

**FORM-'A'****Form for seeking prior approval under Section -2(iii) of the proposals  
by the State Governments and other authorities.**

## PART-I

(To be filled up by the user agency)

1.0	Project Details:								
	i.	Short narrative of the proposal and Project / scheme for which forest land is required	<p>: Proposal for grant of Forest Clearance over 540.668 sq km forest area under Ningru Petroleum Mining Lease (Ningru PML) block in Changlang and Lohit districts of Arunachal Pradesh towards re-grant of the PML as per Hon'ble Supreme Court's order passed on 08.08.2014 on the basis of the Report of Central Empowered Committee (CEC) dated 25.02.2014 . The proposal is exclusively towards issuance of Petroleum Mining Lease (PML) for the Ningru PML block without calling for any physical diversion of forest land. After obtaining the PML, in line with Hon'ble Supreme Court's order, Oil India Limited (OIL) will submit location-wise Forest Clearance Proposal(s) as and when required under the Forest (Conservation) Act, 1980 on the standard conditions of CA, NPV, FRA, etc. for the forest land involved in its actual drilling and other activities requiring physical diversion of forest land.</p> <p>The 540.668 sq km of Ningru PML falls party in Changlang District &amp; partly in Lohit District as under –</p> <table> <tr> <td>Changlang district</td> <td>: 343.397 sq km</td> </tr> <tr> <td>Lohit district</td> <td>: 197.271 sq km</td> </tr> <tr> <td>Total</td> <td>: 540.668 sq km</td> </tr> </table> <p>Short narrative of the project in Annexure-IV attached.</p>	Changlang district	: 343.397 sq km	Lohit district	: 197.271 sq km	Total	: 540.668 sq km
Changlang district	: 343.397 sq km								
Lohit district	: 197.271 sq km								
Total	: 540.668 sq km								
	ii.	Map showing the required forest land boundary of adjoining forest on a 1:50, 000 scale map	<p>: Topo-sheet (covering part of topo-sheet Nos. 92 A/2, 92 A/3, 83 M/14 and 83 M/15) showing Ningru Petroleum Mining Lease area enclosed. Coordinates of the PML area in Annexure-III.</p>						


	iii.	Cost of the Project	:	NA
	iv.	Justification for locating the project in forest area.	:	Oil & natural gas (hydrocarbons), formed from organic matter from dead plants & animals and found deep under the earth, take millions of years to form & require a specific set of thermodynamic conditions (pressure and temperature). Accordingly, they are found in specific places on the earth. Such hydrocarbons are detected through extensive Geological studies and various surveys viz. gravity survey, magnetic survey, seismic survey, etc. and subsequent interpretation of the data so acquired from such surveys. The eastern part of Arunachal Pradesh, a part of Upper Assam Geological Province, is rich in such hydrocarbons. The Ningru block, which covers 54066.8 ha of forest land in Arunachal Pradesh and a part of above province, have been identified to be potential areas for hydrocarbon resources and accordingly awarded to OIL by Govt. of India under nomination basis for its Hydrocarbon Exploration & Production (E&P) activities. As such, the area cannot be changed.
	v.	Cost benefit analysis (to be enclosed)	:	NA
	vi.	Employment likely to be generated	:	NA (proposal towards re-grant of PML only).
2.0		Purpose-wise break-up of the total land required.	:	NA
3.0		Details of displacement of people due to the project, if any?	:	NA (no physical diversion of forest land)
	i.	Number of families	:	-
	ii.	Number of Schedule castes / Schedule tribes families	:	-
	iii.	Rehabilitation plan (to be enclosed)	:	-
4.0		Whether clearance under Environment (Protection) Act, 1986 required? Yes /No	:	No
5.0.		Undertaking to bear cost of raising and maintenances of compensatory afforestation and/or penal CA as well as cost for protection & regeneration of Safety Zone, etc. as	:	NA



	per the scheme prepared by State Government (undertaking to be enclosed)		
6.0	Details of certificates / documents enclosed as required under the instruction	:	<p>i. Topo-sheet (covering part of topo-sheet Nos. 92 A/2, 92 A/3, 83 M/14 and 83 M/15) showing Ningru PML block.</p> <p>ii. Annexure-I : Undertaking on NPV as per Hon'ble Supreme Court's order.</p> <p>iii. Annexure-II : Undertaking on submitting location-wise Forest Clearance Proposal(s) as and when required under the Forest (Conservation) Act, 1980 on the standard conditions of CA, NPV, FRA, etc. for the forest land involved in OIL's actual drilling &amp; other activities requiring physical diversion of forest land as per Hon'ble Supreme Court's order .</p> <p>iv. Short narrative of project (Annex. IV)</p>

Date : 29.07.2015  
Place : DULIAJAN



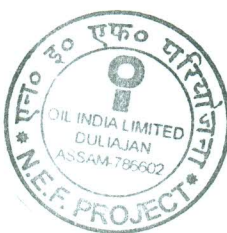
  
(RK Borah)  
Chief Engineer-Tpt (NEF)  
For Head-NEF  
OIL INDIA LTD, DULIAJAN-786602

State serial No. of roposal.....  
(To be filled up by the Nodal officer with date of receipt)

Annexure – I

**TO WHOM IT MAY CONCERN**

We do hereby undertake to pay the Net Present Value (NPV) as applicable as per Hon'ble Supreme Court's order dated 08.08.2014 passed on the basis of Report of Central Empowered Committee (CEC) dated 25.02.2014 and Ministry's guidelines dated 24.06.2015 against issuance of Forest Clearance towards formal grant of Ningru Petroleum Mining Lease in Iohit and Changlang districts of Arunachal Pradesh.



Date : 29.07.2015  
Place : DULIAJAN

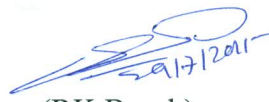
(RK Borah)  
Chief Engineer-Tpt (NEF)  
For Head-NEF  
OIL INDIA LTD, DULIAJAN-786602

**TO WHOM IT MAY CONCERN**

We do hereby undertake to submit location-wise Forest Clearance Proposal(s) as and when required under the Forest (Conservation) Act, 1980 on the standard conditions of CA, NPV, FRA, etc. for the forest land involved in OIL's actual drilling & other activities requiring physical diversion of forest land within the Ningru Petroleum Mining Lease area in Lohit & Changlang districts of Arunachal Pradesh as per Hon'ble Supreme Court's order dated 08.08.2014 passed on the basis of Report of Central Empowered Committee (CEC) dated 25.02.2014 and Ministry's guidelines dated 24.06.2015.

Date : 29.07.2015  
Place : DULIAJAN



  
(RK Borah)  
Chief Engineer-Tpt (NEF)  
For Head-NEF  
OIL INDIA LTD, DULIAJAN-786602

**COORDINATES OF PML AREA****A. Ningru PML -**

Area (sq km)	POINTS	LATITUDE			LONGITUDE		
		DEG	MIN	SEC	DEG	MIN	SEC
540.668	A	27	24	31	96	1	13
	B	27	25	40	96	1	35
	C	27	27	50	96	5	45
	D	27	26	30	96	6	25
	E	27	26	35	96	8	0
	F	27	28	20	96	11	15
	G	27	28	40	96	13	0
	H	27	30	25	96	12	58
	I	27	34	20	96	7	45
	J	27	32	50	96	5	45
	K	27	29	40	95	59	30
	L	27	31	20	95	58	0
	M	27	34	30	96	1	10
	N	27	36	20	96	0	25
	P	27	44	0	95	55	10
	Q	27	45	0	95	58	50
	R	27	40	5	96	2	10
	S	27	41	5	96	5	20
	T	27	37	0	96	8	45
	U	27	34	40	96	14	35
	V	27	33	50	96	15	30
	W	27	29	18	96	18	35
	X	27	27	10	96	15	20
	Y	27	24	40	96	9	15
	Z	27	25	0	96	6	30
	Z1	27	21	40	96	3	20
	Z2	27	23	0	96	0	10
	D1	27	23	1	96	1	13
	C1	27	23	1	96	3	22
	B1	27	24	31	96	3	22
	A	27	24	31	96	1	13
	<b>BLOCK-II</b>						
	Z2	27	23	0	96	0	10
	Z3	27	25	50	95	58	0
	B	27	25	40	96	1	35
	A	27	24	31	96	1	13
	D1	27	23	1	96	1	13
	Z2	27	23	0	96	0	10



**B. Kharsang PML (area within Ningru PML, but not with OIL) -**

Area (sq km)	POINTS	LATITUDE			LONGITUDE		
		DEG	MIN	SEC	DEG	MIN	SEC
11.000	A	27	24	31	96	01	13
	D1	27	23	01	96	01	13
	C1	27	23	01	96	03	22
	B1	27	24	31	96	03	22
	A	27	24	31	96	01	13



**SHORT NARRATIVE OF THE PROPOSAL &  
THE PROJECT : FUTURE PLAN**

OIL INDIA LIMITED (OIL), a Public Sector Undertaking (PSU) of Govt. of India, engaged in exploration, production & transportation of hydrocarbon is operating in Ningru Petroleum Mining Lease (Ningru PML) and Ningru Extension Petroleum Mining Lease (Ningru Extn. PML) areas covering 615.668 sq km area in Arunachal Pradesh since Nov'1963 & Sept'1984 respectively. Out of total 615.668 sq km, while Ningru PML of 540.668 sq km covers 197.271 sq km in Lohit District and 343.397 sq km in Changlang District of Arunachal Pradesh, the balance 75 sq km (615.668 – 540.668) under Ningru Extension PML falls in Changlang District of Arunachal Pradesh(AP).

2.0 On expiry of validity of Ningru PML on 26.11.2003, OIL submitted its application for re-grant of the PML during Sept'2002. Though Ministry of Petroleum & Natural Gas (MoP&NG), Govt. of India accorded its approval on the re-grant, the *Formal Approval by State Government* on the PML has been kept on hold by Govt. of Arunachal Pradesh (AP) pending prior approval under Forest (Conservation) Act, 1980.

3.0 Accordingly, the subject Forest Clearance proposal submitted is exclusively towards formal issuance of grant of Ningru Extn. Petroleum Mining Lease by Govt. of Arunachal Pradesh without calling for any physical diversion of forest land in line with Hon'ble Supreme Court's order passed on 08.08.2014 on the basis of Report of Central Empowered Committee (CEC) dated 25.02.2014 and Ministry's guidelines dated 24.06.2015 on the subject. For actual physical diversion of forest land for OIL's drilling & other activities within the PML areas, OIL will apply separate Forest Clearance proposal(s) as & when required as per prevailing norms under F(C) Act, 1980 on the standard conditions of CA, NPV, FRA, etc. as per above Hon'ble Supreme Court's order.

4.0 Geologically, Arunachal Pradesh is a part of Upper Assam Geological Province and amongst the 76 priority providences identified by US Geological Survey World Energy Assessment Team (2000). The search for hydrocarbon by OIL in Arunachal Pradesh goes back to 1963 when Govt. of India initially granted the Ningru Petroleum Exploration License (PEL) to OIL covering Kharsang-Shonking, Kherem-Kumchai & Manabum area in Lohit & Changlang districts of Arunachal Pradesh.



4.1 Over the years till 2003-2004, OIL carried out various geophysical surveys, surface mapping including drilling of number of wells in the area. Kumchai field, inside Ningru PML, is fully developed where 14 wells have been drilled so far. However, already discovered Kherem field in Ningru Extn. PML is yet to be developed fully.

#### 5.0 Future plan (Immediate plan) –

- Kumchai field under Ningru PML is producing around 70 KLPD of oil and 40,000 SCUMD of gas through 2 wells. OIL plans to do work-over in some of the wells to enhance the production potential.
- Out of the 40,000 SCUMD of gas produced, around 10,000–15,000 SCUMD is being used for internal purpose and the remaining is flared. In order to reduce the flaring and also to use the gas, OIL along with Govt. of Arunachal Pradesh is setting up a 10MW power plant at Kumchai, which requires around 55,000 SCUMD of gas, at a cost of around Rs. 140 crore. The project is in advance stage and waiting for re-grant of Ningru PML.
- OIL is planning to drill 10 development and 8 exploratory wells in the Kumchai field to enhance oil & gas production from the area.
- Additionally, OIL is taking-up geological & reservoir study (viz. Structural modelling, Facies modelling) for further development of the field.
- Additionally, one exploratory well named as Loc-NMA will be drilled with immediate effect in north Manabhum area in the northern part of Ningru PML (separate FC proposal for diversion of 32.836 ha of forest land for the location 'NMA' has already been submitted).

#### 5.1 Future plan (Mid to long-term plan) –

- Develop the fields for full commercial hydrocarbon production. The in place reserves of the fields is around 20.7 MMSKL, of which around 14.74MMSKL is oil and remaining is gas. Out of the estimated oil-in-place (14.74 MMSDKLS); around 0.6921 MMSDKLS (4.7% of OIP) have been recovered. Similarly, out of 4055.7845 MMSCM initial gas-in-place (GIP), only 13% of gas has been recovered.
- OIL plan to drill 60 wells in the rest of the areas of the two PML blocks which are already been covered by seismic and other geophysical surveys.
- In addition to above, as mid to long-term strategy, OIL plans to carryout additional seismic, gravity-magnetic survey, etc. in the area.
- Based on the prospects & quantum of commercial hydrocarbon production, OIL will be setting up various installations, infrastructure facilities, etc. in the PML areas as per requirements.

6.0 The proposed 79 drilling wells have been categorised under 5(five) priority zones within the blocks as under. Action for drilling will be initiated based on the priority setting, where Priority Zone-I has the first priority and Priority Zone-V being the last, except for Loc-NMA falling under Priority Zone-II, which will be drilled with immediate effect once the PML and FC (for the location) are obtained.

- |                         |  |
|-------------------------|--|
| i. Priority Zone-I      | - Kumchai area & Ningru Extn. PML area |
| ii. Priority Zone -II   | - North Manabhum area                  |
| iii. Priority Zone -III | - North Kharsang area                  |
| iv. Priority Zone -IV   | - Shongking area                       |
| v. Priority Zone -V     | - South Manabhum area                  |

7.0 The coordinates of the 79 drilling locations and a map showing the priority zones with the locations are provided vide Annexure-IV(A) attached. The coordinates are Geological Sub-surface Coordinates only and the actual surface coordinates may get changed slightly based on physical accessibility of the locations. However, it is to be noted that in the subject Forest Clearance proposal, no diversion of forest land for these locations has been proposed. OIL will be submitting separate FC proposal(s) for these locations requiring actual diversion of forest land as & when drilling operations in the locations are taken up.

8.0 As it is understood from above, in absence of Mining Leases, OIL's planned exploration and development activities in the Ningru PML area have remained stalled since more than a decade.





**COORDINATES OF PROPOSED WELLS (TOTAL 79 NOS.)****(Geological Sub-surface Coordinates)****1.0 Priority Zone-I (Kumchai area & Ningru Extn. PML area)**

Location Sl. No.	Coordinates	
	X	Y
<b>1</b>	3341804	1102266
<b>2</b>	3328572	1092515
<b>3</b>	3331188	1095091
<b>4</b>	3341245	1102755
<b>5</b>	3342391	1102651
<b>6</b>	3339308	1101388
<b>7</b>	3337664	1099119
<b>8</b>	3341084	1102021
<b>9</b>	3342752	1102794
<b>10</b>	3341748	1102778

Location Sl. No.	Coordinates	
	X	Y
<b>11</b>	3337619	1099743
<b>12</b>	3339136	1101295
<b>13</b>	3339324	1100821
<b>14</b>	3339450	1101700
<b>15</b>	3340306	1101400
<b>16</b>	3340195	1102508
<b>17</b>	3340836	1102243
<b>18</b>	3341142	1101699
<b>19</b>	3341247	1102507
<b>20</b>	3341693	1102744

**2.0 Priority Zone-II (North Manabhum area)**

Location Sl. No.	Coordinates	
	X	Y
<b>1</b>	3332050	1121800
<b>2</b>	3330100	1120150
<b>3</b>	3332050	1120200
<b>4</b>	3330100	1118100
<b>5</b>	3332050	1118150
<b>6</b>	3332100	1116150
<b>7</b>	3334050	1116150
<b>8</b>	3332050	1114100
<b>9</b>	3334100	1114100
<b>10</b>	3336000	1114050
<b>11</b>	3334100	1112200
<b>12</b>	3336000	1112200
<b>13</b>	3338000	1112200

Location Sl. No.	Coordinates	
	X	Y
<b>14</b>	3340050	1112200
<b>15</b>	3342000	1112200
<b>16</b>	3334300	1110100
<b>17</b>	3336000	1110100
<b>18</b>	3338000	1110100
<b>19</b>	3340050	1110100
<b>20</b>	3342000	1110100
<b>21</b>	3344050	1110100
<b>22</b>	3338000	1108100
<b>23</b>	3340050	1108100
<b>24</b>	3342000	1108100
<b>25</b>	3344050	1108100
<b>26*</b>	3342988	1110618

(\* Loc-NMA)



### 3.0 Priority Zone-III (North Kharsang area)

Location Sl. No.	Coordinates	
	X	Y
1	3342000	1087850
2	3344000	1087600
3	3338800	1086050
4	334000	1086100
5	3342000	1086100

Location Sl. No.	Coordinates	
	X	Y
6	3344000	1086150
7	3338000	1085000
8	3340000	1084900
9	3342000	1084600

### 4.0 Priority Zone-IV (Shongking area)

Location Sl. No.	Coordinates	
	X	Y
1	3352000	1088100
2	3350000	1087400
3	3348300	1086100
4	3350050	1086100
5	3352000	1086100

### 5.0 Priority Zone-V (South Manabhum area)

Location Sl. No.	Coordinates	
	X	Y
1	3348000	1106050
2	3350000	1106050
3	3346200	1104700
4	3348000	1104100
5	3350000	1104100
6	3352000	1104100
7	3354000	1104100
8	3350000	1102050
9	3352000	1102050
10	3354000	1102050

Location Sl. No.	Coordinates	
	X	Y
11	3356050	1102050
12	3354000	1100100
13	3356050	1100100
14	3358000	1100100
15	3356050	1098150
16	3358000	1098150
17	3360050	1098150
18	3358000	1096150
19	3360050	1096150

