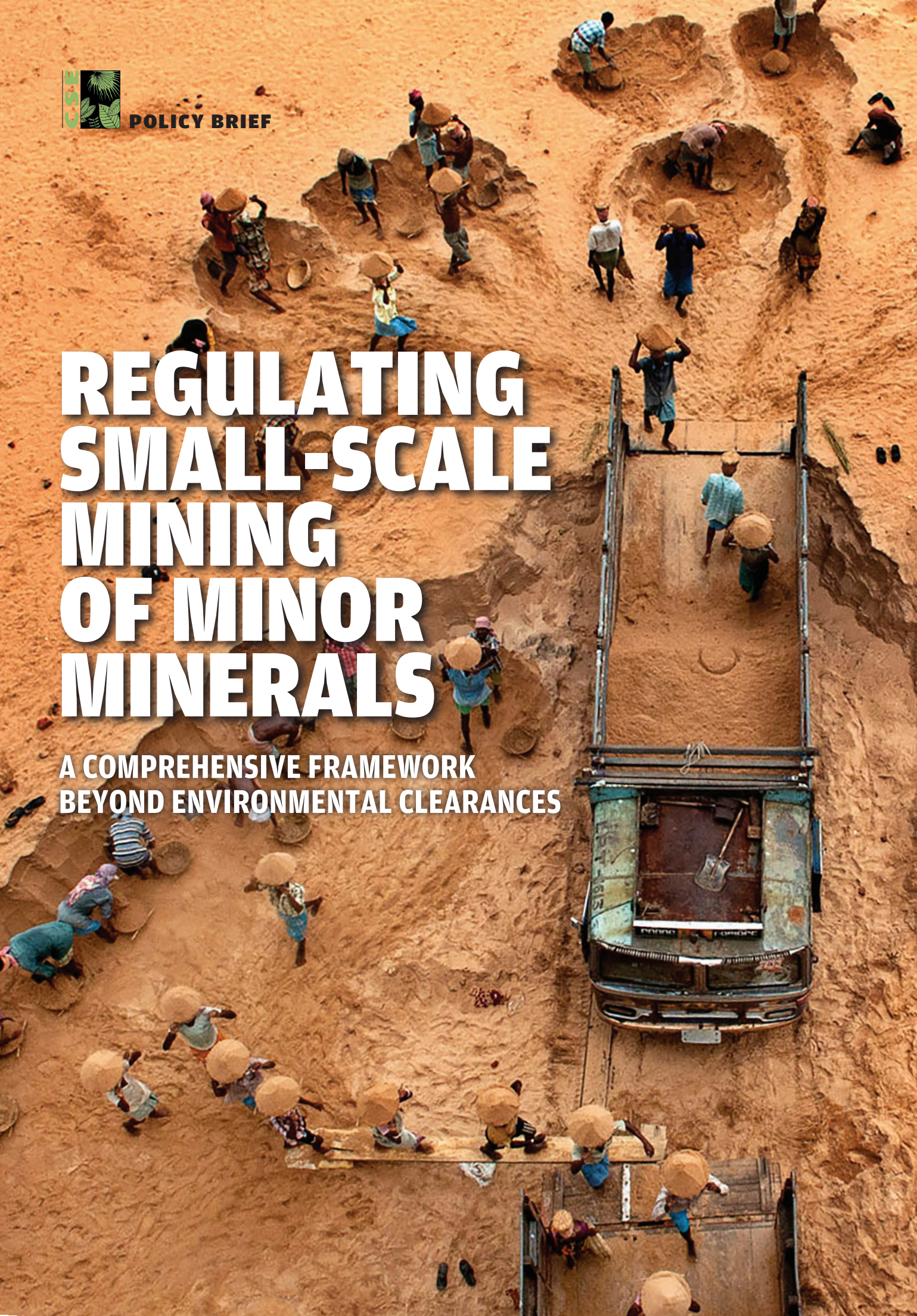
POLICY BRIEF

REGULATING SMALL-SCALE MINING OF MINOR MINERALS

A COMPREHENSIVE FRAMEWORK BEYOND ENVIRONMENTAL CLEARANCES



Research direction: **Chandra Bhushan**

Writer: **Srestha Banerjee**

Research support: **Manavi Bhardwaj**

Editor: **Arif Ayaz Parrey**

Cover design: **Ajit Bajaj**

Layout: **Kirpal Singh**

Production: **Rakesh Shrivastava** and **Gundhar Das**

Published by
Centre for Science and Environment
41, Tughlakabad Institutional Area, New Delhi 110 062
Phones: 91-11-40616000
Fax: 91-11-29955879
E-mail: cse@cseindia.org
Website: www.cseindia.org

Printed at Straight Lines, New Delhi

1. INTRODUCTION

After years of deliberation, the Ministry of Environment, Forest and Climate Change (MoEF&CC) has finally amended the Environmental Impact Assessment (EIA) Notification, 2006 to bring small-scale mining projects under its ambit. The Amendment, instituted in January 2016, has made environmental clearance (EC) compulsory for mining of minor minerals in areas less than or equal to five hectares.

The action was prompted by orders given by the Supreme Court of India in 2012 and later by the National Green Tribunal (NGT) in 2015, in response to matters concerning mining irregularities in small-scale leases. The 2016 Amendment to the EIA Notification is expected to tighten regulatory safeguards for small-scale mining and improve environmental performance of such activities.

Just after the Amendment was notified, the then environment minister Prakash Javadekar said in a press conference, "The ministry has taken several policy initiatives and enacted environmental and pollution control legislations to prevent indiscriminate exploitation of natural resources and to promote integration of environmental concerns in developmental projects." He indicated that the latest Amendment was one such initiative. In May 2016, the Central government hailed this as a move for ensuring sustainable development. The government's particular focus on the Amendment remains its potential to control rampant sand mining. The call, therefore, has been for "ensuring sustainable sand mining for sustainable development".[1]

This policy brief analyses whether the provisions of EC will improve small-scale mining governance and prevent illegal mining. To this end, a detailed case study of Gautam Budh Nagar of Uttar Pradesh, a key sand mining district, was carried out and is presented here. In the end, we arrive at a set of recommendations on how to improve the situation on the ground through comprehensive reform measures in the governance mechanism.

2. REGULATING SMALL-SCALE MINING–BACKGROUND

Before going into what the recent initiatives mean for controlling rampant mining, or how much they will be effective in ensuring better mining practices and sustainability, it is pertinent to recount the course of events that led to this action.

The issue of granting EC for small-scale mining of minor minerals has been under deliberation for the past few years. Earlier, the EIA Notification, 2006 and its subsequent amendments did not require ECs for such projects. This allowed mining under small leases without any environmental assessment.

The EIA Notification, 2006 broadly divides projects into two categories—Category A (mining area equal to or greater than 50 ha) and Category B (mining area between five and 50 ha)—based on potential impacts over an area and on human health and natural and man-made resources. According to the notification, all Category A projects (with potentially significant impact) are required to carry out an EIA and undertake a public hearing before an EC is granted by the Union environment ministry. Category B projects (with potentially less significant impact) are evaluated and given a clearance by state level authorities, state environment impact assessment authority (SEIAA) and state expert appraisal committee (SEAC). Moreover, projects under Category B1 also require an EIA and public consultation, but those under B2 are exempted from requirements of both EIA and public consultation.

However, as irregularities started being reported with respect to minor mineral mining, particularly sand, a need for introducing EC requirements for these projects started to be felt strongly. A report of the then Ministry of Environment and Forests (MoEF, now MoEF&CC) in 2010 specifically described such activity as "haphazard and unscientific".[2] Following these events, both the Supreme Court (SC) and the National Green Tribunal (NGT) issued orders and directives making ECs compulsory for projects less than five hectares. The Union environment ministry also took a number of measures to bring the matter under regulatory purview.

Timeline of environmental clearance for small-scale mining

In February 2012, observing the illegal and unscientific nature of mining of minor minerals, the Supreme Court ordered that "leases of minor minerals, including their renewal for an area of less than five ha, be granted by the states/Union Territories only after getting environmental clearance from the MoEF." In May the same year, the MoEF issued an office memorandum (OM) asking all states to follow the apex court's order, thus requiring all small-scale minor mineral projects to get an EC.

In June 2013, the MoEF received a number of representations conveying problems being faced by brick kiln manufacturers in obtaining ECs for 'brick earth' mined by them, and by the developers of road projects in respect of mining of 'ordinary earth'. Responding to this, the ministry issues another memorandum, placing all such projects of less than five ha under Category B2. The EIA, 2006 was amended for the first time in September 2013, providing specifications for 'minor minerals'. The Amendment notes that leases less than

50 ha for minor minerals would be considered Category B leases. In December 2013, the MoEF issued another OM categorising minor mineral projects into B1 and B2, bringing clarity on the issue of clearances. For river sand mining projects, it noted that those with lease areas equal to or greater than five ha, but less than 25 ha, will fall under B2 category. In cases where the periphery of one mining lease area is less than 1 km from the periphery of another lease area, and the total area covered by these mine-leases equals or exceeds 25 ha, they will become a cluster and the project will come under Category B1. It is further specified that "no river sand mining project with mine lease area less than five ha may be considered for granting EC." For brick earth and ordinary earth, leases between five and 25 ha remain under Category B2. All other minor mineral projects with a mining lease area less than 25 ha are placed under B2.

However, a lot of ambiguity remained in the understanding of this classification on the part of state governments and individuals or companies undertaking mining. In October 2014, changes were again made with respect to mining of minerals in the EIA Notification. Under Category B projects, the distinction only reflected coal mines and non-coal mines, with all non-coal mine leases below 50 ha clubbed as Category B. So, MoEF&CC finally simplified the classification and declared that all non-coal mining projects including minor minerals less than 50 ha should be considered as B category and more than 50 ha as A category projects.

Amendments were introduced to the EIA Notification, 2006 in January 2016. Categorisations B1 and B2 were outlined. ECs for small-scale mining of minor minerals were provided in detail. Leases of minor minerals below 25 ha were placed under B2, of which zero-five ha leases were to be cleared at the district level. Also, clusters below 25 ha were also placed under B2.

For this to happen, a number of provisions have been outlined, including creation of new authorities at the district level to give clearances, provisions for scientific mining, provisions of stricter monitoring to curb illegal activities etc. (see Box: *Highlights of the EIA Notification Amendment, 2016*).

Will clearances curb mining irregularities?

The question we now need to revisit is how much the latest amendment to the EIA Notification, introducing clearances, will help curb the various irregularities associated with small-scale mining such as illegal mining and environmental degradation—problems that mandated the introduction of clearances in the first place.

The current state of affairs suggests that the problem is much bigger than what introduction of requirement of ECs could solve. The multifaceted nature of the problem requires a more complex problem-solving approach. We illustrate this with the example of sand mining in the Yamuna riverbed in Gautam Budh Nagar district of Uttar Pradesh.

Highlights of the EIA Notification Amendment, 2016

Establishment of authorities at the district level to clear projects and provisions for scientific mining

District-level authorities: DEIAA and DEAC

The latest notification provides for the establishment of district level authorities—the district environment impact assessment authority (DEIAA) and district expert appraisal committee (DEAC)—to give EC to small-scale mining projects. The authorities have been charged with evaluation of EC proposals for minor mineral leases that are equal to or below five ha and also for clusters of small leases where the size of the cluster is upto 25 ha, with no individual lease being more than five ha. According to the MoEF&CC, the creation of district level authorities was necessary because "as a result of the Supreme Court order, the number of cases which are now required to obtain prior EC has increased substantially".[3]

A four-member DEIAA will be responsible for grant of EC for minor mineral projects with leases equal to or below five ha. The DEIAA will be chaired by the district magistrate or collector and the sub-divisional magistrate or sub-divisional officer of the district headquarter will be the member-secretary. The other two members will be the senior-most divisional forest officer and an expert member to be nominated by the divisional commissioner or chief conservator of forests.[4]

For the purpose of assisting the DEIAA, there will be an 11-member DEAC. The DEAC will be chaired by the senior-most executive engineer of the irrigation department. The assistant or deputy director or district mines officer or geologist in the district (in that order) will serve as the member -secretary. The other members will be from senior-most sub-divisional officer (forest), a representative of remote sensing department or geology department or state groundwater department to be nominated by the district magistrate or district collector, occupational health expert or medical officer to be nominated by the district magistrate or district collector, engineer from *zila parishad*, a representative from state pollution control board or committee, senior-most assistant engineer of public works department, and three experts to be nominated by the divisional commissioner.[5]

Proposal of a district survey report

The requirement of a district survey report for sand or riverbed mining and also for mining of other minor minerals has been specified. The survey report needs to be prepared for each minor mineral in the district separately. The main objective of the report is to determine areas where mining can be allowed and where it must be prohibited. For this, the report should identify aggradations, depositions, areas of erosion, and proximity to infrastructure and installations. It must also calculate the annual rate of replenishment and allow time for replenishment after mining in a particular area.

A general structure of the report has also been outlined which requires information on mining and minerals in place and information on geology, meteorology, hydrology etc. of the district. A survey guideline has also been given which is to be undertaken by the DEIAA. The DEIAA should conduct the survey with the assistance of any of the following departments: geology, irrigation, forest, public works, remote sensing and mining; or groundwater board etc. in the district.

Provisions of cluster mining

The amendment includes provisions for cluster mining, detailing out procedure for obtaining an EC for clusters. A cluster situation will arise when the distance of the periphery of one lease is less than 500 meters from the peripheries of other leases in a homogeneous mineral area which shall be applicable to the mine leases or quarry licenses granted on and after 9 September 2013.

For consideration of EC to one cluster, a single EIA report/environmental management plan (EMP) is required to be prepared for the entire cluster "in order to capture all the possible externalities". In addition, a single public hearing is to be conducted for the entire cluster (except B2 category). However, ECs shall be applied for and issued to individual project proponents in the cluster based on the common EIA/EMP and the public hearing.

Monitoring of mining activities with technology-enabled services

Various technology-enabled services have been specified for monitoring sand or riverbed mining activities including movement of mined materials. Security features have been specified for transit permits such as the use of a unique barcode and unique quick response (QR) code etc., details on how the permit should be printed, use of smart phones and CCTV cameras at the mine site, sophisticated weighing equipments to monitor the movement of sand from the mines, tracking vehicles through radio-frequency identification (RFID) tags and GPS etc..

3. CASE STUDY: GAUTAM BUDH NAGAR

Rampant mining in the Yamuna riverbed

Hollowed out deep mine pits interspersed with mounds of mud is a common sight along the Yamuna river in Gautam Budh Nagar district of Uttar Pradesh (UP). Some of them are as deep as 15 feet—evidence of the widespread and unscientific in-stream and floodplain sand mining activity that goes on unabated. Rampant mining in the area caught national attention in the summer of 2013. Durga Shakti Nagpal, sub-divisional magistrate of Gautam Budh Nagar, was suspended from service by the state government, reportedly for cracking down on illegal sand mining and for taking on politicians involved in such activities. Between February and July 2013, officials under the supervision of Nagpal had seized about 274 dumpers carrying illegally mined sand.

However, the crackdown or unearthing of irregularities could only create a small dent in a well-oiled machine. "Today I use bigger machines, dig deeper, have larger dumpers and pay the police more to get away with it," responds a miner during a field investigation by the Centre for Science and Environment (CSE). Rampant mining continues, sometimes covertly, sometimes in broad daylight. The huge number of cases pending before the NGT, a fraction of the total violations, gives a sense of the scale of the problem. While some cases have been dispensed off, more than 50 are currently pending before the tribunal as per Rahul Choudhary, a lawyer in many of the petitions.

Some sand miners are not hesitant to share information about the rising demand and how lucrative sand mining business is today. "Two years back we were selling a tractor-trolley of sand for Rs 2,000–3,000, now we are selling the sand for Rs 4,000–5,000 per tractor-trolley," discloses a miner. "Big contractors who use heavy machinery enabling them to mine more can earn up to Rs 5 lakh a night," says another.

As the demand for sand has increased, the intensity and scale of reckless mining has also gone up. "Earlier we would dig manually up to three–four feet, now we dig up to even 12 feet with machines," said a sand miner. Some also openly acknowledge that they have never done mining with any kind of permits. "We used to fill over 100 tractor-trolleys with sand in broad daylight in the past after giving the police around Rs 1,000 till few years ago. Now, with all the control (on illegal mining) we pay the police Rs 5,000 to mine at night and can fill up to 50–60 dumpers a night."

Status of minor mineral mining in Uttar Pradesh

The scale of mining happening for minor minerals including sand is difficult to ascertain. Information on various factors such as number of leases, production, and royalty earnings etc., is poorly documented. It is largely because a lot of mining happens illegally and there are no records.

However, according to information obtained by CSE in 2016 from the Directorate of Geology and Mining of Uttar Pradesh through an RTI, there are more than 1,367 minor mineral leases in UP. Out of these, only 175 are of sand or murram mining—this

translates into just 13 per cent of the total minor mineral leases. But this remains a gross underestimation of the scale of mining actually happening in the state. Nevertheless, the data available indicates that amount of sand mined in UP has been steadily increasing. Between 2012–13 and 2014–15, sand production more than doubled (see Table 1: *Sand mining in Uttar Pradesh*).

Table 1: Sand mining in Uttar Pradesh
There has been a relentless growth in the amount mined

Year	Royalty (in lakh Rs)	Production (cubic metre)	Estimated value (in lakh Rs)
2014–15 (74 districts)	8,905	29,681,667	53,427
2013–14 (74 districts)	6,619	22,062,467	39,712
2012–13 (72 districts)	3,875	13,840,393	24,913

Source: Directorate of Geology and Mining, Uttar Pradesh

The situation is similar with respect to Gautam Budh nagar district as well, which holds a significant share of sand mining in the state. The data available from the mining department is grossly underestimated (see Table 2: *Sand mining in Gautam Budh Nagar*).

Table 2: Sand mining in Gautam Budh Nagar
Ground assessments suggest the numbers are grossly underestimated

Year	Royalty (in lakh Rs)	Production (cubic metre)	Estimated value (in lakh Rs)
2014–15	320	1,066,667	1,920
2013–14	272	906,667	1,632
2012–13	294	1,050,000	1,890

Source: Directorate of Geology and Mining, Uttar Pradesh

Such suspicions are not without reason. To begin with, information provided by the UP Directorate of Geology and Mining does not provide any data on the number of mine leases. It seems that most of this mining was happening under the provisions of short-term permits granted for river sand mining which, in all likelihood, is not captured in the data provided.

Secondly, the available data on sand production in the district between 2012–13 to 2014–15 is also inconclusive when compared to overall sand production in UP during that period. For example, in 2014–15, sand production in Gautam Budh Nagar was declared to be 1,066,667 cubic metre as compared to the declared 29,681,667 cubic metre for the whole state. In 2014–15, therefore, legally only about 3.6 per cent of all sand mining that took place in UP occurred in Gautam Budh Nagar. In 2012–13, this figure was 7.6 per cent. This seems a gross underestimation considering that NOIDA and Greater NOIDA are major hubs for building and infrastructure development in UP. Gautam Budh Nagar also supplies sand to Delhi. The obvious source of sand to meet all this demand seems to be illegal mining.

The big question is, what is sustaining such massive irregularities in sand mining? Before we answer this question it is important to review the regulatory framework concerning small-scale mining, particularly minor minerals such as sand.

Regulatory framework for small-scale minor mineral mining in Uttar Pradesh

Regulation of minor minerals has three key components, the granting of concessions (leases/ permits); the awarding of clearances and consents including monitoring of clearance and consent conditions; and addressing issues of illegal mining (see Figure 1: *Regulatory framework for small-scale mining* and Figure 2: *Institutional framework for regulating small-scale mining*). The regulatory framework for such mining activities is, in turn, primarily guided by two Central laws, the Mines and Minerals (Development and Regulation) (MMDR) Act, 1957 (amended in 2015); and the EIA Notification, 2006 (as amended in 2016) framed under the Environment Protection (EP) Act, 1986, and subsequent rules developed under them.

Section 15 of the MMDR Act delegates the power to make rules in respect of minor minerals to state governments. Subsequently, all states have developed such rules. Uttar Pradesh has the UP Minor Mineral (Concession) Rules (MMC), 1963 (and its subsequent amendments). As the name suggests, the MMC Rules primarily outline the mechanism for granting of leases for various minor minerals and issues related to it. This involves the district and state mining departments. Section 23 of the MMDR Act further empowers state governments to make rules for prevention of illegal mining, transportation and storage of

Figure 1: Regulatory framework for small-scale mining

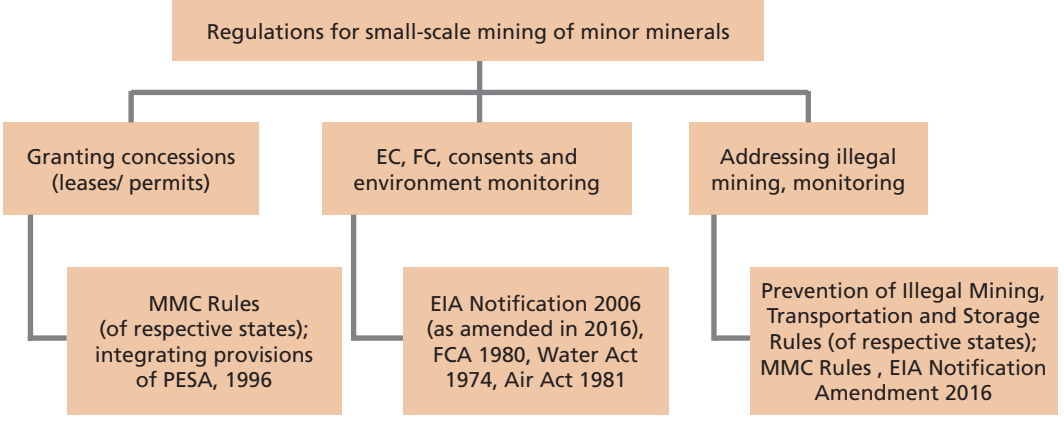
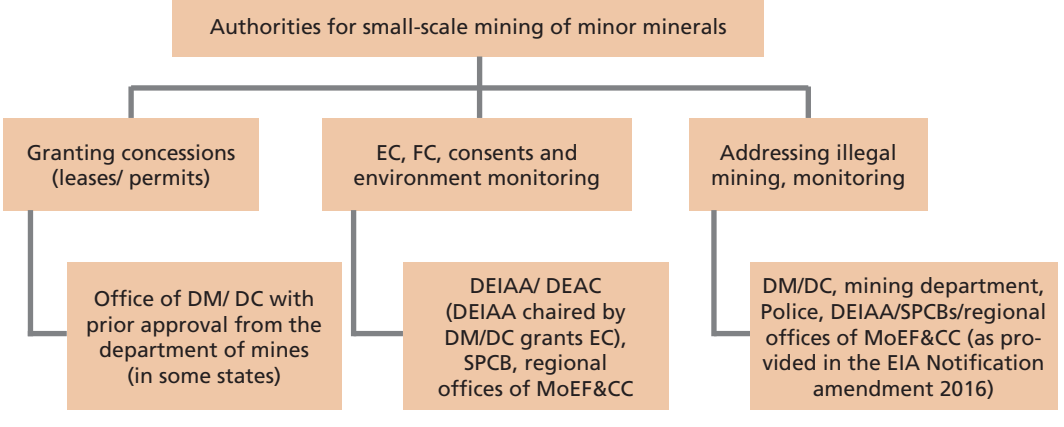


Figure 2: Institutional framework for regulating small-scale mining



minerals. Accordingly, the UP government enacted the UP Minerals (Prevention of Illegal Mining, Transportation and Storage) Rules in 2002. This also involves various state and distrcit level officials.

The other important component of the regulatory framework is the clearance for these mining projects under the EIA Notification 2006. As specified earlier, district level authorities have now been proposed to give EC for small-scale mining leases.

Besides, projects also require consents from State Pollution Control Board (SPCB) under Water (Prevention and Control of Pollution) Act (Water Act), 1974 and Air (Prevention and Control of Pollution) Act (Air Act), 1981; and clearance under Forest Conservation Act (FCA), 1980, in relevant cases.

Uttar Pradesh mining: A victim of confusing regulations and litigation

A review of the regulatory framework guiding mining of minor minerals and small-scale mining in UP suggests that it is the systemic malfunction of governance mechanisms that has sustained various irregularities that the state suffers from. These include poorly framed and confusing regulatory provisions, weak institutions and inadequate monitoring and enforcement. Poor governance has prompted court intervention from time to time but that has not helped the matter either.

Mining leases

Under the 1963 Rules, mining leases in UP can primarily be given on a first-come-first-serve basis (Rule 9). However, they can also be awarded by inviting bids through auction/tender/auction-cum-tender (Rule 23) after the state government by a general or special order declares the areas which may be leased by such processes.[6] Once an area has been "declared" for auctioning, it cannot be granted on a first-come-first-served basis (see Box: *Key leasing provisions under Uttar Pradesh Minor Mineral Concessions Rules, 1963*).

Key leasing provisions under Uttar Pradesh Minor Mineral (Concession) Rules, 1963

Leases can be granted in three different manners

Lease granted on first-come-first-served basis: Rule 9(1) allows the grant of mining leases in this manner. It is noted that "Where two or more persons have applied for a mining lease in respect of the same land, the applicant whose application was received earlier shall have a preferential right for the grant of lease over the applicant whose application was received later".

Lease granted through auction/tender/auction-cum-tender: Rule 23 allows leases to be awarded by inviting bids through auction/tender/auction-cum-tender in declared areas. According to Rule 23(1) "The State Government may by general or special order declare the area or areas which may be leased out by auction or by tender or by auction-cum-tender." Additionally, Rule 23(3) clarifies that "On the declaration of the area or areas under sub-rule (1), the provisions of chapters II, III and VI of these Rules shall not apply to the area or areas in respect of which the declaration has been issued. Such area or areas may be leased out according to the procedure described in this Chapter." This means that once an area is "declared" for auctioning, it cannot be granted on a first-come-first-served basis.

Short-term permits: Riverbed mining can also be done through a short-term permit as stipulated under Chapter VI, Rule 51–55.

Riverbed mining in UP could also take place through mining permits—permits were granted to applicants who could extract the greatest quantity for a period not exceeding six months (Rules 51–55). As shared by state mining officials, permits for riverbed mining were typically given in situations where leases were held up in court cases. This was done to allow mining to continue so that revenue could flow uninterrupted to the state.

In order to make the leasing process transparent, the 35th amendment to the UP MMC Rules in December 2012 introduced e-auctioning and e-tendering. However, before the amendment was made, the government issued a government order (GO) on 31 May 2012 to introduce e-auctioning and e-tendering. The reason for introducing the GO was justified by UP officials as an intermediary measure as "amending Rules is a lengthy procedure".

In October 2014, the 37th amendment was introduced, stipulating provisions for granting of mine leases for riverbed mining specifically. The amendment (Rule 9A) required that "mining leases for sand or morrum or bajri or boulder or any of these in mixed state, exclusively found in the riverbed, shall be granted by the way of sealed bids." A technical and financial bid was required to be submitted in sealed envelopes (see Box: *Key changes made to Uttar Pradesh Minor Mineral Concessions Rules, 1963*).

Key changes made to Uttar Pradesh Minor Mineral (Concession) Rules, 1963

Important amendments have been made to expedite the leasing process

35th amendment, notified on 23 December 2012

- E-tendering introduced as a mode of granting auction leases (Rule 23)
- Lease period increased to at least three years for riverbed mining (Rule 12) and earnest money increased to 25 per cent of reserved price (Rule 27-A)
- Mining plans made obligatory for riverbed mining. Deeming provision introduced in context of mining plans for riverbed mining. This means a mining plan is deemed to be approved if the state director of geology and mining does not approve/modify/reject it within three months from the date of submission of the plan (Rule 34).

36th amendment, notified on 26 February 2014

- Mining operations can only commence after obtaining environmental clearance (EC) wherever required. Application for EC to be made by project proponent or end-user (Rule 34).

37th amendment, notified on 22 October 2014

- Inserted new Rule 9A, stipulating provisions for grant of leases exclusively for riverbed mining by the way of sealed bids. A technical and a financial bid required to be submitted in sealed envelopes.

38th amendment, notified on 14 July 2015

- Deeming provision removed; state director of geology and mining now has to respond within 30 days of receipt of the mining plan with a final decision.

Leasing provisions: A matter of perpetual litigation

Though the UP government tried to introduce a mechanism of e-auctioning and e-tendering leases, the process was fraught with litigation by miners. The petitioners, claiming to be engaged in mining activities, highlighted some common concerns in a series of petitions at the Allahabad High Court (HC). The petitions were filed primarily challenging the GO dated May 2012, which introduced e-tendering and e-auctioning before amendments were made to the MMC Rules.

The government order of 31 May 2012 provided that "with intent to bring more transparency and towards more revenue, it has been decided to declare all the vacant area bearing sand, murram, bajri and boulders in the state under Chapter IV to be settled by method of e-tendering."

Four major concerns were highlighted by the miners:

- The May 2012 GO takes away the preferential right conferred under Rule 9 of the 1963 Rules. Following the May order, the leases that were granted under the 1963 Rules would be up for auction once their initial lease periods were over and the miners applied for renewal. This was not acceptable to the miners because they wanted to retain hold of the leases.
- There was also uncertainty about what was going to happen to applications for new leases filed before the GO order was issued.
- Uncertainty also arose about the treatment of an area as "vacant area" The question was whether an area with regard to which an application for grant or renewal of a mining lease under Chapter II of the 1963 Rules (that is, first-come-first-served basis) was pending was to be treated as vacant area.
- It was also contended that inviting applications by e-tendering was a cumbersome procedure which had been adopted to harm interests of the poor, socially and educationally backward and those traditionally engaged in mining. For these prospective leasees, it would not be possible to avail e-tendering or e-auctioning.

The validity of the GO was also challenged. The question was whether the GO of May 2012 was only a policy decision of the state government or could it be treated as a 'declaration' within the meaning of Rule 23(1) of the MMC Rules, that allowed areas to be deemed fit for auction. According to Rule 23(1), "the state government may, by general or special order, declare the area or areas which may be leased out by auction or by tender or by auction-cum-tender".

However, the state government defended its position and clarified the following:

- Areas which were already on lease at the time of issuance of the May 2012 order were also to be settled by auction (under provisions of Chapter IV) as and when their lease periods came to an end. The reason is that there is no 'inviolable right' of renewal of a lease; the right of consideration of renewal and claim of renewal of the leases has to be dealt with in accordance with the Rules as existing at the time
- An application for renewal of a lease is in essence an application for grant of lease and the principles for grant of a lease have to be followed with regard to renewal applications.

In a combined judgement on all these matters delivered on 29 January 2013, the HC upheld the state government's position about e-tendering. It also upheld that the GO is a 'valid declaration' within the meaning of Rule 23(1). The court noted that it did not "find any error" in the GO dated 31 May 2012.

However, the court had reservations with respect to changes in auction conditions that were subsequently specified in orders and notices by the state following the May 2012 order. These, the court said, created confusion and difficulty for bidders.[7] Therefore, the court ordered that notices issued by the district magistrate inviting applications by e-tendering consequent to the May 2012 order could not be allowed. The government was asked to issue fresh notices in accordance with the law.

But litigation concerning auctioning and tendering did not end with the GO orders of 2012. The government's new move in October 2014 (37th amendment in the Rules) was also challenged in the high court. Among others, a key issue here remained the provision of the MMC Rules under Section 9A, which stipulates a bidding mechanism for granting leases for mining of minor minerals exclusively found in riverbeds.

A key contention was that Rule 9A (introduced under Chapter II) is nothing else but the procedure for settling the lease of minor minerals through tender as is squarely covered by Rule 23(1). It was also pointed out that a new Rule for auctioning or tendering of just riverbed mining leases under Chapter II also contradicts another provision of the MMC Rules, Rule 23(3) of Chapter IV. This is because according to Rule 23(3), on declaration of an area for auctioning or tendering under Rule 23 (1) by the state government, the provisions of Chapter II stand excluded. It was contended that the Rules 9(A) and 23 thus cannot be harmonised. The MMC Rules must be amended suitably before such an auction could take place. Rule 9A was held "bad in law" by the HC and quashed. The court was of the opinion that the introduction of Rule 9A was illegal as it was in direct conflict with Rule 23 of the Concession Rules.

The legal official of the state mining department noted that the provision of awarding riverbed mining leases through sealed bids was introduced to address the concern of the miners themselves, who had earlier said that not everyone can have access to electronic bidding or follow up the process thoroughly. "However, now this has also become problematic," he remarked.

Mining officials from all walks in UP clearly remain frustrated with the continuous litigation. "One issue would be resolved, and they would pick up another. They basically wanted mining to go on like it had always been going on, controlled by the mafia, with no transparency," said a mining official from Gautam Budh Nagar. Other officials echoed the sentiment. A senior official of UP mines department clarified that the amendments were being brought in to "regularise the situation". "The state was losing out on huge revenue due to the stalemate," he emphasised.

The UP government has, however, not given up on the matter and has filed a petition in the SC contesting the HC order.[8] The final judgment is pending. Nevertheless, hearings at the apex court has made state mining officials hopeful that the judgment will be delivered in favour of the state and that granting of leases for riverbed mining may soon commence as under Rule 9A. Till this happens, the stand-off continues.

Environmental clearances

The other issue which has given rise to a lot of confusion is the incorporation of a provision for ECs for small-scale leases of minor minerals in the UP MMC Rules. The UP government, like other state governments, did not have such provisions included in the MMC Rules as the EIA 2006 Notification had no specifications for such leases. However, after the Supreme Court judgment of February 2012, ECs came into consideration. Later, the NGT also played a key role in instituting a provision for ECs for small-scale mining of minor minerals.

Clearance and court directions

In February 2012, in the matter of *Deepak Kumar etc. vs State of Haryana & Ors*,[9] the SC cautioned against illegal and unscientific mining practices of minor minerals in small-scale leases. The court order was passed following deliberations over the validity of auction notices for minor minerals extracted from lease areas below five ha in several districts in Haryana (See Box: *Deepak Kumar etc. vs State of Haryana & Ors*). It took cognisance of the fact that the overall environmental impact from mining of minor minerals can be largely attributed to these leases often being less than five ha and thus not requiring ECs under the EIA Notification, 2006. Referring to a March 2010 report of the Union environment ministry, the court specifically noted that though individual mines of minor minerals, being small in size, may have insignificant impact, their collective impact on a regional scale is adverse. Following such observations, for the first time, the matter of clearances for small-scale mines was taken up.

Deepak Kumar etc. vs State of Haryana & Ors

The Supreme Court underlines the serious environmental impact of small-scale mining of minor minerals and orders its regulation

On 27 February 2012, the SC gave a decisive order for regulating mining activities in small-scale leases.[10] The bench comprising Justice K.S. Radhakrishnan and Justice C.K. Prasad directed all state governments and Union territories to integrate environmental considerations with their minor mineral regulatory framework.

The SC order came in response to a petition filed in 2009 by Deepak Kumar, challenging auction notices given by Haryana's Department of Mines and Geology for extraction of minor minerals in small leases in various districts of the state. It was brought to the court's attention that these auction notices involved mining in lease areas below five hectares and such earmarked areas were at the foothills of fragile Himalayan ranges, the Shivalik hills and riverbeds. No EIA has ever taken place for mining in these areas, thereby causing serious environmental and ecological degradation in them. At the same time, the court also considered complaints about illegal mining in Rajasthan and Uttar Pradesh.

During the deliberations, the SC referred to reports and observations made over the years and noted the serious environmental impacts of riverbed mining. The court observed that "over the years, India's rivers and riparian ecology have been badly affected by the alarming rate of unrestricted sand mining which damages the ecosystem of rivers and the safety of bridges, weakens riverbeds, destroys natural habitats of organisms living on riverbeds, affects fish breeding and migration, spells disaster for the conservation of many bird species, increases saline water in the rivers etc. Extraction of alluvial material from within or near a stream-bed has a direct impact on the stream's physical habitat characteristics... Altering these habitat characteristics can have deleterious impact on both in-stream biota and the associated riparian habitat."[11]

In the light of these observations, the court agreed with the contention of the petitioner that the auction notices of the Haryana mining department had been issued without conducting any study on the possible environmental impacts. Though this was done under the pretext of the leases being small, the court did not consider that to be a reason to disregard the impact. The bench sternly noted that lease size being less than

five ha and separated by one km does not make a case for their low environmental impact, because "their collective impact may be significant".

The court also noted that such concerns were valid not only for Haryana "but also for other states of the country and these issues had come up for deliberations before the government of India on various occasions". It declared that operation of mines of minor minerals, including small-scale leases, needed to be strictly regulated.

The SC directed all state governments to make necessary changes in their minor mineral regulatory framework in order to address the environmental impacts of such mining. In this respect, the states were referred particularly to two documents—a report of the then MoEF on *Environmental Aspects of Quarrying of Minor Minerals* (2010) and a model *Mining Framework for Minor Minerals* (2010), which were prepared by the Indian Bureau of Mines, directed by the Ministry of Mines.[12] Both the documents contain guidelines on aspects such as size and period of mining lease, mining mechanisms, requirement of a mining plan, mine closure and reclamation and rehabilitation etc. The MoEF recommendations also provided specific guidelines for riverbed mining. All state governments and Union territories were asked to give effect to the recommendations made by the then MoEF and the mines ministry in their model documents. The states were supposed to do this within six months by framing "necessary rules under Section 15 of the Mines and Minerals (Development and Regulation) Act, 1957".[13]

The court further directed that "in the meanwhile, leases of minor minerals including their renewal for an area of less than five hectares be granted by the states or union territories only after getting environmental clearance from the MoEF".[14]

The SC ordered that "leases of minor minerals, including their renewal for an area of less than five hectares, be granted by the states or union territories only after getting environmental clearance from the MoEF." Requirement of incorporating provisions of mining plans under the state MMC Rules was also emphasised on. The court also directed state governments to make necessary changes in their minor mineral regulatory framework in order to address the environmental impacts associated with mining of minor minerals.

Following the SC directive, the NGT issued directions on similar lines in August 2013. The tribunal gave a restraint order on sand and riverbed mining without an EC anywhere in the country[15] (See Box: *Restraint on mining without environmental clearances*).

Restraint on mining without environmental clearances

Bar association ensures a National Green Tribunal ruling on mining regulations

On 5 August 2013, the NGT took a stern position on illegal sand and riverbed mining. The NGT was deliberating on a case filed by its bar association with respect to unscientific and illegal sand mining on the banks of Yamuna, Ganga, Chambal, Gomti and Revati. The applicants had brought to the attention of the NGT that according to the Supreme Court order in *Deepak Kumar vs State of Haryana*, "even the person carrying on mining activity in less than five ha lease areas is expected to take EIA clearance from MoEF or SEIAA."

Following the submissions, the NGT issued a restraint order on riverbed sand mining. Extending its order to all states, the tribunal declared: "We restrain any person, company, authority to carry out any mining activity or removal of sand, from riverbeds anywhere in the country without obtaining an environmental clearance from MoEF/SEIAA and license from competent authorities."

State government acts on court directives

Subsequent to the SC order, a GO was issued on 22 March 2012 by the UP government specifying the requirements for lease holders or appliers to comply with the court directive. However, the state issued another GO on 4 March 2013, allowing lease holders who already had ECs to mine to continue mining for a period which was equivalent to the leftover lease period. State mining officials clarified that "this was to take into account the time lost in obtaining ECs that also resulted in loss of revenue."

The UP government also mandated a mining plan for riverbed mining, noting that such mining operations can only commence after the lessee submits a plan and gets it approved by the director of geology and mines. Prior to this, there was only a mention of mining plan requirement for "*in situ* rock deposits".[16] This provision with respect to the mining plan was introduced in the MMC Rules (Rule 34) by way of the 35th amendment in December 2012.

While all these changes were taking place in the law, the NGT order of 5 August 2013, restraining mining activities without an EC, created an additional hurdle. The order effectively meant stopping mining activities under leases which did not have ECs. In response to queries about whether mining activities under leases without ECs were suspended following the NGT order, UP mining officials said that "we followed the court orders and only leases having ECs were allowed". The officials said that no official order was released suspending mining activities following the NGT order. "The MMC Rules were amended to integrate the requirement of an EC," was all the information the concerned officer shared. However, it was also acknowledged by other officials that all mining activities without ECs could not be brought to a halt altogether in the meantime.

The requirement of ECs was finally incorporated in the UP MMC Rules on 26 February 2014 through the 36th amendment. Till then, the requirement for an EC was communicated only through GOs and tender notices. So there was a two year gap between the SC judgement and the amendment of UP MMC rules on EC.

4. WHAT HAVE BEEN THE RESULTS?

The situation in UP is a classic representation of the quagmire that is the regulation of mining of minor mineral in small-scale leases. While the quantities of minor minerals mined—such as sand—have been rising exponentially for many years now, the state government clearly remains ill-prepared to regulate this mining appropriately. This lack of preparedness is not confined to UP but is true of many other states as well, as is evident from deliberations at the SC and NGT. The result has been continued illegality.

In the face of the government's lack of preparation, courts have become the recourse for action. From issues of granting mine leases, awarding ECs, ensuring that scientific mining practices were undertaken etc., the SC, high courts and NGT have given various directions. A few state governments assumed the role of carrying out these orders. UP is a prime example. Instead of comprehensive regulatory reforms to deal with the problems, as was the need of the hour, there was reliance on a patchy course of action.

The justification mining officials provide for such action is that they "had to keep mining going on". Officials argue that "since amendments take time to come into force, such actions were taken to deal with immediate issues at hand. While amendments were in the process of being made, waiting for them would delay the action to address these issues."

But has this helped in alleviating the problems? The answer is a resounding no. Following are some of the key issues and challenges that can be noted from the UP experience.

Knee-jerk government response to court orders

The UP government may have intended to address concerns about illegal mining, transparency in the grant of leases and environmental impact of such activities, but the way it went about doing so remained problematic. As noted above, the government's actions came as a follow-up measure to court directions.

For instance, let us consider the case of granting leases. In 2006, the Allahabad HC gave directions to introduce e-tendering.[17] The government did nothing for several years and became proactive only in 2012 when the SC passed a major judgement on the issue. The government issued a slew of measures for auctioning and tendering of mine leases. The justification provided was that "non settlement of mining rights leads to illegal mining, and the move towards e-tendering and e-auctioning by passing orders was to control illegal mining". But this was done without simultaneous required changes in laws. Rather than resolving confusion, such moves created more chaos. The government got caught up in more court litigation. Meanwhile, illegal activities continued in a business-as-usual fashion.

The poor handling of the matter by the UP government is also evident from observations made by the Allahabad HC in its 29 January 2013 judgement, through which the court settled a bunch of petitions on mining. The Court noted that the state "should have

proceeded with actual grant of mining leases after implementing the directions given by the Supreme Court on 27 February 2012, in Deepak Kumar's case".

Regulatory and policy actions primarily based on court orders is also problematic because courts typically respond to the specific issue(s) brought before them. It is also not the brief of the judiciary to pronounce an order taking into account every regulatory aspect pertaining to the issue(s). For instance, when a matter challenging EIA or ECs is brought before the court or the NGT, it particularly focuses on the regulatory aspects of EIA and clearance and concerns related to it. Similar is the case with leasing provisions.

Therefore, while the respective authorities need to abide by the orders of the court, they must also play a pro-active role in considering all aspects while implementing those orders to avoid confusion and conflict.

Using court decisions to perpetuate more illegality

As discussed earlier, officials of Gautam Budh Nagar mines department in particular and also the state department in general expressed clear frustration with the never-ending litigation. According to them, the steps taken by the government were challenged in the HC to hinder implementation of regulatory measures that would check illegal mining.

The mines department also harbours resentment about the way the court dealt with the matter. A senior state mining official said, "why is the HC not letting the system function and (in the process) letting illegal mining to go on? We are trying to get a policy to grant leases. What is the problem?"

Court litigation and the subsequent regulatory quagmire also interrupted official granting of mine leases. "The government has not been able to grant any leases for riverbed mining since 2012 due to judicial hurdles particularly in the HC," informed officials of the mines department of Gautam Budh Nagar. "For the same reason, no permits for riverbed mining could be granted. The only type of permits that has been given for a three month period is for basement mining," the official adds. Even the leases of the three mines on the riverbed, in operation for almost two decades, were not renewed when they expired in 2013.[18] The situation has been further complicated by the NGT order restraining mining activities without ECs.

But mining is happening, and happening illegally in broad daylight. The state mining department is not oblivious to this. According to state mining officials, legal mining is only taking place at 30 per cent of the areas where mining is supposed to happen (both in terms of old blocks that expired and became vacant, as well as new blocks that were identified to be granted through e-tendering). The state is losing out on revenue from 70 per cent of the area where leases can be granted.

The UP case is also indicative of similar hold-ups in regulatory implementation in other states in the face of lengthy court proceedings. This was brought out during a meeting that the ministry of mines held with various state governments in October 2014 to discuss issues of illegal sand mining. During the meeting, as was noted in its minutes, "almost all the state governments pointed out that litigation is strangulating the administrative integrity and impeding grant or renewal of sand mining leases, resulting in increase in illegal mining".[19]

Delayed action by the state government

While the UP government has repeatedly expressed frustration with court litigation and argues that it is an impediment, the government's own inaction cannot be overlooked.

A case in point remains the way the government dealt with environmental concerns of small-scale mining. Despite the availability of model guidelines issued by the Union environment ministry and mines ministry, as well as the directions of the SC for undertaking environmentally responsible mining, the UP Government did not factor in such consideration in its mining Rules until it was too late. Doing so could have prevented unscientific mining practices to a considerable extent.

The government continued with regulatory provisions that potentially aided unscientific mining. Consider the use of 'deemed' clause for mining plan approval before mining can commence. According to the MMC Rules [Rule 34(4)], a mining plan has to be approved (modified or rejected) by the director within three months from the date of receipt of the plan. However, in case the director fails to make a decision on the mining plan within the three month period, the plan "for the first year shall be *deemed* to have been approved".[20] This created the potential for haphazard mining practices to take root. We should also bear in mind that if approval to mine can be deemed granted in this manner, what are the chances that even a poor mining plan will be rejected later?

The government finally began to look seriously into this matter in 2015. The latest amendment to the MMC Rules on 14 July 2015 (38th amendment) has removed the 'deemed' provision. Now, selected leasees have to prepare a mining plan and get it approved by the director prior to the execution of the lease deed. The director has to respond within 30 days from the date of receipt of the plan by approving, modifying or rejecting the plan.

Poor monitoring and enforcement

Poor monitoring and enforcement of existing laws has been another major reason for the continuing irregularities.

According to the provisions of the MMC Rules, a district officer or district mining official (not below the rank of mines inspector) can carry out inspection of any mine. District officials can also take the assistance of local police in the enforcement of the provisions of the MMC Rules. A person found engaged in mining without a valid lease or permit can be punished with imprisonment for a term that may extend up to six months, or a fine that may extend to Rs 25,000 or both.

But mining officials, in Gautam Budh Nagar as well as the state at large, acknowledge that site inspections are seldom carried out. This is largely because the mining department barely has the resources (particularly humanpower) to do so. For instance, officials at Gautam Budh Nagar say that there is only one mines inspector and two mines surveyors in the district. The numbers are alarming considering the amount of sand that is provided by Gautam Budh Nagar to the construction boom. The situation in other parts of the state is no better. An estimated 30 mines inspectors look after the entire state.

Due to this paucity of resources, the state seems helpless in enforcing regulations and court orders. According to the mines department of Gautam Budh Nagar, "it is very difficult for the department to constantly monitor the entire stretch of the Yamuna in the district."

Therefore, what monitoring and enforcement today means in Gautam Budh Nagar and UP at large is seizing a few vehicles carrying illegally mined minerals.[21] The penalty collected from these raids creates a source of revenue. In Gautam Budh Nagar, as per official data provided by the mines department, between April and September 2015, 40 vehicles were seized and a total of Rs 12.2 lakh was collected in the form of penalty.

A more detailed understanding of the amount of money collected from penalties on illegal mining activities in Gautam Budh Nagar can be obtained by the information on the raids (*See Table 3: Raids on illegal mining in Gautam Budh Nagar).*

Table 3: Raids on illegal mining in Gautam Budh Nagar

Government machinery is only able to penalise a fraction of the irregularities

Year (ending in March)	No of raids	Collected amount (in lakh rupees)
2012–13	328	148.52
2013–14	310	215.7
2014–15	112	66.37

Source: CSE research—RTI application

However, raids and stopping vehicles is done only in case of a fraction of the irregularities. Officials acknowledge this. Worse still, drivers caught transporting the material are the ones to be penalised, while those who are looting the riverbeds watch from a distance of immunity. In cases where FIRs are launched against those involved in illegal mining, police and administrative action does not follow. Officials say that carrying out raids at these sites is challenging and taking recourse to the judiciary a lengthy process which does not often result in strict legal action. Lack of adequate humanpower and the fear of the sand mafia also remain as challenges. "Even with the assistance of police, it is challenging to carry out raids without strength of numbers and in the face of violent attacks by the mafia," say officials of Gautam Budh Nagar's mines department.

In its February 2012 judgment, the Supreme Court had very aptly observed: "The demand for sand increases day by day as building and construction and expansion of infrastructure continues, thereby placing immense pressure on the supply of sand resources and, hence, mining activities are going on legally and illegally without any restrictions." The situation in UP is a glaring example of this. With or without leases and permits, miners in Gautam Budh Nagar and across UP continue to cater to the growing sand demand. Today, the profits from sand mining are astounding as compared to just five years ago. According to locals of Gautam Budh Nagar, a dumper-worth of sand (equivalent to sand in four tractor-trolleys) mined illegally today sells for Rs 25,000–30,000 as opposed to around Rs 3,000–4,000 in the past, delivering a profit that is six to seven times more. The future looks equally bright for the miners, as the demand for sand in Delhi-NCR is expected to keep growing.

In such circumstances, only the most vigilant combination of regulations and enforcement can ensure that loopholes in the system are not exploited by those who want to profit at the cost of the environment and people.

5. THE WAY FORWARD

Small-scale mining requires wholesale reforms

One of the key challenges that the UP situation brings out is the poorly structured governance mechanism that has been in place to regulate small-scale mining. While there are a number of regulatory provisions guiding small-scale mining, and multiple authorities are in force to put them into practice, their collective ineffectiveness is all too visible.

It is true that to keep up with the present day challenges of small-scale mining, a clearance mechanism was required to control haphazardness and the adverse impact such activities have on the environment. But it is also true that lack of regulations alone had not sustained haphazard small-scale mining. The fragmented dealing of mining issues under various laws, and consequently, by multiple regulatory authorities, has largely contributed to the situation. Such approach has given rise to multiplicity in the system and has made compliance and enforcement confusing.

The fragmentation and multiplicity has also led to ineffectiveness in the functioning of regulatory authorities because the same officials have been burdened with the task of going through increasing number of documents under different laws. For instance, the DCs or DMs office is typically involved in the granting of mineral concessions under the provisions of the MMC Rules after reviewing the concerned documents. The same officials will also be required to grant ECs under the EIA Notification, after considering a separate set of documents. They also remain responsible for monitoring of mining activities and preventing irregularities under the concerned laws for the same. This technically makes it very difficult to actually go through the various documents thoroughly and make decisions. A similar situation arises with the other authorities concerned with monitoring and enforcement. The mining department, the regional office of MoEF&CC, the SPCB etc. are required to look into multiple paperwork under various laws and are stretched in their capacity. This essentially makes the authorities a clearing house of paperwork, without ensuring improved environmental assessment or compliance of various conditions that are stipulated under each of the separate clearances, permits and plans.

Therefore, if such fragmentation continues, it will not be possible to bring about real changes on the ground. The requirement of ECs alone, as brought about under the 2016 amendment, will not help to alleviate the situation with respect to small-scale mining. In fact, if considered in isolation, it will end up becoming just another paperwork requirement for the regulatory system.

The need of the hour is, therefore, a comprehensive approach to reforms. A cohesive, effective and transparent regulatory and institutional framework needs to be formulated. Fragmentation and multiplicity that exist in the processes of assessment, granting permits, and monitoring of mining activities need to be addressed collectively. To ensure this, convergence must happen in these processes, and responsibilities of various departments and authorities will also have to be consolidated accordingly.

The 2016 Amendment to the EIA Notification provides an opportunity for developing such a comprehensive approach. Though the amendment has been instituted for granting ECs to minor mineral mining in small-scale leases and monitoring of such activities, its various provisions have prospects of planning a cohesive regulatory system around it. Keeping the 2016 EIA Notification Amendment in focus, the required revisions can now be brought out through the following measures.

A. Converging processes and consolidating responsibilities

1. Instituting a mechanism of comprehensive assessment

The assessment process for granting mining leases, clearances, and permits can be made inclusive by taking the District Survey Report (DSR), a comprehensive document, as the base document for evaluating proposals for clearances and mine leases. The systemic approach that needs to be followed in this regard includes the following steps:

- The DSR shall be prepared as per provisions of Para 7 (iii) and Appendix X of the EIA Notification Amendment 2016 by the DEIAA.
- Based on the DSR, and after assessing project-specific conditions, an EMP should be prepared for specific mine leases or clusters by a Registered Qualified Person or Accredited Consultants of Quality Council of India, National Accreditation Board for Education and Training, as required for the EC.
- The DSR should also become the basis for preparing the mining plan as per provisions of the MMC Rules, 1960, and as specified by the Indian Bureau of Mines, for granting of EC and of mine lease.
- Based on the DSR, common and comprehensive set of environmental compliance conditions can be stipulated for both the EMP and the mining plan.
- The EMP and the mining plan as prepared should also become the key documents for monitoring and compliance.

2. Developing a single window system for approval of clearances, leases and permits

A single window system for granting of clearances, leases and permits should also be developed simultaneously, taking into account the composition of the district level authorities as created under the 2016 EIA Notification Amendment. The composition of both the DEAC and DEIAA provides the scope for developing such an integrated approval system. This can happen as follows:

- The 11 member DEAC has representation from all concerned departments, whose participation is required for appropriately assessing environmental impacts of mining proposals and taking a reasoned decision on whether such proposal can be allowed or not. Given the expertise of the DEAC, it should be made a 'single-window' committee for appraising and recommending proposals for EC, FC and mine leases.

  The DEAC should also be authorised to give consent under provisions of the Water (Prevention and Control of Pollution) Act, 1974 (Water Act), and the Air (Prevention and Control of Pollution) Act, 1981 (Air Act), as it has representation from State Pollution Control Board (SPCB) as a member.
- After a proposal is appraised by the DEAC, if considered suitable, it will recommend the proposal to the DEIAA for approval of clearances and granting of a lease.

- The four-member DEIAA, chaired by the DC/DM, should become the 'single-window' authority for granting of EC, FC, mining lease/permit. A single window approval through the DEIAA can be ensured for reasons as follows and through the following steps:
- According to the 2016 Amendment, the DEIAA, chaired by the DM/DC will be responsible for granting of ECs for small-scale leases. On the other hand, according to state mining rules, as in the case of UP, the DC/DM also remains responsible for awarding mining leases (following prior approval from the state government). Since the DC/DM office plays a key role for both, the approval process for both EC and mine lease should be synergised. In states where granting of leases is not done by the DM/DC, such power should be devolved to them for administrative efficiency by amending the MMC Rules.
- Based on recommendations of the DEAC, the DEIAA can grant (or reject) EC for the mining proposals.
- Upon approval of the EC, DEIAA can combine all required documents and send them to the concerned authority in the state government for prior approval for granting of the mine lease. Following such approval, the lease can be awarded by the DEIAA.
- The FC, where required, can be also be handled by the DEIAA, as the senior-most divisional forest officer remains a member of this authority.

3. Removing inefficiency in monitoring and compliance

- Existing multiplicity and ineffectiveness in the process of monitoring and compliance can also be removed if the concerned officials are looking at a comprehensive set of conditions given on the basis of the DSR, as discussed earlier.
- Similarly, the DEAC and DEIAA can be entrusted with monitoring and compliance if a single-window system of assessment and approval is instituted.

B. Instituting necessary changes in other laws for integrated regulatory framework

To ensure an integrated framework for comprehensive assessment, a streamlined approval system and robust monitoring, the various laws concerned with small-scale mining of minor minerals will also have to be suitably amended and aligned with the EIA Notification Amendment 2016. The necessary regulatory reforms that will be required in various laws are as follows.

- **Amendments in state MMC Rules**

  State MMC Rules will have to be suitably amended to ensure the following:

- **Scientific mining practices:** The provisions of the EIA Notification Amendment 2016 related to ensuring scientific mining practices should be suitably integrated in the state MMC Rules. This particularly involves requirements of DSR, mining plan/EMP/EIA report as the case may be, and provisions related to cluster mining.

  For example, in the UP MMC Rules, provisions for systemic and scientific mining should be introduced in Chapter II that specifies provisions and pre-requisites for granting of mine leases, and Chapter VI, that outlines provisions for mining permits. Accordingly, Chapter V, that provides conditions of a mining lease, should also be suitably amended.

- **Comprehensive assessment of mining proposals through the DEAC:** To ensure comprehensive assessment of a mining proposal by the DEAC, amendments should be introduced in the Rules specifying conditions for granting of a mining lease.

  For example, in the in the UP MMC Rules, amendments should be introduced in Chapters II, V and VI for such purpose.
- **Single-window approval system through the DEIAA:** To ensure a single-window system for approval of clearances and mining leases/permits, systemic steps should be appropriately integrated in the concerned sections of the Rules that outline the procedure for submitting an application for mining/quarry lease and granting of the same.

  For example, in the UP MMC Rules, amendments should be introduced in Chapter II and Chapter VI that outlines such procedure for mining leases and mining permits respectively, and also Chapter IV, that gives specifications for auction.
- **Monitoring of mining activities:** Many of the state MMC Rules stipulate certain provisions of monitoring of mining activities. The EIA Notification Amendment 2016 details out provisions of monitoring of mining activities and transportation of sand, as well as using latest technologies to minimize irregularities. The provisions for monitoring under the state MMC Rules needs to be suitably revised to integrate the requirements of the 2016 Amendment.
- **Mandating recommendation of Panchayati Raj institutions:** Incorporate the considerations of local institutions as mandated under the Panchayat (Extension to Scheduled Areas) Act, 1996 (PESA). Sub-sections 4(k) and 4(l) of PESA specify that prior "recommendations of the Gram Sabha or the panchayats shall be made mandatory" before the "grant of prospective license or mining leases of minor minerals", or grant of concessions for the exploitation of minor minerals by auction". Such provisions must be included under conditions for grant of mining leases, for example, as provide in Chapter V of UP MMC Rules.

Amendments in the FC Act, 1980 and subsequent Rules

- The FC Act will also need to be suitably amended to devolve power to the DEIAA to grant forest clearances in cases where required, for operation of small-scale mining leases.

Amendments in the state Prevention of Illegal Mining, Transportation and Storage Rules

- The state Prevention of Illegal Mining, Transportation and Storage Rules should be amended to integrate the provisions of EIA Notification 2016 as related to monitoring of mining activities. These include use of technology-enabled services for on-site monitoring of sand or riverbed mining activities including movement of mined materialsm, specifications of security features for transit permits such as Magnetic Ink Character Recognition (MICR), unique Quick Response (QR) code, unique barcode, fugitive ink background etc., monitoring at check-posts, technology-enabled mechanism for tracking of vehicles etc.

  For example, to integrate these in the UP Minerals (Prevention of Illegal Mining, Transportation and Storage) Rules (2002), Rules 5, 6 and 7 should be amended so that they stipulate provisions for issue of transit pass, establishment of check-posts for inspection of minerals, and transportation of minerals respectively.

- No major changes will be required in the Water Act (1974) and the Air Act (1981). The 2016 Notification already recognises "a representative of the SPCB or Committee" (pollution control committee) as member of the DEAC. The SPCBs can delegate powers to the concerned official of the board under provisions of Section 9 of the Water Act (1974) and Section 11 of the Air Act (1981) for giving consent and undertaking monitoring under the provisions of these Acts.

c. Strengthening institutions and ensuring accountability

Finally, strengthening of institutions is the key for decentralisation of regulatory mechanisms to become successful. Given the exponential rise of mining activities and the regulatory requirements that must be fulfilled to ensure sustainable mining, the authorities must be suitably strengthened at the district level. It is clear that in most districts there remains a regulatory deficit. Therefore, the government must take prompt actions to address this through the following measures (but not limited to these):

- Humanpower, other resources and infrastructure must be adequately made available to various departments and authorities at the district level for such an augmentation.
- Ensuring transparency and accountability of the regulatory bodies and operation of the system should be of utmost importance.
- All information related to clearances and leasing including survey reports, data on monitoring and enforcement etc. should be put in the public domain and made accessible to people.
- Monitoring and enforcement through the use of latest technology as suggested in the 2016 amendment must be complemented by people on the ground. It must also be realised that given the demand for sand today, enforcement cannot be improved by merely increasing the fine on illegal activities, or deploying police to catch mining violations. It will rather sustain unscrupulous activities and mining will continue as it is.

The UP situation is not an isolated story. A sandstorm of grossly unregulated smalls scale mining is sweeping across many states such as Haryana, Maharashtra, Andhra Pradesh, Tamil Nadu etc. It is evident in the numerous reports, court litigations and also in interactions with government officials. There is ample recognition of the scale of the problem at every level—what is missing is a suitable and comprehensive action policy.

References

1. Ministry of Environment, Forest and Climate Change, 9 May 2016, *Ensuring sustainable sand mining for sustainable development*

2. Ministry of Environment and Forests, March 2010, Report of the Group, *Environmental Aspects of Quarrying of Minor Minerals*, New Delhi

3. Ministry of Environment, Forest and Climate Change, Notification dated 15 January 2016, S.O. 141(E)

4. Ministry of Environment, Forest and Climate Change, Notification dated 20 January 2016, S.O. 190(E)

5. Ibid

6. Rule 23 stipulates that no area or areas shall be leased out by auction or by tender or by auction-cum-tender for more than five years at a time; the period in respect of in-situ rock type mineral deposit shall be five years and in respect of riverbed mineral deposit shall be one year at a time.

7. Such modifications included changes in conditions for auctions such as provisions of earnest money submission with respect to reserve price. Changing the earnest money to the extent of 25 percent of the reserved price has adversely affected large number of intending bidders who could not even submit their applications. The court noted that the entire process of changed conditions was vitiated and could not be sustained.

8. *State of Uttar Pradesh and Others vs Gulab Chandra Mishra, SLP (Civil), 14578 /2015*

9. 27 February 2012, Supreme Court of India, *Deepak Kumar etc. vs State of Haryana & Ors*

10. Supreme Court of India, 27 February 2012, *Deepak Kumar etc. vs State of Haryana and Others, I.A. Nos.12-13 of 2011 in Special Leave Petition (C) No. 19628-1962 of 2009*

11 Supreme Court of India, 27 February 2012, *Deepak Kumar etc. vs State of Haryana and Others, I.A. Nos.12-13 of 2011 in Special Leave Petition (C) No. 19628-19629 of 2009*, p 6

12. The document has also been referred to as the model '*Minor Minerals Conservation and Development Rules 2010*'

13. Ibid, p 26

14. Ibid, p 27

15. National Green Tribunal, 5 August 2013, *National Green Tribunal Bar Association vs Ministry of Environment and Forests and Ors., Original Application No. 171 of 2013*

16. Following the 35th amendment of December 2012, the UP MMC Rules, under Rule 34(2), stipulate that: Mining operations shall, in respect of in situ-rock deposits and sand or murram or bajri or boulders or any of these in mixed state exclusively found in riverbeds, be undertaken in accordance with a mining plan detailing yearly development schemes, aspect of reclamation and rehabilitation of mined out areas, including progressive mine closure schemes duly approved by the director.

17. High Court of Allahabad, 12 July 2006, *Chandrika Prasad Nishad Vs State of UP and Others, Writ Petition No. 5018 (M/S) of 2005*

18. All three mine leases were adjacent to each other in the Raipur Khadar area. Details: (i) Chakbasantpur having mine lease area (MLA) of 151 acres, (ii) Azgarpur Jagir having MLA of 100 acres, and (iii) Raipur Khadar having MLA of 156 acres

19 Ministry of Mines, 2014, *Minutes of the meeting held from 29 October 2014 to 31 October 2014 with different state governments and union territories to discuss the issue of illegal mining of sand*, p 4

20. On the other hand, the Rules specify that the lease should "commence mining operations within six months from the date of execution of the lease deed" [Rule 34(1)].

21. Illegal transportation is regulated as per the provisions of the Concession Rules, as well as the Uttar Pradesh Minerals (Prevention of Illegal Mining, Transportation and Storage) Rules, 2002. The person transporting minerals requires a valid transit pass issued by the lease/ permit holder.

22. The PESA, which governs nine states, including Andhra Pradesh, Chhattisgarh, Gujarat, Himachal Pradesh, Jharkhand, Maharashtra, Madhya Pradesh, Orissa and Rajasthan, constructs a framework of local/tribal self-governance around certain features.

Centre for Science and Environment
41, Tughlakabad Institutional Area, New Delhi 110 062, India,
Ph: +91-11-40616000 Fax: +91-11-29955879
E-mail: cse@cseindia.org, Website: www.cseindia.org