

**DETAIL STATEMENT (ENGLISH) OF THE PUBLIC HEARING FOR OIL
EXPLORATORY DRILLING TO BE UNDERTAKEN BY OIL INDIA Ltd., NEAR
PHULMAWI VILLAGE, AIZAWL DISTRICT**

VENUE : COMMUNITY HALL, PHULMAWI, MIZORAM

TIME : 30th August 2011; 12:00 Noon

Introduction:

A consortium of Oil India Ltd. (OIL) with 85% participating interest (PI) and Shiv-Vani Oil & Gas Exploration Services with 15% PI has signed a production sharing contract (PSC) with the Government of India for the exploration and production of hydrocarbons in the Exploration Block MZ-ONN-2004/1 falling in Lunglei, Serchhip, Aizawl and Mamit districts in Mizoram under NELP-VI. PSC designates OIL as the Operator of the block. The block is located in central part of Mizoram primarily within Lunglei, Serchhip and Aizawl districts even though a small portion falls in Mamit district. The total area of the block is 3213 sq. km and lies towards south of Aizawl, the capital city of Mizoram.

Exploratory drilling has not been carried at any place in the block so far. Acquisition, processing and interpretation of 2-D Seismic Survey, Gravity Magnetic Survey, Geochemical Survey has been done for the block MZ-ONN-2004/1 while 3 – D surveys are in progress. Based on seismic data analysis, OIL is planning to carry out exploratory drilling and testing at 5 promising locations in Phase I within 2007-2012 and at one location in Phase II during 2012-2015 period within the block area as per the minimum work programme (MWP) outlined in PSC to establish the techno-economic viability for production of hydrocarbons in the block area within a period of 8 years, that is, 2007-15. In addition to these exploratory wells, as per PSC requirement, additional appraisal/delineation wells need to be drilled for commercial production in case of discovery of oil/gas. The Capital city Aizawl is nearly 5 km north of the northern boundary of the block.

The public hearing is convened to obtain views, comments & suggestions on the project ‘Exploratory Drilling & Testing in Block MZ-ONN-2004/1 (Mizoram) from the people of affected areas.

The lists of participants are listed at Annexure.

The Hearing was presided over by Shri J. Hmingthanmawia, ADC, Aizawl District, Aizawl, Mizoram at the scheduled date and time. The participants include all sections of life. At the outset, the chairman after welcoming all the participants briefly explained the reason for holding the Public Hearing. He said that oil exploratory drilling in Mizoram is the central government initiative and the OIL is assigned to undertake the work in this area. He then introduced the following local authorities and officials from the State Government.

1. Village Council Members of Phulmawi Village
2. Village Council Members/leaders of Young Mizo Association(YMA), Tlungvel Village
3. All people of Phulmawi & Tlungvel village
4. Shri Lalhmachhuana, Sr. Geologist, Geology & Mineral Resources Department, G.O.M
5. Shri Lalbiakkima, Jr. Geologist, Geology & Mineral Resources Department
6. Smt P.C. Lalmuanpuii, AEE, MPCB,
7. All Officials of MPCB.

At the request of the Chairman, Pu C. Laldinkima, Geologist, OIL introduced following officials from OIL:

8. Shri Khargeswar Saikia, Chief Engineer, Drilling, OIL
9. Shri S.K Dutta, Head Drilling, OIL
10. Shri S.K. Mishra, Chief Chemist, OIL
11. Shri C. Laldinkima, Geologist, OIL
12. Shri M.P. Chaliha, Manager (Public Relations)
13. Shri Amitabh Goswami, Administrative Officer
14. Shri Pranjal Buragohain, Consultant, Greentech E.E.C
15. Shri Zothansanga, Transport Department, OIL

He then invited Smt P.C. Lalmuanpuii, AEE, Mizoram Pollution Control Board for introductory remark. The AEE mentioned that Public hearing is hold as per the EIA Notification as amended in 2006. She explained the need and objectives of holding Public Meeting saying that some developmental projects require Environmental Clearance from the Ministry of Environment & Forests for which Public Consultation is mandatory, hence today's Public Hearing Meeting. She added that the hearing was notified in Vanglaini and the Times of India for 30 days during which the draft EIA Report prepared by the Company was kept for suggestion and comments as per the aforesaid rule. She also reported that no suggestions or comments were received from the affected area during this period. She also highlighted that the hearing is meant for the public so that they have a say in the environmental impact of this developmental project but it is not to take approval or consent from the public. She also mentioned that all proceedings will be recorded in print and in video which will be sent to the Ministry of Environment & Forests, G.O.I. She requested the public to speak out their views, comments and suggestions regarding environmental impact of the proposed project.

The Chairman then requested Shri C. Laldinkima, Geologists, Oil India Limited for a presentation on the project. He explained about the meaning of various terminologies like explore, produce, transport, refining, relating to the proposed project including the functions and proposed work plan of the project. He explained the work area allotted to the company with the help of a map which extends over 4 districts of Mizoram viz Aizawl, Lunglei, Serchhip and Mamit district and 5 wells will be drilled in the first phase and one well in the second stage.

He also explained in detail with the help of pictures about drilling well bore and casing and the drilling procedure which is reported to be done with water based mud. He mentioned that a depth of about 5 km will be drilled which will taper towards the bottom.

He also explained about the ground water and surface water quality, soil characteristics, agricultural crops, climatology & meteorological quality like rainfall and humidity, air quality data obtained by the company around the work area. He also informed the public that about 25-30 KLPD will be used for drilling machine, 10-15 KLPD for mud preparation and 3 KLPD will be used for cooling. The source of pollution, risk and accidents that could occur in the work area and various mitigation measures like pit for drilling mud, chimney for smoke from DG set, Blow Out Preventor (BOP) for fire explosion, etc for the same and trained personnel will be deployed to take care of accidents. Wastes management team will also kept at the site to oversee waste management in the drilling site

The Chairman then invited comments, views and suggestions from participants of the hearing. The main issues raised and clarifications from the project proponent were as summarized below:

1. **Mr. Zohmangaiha, President, Tlungvel Venghlun Br. YMA**

“We have heard about the project in detail. How much area will be required for installation of drilling machines and staff quarters? Will there be job opportunity for villagers of Tlungvel & Phulmawi?”

OIL: *“Not less than half the size of 1st AR Ground (football playground) will be required. Regarding labour, we will engage local people to the maximum extent possible.”*

2. **Mr. Lalrinawma, Retired Teacher, Tlungvel Primary School:**

“As shown in the picture, large plot of land will be needed. Will compensation be given for land acquired for the project?”

OIL: *“Whether it is private or public land holding, the company will pay compensation for its worth.”*

Chairman: *“May I clarify some points regarding acquisition of land. Land required for drilling and approach road will be acquired and the company has submitted proposal for the same to us. The type of pass/ Certificate for land holding will play an important*

role. Under VC pass, the VC can give land for housing but not for gardening. Periodic patta is meant for farming/gardening/cultivation alone. It bears no ownership right but only the right of use. However, the value of cultivation within the pass shall be counted for compensation as per the Government approved rates. Meanwhile, for land having LSC, District Collector will calculate land value per Sq.m and compensation will be paid accordingly.”

3. Mr. Lalengmawia, M/S Teacher, Phulmawi:

“Regarding Air pollution, SO₂, NO₂ and Hydrocarbon may be released. These pollutants cannot be contained in one place and will be dispersed by wind thus polluting our village and its environment. Will it be safe enough for the public if machines are located away from human habitation as advocated?”

“There is one Community Health Centre in Thingsulthliah and one Health Sub Center in Tlungvel, which are far enough from our village. Is there any possibility of providing medical privilege to us in case of illness?”

OIL: *“Air pollution will be created by diesel generator. When oil burns, CO₂ and carbon monoxide are released anyway. However, the DG will be placed far from human habitation. Smoke will not be discharged in huge quantity and pollution will not be much as you think of. It is true that some chemicals will be generated but will be negligible. Smoke emitted by a heavy truck plying on a road is not considered a nuisance here. It will be more or less the same with that. Besides, drilling operation will take place for about 4-5 months only. There is no chance of any people falling sick due to the emission from the DG set and we will take responsibility if anyone does fall ill because of our operations.”*

4. Mr. Zosangliana, President, Joint YMA, Tlungvel:

“Large plot of land will be required for your operations. If there are no oil reserves, will you abandon and leave the site just like that?”

“Does NH-54 require widening?”

“Will refinery be put up in Mizoram or will oil be transported to other state?”

“How many unskilled labours will be needed?”

OIL: *“If the project fails, we will follow advice of the state government and will go by it.*

“We will have big problems with NH-54 in bringing in our trucks. Our trucks will not be able to move about the curve. We have had road survey with the state PWD right from the border up till here. We will take advice from them and we may need to widen the existing road in some places. We do need to build or widen the road for our machines.”

“We do not have refinery. If there is oil production, it may be possible to set up refinery in Mizoram if we tie up with other refining company or it may also be transported outside too. We do not have authority in this regard.”

“There will be job opportunities for those who are hardworking and sincere.”

5. **Mr. P. Lalnunsiam, President, Village Council, Phulmawi:**

“If Oil India is to work here, I would like to present the requirements of the society, which are:

- 1) “We have a small playground and our youths need sports center. It would be highly appreciated if the company could upgrade our existing field.”
- 2) “The water supply system here is insufficient to meet our requirements and we thus have immense problems especially during dry season. Is it possible to construct water tank for us?”
- 3) “Will it be possible to generate job opportunities for the youths?”
- 4) “We wish for the approach road to the site to pass through our village. If the approach road originates from our village passing through our locality, it will become a good source of income for us. Our Reserved Forests has been an eye attraction for the travelers along Aizawl- Lunglei road. It will no longer be possible

to safeguard these forests if the approach road passes through it. We therefore desire that the road be constructed within the span of our observation.”

OIL: *“Playground, development and promotion of sports is one of the main criteria and main areas of activities included in CSR activities of the company and we can definitely extend help in that area for further development.”*

“Regarding water storage, this comes under public amenities. We have some provisions for extending financial assistance or implementing projects, which are directly linked to community benefits. We do not have all the experts with us, we will have to take help of local authorities like PHE department etc.”

“Regarding labour / manpower, there are some avenues for short term work during drilling which are purely temporary and the local people will be given priority in unskilled work. But these are temporary jobs as we will keep on exploring till Hydrocarbon is discovered. After Hydrocarbon discovery, the scenario will be totally different.

“Regarding approach road to originate from this village, i.e road which can be used for drilling, construction or development of road involves more technical things and requires lots of survey before some final conclusion is arrived. Whether taking approach road from your village or some other places is purely a technical decision which is to be taken jointly by drilling department and other department and it is difficult to say right now. We are in touch with the state PWD. In fact, we are working together because the Engineers of the MPWD extended help by giving us guidance and support. So we will follow their suggestions. We are actually following the advice of the government regarding any kind of civil or development work. Other than that we can definitely extend help like widening of existing roads. For any CSR activities of the Company, we always take help of the local people for implementing CSR activities.

“We have a very solid CSR policy under which we have some restrictions about implementing certain CSR policies till hydrocarbon is discovered. We are now at the stage of exploration only and once hydrocarbon is proved, all the CSR policies that have been told will be definitely implemented. But that is till we can prove that hydrocarbon is here in commercial phases.”

Chairman: *“I would like to ask the villagers that do you mean to say that your Reserved Forests will be protected if approach road passes through your village.”*

6. **Mr. R.Lalrinmawia, SDO, PWD:**

“They desired to have the road to pass through their village. If the road is constructed elsewhere, the Reserved Forests which is still here because of the effort rendered by the local people for its protection will become open for all. I also feel that the road will be shorter if it originates from within the village. Besides, the state PWD is planning to construct Aizawl by-pass road from Silchar via Khamrang along Zemabawk-Tuirial and – Khumtung. Even if there is oil production, this by-pass road will be much more significant. This proposed road will also offer excellent chance of village extension for Phulmawi. “I have come here all the way from Lawngtlai to address this matter.”

7. **Mr. Zakunga, Farmer, Tlungvel:**

“My first question is how far should we have cultivation from the drilling site? What distance will be safe for farmers or the passers-by?”

“Regarding Refinery, we fear that incidents like in Assam which broke out due to non establishment of refinery thereby resulting into killing, we therefore request you to put up refinery here in Mizoram so that there’s no problem for the next generation.”

“Can there be gas leak like the one in Bhopal? Will it be dangerous?”

OIL: *“Drilling site will be fenced. You can have cultivation and go about anywhere outside the fencing. If you refuse to work somewhere near our premises just for the sake of your safety, then that is a different thing. It’s up to you to work or not outside our premises.”*

“We will try to work so that there is no leakage. We, however, cannot guarantee that there will be no accidents at all. As such it may be safer not to stay too close to our work area.”

“Regarding Refinery, it is highly desired to have it here in Mizoram. However, having refinery here is in the hands of higher authority and is beyond our power. As such we cannot promise anything of that sort at present.”

7. **Mr. P.C. Lalsangzuala, President, Tlungvel Vengthar Branch YMA:**

“From where did you get this contract and how do you come to know this place? What are the other sites where you plan to drill? Why do you select this place? When do you plan to execute the work? We guess the Company itself will control Pollution.”

OIL: *“Sites are selected based on the five studies that we have conducted. The first one is called Geological modeling which was initiated in 2007. Rough studies were conducted within our blocks so as to enable us to select sites for detail study. Second was 2-D seismic study. This was for studying different strata of the earth. It was carried out by drilling about 23-30 metre depth where bursting of explosives was done. An apparatus like the one used for measuring the intensity of earthquake, measured vibration so produced. The third one was ‘Geo-chemical’ study. This was done by testing of stones collected from different areas in laboratory for traces of oil or gas. Another type of ‘Geo chemical’ studies was also done by employing one of the latest technologies in USA called WL Core Technology. An apparatus which is as small as a pen was buried at a shallow depth of the earth’s crust for 14 days. After it was taken out, it was packed in an airtight container and was sent to foreign laboratory where test was carried out for oil or gas molecule. As all sampling stations were labeled, we were able to know the areas having probable potential. Study of fault and anticline did the fourth one. The fifth one was comparison and compilation of all the sites with Satellite imagery for final selection.”*

“We are planning to drill in Phulmawi, Maubuang, Thenzawl and Darlung/S. Sabual.

“We are now applying for the consent from the Government and we will commence work as soon as all necessary authorizations are obtained.”

8. **Mr. P.T Thanglura, M/S Teacher Tlungvel:**

“There were lots of arguments amongst the villagers regarding Air Pollution from the project. Some said an area within 5 km of the drilling site is not safe while some said 10 Km. We believe that lots of Carbon will be released. Is this true? However it was mentioned before that cultivation could be done outside the premises of the project. This may become a dead trap for us.

“What do you rank of Phulmawi in comparison with other sites that you have so selected as per your studies? Is it the best choice?

OIL: *“The idea that an area within 5 Km of the drilling site is unsafe is not true. I believe things are exaggerated to some extent. Yes, it is best to stay beyond 500 m of the site in case of fire emergency accidentally occurs. However, areas within 5 Km or 10 Km of the site as unsafe are not correct.”*

“We looked for the most suitable site, which offers easy approach. I think Phulmawi may rank second in our studies”.

“Regarding carbon release in huge quantity, it is the very carbon that we are in search of. Vehicles plying on the road do release carbon monoxide. But from our studies, we don't expect release of such harmful chemical compounds and if any, it will be controlled.”

Mr. P.T Thanglura, M/S Teacher Tlungvel (additional question):

“Huge quantities of dust are being generated by JCB or Bulldozer alone. Now that the company will be working with very heavy machines, how much dust will be generated or is it much lesser than we thought of?”

OIL: *“Smoke or dust will not be generated in huge amount from operations of machines.*

Mr. P.T Thanglura, M/S Teacher, Tlungvel (additional question):

“Some of us from Phulmawi & Tlungvel Village have land, which are of VC pass but not LSC or periodic patta near the proposed drilling site. Is it possible to claim compensation for the same value?”

OIL: *“May I request our Hon’ble Chairman to answer your question regarding land holding & compensation.”*

Chairman: *“We will acquire land for drilling site and approach road. Those who hold land within this area shall receive compensation depending upon the type of pass that the owners possess. Besides land, all vegetation within acquired area shall also be compensated as per the approved rate of the state govt. However, the company says that compensation cannot be given for land outside acquired area even if it falls within 500 Km of the drilling site. This implies that compensation will be given if it falls within the required area for drilling site and approach road but not for land outside the area.”*

9. **Mr. Shri Zakunga, Farmer, Tlungvel:**

“I want Refinery to be set up in Mizoram only but not in Silchar or somewhere else so that problems that occurred in Assam are not repeated here.”

10. **Mr. Saihlira Sailo, VC member Tlungvel:**

“We want an approach road to pass through Phulmawi if you are to work here. If not, our Reserved Forests will be encroached and destructed. If a road passes through the village, we will be able to see if someone tries to cut down the forest.”

CONCLUSION:

The summary of the meeting was read out and necessary corrections were made. After duly signing of the minutes by the Chairman, the Meeting ended with the vote of thanks from Shri C. Laldinkima, Geologists, Oil India Limited, Duliajan, Assam.