MINUTES OF THE 19th MEETING OF TECHNICAL CUM COST COMMITTEE (TCC) OF NATIONAL MINERAL EXPLORATION TRUST (NMET)

Held at Fermor Conference Hall, Geological Survey of India, Nagpur on 18th & 19th January, 2019

The 19th meeting of Technical-Cum-Cost Committee (TCC) of National Mineral Exploration Trust (NMET) was held at Fermor Conference Hall, GSI, Nagpur on 18th & 19th January of 2019 under the chairmanship of Shri D. Mohan Raj, Addl. Director General & Head, National Mission-II, GSI, Nagpur. The list of participants is as per **Annexure-1A & 1B**.

Shri Manoj Kumar, Director, DGCO and Member Secretary, NMET welcomed all the members and gave a brief account of the decisions taken in 18th TCC meeting. He expressed the concerns of NMET Secretariat over the time overrun of the project and called for putting best efforts to avoid the same.

Shri Pradeep Singh, Director, NMET highlighted the observations of IFD, MoM in particular the NMET funded project with time over-run under execution by MECL. The committee expressed that the issue of time overrun on projects is a serious matter and all implementing agencies including MECL have to manage project execution in such a way that large time overrun on projects could be avoided.

Shri D. Mohan Raj, ADG & NMH-II and Chairman, TCC also welcomed the participants including those of new members of TCC. He restressed on furnishing new proposals well in advance of 15 days by NEAs so that the sufficient time is available to TCC members for study of the proposals. He also reiterated the objectives of NMET with thrust on bringing out concealed/deep seated deposits in the country, sustainable and advanced mining methodologies and technological practices, NMET funding priority for regional and detailed exploration for strategic and critical metals, facilitating greenfield regional exploration, including high risk exploration for deep seated mineralization, promoting G2 level exploration in the areas where G3 stage of exploration already carried out, facilitating geophysical surveys in the country and facilitating National Core repository for encouraging research etc.

He recalled the decision of 18th TCC that the vetting of the completed report will be done by TCC Committee and the same will be put up for approval in Executive Committee of NMET**.** He also told that in this connection, the NEAs may be asked for presentation and review in the TCC meeting on the completed report. Initiating the proceedings of the meeting, he invited the concerned NEAs for their technical deliberations.

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Evaluation of new proposals

Agenda-1: KIOCL PROJECT PROPOSAL

- The KIOCL representative informed that the proposed exploration proposals for limestone has been taken up at the instance of Director, DMG, Govt. of Karnataka vide their Lr No. DMG-17013/6/2018-19/4010, dated 06.09.2018 for mooting out seamless proposal for G3 to G2 in 1592.18 ha and 161.135 ha area of Neerbudhihal and Kalasakappa blocks respectively.
- The limestone deposits belong to Kaladgi Group (Proterozoic) of Kaladgi Basin
- Representative from DMG, Karnataka endorsed that the proposed blocks does not have any Lease Hold area.
- DDG & RMH-IV, SR, GSI, stated that proposed Kalaskoppa and Neerbudhihal blocks (KIOCL) are located to the East of East & West Varchagal Blocks, where GSI carried out G3 level of exploration and estimated 12 million tonnes and 4 million tonnes of resources, respectively for limestone and dolomite.
- Geologically, the Limestone & Dolomite occur in Yendigere Fm of Lokapur Group in Kaladgi Basin.

1.1 PRELIMINARY EXPLORATION (G3) IN NEERBUDHIHAL LIMESTONE & DOLOMITE BLOCK, KARNATAKA – KAR_NLDB_3363

Committee discussed the proposal in detail and observed the following-

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- A State Highway passes through the block, leaving aside the buffer corridor of 500 m on either side of the road, the remaining area to the east of road is insufficient for developing a mine. Moreover, the geological data is also insufficient to support a G3 level of exploration.
- DGM, Karnataka informed that high grade limestone from this sector is being used in steel making.
- Limestone deposits in the adjacent areas are reported with structural complexity and highly dipping beds of limestone and disturbance as reported by SU: K&G, GSI.
- In the proposed block Dolomite is occurring associated with the limestone in the area
- Committee observed that the Geological evidences available are insufficient to directly take up the block for G3 level exploration works.
- Suggested to carve out an area sufficient to have large scale geological mapping with collection of structural data to understand the plan the further course of exploration.

Committee recommended that a block inclusive of above area, a larger area to the extent of 30 sq km, may be drawn in consultation with DMG, Karnataka proposing for G4 level studies along with proposals of Detailed Geological & Structural Mapping initially and collection of samples and other geological activities to prove the consistent thickness of limestone in the area.

1.2 PRELIMINARY EXPLORATION IN KALASAKOPPA LIMESTONE & DOLOMITE BLOCK (DIST), KARNATAKA – KAR_KLDB_1580 (G3)

Committee discussed the proposal in detail and observed the following

- A Railway line passes through the block area.
- Limestone deposit in the adjacent areas (operating mines of State PSU) has been expected to continue in the block area.
- Eastern side of the block is restricted with human settlement.
- Bifurcating the block after leaving behind 500 m buffer zone on either side of the railway line will result in smaller area, insufficient for exploration/mining.
- DMG, Karnataka opined that even the smaller blocks are essential for auction to cater smaller entrepreneurs.

Committee recommended that the smaller area to the south of the railway line may be abandoned and cannot be considered for exploration, and suggested to draw a fresh block on the Northern part of the railway line with larger extent in consultation with DMG, Karnataka for G3 level exploration works.

Agenda-2: PROPOSALS FROM OMECL

2.1 PROPOSAL FOR GENERAL EXPLORATION (G2) IN KHANDADHAR SUB-BLOCK-A FOR IRON ORE IN SUNDARGARH DISTRICT, ODISHA STATE

- As per suggestion of 18th TCC, OMECL submitted modified proposal of Khandadhar Sub Block-A for G2 level of exploration for Iron in 4.039 sq km along with geological mapping on 1:2000 scale and drill holes at 200x200m grid to be drilled up to 60m.
- The borehole location to be fixed on the basis of the topography of the area/ore body.
- One borehole core up to 200 m to be submitted to GSI with maximum core recovery.

Committee recommended the proposal of G2 level exploration in Khandadhar Sub Block- A in Sundergarh, Odisha for an estimated cost of Rs 405.23 Lakh including GST and time schedule of 12 months as per Annexure-2A & 2B.

2.2 PROPOSAL FOR PRELIMINARY EXPLORATION (G3) IN KARNAPODIKONDA IN NARAYANPATNA TEHSIL, KORAPUT DISTRICT, ODISHA

- The exploration proposal for bauxite in Karnapodikonda lies in Eastern Ghat Bauxite Belt nearby operational mines such as Panchpatmali, Baphlimali & Kodingmali.
- The block with 9.062 Sq km is exposed as merged linear bodies extending along NNE-SSW with bauxite exposed along scarps.
- The OMECL proposed to take up G3 level exploration in the block with an area of 9.062 sq km along with detailed geological mapping on 1:4,000 scale and sampling.

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- The exploratory drill holes may be carried out on 400m x 400 m grid comprising 43 boreholes with a total of 1020 m of drilling. The committee accepted the proposal of OMECL for the drilling to be taken up on outsourced basis.
- The execution of exploration including survey, mapping, drilling, sampling and chemical analysis etc., have to be undertaken as per the time schedule and work plan given in Annexure-3A & 3B.
- Initially 25 samples from 5 bore holes (1 m sample length) are required to be analysed, if results are not encouraging then the drilling may be stopped restricted to the top of lithomarge. If the results are encouraging all the bore holes may be drilled to the top of bedrock and the entire thickness of lithomarge clay to be analysed for REE elements as per the sample length suggested above.
- If total SiO2 is more than 5%, then Reactive Silica required to be analysed.
- REE analysis can also be done in ferruginous laterite capping for five samples initially, if the results are encouraging, all the samples should also be analysed.
- As per suggestion of Committee, the bore hole points were relocated taking into consideration the outcrop pattern and exposer of bauxite along scarps.
- Committee emphasised core recovery should be more than 90%.

Committee recommended the proposal of G3 level exploration in Karnapodikonda Bock in Koraput, Odisha for an estimated cost of Rs 170.98 Lakh including GST and time schedule of Eight months as per Annexure-3A & 3B.

Agenda-3: **PROPOSALS FROM HCL**

- Hindustan Copper Limited (HCL) submitted the modified proposals for G2 Exploration for (i) Khetri Copper Block of Khetri Copper complex (KCC), (ii) Malanjkhand Copper Lease, MCP and (iii) Rakha Mining Leases of Indian Copper Complex (ICC) and Kendadih as per suggestion of the 17th TCC- NMET which were originally proposed for G3 level of exploration. The already recommended project proposal on Kolihan Lease Block was also reviewed by the committee.
- During the discussion, HCL officials informed that an EOI has already been floated for Geophysical Survey for all the lease areas. The objective of these studies is to prove the strike and depth continuity (up to a depth of about 1000-1200 meters) of the deposit through Ground Geophysical Surveys. Subsequently, the committee suggested that the drilling proposals submitted by HCL are to be taken up based on results of Geophysical Survey. In addition to these, the Appropriate Magnetotelluric (MT) Survey method to be deployed to map the conductive body, a suitable geophysical method for evaluation of deep-seated sulphide deposit, was also suggested to be resorted in **Khetri and Rakha areas.**
- The copper mineralisation in the adjacent area are already proved to the depth of 800 to 1000m, in those areas the exploration needs to be taken up by drilling as informed by the HCL.
- The proposed G2 level of exploration in parts of Khetri Copper Block of KCC, Rakha Copper Mining Lease of ICC and Malanjkhand Copper Lease, Kendadih aims on establishing copper reserves to support enhance production targets.
- HCL also informed the committee that the exploration in all the four lease areas will be undertaken through MECL.

The three revised new projects proposals and one proposal of Kolihan recommended during 17th TCC were reviewed in the 19th meeting of TCC whose details are as follow-

3.1 PROPOSAL FOR GENERAL EXPLORATION (G2) FOR KHETRI COPPER (BLOCK) MINING LEASE, DISTRICT JHUNJHUNU, RAJASTHAN

- HCL originally proposed exploration of G3 level in this block, however, the 17th TCC Committee suggested revising the proposal with boreholes to be drilled at 90x60m intervals in compliance with G2 stage exploration guidelines. The committee in 17th TCC meeting also advised to revise the proposal corresponding to G2 Level of exploration up to (-)300 mRL between 3900 to 5000 latitude and 1960 to 2900 latitude. However, during the present discussions the committee felt that the exploration by drilling at depth greater than (-180m) may be planned and executed based on the results of the geophysical studies. Therefore, the committee recommended to restrict the

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exploration proposal between 3900 to 5000 latitude in Khetri block upto a depth of (-)180 mRL only. The decision is based on the fact that continuity of mineralization has been proved in adjoining blocks up to corresponding depth (Banwas Block and Central Galaxy of Khetri Block).

- Possibilities of drilling through underground drives/facilities were also discussed on techno-economic consideration. However, HCL explained that time schedule and rate for underground mine development becomes expensive compared with the planned exploratory drilling as it requires to address operational issues like ventilation, sufficient space for drilling machine, accessories and waste generation. Committee agreed on requirement of surface drilling.
- Accordingly, HCL further revised the proposal and presented before the 19th TCC. The 19th TCC Committee also endorses to include the various suggestion given during 17th TCC –
  - In the first phase, the exploration between 3900 to 5000 latitude in Khetri block will be taken up upto (-180) mRL.
  - The exploration in second phase from (-180) mRL to (-300) mRL shall be planned based on the results of geophysical studies.
  - A total of 29 boreholes to be drilled, each to a depth of 550m and an estimated meterage of 20,595m
  - Staggered pattern of boreholes needs to be avoided and systematic multiple intersections along same profiles are to be made for achieving proper levels of intersections at every -60m, -120 and -180m vertical depth to enable level plans and proper resource estimation practices to be adopted.
  - Ore body modelling has to be taken as whole/all mine area and cost will be reimbursed on actual basis.
  - Committee also suggested that analysis of composite samples to include Co, Ni and Mo in addition to proposed Cu, Au, Ag, Pb, Zn analyses.

Committee recommended the proposal for the approval of the EC, with G2 stage exploration at an estimated cost of Rs. 27.40 Crores to be completed in 18 months as per Annexure-4A & 4B.

3.2 EXPLORATION PROPOSAL FOR COPPER IN HCL/ICC MINE LEASE BLOCK (RAKHA & KENDADIH BLOCKS), GHATSHILA SUBDIVISION, DISTRICT- EAST SINGHBHUM, JHARKHAND (G-2).

- The proposed blocks are part of 200 km long Singhbhum Copper Belt (SCB) extending between Kesharpur in South East and Duarpuram in North West, within Shighbhum Shear Zone. The proposals cover 929.05 Ha (387.64 Ha) in Rakha ML in NW & 541.41 Ha in Kendadih ML in SE.
- The proposal was presented by HCl in 17th TCC meeting where committee suggested to revise the same for G2 stage of exploration with suggestion of drill holes spacing at strike interval of 100m; vertical depth of intersection is to be kept at 75m intervals (to facilitate their mine level plans); Initially, the exploration to be restricted to -260mRL for Kendadih and Rakha Blocks. Chapri may be taken up at a later stage.
- Accordingly, HCL presented the revised proposal in 19th TCC, where the committee suggested that G2 explorations of Phase-1A and Phase-1B may be taken up to (-)180 mRL following the MT Survey to be undertaken along 8 km strike length and at an station interval of 500m.
- However, Committee also enquired various possibilities of taking up the exploration programme from underground facilities. HCL explained that cost requirement will not be less if exploration program to be conducted through underground developments and time required for development of winze, drive, x-cuts also need to be taken into account apart from the waste excavations which will have to be hoisted on surface and may pose environmental hazards.

The committee advised HCL to submit a note on cost comparison with pros & con analysis between proposed explorations through underground facilities via-a-vis from surface, for further necessary observations of the Committee.

3.3 EXPLORATION PROPOSAL (G2) LEVEL FOR MALANJKHAND COPPER MINING LEASE, BALAGHAT DISTRICT, MADHYA PRADESH.

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- Malanjkhand Copper Deposit is located in the southern block of Central Indian Precambrian Shield. The basement Complex comprises low grade metasediments of the Chilpi Ghat Series of Lower Proterozoic age intruded by granitoids and subsequently by quartz reef forming the main host of sulphide mineralization and varies in composition from pure quartz to quartzo- feldspathic rock.
- The depth of existing open pit is about 250m from surface, up to 340mRL. Potential of the deposit, in this area up to "0" mRL, has already been established. Underground mining activities has been planned at Malanjkhand below open pit mine up to (-) 60 mRL at first phase. The underground mine will be further deepened in the next phase.
- The proposal was presented to 17th TCC Committee by HCL, where committee suggested to revised exploration proposal for G-2 stage between Section Lines S-1 to S-11 over a strike length of 850m with boreholes to be drilled along the existing section lines to intersect the mineralized zone at a uniform level. Spacing of vertical depth of intersection to be kept at 60m and intersect at levels: (-)60mRL, (-) 120mRL, and (-)180mRL and may be up to -300mRL. After ensuring the presence of mineralized body in the first level (i.e., -60m), second level exploration (i.e., -120m) to be taken up after periodic review of TCC.
- Accordingly, HCL presented a revised proposal in 19th TCC meeting. After review, committee suggested to restrict the exploration up to (-)240mRL within areas between Section 1 and Section 9A (covering about 850m strike length).
  - In the first phase, the exploration between section lines S1 to S9A (covering about 850m strike length) restrict the exploration level up to (-240) mRL.
  - A total of 24 boreholes to be drilled, and an estimated meterage of 19,150m
  - Staggered pattern of boreholes needs to be avoided and systematic multiple intersections along same profiles are to be made for achieving proper levels of intersections at every -120m, -180 and -240m vertical depth to enable level plans and proper resource estimation practices to be adopted.
  - Ore body modelling has to be taken as whole/all mine area and cost will be reimbursed on actual basis.
  - Committee also suggested that analysis of composite samples to include Co, Ni and Mo in addition to proposed Cu, Au, Ag, Pb, Zn analyses.

Committee recommended the proposal for the approval of the EC, with G2 stage exploration at an estimated cost of Rs. 26.46 Crores to be completed in 18 months, NMET as per Annexure-5A & 5B.

3.4 EXPLORATION PROPOSAL (G2) LEVEL FOR KOLIHAN COPPER MINING LEASE, DISTRICT JHUNJHUNU, RAJASTHAN

- The project proposal for G2 stage exploration was reviewed and recommended during 17th TCC meeting for G2 level exploration with 24668 meters of drilling at an estimated cost of Rs. 31.66 crores up to a depth of (-) 300 mRL. The proposal envisaged G-2 stage exploration in Kolihan Mining Lease Block with the help of 24,648m of drilling in 32 boreholes with spacing of 100m and up to depth of -300mRL from 0mRL.
- However, the 19th TCC committee re-examined the proposal and advised to restrict the exploration drilling proposal up to (-) 180 mRL in first phase. The committee was of view that the exploration at deeper levels from (-180) mRL to (-300) mRL will be taken up in second phase after review of the results of Geophysical studies. Accordingly, HCL revised the proposal and submitted.

- In the first phase, the exploration between restrict the exploration level up to (-180) mRL.
- A total of 21 boreholes to be drilled, each borehole at a depth of 604m and an estimated meterage of 15093m
- Staggered pattern of boreholes needs to be avoided and systematic multiple intersections along same profiles are to be made for achieving proper levels of intersections at every -120m, -180 and -240m vertical depth to enable level plans and proper resource estimation practices to be adopted.
- Ore body modelling has to be taken as whole/all mine area and cost will be reimbursed on actual basis.
- Committee also suggested that analysis of composite samples to include Co, Ni and Mo in addition to proposed Cu, Au, Ag, Pb, Zn analyses.

Committee reviewed its decision of 17th TCC meeting w.r.t. to Cost and Depth of exploration in r/o Kolihan Block and recommended the proposal for the approval of the EC, with G2 stage exploration up to depth of (-)180Mrl, at an estimated cost of Rs. 20.44 Crores to be completed in 18 months as per Annexure-6A & 6B.

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The committee also recommended that for all the above four proposals of HCL that standard norms of ore body intersection are to be followed i.e., first level intersection at (-)60m vertical depth is to be followed by second level at (-)120m and third at (-)180m level from the reference level considered for exploration. After establishing continuity of ore body up to the first level, the promising areas needs to be considered for second level drilling after the review and approval from the TCC.

Agenda-4: PROJECT PROPOSALS OF MECL

4.1 GENERAL EXPLORATION (G2) PROPOSAL FOR ESTIMATION OF GOLD ORE IN C. K HALLI NORTH BLOCK (0.40 SQ KM), CHITRADURGA DISTRICT, KARNATAKA.

- DGM Karnataka informed that there is overlap issue of Deccan Gold's lease hold area and proposed blocks i.e. C. K. Halli Main block and C. K. Halli North Block. Hence, Committee advised DGM Karnataka to submit the letter regarding the issue.

Committee decided that the proposals to be put on hold till the overlapping issue are resolved, accordingly informed the MECL informed that previous meeting CK Halli main block was approved will also be on hold.

4.2 PROPOSAL FOR GENERAL EXPLORATION (G2) OF COPPER ORE RESOURCES IN BARAGANDA BLOCK, DISTT. GIRIDIH, JHARKHAND.

- MECL presented the proposal for General Exploration (G2) of Copper Ore resources in Baraganda Block, Distt. Giridih, Jharkhand.
- DMG, Jharkhand informed that the block is free hold area endorsed the proposal for G2 exploration by MECL.

Committee discussed the proposal in details and advised to submit the proposal in next TCC after updating geological map.

4.3 REVISED PROPOSAL FOR G-3 LEVEL EXPLORATION OF IRON AND MANGANESE ORE IN JAMDA-KOIRA VALLEY IRON ORE BELT IN SILPUNJI BLOCK, DISTRICT-WEST SINGHBHUM, JHARKHAND

- As per suggestions of 17th & 18th TCC, MECL submitted the revised proposal.
- The Committee clarified that the present proposal will be treated as Phase-I of G-3 level of exploration which would include Geological mapping, trenching and Geophysical Survey.
- The drill hole plan will be chalk out after completion of Geological and Geophysical Surveys and integration of the data.
- Committee discussed the proposal in length and recommended following changes:
- To modify the station interval grid of Geophysical Survey from 50m x 25m to 100m x 25m
- An interim report is to be submitted after completion of Phase-I work based on which the subsequent drill holes.

MECL submitted the modified proposal and Committee recommended for approval of EC with an estimated cost of Rs. 97.23 Lakh and to be completed in time schedule of 6 months as per Annexure-7A & 7B.

4.4 PROPOSAL FOR GENERAL EXPLORATION (G-2) IN DUNGURIPALLI BLOCK FOR MANGANESE ORE, DISTRICT-BOLANGIR, ODISHA

- Committee discussed the proposal in length and recommended following 11 boreholes:
  - Section S3: PBH-01
  - Section S5: PBH-02 in reverse direction

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- In between Section 6 & Section 7 (Near the out croup): PBH-03
- Section S8: PBH-04
- Section S12: PBH-05
- Section S14: PBH-06
- Section S19: PBH-07
- Section S27: PBH-08
- Section S28 PBH-09 & PBH-10 with the condition i.e., PBH-10 will be drilled if PBH-09 is positive.
- Section S29: PBH-11

- Committee observed that since the suggested exploration proposal is not of G-2 level, therefore, the proposed Base Line Environmental Studies suggested be dropped from current proposal and advised to submit a separate proposal for Base Line Environmental Studies taking into consideration all the adjoining NMET funded blocks viz. Tamiya, Rengali, Babja, Biarapalli and Dumgripalli Blocks.

MECL submitted the modified proposal and Committee recommended for approval of EC with a total estimated cost of Rs. 157.36 Lakh involving 840m of drilling in 11 boreholes to be completed in time schedule of 8 months as per Annexure- 8A & B.

Agenda-5: **ADDITIONAL AGENDA ITEMS OF KIOCL**

5.1 REVIEW OF WORK PROGRESS – UDBUR GOLD BLOCK (KAR_SR_07)

- Committee reviewed the progress of ongoing exploration works.
- KIOCL presented the chemical analysis results of the trenching works executed as per the directions of 16th TCC-NMET.
- Maximum range of Ni concentration reported is 1000 to 1600 ppm.
- Committee observed the values are much lower than the cut off grade of 3000 ppm for Ni and stray in nature.
- Hence, Committee recommended
  - PGE analysis works not to be carried out.
  - Complete the analytical studies as approved previously to establish Nickel phase and submit a detail report.
  - Further works in the block would be reviewed on the study of the above report.
- KIOCL requested to accord approval of the below additional costs towards Sample Analytical /Physical studies

S. No.	Details	Amount in Rs
1	SEM & EPMA studies of STAGE 02(B) works	4,74,950
2	Cost Over Run for Stage 01 Sample Analytical studies	2,124
3	Total amount in Rs (Including GST)	Rs. 4,77,074/-

Committee approved that in Udbur Block, based on available exploratory data generated till now, the interim report may be submitted for further observations. Also, KIOCL may prepare a drill hole plan for further exploration to be carried out in phase-3 and submit to TCC in next meeting.
Committee also approved an additional cost of Rs 4,77,074/- including GST incurred towards SEM & EPMA studies of Stage 2B works and Cost overrun of Stage 01 sample analysis.

5.2 APPROVAL IN RESPECT OF TIRUMANKARADU IRON ORE BLOCK (G4) SR_TN_04

- Committee noted the reasons for temporary stoppage of exploration works.

Committee approved additional time period of Six months only w.e.f. the date of receipt of consent from State Govt. for carrying out balance approved works.
Committee also approved the Cost overrun for Stage 01 Sample Analytical studies of Rs. 2,124/- including GST.

5.3 APPROVAL FOR TIME OVER RUN IN RESPECT OF POOMEDU IRON ORE BLOCK (G4)

- Committee noted the reasons for not initiating the works.

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Committee approved the additional time period of Six months only w.e.f. the date of receipt of consent from State Govt.

Agenda-6: **ADDITIONAL AGENDA ITEMS OF MECL**

6.1 REVIEW OF POTASH EXPLORATION OF LAKHASAR SUB BASIN, DISTRICT- BIKANER, RAJASTHAN.

- MECL presented the current status of Potash exploration of Lakhasar sub basin with analytical results of two boreholes (MLP-01 & MLP-02). Out of four, the three boreholes are closed and one is in progress.

Committee accorded approval for taking up of drilling of 5th BH (PBH-05) and simultaneously sampling and analysis of the core samples. The committee will review the analytical results of MLP-03 & MLP-04 to decide future course of exploration.

6.2 ISWAL- SELU-KATHAR-TULA (THALA) AREA, UDAIPUR & RAJSAMAND, RAJASTHAN FOR BASE METALS, G-4 (RAJ-14; MAGNESITE BLOCK).- SANCTION OF ADDITIONAL DRILLING AND COST OVERRUN

- MECL presented the status of exploration in RAJ-14 where 20 bore holes were drilled involving 669m against the approved target of 600m. MECL requested to approve additional drilling of 69m for technical Justification of Borehole closure.

Committee approved additional drilling of 69m with additional cost of Rs. 5,91,761/- (Rupees Five Lakh Nighty One Thousand Seven Hundred Sixty- one only) which includes 18% GST as per Annexure-9A & 9B.

6.3 AMBADALA-SUNAKHUNTI AREA (BLOCK ID ER-ODS-02)- FOR ADDITIONAL COST APPROVAL

- MECL presented the status of the exploration carried out in Ambadala Sunakhunti Block (ODS-02). GR of the block was submitted in December-2018. MECL requested
  - to approve for additional cost for trenching of 128.50 cu.m (Total trenching 228.50 cu. m & against the approved target of 100.00 cu. m).
  - to approve additional cost Rs. 935/- for analyzing one sample for Graphite.

Committee accorded approval for additional trenching of 128.50Qu m with additional cost of Rs. 2,38,110.50 and additional analytical cost of Rs. 935/- for one Graphite sample analysis, totalling 2,82,074/- (Rs. Two Lakh Eighty Two Thousand Seventy- four only) including GST as per Annexure-10.

6.4 VASU JAGAT KHARWACH & SARAN BHARWAWAT AREA (BLOCK ID CR-RAJ-21)

- MECL sought approval for channel samples instead of Trenching & Pit samples. Sanction for additional 5 No of samples for gold involving Rs. 7300/-.
- MECL presented the current status of exploration in the Vasu Jagat Kharwach & Saran Bharwawat block and requested to consider the trenching & pit samples as channel sample for billing purpose. In addition to above also requested for an additional cost of Rs. 7,300/- for Gold analysis in 5 samples.

Committee approved the above proposal of channel samples and additional gold analysis with additional cost of Rs. 7,300/- plus Rs. 1,314 of GST, totalling Rs. 8,614/- (Eight Thousand Six Hundred Fourteen only) as per Annexure-11.

6.5 REVISED DRILLING TARGETS IN APPROVED PROJECT- REGIONAL EXPLORATION (G2/G3) FOR COAL IN RECHERLA BLOCK, GODAVARI VALLEY COAL FIELD, ANDHRA PRADESH.

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- MECL presented the status of exploration work in the Recherla Block and requested to consider the base seam as Seam-A instead of Seam-C approved in the original proposal with following reasons which involves an additional drilling of 2000m and sampling with an additional cost of 117.22 Lakhs.
- Boreholes drilled in the adjacent Chintalapudi Coal Block revealed the development of Seam-A, B, C, D, E etc. in major portion of the block with varying seam thickness.
- MECL completed one borehole with target Seam A at the depth of 796.00 m.
- Considering the parting between Seam-C & A from current borehole target depth of the projected boreholes has been re estimated.
- About 70 m thick coal packet have been intersected in the recently drilled borehole (MGRP-01) out of which the thickness of bottom most Seam-A is 19 m.

Committed recommended the revised proposal of MECL for approval of EC involving 2,000m additional drilling with appropriate sampling involving an estimated cost of Rs, 117.22 lakh including GST as per Annexure-12, along with presentation of 1 BH drill core at GSI Core Library, Hyderabad.

6.6 TIME OVER RUN IN APPROVED PROJECTS

- The committee reviewed the details of the time overrun in ongoing projects and requested the MECL to submit the details with reason/justification for delay of all the projects having time overrun for approval in next EC meeting.
- Committee also directed that all the Implementing agencies shall submit the work progress on monthly basis in prescribed format.
- MECL submitted the list of 17 projects seeking approval from TCC along with justification (Annexure-13)
- In Annexure-13, S. No.7 'Kanawat-Chala-Karath-Bagholi Area, Jhunjhunu & Sikar, Rajasthan for Iron project; the cost overrun has been already approved in 10th EC as per following

Activity	Approved in	Base Rate	Escalated rate	Quantity	Amount in INR (inclusive of all taxes)
Drilling	4th EC on 21.02.2017	2,551/-	11,215/-	600 m	67,29,000.00
Drilling	6th EC on 11.01.2018	-	-	615 m	No additional cost as per 6th EC recommendation
Actual drilling done	-	2,551/-	11,215/-	719.50 m	79,00,967.50
Additional amount required for drilling (104.50m**):**					**11,71,967.50**

The committee recommended for approval of EC in respect of time overrun of MECL projects as per Annexure-13

6.7 ADVANCES FOR MOBILISATION IN NMET BLOCKS.

- MECL requested to make provision for advance payment to take up exploration work in the block approved under NMET funding.
- The Director, NMET informed the house that at present there is no provision of advance payment for NMET funded projects. However, the request of NEAs may be put for consideration of the Executive Committee after an exercise for the quantum of amount to be paid to the NEA's as advance payment is done by of MECL, CMPDI and KIOCL. The three NEAs will be requested to carry out this exercise and submit the findings to next TCC meeting.

6.8 COAL BLOCKS TO BE TAKEN UP FOR EXPLORATION BY NMET FUNDING

- The Dy Director, DGM, Chhattisgarh requested NMET to take the exploration project of Coal. The Director, NMET Informed that as the issue of payment of Technical Consultancy charges is pending with JS&FA, the new projects for coal & lignite exploration will be taken up after the issue is settled.

GUIDELINES BY COMMITTEE

19.1.2019

19/01/xxx.

- The Committee directed that all the Implementing agencies shall submit the work progress on monthly basis in prescribed format.
- The committee advised that Implementing agencies have to take approval for any time overrun with proper justification before the lapse of approved time schedule of the concerned project.
- The expenditure bill may be submitted to NMET along with the approval of time overrun, if any.
- The committee decided that henceforth the Peer Review of the reports will be undertaken by TCC-NMET, therefore, the new proposals must exclude this from cost estimation.
- The committee also decided that after completion of the project, the implementing agencies may submit the GR to TCC. The committee will send the GR for peer review to a suitable expert. For this purpose, the committee may identify the experts from the list of experts approved by the Executive Committee in its 3rd meeting or any other working or retired experts having expertise in the specific mineral commodity to which the report pertains. The peer review fee of Rs. 10000/- as decided by the Executive Committee will be payable to the peer reviewer. The matter will be put up in the Executive Committee in its next meeting.

Meeting ended with thanks deliberation by the Member Secretary, TCC, NMET.

19.1.2019

19/01/2019.