दर्भ :- आपका पत्रांक-एसजेवीएन/एनएमएचईपी/पर्यावरण/23-281 दिनांक 20.04.2023।

महोदय,

उपरोक्त विषयक सन्दर्भित पत्र के क्रम में इस वन प्रभाग से नैटवाड मोरी जल विद्युत परियोजना के अन्तर्गत कैचमेंट उपचार योजना, जैव विविधता योजना, क्षतिपूरक वनीकरण एवं देवता रेंज भासला कक्ष सं० 1, 2 एवं 3 खनन क्षेत्र तथा सान्द्रा रेंज बैनोल कक्ष संख्या 15 एवं 16 खनन क्षेत्र के सापेक्ष वृक्षारोपण कार्य की प्रगति सूचना संलग्न कर सूचनार्थ एवं आवश्यक कार्यवाही हेतु प्रेषित।

संलग्न-उपरोक्तानुसार।

भवदीय,  
(सुबोध कुमार काला)  
उप वन संरक्षक,  
टौंस वन प्रभाग, पुरोला।

प्रपत्र

टौन्स वन प्रभाग, पुरोला में नैटवाड़-मोरी जल विद्युत परियोजना में कैट प्लान योजना के अन्तर्गत किये गये कार्यों का विवरण। (वित्तीय वर्ष 2022-23)

(धनराशि रू० में)

क्र०सं०	योजना का नाम	कार्य का नाम	प्राप्त धनराशि	इकाई	भौतिक	व्यय धनराशि
1	2	3	4	5	6	7
1	सतलुज जल विद्युत परियोजना (वन जमा)	सतलुज जल विद्युत परियोजना के अन्तर्गत सान्द्रा रेंज के बैनोल क०सं०- 15 व 16 बफर जोन के आस-पास वन पंचायत ग्राम सभा रिक्त भूमि पर 7000 पौधों का वृक्षारोपण कार्यत	897,000	पौध संख्या	वन पंचायत सरपंच सरास को बाबत व०पं०, सरास में वृक्षारोपण के प्रथम वर्ष-अनुरक्षण मुगतान (7000 पौध रोपण)	72,300
2		जैव विविधता के अन्तर्गत प्राप्त	1,860,228	पौध संख्या	जैव विविधता वनीकरण के अन्तर्गत किये गये पौधों की देख-रेख व अनुरक्षण कार्य करने का पारिश्रमिक (20 हे०)	381,066
3	सतलुज जल विद्युत परियोजना (सी०ए०) अनुरक्षण तृतीय वर्ष	Thadung-3a (Purola Range)	73000	ha	20.00	73000
		Thadung-12 (Purola Range)	73000	ha	20.00	73000
		Dalnu-8 (Purola Range)	73000	ha	20.00	73000
		Ludrala Soyam (Singtoor Range)	33000	ha	9.00	33000
		Benol-4 (Sandra Range)	121000	ha	11.00	121000
		<b>Total :-</b>		<b>373000</b>		
<b>G. Total :-</b>			<b>3130228</b>			<b>826366</b>

(सुबोध कुमार काला)

उप वन संरक्षक,

टौन्स वन प्रभाग, पुरोला।

**कैट प्लान कार्यों की भौतिक प्रगति का कैट प्लानवार/प्रभागवार/मदवार विवरण**  
**माह मार्च 2023 (धनराशि लाख में)**  
**प्रपत्र-1**

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
कैट प्लान का नाम	वृत्त का नाम	प्रभाग/पी.एम.यू.	कोड सं०	कार्य विवरण	प्रस्तावित कार्य	डी०पी०आर ० अनुसार भौतिक कार्यों की मदवार कुल मात्रा	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	उपलब्धि	भौतिक लक्ष्य	उपलब्धि	भौतिक लक्ष्य	उपलब्धि	भौतिक लक्ष्य	उपलब्धि
			1.1 प्रशासनिक व्यय											
			1.1.1 पूंजीगत व्यय											
			1.1.1.1	पूजागत व्यय	उपकरण आगुर्त तथा भवनों की स्थापना तथा क्षेत्रीय हट/रटोर मरम्मत	ल०स०0	-	-	2	1.00	ल०स०0	8.68	-	-
			1.1.1.2	पूजागत व्यय	वाहनो को क्रय (वार एवं दुपहिया)	ल०स०0	1	0.25	-	-	4	32.87836	-	-
			1.1.2.1	आवर्ती व्यय	सावदा स्टाफ तथा ग्राम प्रेरक के वेतन	12	-	-	-	-	3	0.40887	3No	1.700
			1.1.2.2	आवर्ती व्यय	वन कर्मचारियों को परियोजना भत्ता/मानदेय	ल०स०0	-	-	L.S.	0.50	-	-	-	-
			1.1.2.3	आवर्ती व्यय	परियोजना स्टाफ और मोटिवेटर्स को संचार एवं याहन भत्ता	ल०स०0	-	-	-	-	-	-	1No	0.410
			1.1.2.4	आवर्ती व्यय	गाइडों का रखरखाव व मरम्मत तथा किफायते पर व्यय	ल०स०0	-	-	3	0.50	-	-	-	-
			1.1.2.5	आवर्ती व्यय	कार्य कार्यालय व्यय	ल०स०0	-	-	-	-	-	-	-	-
			1.1.2.6	आवर्ती व्यय	कर्मचारियों के आवास मरम्मत/अन्य सिविल	ल०स०0	-	-	-	-	-	-	L.S.	0.730
					कुल योग-									
			1.2	आवर्ती व्यय	अनुसंधान एवं मूल्यांकन (०५ मंदा)	ल०स०0	-	-	-	2.00	-	-	-	2.840
					कुल योग-									
					कुल योग परियोजना प्रवर्धन-									
					कुल योग परियोजना प्रवर्धन-									
			2.1 संस्थागत पद्धति का विकास					0.25		2.00000		41.96723		2.840
			2.1.1 सामुदायिक परिसम्पत्तियां											
					संस्थागत विकास एवं सहायता									
					योग-									

मोरी-नैटवाडे जल विद्युत परियोजना

यमुना वृत्त

टॉस वन प्रभाग, पुरोला

कैट प्लान का नाम	वृत्त का नाम	प्रभाग/पी.एम.यू.	कोड सं०	कार्य विवरण	प्रस्तावित कार्य	डी०पी०आर 0 अनुसार भौतिक कार्यों की मदवार कुल मात्रा	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2020-21 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2021-22 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2022-23 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि				
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
			2.1.2 प्रवेश बिन्दु कार्य											
			2.1.2.1	प्रवेश बिन्दु कार्य	नौला/धात की मरम्मत/सुधारिकरण का कार्य	5	-	-	3	1.50	1	0.91	-	-
			2.1.2.2	प्रवेश बिन्दु कार्य	पेवजल/सिंघाई टैंक का निर्माण	2	-	-	2	1.70	1	0.04	-	-
			2.1.2.3	प्रवेश बिन्दु कार्य	सिंघाई नहर सुधारिकरण/निर्माण	289	-	-	-	-	-	3.78	-	-
			2.1.2.4	प्रवेश बिन्दु कार्य	खड्डजा रास्तों का सुधारिकरण	879 र0मी०	-	-	200 Rm	2.60	679 र0मी०	8.82	-	-
					योग -					5.80		13.55		
					कुल योग प्रवेश बिन्दु कार्य-					5.80		13.55		
			2.2.1	क्षमता विकास	ग्रामीण एवं वन पंचायतों, परिवर्तन स्टाफ व विभागीय कार्मिकों का प्रशिक्षण व क्षमता विकास	63	63	1,42,214	9	1.00	3	3.72	4No	4.167
			2.2.2	क्षमता विकास	परियोजना प्रचार-प्रसार तथा अनिलेखीकरण/डी०पी०आर० का निर्माण	10र0र0	-	-	10र0र0	0.50	3	2.73	L.S.	0.640
					कुल योग क्षमता विकास एवं प्रचार प्रसार-			1,42,214		1.50		6.45		4.807
			2.3 सूक्ष्म योजना व डी०पी०आर० की तैयारी											
			2.3.1	सूक्ष्म योजना एवं विस्तृत परियोजना रिपोर्ट तैयारी	सूक्ष्म योजना एवं विस्तृत परियोजना रिपोर्ट की तैयारी	1	1	2.50	-	-	-	-	-	-
					योग-			2.50		-		-		-
			2.4 अध्ययन/अनुसंधान											
			2.4.1	अध्ययन/अनुसंधान	अध्ययन/अनुसंधान	10र0र0	-	-	-	-	-	-	-	-
					योग-			-		-		-		-
			3.1 कैम्पेस्ट उपचार कार्य											
			3.1.1 वनीकरण											
			3.1.1.1	क्षेत्रपाला विकास	क्षेत्रपाला विकास	3	3	7,66,550	-	-	3	2.00	-	-
			3.1.1.2	रोपण हेतु पौध तैयार करना	रोपण हेतु पौध तैयार करना/पुनर्नी पौधों का तैयार करना	190280	1,90,280	6,07,250	190,280	9.52	30000	1.00	-	-
					योग-			13,738		9,5200		3.00		-
					कुल योग तैयारी के-			3,92,314		7,30		20.00		4,807

कैट प्लान का नाम	वृत्त का नाम	प्रभाग/पी.एम.यू.	कोड सं०	कार्य विवरण	प्रस्तावित कार्य	डीपीआर अनुसार 0 मॉड्यूल कार्यों की मदवार कुल मात्रा	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के आधारन उपलब्धि	वित्तीय वर्ष 2020-21 में प्रस्तावित लक्ष्यों के आधारन उपलब्धि	वित्तीय वर्ष 2021-22 में प्रस्तावित लक्ष्यों के आधारन उपलब्धि	वित्तीय वर्ष 2022-23 में प्रस्तावित लक्ष्यों के आधारन उपलब्धि				
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
			3.1.1.3	बहुउद्देशी प्रजातियों का रोपण	आग्नि मृदा कार्य करना बहुउद्देशी प्रजातियों का रोपण प्रथम वर्ष का अनुसंधान द्वितीय वर्ष का अनुसंधान	73	34	204000	22	24750	16.00	8.30	16 ha	3.692
									34	7.720	22.00	4.20	22 ha	2.311
											34.00	3.70	34 ha	2.853
					योग-			20.40		32.470	72.00	16.20		8.856
			3.1.1.4	ए०एम०आर०-मिश्रित वन रोपण	ए०एम०आर०-मिश्रित वन रोपण कार्य कचरल कार्य कचरल कार्य द्वितीय वर्ष	84	37	181300	37	81400	47.00	28.45	47 ha	10.158
											37.00	4.40	37 ha	4.057
					योग-			18.13		81.400	84.00	32.85		14.215
			3.1.1.5	पशु वृक्षारोपण/बास रोपण	पशु वृक्षारोपण/बास रोपण हेतु आग्नि मृदा कार्य वनीकरण द्वितीय वर्ष का अनुसंधान	27	20	347526	20	4.400	7.00	7.00	7 ha	3.778
											20.00	2.10	20 ha	2.348
					योग-			3.47526		4.400	27.00	9.10		6.126
					कुल योग वनीकरण कार्य-			55.74326		54.530	150	61.15		29.197
			3.1.2.1	धानसांस्कृतिक विकास	धानसांस्कृतिक विकास	217	-	-	30	0.93	150	6.40	29 No	1.160
			3.1.2.2	अभियांत्रिकी विकास कार्य	कारे परार के विकास कार्य	1554	-	-	400	5.20	493	8.56	92 No	4.980
			3.1.2.2	अभियांत्रिकी विकास कार्य	फोट वायर विकास कार्य	2224	-	-	-	-	21	6.24	137 No	32.627
			3.1.2.3	जल संग्रहण हेतु ड्रैव निर्माण	कस्टर ड्रैव/साई निर्माण कार्य	139	-	-	20	2.00	72	19.30	26 ha	5.777
			3.1.3.1	जल संग्रहण टैंक	जल संग्रहण टैंक (परक्युलेशन टैंक निर्माण)	170	-	-	20	1.80	87	8.40	63 No	5.657
			3.1.3.2	घास/नीला संवर्धन/पेयजल मरम्मत	घास/नीला संवर्धन/पेयजल मरम्मत	6	-	-	-	-	5	9.70	81 mm	2.740
			3.1.3.3	घास खाल बरी निर्माण	घास खाल बरी निर्माण	111	-	-	15	3.00	44	9.50	25 No	4.980
					कुल योग मृदा एवं जल संरक्षण-					12.93		68.10		57.920



1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
कॉट प्लान का नाम	वृत्त का नाम	प्रभाग/पी.एम.यू.	कोड सं०	कार्य विवरण	प्रस्तावित कार्य	डी०पी०आर 0 अनुसार मौलिक कार्यों की मदवार कुल भाजा	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के अद्यतन उपलब्धि	वित्तीय वर्ष 2020-21 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2021-22 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2022-23 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2020-21 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2021-22 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि	वित्तीय वर्ष 2022-23 में प्रस्तावित लक्ष्यों के सापेक्ष अद्यतन उपलब्धि
					कामन फौसविली केन्द्र की स्थापना तथा संचालन करना कुल याग कृषि विकास-	5	-	-	-	-	-	5.14	-	16.607
			3.2.1.2	उन्नत कृषि तकनीक	कामन फौसविली केन्द्र की स्थापना तथा संचालन करना कुल याग कृषि विकास-	5	-	-	-	-	-	5.14	-	16.607
			3.2.2.1	आद्यानिका	आद्यानिका (विपणन हेतु फकीलाग सहायता)	4842	-	-	-	-	-	-	L.S.	0.980
					अ) फल बाँध विवरण	61	-	-	-	-	-	-	-	-
					ब) मीनपालन प्रदर्शन	10	-	-	-	-	-	-	-	-
					स) मशरूम उत्पादन प्रदर्शन	0	-	-	L.S.	1.00	490	4.80	-	0.980
					द) विपणन हेतु फकीलाग सहायता	0	-	-	-	-	-	-	-	-
					याग-									
			3.2.3.1	पशुपालन	पशुपालन	303	-	-	-	-	-	-	20 No	5.580
					अ) चारा मिनीकैट प्रदर्शन (चार नाद निर्माण)	27	-	-	27	1.00	30	0.20	-	-
					ब) चारा नाद का निमाण/चारा टब	27	-	-	27	1.00	30	0.20	-	-
					स) प्रसस्करण हेतु सहायता	27	-	-	27	1.00	30	0.20	-	-
					याग-									
			3.2.4.1	नगर कृषि सेंटर	नगर कृषि सेंटर	0	-	-	-	-	-	-	-	5.580
					अ) इको टूरिज्म हेतु आधारभूत संरचनाओं-डोम स्ट्रे का विकास	0	-	-	-	-	-	-	-	-
					ब) इस्पाशियल विकास-ट्रैल्स, कच्चे माल के क्रय आदि हेतु	ल0रफ0	-	-	ल0रफ0	0.50	55	2.06	45 No	1.640
					स) विपणन हेतु प्रचार प्रसार आदि सहायता	0	-	-	-	-	-	-	-	-
					याग-									1.640

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
कैट प्लान का नाम	ग्रहण का नाम	प्रभाग/पी.एम.यू.	कोड सं	कार्य विवरण	प्रस्तावित कार्य	डीपीआर 0 अनुसार मासिक कार्यों की संख्या कुल	वित्तीय वर्ष 2019-20 में प्रस्तावित लक्ष्यों के सापेक्ष अवतन उपलब्धि		वित्तीय वर्ष 2020-21 में प्रस्तावित लक्ष्यों के सापेक्ष अवतन उपलब्धि		वित्तीय वर्ष 2021-22 में प्रस्तावित लक्ष्यों के सापेक्ष अवतन उपलब्धि		वित्तीय वर्ष 2022-23 में प्रस्तावित लक्ष्यों के सापेक्ष अवतन उपलब्धि	
						मासिक लक्ष्य	उपलब्धि	मासिक लक्ष्य	उपलब्धि	मासिक लक्ष्य	उपलब्धि	मासिक लक्ष्य	उपलब्धि	
			325.1	सामाजिक सुरक्षा सहयोग	सामाजिक सुरक्षा सहयोग	0	-	-	-	-	-	-	-	-
					प्रस्तावित कार्य का कुल योग-					714600		153.00		114284
			4	समकन फंड										
			4.1	ग्रामीणों द्वारा विज्ञात प्लान तैयार की तैयारी	ग्रामीणों द्वारा विज्ञात प्लान की तैयारी	1050	-	-	-	-	-	-	-	-
			4.2	परियोजना कार्यों का संचालन एवं समापन	परियोजना कार्यों का संचालन एवं समापन	1050	-	-	-	-	-	-	-	-
					कुल योग-									
			5. आकाशिक व्यय											
			5.1	आकाशिक व्यय	आकाशिक व्यय	1050	-	-	-	-	1050	2.00	LS	4.303
					योग-									4.303
					प्रस्तावित कार्य का कुल योग-					80.76		216.9672		126.234

(सुबोध कुमार कोला)  
उप वन संरक्षक  
टाँस वन प्रभाग, पुरीला।

T510 = 483.8812

वार्षिक कार्य योजना वर्ष-2022-23 (कैट खान) के तहत किये गये कार्यों के सापेक्ष व्यय का सांश

S.No.	Components	Unit	वर्ष 2022-23 हेतु प्रस्तावित		अवमुक्त धनराशि	03 / 2023 तक व्यय	अवशेष धनराशि
			Physical	Financial			
1	परियोजना ढबन्धन	3	4	5	6	7	8
1	प्रशासनिक व्यय						
1.1.1	ढूजीगत व्यय						
1.1.1.1	उढकरण एवं आपूर्ति तथा ढवनों की स्थापना	ढ०	ढ०ढ०	600000	600000	600000	0
1.1.1.2	वाहनो का क्रय (वार एवं दुढहिया)	ढ०	ढ०ढ०	1600000			
1.2	आवर्ती व्यय						
1.1.2.1	सविवा स्टाफ तथा ग्राम ढ्रेसक के वेतन	ढ०	0	0	0		0
1.1.2.2	वन कर्मचारियो को परियोजना ढस्ता / ढानदेय	ढ०	ढ०ढ०	100000	100000	100000	0
1.1.2.3	गाडियो का रख रखाव व ढरम्मत तथा किराये ढर	ढ०	ढ०ढ०	200000	200000	200000	0
1.1.2.4	परियोजना स्टाफ और ढोटिवेर्से को संवार एवं वाहन ढस्ता	ढ०	ढ०ढ०	150000	150000	150000	0
1.1.2.5	कार्यालट व्यय	ढ०ढ०	ढ०ढ०	25000	25000	25000	0
2	अनुश्रवण एवं ढूल्यांकन	ढ०	ढ०ढ०	0			
				2675000	1075000	1075000	0
	तैयारी ढेज						
1	संस्थागत ढढ्दति का विकास						
1.1	संस्थागत विकास एवं सहायता (वन ढंचायतीं / ई०डी०सी०, 25000 ढति संख्या) इसका उपयोग आजीविका संवर्धन, औषधीय वृक्षों का रोढण, जैव विविधता संरक्षण, ग्राम ढंचायत के हरित आवरण वृद्धि आदि कार्य ढें किया जायेगा।	ढ०	0	0			
1.2	ढवेश ढिन्दु कार्य						
2.1.2.1	नौला / खाण की ढरम्मत / सुधारीकरण कार्य	ढ०	0	0			
2.1.2.2	ढेयजाल / सिचाई ढैक का निर्माण	ढ०	0	0			
2.1.2.3	सिचाई नहर का सुधारीकरण / निर्माण	ढी०	0	0			
2.1.2.4	खण्डजा सास्ता सुधारीकरण	ढी०	0	0			
2.1.2.5	सामुदायिक ढौक ढरम्मत	ढ०	0	0			
2.1.2.6	सामुदायिक ढन्दिर का जीर्णोद्धार	ढी०	0	0			
2.1.2.7	रेन शैड / शौचालय की ढरम्मत एवं निर्माण का कार्य	ढ०	0	0			
2	क्षढता विकास एवं ढवार ढसार						
2.2.1	ग्रामीणों / वन ढंचायतीं / परियोजना स्टाफ व ढिढगीय कर्मिको का ढशिक्षण व क्षढता विकास	ढ०	0	0			
2.2.2	परियोजना ढवार ढसार व अभिलेखी करण	ढ०	ढ०ढ०	0			
2.3	सूक्षढ योजना (ढाईक्रोखान) एवं विस्तृत ढरियोजना रिढर्ट (डी०ढी०आर०की तैयारी)	ढ०	ढ०ढ०	0			
2.4	अध्ययन / अनुसंधान	ढ०	ढ०ढ०	0			
				कुल योग तैयारी केज का			

गावन्द् वन्य जाव गवहार एव राष्ट्राय पाक, पुराला, उत्तरकाशाला

वार्षिक कार्या योजना वर्ष-2022-23 (कैट प्लान) के तहत किये गये कार्या के सापेक्ष व्यय का सांश

S.No.	Components	Unit	वर्ष 2022-23 हेतु प्रस्तावित		अवमुक्त धनराशि	03 / 2023 तक व्यय	अवशेष धनराशि
			Physical	Financial			
1	जलागम उपचार कार्य						
1.1	वानिकी कार्य						
3.1.1.1	वृक्षारोपण कार्य / अग्रिम मुदा कार्य	सं०	0	4052216	4052216	4052216	0
		योग		4052216	4052216	4052216	0
1.2	मुदा एवं जल संरक्षण कार्य						
3.1.2.1	वानस्पतिक बैंक डैम	सं०	0	0			
1.2.2a	अभियान्तिकी-कारे पत्थर के बैंक डैम	सं०/मी०	0	0			
1.2.2b	अभियान्तिकी-वायर क्रेट बैंक डैम	सं०/मी०	0	0			
3.1.2.3	जल संरक्षण हेतु ट्रेंच निर्माण	हे०	0	0			
3.1.2.4	जल संग्रहण टैंक	सं०	0	0			
3.1.2.5	धारा, नौला पेयजल मरम्मत	सं०	2	500000	500000	500000	0
3.1.2.6	बाल / खाल / चरी निर्माण	सं०	50	1250000	1250000	1250000	0
		योग		1750000	1750000	1750000	0
1.3	ईकोसिस्टम सर्विसेज						
3.1.3.1	संस्थागत श्रेणी के तहत पुरुस्कार	सं०	त०स०	200000	200000	200000	0
3.1.3.2	व्यक्तिगत श्रेणी के तहत पुरुस्कार	सं०	त०स०	0			
3.1.3.3	विशिष्ट श्रेणी के तहत पुरुस्कार	सं०	त०स०	0			
		योग		200000	200000	200000	0
1.4	वन्य जीव प्रबन्धन						
3.1.4.1	वन्यजीवों के प्राकृतिक आवास सुधार हेतु उपाय	त०स०	5	252600	252600	252600	0
3.1.4.2	वन्य जीव सुरक्षा सर्तकता बढ़ाने सम्बन्धी उपाय	त०स०	त०स०	50000	50000	50000	0
3.1.4.3	मानव वन्य जीव संघर्ष हेतु रोकथाम हेतु उपाय	सं०/स०	सं०/स०	0			
3.1.4.4	VFG हेतु मानदेय का व्यय एवं प्रशिक्षण	सं०	0	0			
		योग		302600	302600	302600	0
1.5	वैकल्पिक ऊर्जा						
3.1.5.1	सौरजानिक सोलर स्ट्रीट लाईट	सं०	0	0			
3.1.5.2	उज्जवला योजना के साथ कनर्वेजन्स माध्यम से एल०पी०जी० नैस चुल्हे / स्टीव का वितरण	सं०	0	0			
		योग		0		0	
2	संरक्षण लक्षित आजीविका संवर्द्धन						
2.1	कृषि विकास						
3.2.1.1	कृषि विकास चारापत्ती वृक्षारोपण (ASW)	हे०	0	0			
	कृषि विकास चारापत्ती वृक्षारोपण (Plantation)	हे०	0	0			
3.2.1.2	जैविक कृषि उत्पादन पद्धतियों का पदर्शन	हे०	0	0			

S.No.	Components	Unit	वर्ष 2022-23 हेतु प्रस्तावित		अवमुक्त धनराशि	03 / 2023 तक व्यय	अवशेष धनराशि
			Physical	Financial			
3.2.1.3	a. केंचुआ / नाडेप खाद गड्डा निर्माण	सं०	49	219600	219600	219600	0
	b. केंचुआ उत्पादन हैचरी निर्माण (कलस्टर स्तर)	सं०	3	78210	78210	78210	0
	c. जैविक कृषि प्रदर्शन	सं०	10	300000	300000	300000	0
	योग	सं०	0	0			
	योग	सं०		597810	597810	597810	0
2.2	औद्यानिकी						
a.	फल पौध वितरण	सं०	500	25000	25000	25000	0
	b. सौन पालन प्रदर्शन	सं०	30	125000	125000	125000	0
	c. मशरूम उत्पादन प्रदर्शन	सं०	10	195316	195316	195316	0
	d. विपणन हेतु वैकेजिंग सहायता	ल०स०		0		0	0
	योग	सं०		345316	345316	345316	0
2.3	पशुपालन						
a.	चारा मिनीकैट पदर्शन	सं०	100	85000	85000	85000	0
	b. चारा नाद का निर्माण	सं०	12	195460	195460	195460	0
	c. प्रसंस्करण हेतु सहायता	ल०स०		0		0	0
	योग	सं०		280460	280460	280460	0
2.4	गैर कृषि सेक्टर में आय अर्जक गतिविधियां						
a.	ईको-टूरिज्म हेतु अधारभूत संरचनाओं-होम स्टे का विकास	सं०	0	0			
	b. इस्तरित्य विकास-टूरस कब्जे माल का क्रय आदि हेतु	सं०	0	0			
	c. विपणन हेतु प्रचार-प्रसार आदि सहायता	ल०स०		0			
	योग	सं०		0			
2.5	सामाजिक सुरक्षा सहायता	सं०	0	0			
	कुल योग कैचमेंट उपचार कार्य			7528402	7528402	7528402	0
	समेकन फेज						
4.1	ग्रामीणों द्वारा विज्ञान स्थान की तैयारी	ल०स०	ल०स०	0			
	4.2 परियोजना कार्यो का संकलन एवं समापन	ल०स०	ल०स०	0			
	कुल योग समेकन फेज			0			
	आकस्मिक व्यय		ल०स०	0			
	महायोग			10203402	8603402	8603402	0

# ANNEXURE II & III

भारत हेवी इलेक्ट्रिकल्स लिमिटेड  
प्रदूषण नियंत्रण अनुसंधान संस्थान  
रानीपुर, हरिद्वार -249403 (उत्तराखण्ड)  
Bharat Heavy Electricals Limited  
Pollution Control Research Institute  
Ranipur, Haridwar - 249 403, Uttarakhand, India  
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E-mail: pooran81@bhel.in; robinskumar@bhel.in; kumar.shailendra@bhel.in;



Registered Post/Speed Post/By Hand

संदर्भ संख्या: हरि:प्र.नि.अनु.सं: 1903  
दिनांक: 25.03.2023

M/s SJVN Limited  
Naitwar-Mori  
Naitwar-Mori Hydro Electric Project, Mori  
Uttarkashi-249128-  
Uttarakhand

**विषय: : टेस्ट रिपोर्ट के संदर्भ में**

संदर्भ: आपके पत्र की संदर्भ संख्या: SJVN/NMHEP/PCD-151/22-80-82 Dated : 19.05.2022  
प्र.नि.अनु.सं. के पत्र की संदर्भ संख्या/ ई.मेल/ वर्क आर्डर सं: 22-0037-O-691

महोदय,

उपरोक्त विषयांक एवं संदर्भ संख्या में किये गये कार्य की टेस्ट रिपोर्ट सं. TL220694, Dated:24.03.2023 इस पत्र के साथ संलग्न है।

धन्यवाद,

  
(Robins Kumar)  
Manager  
Mob.7661026663  
PCRI BHEL Haridwar





# प्रदूषण नियंत्रण अनुसंधान संस्थान

भारत हेवी इलेक्ट्रिकल्स लिमिटेड, रानीपुर, हरिद्वार (उत्तराखंड)  
**POLLUTION CONTROL RESEARCH INSTITUTE**

(A Govt. of India – UNDP / UNIDO Project)  
**BHARAT HEAVY ELECTRICALS LIMITED**  
RANIPUR, HARIDWAR (U.K.) - 249 403

(Approved Lab under Environment (Protection) Act, 1986)

## TEST REPORT

**Lab Reference No:** TL220694 **Date:** 24.03.2023  
**Indentor:** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water Sample of Tones River (Upstream)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.4
Cadmium	mg/L	ND
COD	mg/L	3
Dissolved Phosphate	mg/L	0.94
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	0.04
Cynide	mg/L	ND
Fluoride	mg/L	0.56
Iron (as Fe)	mg/L	7.31
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	0.02
Mercury	mg/L	ND
Nickel	mg/L	0.01
Odour		Agreeable

Contd..2

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### TEST REPORT

- 2 -

Lab Reference No: TL220694

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.73
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	7.8
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	10.1
Total Kjeldal Nitrogen (TKN)	mg/L	3.08
Total Dissolved Solids	mg/L	30
Total Suspended Solids	mg/L	4
Vanadium	mg/L	ND
Zinc	mg/L	0.04

ND-Not Detectable

(Shailendra Kumar)  
Dy General Manager (PCRI)

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### TEST REPORT

**Lab Reference No:** TL220695 **Date :** 24.03.2023  
**Indentor** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water Sample of downstream of Tones River (Downstream) after Chibra Gad

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.8
Cadmium	mg/L	ND
COD	mg/L	8
Dissolved Phosphate	mg/L	0.88
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	0.05
Cynide	mg/L	ND
Fluoride	mg/L	0.53
Iron (as Fe)	mg/L	9.2
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	0.01
Mercury	mg/L	ND
Nickel	mg/L	ND
Odour	-	Agreeable

Contd..2

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## TEST REPORT

- 2 -

Lab Reference No: TL220695

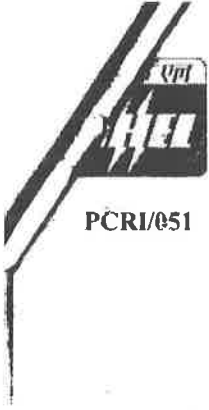
Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.34
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	8.0
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	10.2
Total Kjeldal Nitrogen (TKN)	mg/L	1.96
Total Dissolved Solids	mg/L	36
Total Suspended Solids	mg/L	12
Vanadium	mg/L	ND
Zinc	mg/L	0.03

ND-Not Detectable

(Shailendra Kumar)  
Dy General Manager (PCRI)

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### TEST REPORT

**Lab Reference No:** TL220696 **Date :** 24.03.2023  
**Indentor** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water sample of Tones River (Before confluence to Mia Gad)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.7
Cadmium	mg/L	ND
COD	mg/L	8
Dissolved Phosphate	mg/L	0.97
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	0.04
Cynide	mg/L	ND
Fluoride	mg/L	0.58
Iron (as Fe)	mg/L	4.0
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	0.01
Mercury	mg/L	ND
Nickel	mg/L	ND
Odour		Agreeable

Contd..2

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(Approved Lab under Environment (Protection) Act, 1986)

### TEST REPORT

- 2 -

Lab Reference No:

TL220696

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.34
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	7.9
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	10.8
Total Kjeldal Nitrogen (TKN)	mg/L	4.2
Total Dissolved Solids	mg/L	58
Total Suspended Solids	mg/L	6
Vanadium	mg/L	ND
Zinc	mg/L	0.02

ND-Not Detectable

(Shailendra Kumar)  
Dy General Manager (PCRI)

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**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water sample of Tones River (After confluence to Mia Gad)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.4
Cadmium	mg/L	ND
COD	mg/L	4
Dissolved Phosphate	mg/L	0.93
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	ND
Cynide	mg/L	ND
Fluoride	mg/L	0.55
Iron (as Fe)	mg/L	0.08
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	0.01
Mercury	mg/L	ND
Nickel	mg/L	0.01
Odour	-	Agreeable

Contd..2

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PCRI/051

**TEST REPORT**


- 2 -

Lab Reference No: TL220697

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.36
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	8.0
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	10.7
Total Kjeldal Nitrogen (TKN)	mg/L	3.36
Total Dissolved Solids	mg/L	50
Total Suspended Solids	mg/L	8
Vanadium	mg/L	ND
Zinc	mg/L	0.03

ND-Not Detectable

  
(Shailendra Kumar)  
Dy General Manager (PCRI)

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**Indentor** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water Sample of Tones River (Downstream to Power House)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.9
Cadmium	mg/L	ND
COD	mg/L	8
Dissolved Phosphate	mg/L	0.87
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	ND
Cynide	mg/L	ND
Fluoride	mg/L	0.43
Iron (as Fe)	mg/L	0.14
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	ND
Mercury	mg/L	ND
Nickel	mg/L	0.01
Odour		Agreeable

Contd..2

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- 2 -

Lab Reference No: TL220698

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.34
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	7.8
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	10.9
Total Kjeldal Nitrogen (TKN)	mg/L	1.96
Total Dissolved Solids	mg/L	52
Total Suspended Solids	mg/L	6
Vanadium	mg/L	ND
Zinc	mg/L	0.04

ND-Not Detectable

(Shailendra Kumar)  
Dy General Manager (PCRI)

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**Lab Reference No:** TL220699 **Date:** 24.03.2023  
**Indentor:** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water Sample from Tones River (Down Stream to Sandra range quarry site)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.6
Cadmium	mg/L	ND
COD	mg/L	5
Dissolved Phosphate	mg/L	0.93
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	0.01
Cynide	mg/L	ND
Fluoride	mg/L	0.53
Iron (as Fe)	mg/L	0.06
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	ND
Mercury	mg/L	ND
Nickel	mg/L	0.01
Odour		Agreeable

Contd..2

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- 2 -

Lab Reference No:

TL220699

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.32
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	8.0
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	11.1
Total Kjeldal Nitrogen (TKN)	mg/L	3.92
Total Dissolved Solids	mg/L	54
Total Suspended Solids	mg/L	10
Vanadium	mg/L	ND
Zinc	mg/L	0.03

ND-Not Detectable

(Shailendra Kumar)  
Dy General Manager (PCRI)

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## TEST REPORT

**Lab Reference No:** TL220700 **Date :** 24.03.2023  
**Indentor** M/s SJVN LIMITED, (A Joint Venture of Govt. of India & Govt. of Himachal Pradesh), Naitwar-Mori Hydro Electric Project, Mori, Distt. Uttarkashi, Uttarakhand-249128  
**Customer's Ref. No.:** PO SJVN/NMHEP/PCD-151/22-80-82 Dated 19.05.2022  
**Work Order No.:** 22-0037-O-691  
**Sample Collected by:** PCRI Staff **Collection Date:** 11.02.2023  
**Sample/Job:** Water Sample from Tones River (Down Stream to Devta Range Quarry site)

PARAMETER	UNIT	OBTAINED VALUE
Ammonical Nitrogen	mg/L	ND
Free Ammonia	mg/L	ND
Arsenic	mg/L	ND
BOD <sub>3</sub> at 27°C	mg/L	0.9
Cadmium	mg/L	ND
COD	mg/L	9
Dissolved Phosphate	mg/L	0.89
Hexavalent Chromium	mg/L	ND
Chromium Total	mg/L	ND
Colour	Hazen	<5
Copper	mg/L	ND
Cynide	mg/L	ND
Fluoride	mg/L	0.36
Iron (as Fe)	mg/L	0.11
Lead	mg/L	0.01
Manganese (as Mn)	mg/L	0.01
Mercury	mg/L	ND
Nickel	mg/L	ND
Odour	-	Agreeable

Contd..2

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**POLLUTION CONTROL RESEARCH INSTITUTE**  
(A Govt. of India – UNDP / UNIDO Project)  
BHARAT HEAVY ELECTRICALS LIMITED  
RANIPUR, HARIDWAR (U.K.) - 249 403  
(Approved Lab under Environment (Protection) Act, 1986)

## TEST REPORT

- 2 -

Lab Reference No: TL220700

Date : 24.03.2023

PARAMETER	UNIT	OBTAINED VALUE
Nitrate (as NO <sub>3</sub> )	mg/L	0.33
Mineral Oil (Oil & Grease)	mg/L	ND
pH	-	7.9
Phenol	mg/L	ND
Residual Chlorine	mg/L	ND
Selenium	mg/L	ND
Sulphides	mg/L	ND
Temperature	°C	11.2
Total Kjeldal Nitrogen (TKN)	mg/L	3.36
Total Dissolved Solids	mg/L	56
Total Suspended Solids	mg/L	8
Vanadium	mg/L	ND
Zinc	mg/L	0.03

ND-Not Detectable

  
(Shailendra Kumar)  
Dy General Manager (PCRI)

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Bharat Heavy Electricals Limited  
Pollution Control Research Institute  
Ranipur, Haridwar - 249 403, Uttarakhand, India  
Phone: 01334 – 281362, 284029  
E-mail: pooran81@bhel.in; robinskumar@bhel.in; kumar.shailendra@bhel.in;



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संदर्भ संख्या: हरि:प्र.नि.अनु.सं: 1892  
दिनांक: 22.03.2023

M/s SJVN Limited  
Naitwar-Mori  
Naitwar-Mori Hydro Electric Project, Mori  
Uttarkashi-249128  
Uttarakhand

**विषय: : टेस्ट रिपोर्ट के संदर्भ में**

संदर्भ: आपके पत्र की संदर्भ संख्या : SJVN/NMHEP/PCD-151/22-80-82 Dated : 19.05.2022  
प्र.नि.अनु.सं. के पत्र की संदर्भ संख्या/ ई.मेल/ वर्क आर्डर सं. : 22-0037-O-691

महोदय,

उपरोक्त विषयांक एवं संदर्भ संख्या में किये गये कार्य वायु की टेस्ट रिपोर्ट सं. PCRI: Air & Noise: 2022-23: 1249-1253, 1254-1258 इस पत्र के साथ संलग्न है।

धन्यवाद,

भवदीय,

(Robins Kumar)

Manager

Mob.7661026663

PCRI BHEL Haridwar





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**TEST REPORT**  
**AMBIENT AIR MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 : 1249  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1.	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi (Uttarakhand)
2.	Work Order No.	:	22-0037-0-691
3.	Date of sampling	:	09.02.2023 to 10.02.2023
4.	Location of Sampling	:	Barrage Office ( Site)
5.	Method of Sampling	:	IS:5182 (Part-II-2001, Part-23-2006, Part-VI-2006), NDIR & Gas Detection System, IS-5182 (Part-9), AAS, PM2.5 Sampler
6.	Duration of Sampling	:	24 Hours
7.	Sample collection by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

**B. RESULTS OF AMBIENT AIR MONITORING:**

Sl. No.	Parameter	Unit	Obtained Value	NAAQ Standards*
1.	Particulate Matter less than 10 $\mu\text{m}$ or $\text{PM}_{10}$	$\mu\text{g}/\text{m}^3$	43	100
2.	Particulate Matter less than 2.5 $\mu\text{m}$ or $\text{PM}_{2.5}$	$\mu\text{g}/\text{m}^3$	18	60
3.	Sulphur Dioxide ( $\text{SO}_2$ )	$\mu\text{g}/\text{m}^3$	BDL	80
4.	Nitrogen Dioxide ( $\text{NO}_2$ )	$\mu\text{g}/\text{m}^3$	BDL	80
5.	Carbon Monoxide ( $\text{CO}$ )	$\text{mg}/\text{m}^3$	BDL	4
6.	Lead ( $\text{Pb}$ )	$\mu\text{g}/\text{m}^3$	BDL	1
7.	Ammonia ( $\text{NH}_3$ )	$\mu\text{g}/\text{m}^3$	BDL	400
8.	Ozone ( $\text{O}_3$ )	$\mu\text{g}/\text{m}^3$	46	180
9.	Benzene ( $\text{C}_6\text{H}_6$ )	$\mu\text{g}/\text{m}^3$	BDL	5
10.	Benzo(a)pyrene ( BaP. )	$\text{ng}/\text{m}^3$	BDL	1
11.	Arsenic ( $\text{As}$ )	$\text{ng}/\text{m}^3$	BDL	6
12.	Nickel ( $\text{Ni}$ )	$\text{ng}/\text{m}^3$	BDL	20

BDL: Below Detectable Limit,

\*: National Ambient Air Quality Standards as per CPCB Notification N. Delhi, the 18 Nov. 2009 for Industrial, Residential and Rural Areas

Issued by  
*Avinash*  
( Avinash Kumar )  
Manager (PCRI)

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**TEST REPORT**  
**AMBIENT AIR MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 :1250  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1.	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi (Uttarakhand)
2.	Work Order No.	:	20-0179-0-691
3.	Date of sampling	:	09.02.2023 to 10.02.2023
4.	Location of Sampling	:	Near Stone Crusher ( Site)
5.	Method of Sampling	:	IS:5182 (Part-II-2001, Part-23-2006, Part-VI-2006), NDIR & Gas Detection System, IS-5182 (Part-9), AAS, PM2.5 Sampler
6.	Duration of Sampling	:	24 Hours
7.	Sample collection by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

**B. RESULTS OF AMBIENT AIR MONITORING:**

Sl. No.	Parameter	Unit	Obtained Value	NAAQ Standards*
1.	Particulate Matter less than 10 µm or PM <sub>10</sub>	µg/m <sup>3</sup>	97	100
2.	Particulate Matter less than 2.5 µm or PM <sub>2.5</sub>	µg/m <sup>3</sup>	48	60
3.	Sulphur Dioxide ( SO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
4.	Nitrogen Dioxide ( NO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
5.	Carbon Monoxide ( CO )	mg/m <sup>3</sup>	BDL	4
6.	Lead ( Pb )	µg/m <sup>3</sup>	BDL	1
7.	Ammonia ( NH <sub>3</sub> )	µg/m <sup>3</sup>	BDL	400
8.	Ozone ( O <sub>3</sub> )	µg/m <sup>3</sup>	47	180
9.	Benzene ( C <sub>6</sub> H <sub>6</sub> )	µg/m <sup>3</sup>	BDL	5
10.	Benzo(a)pyrene ( BaP )	ng/m <sup>3</sup>	BDL	1
11.	Arsenic ( As )	ng/m <sup>3</sup>	BDL	6
12.	Nickel ( Ni )	ng/m <sup>3</sup>	BDL	20

BDL: Below Detectable Limit,

\*: National Ambient Air Quality Standards as per CPCB Notification N. Delhi, the 18 Nov. 2009 for Industrial, Residential and Rural Areas

Issued by  
*Avinash*  
( Avinash Kumar )  
Manager (PCRI)

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**TEST REPORT**  
**AMBIENT AIR MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 : 1251  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1.	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi (Uttarakhand)
2.	Work Order No.	:	22-0037-O-691
3.	Date of sampling	:	09.02.2023 to 10.02.2023
4.	Location of Sampling	:	Near Bainol Village
5.	Method of Sampling	:	IS:5182 (Part-II-2001, Part-23-2006, Part-VI-2006), NDIR & Gas Detection System, IS-5182 (Part-9), AAS, PM2.5 Sampler
6.	Duration of Sampling	:	24 Hours
7.	Sample collection by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

**B. RESULTS OF AMBIENT AIR MONITORING:**

Sl. No.	Parameter	Unit	Obtained Value	NAAQ Standards*
1.	Particulate Matter less than 10 µm or PM <sub>10</sub>	µg/m <sup>3</sup>	88	100
2.	Particulate Matter less than 2.5 µm or PM <sub>2.5</sub>	µg/m <sup>3</sup>	41	60
3.	Sulphur Dioxide ( SO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
4.	Nitrogen Dioxide ( NO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
5.	Carbon Monoxide ( CO )	mg/m <sup>3</sup>	0.10	4
6.	Lead ( Pb )	µg/m <sup>3</sup>	BDL	1
7.	Ammonia ( NH <sub>3</sub> )	µg/m <sup>3</sup>	BDL	400
8.	Ozone ( O <sub>3</sub> )	µg/m <sup>3</sup>	49	180
9.	Benzene ( C <sub>6</sub> H <sub>6</sub> )	µg/m <sup>3</sup>	BDL	5
10.	Benzo(a)pyrene ( BaP )	ng/m <sup>3</sup>	BDL	1
11.	Arsenic ( As )	ng/m <sup>3</sup>	BDL	6
12.	Nickel ( Ni )	ng/m <sup>3</sup>	BDL	20

**BDL:** Below Detectable Limit,

\*: National Ambient Air Quality Standards as per CPCB Notification N. Delhi, the 18 Nov. 2009 for Industrial, Residential and Rural Areas

Issued by  
*Avinash*  
(Avinash Kumar)  
Manager (PCRI)

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**TEST REPORT**  
**AMBIENT AIR MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 : 1252  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1.	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi (Uttarakhand)
2.	Work Order No.	:	22-0037-O-691
3.	Date of sampling	:	10.02.2023 to 11.02.2023
4.	Location of Sampling	:	Sandra Range Quarry (Panwar House)
5.	Method of Sampling	:	IS:5182 (Part-II-2001, Part-23-2006, Part-VI-2006), NDIR & Gas Detection System, IS-5182 (Part-9), AAS, PM2.5 Sampler
6.	Duration of Sampling	:	24 Hours
7.	Sample collection by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

**B. RESULTS OF AMBIENT AIR MONITORING:**

Sl. No.	Parameter	Unit	Obtained Value	NAAQ Standards*
1.	Particulate Matter less than 10 µm or PM <sub>10</sub>	µg/m <sup>3</sup>	36	100
2.	Particulate Matter less than 2.5 µm or PM <sub>2.5</sub>	µg/m <sup>3</sup>	17	60
3.	Sulphur Dioxide ( SO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
4.	Nitrogen Dioxide ( NO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
5.	Carbon Monoxide ( CO )	mg/m <sup>3</sup>	0.11	4
6.	Lead ( Pb )	µg/m <sup>3</sup>	BDL	1
7.	Ammonia ( NH <sub>3</sub> )	µg/m <sup>3</sup>	BDL	400
8.	Ozone ( O <sub>3</sub> )	µg/m <sup>3</sup>	46	180
9.	Benzene ( C <sub>6</sub> H <sub>6</sub> )	µg/m <sup>3</sup>	BDL	5
10.	Benzo(a)pyrene ( BaP )	ng/m <sup>3</sup>	BDL	1
11.	Arsenic ( As )	ng/m <sup>3</sup>	BDL	6
12.	Nickel ( Ni )	ng/m <sup>3</sup>	BDL	20

BDL: Below Detectable Limit,

\*: National Ambient Air Quality Standards as per CPCB Notification N. Delhi, the 18 Nov. 2009 for Industrial, Residential and Rural Areas

Issued by  
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Manager (PCRI)

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**TEST REPORT**  
**AMBIENT AIR MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 : 1253  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1.	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi (Uttarakhand)
2.	Work Order No.	:	22-0037-0-691
3.	Date of sampling	:	10.02.2023 to 11.02.2023
4.	Location of Sampling	:	Near Devta Range Quarry (Khooni Gad)
5.	Method of Sampling	:	IS:5182 (Part-II-2001, Part-23-2006, Part-VI-2006), NDIR & Gas Detection System, IS-5182 (Part-9), AAS, PM2.5 Sampler
6.	Duration of Sampling	:	24 Hours
7.	Sample collection by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

**B. RESULTS OF AMBIENT AIR MONITORING:**

Sl. No.	Parameter	Unit	Obtained Value	NAAQ Standards*
1.	Particulate Matter less than 10 µm or PM <sub>10</sub>	µg/m <sup>3</sup>	59	100
2.	Particulate Matter less than 2.5 µm or PM <sub>2.5</sub>	µg/m <sup>3</sup>	31	60
3.	Sulphur Dioxide ( SO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
4.	Nitrogen Dioxide ( NO <sub>2</sub> )	µg/m <sup>3</sup>	BDL	80
5.	Carbon Monoxide ( CO )	mg/m <sup>3</sup>	0.15	4
6.	Lead ( Pb )	µg/m <sup>3</sup>	BDL	1
7.	Ammonia ( NH <sub>3</sub> )	µg/m <sup>3</sup>	BDL	400
8.	Ozone ( O <sub>3</sub> )	µg/m <sup>3</sup>	49	180
9.	Benzene ( C <sub>6</sub> H <sub>6</sub> )	µg/m <sup>3</sup>	BDL	5
10.	Benzo(a)pyrene ( BaP )	ng/m <sup>3</sup>	BDL	1
11.	Arsenic ( As )	ng/m <sup>3</sup>	BDL	6
12.	Nickel ( Ni )	ng/m <sup>3</sup>	BDL	20

BDL: Below Detectable Limit,

\*: National Ambient Air Quality Standards as per GPCB Notification N. Delhi, the 18 Nov. 2009 for Industrial, Residential and Rural Areas

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( Avinash Kumar )  
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**TEST REPORT**  
**AMBIENT NOISE MONITORING**

Lab. Ref.: PCRI: Air & Noise: 2022-23 : 1254-1258  
Date: 21-03-2023

**A. GENERAL INFORMATION:**

1	Name and address of Plant	:	M/s SJVN Limited, Naitwar-Mori Hydro Electric Project, Mori, District- Uttarkashi, Uttarakhand
2	Work Order No.	:	22-0037-0-691
3	Date of sampling	:	11.02.2023
4	Instrument used	:	Sound Level Meter
5	Measurement carried out by	:	PCRI, BHEL, Ranipur, Haridwar-249403 (UK)

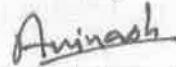
**B. RESULTS OF NOISE MEASUREMENT:**

All measurement in dB (A)

Sl. No.	Location	Measured Values	Allowable Limit (Day Time) * Leq.
1.	Barrage Site Office	68	75 dB (A)
2.	Near Stone Crusher	65	
3.	Near Bainol Village	58	
4.	Near Sandra Range Quarry	65	
5.	Near Devta Range Quarry	57	

**Leq.** : Equivalent Sound Pressure Level

**\*Allowable Noise Limit:** Ambient Air Quality Standards in respect of Noise: Environmental (Protection) Rule, 1986-Schedule-III for Industrial Area

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(Avinash Kumar)  
Manager (PCRI)

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