Mining the forests
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Ishan Kukreti
Correspondent
Down To Earth
Laying the ground

1. On June 18, Prime Minister Narendra Modi put 41 new coal blocks for auction.
2. This was in line with a long list of amendments to the mining sector being undertaken by the government- MMDR amendment, 100% FDI.
3. This time, there’d be no end-use restriction. More on this in the upcoming presentations
4. Investment of Rs. 20,000 crore in coal gasification: More on this in the upcoming presentations
5. “To bring coal sector out of lockdown.”
But there is a problem:

Coal is where the forests are.
Opening up new frontiers

1. Jharkhand has already approached the court.

2. Bander block in Bander coalfield in Maharashtra has been removed, Chhattisgarh has asked the removal of five blocks in ecologically sensitive area.

3. Moreover, these blocks don’t come with prior environmental and forest clearances and will lead to displacement.

   1. The signal that the government is sending by putting up these blocks without getting FC first is that it has no regard for the Provisions of the Panchayats (Extension to Schedule Areas) Act or the Gram Sabha consent under the Schedule Tribe and Other Forest Dweller (Recognition of Forest Rights) Act.
But the question is:
How many coal mines does a nation need?

Especially when majority of the mines already auctioned or allotted are not operational.
Brief History of SC Coal Case

1. In 2014, the SC cancelled 204 coal mines allotted between 1993 and 2011.

2. In 2015, the government enacted the Coal Mines (Special Provisions) Act, 2015 to auction these mines.

3. Between 2015 and 2020, the government has tried to auction 112 mines, but managed to successfully auction only 42.
Status of Schedule I, II, III mines

UNUSED DEPOSITS
Since 2015, government has allotted/auctioned mines under three Schedules of Coal Mines Act, most are not operating

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67 percent of mines aren’t operational
1. The idea of saving forests from the bane of mining isn’t new.
2. In 2010, the Ministry of Coal (MoC) and the Ministry of Environment and Forests (MoEF) conducted a landmark study and classified forest areas within nine coalfields as “Go” and “No-Go” areas.
3. The idea was fairly simple:

1. Un-fragmented forest landscapes having gross forest cover (GFC) > 30% and weighted forest cover (WFC) > 10%, were categorized as category–‘A’ or ‘No Go Area’.
Undoing good

**2010:** The Ministry of Environment and Forest (MoEF) and Ministry of Coal (MoC) study and categorizes 222 coal bocks as No-Go areas.

**2011:** The number of No-Go blocks reduced to 153.

**2012:** MoEF forms a committee to formulate parameters to identify pristine forest areas where any non-forestry activity would lead to irreversible damage.

The six parameters are:

i. hydrological value
ii. landscape integrity
iii. wildlife value,
iv. biological richness
v. forest type
vi. forest cover
**Roping in FSI**

**2014:** Government asks Forest Survey of India (FSI) to undertake a study to analyze 793 coal blocks and classify them as “inviolate” and “not-inviolate”.

- FSI creates a GIS-based **Decision Support System (DSS)** which uses parameters laid down by the MoEF committee.

- FSI submits its report in August, reducing the number of “inviolate” coal blocks to just 35!
Decoding FSI’s DSS

1. Unlike the Go/No-Go classification, “inviolate/violate” is decided on a case by case basis.

2. Forest area to be diverted is divided in 1 km x 1 km grid and fed into FSI’s GIS-based Decision Support System (DSS) software.

3. Data on the six parameters is put in.

4. Categorization is based on two rules:
Decision Rule I

DSS automatically considers an area inviolate if it falls within a **protected area** (national park or wildlife sanctuary); has **very dense forest within a km**; has a patch of **forest type** whose geographical area in the entire country is less than 50 sq km; is in **direct catchment of water sources** for local community or hydropower project; and is located 250 m from the **banks of a perennial river, wetland** of more than 10 ha.
Decision Rule II

If the area is not inviolate based on these criteria, the software assigns it a score based on six parameters: forest cover, forest type, biological richness, wildlife value, landscape integrity and hydrological value. The score is higher for areas with rich biodiversity. For example, for wildlife value, areas which are not protected but have breeding or habitation sites for rare or endangered species, are assigned a score of 95. But areas that are not protected and have occasional wildlife presence are assigned a score of 25. If more than 50 per cent of the grids have a score of more than 70, the area is considered inviolate, otherwise not.
Final Blow

2015: In an MoEFCC and MoC meeting, the parameters for identifying areas “inviolate” are further diluted.

- Blocks like Paturia, Pindrakshi, Kente Extension and Parsa East in Hasdeo-Arand coalfield; Talaipalli in Mand-Raigarh coalfield; and Amelia North in Singrauli coalfield are taken out of the “inviolate” category

- Exemption for blocks already under mining

- Modification of boundaries
Forest clearance is all about saying ‘Yes’

Down To Earth has accessed minutes of a meeting held between the environment and coal ministries on November 17, 2015. It shows how coal ministry officials were “deputed” in the Forest Survey of India to reassess inviolate forest areas and then dilute parameters for their assessment. The minutes say:

- Of the 216 partly inviolate blocks affected by hydrological layer, 58 are already under mining; forest clearance was approved for these. Mining in these blocks need to be continued by taking them out of inviolate status. Boundary modification is feasible in 113 coal blocks so they can come out of inviolate category after re-drawn boundaries. In case of 45 coal blocks boundary modification is not feasible.

- 73 coal blocks fall under inviolate category, of which: 12 are already under mining and forest clearance was accorded to these, so they should be kept out of inviolate category; 49 are affected by Decision Rule-I (29 blocks due to very dense forest only); 6 are affected by Decision Rule-II; 6, allotted earlier by the Ministry of Coal after reconciling the position from the Ministry of Environment, Forest and Climate Change, now fall under inviolate category which need to be taken out of inviolate list. These blocks are: Paturia in Hasdeo-Arand; Pindarakshi in Hasdeo-Arand; Kante Extension in Hasdeo-Arand; Parsa East in Hasdeo-Arand; Talaiapali in Mand-Raigarh; and Ameloa North in Singrauli.

- Out of 29 coal blocks affected due to very dense forest, over 1 sq km boundary modification in 19 blocks is feasible so that they can be out of inviolate category.

- While analysing data at Forest Survey of India, it was observed that even fraction of area of very dense forest of contiguous patch falling in the block make the entire block inviolate under Decision Rule-I. Fifteen blocks are affected due to this parameter, which is to be kept outside the inviolate category.

- While computing the weighted forest cover, area of open forest x 0.25 + area of moderately dense forest x 0.55 + area of very dense forest x 0.85 have already been taken into account in Decision Rule-II. So, considering the parameter of very dense forest under Decision Rule-I leads to duplicity of parameter. Hence, very dense forest should not be considered in Decision Rule-II.

NOTE: Decision Rule-I includes areas that have very dense forests, protected forests and river catchments, making them inviolate. Decision Rule-II includes areas that are not inviolate as per Decision Rule-I, but have a substantial forest cover, biodiversity and wildlife presence.
Anything goes:

Amelia Coal Block, Singrauli by M/s THDC (earlier Tehri Hydro Development Corporation)

1. On September 20, 2018, FAC, while deciding on the diversion of 283.570 ha forestland for mining in Amelia Coal Block, decided to “tweak”, but all so gently, the result of the DSS software.
1*1 Grid of the block

Categorization of grids

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12) **Recommendations of FAC:**

FAC after thorough deliberations and discussions with Nodal Officer Government of Madhya Pradesh and user agency, noting that coal was present over the entire area of the proposal, recommended to grant in-principle approval for diversion of 843.76 ha (1255.26 - 411.5 = 843.76 ha) of forest land after exclusion of 411.5 ha of notified forest land in 8 grids (i.e. 1552013-16, 1554305-7 and 1556599) after analysed under Decision Support System (Rules 1 & 2), from the proposed main block to act as an ecological buffer, with general, standard and following specific conditions.
The fall of Hasdeo-Arand

This is a highly biodiverse and ecologically fragile forest in Korba, Surguja and Surajpur districts of Chhattisgarh. Thousands of sal, mahua and tendu trees abound this largest contiguous stretch of forest of the country. It is spread over 170,000 ha and is a watershed of the Hasdeo-Bango reservoir and the Hasdeo river, a tributary of the Mahanadi. It is also part of an elephant corridor that stretches up to Gumla district in Jharkhand.
1. In 2010 the entire Hasdeo-Arand coalfield was declared a No-Go zone for mining.

2. The block survived in 2011 too.

3. FSI whittled down its inviolate status. Of the total 20 blocks, only eight in Hasdeo were categorised as No-Go, or inviolate.

4. The June 2020 list of blocks for auction includes Morga South, one of the last remaining blocks of Hasdeo-Arand. It has 97 per cent forest cover and was never allotted or auctioned before.
5. This, when there are blocks available in the nearby Mand-Raigarh coalfield.
The last remaining block of Sohagpur

1. This coalfield in Shahdol district of Madhya Pradesh has 110 blocks; 22 of them are in the No-Go areas as per the 2010 list.

2. When the No-Go list was renamed “inviolate list” in 2015, this number was reduced to just one - Marwatola block.

3. It up for auction now.

4. It is on the corridor for tiger movement between Bandhavgarh and Achanakmar tiger reserves, as identified by the Wildlife Institute of India, Dehradun, in 2014.
Saying yes to coal, no matter
Thank you

Contact
Ishan Kukreti
ishan.kukreti@cseindia.org
Twitter: @ikukreti
Ph. +91 8447270352