

Government of India
Ministry of Mines
INDIAN BUREAU OF MINES
Mineral Economics Division



Bulletin of
**Mining Leases
&
Prospecting Licences, 2004**
(Excluding Atomic Minerals, Coal, Lignite,
Petroleum, Natural Gas and Minor Minerals)

Issued by
Controller General
INDIAN BUREAU OF MINES
Nagpur

PREFACE

The preparation and updation of the Directory of Mining Leases is a continuous exercise carried out by Indian Bureau of Mines. Compilation of information on prospecting licences executed/ renewed/ revoked is being carried out for the purpose of publishing it in the Bulletin of Mineral Information, a half-yearly publication, which, inter alia, contains information on mining leases, mineral legislation, trade policy, etc. This is the seventh edition of the Bulletin of Mining Leases and Prospecting Licences, brought out by Indian Bureau of Mines.

This publication contains information on mining leases, prospecting licences as well as reconnaissance permits as on 31.3.2004. Information contained in the Directory of Mining Leases as on 31.3.2004 has been analysed with different parameters, and distribution of mining leases, statewide, districtwise, mineralwise and sectorwise which clearly demarcates high, medium and low mineral potential bearing districts. This type of information will not only satisfy the basic need of various entrepreneurs dealing with mineral industry, but also help the planners to consider 'district', as a unit in the process of planning and development of an area or a district.

The prospecting licences are classified into two groups. The first group consists of licences covering areas up to 25 sq. km in individual cases and the second group, the reconnaissance permits above 25 sq. km and up to 5,000 sq. km in individual cases.

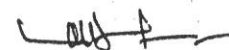
For updation of the Directory of Mining Leases as on 31.3.2004, data supplied by the different State Governments under the statutory provision of Rule 57 (2) of MCR, 1960 was the basis and was used freely for the analysis. In so far as prospecting licences/ reconnaissance permits are concerned, the individual licence/permit deeds and the consolidated annual returns received under Rule 57(1) and (2) of MCR, 1960 have been utilised for the same period. Besides, the above approval orders in case of reconnaissance permits were the sources of information.

Indian Bureau of Mines is thankful to State Government Departments for furnishing information on mining leases, prospecting licences and reconnaissance permits and solicits their cooperation in future as well.

It is hoped that the analysis and information presented in this publication will be useful in the process of planning and programming of new ventures in judicious utilisation of mineral resources and project of mineral-based industries in the country.

Nagpur

Dated : 3.10.2006



(C.P. Ambesh)

Controller General
Indian Bureau of Mines

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1. INTRODUCTION

India has a total geographical area of about 328 million hectares. Of this, the mining lease area, except for fuel and atomic minerals, constitutes around 0.14% (4,53,624 hectares). The position of mining leases as on 31.3.2004 reveals that there are as many as 6,941 mining leases (compared to 9,131 in the previous year) granted in the country by the State Governments covering 59 minerals (excluding coal, lignite, petroleum, natural gas, atomic minerals and minor minerals) with a total area of 4,53,624 hectares and spread over 23 states. These 59 minerals are broadly classified into metallic and non-metallic minerals. This bulletin highlights statewise, sectorwise and districtwise distribution of mining leases, prospecting licences and reconnaissance permits etc. Though apparently negligible, this is still an important land use segment as it contributes to the economic growth of the country. Besides, it calls for environmental protection as land degradation takes place during the process of mining activities.

India is gifted with a wide variety of naturally occurring minerals. These are being exploited to cater the needs of domestic mineral based industries as well as exports to earn foreign exchange. Today, as many as 64 major Metallic and Non-metallic minerals are being exploited in the country excluding coal, atomic and some minor minerals.

The Indian mineral sector is fully opened to private sector both domestic and foreign. The Government had taken a series of new policy initiatives under the overall framework of the National Mineral Policy, 1993 for the growth of mineral sector. As per the amendment to the MMRD Act (now re-designated as MMDR Act), 1957 in December, 1999 a new entity termed 'Reconnaissance Permit' covering essentially prospecting licences over large areas has been introduced. In this amended Act, the limit of maximum areas of reconnaissance permits, prospecting licences and mining leases is 10,000 sq.kms., 25 sq.km and 10 sq.km respectively in a state. This provision may facilitate the entrepreneurs in acquiring more number of "reconnaissance permits, prospecting licences and mining leases" leading to increased mineral production. Besides, the amended Act provides powers to the State Governments for grant of prospecting licences and mining leases in areas which are not compact and contiguous in respect of minerals other than fuel and atomic minerals.

Under Rule 57 (1) of MCR, 1960, a copy of every reconnaissance permit, (no provision for renewal of reconnaissance permits), prospecting licence and mining lease granted or renewed shall be supplied by each State Government within two months of such grant or renewal, to the Controller General, Indian Bureau of Mines. Besides, under Rule 57 (2) of MCR, 1960 all the State Governments / Union Territories are required to submit to the Controller General, Indian Bureau of Mines, a consolidated annual return of reconnaissance permits/prospecting licences/mining leases granted or executed in proforma 'A', prospecting licences/mining leases renewed in proforma 'B', and termination of mining leases and reasons for termination in proforma 'C', for the preceding financial year ending March. The above statements for the previous financial year are required to be submitted to IBM on or before 30th June each year by the State Government. From such information received from all the State Governments under statutory provisions, the information pertaining to mining leases and prospecting licences has been processed and updated through computerization. Subsequently, the required outputs have been generated.

2. LAND USE SCENARIO

India's Geographical area is about 3,28,726 thousand hectares. The entire geographical area is broadly classified into 8 segments including mining lease areas as follows:

Sl. No.	Area/Segment	Total area in thousand hectares	Percentage of area
1.	Agricultural, Cultivable & Culturable Lands	182,845	55.63
2.	Permanent pastures & Other grazing Land	10,499	3.19
3.	Culturable Waste (Potentially Arable)	13,483	4.10
4.	Forest	69,467	21.13
5.	Barren & Un-culturable land	17,762	5.40
6.	Non-agricultural land	24,274	7.38
7.	Mining Lease area*	452	0.14
8.	Other area (No information available)	9,942	3.03
Total		328726	100.00

Source : Directorate of Economics & Statistics, Ministry of Agriculture.

**Directory of Mining Leases, 2004, Indian Bureau of Mines.*

Out of the total geographical area, almost two thirds are under agricultural, cultivable, permanent pastures and grazing lands.

The mining lease area, constitutes around 0.14% (4,53,624 hectares) of the total geographical area of India. However, mining lease area continues to be an important segment and contributing factor to the economy of the country. At the same time, due attention is to be paid for environmental protection as land degradation takes place during the process of mining activities.

TABLE-2 : MINERALWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
1	Agate	2	45.58
2	Amethyst	5	40.64
3	Apatite	1	13.29
4	Asbestos	39	1,846.89
5	Ball clay	41	2,146.19
6	Barytes	119	2,494.20
7	Bauxite	266	24,592.93
8	Calcareous sand	14	151.75
9	Calcite	57	1,593.63
10	Chalk	159	656.24
11	China clay	380	16,312.65
12	Chromite	29	8,548.71
13	Clay (others)	43	937.95
14	Copper ore	17	10,589.86
15	Corundum	12	145.41
16	Diamond	2	576.51
17	Diaspore	17	185.98
18	Dolomite	423	15,600.52
19	Dunite	1	4.45
20	Epidote	1	5.00
21	Felsite	2	5.10
22	Felspar	166	5,076.57
23	Fire clay	220	16,401.86
24	Fluorite	18	1,807.41
25	Garnet	68	1,038.83
26	Gold	9	6,683.12
27	Graphite	132	4,657.94
28	Gypsum	52	18,036.24
29	Iolite	4	24.38
30	Iron ore	474	79,041.71
31	Jaspar	5	211.70
32	Kyanite	23	3,056.25
33	Laterite	114	1,129.33
34	Lead & zinc ore	12	8,221.35
35	Lime kankar	24	891.14
36	Limeshell	29	3,793.13
37	Limestone	1,411	106,260.41
38	Magnesite	27	2,297.14
39	Manganese ore	225	22,123.60
40	Mica	243	7,807.76
41	Moulding sand	39	738.70
42	Ochre	102	3,382.79
43	Opal	1	200.00
44	Perlite	1	144.65

(contd.)

3. MINING LEASES

3.1 STATEWISE ANALYSIS

As on 31.3.2004, there are 6,941 number of mining leases granted by 23 State Governments for 59 different minerals, covering an area of 4,53,624 hectares in the country. States rich in minerals where maximum number of mining leases granted are Andhra Pradesh (22.01%) followed by Gujarat (15.49%), Rajasthan (15.26%), Madhya Pradesh (9.85%), Orissa (6.32%), Karnataka (5.65%), Tamil Nadu (4.73%), Chhattisgarh (3.88%), Goa (3.60%) and Maharashtra (3.21 %). These ten states together account for about 90% of total leases executed and remaining thirteen states account for remaining about 10% of mining leases.

The maximum mining lease area covered by different states are Rajasthan (23.04 %) followed by Orissa (17.02%), Andhra Pradesh (11.41%), Karnataka (8.06%), Chhattisgarh (6.71%), Jharkhand (6.29%), Gujarat (5.21%), Madhya Pradesh (4.06%), Goa (4.00%) and Maharashtra (3.38%). These ten states account for about 89.18% of total lease areas executed and remaining thirteen states represent 10.82%.

The statewise mining lease distribution together with lease areas as well as statewise/districtwise distribution of mining leases as on 31.03.2004 are given in Tables-1 to 4.

TABLE-1 : STATEWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)

Sl. No.	State	No. of Lease	Percentage	Lease Area (Hect.)	Percentage
1	Andhra Pradesh	1,528	22.01	51,756.76	11.41
2	Assam	11	0.16	981.33	0.22
3	Bihar	12	0.17	2,087.77	0.46
4	Chhattisgarh	269	3.87	30,452.62	6.71
5	Goa	250	3.60	18,165.99	4.00
6	Gujarat	1,075	15.49	23,632.81	5.21
7	Haryana	140	2.02	15,033.55	3.31
8	Himachal Pradesh	58	0.84	2,018.58	0.44
9	Jammu & Kashmir	18	0.26	729.58	0.16
10	Jharkhand	201	2.90	28,530.38	6.29
11	Karnataka	392	5.65	36,583.17	8.06
12	Kerala	101	1.46	2,205.49	0.49
13	Madhya Pradesh	684	9.85	18,423.60	4.06
14	Maharashtra	223	3.21	15,335.65	3.38
15	Manipur	2	0.03	610.17	0.13
16	Meghalaya	14	0.20	1,660.16	0.37
17	Orissa	439	6.32	77,188.32	17.02
18	Rajasthan	1,059	15.26	104,495.64	23.04
19	Sikkim	4	0.06	86.00	0.02
20	Tamil Nadu	328	4.72	5,467.31	1.21
21	Uttar Pradesh	40	0.58	5,120.63	1.13
22	Uttaranchal	42	0.61	1,485.36	0.33
23	West Bengal	51	0.73	11,572.76	2.55
Total		6,941	100.00	453,623.63	100.00

Table-2 (concl.)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
45	Phosphorite	16	3,492.77
46	Pyrite	1	647.50
47	Pyrophyllite	66	2,116.04
48	Quartz	845	12,780.42
49	Quartzite	53	624.60
50	Rock salt	3	53.86
51	Sand (others)	46	4,716.79
52	Shale	27	402.14
53	Silica sand	417	18,721.90
54	Sillimanite	5	9,945.84
55	Slate	17	868.47
56	Steatite	395	19,194.97
57	Tin	6	123.80
58	Vermiculite	11	212.55
59	Wollastonite	4	202.49
	Total	6,941	453,623.63

**TABLE-3 : STATEWISE/MINERALWISE DISTRIBUTION OF
LEASES AND LEASE AREA
(as on 31.03.2004)**

State	Mineral	No. of Leases	Lease area (Hect.)
Andhra Pradesh	Amethyst	4	12.99
	Apatite	1	13.29
	Asbestos	7	352.08
	Ball clay	20	254.01
	Barytes	109	2,190.76
	Calcite	5	139.20
	China clay	57	893.40
	Clay (others)	5	215.18
	Corundum	6	35.93
	Dolomite	95	1,601.85
	Felspar	34	529.68
	Fire clay	24	82.31
	Garnet	13	220.00
	Gold	3	408.86
	Graphite	4	81.51
	Iron ore	25	1,511.15
	Laterite	78	642.44
	Lead & zinc ore	1	200.00
	Lime kankar	19	137.65
	Limeshell	5	163.38
	Limestone	201	21,484.88
	Magnesite	1	6.57
	Manganese ore	42	1,124.83
	Mica	111	2,139.81
	Moulding sand	1	31.36
	Ochre	18	189.81
	Phosphorite	1	2.83
	Pyrophyllite	6	169.74
	Quartz	407	5,306.28
	Quartzite	15	169.86
	Sand (others)	12	1,722.10
	Shale	10	177.40
Silica sand	71	1,070.85	
Sillimanite	1	7,000.00	
Slate	12	461.26	
Steatite	98	918.43	
Vermiculite	6	95.28	
Total	1,528	51,756.96	
Assam	Limestone	11	981.33
	Total	11	981.33

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Bihar	Limestone	7	182.17
	Mica	2	1,196.80
	Pyrite	1	647.50
	Quartz	2	61.30
	Total	12	2,087.77
Chhattisgarh	Bauxite	12	5,640.85
	China clay	5	13.16
	Dolomite	82	9,062.31
	Fire clay	4	16.24
	Graphite	3	98.79
	Iron ore	15	10,699.49
	Limestone	110	4,588.83
	Moulding sand	7	64.70
	Ochre	1	10.12
	Quartz	6	18.05
	Quartzite	16	166.00
	Steatite	4	7.89
	Tin	4	66.19
	Total	269	30,452.62
Goa	Bauxite	1	40.92
	Iron ore	187	14,002.79
	Manganese ore	62	4,122.28
	Total	250	18,165.99
Gujarat	Agate	1	4.64
	Ball clay	3	10.49
	Bauxite	149	4,040.71
	Calcareous sand	14	151.75
	Calcite	5	63.31
	Chalk	159	656.24
	China clay	45	1,204.07
	Clay (others)	35	701.21
	Copper ore	1	1,402.00
	Dolomite	98	1,225.04
	Felspar	1	1.00
	Fire clay	72	374.70
	Fluorite	2	31.69
	Gypsum	2	6.76
	Limestone	368	12,427.28
	Manganese ore	1	2.95
	Moulding sand	4	6.83
	Ochre	5	45.35
	Perlite	1	144.65
	Quartz	31	209.26

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Gujarat (contd.)	Quartzite	1	19.30
	Silica sand	69	856.50
	Steatite	6	22.04
	Vermiculite	2	25.04
	Total	1,075	23,632.81
Haryana	Barytes	1	79.32
	Calcite	2	158.56
	China clay	39	3,243.30
	Dolomite	2	252.15
	Felspar	3	285.06
	Iron ore	1	86.20
	Lime kankar	4	705.35
	Limestone	11	592.51
	Mica	1	400.00
	Quartz	16	851.85
	Quartzite	4	68.23
	Silica sand	52	7,959.30
	Slate	4	351.72
	Total	140	15,033.55
Himachal Pradesh	Barytes	2	81.39
	Gypsum	1	116.68
	Limestone	52	1766.65
	Rock Salt	3	53.86
	Total	58	2018.58
Jammu & Kashmir	Gypsum	3	57.71
	Limestone	12	331.07
	Magnesite	2	140.80
	Opal	1	200.00
	Total	18	729.58
Jharkhand	Bauxite	39	3,625.18
	China clay	8	219.48
	Copper ore	3	6,417.69
	Dolomite	1	18.45
	Felspar	6	200.25
	Fire clay	20	730.86
	Graphite	13	405.44
	Iron ore	25	9,675.37
	Kyanite	5	2,560.22
	Limestone	16	1,673.81
	Mica	29	964.39
	Ochre	1	5.62
	Pyrophyllite	1	22.50
	Quartz	18	236.36
	Sand (others)	13	1,765.35
	Steatite	3	9.41
Total	201	28,530.38	

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Karnataka	Barytes	1	17.00
	Bauxite	1	28.80
	Calcite	1	17.00
	China clay	13	839.51
	Chromite	6	987.47
	Clay (others)	1	20.23
	Copper ore	3	487.65
	Corundum	4	18.07
	Dolomite	14	305.10
	Dunite	1	4.45
	Felsite	2	5.10
	Felspar	4	131.91
	Fire clay	3	390.51
	Gold	6	6,274.26
	Graphite	4	235.04
	Iron ore	72	10,446.58
	Kyanite	5	200.70
	Laterite	2	95.21
	Limeshell	14	1,404.01
	Limestone	88	8,380.27
	Magnesite	7	406.47
	Manganese ore	26	2,719.58
	Moulding sand	24	586.99
	Ochre	5	617.18
	Quartz	47	454.38
	Quartzite	1	4.05
	Silica sand	30	1,345.01
	Steatite	6	134.34
Vermiculite	1	26.30	
Total	392	36,583.17	
Kerala	Bauxite	3	1.37
	China clay	41	95.56
	Laterite	1	0.19
	Limeshell	8	1,496.69
	Limestone	1	245.69
	Quartz	2	3.21
	Silica sand	42	35.43
	Sillimanite	3	327.35
	Total	101	2,205.49
Madhya Pradesh	Barytes	2	5.37
	Bauxite	35	795.09
	Calcite	24	63.26
	China clay	16	130.89

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
	Clay (others)	2	1.33
	Copper ore	2	479.90
	Diamond	2	576.51
	Diaspore	11	80.11
	Dolomite	99	483.42
	Fire clay	32	291.23
	Iron ore	8	122.84
	Laterite	31	348.46
	Lead & zinc ore	1	11.00
	Limestone	264	12,259.05
	Manganese ore	27	1,446.91
	Ochre	44	572.10
	Phosphorite	4	112.88
	Pyrophyllite	36	245.00
	Quartz	6	44.07
	Quartzite	1	6.10
	Sand (others)	2	7.52
	Shale	14	173.36
	Silica sand	4	6.25
	Slate	1	55.49
	Steatite	16	105.46
	Total	684	18,423.60
Maharashtra	Agate	1	40.94
	Bauxite	20	4,182.46
	China clay	9	91.77
	Chromite	1	16.22
	Dolomite	11	185.08
	Felspar	2	53.65
	Fire clay	2	18.40
	Fluorite	1	32.70
	Iron ore	25	870.12
	Kyanite	13	295.33
	Laterite	2	43.03
	Limestone	51	5,976.70
	Manganese ore	32	1,094.64
	Mica	1	42.06
	Moulding sand	1	47.02
	Ochre	1	12.36
	Quartz	8	139.86
	Quartzite	1	12.09
	Sand (others)	12	740.30
	Shale	1	41.48
	Silica sand	28	1,399.44
	Total	223	15,335.65

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Manipur	Chromite	2	610.17
	Total	2	610.17
Meghalaya	China clay	2	9.77
	Fire clay	1	221.44
	Limestone	10	1,424.05
	Shale	1	4.90
	Total	14	1,660.16
Orissa	Amethyst	1	27.65
	Asbestos	1	49.22
	Bauxite	4	6,079.09
	China clay	11	797.28
	Chromite	20	6,934.85
	Corundum	2	91.41
	Dolomite	8	877.21
	Fire clay	17	1,899.59
	Graphite	101	3,161.99
	Iolite	4	24.38
	Iron ore	102	30,732.88
	Lead & zinc ore	2	504.86
	Lime kankar	1	48.14
	Limestone	34	8,798.36
	Magnesite	1	40.46
	Manganese ore	34	11,532.41
	Mica	1	2.67
	Ochre	2	197.77
	Pyrophyllite	10	576.96
	Quartz	59	1,236.21
	Quartzite	12	169.27
	Sand (others)	6	437.43
	Sillimanite	1	2,618.49
Steatite	3	292.13	
Tin	2	57.61	
Total	439	77,188.32	
Rajasthan	Asbestos	31	1,445.59
	Ball clay	18	1,881.69
	Barytes	4	120.36
	Calcite	20	1,152.30
	China clay	105	8,153.24
	Copper ore	5	1,717.95
	Dolomite	8	579.28
	Epidote	1	5.00
	Felspar	114	3,833.32

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Rajasthan (concl.)	Fire clay	25	2,383.60
	Fluorite	15	1,743.02
	Garnet	14	340.99
	Graphite	2	383.55
	Gypsum	40	17,465.37
	Iron ore	14	894.29
	Jaspar	5	211.70
	Lead & zinc ore	8	7,505.49
	Limestone	52	20,408.73
	Magnesite	3	15.00
	Manganese ore	1	80.00
	Mica	98	3,062.03
	Ochre	24	1,726.72
	Phosphorite	7	2,251.88
	Pyrophyllite	6	308.16
	Quartz	116	3,971.07
	Quartzite	1	5.00
	Shale	1	5.00
	Silica sand	92	5,391.18
	Steatite	224	17,209.42
Vermiculite	1	42.22	
Wollastonite	4	202.49	
	Total	1,059	104,495.64
Sikkim	Copper ore	3	84.67
	Dolomite	1	1.33
	Total	4	86.00
Tamil Nadu	Bauxite	2	158.46
	China clay	2	15.55
	Dolomite	1	62.07
	Felspar	1	39.47
	Fire clay	11	52.17
	Garnet	41	477.84
	Graphite	5	291.62
	Gypsum	4	203.57
	Limeshell	2	729.05
	Limestone	115	1,926.77
	Magnesite	11	1,195.64
	Quartz	122	237.82
	Silica sand	7	17.01
	Steatite	3	36.56
	Vermiculite	1	23.71
	Total	328	5,467.31

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Uttar Pradesh	Diaspore	6	105.87
	Limestone	4	2,706.15
	Phosphorite	1	874.00
	Pyrophyllite	7	793.68
	Silica sand	22	640.93
	Total	40	5,120.63
Uttaranchal	Dolomite	1	20.23
	Gypsum	2	186.15
	Limestone	3	105.44
	Magnesite	2	492.20
	Phosphorite	2	222.05
	Steatite	32	459.29
	Total	42	1,485.36
West Bengal	China clay	27	605.67
	Dolomite	2	927.00
	Felspar	1	2.23
	Fire clay	9	9,940.81
	Limestone	1	0.67
	Moulding sand	2	2.00
	Ochre	1	5.76
	Phosphorite	1	29.13
	Quartz	5	10.70
	Quartzite	1	4.70
	Sand (others)	1	44.09
	Total	51	11,572.76

**TABLE - 4 : STATEWISE/DISTRICTWISE/MINERALWISE DISTRIBUTION OF
LEASES AND LEASE AREA (as on 31.03.2004)**

State	District	Mineral	No. of Leases	Lease Area (Hect.)
Andhra Pradesh	Adilabad	China clay	14	139.76
		Laterite	1	2.84
		Limestone	12	2,685.28
		Manganese ore	9	346.76
		Total	36	3,174.64
	Anantapur	Barytes	1	2.00
		China clay	3	28.35
		Corundum	2	16.36
		Dolomite	47	716.49
		Felspar	3	32.53
		Gold	1	168.42
		Iron ore	4	244.51
		Laterite	1	38.86
		Limestone	20	1,097.69
		Ochre	2	18.00
		Pyrophyllite	2	69.68
		Quartz	20	517.86
		Shale	1	3.16
		Steatite	35	511.07
		Total	142	3,464.98
	Chittoor	China clay	1	14.17
		Felspar	1	3.78
		Gold	2	240.44
		Pyrophyllite	2	8.08
		Quartz	11	100.79
		Steatite	2	15.20
	Total	19	382.46	
	Cuddapah	Asbestos	7	352.08
		Barytes	90	1,584.30
		China clay	13	611.92
		Clay (others)	3	183.32
		Dolomite	9	163.57
		Felspar	15	311.14
		Iron ore	1	18.62
		Laterite	1	80.94
		Limestone	18	1,296.55
		Magnesite	1	6.57
		Ochre	7	36.07
		Pyrophyllite	2	91.98

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Cuddapah (contd.)	Quartz	11	186.49
		Shale	2	19.71
		Silica sand	1	1.87
		Steatite	3	57.46
		Total	184	5,002.59
	Godavari East	China clay	13	22.79
		Fire clay	22	74.22
		Graphite	1	5.00
		Laterite	13	75.53
		Total	49	177.54
	Godavari West	Ball clay	20	254.01
		China clay	5	35.51
		Clay (others)	2	31.86
		Total	27	321.38
	Guntur	Lead & zinc ores	1	200.00
		Limekankar	1	3.80
		Limestone	28	4,171.66
		Quartz	5	33.84
		Slate	2	80.95
		Total	37	4,490.25
	Karimnagar	Dolomite	2	32.47
		Laterite	2	8.30
		Limestone	3	804.8
		Sand (others)	6	1,626.90
		Silica sand	1	10.00
		Total	14	2,482.47
	Khammam	Barytes	4	297.91
		Corundum	4	19.57
		Dolomite	6	423.32
		Felspar	1	1.50
		Garnet	7	80.45
		Graphite	3	76.51
		Iron ore	5	629.68
		Limestone	2	32.23
		Mica	2	29.83
		Quartz	9	37.55
		Sand (others)	3	15.88
		Total	46	1,644.43

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Krishna	Iron ore	4	19.77
		Limestone	18	2,397.58
		Quartz	3	2.86
		Total	25	2,420.21
	Kurnool	Barytes	6	233.16
		Calcite	2	33.68
		China clay	3	17.03
		Dolomite	28	246.42
		Felspar	1	16.87
		Iron ore	7	52.33
		Laterite	6	19.83
		Limestone	67	3,109.72
		Ochre	7	124.60
		Quartz	14	162.12
		Quartzite	4	31.77
		Shale	6	21.46
		Silica sand	13	178.43
		Steatite	58	334.7
	Total	222	4,582.12	
	Mahbubnagar	Felspar	9	71.13
		Quartz	95	592.5
		Total	104	663.63
	Medak	Amethyst	1	1.31
		Laterite	7	41.05
		Ochre	1	5.67
		Quartz	22	194.37
		Total	31	242.40
	Nalgonda	Laterite	4	4.82
		Limestone	28	4,694.10
		Quartz	20	184.42
		Total	52	4,883.34
	Nellore	Barytes	3	44.87
		Felspar	4	92.73
		Garnet	1	39.68
		Iron ore	2	274.00
		Laterite	9	63.34
		Limeshell	3	150.75
		Mica	99	1,750.76
		Quartz	68	973.72

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Nellore (concl'd.)	Silica sand	39	842.92
		Vermiculite	6	95.28
		Total	234	4,328.05
	Nizamabad	Laterite	2	12.86
		Quartz	3	7.65
		Total	5	20.51
	Prakasam	Barytes	5	28.52
		Garnet	4	4.79
		Iron ore	2	272.24
		Quartz	72	1750.05
		Silica sand	16	30.13
		Slate	10	380.31
		Total	109	2,466.04
	Rangareddi	Amethyst	3	11.68
		China clay	2	6.47
		Fire clay	2	8.09
		Laterite	13	138.69
		Limestone	5	1,195.27
		Quartz	30	180.52
		Shale	1	133.07
		Total	56	1,673.79
	Srikakulam	Garnet	1	95.08
		Lime kankar	1	5.85
		Limeshell	1	4.00
		Quartz	2	12.98
		Quartzite	2	16.02
		Silica sand	1	7.5
		Sillimanite	1	7,000.00
	Total	9	7,141.43	
	Visakhapatnam	Apatite	1	13.29
		Calcite	3	105.52
		China clay	3	17.40
		Laterite	6	57.93
		Limeshell	1	8.63
		Mica	10	359.22
		Ochre	1	5.47
		Phosphorite	1	2.83
		Quartz	11	226.47
		Total	37	796.76

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)	
	Vizianagaram	Limekankar	17	128.00	
		Manganese ore	33	778.07	
		Moulding sand	1	31.16	
		Quartz	11	142.09	
		Quartzite	9	122.07	
		Sand (others)	2	65.47	
		Total	73	1,266.86	
	Warangal	Dolomite	3	19.58	
		Laterite	13	97.45	
		Sand (others)	1	13.85	
		Total	17	130.88	
ASSAM	Karbi Anglong	Limestone	3	185.83	
		Total	3	185.83	
	North Cachar Hills	Limestone	8	795.50	
		Total	8	795.50	
BIHAR	Monghyr	Quartz	2	61.30	
		Total	2	61.30	
	Nawada	Mica	2	1,196.80	
		Total	2	1,196.80	
	Rohtas	Limestone	7	182.17	
		Pyrite	1	647.50	
		Total	8	829.67	
	CHHATTISGARH	Bastar	Limestone	18	43.89
			Quartzite	1	16.00
Total			19	59.89	
Bilaspur		Dolomite	32	8,646.31	
		Total	32	8,646.31	
Dantewara		Iron ore	6	6,886.90	
		Tin	4	66.19	
		Total	10	6,953.09	
Durg		Dolomite	39	169.94	
		Iron ore	4	2,732.62	
	Limestone	38	679.09		
	Moulding sand	4	33.1		
	Quartzite	5	48.08		
	Total	90	3,662.83		

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Janjgir-Champa	Dolomite	6	209.38
		Limestone	3	735.14
		Total	9	944.52
	Jashpur	Quartz	1	1.36
		Total	1	1.36
	Kanker	Bauxite	3	13.22
		Iron ore	4	999.26
		Limestone	1	0.63
		Mould sand	1	13.84
		Steatite	4	7.89
		Total	13	1,034.84
	Kawardha	Bauxite	2	664.33
		Dolomite	1	12.14
		Limestone	1	3.78
		Total	4	680.25
	Korba	Fire clay	1	0.46
		Total	1	0.46
	Mahasamund	Fire clay	3	15.78
		Quartz	1	2.21
		Total	4	17.99
	Raigarh	Dolomite	1	2.33
		Limestone	10	27.38
		Quartz	2	4.25
		Quartzite	2	54.4
		Total	15	88.36
	Raipur	Dolomite	3	22.21
		Limestone	36	3,090.65
		Total	39	3,112.86
	Rajnandgaon	China clay	5	13.16
		Iron ore	1	80.71
		Limestone	3	8.27
		Moulding sand	2	17.76
		Ochre	1	10.12
		Quartz	2	10.23
		Quartzite	8	47.52
		Total	22	187.77

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
GOA	Surguja	Bauxite	7	4,963.30
		Graphite	3	98.79
		Total	10	5,062.09
	North Goa	Iron ore	83	6,175.82
		Manganese ore	17	1,059.51
		Total	100	7,235.33
	South Goa	Bauxite	1	40.92
		Iron ore	104	7,826.97
		Manganese ore	45	3,062.77
		Total	150	10,930.66
GUJARAT	Amreli	Bauxite	3	160.66
		China clay	1	3.01
		Clay (others)	1	88.54
		Limestone	5	1,864.75
		Total	10	2,116.96
	Banaskantha	Calcite	1	3.76
		Copper ore	1	1,402.00
		Limestone	9	422.64
		Vermiculite	1	1.84
		Total	12	1,830.24
	Bharuch	Agate	1	4.64
		Silica sand	26	442.23
		Total	27	446.87
	Bhavnagar	Chalk	1	12.00
		Clay (others)	4	190.81
		Dolomite	3	52.99
		Limestone	1	20.00
		Moulding sand	1	2.80
		Total	10	278.60
	Dahod	Fluorite	1	0.49
		Limestone	5	187.51
		Quartz	1	4.20
		Total	7	192.20
	Jamnagar	Bauxite	106	3,110.34
		Calcareous sand	14	151.75
		Chalk	8	33.56
		Clay (others)	1	20.23
Limestone		52	2,092.96	
Ochre		1	20.03	
Total		182	5,428.87	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Junagarh	Chalk	3	27.90
		Limestone	115	2,736.75
		Total	118	2,764.65
	Kheda	Bauxite	16	84.78
		Limestone	1	10.93
		Total	17	95.71
	Kutch	Ball clay	2	5.00
		Bauxite	6	486.95
		China clay	28	283.17
		Clay (others)	22	290.03
		Gypsum	1	4.95
		Limestone	4	312.18
		Ochre	1	2.00
		Silica sand	5	174.16
		Total	69	1,558.44
	Mehesana	China clay	8	241.27
		Fire clay	1	32.37
		Total	9	273.64
	Panchmahals	Manganese ore	1	2.95
		Quartz	28	198.02
		Quartzite	1	19.30
		Total	30	220.27
	Patan	Ball clay	1	5.49
		China clay	1	36.22
		Clay (others)	5	103.82
		Ochre	3	23.32
		Total	10	168.85
	Porbandar	Bauxite	5	106.69
		Chalk	125	501.97
		China clay	1	3.97
		Limestone	171	3,235.15
		Total	302	3,847.78
	Rajkot	Chalk	22	80.81
		Fire clay	6	7.02
		Gypsum	1	1.81
		Limestone	2	37.13
		Perlite	1	144.65
		Total	32	271.42

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Sabarkantha	Bauxite	13	91.29
		Calcite	3	6.58
		China clay	6	636.43
		Felspar	1	1.00
		Fire clay	14	50.36
		Limestone	2	2.53
		Quartz	1	4.04
		Silica sand	15	70.03
		Steatite	6	22.04
		Total	61	884.30
	Surat	Limestone	1	1,504.75
		Silica sand	1	6.52
		Total	2	1,511.27
	Surendranagar	Clay (others)	2	7.78
		Fire clay	51	284.95
		Moulding sand	3	4.03
		Silica sand	22	163.56
		Total	78	460.32
	Vadodara	Calcite	1	52.97
		Dolomite	95	1,172.05
		Fluorite	1	31.20
		Quartz	1	3.00
		Vermiculite	1	23.20
		Total	99	1,282.42
HARYANA	Ambala	Limestone	2	340.56
		Total	2	340.56
	Bhiwani	Limekankar	4	705.35
		Total	4	705.35
	Faridabad	China clay	2	165.73
		Silica sand	29	6,208.35
		Total	31	6,374.08
	Gurgaon	China clay	37	3,077.57
		Quartz	4	97.93
		Quartzite	2	47.78
		Silica sand	23	1,750.95
		Total	66	4,974.23

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
HIMACHAL PRADESH	Mahendragarh	Barytes	1	79.32
		Calcite	2	158.56
		Dolomite	2	252.15
		Felspar	3	285.06
		Iron ore	1	86.20
		Limestone	9	251.95
		Mica	1	400.00
		Quartz	12	753.92
		Slate	1	81.35
		Total	32	2,348.51
	Rewari	Quartzite	2	20.45
		Slate	3	270.37
		Total	5	290.82
	Bilaspur	Limestone	4	248.39
		Total	4	248.39
	Kannaur	Gypsum	1	116.68
		Total	1	116.68
	Mandi	Rock salt	3	53.86
		Total	3	53.86
Sirmur	Barytes	2	81.39	
	Limestone	46	761.18	
	Total	48	842.57	
Solan	Limestone	2	757.08	
	Total	2	757.08	
JAMMU & KASHMIR	Anantnag	Limestone	9	82.15
		Total	9	82.15
	Baramula	Gypsum	1	2.71
		Total	1	2.71
	Doda	Gypsum	2	55.00
		Total	2	55.00
	Jammu	Limestone	1	4.67
		Total	1	4.67
	Leh	Opal	1	200.00
		Total	1	200.00

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
JHARKHAND	Pulwama	Limestone	1	100.00
		Total	1	100.00
	Srinagar	Limestone	1	144.25
		Total	1	144.25
	Udhampur	Magnesite	2	140.80
		Total	2	140.80
	Deogarh	Felspar	1	0.91
		Total	1	0.91
	Dhanbad	Fire clay	2	114.18
		Limestone	1	17.40
		Quartz	1	5.18
		Sand (others)	13	1,765.35
		Total	17	1,902.11
	Dumka	Quartz	1	0.88
		Total	1	0.88
	Garwah	Limestone	3	1,178.92
		Total	3	1,178.92
	Giridih	Felspar	3	194.96
		Mica	3	190.72
Steatite		1	3.64	
Total		7	389.32	
Gumla	Bauxite	21	2,346.18	
	Total	21	2,346.18	
Hazaribagh	Felspar	1	3.13	
	Fire clay	3	211.12	
	Limestone	2	117.05	
	Mica	1	197.00	
	Pyrophyllite	1	22.50	
	Total	8	550.80	
Kodarma	Mica	25	576.67	
	Quartz	3	79.73	
	Total	28	656.40	
Latehar	Bauxite	2	478.35	
	China clay	1	8.25	
	Fire clay	15	405.56	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Latehar (concl.)	Graphite	1	17.81
		Iron ore	1	2.04
		Quartz	11	142.32
		Total	31	1,054.33
	Lohardaga	Bauxite	16	800.65
		Total	16	800.65
	Palamau	Dolomite	1	18.45
		Felspar	1	1.25
		Graphite	12	387.63
		Iron ore	4	58.06
		Limestone	1	25.97
		Steatite	1	2.52
		Total	20	493.88
	Ranchi	Limestone	4	286.17
		Total	4	286.17
	Sahebganj	China clay	2	12.25
		Total	2	12.25
	Singhbhum (East)	Copper ore	3	6,417.69
		Kyanite	1	2.43
		Total	4	6,420.12
	Singhbhum (West)	China clay	5	198.98
		Iron ore	20	9,615.27
		Kyanite	4	2,557.79
		Limestone	5	48.30
		Ochre	1	5.62
		Quartz	2	8.25
		Steatite	1	3.25
		Total	38	12,437.46
KARNATAKA	Bagalkot	Dolomite	11	290.52
		Iron ore	2	69.99
		Limestone	41	3,043.67
		Total	54	3,404.18
	Bangalore	China clay	1	48.56
		Felspar	4	131.91
		Fire clay	1	2.02
		Silica sand	1	41.83
		Total	7	224.32

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Belgaum	Calcite	1	17.00
		China clay	1	6.58
		Dolomite	3	14.58
		Laterite	2	95.21
		Limestone	15	593.55
		Manganese ore	1	2.33
		Moulding sand	3	31.57
		Quartz	2	5.67
		Quartzite	1	4.05
		Silica sand	2	3.25
		Total	31	773.79
	Bellary	Iron ore	56	4,543.01
		Manganese ore	4	489.29
		Moulding sand	5	51.68
		Ochre	2	532.61
		Quartz	13	102.30
		Steatite	2	4.89
		Total	82	5,723.78
	Bidar	Ochre	1	21.85
		Total	1	21.85
	Chickmagalur	Dunite	1	4.45
		Iron ore	2	4,647.70
		Total	3	4,652.15
	Chitradurga	Barytes	1	17.00
		Copper ore	2	416.83
		Iron ore	5	390.96
		Kyanite	1	169.96
		Limestone	13	1,622.54
		Manganese ore	10	619.21
		Quartz	3	81.60
		Total	35	3,318.10
	Coorg	Corundum	1	0.80
		Total	1	0.80
	Dawangere	Manganese ore	2	64.61
		Moulding sand	5	113.82
		Quartz	3	12.14
		Total	10	190.57

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Dharwar	Clay (others)	1	20.23
		Total	1	20.23
	Gulbarga	Gold	1	55.75
		Limestone	9	2,606.46
		Moulding sand	1	6.50
		Quartz	2	39.61
		Total	13	2,708.32
	Hassan	China clay	2	311.60
		Chromite	6	987.47
		Copper ore	1	70.82
		Quartz	3	68.69
		Steatite	1	80.94
		Vermiculite	1	26.30
		Total	14	1,545.82
	Haveri	Moulding sand	8	246.44
		Total	8	246.44
	Kolar	China clay	4	300.51
		Gold	1	5,215.39
		Total	5	5,515.90
	Koppal	Quartz	7	64.16
		Total	7	64.16
	Mandya	Corundum	1	1.64
		Felsite	1	1.61
		Quartz	2	27.31
		Total	4	30.56
	Mysore	Corundum	2	15.63
		Felsite	1	3.49
		Graphite	4	235.04
		Kyanite	3	28.32
		Limestone	1	110.00
		Magnesite	7	406.47
		Quartz	1	0.90
		Steatite	1	12.14
		Total	20	811.99
	North Kanara	Limeshell	10	996.48
		Limestone	2	136.62
		Manganese ore	1	464.00
		Moulding sand	2	136.98
		Quartz	1	1.82
		Silica sand	10	253.28
		Total	26	1,989.18

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
KERALA	Raichur	Gold	3	965.08
		Quartz	2	13.73
		Total	5	978.81
	Shimoga	China clay	3	33.99
		Kyanite	1	2.42
		Limestone	1	40.12
		Manganese ore	1	526.10
		Quartz	1	16.91
		Total	7	619.54
	South Kanara	Quartz	1	1.95
		Silica sand	3	118.29
		Total	4	120.24
	Tumkur	China clay	2	138.27
		Fire clay	2	388.49
		Gold	1	38.04
		Iron ore	7	794.92
		Limestone	6	227.31
		Manganese ore	7	554.04
		Ochre	1	6.07
		Quartz	6	17.59
		Steatite	2	36.37
		Total	34	2,201.10
	Udupi	Bauxite	1	28.80
		Limeshell	4	407.53
		Ochre	1	56.65
		Silica sand	14	928.36
		Total	20	1421.34
Alapuzha	Limeshell	6	940.44	
	Silica sand	42	35.43	
	Total	48	975.87	
Kannur	China clay	3	11.62	
	Laterite	1	0.19	
	Total	4	11.81	
Kasargod	China clay	1	2.85	
	Total	1	2.85	
Kollam	Bauxite	3	1.37	
	China clay	5	8.75	
	Sillimanite	3	327.35	
	Total	11	337.47	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Kottayam	Limeshell	2	556.25
		Total	2	556.25
	Palakkad	Limestone	1	245.69
		Total	1	245.69
	Thiruvananthapuram	China clay	32	72.34
		Total	32	72.34
	Wynad	Quartz	2	3.21
		Total	2	3.21
MADHYA PRADESH	Badwani	Calcite	19	45.82
		Total	19	45.82
	Balaghat	Copper ore	2	479.90
		Dolomite	13	90.89
		Fire clay	1	2.41
		Limestone	7	73.98
		Manganese ore	23	1,358.43
		Ochre	1	16.18
		Sand (others)	1	5.50
		Total	48	2,027.29
	Chhatarpur	China clay	2	20.12
		Diaspore	7	32.00
		Limestone	2	4.91
		Phosphorite	1	48.76
		Pyrophyllite	13	52.00
		Quartzite	1	6.10
		Steatite	2	10.36
		Total	28	174.25
	Chhindwara	Dolomite	7	63.19
		Manganese ore	1	54.13
		Total	8	117.32
	Damoh	Laterite	1	21.25
		Limestone	8	1,484.60
		Sand (others)	1	2.02
		Total	10	1,507.87
	Datia	Lead & zinc ores	1	11.00
		Quartz	2	14.09
		Total	3	25.09

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Dewas	Barytes	1	3.35
		Silica sand	1	4.05
		Total	2	7.40
	Dhar	Limestone	18	119.78
		Ochre	1	6.31
		Total	19	126.09
	Gwalior	China clay	1	20.63
		Iron ore	1	20.23
		Total	2	40.86
	Jabalpur	Bauxite	3	8.74
		Dolomite	4	15.33
		Fire clay	14	98.97
		Iron ore	6	90.02
		Laterite	2	10.91
		Limestone	11	1,151.87
		Ochre	1	4.14
		Quartz	2	13.98
		Steatite	3	43.34
		Total	46	1,437.30
	Jhabua	Calcite	1	2.40
		Dolomite	16	100.65
		Limestone	1	2.15
		Manganese ore	3	34.35
		Phosphorite	2	11.32
		Total	23	150.87
	Katni	Bauxite	7	42.26
		Dolomite	13	73.42
		Fire clay	13	144.57
		Iron ore	1	12.59
		Laterite	2	4.94
		Limestone	84	1,492.79
		Ochre	3	7.62
		Silica sand	1	0.60
		Steatite	2	15.71
	Total	126	1,794.50	
	Khargon (West Nimar)	Calcite	4	15.04
		China clay	1	0.61
		Limestone	2	4.89
		Silica sand	2	1.60
		Total	9	22.14

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Mandla	Dolomite	34	97.85
		Total	34	97.85
	Mandsaur	Laterite	11	51.52
		Shale	14	173.36
		Slate	1	55.49
		Total	26	280.37
	Morena	Limestone	1	18.00
		Total	1	18.00
	Narsinhapur	Dolomite	3	10.07
		Fire clay	1	20.00
		Limestone	2	35.06
		Steatite	9	36.05
		Total	15	101.18
	Nimach	Laterite	5	62.11
		Limestone	6	963.09
		Total	11	1,025.20
	Panna	Diamond	2	576.51
		Limestone	1	48.39
		Total	3	624.90
	Rewa	Bauxite	10	126.52
		Limestone	17	1,485.49
		Ochre	3	47.37
		Total	30	1659.38
	Sagar	Dolomite	2	20.36
		Phosphorite	1	52.80
		Pyrophyllite	2	3.21
		Total	5	76.37
	Satna	Bauxite	14	117.30
		China clay	7	52.45
		Clay (others)	2	1.33
		Laterite	9	179.99
		Limestone	93	4,368.03
		Ochre	29	426.41
		Total	154	5,145.51
	Seoni	Dolomite	7	11.66
		Total	7	11.66

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
MAHARASHTRA	Shahdol	Bauxite	1	500.27
		China clay	3	20.84
		Fire clay	1	5.66
		Ochre	2	26.76
		Total	7	553.53
	Shivpuri	Diaspore	1	17.00
		Total	1	17.00
	Shyampur	Limestone	7	508.25
		Ochre	2	22.59
		Total	9	530.84
	Sidhi	Limestone	4	497.77
		Total	4	497.77
	Tikamgarh	Barytes	1	2.02
		China clay	1	5.00
		Diaspore	3	31.11
		Pyrophyllite	21	189.79
		Quartz	2	16
		Total	28	243.92
	Umari	China clay	1	11.24
		Fire clay	2	19.62
		Laterite	1	17.74
		Ochre	2	14.72
		Total	6	63.32
	Amravati	China clay	2	16.71
		Fire clay	1	13.26
		Total	3	29.97
	Bhandara	Chromite	1	16.22
		Kyanite	13	295.33
Manganese ore		6	375.97	
Quartz		4	33.32	
Sand (others)		2	43.34	
Total		26	764.18	
Chandrapur	China clay	1	18.00	
	Fluorite	1	32.70	
	Iron ore	3	33.29	
	Laterite	2	43.03	
	Limestone	18	3,623.34	
	Sand (others)	5	461.08	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Chandrapur (concl'd.)	Shale	1	41.48
		Total	31	4,252.92
	Gadchiroli	Iron ore	1	9.96
		Total	1	9.96
	Gondia	Iron ore	2	46.43
		Quartz	1	14.32
		Total	3	60.75
	Jalna	Agate	1	40.94
		Total	1	40.94
	Kolhapur	Bauxite	15	3,865.38
		Iron ore	1	143.95
		Total	16	4,009.33
	Nagpur	China clay	5	43.88
		Dolomite	10	123.17
		Manganese ore	25	526.82
		Ochre	1	12.36
		Quartz	1	1.07
		Sand (others)	4	191.88
		Total	46	899.18
	Raigad	Bauxite	3	111.70
		Total	3	111.70
	Ratnagiri	Bauxite	2	205.38
		Moulding sand	1	47.02
		Silica sand	7	488.08
		Total	10	740.48
	Sindhudurg	China clay	1	13.18
		Felspar	2	53.65
		Fire clay	1	5.14
		Iron ore	18	636.49
		Manganese ore	1	191.85
		Mica	1	42.06
		Quartz	2	91.15
		Quartzite	1	12.09
		Silica sand	21	911.36
		Total	48	1,956.97
	Yeotmal	Dolomite	1	61.91
		Limestone	33	2,353.36
		Sand (others)	1	44.00
		Total	35	2,459.27

State	District	Mineral	No. of Leases	Lease Area (Hect.)
MANIPUR	Chandel	Chromite	1	223.93
		Total	1	223.93
	Ukhrul	Chromite	1	386.24
		Total	1	386.24
MEGHALAYA	Garo Hills West	Fire clay	1	221.44
		Limestone	2	470.00
		Total	3	691.44
	Jaintia Hills	Limestone	2	15.28
		Total	2	15.28
	Khasi Hills East	China clay	2	9.77
Limestone		5	878.77	
Shale		1	4.90	
Total		8	893.44	
Khasi Hills West	Limestone	1	60.00	
	Total	1	60.00	
ORISSA	Angul	Quartz	1	8.13
		Sand (others)	3	318.33
		Total	4	326.46
	Bargarh	China clay	3	103.34
		Graphite	12	220.68
		Limestone	2	806.53
		Quartz	1	15.21
		Total	18	1,145.76
	Baudh	Graphite	1	28.96
		Quartz	4	58.48
Total		5	87.44	
Bolangir	Graphite	64	1,676.25	
	Lead & zinc ores	1	5.26	
	Limestone	1	27.65	
	Manganese ore	1	7.27	
	Quartz	2	143.99	
	Total	69	1,860.42	
Cuttack	Fire clay	7	929.19	
	Total	7	929.19	
Dhenkanal	Chromite	2	847.48	
	Graphite	3	185.70	
	Total	5	1,033.18	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Ganjam	Lime kankar	1	48.14
		Sillimanite	1	2,618.49
		Total	2	2,666.63
	Jajpur	Chromite	12	3,888.39
		Iron ore	1	1,812.99
		Quartz	1	7.23
		Quartzite	1	2.31
		Total	15	5,710.92
	Jharsuguda	Fire clay	2	246.42
		Ochre	1	102.27
		Quartzite	3	121.44
		Sand (others)	1	109.20
		Total	7	579.33
	Kalahandi	Amethyst	1	27.65
		Corundum	1	57.46
		Graphite	10	205.13
		Iolite	4	24.38
		Quartz	33	315.46
		Total	49	630.08
	Keonjhar	Asbestos	1	49.22
		Chromite	6	2,198.98
		Iron ore	61	22,891.90
		Magnesite	1	40.46
		Manganese ore	20	7,922.06
		Pyrophyllite	10	576.96
		Quartz	2	35.99
		Total	101	33,715.57
	Khurda	Fire clay	3	147.09
		Total	3	147.09
	Koraput	Bauxite	2	4,647.28
		China clay	1	38.50
		Graphite	1	501.67
		Limestone	2	1,586.22
		Manganese ore	1	501.67
		Mica	1	2.67
		Ochre	1	95.50
		Quartz	2	22.76
		Total	11	7,396.27

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Malkangiri	Limestone	1	1,694.13
		Quartz	1	2.48
		Tin	2	57.61
		Total	4	1,754.22
	Mayurbhanj	China clay	7	655.44
		Fire clay	1	22.49
		Graphite	1	24.91
		Iron ore	7	1,204.91
		Quartz	1	1.19
		Quartzite	7	20.63
		Steatite	2	136.20
		Total	26	2,065.77
	Nawapara	Corundum	1	33.95
		Graphite	1	20.23
		Limestone	4	410.57
		Total	6	464.75
	Nayagarh	Graphite	1	16.64
		Total	1	16.64
	Raygada	Bauxite	1	1,388.74
		Graphite	7	281.82
		Manganese ore	2	133.86
		Quartzite	1	24.89
		Total	11	1,809.31
	Sambalpur	Fire clay	1	8.84
		Quartz	4	103.61
		Total	5	112.45
	Sundergarh	Bauxite	1	43.07
		Dolomite	8	877.21
		Fire clay	3	545.56
		Iron ore	33	4,823.08
		Lead & zinc ores	1	499.60
		Limestone	24	4,273.26
		Manganese ore	10	2,987.55
		Quartz	7	521.70
		Sand (others)	2	9.90
		Steatite	1	155.93
		Total	90	14,736.86

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
RAJASTHAN	Ajmer	Asbestos	4	214.66
		Felspar	69	2,478.17
		Garnet	3	15.00
		Lead & zinc ores	1	480.45
		Limestone	1	8.57
		Magnesite	1	5.00
		Mica	35	1,351.77
		Quartz	4	127.33
		Steatite	2	131.00
		Vermiculite	1	42.22
		Wollastonite	1	5.00
	Total	122	4,859.17	
	Alwar	Barytes	2	41.85
		China clay	1	4.73
		Copper ore	1	914.07
		Felspar	1	5.00
		Fire clay	1	3.75
		Ochre	1	60.70
		Silica sand	1	4.73
		Steatite	8	511.01
		Total	16	1,545.84
	Banswara	Graphite	2	383.55
		Limestone	1	65.82
		Manganese ore	1	80.00
		Steatite	2	713.08
		Total	6	1,242.45
	Barmer	China clay	2	10.00
		Gypsum	5	1,630.51
		Silica sand	5	551.09
		Total	12	2,191.60
	Bharatpur	Fire clay	3	47.75
		Ochre	2	10.00
		Silica sand	21	1,557.11
		Total	26	1,614.86
	Bhilwara	Asbestos	9	45.00
		China clay	12	778.32
		Felspar	23	478.75
		Garnet	1	5.00
		Lead & zinc ores	1	1,200.00
		Mica	55	1,456.02
		Ochre	1	5.00

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Bhilwara (concl'd.)	Quartz	2	48.16
		Steatite	10	1,519.35
		Total	114	5,535.60
	Bikaner	Ball clay	8	773.96
		China clay	52	4,714.13
		Fire clay	17	2,214.74
		Gypsum	13	3,826.86
		Total	90	11,529.69
	Bundi	China clay	2	109.00
		Ochre	2	99.37
		Silica sand	2	357.00
		Total	6	565.37
	Chittorgarh	China clay	26	1,296.01
		Limestone	8	3,692.81
		Ochre	11	1,254.85
		Shale	1	5.00
		Total	46	6,248.67
	Dausa	China clay	1	32.37
		Iron ore	1	65.25
		Quartz	3	191.28
		Silica sand	7	348.97
		Steatite	5	352.20
		Total	17	990.07
	Dungarpur	Felspar	1	100.00
		Fluorite	10	500.40
		Steatite	63	4,330.97
		Total	74	4,931.37
	Ganganagar	Gypsum	8	1,475.89
		Total	8	1,475.89
	Hanumangarh	Gypsum	5	7,084.65
		Total	5	7,084.65
	Jaipur	Asbestos	1	66.50
		Calcite	1	296.41
		China clay	7	1,171.14
		Dolomite	2	92.93
		Epidote	1	5.00
		Felspar	7	261.33

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Jaipur (concl'd.)	Iron ore	5	484.79
		Limestone	3	1,334.90
		Mica	2	68.37
		Ochre	2	183.00
		Quartz	20	538.81
		Silica sand	18	864.90
		Steatite	9	849.98
		Total	78	6,218.06
	Jaisalmer	Ball clay	1	150.00
		Dolomite	1	32.37
		Gypsum	3	867.89
		Limestone	2	1,998.00
		Ochre	1	32.37
		Silica sand	8	385.00
		Total	16	3,465.63
	Jalore	Fluorite	4	1,075.00
		Gypsum	1	178.50
		Total	5	1,253.50
	Jhunjhunu	Calcite	3	104.94
		Copper ore	4	803.88
		Dolomite	2	66.05
		Fire clay	4	117.36
		Iron ore	5	257.54
		Ochre	1	33.00
		Pyrophyllite	1	42.50
		Quartz	3	212.17
		Steatite	5	432.56
	Total	28	2,070.00	
	Jodhpur	Jasper	5	211.70
		Total	5	211.70
	Karauli	Silica sand	22	740.97
		Steatite	1	5.00
		Total	23	745.97
	Kota	Limestone	4	1309.52
		Total	4	1309.52
	Nagaur	Ball clay	2	10.00
		Gypsum	5	2,401.07
		Limestone	12	6,700.63
		Total	19	9,111.70

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Pali	Asbestos	1	76.89
		Ball clay	7	947.73
		Felspar	2	69.87
		Limestone	11	1,114.15
		Magnesite	2	10.00
		Quartz	15	1,246.20
		Total	38	3464.84
	Rajsamand	Asbestos	13	812.11
		Felspar	1	5.00
		Lead & zinc ores	4	2,142.04
		Mica	2	10.00
		Pyrophyllite	2	105.00
		Quartz	30	465.02
		Steatite	32	2,602.75
		Total	84	6,141.92
	Sawai Madhopur	Ochre	1	38.43
		Quartz	2	249.45
		Silica sand	2	282.25
		Total	5	570.13
	Sikar	Barytes	1	47.51
		Calcite	7	222.79
		China clay	1	32.54
		Dolomite	3	387.93
		Felspar	7	364.83
		Iron ore	3	86.71
		Limestone	5	2,363.12
		Ochre	1	5.00
		Quartz	22	589.81
		Total	50	4,100.24
	Sirohi	Calcite	5	366.66
		Fluorite	1	167.62
		Lead & zinc ores	1	63.00
		Limestone	4	1,116.31
		Wollastonite	2	95.69
		Total	13	1,809.28
	Tonk	Felspar	3	70.37
		Garnet	10	320.99
		Mica	4	175.87
		Quartz	15	302.84
		Quartzite	1	5.00
		Silica sand	6	299.16
		Steatite	1	48.00
	Total	40	1,222.23	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Udaipur	Asbestos	3	230.43
		Barytes	1	31.00
		Calcite	4	161.50
		China clay	1	5.00
		Lead & zinc ores	1	3,620.00
		Limestone	1	704.90
		Ochre	1	5.00
		Phosphorite	7	2,251.88
		Pyrophyllite	3	160.66
		Steatite	86	5,713.52
		Wollastonite	1	101.80
	Total	109	12,985.69	
SIKKIM	Sikkim East	Copper ore	3	84.67
		Total	3	84.67
	Sikkim West	Dolomite	1	1.33
		Total	1	1.33
TAMIL NADU	Ariyalur	Fire clay	2	2.74
		Limestone	10	577.96
		Total	12	580.70
	Chengai-Anna	Quartz	1	6.58
		Total	1	6.58
	Coimbatore	Quartz	5	12.65
		Steatite	1	3.40
		Total	6	16.05
	Cuddalore	Fire clay	3	43.40
		Total	3	43.40
	Dharmapuri	Quartz	1	1.27
		Total	1	1.27
	Dindigul	Limestone	12	35.98
		Quartz	11	9.73
		Total	23	45.71
	Erode	Limestone	1	1.82
		Quartz	24	51.37
		Total	25	53.19
	Kanchipuram	Limeshell	1	190.00
Silica sand		1	4.63	
Total		2	194.63	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Kanyakumari	Garnet	5	258.31
		Total	5	258.31
	Karur	Limestone	14	46.64
		Quartz	31	49.18
		Total	45	95.82
	Madurai	Graphite	1	14.51
		Limestone	2	3.11
		Quartz	2	3.44
		Total	5	21.06
	Nagapattinam	Silica sand	4	7.14
		Total	4	7.14
	Namakkal	Bauxite	2	158.46
		Limestone	11	32.52
		Quartz	14	25.33
		Total	27	216.31
	Perambalur	Fire clay	6	6.03
		Gypsum	1	159.31
		Limestone	11	151.52
		Total	18	316.86
	Periyar	Quartz	12	9.47
		Total	12	9.47
	Ramnathapuram	Limeshell	1	539.05
		Total	1	539.05
	Salem	Felspar	1	39.47
		Limestone	21	89.33
		Magnesite	11	1,195.64
		Quartz	20	68.19
		Total	53	1,392.63
	Sivaganga	Graphite	4	277.11
		Total	4	277.11
	Theni (Madurai)	Limestone	3	6.77
		Total	3	6.77
	Thiruvarur	Silica sand	1	4.16
		Total	1	4.16

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Tiruchirapalli	China clay	1	12.30
		Dolomite	1	62.07
		Garnet	1	19.06
		Gypsum	3	44.26
		Limestone	8	94.28
		Quartz	1	0.61
		Steatite	1	4.90
		Total	16	237.48
	Tirunelveli	Garnet	33	178.54
		Limestone	13	192.53
		Total	46	371.07
	Tuticorin	Garnet	2	21.93
		Limestone	2	4.75
		Total	4	26.68
	Vellore	Steatite	1	28.26
		Vermiculite	1	23.71
		Total	2	51.97
	Villupuram	China clay	1	3.25
		Total	1	3.25
	Virudhunagar	Limestone	7	689.56
		Total	7	689.56
UTTAR PRADESH	Allahabad	Silica sand	16	467.73
		Total	16	467.73
	Banda	Silica sand	6	173.20
		Total	6	173.20
	Hamirpur	Pyrophyllite	3	15.93
		Total	3	15.93
	Jhansi	Diaspore	3	35.03
		Total	3	35.03
	Lalitpur	Diaspore	3	70.84
		Phosphorite	1	874.00
Pyrophyllite		4	777.75	
Total		8	1,722.59	
Sonbhadra	Limestone	4	2,706.15	
	Total	4	2,706.15	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
UTTARANCHAL	Almora	Steatite	1	1.40
		Total	1	1.40
	Bageshwar	Magnesite	1	53.20
		Steatite	23	404.65
		Total	24	457.85
	Dehradun	Limestone	2	97.75
		Phosphorite	2	222.05
		Total	4	319.80
	Pithoragarh	Magnesite	1	439.00
		Steatite	8	53.24
		Total	9	492.24
	Tehri Garhwal	Dolomite	1	20.23
		Gypsum	2	186.15
		Limestone	1	7.69
		Total	4	214.07
WEST BENGAL	Bankura	China clay	10	62.50
		Felspar	1	2.23
		Fire clay	2	12.23
		Quartz	2	4.33
		Quartzite	1	4.70
		Total	16	85.99
	Birbhum	China clay	15	210.88
		Fire clay	1	46.00
		Total	16	256.88
	Burdwan	Fire clay	6	9,882.58
		Moulding sand	2	2.00
		Total	8	9,884.58
	Jalpaiguri	Dolomite	2	927.00
		Total	2	927.00
	Midnapur	Ochre	1	5.76
Total		1	5.76	
Purulia	China clay	2	332.29	
	Limestone	1	0.67	
	Phosphorite	1	29.13	
	Quartz	3	6.37	
	Sand (others)	1	44.09	
	Total	8	412.55	

3.2 DISTRICTWISE ANALYSIS

(i) HIGH MINERAL POTENTIAL DISTRICTS

Districtwise analysis indicates that the total number of mineral bearing districts are around 266 falling in 23 States in the country. Out of these, 16 districts in 6 States are considered as highly potential districts in each of which more than 100 mining leases are granted. There are 2,473 mining leases granted covering an area of 107,515 hectares in the country. These constitute 36% of total number of mining leases and cover around 24% of total area. Information on the number of mining leases granted in highly potential districts is furnished in Table-5.

TABLE - 5 : HIGH MINERAL POTENTIAL DISTRICTS

Sl. No.	District	No. of leases	No. of Minerals	Area of leases (Hect.)	States
1	Anantapur	142	14	3,464.98	Andhra Pradesh
2	Cuddapah	184	16	5,002.59	Andhra Pradesh
3	Kurnool	222	14	4,582.12	Andhra Pradesh
4	Mahbubnagar	104	2	663.63	Andhra Pradesh
5	Nellore	234	10	4,328.05	Andhra Pradesh
6	Prakasam	109	6	2,466.04	Andhra Pradesh
7	South Goa	150	3	10,930.66	Goa
8	Jamnagar	182	6	5,428.87	Gujarat
9	Junagarh	118	2	2,764.65	Gujarat
10	Porbandar	302	4	3,847.78	Gujarat
11	Katni	126	9	1,794.50	Madhya Pradesh
12	Satna	154	6	5,145.51	Madhya Pradesh
13	Keonjhar	101	7	33,715.57	Orissa
14	Ajmer	122	11	4,859.17	Rajasthan
15	Bhilwara	114	9	5,535.60	Rajasthan
16	Udaipur	109	11	12,985.69	Rajasthan
Total		2,473		107,515.41	

ii) **MEDIUM MINERAL POTENTIAL DISTRICTS**

Mining leases granted between 50 to 100 are considered as medium potential districts. There are 1,468 mining leases granted in 20 districts covering an area of 87,921 hectares in the country. These constitute 21% of total number of mining leases and cover over 19% of total area. Information on the number of mining leases granted in medium potential districts is furnished in Table-6.

TABLE -6 : MEDIUM MINERAL POTENTIAL DISTRICTS

Sl. No.	District	No. of leases	No. of Minerals	Area of Leases (Hect.)	States
1	Nalgonda	52	3	4883.34	Andhra Pradesh
2	Rangareddi	56	7	1673.79	Andhra Pradesh
3	Vizianagaram	73	6	1,266.86	Andhra Pradesh
4	Durg	90	5	3,662.83	Chhattisgarh
5	North Goa	100	2	7,235.33	Goa
6	Kachchh	69	8	1,558.44	Gujarat
7	Sabarkantha	61	9	884.30	Gujarat
8	Surendranagar	78	4	460.32	Gujarat
9	Vadodara	99	5	1,282.42	Gujarat
10	Gurgaon	66	4	4,974.23	Haryana
11	Bagalkot	54	3	3,404.18	Karnataka
12	Bellary	82	6	5,723.78	Karnataka
13	Bolangir	69	5	1,860.42	Orissa
14	Sundergarh	90	10	14,736.86	Orissa
15	Bikaner	90	4	11,529.69	Rajasthan
16	Dungarpur	74	3	4,931.37	Rajasthan
17	Jaipur	78	13	6,218.06	Rajasthan
18	Rajsamand	84	7	6,141.92	Rajasthan
19	Sikar	50	9	4,100.24	Rajasthan
20	Salem	53	4	1,392.63	Tamil Nadu
Total		1,468		87,921.01	

ii) **LOW MINERAL POTENTIAL DISTRICTS**

Mining leases granted below 50 are considered as low mineral potential districts. There are 3,000 mining leases granted in 230 districts covering an area of 2,58,187 hectares in the country. These account for 43% of the leases, covering 57% of the total area. Statewise distribution of low potential districts and area covered is given in Table-7.

**TABLE -7 : LOW MINERAL POTENTIAL DISTRICTS
(BY STATE)**

Sl. No.	State	No. of Districts	No. of Lease	Lease Area (Hect)
1	Andhra Pradesh	13	352	23,425.36
2	Assam	2	11	981.33
3	Bihar	3	12	2,087.77
4	Chhattisgarh	13	179	26,789.79
5	Gujarat	11	166	7,406.03
6	Haryana	5	74	10,059.32
7	Himachal Pradesh	5	58	2,018.58
8	Jammu & Kashmir	8	18	729.58
9	Jharkhand	15	201	28,530.38
10	Karnataka	21	256	27,455.21
11	Kerala	8	101	2,205.49
12	Madhya Pradesh	27	404	11,483.59
13	Maharashtra	12	223	15,335.65
14	Manipur	2	2	610.17
15	Meghalaya	4	14	1,660.16
16	Orissa	17	179	26,875.47
17	Rajasthan	20	338	48,193.90
18	Sikkim	2	4	86.00
19	Tamil Nadu	25	275	4,074.68
20	Uttar Pradesh	6	40	5,120.63
21	Uttaranchal	5	42	1,485.36
22	West Bengal	6	51	11,572.76
Total		230	3,000	258,187.21

3.3 MINERALWISE ANALYSIS

The total number of naturally occurring minerals/metals for which the mining leases are granted in the country are 59 minerals. These minerals/metals are broadly classified into metallic and non-metallic minerals.

(i) METALLIC MINERALS

The metallic minerals include ferrous, non-ferrous and noble metals. The ferrous group includes iron ore, manganese ore, chromite and tungsten, where non-ferrous group consists of antimony ores, bauxite, copper, lead & zinc ore, molybdenum, nickel and vanadium. The noble metal group includes gold, silver and platinum group of metals. There are no commercial mining leases for silver and platinum group of metals at present in the country.

Metallic minerals for which mining leases are granted as on 31.3.2004 are 8 in number and the number of leases are 1,038 or 15% of the total mining leases with an area of 1,59,925 hectares (35% of the total mining lease area in the country). Out of the eight metallic minerals, the total number of mining leases granted for iron ore is placed at 474 followed by bauxite (266), manganese ore (225), chromite (29) and copper ore (17). These five minerals account for 1,011 mining leases (97% of the mining leases for metallic minerals) with an area of 1,44,897 hectares (91% of the lease area of metallic minerals). The distribution of mining leases for metallic minerals is given in Table-8.

TABLE-8 : DISTRIBUTION OF MINING LEASES FOR METALLIC MINERALS

Sl.No.	Mineral /Metal	No. of leases executed	Area in hectares
1	Bauxite	266	24,592.93
2.	Chromite	29	8,548.71
3.	Copper ore	17	10,589.86
4.	Gold	9	6,683.12
5.	Iron ore	474	79,041.71
6.	Lead & zinc ore	12	8,221.35
7.	Manganese ore	225	22,123.60
8.	Tin	6	123.80
	Total	1038	159,925.08

ii) **NON-METALLIC MINERALS**

There are 51 major non-metallic or industrial minerals for which leases are granted in the country. The number of mining leases granted for these minerals are placed at 5903 (85% of the total mining leases) with an area of 293,699 hectares (65% of the total lease area). Distribution of mining leases for non-metallic minerals is given in Table-9.

**TABLE-9 : DISTRIBUTION OF MINING LEASES FOR
NON-METALLIC MINERALS**

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
1	Agate	2	45.58
2	Amethyst	5	40.64
3	Apatite	1	13.29
4	Asbestos	39	1,846.89
5	Ball clay	41	2,146.19
6	Barytes	119	2,494.20
7	Calcareous sand	14	151.75
8	Calcite	57	1,593.63
9	Chalk	159	656.24
10	China clay	380	16,312.65
11	Clay (others)	43	937.95
12	Corundum	12	145.41
13	Diamond	2	576.51
14	Diaspore	17	185.98
15	Dolomite	423	15,600.52
16	Dunite	1	4.45
17	Epidote	1	5.00
18	Felsite	2	5.10
19	Felspar	166	5,076.57
20	Fire clay	220	16,401.86
21	Fluorite	18	1,807.41
22	Garnet	68	1,038.83
23	Graphite	132	4,657.94
24	Gypsum	52	18,036.24
25	Iolite	4	24.38
26	Jaspar	5	211.70
27	Kyanite	23	3,056.25
28	Laterite	114	1,129.33
29	Lime kankar	24	891.14
30	Limeshell	29	3,793.13
31	Limestone	1,411	106,260.41
32	Magnesite	27	2,297.14
33	Mica	243	7,807.76
34	Moulding sand	39	738.70
35	Ochre	102	3,382.79
36	Opal	1	200.00
37	Perlite	1	144.65

(contd.)

Table-9 (concl'd.)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
38	Phosphorite	16	3,492.77
39	Pyrite	1	647.50
40	Pyrophyllite	66	2,116.04
41	Quartz	845	12,780.42
42	Quartzite	53	624.60
43	Rock salt	3	53.86
44	Sand (others)	46	4,716.79
45	Shale	27	402.14
46	Silica sand	417	18,721.90
47	Sillimanite	5	9,945.84
48	Slate	17	868.47
49	Steatite	395	19,194.97
50	Vermiculite	11	212.55
51	Wollastonite	4	202.49
Total		5903	293,698.55

The mineralwise/statewise distribution of lease and lease area as on 31.3.2004 is given in Table 10.

**TABLE -10 : MINERALWISE/STATEWISE DISTRIBUTION OF
LEASES AND LEASE AREA (as on 31.03.2004)**

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
1	Agate	Gujarat	1	4.64
		Maharashtra	1	40.94
		Total	2	45.58
2	Amethyst	Andhra Pradesh	4	12.99
		Orissa	1	27.65
		Total	5	40.64
3	Apatite	Andhra Pradesh	1	13.29
		Total	1	13.29
4	Asbestos	Andhra Pradesh	7	352.08
		Orissa	1	49.22
		Rajasthan	31	1,445.59
		Total	39	1,846.89
5	Ball clay	Andhra Pradesh	20	254.01
		Gujarat	3	10.49
		Rajasthan	18	1,881.69
		Total	41	2,146.19
6	Barytes	Andhra Pradesh	109	2,190.76
		Haryana	1	79.32
		Himachal Pradesh	2	81.39
		Karnataka	1	17.00
		Madhya Pradesh	2	5.37
		Rajasthan	4	120.36
		Total	119	2,494.20
7	Bauxite	Chhattisgarh	12	5,640.85
		Goa	1	40.92
		Gujarat	149	4,040.71
		Jharkhand	39	3,625.18
		Karnataka	1	28.80
		Kerala	3	1.37
		Madhya Pradesh	35	795.09
		Maharashtra	20	4,182.46
		Orissa	4	6,079.09
		Tamil Nadu	2	158.46
		Total	266	24,592.93
8	Calcareous sand	Gujarat	14	151.75
		Total	14	151.75

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
9	Calcite	Andhra Pradesh	5	139.20
		Gujarat	5	63.31
		Haryana	2	158.56
		Karnataka	1	17.00
		Madhya Pradesh	24	63.26
		Rajasthan	20	1,152.30
		Total	57	1,593.63
10	Chalk	Gujarat	159	656.24
		Total	159	656.24
11	China clay	Andhra Pradesh	57	893.40
		Chhattisgarh	5	13.16
		Gujarat	45	1,204.07
		Haryana	39	3,243.30
		Jharkhand	8	219.48
		Karnataka	13	839.51
		Kerala	41	95.56
		Madhya Pradesh	16	130.89
		Maharashtra	9	91.77
		Meghalaya	2	9.77
		Orissa	11	797.28
		Rajasthan	105	8,153.24
		Tamil Nadu	2	15.55
West Bengal	27	605.67		
Total	380	16,312.65		
12	Chromite	Karnataka	6	987.47
		Maharashtra	1	16.22
		Manipur	2	610.17
		Orissa	20	6,934.85
		Total	29	8,548.71
13	Clay (others)	Andhra Pradesh	5	215.18
		Gujarat	35	701.21
		Karnataka	1	20.23
		Madhya Pradesh	2	1.33
		Total	43	937.95
14	Copper ore	Gujarat	1	1,402.00
		Jharkhand	3	6,417.69
		Karnataka	3	487.65
		Madhya Pradesh	2	479.90
		Rajasthan	5	1,717.95
		Sikkim	3	84.67
		Total	17	10,589.86

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
15	Corundum	Andhra Pradesh	6	35.93
		Karnataka	4	18.07
		Orissa	2	91.41
		Total	12	145.41
16	Diamond	Madhya Pradesh	2	576.51
		Total	2	576.51
17	Diaspore	Madhya Pradesh	11	80.11
		Uttar Pradesh	6	105.87
		Total	17	185.98
18	Dolomite	Andhra Pradesh	95	1,601.85
		Chhattisgarh	82	9,062.31
		Gujarat	98	1,225.04
		Haryana	2	252.15
		Jharkhand	1	18.45
		Karnataka	14	305.10
		Madhya Pradesh	99	483.42
		Maharashtra	11	185.08
		Orissa	8	877.21
		Rajasthan	8	579.28
		Sikkim	1	1.33
		Tamil Nadu	1	62.07
		Uttaranchal	1	20.23
		West Bengal	2	927.00
Total	423	15,600.52		
19	Dunite	Karnataka	1	4.45
	Total	1	4.45	
20	Epidote	Rajasthan	1	5.00
		Total	1	5.00
21	Felsite	Karnataka	2	5.10
		Total	2	5.10
22	Felspar	Andhra Pradesh	34	529.68
		Gujarat	1	1.00
		Haryana	3	285.06
		Jharkhand	6	200.25
		Karnataka	4	131.91
		Maharashtra	2	53.65
		Rajasthan	114	3,833.32
		Tamil Nadu	1	39.47
		West Bengal	1	2.23
Total	166	5,076.57		

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
23	Fire clay	Andhra Pradesh	24	82.31
		Chhattisgarh	4	16.24
		Gujarat	72	374.70
		Jharkhand	20	730.86
		Karnataka	3	390.51
		Madhya Pradesh	32	291.23
		Maharashtra	2	18.40
		Meghalaya	1	221.44
		Orissa	17	1,899.59
		Rajasthan	25	2,383.60
		Tamil Nadu	11	52.17
		West Bengal	9	9,940.81
		Total	220	16,401.86
		24	Fluorite	Gujarat
Maharashtra	1			32.70
Rajasthan	15			1,743.02
Total	18			1,807.41
25	Garnet	Andhra Pradesh	13	220.00
		Rajasthan	14	340.99
		Tamil Nadu	41	477.84
		Total	68	1,038.83
26	Gold	Andhra Pradesh	3	408.86
		Karnataka	6	6,274.26
		Total	9	6,683.12
27	Graphite	Andhra Pradesh	4	81.51
		Chhattisgarh	3	98.79
		Jharkhand	13	405.44
		Karnataka	4	235.04
		Orissa	101	3,161.99
		Rajasthan	2	383.55
		Tamil Nadu	5	291.62
		Total	132	4,657.94
28	Gypsum	Gujarat	2	6.76
		Himachal Pradesh	1	116.68
		Jammu & Kashmir	3	57.71
		Rajasthan	40	17,465.37
		Tamil Nadu	4	203.57
		Uttaranchal	2	186.15
		Total	52	18,036.24
29	Iolite	Orissa	4	24.38
		Total	4	24.38

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
30	Iron ore	Andhra Pradesh	25	1,511.15
		Chhattisgarh	15	10,699.49
		Goa	187	14,002.79
		Haryana	1	80.20
		Jharkhand	25	9,675.37
		Karnataka	72	10,446.58
		Madhya Pradesh	8	122.84
		Maharashtra	25	870.12
		Orissa	102	30,732.88
		Rajasthan	14	894.29
		Total	474	79,041.71
31	Jasper	Rajasthan	5	211.70
		Total	5	211.70
32	Kyanite	Jharkhand	5	2,560.22
		Karnataka	5	200.70
		Maharashtra	13	295.33
		Total	23	3,056.25
33	Laterite	Andhra Pradesh	78	642.44
		Karnataka	2	95.21
		Kerala	1	0.19
		Madhya Pradesh	31	348.46
		Maharashtra	2	43.03
		Total	114	1,129.33
34	Lead & zinc ore	Andhra Pradesh	1	200.00
		Madhya Pradesh	1	11.00
		Orissa	2	504.86
		Rajasthan	8	7,505.49
		Total	12	8,221.35
35	Lime kankar	Andhra Pradesh	19	137.65
		Haryana	4	705.35
		Orissa	1	48.14
		Total	24	891.14
36	Limeshell	Andhra Pradesh	5	163.38
		Karnataka	14	1,404.01
		Kerala	8	1,496.69
		Tamil Nadu	2	729.05
		Total	29	3,793.13

(contd.)

Sl. No.	Mineral	No. of Lease	State	No. of Lease	Lease Area (Hect.)
37	Limestone		Andhra Pradesh	201	21,484.88
			Assam	11	981.33
			Bihar	7	182.17
			Chhattisgarh	110	4,588.83
			Gujarat	368	12,427.28
			Haryana	11	592.51
			Himachal Pradesh	52	1,766.65
			Jammu & Kashmir	12	331.07
			Jharkhand	16	1,673.81
			Karnataka	88	8,380.27
			Kerala	1	245.69
			Madhya Pradesh	264	12,259.05
			Maharashtra	51	5,976.70
			Meghalaya	10	1,424.05
			Orissa	34	8,798.36
			Rajasthan	52	20,408.73
			Tamil Nadu	115	1,926.77
			Uttar Pradesh	4	2,706.15
			Uttaranchal	3	105.44
			West Bengal	1	0.67
	Total		1,411	106,260.41	
38	Magnesite		Andhra Pradesh	1	6.57
			Jammu & Kashmir	2	140.80
			Karnataka	7	406.47
			Orissa	1	40.46
			Rajasthan	3	15.00
			Tamil Nadu	11	1,195.64
			Uttaranchal	2	492.20
			Total	27	2,297.14
39	Manganese ore		Andhra Pradesh	42	1,124.83
			Goa	62	4,122.28
			Gujarat	1	2.95
			Karnataka	26	2,719.58
			Madhya Pradesh	27	1,446.91
			Maharashtra	32	1,094.64
			Orissa	34	11,532.41
			Rajasthan	1	80.00
			Total	225	22,123.60
			40	Mica	
Bihar	2	1,196.80			
Haryana	1	400.00			
Jharkhand	29	964.39			
Maharashtra	1	42.06			
Orissa	1	2.67			
Rajasthan	98	3,062.03			
Total	243	7,807.76			

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
41	Moulding sand	Andhra Pradesh	1	31.16
		Chhattisgarh	7	64.70
		Gujarat	4	6.83
		Karnataka	24	586.99
		Maharashtra	1	47.02
		West Bengal	2	2.00
		Total	39	738.70
42	Ochre	Andhra Pradesh	18	189.81
		Chhattisgarh	1	10.12
		Gujarat	5	45.35
		Jharkhand	1	5.62
		Karnataka	5	617.18
		Madhya Pradesh	44	572.10
		Maharashtra	1	12.36
		Orissa	2	197.77
		Rajasthan	24	1,726.72
		West Bengal	1	5.76
		Total	102	3,382.79
43	Opal	Jammu & Kashmir	1	200.00
		Total	1	200.00
44	Perlite	Gujarat	1	144.65
		Total	1	144.65
45	Phosphorite	Andhra Pradesh	1	2.83
		Madhya Pradesh	4	112.88
		Rajasthan	7	2,251.88
		Uttar Pradesh	1	874.00
		Uttaranchal	2	222.05
		West Bengal	1	29.13
		Total	15	3,490.57
56	Pyrite	Bihar	1	647.50
		Total	1	647.50
47	Pyrophyllite	Andhra Pradesh	6	169.74
		Jharkhand	1	22.50
		Madhya Pradesh	36	245.00
		Orissa	10	576.96
		Rajasthan	6	308.16
		Uttar Pradesh	7	793.68
		Total	66	2,116.04

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
48	Quartz	Andhra Pradesh	407	5,306.28
		Bihar	2	61.30
		Chhattisgarh	6	18.05
		Gujarat	31	209.26
		Haryana	16	851.85
		Jharkhand	18	236.36
		Karnataka	47	454.38
		Kerala	2	3.21
		Madhya Pradesh	6	44.07
		Maharashtra	8	139.86
		Orissa	59	1,236.21
		Rajasthan	116	3,971.07
		Tamil Nadu	122	237.82
		West Bengal	5	10.70
	Total	845	12,780.42	
49	Quartzite	Andhra Pradesh	15	169.86
		Chhattisgarh	16	166.00
		Gujarat	1	19.30
		Haryana	4	68.23
		Karnataka	1	4.05
		Madhya Pradesh	1	6.10
		Maharashtra	1	12.09
		Orissa	12	169.27
		Rajasthan	1	5.00
		West Bengal	1	4.70
			Total	53
50	Rock salt	Himachal Pradesh	3	53.86
		Total	3	53.86
51	Sand (others)	Andhra Pradesh	12	1,722.10
		Jharkhand	13	1,765.35
		Madhya Pradesh	2	7.52
		Maharashtra	12	740.30
		Orissa	6	437.43
		West Bengal	1	44.09
		Total	46	4,716.79
52	Shale	Andhra Pradesh	10	177.40
		Madhya Pradesh	14	173.36
		Maharashtra	1	41.48
		Meghalaya	1	4.90
		Rajasthan	1	5.00
		Total	27	402.14

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
53	Silica sand	Andhra Pradesh	71	1,070.85
		Gujarat	69	856.50
		Haryana	52	7,959.30
		Karnataka	30	1,345.01
		Kerala	42	35.43
		Madhya Pradesh	4	6.25
		Maharashtra	28	1,399.44
		Rajasthan	92	5,391.18
		Tamil Nadu	7	17.01
		Uttar Pradesh	22	640.93
		Total	417	18,721.90
54	Silimanite	Andhra Pradesh	1	7,000.00
		Kerala	3	327.35
		Orissa	1	2,618.49
		Total	5	9,945.84
55	Slate	Andhra Pradesh	12	461.26
		Haryana	4	351.72
		Madhya Pradesh	1	55.49
		Total	17	868.47
56	Steatite	Andhra Pradesh	98	918.43
		Chhattisgarh	4	7.89
		Gujarat	6	22.04
		Jharkhand	3	9.41
		Karnataka	6	134.34
		Madhya Pradesh	16	105.46
		Orissa	3	292.13
		Rajasthan	224	17,209.42
		Tamil Nadu	3	36.56
		Uttaranchal	32	459.29
		Total	395	19,194.97
57	Tin	Chhattisgarh	4	66.19
		Orissa	2	57.61
		Total	6	123.80
58	Vermiculite	Andhra Pradesh	6	95.28
		Gujarat	2	25.04
		Karnataka	1	26.30
		Rajasthan	1	42.22
		Tamil Nadu	1	23.71
		Total	11	212.55
59	Wollastonite	Rajasthan	4	202.49
		Total	4	202.49

3.4 FREQUENCY DISTRIBUTION OF MINING LEASES

The number of mining leases so far granted for various minerals are classified into eight categories :

- Category – I** : Includes minerals for which number of mining leases granted is between 1,001-2000;
- Category – II** : Includes minerals for which number of mining leases granted are between 501 and 1,000;
- Category – III** : Includes minerals for which number of mining leases granted are between 401 and 500;
- Category – IV** : Includes minerals for which number of mining leases granted are between 301 and 400;
- Category – V** : Includes minerals for which number of mining leases granted is between 201 and 300;
- Category – VI** : Includes minerals for which number of mining leases granted are between 101 and 200;
- Category – VII** : Includes minerals for which number of mining leases granted are between 51 and 100 and
- Category – VIII** : Includes minerals for which number of mining leases granted are between 1 and 50.

Frequency distribution of mining leases by minerals are furnished in Table-10.

Number of minerals, their mining leases and area of leases covered category-wise are summarised as below :

Category	No. of Mineral	No. of mining leases		Lease area in hect.	
		No. of leases	Percentage	Lease area	Percentage
I	1	1,411	20.32	1,06,260.41	23.42
II	1	845	12.17	12,780.42	2.82
III	3	1,314	18.93	1,13,364.13	24.99
IV	2	775	11.17	35,507.62	7.83
V	4	954	13.75	70,926.15	15.64
VI	6	792	11.41	17,397.07	3.84
VII	5	296	4.26	23,409.34	5.16
VIII	38	554	7.98	73,978.49	16.31
Total	59	6,941	100.00	4,53,623.63	100.00

TABLE-11 : FREQUENCY DISTRIBUTION OF MINING LEASES

Category	No. of Lease Granted	Mineral	No. of Mining Lease Granted	Lease Area in Hectares
I	>1000	Limestone	1,411	106,260.41
		Total	1,411	106,260.41
II	Between 501 to 1,000	Quartz	845	12780.42
		Total	845	12780.42
III	Between 401 to 500	Dolomite	423	15,600.52
		Iron ore	474	79,041.71
		Silica sand	417	18,721.90
		Total	1,314	113,364.13
IV	Between 301 to 400	China clay	380	16,312.65
		Steatite	395	19,194.97
		Total	775	35,507.62
V	Between 201 to 300	Bauxite	266	24592.93
		Fire clay	220	16401.86
		Manganese ore	225	22123.6
		Mica	243	7807.76
		Total	954	70,926.15
VI	Between 101 to 200	Barytes	119	2,494.20
		Chalk	159	656.24
		Felspar	166	5,076.57
		Graphite	132	4,657.94
		Laterite	114	1,129.33
		Ochre	102	3,382.79
		Total	792	17,397.07
VII	Between 51 to 100	Calcite	57	1,593.63
		Garnet	68	1,038.83
		Gypsum	52	18,036.24
		Pyrophyllite	66	2,116.04
		Quartzite	53	624.60
		Total	296	23,409.34
VIII	Between 50 to 1	Agate	2	45.58
		Amethyst	5	40.64
		Apatite	1	13.29
		Asbestos	39	1,846.89
		Ball clay	41	2,146.19

(contd.)

Category	No. of Lease Granted	Mineral	No. of Mining Lease Granted	Lease Area in Hectares
VIII	Between 50 to 1 (contd.)	Limestone	1,411	106,260.41
		Calcareous sand	14	151.75
		Chromite	29	8,548.71
		Clay (others)	43	937.95
		Copper ore	17	10,589.86
		Corundum	12	145.41
		Diamond	2	576.51
		Diaspore	17	185.98
		Dunite	1	4.45
		Epidote	1	5.00
		Felsite	2	5.10
		Fluorite	18	1,807.41
		Gold	9	6,683.12
		Iolite	4	24.38
		Jasper	5	211.70
		Kyanite	23	3,056.25
		Lead & zinc ore	12	8,221.35
		Lime kankar	24	891.14
		Limeshell	29	3,793.13
		Magnesite	27	2,297.14
		Moulding sand	39	738.70
		Opal	1	200.00
		Perlite	1	144.65
		Phosphorite	16	3,492.77
		Pyrite	1	647.50
		Rock salt	3	53.86
		Sand (others)	46	4,716.79
		Shale	27	402.14
		Sillimanite	5	9,945.84
		Slate	17	868.47
		Tin	6	123.80
		Vermiculite	11	212.55
		Wollastonite	4	202.49
		Total	554	73,978.49

3.5 MUSEUM DISTRICTS OF MINERALS

The concentration of both number and wide variety of minerals is confined to as many as 67 districts covering 12 States which have more than 4 varieties of minerals. Cuddapah, Anantapur, Kurnool, Khamam districts of Andhra Pradesh, Jaipur, Ajmer and Udaipur districts of Rajasthan are considered as museum districts of minerals.

3.6 SECTORWISE DISTRIBUTION OF MINING LEASES

Mining leases are in force both in the private and public sectors including Central and State Govt. Undertakings. Out of the total 6,941 mining leases in the country, 502 (7.23%) leases are granted in the Public Sector extending over an area of 1,64,412.56 hectares and the remaining mining leases with an area of 2,89,211.07 hectares are in the private sector. Most of the metallic minerals namely bauxite, chromite, copper ore, lead & zinc ores, gold, iron ore & manganese ore and non-metallic minerals like limestone, dolomite, pyrite, apatite, barytes, fluorite, asbestos, kyanite, magnesite, etc. are being exploited by both public and private sectors.

i) CENTRAL GOVERNMENT PUBLIC SECTOR UNDERTAKINGS

There are 205 number of mining leases granted in 18 States for different minerals, covering an area of 83,865.02 hectares. The States rich in minerals where maximum number of mining leases granted for Central Public Sector Undertakings are Maharashtra (15.20%) followed by Andhra Pradesh (14.70%), Madhya Pradesh (12.74%), Rajasthan (11.27%), Chhattisgarh (9.80%), Jharkhand & Orissa (8.82% each) and Tamil Nadu (5.88%). These eight States together account for over 87% of total leases executed and remaining States account for 13%.

The maximum mining lease area covered by different States are Jharkhand (19.34%) followed by Chhattisgarh (16.38%), Orissa (15.33%), Rajasthan (13.86%), Karnataka (13.72%), Andhra Pradesh (7.84%) and Madhya Pradesh (6.42%). These seven States account for 93% of total lease area granted and remaining States account for 7%.

ii) STATE GOVERNMENT PUBLIC SECTOR UNDERTAKINGS

There are 297 number of mining leases granted in 19 States for different minerals, covering an area of 80,547.54 hectares. The States rich in minerals where maximum number of mining leases granted are Karnataka (18.52%) followed by Rajasthan (17.50%), Orissa & Tamil Nadu (15.82%) each, Maharashtra (5.38%), Andhra Pradesh (4.71%), Haryana (4.38%) and Gujarat (3.70%). These eight States together account for 86% of total leases granted and remaining States account for remaining 14% of mining leases of State Public Sector.

The maximum mining lease area covered by different States are Orissa (35.18%) followed by Rajasthan (32.18%), Karnataka (10.05%), Uttar Pradesh (5.40%), Gujarat (4.49%), Tamil Nadu (3.21%) and Haryana (2.41%). These seven States account for 93% of total lease area executed and remaining States account for remaining 7%.

Statewise and Sectorwise distribution of mining leases is given in Tables-12 to 14.

TABLE-12 : SECTORWISE DISTRIBUTION OF MINING LEASES
(as on 31/03/2004)
(Public Sector and Private Sector)

Sl. No	State	Total		Public Sector		Private Sector	
		No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
1.	Andhra Pradesh	1,528	51,756.76	44	7,719.58	1,484	44,037.18
2.	Assam	11	981.33	2	338.00	9	643.33
3.	Bihar	12	2,087.77	1	647.50	11	1,440.27
4.	Chhattisgarh	269	30,452.62	27	14,392.80	242	16,059.82
5.	Goa	250	18,165.99	--	--	250	18,165.99
6.	Gujarat	1,075	23,632.81	11	3,614.69	1,064	20,018.12
7.	Haryana	140	15,033.55	17	2,645.88	123	12,387.67
8.	Himachal Pradesh	58	2,018.58	5	547.76	53	1,470.82
9.	Jammu & Kashmir	18	729.58	3	240.80	15	488.78
10.	Jharkhand	201	28,530.38	23	16,537.39	178	11,992.99
11.	Karnataka	392	36,583.17	62	19,597.28	330	16,985.89
12.	Kerala	101	2,205.49	5	577.26	96	1,628.23
13.	Madhya Pradesh	684	18,423.60	32	5,498.28	652	12,925.32
14.	Maharashtra	223	15,335.65	47	2,216.29	176	13,119.36
15.	Manipur	2	610.17	--	--	2	610.17
16.	Meghalaya	14	1,660.16	4	1,000.07	10	660.09
17.	Orissa	439	77,188.32	65	41,184.15	374	36,004.17
18.	Rajasthan	1,059	104,495.64	75	37,540.48	984	66,955.16
19.	Sikkim	4	86.00	3	84.67	1	1.33
20.	Tamil Nadu	328	5,467.31	59	3,605.87	269	1,861.44
21.	Uttar Pradesh	40	5,120.63	9	4,387.93	31	732.70
22.	Uttaranchal	42	1,485.36	5	811.25	37	674.11
23.	West Bengal	51	11,572.76	3	1,224.63	48	10,348.13
Total		6,941	453,623.63	502	164,412.56	6,439	289,211.07

TABLE-13 : DISTRIBUTION OF MINING LEASES IN PUBLIC SECTOR
(as on 31/03/2004)
(Central Govt and State Govt.)

Sl. No	State	Public Sector (Total)		Central Govt.		State Govt.	
		No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
1.	Andhra Pradesh	44	7,719.58	30	6,569.20	14	1,150.38
2.	Assam	2	338.00	1	171.00	1	167.00
3.	Bihar	1	647.50	1	647.50	--	--
4.	Chhattisgarh	27	14,392.80	20	13,730.70	7	662.10
5.	Gujarat	11	3,614.69	--	--	11	3,614.69
6.	Haryana	17	2,645.88	4	705.35	13	1,940.53
7.	Himachal Pradesh	5	547.76	5	547.76	--	--
8.	Jammu & Kashmir	3	240.80	1	140.80	2	100.00
9.	Jharkhand	23	16,537.39	18	16,211.98	5	325.41
10.	Karnataka	62	19,597.28	7	11,505.40	55	8,091.88
11.	Kerala	5	577.26	2	169.71	3	407.55
12.	Madhya Pradesh	32	5,498.28	26	5,377.88	6	120.40
13.	Maharashtra	47	2,216.29	31	1,503.96	16	712.33
14.	Meghalaya	4	1,000.07	--	--	4	1,000.07
15.	Orissa	65	41,184.15	18	12,847.88	47	28,336.27
16.	Rajasthan	75	37,540.48	23	11,619.43	52	25,921.05
17.	Sikkim	3	84.67	--	--	3	84.67
18.	Tamil Nadu	59	3,605.87	12	1,020.14	47	2,585.73
19.	Uttar Pradesh	9	4,387.93	1	33.58	8	4,354.35
20.	Uttaranchal	5	811.25	4	714.25	1	97.00
21.	West Bengal	3	1,224.63	1	348.50	2	876.13
Total		502	164,412.56	205	83,865.02	297	80,547.54

TABLE-14 : SECTORWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)
(By State/District/Mineral)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Andhra Pradesh	Adilabad	Limestone	1	839.41	1	809.38	2	1,648.79
	Anantapur	Gold	1	168.42	-	-	1	168.42
	Chittoor	Gold	2	240.44	-	-	2	240.44
	Cuddapah	Barytes	-	-	4	161.73	4	161.73
	Godavari (West)	China clay	-	-	2	24.39	2	24.39
	Guntur	Lead & zinc	1	200.00	-	-	1	200.00
	Karimnagar	Sand (others)	5	1,602.00	-	-	5	1,602.00
	Khammam	Dolomite	1	384.61	-	-	1	384.61
		Sand (others)	3	15.88	-	-	3	15.88
	Krishna	Limestone	1	1,295.00	-	-	1	1,295.00
	Mahbubnagar	Felspar	1	17.82	-	-	1	17.82
	Prakasam	Iron ore	1	266.33	-	-	1	266.33
	Rangareddi	Laterite	1	41.41	-	-	1	41.41
		Limestone	2	868.74	-	-	2	868.74
	Srikakulam	Shale	1	133.07	-	-	1	133.07
		Silica sand	1	7.50	-	-	1	7.50
	Visakhapatnam	Apatite	-	-	1	13.29	1	13.29
		Mica	-	-	2	48.68	2	48.68
		Phosphorite	-	-	1	2.83	1	2.83
		Quartz	1	3.24	-	-	1	3.24
	Vizianagaram	Manganese ore	5	389.50	3	90.08	8	479.58
		Moulding sand	1	31.16	-	-	1	31.16
		Sand (others)	1	64.67	-	-	1	64.67
	Total	30	6,569.20	14	1,150.38	44	7,719.58	
Assam	Karbi Anglong	Limestone	1	171.00	-	-	1	171.00
	North Cachar Hills	Limestone	-	-	1	167.00	1	167.00
		Total	1	171.00	1	167	2	338.00
Bihar	Rohtas	Pyrite	1	647.50	-	-	1	647.50
		Total	1	647.50	-	-	1	647.50
Chhattisgarh	Bilaspur	Dolomite	2	1562.12	-	-	2	1,562.12
	Dantewara	Iron ore	6	6886.9	-	-	6	6,886.90
		Tin	-	-	3	58.45	0	58.45
	Durg	Dolomite	-	-	1	22.15	1	22.15
		Iron ore	4	2,732.62	-	-	4	2,732.62
		Limestone	3	198.03	-	-	3	198.03
		Moulding sand	1	24.98	-	-	1	24.98
	Janjgir-Champa	Dolomite	1	122.70	-	-	1	122.70
	Kanker	Iron ore	1	938.06	-	-	1	938.06
	Kawardha	Bauxite	1	626.12	-	-	1	626.12
Surguja	Bauxite	1	639.17	3	581.50	4	1,220.67	
	Total	20	13,730.70	7	662.10	27	14,392.80	

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Gujarat	Banaskantha	Copper ore	-	-	1	1,402.00	1	1,402.00
	Jamnagar	Bauxite	-	-	2	189.79	2	189.79
	Kachchh	Bauxite	-	-	6	486.95	6	486.95
	Surat	Limestone	-	-	1	1504.75	1	1,504.75
	Vadodara	Fluorite	-	-	1	31.20	1	31.20
		Total			11	3,614.69	11	3,614.69
Haryana	Bhiwani	Lime kankar	5	705.35	-	-	5	705.35
	Faridabad	China clay	-	-	1	70.00	1	70.00
		Silica sand	-	-	4	1283.09	4	1,283.09
		Silica sand	-	-	3	239.76	3	239.76
	Gurgaon	Felspar	-	-	1	23.61	1	23.61
		Iron ore	-	-	1	86.20	1	86.20
		Limestone	-	-	1	9.85	1	9.85
	Rewari	Slate	-	-	2	228.02	2	228.02
		Total		4	705.35	13	1940.53	18
	Himachal Pradesh	Mandi	Rock salt	3	53.86	-	-	3
Sirmur		Limestone	1	255.70	-	-	1	255.70
Solan		Limestone	1	238.2	-	-	1	238.20
		Total	5	547.76	-	-	5	547.76
Jammu & Kashmir	Pulwama	Limestone	-	-	1	100.00	1	100.00
	Udhampur	Magnesite	1	140.80	1	N.A.	2	140.80
		Total	1	140.80	2	100	3	240.80
Jharkhand	Garwah	Limestone	3	1,178.92	-	-	3	1,178.92
	Palamau	Graphite	-	-	1	15.18	1	15.18
	Ranchi	Limestone	-	-	2	239.63	2	239.63
	Singhbhum (East)	Copper ore	3	6,417.69	-	-	3	6,417.69
		Kyanite	-	-	1	2.43	1	2.43
	Singhbhum (West)	Iron ore	11	6867.12	-	-	11	6,867.12
		Kyanite	1	1,748.25	1	68.17	2	1,816.42
	Total	18	16,211.98	5	325.41	23	16,537.39	
Karnataka	Bagalkot	Dolomite	-	-	2	253.29	2	253.29
		Limestone	-	-	10	2,550.36	10	2,550.36
	Bangalore	Felsper	-	-	3	130.30	3	130.30
		Limestone	-	-	2	351.12	2	351.12
	Bellary	Iron ore	2	1,255.50	8	782.30	10	2,037.80
	Chickmagalur	Iron ore	1	4,605.00	-	-	1	4,605.00
	Chitradurga	Copper ore	-	-	2	416.83	2	416.83
		Limestone	-	-	1	111.30	1	111.30
	Gulbarga	Gold	-	-	1	55.75	1	55.75
		Limestone	3	429.51	-	-	3	429.51
	Hassan	China clay	-	-	2	311.60	2	311.60
		Chromite	-	-	6	987.47	6	987.47
		Copper ore	-	-	1	70.82	1	70.82
		Quartz	-	-	2	18.20	2	18.20
		Steatite	-	-	1	80.94	1	80.94
		Vermiculite	-	-	1	26.30	1	26.30

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Karnataka (contd.)	Kolar	Gold	1	5,215.39	-	-	1	5,215.39
	Mandya	Quartz	-	-	1	15.17	1	15.17
	Mysore	Magnesite	-	-	3	338.12	3	338.12
	Raichur	Gold	-	-	3	965.08	3	965.08
	Shimoga	China clay	-	-	3	33.99	3	33.99
		Manganese ore	-	-	1	526.10	1	526.10
	Tumkur	Gold	-	-	1	38.04	1	38.04
	Udupi	Bauxite	-	-	1	28.80	1	28.80
		Total		7	11,505.40	55	8,091.88	62
Kerala	Kollam	China clay	-	-	1	4.22	1	4.22
		Sillimanite	2	169.71	1	157.64	3	327.35
	Palakkad	Limestone	-	-	1	245.69	1	245.69
		Total	2	169.71	3	407.55	5	577.26
Madhya Pradesh	Balaghat	Copper ore	2	479.90	-	-	2	479.90
		Manganese ore	11	1,172.27	-	-	11	1,172.27
		Sand (others)	1	5.50	-	-	1	5.50
	Chhattarpur	Phosphorite	-	-	1	48.76	1	48.76
		Jabalpur	Limestone	1	89.32	-	-	1
	Jhabua	Phosphorite	-	-	2	11.32	2	11.32
	Katni	Fireclay	2	38.27	-	-	2	38.27
		Limestone	3	1,109.09	-	-	3	1,109.09
	Mandla	Dolomite	-	-	1	2.52	1	2.52
	Nimach	Limestone	2	500.45	-	-	2	500.45
	Panna	Diamond	2	576.51	-	-	2	576.51
	Sagar	Phosphorite	-	-	1	52.80	1	52.80
	Satna	Limestone	2	1,406.57	0	0	2	1,406.57
	Tikamgarh	Pyrophyllite	-	-	1	5.00	1	5.00
		Total	26	5,377.88	6	120.40	32	5,498.28
	Maharashtra	Bhandara	Kyanite	-	-	9	251.48	9
Manganese ore			6	375.97	-	-	6	375.97
Sand (others)			1	40.11	-	-	1	40.11
Chandrapur		Fluorite	-	-	1	32.70	1	32.70
		Sand (others)	5	461.08	-	-	5	461.08
Gondia		Iron ore	-	-	1	43.82	1	43.82
		Nagpur	Dolomite	-	-	1	42.52	1
Sindhudurg		Manganese ore	14	390.92	-	-	14	390.92
		Sand (others)	4	191.88	-	-	4	191.88
		Felspar	-	-	1	29.27	1	29.27
Yeotmal		Silica sand	-	-	2	105.07	2	105.07
		Limestone	-	-	1	207.47	1	207.47
		Sand (others)	1	44.00	-	-	1	44.00
	Total	31	1,503.96	16	712.33	47	2,216.29	
Meghalaya	Garo Hills West	Fire clay	-	-	1	221.44	1	221.44
		Limestone	-	-	1	384.00	1	384.00
	Khasi Hills East	Limestone	-	-	2	394.63	2	394.63
		Total	-	-	4	1,000.07	4	1,000.07

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Orissa	Bargarh	Limestone	-	-	2	806.53	2	806.53
	Dhenkanal	Chromite	-	-	2	847.48	2	847.48
	Ganjam	Sillimanite	1	2,618.49	-	-	1	2,618.49
	Jajpur	Chromite	-	-	5	2,865.85	5	2,865.85
		Iron ore	-	-	1	1,812.99	1	1,812.99
	Kalahandi	Amethyst	-	-	1	27.65	1	27.65
		Corundum	-	-	1	57.46	1	57.46
	Keonjhar	Chromite	-	-	3	1,933.64	3	1,933.64
		Iron ore	4	4,162.91	12	7,384.06	16	11,546.97
		Manganese ore	-	-	7	4,511.54	7	4,511.54
	Koraput	Bauxite	2	4,647.28	-	-	2	4,647.28
		Graphite	-	-	1	501.67	1	501.67
		Limestone	-	-	2	1,586.22	2	1,586.22
		Manganese ore	-	-	1	501.67	1	501.67
	Malkangiri	Limestone	-	-	1	1,694.13	1	1,694.13
	Nawapara	Corundum	-	-	1	33.95	1	33.95
		Limestone	-	-	3	343.00	3	343.00
	Rayagada	Bauxite	-	-	1	1,388.74	1	1,388.74
	Sundergarh	Dolomite	2	384.03	-	-	2	384.03
		Iron ore	6	487.64	3	2,039.69	9	2,527.33
		Lead & zinc ores	1	499.60	-	-	1	499.60
		Quartz	2	47.93	-	-	2	47.93
		Total	18	12,847.88	47	28,336.27	65	41,184.15
Rajasthan	Ajmer	Lead & zinc ores	1	480.45	-	-	1	480.45
	Alwar	Copper ore	1	914.07	-	-	1	914.07
	Banswara	Graphite	-	-	2	383.55	2	383.55
	Barmer	Gypsum	2	1,100.66	2	389.85	4	1,490.51
	Bhilwara	Lead & zinc ores	1	1,200.00	-	-	1	1,200.00
	Bikaner	Gypsum	3	367.02	9	3,454.84	12	3,821.86
	Dungarpur	Fluorite	-	-	4	292.30	4	292.30
	Ganganagar	Gypsum	4	346.50	4	1,129.39	8	1,475.89
	Hanumangarh	Gypsum	-	-	5	7084.65	5	7,084.65
	Jaisalmer	Gypsum	1	501.68	2	366.21	3	867.89
		Limestone	-	-	2	1,998.00	2	1,998.00
	Jalore	Fluorite	-	-	4	1,075.00	4	1,075.00
		Gypsum	-	-	1	178.50	1	178.50
	Jhunjhunu	Copper ore	4	803.88	-	-	4	803.88
	Nagaur	Gypsum	-	-	5	2,401.07	5	2,401.07
		Limestone	-	-	3	4,915.44	3	4,915.44
	Rajsamand	Lead & zinc ores	4	2,142.04	-	-	4	2,142.04
	Sirohi	Lead & zinc ores	-	-	1	63.00	1	63.00
	Udaipur	Barytes	-	-	1	31.00	1	31.00
		Calcite	-	-	1	49.50	1	49.50
		Lead & zinc ores	1	3,620.00	-	-	1	3,620.00
		Phosphorite	1	143.13	6	2,108.75	7	2,251.88
		Total	23	11,619.43	52	25,921.05	75	37,540.48

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total		
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	
Sikkim	Sikkim East	Copper ore	-	-	3	84.67	3	84.67	
		Total	-	-	3	84.67	3	84.67	
Tamil Nadu	Ariyalur	Limestone	-	-	4	374.06	4	374.06	
	Chengai-Anna	Quartz	-	-	1	6.58	1	6.58	
	Cuddalore	Fireclay	-	-	2	42.05	2	42.05	
	Dindigul	Quartz	-	-	2	1.47	2	1.47	
	Erode	Quartz	-	-	6	24.96	6	24.96	
	Kanchipuram	Limeshell	-	-	1	190.00	1	190.00	
		Silica sand	-	-	1	4.63	1	4.63	
	Kanyakumari	Garnet	5	258.31	-	-	5	258.31	
	Karur	Quartz	-	-	7	19.30	7	19.30	
	Namakkal	Quartz	-	-	3	7.92	3	7.92	
	Perambalur	Limestone	-	-	1	110.68	1	110.68	
	Periyar	Quartz	-	-	2	3.59	2	3.59	
	Ramnathapuram	Limeshell	-	-	1	539.05	1	539.05	
	Salem	Magnesite	7	761.83	3	431.24	10	1,193.07	
		Quartz	-	-	2	0.97	2	0.97	
	Sivaganga	Graphite	-	-	2	242.46	2	242.46	
	Tiruchirapalli	China clay	-	-	1	12.30	1	12.30	
		Dolomite	-	-	1	62.07	1	62.07	
		Limestone	-	-	1	9.95	1	9.95	
	Tirunelveli	Garnet	-	-	1	4.36	1	4.36	
		Limestone	-	-	2	27.80	2	27.80	
	Vellore	Vermiculite	-	-	1	23.71	1	23.71	
	Virudhunagar	Limestone	-	-	2	446.58	2	446.58	
		Total	12	1,020.14	47	2,585.73	59	3,605.87	
	Uttar Pradesh	Allahabad	Silica sand	1	33.58	-	-	1	33.58
		Lalitpur	Phosphorite	-	-	1	874.00	1	874.00
Pyrophyllite			-	-	3	774.20	3	774.20	
Sonbhadra		Limestone	-	-	4	2,706.15	4	2,706.15	
		Total	1	33.58	8	4,354.35	9	4,387.93	
Uttaranchal	Bageshwar	Magnesite	1	53.20	-	-	1	53.20	
	Dehradun	Limestone	-	-	1	97.00	1	97.00	
		Phosphorite	2	222.05	-	-	2	222.05	
	Pithoragarh	Magnesite	1	439.00	-	-	1	439.00	
		Total	4	714.25	1	97.00	5	811.25	
West Bengal	Burdwan	Fireclay	1	348.50	-	-	1	348.50	
	Jalpaiguri	Dolomite	-	-	1	847.00	1	847.00	
	Purulia	Phosphorite	-	-	1	29.13	1	29.13	
		Total	1	348.50	2	876.13	3	1,224.63	

3.7 YEARWISE STATUS OF EXPIRY OF MINING LEASES

Every mining lease is granted for a stipulated period and once this period expires the lessees shall have to apply for renewal to the respective State Governments as per the provisions under MCR, 1960. The period of leases varies from minimum 20 years to a maximum of 30 years. Further, renewal (s) are possible for period or periods not exceeding 20 years in each case. Out of the total number of leases in the Directory (6,941) more than 1,110 (10%) leases will expire between 2005 to 2009. The yearwise and Statewise break up of the position of expiry of lease are given in Tables -15 and 16.

TABLE - 15 : YEARWISE STATUS OF EXPIRY OF MINING LEASES

Year	No. of leases	Percentage	Lease Area (Hect.)	Percentage
2005	368	2.70	24279.95	2.58
2006	337	2.47	21109.09	2.25
2007	213	1.56	14519.99	1.55
2008	115	0.84	7223.93	0.77
2009	77	0.56	5722.14	0.66
2010	110	0.81	12314.98	1.31
2011	111	0.81	8084.71	0.86

**TABLE -16 : STATEWISE AND YEARWISE STATUS OF EXPIRY OF MINING LEASES
(BY STATE)**

Sl. No.	State	2005		2006		2007		2008		2009		2010		2011	
		No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)
1	Andhra Pradesh	52	2,055.35	30	1,805.64	15	1,831.30	7	244.73	11	164.33	15	601.98	12	125.61
2	Assam	-	-	6	150.83	1	35	-	-	-	-	1	40.00	-	-
3	Bihar	2	61.30	2	232.43	-	-	-	-	-	-	-	-	-	-
4	Chhattisgarh	11	981.11	11	641.28	10	3,343.42	-	-	2	22.43	1	6.47	-	-
5	Goa	1	40.92	-	-	6	406.82	1	9.49	-	-	-	-	-	-
6	Gujarat	55	724.65	74	741.17	48	716.72	25	379.96	10	115.74	8	27.67	19	60.72
7	Haryana	3	559.80	2	665.01	2	759.22	-	-	-	-	1	50.50	-	-
8	Himachal Pradesh	9	84.29	3	8.8	4	44.42	-	-	1	0.37	1	27.83	2	241.16
9	Jammu & Kashmir	-	-	-	-	-	-	-	-	1	140.80	2	43.56	-	-
10	Jharkhand	24	2,843.69	27	2,121.15	3	144.90	7	222.87	8	2,297.80	16	430.45	3	2,542.24
11	Karnataka	28	1,754.27	12	472.25	11	704.26	5	883.99	4	80.83	8	200.43	7	315.13
12	Kerala	6	241.03	5	6.72	7	11.42	4	5.93	2	8.07	1	0.27	2	3.37
13	Madhya Pradesh	71	2,033.78	48	538.04	27	254.02	4	20.16	3	94.57	14	98.00	13	123.30
14	Maharashtra	7	158.97	11	444.65	13	273.59	3	112.27	8	402.48	6	111.66	5	197.17
15	Meghalaya	-	-	1	86.00	1	221.44	1	11.08	-	-	1	384.00	-	-
16	Orissa	42	7,996.50	44	5,609.03	27	1,397.73	21	1,324.49	14	1787.31	19	3,570.02	20	862.95
17	Rajasthan	41	3,643.62	41	7,227.29	22	3,550.85	24	3,475.79	10	566.31	14	6,698.89	27	3,611.24
18	Tamil Nadu	7	453.78	9	197.72	12	681.12	13	533.17	3	41.1	1	7.06	1	1.82
19	Uttaranchal	3	165.4	-	-	2	89.43	-	-	-	-	-	-	-	-
20	Uttar Pradesh	2	450.15	4	78.25	-	-	-	-	-	-	-	-	-	-
21	West Bengal	4	31.34	7	82.83	2	54.33	-	-	-	-	1	16.19	-	-
	Total	368	24,279.95	337	21,109.09	213	14,519.99	115	7,223.93	77	5,722.14	110	12,314.98	111	8,084.71

4. PROSPECTING LICENCES

Under the Mines & Minerals (Development & Regulation) Act, 1957, "Prospecting Licence" (PL) means a licence granted for the purpose of undertaking "prospecting operations" with a view to exploring/locating or proving mineral deposits on surface/subsurface area. The State Governments and the Union Territories are empowered to grant/renew/voke prospecting licences (PL) under the provisions of Mineral Concession Rules, 1960.

The area restrictions for prospecting licences have been substantially liberalized by making such restrictions applicable statewide instead of the country as a whole.

4.1 STATEWISE DISTRIBUTION OF PROSPECTING LICENCES

As per information received from the State Governments/Union Territories, 133 prospecting licences were executed covering 13,250 hectares during 2003-04 as compared with 255 prospecting licences covering 35,385 hectares during 2002-03. The Statewise distribution of prospecting licences executed during 2002-03 and 2003-04 is given in Table-17. These prospecting licences, however, exclude reconnaissance permits executed for aerial prospecting.

TABLE - 17 : STATEWISE DISTRIBUTION OF PROSPECTING LICENCES EXECUTED, 2002-03 AND 2003-04

States	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Andhra Pradesh	12	1,285	10	1,628
Chhattisgarh	14	2 37	6	574
Haryana	-	-	11	806
Himachal Pradesh	-	-	1	21
Kerala	1	++	1	65
Madhya Pradesh	1	2	11	195
Maharashtra	8	537	26	842
Meghalaya	-	-	1	473
Orissa	13	427	2	78
Rajasthan	201	32,864	60	7,769
Uttaranchal	3	5	4	799
Uttar Pradesh	1	24	-	-
West Bengal	1	4	-	-
Total	255	35385	133	13250

Area figures rounded off.

The mineral rich States where prospecting licences so far executed during 2003-04 were Rajasthan (60), Maharashtra (26), Haryana and Madhya Pradesh (11 each), Andhra Pradesh (10), Chhattisgarh (6), Uttaranchal (4), Orissa (2), and Himachal Pradesh, Kerala and Meghalaya (one each). Rajasthan alone accounted for 45% licences while remaining ten States shared 55 per cent. Areawise, Rajasthan covered 59% while the remaining States accounted for 41 per cent.

4.2 MINERALWISE DISTRIBUTION OF PROSPECTING LICENCES

Mineralwise in 2003-04, limestone accounted for maximum twelve prospecting licences executed followed by calcite (7), quartz (6), soapstone/steatite (5), dolomite (4), ochre (3), diamond, iron ore and manganese ore (2 each), amethyst quartz, barytes, bauxite, corundum, felspar, fluorite, gold & associated minerals, jasper, laterite, limeshell, moulding sand, pyrophyllite, semi-precious stones, silica sand, tin and white clay (one each). Other associated minerals accounted for 74 licences (56%) executed during 2003-04. The mineralwise distribution of prospecting licences executed during 2002-03 and 2003-04 is given in Table-18. The prospecting licences are executed for individual mineral or group of associated minerals, depending upon their nature of occurrences, such as iron and manganese ores; mica, felspar and quartz; copper, lead and zinc ores; dolomite and limestone and vice versa.

TABLE - 18 : MINERALWISE DISTRIBUTION OF PROSPECTING LICENCES EXECUTED, 2002-03 AND 2003-04

Mineral	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Amethyst quartz	-	-	1	1
Barytes	3	53	1	4
Bauxite	1	++	1	151
Calcite	11	1,526	7	828
China clay	2	428	-	-
Corundum	-	-	1	6
Diamond	-	-	2	225
Dolomite	4	13	4	32
Felspar	-	-	1	2
Fireclay	1	4	-	-
Fluorite	-	-	1	265
Garnet	1	113	-	-
Gold & associated minerals	1	4,310	1	793
Graphite	3	62	-	-
Gypsum	2	725	-	-
Iron ore	2	86	2	526
Jasper	3	685	1	20
Laterite	-	-	1	5
Limestone	9	1,087	12	1,938
Limeshell	-	-	1	65
Manganese ore	2	197	2	22
Moulding sand	-	-	1	11
Ochre	3	212	3	13
Pyrophyllite	1	59	1	138
Pyroxenite	3	74	-	-
Quartz	4	189	6	33
Quartzite	3	9	-	-
Semi-precious stones	-	-	1	4
Shale	1	2	-	-
Silica sand	2	72	1	50
Soapstone/steatite	10	1,123	5	329
Tin ore	-	-	1	24
White clay	-	-	1	7
Associated minerals	183	24,356	74	7,758
Total	255	35,385	133	13,250

Area figures rounded off.

4.3 AREAWISE DISTRIBUTION OF PROSPECTING LICENCES

Areawise analysis indicated that limestone occupied the first place, covering an area of 1,938 ha. followed by calcite (828 ha.), gold & associated minerals (793 ha.), iron ore (526 ha.), soapstone/steatite (329 ha.), fluorite (265 ha.), diamond (225 ha.), bauxite (151 ha.) and pyrophyllite (138 ha.). These minerals together accounted for 39% area while other minerals like amethyst quartz, barytes, corundum, dolomite, felspar, jasper, manganese ore, limeshell, ochre, quartz, semi-precious stones, silica sand, tin ore, white clay, moulding sand and laterite covered less than 100 hectares. Other associated minerals occupied 7,758 ha. or 59% area under prospecting licences.

4.4 SECTORWISE DISTRIBUTION OF PROSPECTING LICENCES

Out of the 133 prospecting licences executed in 2003-04, public sector accounted for 5 licences or 3.75% compared with 3 licences or 1.18% of the total in previous year. The remaining 128 prospecting licences or 96.25 % were executed in private sector compared with 252 licences or 98.82% in the previous year. The sectorwise distribution of prospecting licences during 2002-03 to 2003-04 is given in Table-19.

TABLE-19 : DISTRIBUTION OF PROSPECTING LICENCES IN PUBLIC AND PRIVATE SECTORS

Sector	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Total	255	35,385	133	13,250
Public	3	5,035	5	417
Private	252	30,350	128	12,833
Public%	1.18	14.23	3.75	3.14
Private%	98.82	85.77	96.25	96.86

5. RECONNAISSANCE PERMITS

The provision of Reconnaissance Permits (RP) was introduced with effect from 20.12.1999 under the Mines & Minerals (Development & Regulation) Act, 1957 and from 18.1.2000 under the Mineral Concession Rules, 1960 and Mineral Conservation and Development Rules, 1988 made under the Act. RP is a permit granted for the purpose of undertaking "reconnaissance operations" which means any operation undertaken for preliminary prospecting of a mineral through regional, aerial, geophysical or geochemical surveys and geological mapping, but it does not include pitting, trenching, drilling (except drilling boreholes on a grid specified from time to time by the Central Government) or subsurface excavation.

Approvals have been granted by the Central Government to 23 reconnaissance permits covering 31,456 sq. km. in 2003-04 distributed in Andhra Pradesh, Chhattisgarh, Karnataka, Madhya Pradesh, Orissa and West Bengal for precious and high-value minerals like diamond, precious minerals, gold, silver, platinum group of metals & associated minerals; non-ferrous minerals like copper, lead & zinc ores; strategic minerals/ores like nickel, tungsten, arsenic, antimony, bismuth, cobalt, molybdenum & associated minerals and non-metallic minerals like ilmenite and garnet etc..

During 2003-04, approvals for grant of reconnaissance permits have been accorded to eight companies; viz., ACC-RIO TINTO Exploration Ltd., Anglo American Exploration (India) Pvt. Ltd., BHP Khanij Anveshan Pvt. Ltd., BHP Minerals (India) Pvt. Ltd., De Beers India Prospecting Pvt. Ltd., Geomysore Services (India) Pvt. Ltd., Metmin Finance & Holdings Pvt. Ltd., and WSIL Mineral Sand India Pvt. Ltd.,

5.1 MINERALWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

During 2003-04, four companies were granted 18 reconnaissance permits for diamond and associated minerals covering an area of 25,864 sq. km (82%) compared with 11 reconnaissance permits covering an area of 17,427 sq. km (35%) in the previous year. One reconnaissance permit has been granted for ilmenite, garnet etc. covering an area of 1,428 sq. kms (5%) against none in the previous year, 4 reconnaissance permits have been granted for copper, lead, zinc, gold, nickel and associated minerals covering an area of 4164 sq. km. (13%), and 7 reconnaissance permits with 11,634 sq. km. (23%) in the previous year. The mineralwise reconnaissance permits granted/executed during 2002-03 and 2003-04 are given in Table-20.

**TABLE-20: MINERALWISE DISTRIBUTION PERMITS,
2002-03 AND 2003-04**

Mineral	2002-03		2003-04	
	No.	Area (sq.km.)	No.	Area (sq. km.)
Copper, lead, zinc, gold, silver, bismuth, cadmium, nickel and associated minerals	7	11,634	4	4164
Diamond	1	2,010	-	-
Diamond and associated minerals	10	15,417	6	6,196
Dolomite and associated minerals	1	1,975	-	-
Gold	2	1,980	-	-
Gold and associated minerals	10	17,268	-	-
Diamond, Precious Stones & other associated minerals	-	-	12	19,668
Ilmenite, Garnet, etc.	-	-	1	1,428
Total	31	50,284	23	31,456

5.2 STATEWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

During 2003-04, twenty three reconnaissance permits were approved/granted/executed covering about 31,456 sq. km. in Andhra Pradesh, Chhattisgarh, Karnataka, Madhya Pradesh, Orissa and West Bengal for high-value minerals like gold, silver, copper, lead-zinc, nickel, cadmium, bismuth, diamond, precious stones and associated minerals & industrial minerals such as ilmenite and garnet. Chhattisgarh was leading in the number of RPs accounting for 7 RPs covering an area of about 11,693 sq. km. (37%) followed by 6 RPs in Andhra Pradesh 8,593 sq. km. (27%), 5 RPs in Madhya Pradesh 6,240 sq. kms (20%) and 3 RPs in Orissa covering 2,423 sq. km. (8%). These States together accounted for about 91% RPs covering 92% area. Karnataka and West Bengal States shared the remaining. The Statewise distribution of reconnaissance permits, 2002-03 and 2003-04 is given in Table-21.

**TABLE-21: STATEWISE DISTRIBUTION OF RECONNAISSANCE PERMITS,
2002-03 AND 2003-04**

State	2002-03		2003-04	
	No.	Area (sq. km.)	No.	Area (sq. km.)
Andhra Pradesh	4	8,725	6	8,593
Chhattisgarh	8	10,626	7	11,693
Jharkhand	1	1,870	-	-
Karnataka	8	11,626	1	2,130
Madhya Pradesh	8	16,623	5	6,240
Rajasthan	2	814	-	-
Orissa	-	-	3	2,423
West Bengal	-	-	1	377
Total	31	50,284	23	31,456

5.3 AREAWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

Areawise, M/s BHP Khanij Anveshan Pvt. Ltd. held maximum area of about 11,776 sq. km., under 7 RPs followed by M/s ACC-RIO TINTO Exploration Ltd. 8,525 sq. km. under 7 RPs, M/s BHP Minerals (India) Pvt. Ltd. 5,892 sq. km. under 3 RPs, M/s De Beers India Prospecting Pvt. Ltd., 1,643 sq. kms. under 2 RPs, M/s WSIL Mineral Sand India Pvt. Ltd. 1,428 sq. km. under 1 RP and M/s Metmin Finance Holdings Pvt. Ltd. 1,330 sq. km. under 1 RP. These six companies shared about 97% area and the remaining two companies covered less than 1,000 sq. km. each or about 3% area. The companywise distribution of RPs during 2002-03 and 2003-04 are given in Table-22 and details of reconnaissance permits granted/executed during 2003-04 are furnished in Table-23.

TABLE – 22: AREAWISE/COMPANYWISE DISTRIBUTION OF RECONNAISSANCE PERMITS DURING 2002-03 AND 2003-04

Sl. No.	Company	2002-03		2003-04	
		No.	Area (sq. km.)	No.	Area (sq. km.)
1.	ACC-RIO TINTO Exploration Ltd., RCD Campus, Lal Bahadur Shastri Marg, Thane-400 064.	3	7,650	7	8,525
2.	Anglo American Exploration (India) Pvt. Ltd., 21, South Ex-Plaza-I, 389, Masjid Moth, South Ext-II, New Delhi-110 049.	4	8,499	1	377
3.	BHP Khanij Anveshan Pvt. Ltd., 7/F, World Trade Tower, Barakhamba Lane, New Delhi-110 001.	-	-	7	11,776
4.	BHP Minerals (India) Pvt. Ltd., 7/F, World Trade Tower, Barakhamba Lane, New Delhi-110 001.	1	2,293	3	5,892
5.	De Beers India Prospecting Pvt. Ltd., Advanced Business Centre, 83, Maker Chambers VI, Nariman Point, Mumbai-400 021.	4	6,629	2	1,643
6.	Emperor Granite Pvt. Ltd. Bhopal	1	1,000	-	-
7.	Geomysore Services (India) Pvt. Ltd., 120/45, 3rd Block, 6th Cross, 6th 'A' Main, Thyagaraja Nagar, Bangalore-560 028.	9	8,989	1	485

(contd.)

Table-22 (concl.)

Sl. No.	Company	2002-03		2003-04	
		No.	Area (sq. km.)	No.	Area (sq. km.)
8.	Hindustan Zinc Ltd., Yashad Bhavan, Yashadgarh, Udaipur-313 001.	1	361	-	-
9.	Hutti Gold Mines Co. Ltd., 6/13, Gurappa Avenue, Prime Rose Road Cross, Bangalore-560 005.	1	4,103	-	-
10.	Indophil Resources Exploration Services India Pvt. Ltd., 114, 5th Cross, 3rd Main Road, Girinagar, Bangalore-560 085.	2	4,995	-	-
11.	Metmin Finance & Holdings Pvt. Ltd., 161/162, Mittal Court, 'A' Wing, Nariman Point, Mumbai-400 021.	-	-	1	1330
12.	Minpro Corporation, 201, Gulmohor, Chitnavis Marg, Opp. Hislop College, Nagpur-440 001.	1	110	-	-
13.	Mira Exploration Pvt. Ltd., D-11/2251 Basant Kunj, New Delhi-110 020	1	481	-	-
14.	National Mineral Development Corporation Ltd., 10-3-311/A, Castle Hills, Masab Tank, Hyderabad-500 028.	2	3,304	-	-
15.	Phelps Dodge Explortion India Pvt. Ltd B-1, Defence Colony, New Delhi- 110 024.	1	1,870	-	-
16.	WSIL Mineral Sand India Pvt. Ltd., D-19, Press Enclave, Saket, New Delhi-110 024.	-	-	1	1428
Total		31	50,284	23	31,456

TABLE-23 : RECONNAISSANCE PERMITS APPROVED BY THE MINISTRY OF MINES AND GRANTED/EXECUTED BY VARIOUS STATE GOVERNMENTS, 2003-04

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
1	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Karnataka	Gulbarga and Raichur	Diamond and associated minerals	2130.00	i) 30.07.2003	-	3
2	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Madhya Pradesh	Chhatarpur and Panna	Gold, copper, lead, zinc, silver, bismuth and cadmium	1971.69	i) 30.06.2003	13.10.2003	3
3	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Chhattisgarh	Raigarh, Jashpur and Surguja	Diamond, gold and associated minerals	1000.00	i) 30.06.2003	19.12.2003	3
4	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Chhattisgarh	Raigarh and Jashpur	Diamond, gold and associated minerals	1000.00	i) 30.06.2003	19.12.2003	3
5	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh, Bolangir and Navapara	Diamond and associated minerals	798.00	i) 30.07.2003	-	3
6	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh and Navapara	Diamond and associated minerals	1360.00	i) 28.08.2003	-	3

(contd.)

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					

7	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh and Bolangir	Diamond and associated minerals	265.00	i) 28.08.2003	-	3
8	Anglo American Exploration (India) Pvt. Ltd., South Ex-Plaza, 389, Masjid Moth, South Ext-II New Delhi-110 049.	West Bengal	Medinapur and Purulia	Copper, nickel, and associated minerals	377.00	i) 30.07.2003	11.10.2003	?
9	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar and Rangareddy	Diamond, precious stone, iron, copper, lead, zinc, gold and associated minerals	1984.00	i) 30.05.2003 ii) 04.07.2003	17.10.2003	3
10	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar	Diamond, precious stone, iron, copper, lead, zinc, gold and associated minerals	1846.00	i) 30.05.2003 ii) 04.07.2003	13.10.2003	3
11	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Madhya Pradesh	Chhatapur and Tikamgarh	Diamond, precious stone, copper, lead, zinc, nickel, gold and associated minerals	863.64	i) 02.06.2003 ii) 05.06.2003	01.07.2003	3
12	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar	Diamond, gold and associated minerals	1700.00	i) 30.06.2003	-	3

(contd.)

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
13	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar	Diamond, gold and associated minerals	1500.00	i) 30.06.2003	-	3
14	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar, Durg and Kanker	Diamond, gold, iron and other associated minerals	1800.00	i) 30.07.2003	-	3
15	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Dantewara	Diamond, gold, iron and other associated minerals	2083.00	i) 30.07.2003	-	3
16	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Anantapur	Diamond, precious stone, nickel, copper, lead, zinc, gold and associated minerals	1070.00	i) 30.05.2003 ii) 17.06.2003	13.08.2003	3
17	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar and Rangareddy	Diamond, precious stone, nickel, copper, lead, zinc, gold and associated minerals	2212.00	i) 30.05.2003 ii) 04.07.2003	13.08.2003	3
18	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Dantewara	Diamond, gold, iron and other associated minerals	2610.00	i) 30.07.2003	-	3

(contd.)

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1. INTRODUCTION

India has a total geographical area of about 328 million hectares. Of this, the mining lease area, except for fuel and atomic minerals, constitutes around 0.14% (4,53,624 hectares). The position of mining leases as on 31.3.2004 reveals that there are as many as 6,941 mining leases (compared to 9,131 in the previous year) granted in the country by the State Governments covering 59 minerals (excluding coal, lignite, petroleum, natural gas, atomic minerals and minor minerals) with a total area of 4,53,624 hectares and spread over 23 states. These 59 minerals are broadly classified into metallic and non-metallic minerals. This bulletin highlights statewise, sectorwise and districtwise distribution of mining leases, prospecting licences and reconnaissance permits etc. Though apparently negligible, this is still an important land use segment as it contributes to the economic growth of the country. Besides, it calls for environmental protection as land degradation takes place during the process of mining activities.

India is gifted with a wide variety of naturally occurring minerals. These are being exploited to cater the needs of domestic mineral based industries as well as exports to earn foreign exchange. Today, as many as 64 major Metallic and Non-metallic minerals are being exploited in the country excluding coal, atomic and some minor minerals.

The Indian mineral sector is fully opened to private sector both domestic and foreign. The Government had taken a series of new policy initiatives under the overall framework of the National Mineral Policy, 1993 for the growth of mineral sector. As per the amendment to the MMRD Act (now re-designated as MMDR Act), 1957 in December, 1999 a new entity termed 'Reconnaissance Permit' covering essentially prospecting licences over large areas has been introduced. In this amended Act, the limit of maximum areas of reconnaissance permits, prospecting licences and mining leases is 10,000 sq.kms., 25 sq.km and 10 sq.km respectively in a state. This provision may facilitate the entrepreneurs in acquiring more number of "reconnaissance permits, prospecting licences and mining leases" leading to increased mineral production. Besides, the amended Act provides powers to the State Governments for grant of prospecting licences and mining leases in areas which are not compact and contiguous in respect of minerals other than fuel and atomic minerals.

Under Rule 57 (1) of MCR, 1960, a copy of every reconnaissance permit, (no provision for renewal of reconnaissance permits), prospecting licence and mining lease granted or renewed shall be supplied by each State Government within two months of such grant or renewal, to the Controller General, Indian Bureau of Mines. Besides, under Rule 57 (2) of MCR, 1960 all the State Governments / Union Territories are required to submit to the Controller General, Indian Bureau of Mines, a consolidated annual return of reconnaissance permits/prospecting licences/mining leases granted or executed in proforma 'A', prospecting licences/mining leases renewed in proforma 'B', and termination of mining leases and reasons for termination in proforma 'C', for the preceding financial year ending March. The above statements for the previous financial year are required to be submitted to IBM on or before 30th June each year by the State Government. From such information received from all the State Governments under statutory provisions, the information pertaining to mining leases and prospecting licences has been processed and updated through computerization. Subsequently, the required outputs have been generated.

2. LAND USE SCENARIO

India's Geographical area is about 3,28,726 thousand hectares. The entire geographical area is broadly classified into 8 segments including mining lease areas as follows:

Sl. No.	Area/Segment	Total area in thousand hectares	Percentage of area
1.	Agricultural, Cultivable & Culturable Lands	182,845	55.63
2.	Permanent pastures & Other grazing Land	10,499	3.19
3.	Culturable Waste (Potentially Arable)	13,483	4.10
4.	Forest	69,467	21.13
5.	Barren & Un-culturable land	17,762	5.40
6.	Non-agricultural land	24,274	7.38
7.	Mining Lease area*	452	0.14
8.	Other area (No information available)	9,942	3.03
Total		328726	100.00

Source : Directorate of Economics & Statistics, Ministry of Agriculture.

**Directory of Mining Leases, 2004, Indian Bureau of Mines.*

Out of the total geographical area, almost two thirds are under agricultural, cultivable, permanent pastures and grazing lands.

The mining lease area, constitutes around 0.14% (4,53,624 hectares) of the total geographical area of India. However, mining lease area continues to be an important segment and contributing factor to the economy of the country. At the same time, due attention is to be paid for environmental protection as land degradation takes place during the process of mining activities.

TABLE-2 : MINERALWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
1	Agate	2	45.58
2	Amethyst	5	40.64
3	Apatite	1	13.29
4	Asbestos	39	1,846.89
5	Ball clay	41	2,146.19
6	Barytes	119	2,494.20
7	Bauxite	266	24,592.93
8	Calcareous sand	14	151.75
9	Calcite	57	1,593.63
10	Chalk	159	656.24
11	China clay	380	16,312.65
12	Chromite	29	8,548.71
13	Clay (others)	43	937.95
14	Copper ore	17	10,589.86
15	Corundum	12	145.41
16	Diamond	2	576.51
17	Diaspore	17	185.98
18	Dolomite	423	15,600.52
19	Dunite	1	4.45
20	Epidote	1	5.00
21	Felsite	2	5.10
22	Felspar	166	5,076.57
23	Fire clay	220	16,401.86
24	Fluorite	18	1,807.41
25	Garnet	68	1,038.83
26	Gold	9	6,683.12
27	Graphite	132	4,657.94
28	Gypsum	52	18,036.24
29	Iolite	4	24.38
30	Iron ore	474	79,041.71
31	Jaspar	5	211.70
32	Kyanite	23	3,056.25
33	Laterite	114	1,129.33
34	Lead & zinc ore	12	8,221.35
35	Lime kankar	24	891.14
36	Limeshell	29	3,793.13
37	Limestone	1,411	106,260.41
38	Magnesite	27	2,297.14
39	Manganese ore	225	22,123.60
40	Mica	243	7,807.76
41	Moulding sand	39	738.70
42	Ochre	102	3,382.79
43	Opal	1	200.00
44	Perlite	1	144.65

(contd.)

3. MINING LEASES

3.1 STATEWISE ANALYSIS

As on 31.3.2004, there are 6,941 number of mining leases granted by 23 State Governments for 59 different minerals, covering an area of 4,53,624 hectares in the country. States rich in minerals where maximum number of mining leases granted are Andhra Pradesh (22.01%) followed by Gujarat (15.49%), Rajasthan (15.26%), Madhya Pradesh (9.85%), Orissa (6.32%), Karnataka (5.65%), Tamil Nadu (4.73%), Chhattisgarh (3.88%), Goa (3.60%) and Maharashtra (3.21 %). These ten states together account for about 90% of total leases executed and remaining thirteen states account for remaining about 10% of mining leases.

The maximum mining lease area covered by different states are Rajasthan (23.04 %) followed by Orissa (17.02%), Andhra Pradesh (11.41%), Karnataka (8.06%), Chhattisgarh (6.71%), Jharkhand (6.29%), Gujarat (5.21%), Madhya Pradesh (4.06%), Goa (4.00%) and Maharashtra (3.38%). These ten states account for about 89.18% of total lease areas executed and remaining thirteen states represent 10.82%.

The statewise mining lease distribution together with lease areas as well as statewise/districtwise distribution of mining leases as on 31.03.2004 are given in Tables-1 to 4.

TABLE-1 : STATEWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)

Sl. No.	State	No. of Lease	Percentage	Lease Area (Hect.)	Percentage
1	Andhra Pradesh	1,528	22.01	51,756.76	11.41
2	Assam	11	0.16	981.33	0.22
3	Bihar	12	0.17	2,087.77	0.46
4	Chhattisgarh	269	3.87	30,452.62	6.71
5	Goa	250	3.60	18,165.99	4.00
6	Gujarat	1,075	15.49	23,632.81	5.21
7	Haryana	140	2.02	15,033.55	3.31
8	Himachal Pradesh	58	0.84	2,018.58	0.44
9	Jammu & Kashmir	18	0.26	729.58	0.16
10	Jharkhand	201	2.90	28,530.38	6.29
11	Karnataka	392	5.65	36,583.17	8.06
12	Kerala	101	1.46	2,205.49	0.49
13	Madhya Pradesh	684	9.85	18,423.60	4.06
14	Maharashtra	223	3.21	15,335.65	3.38
15	Manipur	2	0.03	610.17	0.13
16	Meghalaya	14	0.20	1,660.16	0.37
17	Orissa	439	6.32	77,188.32	17.02
18	Rajasthan	1,059	15.26	104,495.64	23.04
19	Sikkim	4	0.06	86.00	0.02
20	Tamil Nadu	328	4.72	5,467.31	1.21
21	Uttar Pradesh	40	0.58	5,120.63	1.13
22	Uttaranchal	42	0.61	1,485.36	0.33
23	West Bengal	51	0.73	11,572.76	2.55
Total		6,941	100.00	453,623.63	100.00

Table-2 (concl.)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
45	Phosphorite	16	3,492.77
46	Pyrite	1	647.50
47	Pyrophyllite	66	2,116.04
48	Quartz	845	12,780.42
49	Quartzite	53	624.60
50	Rock salt	3	53.86
51	Sand (others)	46	4,716.79
52	Shale	27	402.14
53	Silica sand	417	18,721.90
54	Sillimanite	5	9,945.84
55	Slate	17	868.47
56	Steatite	395	19,194.97
57	Tin	6	123.80
58	Vermiculite	11	212.55
59	Wollastonite	4	202.49
	Total	6,941	453,623.63

**TABLE-3 : STATEWISE/MINERALWISE DISTRIBUTION OF
LEASES AND LEASE AREA
(as on 31.03.2004)**

State	Mineral	No. of Leases	Lease area (Hect.)
Andhra Pradesh	Amethyst	4	12.99
	Apatite	1	13.29
	Asbestos	7	352.08
	Ball clay	20	254.01
	Barytes	109	2,190.76
	Calcite	5	139.20
	China clay	57	893.40
	Clay (others)	5	215.18
	Corundum	6	35.93
	Dolomite	95	1,601.85
	Felspar	34	529.68
	Fire clay	24	82.31
	Garnet	13	220.00
	Gold	3	408.86
	Graphite	4	81.51
	Iron ore	25	1,511.15
	Laterite	78	642.44
	Lead & zinc ore	1	200.00
	Lime kankar	19	137.65
	Limeshell	5	163.38
	Limestone	201	21,484.88
	Magnesite	1	6.57
	Manganese ore	42	1,124.83
	Mica	111	2,139.81
	Moulding sand	1	31.36
	Ochre	18	189.81
	Phosphorite	1	2.83
	Pyrophyllite	6	169.74
	Quartz	407	5,306.28
	Quartzite	15	169.86
	Sand (others)	12	1,722.10
	Shale	10	177.40
Silica sand	71	1,070.85	
Sillimanite	1	7,000.00	
Slate	12	461.26	
Steatite	98	918.43	
Vermiculite	6	95.28	
Total	1,528	51,756.96	
Assam	Limestone	11	981.33
	Total	11	981.33

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Bihar	Limestone	7	182.17
	Mica	2	1,196.80
	Pyrite	1	647.50
	Quartz	2	61.30
	Total	12	2,087.77
Chhattisgarh	Bauxite	12	5,640.85
	China clay	5	13.16
	Dolomite	82	9,062.31
	Fire clay	4	16.24
	Graphite	3	98.79
	Iron ore	15	10,699.49
	Limestone	110	4,588.83
	Moulding sand	7	64.70
	Ochre	1	10.12
	Quartz	6	18.05
	Quartzite	16	166.00
	Steatite	4	7.89
	Tin	4	66.19
	Total	269	30,452.62
Goa	Bauxite	1	40.92
	Iron ore	187	14,002.79
	Manganese ore	62	4,122.28
	Total	250	18,165.99
Gujarat	Agate	1	4.64
	Ball clay	3	10.49
	Bauxite	149	4,040.71
	Calcareous sand	14	151.75
	Calcite	5	63.31
	Chalk	159	656.24
	China clay	45	1,204.07
	Clay (others)	35	701.21
	Copper ore	1	1,402.00
	Dolomite	98	1,225.04
	Felspar	1	1.00
	Fire clay	72	374.70
	Fluorite	2	31.69
	Gypsum	2	6.76
	Limestone	368	12,427.28
	Manganese ore	1	2.95
	Moulding sand	4	6.83
	Ochre	5	45.35
	Perlite	1	144.65
	Quartz	31	209.26

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Gujarat (contd.)	Quartzite	1	19.30
	Silica sand	69	856.50
	Steatite	6	22.04
	Vermiculite	2	25.04
	Total	1,075	23,632.81
Haryana	Barytes	1	79.32
	Calcite	2	158.56
	China clay	39	3,243.30
	Dolomite	2	252.15
	Felspar	3	285.06
	Iron ore	1	86.20
	Lime kankar	4	705.35
	Limestone	11	592.51
	Mica	1	400.00
	Quartz	16	851.85
	Quartzite	4	68.23
	Silica sand	52	7,959.30
	Slate	4	351.72
Total	140	15,033.55	
Himachal Pradesh	Barytes	2	81.39
	Gypsum	1	116.68
	Limestone	52	1766.65
	Rock Salt	3	53.86
	Total	58	2018.58
Jammu & Kashmir	Gypsum	3	57.71
	Limestone	12	331.07
	Magnesite	2	140.80
	Opal	1	200.00
	Total	18	729.58
Jharkhand	Bauxite	39	3,625.18
	China clay	8	219.48
	Copper ore	3	6,417.69
	Dolomite	1	18.45
	Felspar	6	200.25
	Fire clay	20	730.86
	Graphite	13	405.44
	Iron ore	25	9,675.37
	Kyanite	5	2,560.22
	Limestone	16	1,673.81
	Mica	29	964.39
	Ochre	1	5.62
	Pyrophyllite	1	22.50
	Quartz	18	236.36
	Sand (others)	13	1,765.35
	Steatite	3	9.41
Total	201	28,530.38	

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Karnataka	Barytes	1	17.00
	Bauxite	1	28.80
	Calcite	1	17.00
	China clay	13	839.51
	Chromite	6	987.47
	Clay (others)	1	20.23
	Copper ore	3	487.65
	Corundum	4	18.07
	Dolomite	14	305.10
	Dunite	1	4.45
	Felsite	2	5.10
	Felspar	4	131.91
	Fire clay	3	390.51
	Gold	6	6,274.26
	Graphite	4	235.04
	Iron ore	72	10,446.58
	Kyanite	5	200.70
	Laterite	2	95.21
	Limeshell	14	1,404.01
	Limestone	88	8,380.27
	Magnesite	7	406.47
	Manganese ore	26	2,719.58
	Moulding sand	24	586.99
	Ochre	5	617.18
	Quartz	47	454.38
	Quartzite	1	4.05
	Silica sand	30	1,345.01
Steatite	6	134.34	
Vermiculite	1	26.30	
Total	392	36,583.17	
Kerala	Bauxite	3	1.37
	China clay	41	95.56
	Laterite	1	0.19
	Limeshell	8	1,496.69
	Limestone	1	245.69
	Quartz	2	3.21
	Silica sand	42	35.43
	Sillimanite	3	327.35
	Total	101	2,205.49
Madhya Pradesh	Barytes	2	5.37
	Bauxite	35	795.09
	Calcite	24	63.26
	China clay	16	130.89

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
	Clay (others)	2	1.33
	Copper ore	2	479.90
	Diamond	2	576.51
	Diaspore	11	80.11
	Dolomite	99	483.42
	Fire clay	32	291.23
	Iron ore	8	122.84
	Laterite	31	348.46
	Lead & zinc ore	1	11.00
	Limestone	264	12,259.05
	Manganese ore	27	1,446.91
	Ochre	44	572.10
	Phosphorite	4	112.88
	Pyrophyllite	36	245.00
	Quartz	6	44.07
	Quartzite	1	6.10
	Sand (others)	2	7.52
	Shale	14	173.36
	Silica sand	4	6.25
	Slate	1	55.49
	Steatite	16	105.46
	Total	684	18,423.60
Maharashtra	Agate	1	40.94
	Bauxite	20	4,182.46
	China clay	9	91.77
	Chromite	1	16.22
	Dolomite	11	185.08
	Felspar	2	53.65
	Fire clay	2	18.40
	Fluorite	1	32.70
	Iron ore	25	870.12
	Kyanite	13	295.33
	Laterite	2	43.03
	Limestone	51	5,976.70
	Manganese ore	32	1,094.64
	Mica	1	42.06
	Moulding sand	1	47.02
	Ochre	1	12.36
	Quartz	8	139.86
	Quartzite	1	12.09
	Sand (others)	12	740.30
	Shale	1	41.48
	Silica sand	28	1,399.44
	Total	223	15,335.65

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Manipur	Chromite	2	610.17
	Total	2	610.17
Meghalaya	China clay	2	9.77
	Fire clay	1	221.44
	Limestone	10	1,424.05
	Shale	1	4.90
	Total	14	1,660.16
Orissa	Amethyst	1	27.65
	Asbestos	1	49.22
	Bauxite	4	6,079.09
	China clay	11	797.28
	Chromite	20	6,934.85
	Corundum	2	91.41
	Dolomite	8	877.21
	Fire clay	17	1,899.59
	Graphite	101	3,161.99
	Iolite	4	24.38
	Iron ore	102	30,732.88
	Lead & zinc ore	2	504.86
	Lime kankar	1	48.14
	Limestone	34	8,798.36
	Magnesite	1	40.46
	Manganese ore	34	11,532.41
	Mica	1	2.67
	Ochre	2	197.77
	Pyrophyllite	10	576.96
	Quartz	59	1,236.21
	Quartzite	12	169.27
	Sand (others)	6	437.43
	Sillimanite	1	2,618.49
Steatite	3	292.13	
Tin	2	57.61	
Total	439	77,188.32	
Rajasthan	Asbestos	31	1,445.59
	Ball clay	18	1,881.69
	Barytes	4	120.36
	Calcite	20	1,152.30
	China clay	105	8,153.24
	Copper ore	5	1,717.95
	Dolomite	8	579.28
	Epidote	1	5.00
	Felspar	114	3,833.32

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Rajasthan (concl.)	Fire clay	25	2,383.60
	Fluorite	15	1,743.02
	Garnet	14	340.99
	Graphite	2	383.55
	Gypsum	40	17,465.37
	Iron ore	14	894.29
	Jaspar	5	211.70
	Lead & zinc ore	8	7,505.49
	Limestone	52	20,408.73
	Magnesite	3	15.00
	Manganese ore	1	80.00
	Mica	98	3,062.03
	Ochre	24	1,726.72
	Phosphorite	7	2,251.88
	Pyrophyllite	6	308.16
	Quartz	116	3,971.07
	Quartzite	1	5.00
	Shale	1	5.00
	Silica sand	92	5,391.18
	Steatite	224	17,209.42
	Vermiculite	1	42.22
	Wollastonite	4	202.49
	Total	1,059	104,495.64
Sikkim	Copper ore	3	84.67
	Dolomite	1	1.33
	Total	4	86.00
Tamil Nadu	Bauxite	2	158.46
	China clay	2	15.55
	Dolomite	1	62.07
	Felspar	1	39.47
	Fire clay	11	52.17
	Garnet	41	477.84
	Graphite	5	291.62
	Gypsum	4	203.57
	Limeshell	2	729.05
	Limestone	115	1,926.77
	Magnesite	11	1,195.64
	Quartz	122	237.82
	Silica sand	7	17.01
	Steatite	3	36.56
	Vermiculite	1	23.71
	Total	328	5,467.31

(contd.)

State	Mineral	No. of Leases	Lease area (Hect.)
Uttar Pradesh	Diaspore	6	105.87
	Limestone	4	2,706.15
	Phosphorite	1	874.00
	Pyrophyllite	7	793.68
	Silica sand	22	640.93
	Total	40	5,120.63
Uttaranchal	Dolomite	1	20.23
	Gypsum	2	186.15
	Limestone	3	105.44
	Magnesite	2	492.20
	Phosphorite	2	222.05
	Steatite	32	459.29
	Total	42	1,485.36
West Bengal	China clay	27	605.67
	Dolomite	2	927.00
	Felspar	1	2.23
	Fire clay	9	9,940.81
	Limestone	1	0.67
	Moulding sand	2	2.00
	Ochre	1	5.76
	Phosphorite	1	29.13
	Quartz	5	10.70
	Quartzite	1	4.70
	Sand (others)	1	44.09
Total	51	11,572.76	

**TABLE - 4 : STATEWISE/DISTRICTWISE/MINERALWISE DISTRIBUTION OF
LEASES AND LEASE AREA (as on 31.03.2004)**

State	District	Mineral	No. of Leases	Lease Area (Hect.)
Andhra Pradesh	Adilabad	China clay	14	139.76
		Laterite	1	2.84
		Limestone	12	2,685.28
		Manganese ore	9	346.76
		Total	36	3,174.64
	Anantapur	Barytes	1	2.00
		China clay	3	28.35
		Corundum	2	16.36
		Dolomite	47	716.49
		Felspar	3	32.53
		Gold	1	168.42
		Iron ore	4	244.51
		Laterite	1	38.86
		Limestone	20	1,097.69
		Ochre	2	18.00
		Pyrophyllite	2	69.68
		Quartz	20	517.86
		Shale	1	3.16
		Steatite	35	511.07
		Total	142	3,464.98
	Chittoor	China clay	1	14.17
		Felspar	1	3.78
		Gold	2	240.44
		Pyrophyllite	2	8.08
		Quartz	11	100.79
		Steatite	2	15.20
		Total	19	382.46
	Cuddapah	Asbestos	7	352.08
		Barytes	90	1,584.30
		China clay	13	611.92
		Clay (others)	3	183.32
		Dolomite	9	163.57
		Felspar	15	311.14
		Iron ore	1	18.62
		Laterite	1	80.94
		Limestone	18	1,296.55
		Magnesite	1	6.57
		Ochre	7	36.07
	Pyrophyllite	2	91.98	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Cuddapah (contd.)	Quartz	11	186.49
		Shale	2	19.71
		Silica sand	1	1.87
		Steatite	3	57.46
		Total	184	5,002.59
	Godavari East	China clay	13	22.79
		Fire clay	22	74.22
		Graphite	1	5.00
		Laterite	13	75.53
		Total	49	177.54
	Godavari West	Ball clay	20	254.01
		China clay	5	35.51
		Clay (others)	2	31.86
		Total	27	321.38
	Guntur	Lead & zinc ores	1	200.00
		Limekankar	1	3.80
		Limestone	28	4,171.66
		Quartz	5	33.84
		Slate	2	80.95
		Total	37	4,490.25
	Karimnagar	Dolomite	2	32.47
		Laterite	2	8.30
		Limestone	3	804.8
		Sand (others)	6	1,626.90
		Silica sand	1	10.00
		Total	14	2,482.47
	Khammam	Barytes	4	297.91
		Corundum	4	19.57
		Dolomite	6	423.32
		Felspar	1	1.50
		Garnet	7	80.45
		Graphite	3	76.51
		Iron ore	5	629.68
		Limestone	2	32.23
		Mica	2	29.83
		Quartz	9	37.55
		Sand (others)	3	15.88
		Total	46	1,644.43

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Krishna	Iron ore	4	19.77
		Limestone	18	2,397.58
		Quartz	3	2.86
		Total	25	2,420.21
	Kurnool	Barytes	6	233.16
		Calcite	2	33.68
		China clay	3	17.03
		Dolomite	28	246.42
		Felspar	1	16.87
		Iron ore	7	52.33
		Laterite	6	19.83
		Limestone	67	3,109.72
		Ochre	7	124.60
		Quartz	14	162.12
		Quartzite	4	31.77
		Shale	6	21.46
		Silica sand	13	178.43
		Steatite	58	334.7
	Total	222	4,582.12	
	Mahbubnagar	Felspar	9	71.13
		Quartz	95	592.5
		Total	104	663.63
	Medak	Amethyst	1	1.31
		Laterite	7	41.05
		Ochre	1	5.67
		Quartz	22	194.37
		Total	31	242.40
	Nalgonda	Laterite	4	4.82
		Limestone	28	4,694.10
		Quartz	20	184.42
		Total	52	4,883.34
	Nellore	Barytes	3	44.87
		Felspar	4	92.73
		Garnet	1	39.68
		Iron ore	2	274.00
		Laterite	9	63.34
		Limeshell	3	150.75
		Mica	99	1,750.76
		Quartz	68	973.72

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Nellore (concl.)	Silica sand	39	842.92
		Vermiculite	6	95.28
		Total	234	4,328.05
	Nizamabad	Laterite	2	12.86
		Quartz	3	7.65
		Total	5	20.51
	Prakasam	Barytes	5	28.52
		Garnet	4	4.79
		Iron ore	2	272.24
		Quartz	72	1750.05
		Silica sand	16	30.13
		Slate	10	380.31
		Total	109	2,466.04
	Rangareddi	Amethyst	3	11.68
		China clay	2	6.47
		Fire clay	2	8.09
		Laterite	13	138.69
		Limestone	5	1,195.27
		Quartz	30	180.52
		Shale	1	133.07
		Total	56	1,673.79
	Srikakulam	Garnet	1	95.08
		Lime kankar	1	5.85
		Limeshell	1	4.00
		Quartz	2	12.98
		Quartzite	2	16.02
		Silica sand	1	7.5
		Sillimanite	1	7,000.00
		Total	9	7,141.43
	Visakhapatnam	Apatite	1	13.29
		Calcite	3	105.52
		China clay	3	17.40
		Laterite	6	57.93
		Limeshell	1	8.63
		Mica	10	359.22
		Ochre	1	5.47
		Phosphorite	1	2.83
		Quartz	11	226.47
	Total	37	796.76	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Vizianagaram	Limekankar	17	128.00
		Manganese ore	33	778.07
		Moulding sand	1	31.16
		Quartz	11	142.09
		Quartzite	9	122.07
		Sand (others)	2	65.47
		Total	73	1,266.86
	Warangal	Dolomite	3	19.58
		Laterite	13	97.45
		Sand (others)	1	13.85
		Total	17	130.88
ASSAM	Karbi Anglong	Limestone	3	185.83
		Total	3	185.83
	North Cachar Hills	Limestone	8	795.50
		Total	8	795.50
BIHAR	Monghyr	Quartz	2	61.30
		Total	2	61.30
	Nawada	Mica	2	1,196.80
		Total	2	1,196.80
	Rohtas	Limestone	7	182.17
		Pyrite	1	647.50
Total		8	829.67	
CHHATTISGARH	Bastar	Limestone	18	43.89
		Quartzite	1	16.00
		Total	19	59.89
	Bilaspur	Dolomite	32	8,646.31
		Total	32	8,646.31
	Dantewara	Iron ore	6	6,886.90
		Tin	4	66.19
		Total	10	6,953.09
	Durg	Dolomite	39	169.94
		Iron ore	4	2,732.62
Limestone		38	679.09	
Moulding sand		4	33.1	
Quartzite		5	48.08	
Total		90	3,662.83	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Janjgir-Champa	Dolomite	6	209.38
		Limestone	3	735.14
		Total	9	944.52
	Jashpur	Quartz	1	1.36
		Total	1	1.36
	Kanker	Bauxite	3	13.22
		Iron ore	4	999.26
		Limestone	1	0.63
		Mould sand	1	13.84
		Steatite	4	7.89
		Total	13	1,034.84
	Kawardha	Bauxite	2	664.33
		Dolomite	1	12.14
		Limestone	1	3.78
		Total	4	680.25
	Korba	Fire clay	1	0.46
		Total	1	0.46
	Mahasamund	Fire clay	3	15.78
		Quartz	1	2.21
		Total	4	17.99
	Raigarh	Dolomite	1	2.33
		Limestone	10	27.38
		Quartz	2	4.25
		Quartzite	2	54.4
		Total	15	88.36
	Raipur	Dolomite	3	22.21
		Limestone	36	3,090.65
		Total	39	3,112.86
	Rajnandgaon	China clay	5	13.16
		Iron ore	1	80.71
		Limestone	3	8.27
		Moulding sand	2	17.76
		Ochre	1	10.12
		Quartz	2	10.23
		Quartzite	8	47.52
		Total	22	187.77

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Surguja	Bauxite	7	4,963.30
		Graphite	3	98.79
		Total	10	5,062.09
GOA	North Goa	Iron ore	83	6,175.82
		Manganese ore	17	1,059.51
		Total	100	7,235.33
	South Goa	Bauxite	1	40.92
		Iron ore	104	7,826.97
		Manganese ore	45	3,062.77
Total		150	10,930.66	
GUJARAT	Amreli	Bauxite	3	160.66
		China clay	1	3.01
		Clay (others)	1	88.54
		Limestone	5	1,864.75
		Total	10	2,116.96
	Banaskantha	Calcite	1	3.76
		Copper ore	1	1,402.00
		Limestone	9	422.64
		Vermiculite	1	1.84
		Total	12	1,830.24
	Bharuch	Agate	1	4.64
		Silica sand	26	442.23
		Total	27	446.87
	Bhavnagar	Chalk	1	12.00
		Clay (others)	4	190.81
		Dolomite	3	52.99
		Limestone	1	20.00
		Moulding sand	1	2.80
		Total	10	278.60
	Dahod	Fluorite	1	0.49
		Limestone	5	187.51
Quartz		1	4.20	
Total		7	192.20	
Jamnagar	Bauxite	106	3,110.34	
	Calcareous sand	14	151.75	
	Chalk	8	33.56	
	Clay (others)	1	20.23	
	Limestone	52	2,092.96	
	Ochre	1	20.03	
	Total	182	5,428.87	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Junagarh	Chalk	3	27.90
		Limestone	115	2,736.75
		Total	118	2,764.65
	Kheda	Bauxite	16	84.78
		Limestone	1	10.93
		Total	17	95.71
	Kutch	Ball clay	2	5.00
		Bauxite	6	486.95
		China clay	28	283.17
		Clay (others)	22	290.03
		Gypsum	1	4.95
		Limestone	4	312.18
		Ochre	1	2.00
		Silica sand	5	174.16
		Total	69	1,558.44
	Mehesana	China clay	8	241.27
		Fire clay	1	32.37
		Total	9	273.64
	Panchmahals	Manganese ore	1	2.95
		Quartz	28	198.02
		Quartzite	1	19.30
		Total	30	220.27
	Patan	Ball clay	1	5.49
		China clay	1	36.22
		Clay (others)	5	103.82
		Ochre	3	23.32
		Total	10	168.85
	Porbandar	Bauxite	5	106.69
		Chalk	125	501.97
		China clay	1	3.97
		Limestone	171	3,235.15
		Total	302	3,847.78
	Rajkot	Chalk	22	80.81
		Fire clay	6	7.02
		Gypsum	1	1.81
		Limestone	2	37.13
		Perlite	1	144.65
		Total	32	271.42

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Sabarkantha	Bauxite	13	91.29
		Calcite	3	6.58
		China clay	6	636.43
		Felspar	1	1.00
		Fire clay	14	50.36
		Limestone	2	2.53
		Quartz	1	4.04
		Silica sand	15	70.03
		Steatite	6	22.04
		Total	61	884.30
	Surat	Limestone	1	1,504.75
		Silica sand	1	6.52
		Total	2	1,511.27
	Surendranagar	Clay (others)	2	7.78
		Fire clay	51	284.95
		Moulding sand	3	4.03
		Silica sand	22	163.56
		Total	78	460.32
	Vadodara	Calcite	1	52.97
		Dolomite	95	1,172.05
		Fluorite	1	31.20
		Quartz	1	3.00
		Vermiculite	1	23.20
		Total	99	1,282.42
HARYANA	Ambala	Limestone	2	340.56
		Total	2	340.56
	Bhiwani	Limekankar	4	705.35
		Total	4	705.35
	Faridabad	China clay	2	165.73
		Silica sand	29	6,208.35
		Total	31	6,374.08
	Gurgaon	China clay	37	3,077.57
		Quartz	4	97.93
		Quartzite	2	47.78
		Silica sand	23	1,750.95
		Total	66	4,974.23

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Mahendragarh	Barytes	1	79.32
		Calcite	2	158.56
		Dolomite	2	252.15
		Felspar	3	285.06
		Iron ore	1	86.20
		Limestone	9	251.95
		Mica	1	400.00
		Quartz	12	753.92
		Slate	1	81.35
		Total	32	2,348.51
	Rewari	Quartzite	2	20.45
		Slate	3	270.37
		Total	5	290.82
HIMACHAL PRADESH	Bilaspur	Limestone	4	248.39
		Total	4	248.39
	Kannaur	Gypsum	1	116.68
		Total	1	116.68
	Mandi	Rock salt	3	53.86
		Total	3	53.86
	Sirmur	Barytes	2	81.39
		Limestone	46	761.18
		Total	48	842.57
	Solan	Limestone	2	757.08
Total		2	757.08	
JAMMU & KASHMIR	Anantnag	Limestone	9	82.15
		Total	9	82.15
	Baramula	Gypsum	1	2.71
		Total	1	2.71
	Doda	Gypsum	2	55.00
		Total	2	55.00
	Jammu	Limestone	1	4.67
		Total	1	4.67
	Leh	Opal	1	200.00
		Total	1	200.00

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Pulwama	Limestone	1	100.00
		Total	1	100.00
	Srinagar	Limestone	1	144.25
		Total	1	144.25
	Udhampur	Magnesite	2	140.80
		Total	2	140.80
JHARKHAND	Deogarh	Felspar	1	0.91
		Total	1	0.91
	Dhanbad	Fire clay	2	114.18
		Limestone	1	17.40
		Quartz	1	5.18
		Sand (others)	13	1,765.35
		Total	17	1,902.11
	Dumka	Quartz	1	0.88
		Total	1	0.88
	Garwah	Limestone	3	1,178.92
		Total	3	1,178.92
	Giridih	Felspar	3	194.96
		Mica	3	190.72
		Steatite	1	3.64
		Total	7	389.32
	Gumla	Bauxite	21	2,346.18
		Total	21	2,346.18
	Hazaribagh	Felspar	1	3.13
		Fire clay	3	211.12
		Limestone	2	117.05
		Mica	1	197.00
		Pyrophyllite	1	22.50
		Total	8	550.80
	Kodarma	Mica	25	576.67
		Quartz	3	79.73
		Total	28	656.40
	Latehar	Bauxite	2	478.35
		China clay	1	8.25
		Fire clay	15	405.56

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Latehar (concl.)	Graphite	1	17.81
		Iron ore	1	2.04
		Quartz	11	142.32
		Total	31	1,054.33
	Lohardaga	Bauxite	16	800.65
		Total	16	800.65
	Palamau	Dolomite	1	18.45
		Felspar	1	1.25
		Graphite	12	387.63
		Iron ore	4	58.06
		Limestone	1	25.97
		Steatite	1	2.52
		Total	20	493.88
	Ranchi	Limestone	4	286.17
		Total	4	286.17
	Sahebganj	China clay	2	12.25
		Total	2	12.25
	Singhbhum (East)	Copper ore	3	6,417.69
		Kyanite	1	2.43
		Total	4	6,420.12
	Singhbhum (West)	China clay	5	198.98
		Iron ore	20	9,615.27
		Kyanite	4	2,557.79
		Limestone	5	48.30
		Ochre	1	5.62
		Quartz	2	8.25
		Steatite	1	3.25
		Total	38	12,437.46
KARNATAKA	Bagalkot	Dolomite	11	290.52
		Iron ore	2	69.99
		Limestone	41	3,043.67
		Total	54	3,404.18
	Bangalore	China clay	1	48.56
		Felspar	4	131.91
		Fire clay	1	2.02
		Silica sand	1	41.83
		Total	7	224.32

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Belgaum	Calcite	1	17.00
		China clay	1	6.58
		Dolomite	3	14.58
		Laterite	2	95.21
		Limestone	15	593.55
		Manganese ore	1	2.33
		Moulding sand	3	31.57
		Quartz	2	5.67
		Quartzite	1	4.05
		Silica sand	2	3.25
		Total	31	773.79
	Bellary	Iron ore	56	4,543.01
		Manganese ore	4	489.29
		Moulding sand	5	51.68
		Ochre	2	532.61
		Quartz	13	102.30
		Steatite	2	4.89
		Total	82	5,723.78
	Bidar	Ochre	1	21.85
		Total	1	21.85
	Chickmagalur	Dunite	1	4.45
		Iron ore	2	4,647.70
		Total	3	4,652.15
	Chitradurga	Barytes	1	17.00
		Copper ore	2	416.83
		Iron ore	5	390.96
		Kyanite	1	169.96
		Limestone	13	1,622.54
		Manganese ore	10	619.21
		Quartz	3	81.60
		Total	35	3,318.10
	Coorg	Corundum	1	0.80
		Total	1	0.80
	Dawangere	Manganese ore	2	64.61
		Moulding sand	5	113.82
		Quartz	3	12.14
		Total	10	190.57

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Dharwar	Clay (others)	1	20.23
		Total	1	20.23
	Gulbarga	Gold	1	55.75
		Limestone	9	2,606.46
		Moulding sand	1	6.50
		Quartz	2	39.61
		Total	13	2,708.32
	Hassan	China clay	2	311.60
		Chromite	6	987.47
		Copper ore	1	70.82
		Quartz	3	68.69
		Steatite	1	80.94
		Vermiculite	1	26.30
		Total	14	1,545.82
	Haveri	Moulding sand	8	246.44
		Total	8	246.44
	Kolar	China clay	4	300.51
		Gold	1	5,215.39
		Total	5	5,515.90
	Koppal	Quartz	7	64.16
		Total	7	64.16
	Mandya	Corundum	1	1.64
		Felsite	1	1.61
		Quartz	2	27.31
		Total	4	30.56
	Mysore	Corundum	2	15.63
		Felsite	1	3.49
		Graphite	4	235.04
		Kyanite	3	28.32
		Limestone	1	110.00
		Magnesite	7	406.47
		Quartz	1	0.90
		Steatite	1	12.14
		Total	20	811.99
	North Kanara	Limeshell	10	996.48
		Limestone	2	136.62
		Manganese ore	1	464.00
		Moulding sand	2	136.98
		Quartz	1	1.82
		Silica sand	10	253.28
		Total	26	1,989.18

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Raichur	Gold	3	965.08
		Quartz	2	13.73
		Total	5	978.81
	Shimoga	China clay	3	33.99
		Kyanite	1	2.42
		Limestone	1	40.12
		Manganese ore	1	526.10
		Quartz	1	16.91
		Total	7	619.54
	South Kanara	Quartz	1	1.95
		Silica sand	3	118.29
		Total	4	120.24
	Tumkur	China clay	2	138.27
		Fire clay	2	388.49
		Gold	1	38.04
		Iron ore	7	794.92
		Limestone	6	227.31
		Manganese ore	7	554.04
		Ochre	1	6.07
		Quartz	6	17.59
Steatite		2	36.37	
Total		34	2,201.10	
Udupi	Bauxite	1	28.80	
	Limeshell	4	407.53	
	Ochre	1	56.65	
	Silica sand	14	928.36	
	Total	20	1421.34	
KERALA	Alapuzha	Limeshell	6	940.44
		Silica sand	42	35.43
Total		48	975.87	
Kannur	China clay	3	11.62	
	Laterite	1	0.19	
	Total	4	11.81	
Kasargod	China clay	1	2.85	
	Total	1	2.85	
Kollam	Bauxite	3	1.37	
	China clay	5	8.75	
	Sillimanite	3	327.35	
	Total	11	337.47	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Kottayam	Limeshell	2	556.25
		Total	2	556.25
	Palakkad	Limestone	1	245.69
		Total	1	245.69
	Thiruvananthapuram	China clay	32	72.34
		Total	32	72.34
	Wynad	Quartz	2	3.21
		Total	2	3.21
MADHYA PRADESH	Badwani	Calcite	19	45.82
		Total	19	45.82
	Balaghat	Copper ore	2	479.90
		Dolomite	13	90.89
		Fire clay	1	2.41
		Limestone	7	73.98
		Manganese ore	23	1,358.43
		Ochre	1	16.18
		Sand (others)	1	5.50
		Total	48	2,027.29
	Chhatarpur	China clay	2	20.12
		Diaspore	7	32.00
		Limestone	2	4.91
		Phosphorite	1	48.76
		Pyrophyllite	13	52.00
		Quartzite	1	6.10
		Steatite	2	10.36
		Total	28	174.25
	Chhindwara	Dolomite	7	63.19
		Manganese ore	1	54.13
		Total	8	117.32
	Damoh	Laterite	1	21.25
		Limestone	8	1,484.60
		Sand (others)	1	2.02
		Total	10	1,507.87
	Datia	Lead & zinc ores	1	11.00
		Quartz	2	14.09
		Total	3	25.09

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Dewas	Barytes	1	3.35
		Silica sand	1	4.05
		Total	2	7.40
	Dhar	Limestone	18	119.78
		Ochre	1	6.31
		Total	19	126.09
	Gwalior	China clay	1	20.63
		Iron ore	1	20.23
		Total	2	40.86
	Jabalpur	Bauxite	3	8.74
		Dolomite	4	15.33
		Fire clay	14	98.97
		Iron ore	6	90.02
		Laterite	2	10.91
		Limestone	11	1,151.87
		Ochre	1	4.14
		Quartz	2	13.98
		Steatite	3	43.34
		Total	46	1,437.30
	Jhabua	Calcite	1	2.40
		Dolomite	16	100.65
		Limestone	1	2.15
		Manganese ore	3	34.35
		Phosphorite	2	11.32
		Total	23	150.87
	Katni	Bauxite	7	42.26
		Dolomite	13	73.42
		Fire clay	13	144.57
		Iron ore	1	12.59
		Laterite	2	4.94
		Limestone	84	1,492.79
		Ochre	3	7.62
		Silica sand	1	0.60
		Steatite	2	15.71
		Total	126	1,794.50
	Khargon (West Nimar)	Calcite	4	15.04
		China clay	1	0.61
		Limestone	2	4.89
		Silica sand	2	1.60
		Total	9	22.14

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Mandla	Dolomite	34	97.85
		Total	34	97.85
	Mandsaur	Laterite	11	51.52
		Shale	14	173.36
		Slate	1	55.49
		Total	26	280.37
	Morena	Limestone	1	18.00
		Total	1	18.00
	Narsinhapur	Dolomite	3	10.07
		Fire clay	1	20.00
		Limestone	2	35.06
		Steatite	9	36.05
		Total	15	101.18
	Nimach	Laterite	5	62.11
		Limestone	6	963.09
		Total	11	1,025.20
	Panna	Diamond	2	576.51
		Limestone	1	48.39
		Total	3	624.90
	Rewa	Bauxite	10	126.52
		Limestone	17	1,485.49
		Ochre	3	47.37
		Total	30	1659.38
	Sagar	Dolomite	2	20.36
		Phosphorite	1	52.80
		Pyrophyllite	2	3.21
		Total	5	76.37
	Satna	Bauxite	14	117.30
		China clay	7	52.45
		Clay (others)	2	1.33
		Laterite	9	179.99
		Limestone	93	4,368.03
		Ochre	29	426.41
		Total	154	5,145.51
	Seoni	Dolomite	7	11.66
		Total	7	11.66

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Shahdol	Bauxite	1	500.27
		China clay	3	20.84
		Fire clay	1	5.66
		Ochre	2	26.76
		Total	7	553.53
	Shivpuri	Diaspore	1	17.00
		Total	1	17.00
	Shyampur	Limestone	7	508.25
		Ochre	2	22.59
		Total	9	530.84
	Sidhi	Limestone	4	497.77
		Total	4	497.77
	Tikamgarh	Barytes	1	2.02
		China clay	1	5.00
		Diaspore	3	31.11
		Pyrophyllite	21	189.79
		Quartz	2	16
		Total	28	243.92
	Umaria	China clay	1	11.24
		Fire clay	2	19.62
		Laterite	1	17.74
		Ochre	2	14.72
		Total	6	63.32
MAHARASHTRA	Amravati	China clay	2	16.71
		Fire clay	1	13.26
Total		3	29.97	
	Bhandara	Chromite	1	16.22
		Kyanite	13	295.33
		Manganese ore	6	375.97
		Quartz	4	33.32
		Sand (others)	2	43.34
		Total	26	764.18
	Chandrapur	China clay	1	18.00
		Fluorite	1	32.70
		Iron ore	3	33.29
		Laterite	2	43.03
		Limestone	18	3,623.34
		Sand (others)	5	461.08

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Chandrapur (concl'd.)	Shale	1	41.48
		Total	31	4,252.92
	Gadchiroli	Iron ore	1	9.96
		Total	1	9.96
	Gondia	Iron ore	2	46.43
		Quartz	1	14.32
		Total	3	60.75
	Jalna	Agate	1	40.94
		Total	1	40.94
	Kolhapur	Bauxite	15	3,865.38
		Iron ore	1	143.95
		Total	16	4,009.33
	Nagpur	China clay	5	43.88
		Dolomite	10	123.17
		Manganese ore	25	526.82
		Ochre	1	12.36
		Quartz	1	1.07
		Sand (others)	4	191.88
		Total	46	899.18
	Raigad	Bauxite	3	111.70
		Total	3	111.70
	Ratnagiri	Bauxite	2	205.38
		Moulding sand	1	47.02
		Silica sand	7	488.08
		Total	10	740.48
	Sindhudurg	China clay	1	13.18
		Felspar	2	53.65
		Fire clay	1	5.14
		Iron ore	18	636.49
		Manganese ore	1	191.85
		Mica	1	42.06
		Quartz	2	91.15
		Quartzite	1	12.09
		Silica sand	21	911.36
		Total	48	1,956.97
	Yeotmal	Dolomite	1	61.91
		Limestone	33	2,353.36
		Sand (others)	1	44.00
		Total	35	2,459.27

State	District	Mineral	No. of Leases	Lease Area (Hect.)
MANIPUR	Chandel	Chromite	1	223.93
		Total	1	223.93
	Ukhrul	Chromite	1	386.24
		Total	1	386.24
MEGHALAYA	Garo Hills West	Fire clay	1	221.44
		Limestone	2	470.00
		Total	3	691.44
	Jaintia Hills	Limestone	2	15.28
		Total	2	15.28
	Khasi Hills East	China clay	2	9.77
Limestone		5	878.77	
Shale		1	4.90	
Total		8	893.44	
Khasi Hills West	Limestone	1	60.00	
	Total	1	60.00	
ORISSA	Angul	Quartz	1	8.13
		Sand (others)	3	318.33
		Total	4	326.46
	Bargarh	China clay	3	103.34
		Graphite	12	220.68
		Limestone	2	806.53
		Quartz	1	15.21
		Total	18	1,145.76
	Baudh	Graphite	1	28.96
		Quartz	4	58.48
Total		5	87.44	
Bolangir	Graphite	64	1,676.25	
	Lead & zinc ores	1	5.26	
	Limestone	1	27.65	
	Manganese ore	1	7.27	
	Quartz	2	143.99	
	Total	69	1,860.42	
Cuttack	Fire clay	7	929.19	
	Total	7	929.19	
Dhenkanal	Chromite	2	847.48	
	Graphite	3	185.70	
	Total	5	1,033.18	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Ganjam	Lime kankar	1	48.14
		Sillimanite	1	2,618.49
		Total	2	2,666.63
	Jajpur	Chromite	12	3,888.39
		Iron ore	1	1,812.99
		Quartz	1	7.23
		Quartzite	1	2.31
		Total	15	5,710.92
	Jharsuguda	Fire clay	2	246.42
		Ochre	1	102.27
		Quartzite	3	121.44
		Sand (others)	1	109.20
		Total	7	579.33
	Kalahandi	Amethyst	1	27.65
		Corundum	1	57.46
		Graphite	10	205.13
		Iolite	4	24.38
		Quartz	33	315.46
		Total	49	630.08
	Keonjhar	Asbestos	1	49.22
		Chromite	6	2,198.98
		Iron ore	61	22,891.90
		Magnesite	1	40.46
		Manganese ore	20	7,922.06
		Pyrophyllite	10	576.96
		Quartz	2	35.99
		Total	101	33,715.57
	Khurda	Fire clay	3	147.09
		Total	3	147.09
	Koraput	Bauxite	2	4,647.28
		China clay	1	38.50
		Graphite	1	501.67
		Limestone	2	1,586.22
		Manganese ore	1	501.67
		Mica	1	2.67
		Ochre	1	95.50
		Quartz	2	22.76
		Total	11	7,396.27

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Malkangiri	Limestone	1	1,694.13
		Quartz	1	2.48
		Tin	2	57.61
		Total	4	1,754.22
	Mayurbhanj	China clay	7	655.44
		Fire clay	1	22.49
		Graphite	1	24.91
		Iron ore	7	1,204.91
		Quartz	1	1.19
		Quartzite	7	20.63
		Steatite	2	136.20
		Total	26	2,065.77
	Nawapara	Corundum	1	33.95
		Graphite	1	20.23
		Limestone	4	410.57
		Total	6	464.75
	Nayagarh	Graphite	1	16.64
		Total	1	16.64
	Raygada	Bauxite	1	1,388.74
		Graphite	7	281.82
		Manganese ore	2	133.86
		Quartzite	1	24.89
		Total	11	1,809.31
	Sambalpur	Fire clay	1	8.84
		Quartz	4	103.61
		Total	5	112.45
	Sundergarh	Bauxite	1	43.07
		Dolomite	8	877.21
		Fire clay	3	545.56
		Iron ore	33	4,823.08
		Lead & zinc ores	1	499.60
		Limestone	24	4,273.26
		Manganese ore	10	2,987.55
		Quartz	7	521.70
		Sand (others)	2	9.90
		Steatite	1	155.93
	Total	90	14,736.86	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)	
RAJASTHAN	Ajmer	Asbestos	4	214.66	
		Felspar	69	2,478.17	
		Garnet	3	15.00	
		Lead & zinc ores	1	480.45	
		Limestone	1	8.57	
		Magnesite	1	5.00	
		Mica	35	1,351.77	
		Quartz	4	127.33	
		Steatite	2	131.00	
		Vermiculite	1	42.22	
		Wollastonite	1	5.00	
	Total	122	4,859.17		
		Alwar	Barytes	2	41.85
			China clay	1	4.73
			Copper ore	1	914.07
			Felspar	1	5.00
			Fire clay	1	3.75
			Ochre	1	60.70
			Silica sand	1	4.73
			Steatite	8	511.01
			Total	16	1,545.84
			Banswara	Graphite	2
	Limestone			1	65.82
	Manganese ore			1	80.00
	Steatite			2	713.08
	Total			6	1,242.45
		Barmer	China clay	2	10.00
			Gypsum	5	1,630.51
			Silica sand	5	551.09
			Total	12	2,191.60
		Bharatpur	Fire clay	3	47.75
			Ochre	2	10.00
			Silica sand	21	1,557.11
			Total	26	1,614.86
		Bhilwara	Asbestos	9	45.00
			China clay	12	778.32
			Felspar	23	478.75
			Garnet	1	5.00
			Lead & zinc ores	1	1,200.00
			Mica	55	1,456.02
			Ochre	1	5.00

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Bhilwara (concl'd.)	Quartz	2	48.16
		Steatite	10	1,519.35
		Total	114	5,535.60
	Bikaner	Ball clay	8	773.96
		China clay	52	4,714.13
		Fire clay	17	2,214.74
		Gypsum	13	3,826.86
		Total	90	11,529.69
	Bundi	China clay	2	109.00
		Ochre	2	99.37
		Silica sand	2	357.00
		Total	6	565.37
	Chittorgarh	China clay	26	1,296.01
		Limestone	8	3,692.81
		Ochre	11	1,254.85
		Shale	1	5.00
		Total	46	6,248.67
	Dausa	China clay	1	32.37
		Iron ore	1	65.25
		Quartz	3	191.28
		Silica sand	7	348.97
		Steatite	5	352.20
		Total	17	990.07
	Dungarpur	Felspar	1	100.00
		Fluorite	10	500.40
		Steatite	63	4,330.97
		Total	74	4,931.37
	Ganganagar	Gypsum	8	1,475.89
		Total	8	1,475.89
	Hanumangarh	Gypsum	5	7,084.65
		Total	5	7,084.65
	Jaipur	Asbestos	1	66.50
		Calcite	1	296.41
		China clay	7	1,171.14
		Dolomite	2	92.93
		Epidote	1	5.00
		Felspar	7	261.33

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Jaipur (concl'd.)	Iron ore	5	484.79
		Limestone	3	1,334.90
		Mica	2	68.37
		Ochre	2	183.00
		Quartz	20	538.81
		Silica sand	18	864.90
		Steatite	9	849.98
		Total	78	6,218.06
	Jaisalmer	Ball clay	1	150.00
		Dolomite	1	32.37
		Gypsum	3	867.89
		Limestone	2	1,998.00
		Ochre	1	32.37
		Silica sand	8	385.00
		Total	16	3,465.63
	Jalore	Fluorite	4	1,075.00
		Gypsum	1	178.50
		Total	5	1,253.50
	Jhunjhunu	Calcite	3	104.94
		Copper ore	4	803.88
		Dolomite	2	66.05
		Fire clay	4	117.36
		Iron ore	5	257.54
		Ochre	1	33.00
		Pyrophyllite	1	42.50
		Quartz	3	212.17
		Steatite	5	432.56
		Total	28	2,070.00
	Jodhpur	Jasper	5	211.70
		Total	5	211.70
	Karauli	Silica sand	22	740.97
		Steatite	1	5.00
		Total	23	745.97
	Kota	Limestone	4	1309.52
		Total	4	1309.52
	Nagaur	Ball clay	2	10.00
		Gypsum	5	2,401.07
		Limestone	12	6,700.63
		Total	19	9,111.70

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Pali	Asbestos	1	76.89
		Ball clay	7	947.73
		Felspar	2	69.87
		Limestone	11	1,114.15
		Magnesite	2	10.00
		Quartz	15	1,246.20
		Total	38	3464.84
	Rajsamand	Asbestos	13	812.11
		Felspar	1	5.00
		Lead & zinc ores	4	2,142.04
		Mica	2	10.00
		Pyrophyllite	2	105.00
		Quartz	30	465.02
		Steatite	32	2,602.75
		Total	84	6,141.92
	Sawai Madhopur	Ochre	1	38.43
		Quartz	2	249.45
		Silica sand	2	282.25
		Total	5	570.13
	Sikar	Barytes	1	47.51
		Calcite	7	222.79
		China clay	1	32.54
		Dolomite	3	387.93
		Felspar	7	364.83
		Iron ore	3	86.71
		Limestone	5	2,363.12
		Ochre	1	5.00
		Quartz	22	589.81
		Total	50	4,100.24
	Sirohi	Calcite	5	366.66
		Fluorite	1	167.62
		Lead & zinc ores	1	63.00
		Limestone	4	1,116.31
		Wollastonite	2	95.69
		Total	13	1,809.28
	Tonk	Felspar	3	70.37
		Garnet	10	320.99
		Mica	4	175.87
		Quartz	15	302.84
		Quartzite	1	5.00
		Silica sand	6	299.16
		Steatite	1	48.00
		Total	40	1,222.23

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Udaipur	Asbestos	3	230.43
		Barytes	1	31.00
		Calcite	4	161.50
		China clay	1	5.00
		Lead & zinc ores	1	3,620.00
		Limestone	1	704.90
		Ochre	1	5.00
		Phosphorite	7	2,251.88
		Pyrophyllite	3	160.66
		Steatite	86	5,713.52
		Wollastonite	1	101.80
		Total	109	12,985.69
SIKKIM	Sikkim East	Copper ore	3	84.67
		Total	3	84.67
	Sikkim West	Dolomite	1	1.33
		Total	1	1.33
TAMIL NADU	Ariyalur	Fire clay	2	2.74
		Limestone	10	577.96
		Total	12	580.70
	Chengai-Anna	Quartz	1	6.58
		Total	1	6.58
	Coimbatore	Quartz	5	12.65
		Steatite	1	3.40
		Total	6	16.05
	Cuddalore	Fire clay	3	43.40
		Total	3	43.40
	Dharmapuri	Quartz	1	1.27
		Total	1	1.27
	Dindigul	Limestone	12	35.98
		Quartz	11	9.73
		Total	23	45.71
	Erode	Limestone	1	1.82
		Quartz	24	51.37
		Total	25	53.19
Kanchipuram	Limeshell	1	190.00	
	Silica sand	1	4.63	
	Total	2	194.63	

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Kanyakumari	Garnet	5	258.31
		Total	5	258.31
	Karur	Limestone	14	46.64
		Quartz	31	49.18
		Total	45	95.82
	Madurai	Graphite	1	14.51
		Limestone	2	3.11
		Quartz	2	3.44
		Total	5	21.06
	Nagapattinam	Silica sand	4	7.14
		Total	4	7.14
	Namakkal	Bauxite	2	158.46
		Limestone	11	32.52
		Quartz	14	25.33
		Total	27	216.31
	Perambalur	Fire clay	6	6.03
		Gypsum	1	159.31
		Limestone	11	151.52
		Total	18	316.86
	Periyar	Quartz	12	9.47
		Total	12	9.47
	Ramnathapuram	Limeshell	1	539.05
		Total	1	539.05
	Salem	Felspar	1	39.47
		Limestone	21	89.33
		Magnesite	11	1,195.64
		Quartz	20	68.19
		Total	53	1,392.63
	Sivaganga	Graphite	4	277.11
		Total	4	277.11
	Theni (Madurai)	Limestone	3	6.77
		Total	3	6.77
	Thiruvarur	Silica sand	1	4.16
		Total	1	4.16

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
	Tiruchirapalli	China clay	1	12.30
		Dolomite	1	62.07
		Garnet	1	19.06
		Gypsum	3	44.26
		Limestone	8	94.28
		Quartz	1	0.61
		Steatite	1	4.90
		Total	16	237.48
	Tirunelveli	Garnet	33	178.54
		Limestone	13	192.53
		Total	46	371.07
	Tuticorin	Garnet	2	21.93
		Limestone	2	4.75
		Total	4	26.68
	Vellore	Steatite	1	28.26
		Vermiculite	1	23.71
		Total	2	51.97
	Villupuram	China clay	1	3.25
		Total	1	3.25
	Virudhunagar	Limestone	7	689.56
		Total	7	689.56
UTTAR PRADESH	Allahabad	Silica sand	16	467.73
		Total	16	467.73
	Banda	Silica sand	6	173.20
		Total	6	173.20
	Hamirpur	Pyrophyllite	3	15.93
		Total	3	15.93
	Jhansi	Diaspore	3	35.03
		Total	3	35.03
	Lalitpur	Diaspore	3	70.84
		Phosphorite	1	874.00
		Pyrophyllite	4	777.75
		Total	8	1,722.59
	Sonbhadra	Limestone	4	2,706.15
		Total	4	2,706.15

(contd.)

State	District	Mineral	No. of Leases	Lease Area (Hect.)
UTTARANCHAL	Almora	Steatite	1	1.40
		Total	1	1.40
	Bageshwar	Magnesite	1	53.20
		Steatite	23	404.65
		Total	24	457.85
	Dehradun	Limestone	2	97.75
		Phosphorite	2	222.05
		Total	4	319.80
	Pithoragarh	Magnesite	1	439.00
		Steatite	8	53.24
		Total	9	492.24
	Tehri Garhwal	Dolomite	1	20.23
		Gypsum	2	186.15
		Limestone	1	7.69
		Total	4	214.07
WEST BENGAL	Bankura	China clay	10	62.50
		Felspar	1	2.23
		Fire clay	2	12.23
		Quartz	2	4.33
		Quartzite	1	4.70
		Total	16	85.99
	Birbhum	China clay	15	210.88
		Fire clay	1	46.00
		Total	16	256.88
	Burdwan	Fire clay	6	9,882.58
		Moulding sand	2	2.00
		Total	8	9,884.58
	Jalpaiguri	Dolomite	2	927.00
		Total	2	927.00
	Midnapur	Ochre	1	5.76
		Total	1	5.76
	Purulia	China clay	2	332.29
		Limestone	1	0.67
		Phosphorite	1	29.13
		Quartz	3	6.37
		Sand (others)	1	44.09
Total		8	412.55	

3.2 DISTRICTWISE ANALYSIS

(i) HIGH MINERAL POTENTIAL DISTRICTS

Districtwise analysis indicates that the total number of mineral bearing districts are around 266 falling in 23 States in the country. Out of these, 16 districts in 6 States are considered as highly potential districts in each of which more than 100 mining leases are granted. There are 2,473 mining leases granted covering an area of 107,515 hectares in the country. These constitute 36% of total number of mining leases and cover around 24% of total area. Information on the number of mining leases granted in highly potential districts is furnished in Table-5.

TABLE - 5 : HIGH MINERAL POTENTIAL DISTRICTS

Sl. No.	District	No. of leases	No. of Minerals	Area of leases (Hect.)	States
1	Anantapur	142	14	3,464.98	Andhra Pradesh
2	Cuddapah	184	16	5,002.59	Andhra Pradesh
3	Kurnool	222	14	4,582.12	Andhra Pradesh
4	Mahbubnagar	104	2	663.63	Andhra Pradesh
5	Nellore	234	10	4,328.05	Andhra Pradesh
6	Prakasam	109	6	2,466.04	Andhra Pradesh
7	South Goa	150	3	10,930.66	Goa
8	Jamnagar	182	6	5,428.87	Gujarat
9	Junagarh	118	2	2,764.65	Gujarat
10	Porbandar	302	4	3,847.78	Gujarat
11	Katni	126	9	1,794.50	Madhya Pradesh
12	Satna	154	6	5,145.51	Madhya Pradesh
13	Keonjhar	101	7	33,715.57	Orissa
14	Ajmer	122	11	4,859.17	Rajasthan
15	Bhilwara	114	9	5,535.60	Rajasthan
16	Udaipur	109	11	12,985.69	Rajasthan
Total		2,473		107,515.41	

ii) **MEDIUM MINERAL POTENTIAL DISTRICTS**

Mining leases granted between 50 to 100 are considered as medium potential districts. There are 1,468 mining leases granted in 20 districts covering an area of 87,921 hectares in the country. These constitute 21% of total number of mining leases and cover over 19% of total area. Information on the number of mining leases granted in medium potential districts is furnished in Table-6.

TABLE -6 : MEDIUM MINERAL POTENTIAL DISTRICTS

Sl. No.	District	No. of leases	No. of Minerals	Area of Leases (Hect.)	States
1	Nalgonda	52	3	4883.34	Andhra Pradesh
2	Rangareddi	56	7	1673.79	Andhra Pradesh
3	Vizianagaram	73	6	1,266.86	Andhra Pradesh
4	Durg	90	5	3,662.83	Chhattisgarh
5	North Goa	100	2	7,235.33	Goa
6	Kachchh	69	8	1,558.44	Gujarat
7	Sabarkantha	61	9	884.30	Gujarat
8	Surendranagar	78	4	460.32	Gujarat
9	Vadodara	99	5	1,282.42	Gujarat
10	Gurgaon	66	4	4,974.23	Haryana
11	Bagalkot	54	3	3,404.18	Karnataka
12	Bellary	82	6	5,723.78	Karnataka
13	Bolangir	69	5	1,860.42	Orissa
14	Sundergarh	90	10	14,736.86	Orissa
15	Bikaner	90	4	11,529.69	Rajasthan
16	Dungarpur	74	3	4,931.37	Rajasthan
17	Jaipur	78	13	6,218.06	Rajasthan
18	Rajsamand	84	7	6,141.92	Rajasthan
19	Sikar	50	9	4,100.24	Rajasthan
20	Salem	53	4	1,392.63	Tamil Nadu
Total		1,468		87,921.01	

ii) **LOW MINERAL POTENTIAL DISTRICTS**

Mining leases granted below 50 are considered as low mineral potential districts. There are 3,000 mining leases granted in 230 districts covering an area of 2,58,187 hectares in the country. These account for 43% of the leases, covering 57% of the total area. Statewise distribution of low potential districts and area covered is given in Table-7.

**TABLE -7 : LOW MINERAL POTENTIAL DISTRICTS
(BY STATE)**

Sl. No.	State	No. of Districts	No. of Lease	Lease Area (Hect)
1	Andhra Pradesh	13	352	23,425.36
2	Assam	2	11	981.33
3	Bihar	3	12	2,087.77
4	Chhattisgarh	13	179	26,789.79
5	Gujarat	11	166	7,406.03
6	Haryana	5	74	10,059.32
7	Himachal Pradesh	5	58	2,018.58
8	Jammu & Kashmir	8	18	729.58
9	Jharkhand	15	201	28,530.38
10	Karnataka	21	256	27,455.21
11	Kerala	8	101	2,205.49
12	Madhya Pradesh	27	404	11,483.59
13	Maharashtra	12	223	15,335.65
14	Manipur	2	2	610.17
15	Meghalaya	4	14	1,660.16
16	Orissa	17	179	26,875.47
17	Rajasthan	20	338	48,193.90
18	Sikkim	2	4	86.00
19	Tamil Nadu	25	275	4,074.68
20	Uttar Pradesh	6	40	5,120.63
21	Uttaranchal	5	42	1,485.36
22	West Bengal	6	51	11,572.76
Total		230	3,000	258,187.21

3.3 MINERALWISE ANALYSIS

The total number of naturally occurring minerals/metals for which the mining leases are granted in the country are 59 minerals. These minerals/metals are broadly classified into metallic and non-metallic minerals.

(i) METALLIC MINERALS

The metallic minerals include ferrous, non-ferrous and noble metals. The ferrous group includes iron ore, manganese ore, chromite and tungsten, where non-ferrous group consists of antimony ores, bauxite, copper, lead & zinc ore, molybdenum, nickel and vanadium. The noble metal group includes gold, silver and platinum group of metals. There are no commercial mining leases for silver and platinum group of metals at present in the country.

Metallic minerals for which mining leases are granted as on 31.3.2004 are 8 in number and the number of leases are 1,038 or 15% of the total mining leases with an area of 1,59,925 hectares (35% of the total mining lease area in the country). Out of the eight metallic minerals, the total number of mining leases granted for iron ore is placed at 474 followed by bauxite (266), manganese ore (225), chromite (29) and copper ore (17). These five minerals account for 1,011 mining leases (97% of the mining leases for metallic minerals) with an area of 1,44,897 hectares (91% of the lease area of metallic minerals). The distribution of mining leases for metallic minerals is given in Table-8.

TABLE-8 : DISTRIBUTION OF MINING LEASES FOR METALLIC MINERALS

Sl.No.	Mineral /Metal	No. of leases executed	Area in hectares
1	Bauxite	266	24,592.93
2.	Chromite	29	8,548.71
3.	Copper ore	17	10,589.86
4.	Gold	9	6,683.12
5.	Iron ore	474	79,041.71
6.	Lead & zinc ore	12	8,221.35
7.	Manganese ore	225	22,123.60
8.	Tin	6	123.80
	Total	1038	159,925.08

ii) **NON-METALLIC MINERALS**

There are 51 major non-metallic or industrial minerals for which leases are granted in the country. The number of mining leases granted for these minerals are placed at 5903 (85% of the total mining leases) with an area of 293,699 hectares (65% of the total lease area). Distribution of mining leases for non-metallic minerals is given in Table-9.

**TABLE- 9 : DISTRIBUTION OF MINING LEASES FOR
NON-METALLIC MINERALS**

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
1	Agate	2	45.58
2	Amethyst	5	40.64
3	Apatite	1	13.29
4	Asbestos	39	1,846.89
5	Ball clay	41	2,146.19
6	Barytes	119	2,494.20
7	Calcareous sand	14	151.75
8	Calcite	57	1,593.63
9	Chalk	159	656.24
10	China clay	380	16,312.65
11	Clay (others)	43	937.95
12	Corundum	12	145.41
13	Diamond	2	576.51
14	Diaspore	17	185.98
15	Dolomite	423	15,600.52
16	Dunite	1	4.45
17	Epidote	1	5.00
18	Felsite	2	5.10
19	Felspar	166	5,076.57
20	Fire clay	220	16,401.86
21	Fluorite	18	1,807.41
22	Garnet	68	1,038.83
23	Graphite	132	4,657.94
24	Gypsum	52	18,036.24
25	Iolite	4	24.38
26	Jaspar	5	211.70
27	Kyanite	23	3,056.25
28	Laterite	114	1,129.33
29	Lime kankar	24	891.14
30	Limeshell	29	3,793.13
31	Limestone	1,411	106,260.41
32	Magnesite	27	2,297.14
33	Mica	243	7,807.76
34	Moulding sand	39	738.70
35	Ochre	102	3,382.79
36	Opal	1	200.00
37	Perlite	1	144.65

(contd.)

Table-9 (concl.)

Sl. No.	Mineral	No. of Leases	Lease Area (Hect.)
38	Phosphorite	16	3,492.77
39	Pyrite	1	647.50
40	Pyrophyllite	66	2,116.04
41	Quartz	845	12,780.42
42	Quartzite	53	624.60
43	Rock salt	3	53.86
44	Sand (others)	46	4,716.79
45	Shale	27	402.14
46	Silica sand	417	18,721.90
47	Sillimanite	5	9,945.84
48	Slate	17	868.47
49	Steatite	395	19,194.97
50	Vermiculite	11	212.55
51	Wollastonite	4	202.49
Total		5903	293,698.55

The mineralwise/statewise distribution of lease and lease area as on 31.3.2004 is given in Table 10.

**TABLE -10 : MINERALWISE/STATEWISE DISTRIBUTION OF
LEASES AND LEASE AREA (as on 31.03.2004)**

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
1	Agate	Gujarat	1	4.64
		Maharashtra	1	40.94
		Total	2	45.58
2	Amethyst	Andhra Pradesh	4	12.99
		Orissa	1	27.65
		Total	5	40.64
3	Apatite	Andhra Pradesh	1	13.29
		Total	1	13.29
4	Asbestos	Andhra Pradesh	7	352.08
		Orissa	1	49.22
		Rajasthan	31	1,445.59
		Total	39	1,846.89
5	Ball clay	Andhra Pradesh	20	254.01
		Gujarat	3	10.49
		Rajasthan	18	1,881.69
		Total	41	2,146.19
6	Barytes	Andhra Pradesh	109	2,190.76
		Haryana	1	79.32
		Himachal Pradesh	2	81.39
		Karnataka	1	17.00
		Madhya Pradesh	2	5.37
		Rajasthan	4	120.36
		Total	119	2,494.20
7	Bauxite	Chhattisgarh	12	5,640.85
		Goa	1	40.92
		Gujarat	149	4,040.71
		Jharkhand	39	3,625.18
		Karnataka	1	28.80
		Kerala	3	1.37
		Madhya Pradesh	35	795.09
		Maharashtra	20	4,182.46
		Orissa	4	6,079.09
		Tamil Nadu	2	158.46
		Total	266	24,592.93
		8	Calcareous sand	Gujarat
Total	14			151.75

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
9	Calcite	Andhra Pradesh	5	139.20
		Gujarat	5	63.31
		Haryana	2	158.56
		Karnataka	1	17.00
		Madhya Pradesh	24	63.26
		Rajasthan	20	1,152.30
	Total	57	1,593.63	
10	Chalk	Gujarat	159	656.24
		Total	159	656.24
11	China clay	Andhra Pradesh	57	893.40
		Chhattisgarh	5	13.16
		Gujarat	45	1,204.07
		Haryana	39	3,243.30
		Jharkhand	8	219.48
		Karnataka	13	839.51
		Kerala	41	95.56
		Madhya Pradesh	16	130.89
		Maharashtra	9	91.77
		Meghalaya	2	9.77
		Orissa	11	797.28
		Rajasthan	105	8,153.24
		Tamil Nadu	2	15.55
West Bengal	27	605.67		
	Total	380	16,312.65	
12	Chromite	Karnataka	6	987.47
		Maharashtra	1	16.22
		Manipur	2	610.17
		Orissa	20	6,934.85
		Total	29	8,548.71
13	Clay (others)	Andhra Pradesh	5	215.18
		Gujarat	35	701.21
		Karnataka	1	20.23
		Madhya Pradesh	2	1.33
		Total	43	937.95
14	Copper ore	Gujarat	1	1,402.00
		Jharkhand	3	6,417.69
		Karnataka	3	487.65
		Madhya Pradesh	2	479.90
		Rajasthan	5	1,717.95
		Sikkim	3	84.67
	Total	17	10,589.86	

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
15	Corundum	Andhra Pradesh	6	35.93
		Karnataka	4	18.07
		Orissa	2	91.41
		Total	12	145.41
16	Diamond	Madhya Pradesh	2	576.51
		Total	2	576.51
17	Diaspore	Madhya Pradesh	11	80.11
		Uttar Pradesh	6	105.87
		Total	17	185.98
18	Dolomite	Andhra Pradesh	95	1,601.85
		Chhattisgarh	82	9,062.31
		Gujarat	98	1,225.04
		Haryana	2	252.15
		Jharkhand	1	18.45
		Karnataka	14	305.10
		Madhya Pradesh	99	483.42
		Maharashtra	11	185.08
		Orissa	8	877.21
		Rajasthan	8	579.28
		Sikkim	1	1.33
		Tamil Nadu	1	62.07
		Uttaranchal	1	20.23
		West Bengal	2	927.00
Total	423	15,600.52		
19	Dunite	Karnataka	1	4.45
		Total	1	4.45
20	Epidote	Rajasthan	1	5.00
		Total	1	5.00
21	Felsite	Karnataka	2	5.10
		Total	2	5.10
22	Felspar	Andhra Pradesh	34	529.68
		Gujarat	1	1.00
		Haryana	3	285.06
		Jharkhand	6	200.25
		Karnataka	4	131.91
		Maharashtra	2	53.65
		Rajasthan	114	3,833.32
		Tamil Nadu	1	39.47
		West Bengal	1	2.23
Total	166	5,076.57		

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
23	Fire clay	Andhra Pradesh	24	82.31
		Chhattisgarh	4	16.24
		Gujarat	72	374.70
		Jharkhand	20	730.86
		Karnataka	3	390.51
		Madhya Pradesh	32	291.23
		Maharashtra	2	18.40
		Meghalaya	1	221.44
		Orissa	17	1,899.59
		Rajasthan	25	2,383.60
		Tamil Nadu	11	52.17
		West Bengal	9	9,940.81
		Total	220	16,401.86
		24	Fluorite	Gujarat
Maharashtra	1			32.70
Rajasthan	15			1,743.02
Total	18			1,807.41
25	Garnet	Andhra Pradesh	13	220.00
		Rajasthan	14	340.99
		Tamil Nadu	41	477.84
		Total	68	1,038.83
26	Gold	Andhra Pradesh	3	408.86
		Karnataka	6	6,274.26
		Total	9	6,683.12
27	Graphite	Andhra Pradesh	4	81.51
		Chhattisgarh	3	98.79
		Jharkhand	13	405.44
		Karnataka	4	235.04
		Orissa	101	3,161.99
		Rajasthan	2	383.55
		Tamil Nadu	5	291.62
		Total	132	4,657.94
28	Gypsum	Gujarat	2	6.76
		Himachal Pradesh	1	116.68
		Jammu & Kashmir	3	57.71
		Rajasthan	40	17,465.37
		Tamil Nadu	4	203.57
		Uttaranchal	2	186.15
		Total	52	18,036.24
29	Iolite	Orissa	4	24.38
		Total	4	24.38

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
30	Iron ore	Andhra Pradesh	25	1,511.15
		Chhattisgarh	15	10,699.49
		Goa	187	14,002.79
		Haryana	1	80.20
		Jharkhand	25	9,675.37
		Karnataka	72	10,446.58
		Madhya Pradesh	8	122.84
		Maharashtra	25	870.12
		Orissa	102	30,732.88
		Rajasthan	14	894.29
		Total	474	79,041.71
31	Jasper	Rajasthan	5	211.70
		Total	5	211.70
32	Kyanite	Jharkhand	5	2,560.22
		Karnataka	5	200.70
		Maharashtra	13	295.33
		Total	23	3,056.25
33	Laterite	Andhra Pradesh	78	642.44
		Karnataka	2	95.21
		Kerala	1	0.19
		Madhya Pradesh	31	348.46
		Maharashtra	2	43.03
		Total	114	1,129.33
34	Lead & zinc ore	Andhra Pradesh	1	200.00
		Madhya Pradesh	1	11.00
		Orissa	2	504.86
		Rajasthan	8	7,505.49
		Total	12	8,221.35
35	Lime kankar	Andhra Pradesh	19	137.65
		Haryana	4	705.35
		Orissa	1	48.14
		Total	24	891.14
36	Limeshell	Andhra Pradesh	5	163.38
		Karnataka	14	1,404.01
		Kerala	8	1,496.69
		Tamil Nadu	2	729.05
		Total	29	3,793.13

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
37	Limestone	Andhra Pradesh	201	21,484.88
		Assam	11	981.33
		Bihar	7	182.17
		Chhattisgarh	110	4,588.83
		Gujarat	368	12,427.28
		Haryana	11	592.51
		Himachal Pradesh	52	1,766.65
		Jammu & Kashmir	12	331.07
		Jharkhand	16	1,673.81
		Karnataka	88	8,380.27
		Kerala	1	245.69
		Madhya Pradesh	264	12,259.05
		Maharashtra	51	5,976.70
		Meghalaya	10	1,424.05
		Orissa	34	8,798.36
		Rajasthan	52	20,408.73
		Tamil Nadu	115	1,926.77
		Uttar Pradesh	4	2,706.15
		Uttaranchal	3	105.44
		West Bengal	1	0.67
			Total	1,411
38	Magnesite	Andhra Pradesh	1	6.57
		Jammu & Kashmir	2	140.80
		Karnataka	7	406.47
		Orissa	1	40.46
		Rajasthan	3	15.00
		Tamil Nadu	11	1,195.64
		Uttaranchal	2	492.20
		Total	27	2,297.14
39	Manganese ore	Andhra Pradesh	42	1,124.83
		Goa	62	4,122.28
		Gujarat	1	2.95
		Karnataka	26	2,719.58
		Madhya Pradesh	27	1,446.91
		Maharashtra	32	1,094.64
		Orissa	34	11,532.41
		Rajasthan	1	80.00
		Total	225	22,123.60
		40	Mica	Andhra Pradesh
Bihar	2			1,196.80
Haryana	1			400.00
Jharkhand	29			964.39
Maharashtra	1			42.06
Orissa	1			2.67
Rajasthan	98			3,062.03
Total	243	7,807.76		

(contd..)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
41	Moulding sand	Andhra Pradesh	1	31.16
		Chhattisgarh	7	64.70
		Gujarat	4	6.83
		Karnataka	24	586.99
		Maharashtra	1	47.02
		West Bengal	2	2.00
		Total	39	738.70
42	Ochre	Andhra Pradesh	18	189.81
		Chhattisgarh	1	10.12
		Gujarat	5	45.35
		Jharkhand	1	5.62
		Karnataka	5	617.18
		Madhya Pradesh	44	572.10
		Maharashtra	1	12.36
		Orissa	2	197.77
		Rajasthan	24	1,726.72
		West Bengal	1	5.76
		Total	102	3,382.79
		43	Opal	Jammu & Kashmir
Total	1			200.00
44	Perlite	Gujarat	1	144.65
		Total	1	144.65
45	Phosphorite	Andhra Pradesh	1	2.83
		Madhya Pradesh	4	112.88
		Rajasthan	7	2,251.88
		Uttar Pradesh	1	874.00
		Uttaranchal	2	222.05
		West Bengal	1	29.13
		Total	15	3,490.57
56	Pyrite	Bihar	1	647.50
		Total	1	647.50
47	Pyrophyllite	Andhra Pradesh	6	169.74
		Jharkhand	1	22.50
		Madhya Pradesh	36	245.00
		Orissa	10	576.96
		Rajasthan	6	308.16
		Uttar Pradesh	7	793.68
		Total	66	2,116.04

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
48	Quartz	Andhra Pradesh	407	5,306.28
		Bihar	2	61.30
		Chhattisgarh	6	18.05
		Gujarat	31	209.26
		Haryana	16	851.85
		Jharkhand	18	236.36
		Karnataka	47	454.38
		Kerala	2	3.21
		Madhya Pradesh	6	44.07
		Maharashtra	8	139.86
		Orissa	59	1,236.21
		Rajasthan	116	3,971.07
		Tamil Nadu	122	237.82
		West Bengal	5	10.70
		Total	845	12,780.42
49	Quartzite	Andhra Pradesh	15	169.86
		Chhattisgarh	16	166.00
		Gujarat	1	19.30
		Haryana	4	68.23
		Karnataka	1	4.05
		Madhya Pradesh	1	6.10
		Maharashtra	1	12.09
		Orissa	12	169.27
		Rajasthan	1	5.00
		West Bengal	1	4.70
		Total	53	624.60
		50	Rock salt	Himachal Pradesh
Total	3			53.86
51	Sand (others)	Andhra Pradesh	12	1,722.10
		Jharkhand	13	1,765.35
		Madhya Pradesh	2	7.52
		Maharashtra	12	740.30
		Orissa	6	437.43
		West Bengal	1	44.09
		Total	46	4,716.79
52	Shale	Andhra Pradesh	10	177.40
		Madhya Pradesh	14	173.36
		Maharashtra	1	41.48
		Meghalaya	1	4.90
		Rajasthan	1	5.00
		Total	27	402.14

(contd.)

Sl. No.	Mineral	State	No. of Lease	Lease Area (Hect.)
53	Silica sand	Andhra Pradesh	71	1,070.85
		Gujarat	69	856.50
		Haryana	52	7,959.30
		Karnataka	30	1,345.01
		Kerala	42	35.43
		Madhya Pradesh	4	6.25
		Maharashtra	28	1,399.44
		Rajasthan	92	5,391.18
		Tamil Nadu	7	17.01
		Uttar Pradesh	22	640.93
		Total	417	18,721.90
54	Silimanite	Andhra Pradesh	1	7,000.00
		Kerala	3	327.35
		Orissa	1	2,618.49
		Total	5	9,945.84
55	Slate	Andhra Pradesh	12	461.26
		Haryana	4	351.72
		Madhya Pradesh	1	55.49
		Total	17	868.47
56	Steatite	Andhra Pradesh	98	918.43
		Chhattisgarh	4	7.89
		Gujarat	6	22.04
		Jharkhand	3	9.41
		Karnataka	6	134.34
		Madhya Pradesh	16	105.46
		Orissa	3	292.13
		Rajasthan	224	17,209.42
		Tamil Nadu	3	36.56
		Uttaranchal	32	459.29
		Total	395	19,194.97
57	Tin	Chhattisgarh	4	66.19
		Orissa	2	57.61
		Total	6	123.80
58	Vermiculite	Andhra Pradesh	6	95.28
		Gujarat	2	25.04
		Karnataka	1	26.30
		Rajasthan	1	42.22
		Tamil Nadu	1	23.71
		Total	11	212.55
59	Wollastonite	Rajasthan	4	202.49
		Total	4	202.49

3.4 FREQUENCY DISTRIBUTION OF MINING LEASES

The number of mining leases so far granted for various minerals are classified into eight categories :

- Category – I** : Includes minerals for which number of mining leases granted is between 1,001-2000;
- Category – II** : Includes minerals for which number of mining leases granted are between 501 and 1,000;
- Category – III** : Includes minerals for which number of mining leases granted are between 401 and 500;
- Category – IV** : Includes minerals for which number of mining leases granted are between 301 and 400;
- Category – V** : Includes minerals for which number of mining leases granted is between 201 and 300;
- Category – VI** : Includes minerals for which number of mining leases granted are between 101 and 200;
- Category – VII** : Includes minerals for which number of mining leases granted are between 51 and 100 and
- Category – VIII** : Includes minerals for which number of mining leases granted are between 1 and 50.

Frequency distribution of mining leases by minerals are furnished in Table-10.

Number of minerals, their mining leases and area of leases covered category-wise are summarised as below :

Category	No. of Mineral	No. of mining leases		Lease area in hect.	
		No. of leases	Percentage	Lease area	Percentage
I	1	1,411	20.32	1,06,260.41	23.42
II	1	845	12.17	12,780.42	2.82
III	3	1,314	18.93	1,13,364.13	24.99
IV	2	775	11.17	35,507.62	7.83
V	4	954	13.75	70,926.15	15.64
VI	6	792	11.41	17,397.07	3.84
VII	5	296	4.26	23,409.34	5.16
VIII	38	554	7.98	73,978.49	16.31
Total	59	6,941	100.00	4,53,623.63	100.00

TABLE-11 : FREQUENCY DISTRIBUTION OF MINING LEASES

Category	No. of Lease Granted	Mineral	No. of Mining Lease Granted	Lease Area in Hectares
I	>1000	Limestone	1,411	106,260.41
		Total	1,411	106,260.41
II	Between 501 to 1,000	Quartz	845	12780.42
		Total	845	12780.42
III	Between 401 to 500	Dolomite	423	15,600.52
		Iron ore	474	79,041.71
		Silica sand	417	18,721.90
		Total	1,314	113,364.13
IV	Between 301 to 400	China clay	380	16,312.65
		Steatite	395	19,194.97
		Total	775	35,507.62
V	Between 201 to 300	Bauxite	266	24592.93
		Fire clay	220	16401.86
		Manganese ore	225	22123.6
		Mica	243	7807.76
		Total	954	70,926.15
VI	Between 101 to 200	Barytes	119	2,494.20
		Chalk	159	656.24
		Felspar	166	5,076.57
		Graphite	132	4,657.94
		Laterite	114	1,129.33
		Ochre	102	3,382.79
		Total	792	17,397.07
VII	Between 51 to 100	Calcite	57	1,593.63
		Garnet	68	1,038.83
		Gypsum	52	18,036.24
		Pyrophyllite	66	2,116.04
		Quartzite	53	624.60
		Total	296	23,409.34
VIII	Between 50 to 1	Agate	2	45.58
		Amethyst	5	40.64
		Apatite	1	13.29
		Asbestos	39	1,846.89
		Ball clay	41	2,146.19

(contd.)

Category	No. of Lease Granted	Mineral	No. of Mining Lease Granted	Lease Area in Hectares
VIII	Between 50 to 1 (contd.)	Limestone	1,411	106,260.41
		Calcareous sand	14	151.75
		Chromite	29	8,548.71
		Clay (others)	43	937.95
		Copper ore	17	10,589.86
		Corundum	12	145.41
		Diamond	2	576.51
		Diaspore	17	185.98
		Dunite	1	4.45
		Epidote	1	5.00
		Felsite	2	5.10
		Fluorite	18	1,807.41
		Gold	9	6,683.12
		Iolite	4	24.38
		Jasper	5	211.70
		Kyanite	23	3,056.25
		Lead & zinc ore	12	8,221.35
		Lime kankar	24	891.14
		Limeshell	29	3,793.13
		Magnesite	27	2,297.14
		Moulding sand	39	738.70
		Opal	1	200.00
		Perlite	1	144.65
		Phosphorite	16	3,492.77
		Pyrite	1	647.50
		Rock salt	3	53.86
		Sand (others)	46	4,716.79
		Shale	27	402.14
		Sillimanite	5	9,945.84
		Slate	17	868.47
		Tin	6	123.80
		Vermiculite	11	212.55
Wollastonite	4	202.49		
		Total	554	73,978.49

3.5 MUSEUM DISTRICTS OF MINERALS

The concentration of both number and wide variety of minerals is confined to as many as 67 districts covering 12 States which have more than 4 varieties of minerals. Cuddapah, Anantapur, Kurnool, Khamam districts of Andhra Pradesh, Jaipur, Ajmer and Udaipur districts of Rajasthan are considered as museum districts of minerals.

3.6 SECTORWISE DISTRIBUTION OF MINING LEASES

Mining leases are in force both in the private and public sectors including Central and State Govt. Undertakings. Out of the total 6,941 mining leases in the country, 502 (7.23%) leases are granted in the Public Sector extending over an area of 1,64,412.56 hectares and the remaining mining leases with an area of 2,89,211.07 hectares are in the private sector. Most of the metallic minerals namely bauxite, chromite, copper ore, lead & zinc ores, gold, iron ore & manganese ore and non-metallic minerals like limestone, dolomite, pyrite, apatite, barytes, fluorite, asbestos, kyanite, magnesite, etc. are being exploited by both public and private sectors.

i) CENTRAL GOVERNMENT PUBLIC SECTOR UNDERTAKINGS

There are 205 number of mining leases granted in 18 States for different minerals, covering an area of 83,865.02 hectares. The States rich in minerals where maximum number of mining leases granted for Central Public Sector Undertakings are Maharashtra (15.20%) followed by Andhra Pradesh (14.70%), Madhya Pradesh (12.74%), Rajasthan (11.27%), Chhattisgarh (9.80%), Jharkhand & Orissa (8.82% each) and Tamil Nadu (5.88%). These eight States together account for over 87% of total leases executed and remaining States account for 13%.

The maximum mining lease area covered by different States are Jharkhand (19.34%) followed by Chhattisgarh (16.38%), Orissa (15.33%), Rajasthan (13.86%), Karnataka (13.72%), Andhra Pradesh (7.84%) and Madhya Pradesh (6.42%). These seven States account for 93% of total lease area granted and remaining States account for 7%.

ii) STATE GOVERNMENT PUBLIC SECTOR UNDERTAKINGS

There are 297 number of mining leases granted in 19 States for different minerals, covering an area of 80,547.54 hectares. The States rich in minerals where maximum number of mining leases granted are Karnataka (18.52%) followed by Rajasthan (17.50%), Orissa & Tamil Nadu (15.82%) each, Maharashtra (5.38%), Andhra Pradesh (4.71%), Haryana (4.38%) and Gujarat (3.70%). These eight States together account for 86% of total leases granted and remaining States account for remaining 14% of mining leases of State Public Sector.

The maximum mining lease area covered by different States are Orissa (35.18%) followed by Rajasthan (32.18%), Karnataka (10.05%), Uttar Pradesh (5.40%), Gujarat (4.49%), Tamil Nadu (3.21%) and Haryana (2.41%). These seven States account for 93% of total lease area executed and remaining States account for remaining 7%.

Statewise and Sectorwise distribution of mining leases is given in Tables-12 to 14.

TABLE-12 : SECTORWISE DISTRIBUTION OF MINING LEASES
(as on 31/03/2004)
(Public Sector and Private Sector)

Sl. No	State	Total		Public Sector		Private Sector	
		No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
1.	Andhra Pradesh	1,528	51,756.76	44	7,719.58	1,484	44,037.18
2.	Assam	11	981.33	2	338.00	9	643.33
3.	Bihar	12	2,087.77	1	647.50	11	1,440.27
4.	Chhattisgarh	269	30,452.62	27	14,392.80	242	16,059.82
5.	Goa	250	18,165.99	--	--	250	18,165.99
6.	Gujarat	1,075	23,632.81	11	3,614.69	1,064	20,018.12
7.	Haryana	140	15,033.55	17	2,645.88	123	12,387.67
8.	Himachal Pradesh	58	2,018.58	5	547.76	53	1,470.82
9.	Jammu & Kashmir	18	729.58	3	240.80	15	488.78
10.	Jharkhand	201	28,530.38	23	16,537.39	178	11,992.99
11.	Karnataka	392	36,583.17	62	19,597.28	330	16,985.89
12.	Kerala	101	2,205.49	5	577.26	96	1,628.23
13.	Madhya Pradesh	684	18,423.60	32	5,498.28	652	12,925.32
14.	Maharashtra	223	15,335.65	47	2,216.29	176	13,119.36
15.	Manipur	2	610.17	--	--	2	610.17
16.	Meghalaya	14	1,660.16	4	1,000.07	10	660.09
17.	Orissa	439	77,188.32	65	41,184.15	374	36,004.17
18.	Rajasthan	1,059	104,495.64	75	37,540.48	984	66,955.16
19.	Sikkim	4	86.00	3	84.67	1	1.33
20.	Tamil Nadu	328	5,467.31	59	3,605.87	269	1,861.44
21.	Uttar Pradesh	40	5,120.63	9	4,387.93	31	732.70
22.	Uttaranchal	42	1,485.36	5	811.25	37	674.11
23.	West Bengal	51	11,572.76	3	1,224.63	48	10,348.13
Total		6,941	453,623.63	502	164,412.56	6,439	289,211.07

TABLE-13 : DISTRIBUTION OF MINING LEASES IN PUBLIC SECTOR
(as on 31/03/2004)
(Central Govt and State Govt.)

Sl. No	State	Public Sector (Total)		Central Govt.		State Govt.	
		No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
1.	Andhra Pradesh	44	7,719.58	30	6,569.20	14	1,150.38
2.	Assam	2	338.00	1	171.00	1	167.00
3.	Bihar	1	647.50	1	647.50	--	--
4.	Chhattisgarh	27	14,392.80	20	13,730.70	7	662.10
5.	Gujarat	11	3,614.69	--	--	11	3,614.69
6.	Haryana	17	2,645.88	4	705.35	13	1,940.53
7.	Himachal Pradesh	5	547.76	5	547.76	--	--
8.	Jammu & Kashmir	3	240.80	1	140.80	2	100.00
9.	Jharkhand	23	16,537.39	18	16,211.98	5	325.41
10.	Karnataka	62	19,597.28	7	11,505.40	55	8,091.88
11.	Kerala	5	577.26	2	169.71	3	407.55
12.	Madhya Pradesh	32	5,498.28	26	5,377.88	6	120.40
13.	Maharashtra	47	2,216.29	31	1,503.96	16	712.33
14.	Meghalaya	4	1,000.07	--	--	4	1,000.07
15.	Orissa	65	41,184.15	18	12,847.88	47	28,336.27
16.	Rajasthan	75	37,540.48	23	11,619.43	52	25,921.05
17.	Sikkim	3	84.67	--	--	3	84.67
18.	Tamil Nadu	59	3,605.87	12	1,020.14	47	2,585.73
19.	Uttar Pradesh	9	4,387.93	1	33.58	8	4,354.35
20.	Uttaranchal	5	811.25	4	714.25	1	97.00
21.	West Bengal	3	1,224.63	1	348.50	2	876.13
Total		502	164,412.56	205	83,865.02	297	80,547.54

TABLE-14 : SECTORWISE SUMMARY OF LEASE DISTRIBUTION
(as on 31.03.2004)
(By State/District/Mineral)

State	District	Mineral	Central Govt.		State Govt.		Total		
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	
Andhra Pradesh	Adilabad	Limestone	1	839.41	1	809.38	2	1,648.79	
	Anantapur	Gold	1	168.42	-	-	1	168.42	
	Chittoor	Gold	2	240.44	-	-	2	240.44	
	Cuddapah	Barytes	-	-	4	161.73	4	161.73	
	Godavari (West)	China clay	-	-	2	24.39	2	24.39	
	Guntur	Lead & zinc	1	200.00	-	-	1	200.00	
	Karimnagar	Sand (others)	5	1,602.00	-	-	5	1,602.00	
	Khammam	Dolomite	1	384.61	-	-	1	384.61	
		Sand (others)	3	15.88	-	-	3	15.88	
	Krishna	Limestone	1	1,295.00	-	-	1	1,295.00	
	Mahbubnagar	Felspar	1	17.82	-	-	1	17.82	
	Prakasam	Iron ore	1	266.33	-	-	1	266.33	
	Rangareddi	Laterite	1	41.41	-	-	1	41.41	
		Limestone	2	868.74	-	-	2	868.74	
		Shale	1	133.07	-	-	1	133.07	
		Srikakulam	Silica sand	1	7.50	-	-	1	7.50
	Visakhapatnam	Apatite	-	-	1	13.29	1	13.29	
		Mica	-	-	2	48.68	2	48.68	
		Phosphorite	-	-	1	2.83	1	2.83	
		Quartz	1	3.24	-	-	1	3.24	
		Vizianagaram	Manganese ore	5	389.50	3	90.08	8	479.58
	Vizianagaram	Moulding sand	1	31.16	-	-	1	31.16	
		Sand (others)	1	64.67	-	-	1	64.67	
		Total	30	6,569.20	14	1,150.38	44	7,719.58	
	Assam	Karbi Anglong	Limestone	1	171.00	-	-	1	171.00
		North Cachar Hills	Limestone	-	-	1	167.00	1	167.00
		Total	1	171.00	1	167	2	338.00	
Bihar	Rohtas	Pyrite	1	647.50	-	-	1	647.50	
	Total	1	647.50	-	-	1	647.50		
Chhattisgarh	Bilaspur	Dolomite	2	1562.12	-	-	2	1,562.12	
	Dantewara	Iron ore	6	6886.9	-	-	6	6,886.90	
		Tin	-	-	3	58.45	0	58.45	
		Durg	Dolomite	-	-	1	22.15	1	22.15
	Durg	Iron ore	4	2,732.62	-	-	4	2,732.62	
		Limestone	3	198.03	-	-	3	198.03	
		Moulding sand	1	24.98	-	-	1	24.98	
	Janjgir-Champa	Dolomite	1	122.70	-	-	1	122.70	
	Kanker	Iron ore	1	938.06	-	-	1	938.06	
	Kawardha	Bauxite	1	626.12	-	-	1	626.12	
	Surguja	Bauxite	1	639.17	3	581.50	4	1,220.67	
Total	20	13,730.70	7	662.10	27	14,392.80			

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Gujarat	Banaskantha	Copper ore	-	-	1	1,402.00	1	1,402.00
	Jamnagar	Bauxite	-	-	2	189.79	2	189.79
	Kachchh	Bauxite	-	-	6	486.95	6	486.95
	Surat	Limestone	-	-	1	1504.75	1	1,504.75
	Vadodara	Fluorite	-	-	1	31.20	1	31.20
		Total			11	3,614.69	11	3,614.69
Haryana	Bhiwani	Lime kankar	5	705.35	-	-	5	705.35
	Faridabad	China clay	-	-	1	70.00	1	70.00
		Silica sand	-	-	4	1283.09	4	1,283.09
		Silica sand	-	-	3	239.76	3	239.76
	Mahendragarh	Felspar	-	-	1	23.61	1	23.61
		Iron ore	-	-	1	86.20	1	86.20
		Limestone	-	-	1	9.85	1	9.85
	Rewari	Slate	-	-	2	228.02	2	228.02
		Total		4	705.35	13	1940.53	18
Himachal Pradesh	Mandi	Rock salt	3	53.86	-	-	3	53.86
	Simmur	Limestone	1	255.70	-	-	1	255.70
	Solan	Limestone	1	238.2	-	-	1	238.20
		Total	5	547.76			5	547.76
Jammu & Kashmir	Pulwama	Limestone	-	-	1	100.00	1	100.00
	Udhampur	Magnesite	1	140.80	1	N.A.	2	140.80
		Total	1	140.80	2	100	3	240.80
Jharkhand	Garwah	Limestone	3	1,178.92	-	-	3	1,178.92
	Palamau	Graphite	-	-	1	15.18	1	15.18
	Ranchi	Limestone	-	-	2	239.63	2	239.63
	Singhbhum (East)	Copper ore	3	6,417.69	-	-	3	6,417.69
		Kyanite	-	-	1	2.43	1	2.43
	Singhbhum (West)	Iron ore	11	6867.12	-	-	11	6,867.12
		Kyanite	1	1,748.25	1	68.17	2	1,816.42
	Total	18	16,211.98	5	325.41	23	16,537.39	
Karnataka	Bagalkot	Dolomite	-	-	2	253.29	2	253.29
		Limestone	-	-	10	2,550.36	10	2,550.36
	Bangalore	Felsper	-	-	3	130.30	3	130.30
		Limestone	-	-	2	351.12	2	351.12
	Bellary	Iron ore	2	1,255.50	8	782.30	10	2,037.80
	Chickmagalur	Iron ore	1	4,605.00	-	-	1	4,605.00
	Chitradurga	Copper ore	-	-	2	416.83	2	416.83
		Limestone	-	-	1	111.30	1	111.30
	Gulbarga	Gold	-	-	1	55.75	1	55.75
		Limestone	3	429.51	-	-	3	429.51
	Hassan	China clay	-	-	2	311.60	2	311.60
		Chromite	-	-	6	987.47	6	987.47
		Copper ore	-	-	1	70.82	1	70.82
		Quartz	-	-	2	18.20	2	18.20
		Steatite	-	-	1	80.94	1	80.94
		Vermiculite	-	-	1	26.30	1	26.30

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total		
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	
Karnataka (contd.)	Kolar	Gold	1	5,215.39	-	-	1	5,215.39	
	Mandya	Quartz	-	-	1	15.17	1	15.17	
	Mysore	Magnesite	-	-	3	338.12	3	338.12	
	Raichur	Gold	-	-	3	965.08	3	965.08	
	Shimoga	China clay	-	-	3	33.99	3	33.99	
		Manganese ore	-	-	1	526.10	1	526.10	
	Tumkur	Gold	-	-	1	38.04	1	38.04	
	Udupi	Bauxite	-	-	1	28.80	1	28.80	
		Total		7	11,505.40	55	8,091.88	62	19,597.28
Kerala	Kollam	China clay	-	-	1	4.22	1	4.22	
		Sillimanite	2	169.71	1	157.64	3	327.35	
	Palakkad	Limestone	-	-	1	245.69	1	245.69	
		Total	2	169.71	3	407.55	5	577.26	
	Madhya Pradesh	Balaghat	Copper ore	2	479.90	-	-	2	479.90
Manganese ore			11	1,172.27	-	-	11	1,172.27	
Sand (others)			1	5.50	-	-	1	5.50	
Chhattarpur		Phosphorite	-	-	1	48.76	1	48.76	
		Jabalpur	Limestone	1	89.32	-	-	1	89.32
Jhabua		Phosphorite	-	-	2	11.32	2	11.32	
Katni		Fireclay	2	38.27	-	-	2	38.27	
		Limestone	3	1,109.09	-	-	3	1,109.09	
Mandla		Dolomite	-	-	1	2.52	1	2.52	
Nimach		Limestone	2	500.45	-	-	2	500.45	
Panna		Diamond	2	576.51	-	-	2	576.51	
Sagar		Phosphorite	-	-	1	52.80	1	52.80	
Satna		Limestone	2	1,406.57	0	0	2	1,406.57	
Tikamgarh		Pyrophyllite	-	-	1	5.00	1	5.00	
		Total	26	5,377.88	6	120.40	32	5,498.28	
Maharashtra		Bhandara	Kyanite	-	-	9	251.48	9	251.48
			Manganese ore	6	375.97	-	-	6	375.97
	Sand (others)		1	40.11	-	-	1	40.11	
	Chandrapur	Fluorite	-	-	1	32.70	1	32.70	
		Sand (others)	5	461.08	-	-	5	461.08	
	Gondia	Iron ore	-	-	1	43.82	1	43.82	
	Nagpur	Dolomite	-	-	1	42.52	1	42.52	
		Manganese ore	14	390.92	-	-	14	390.92	
		Sand (others)	4	191.88	-	-	4	191.88	
	Sindhudurg	Felspar	-	-	1	29.27	1	29.27	
		Silica sand	-	-	2	105.07	2	105.07	
	Yeotmal	Limestone	-	-	1	207.47	1	207.47	
		Sand (others)	1	44.00	-	-	1	44.00	
		Total	31	1,503.96	16	712.33	47	2,216.29	
Meghalaya	Garo Hills West	Fire clay	-	-	1	221.44	1	221.44	
		Limestone	-	-	1	384.00	1	384.00	
	Khasi Hills East	Limestone	-	-	2	394.63	2	394.63	
		Total	-	-	4	1,000.07	4	1,000.07	

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Orissa	Bargarh	Limestone	-	-	2	806.53	2	806.53
	Dhenkanal	Chromite	-	-	2	847.48	2	847.48
	Ganjam	Sillimanite	1	2,618.49	-	-	1	2,618.49
	Jajpur	Chromite	-	-	5	2,865.85	5	2,865.85
		Iron ore	-	-	1	1,812.99	1	1,812.99
	Kalahandi	Amethyst	-	-	1	27.65	1	27.65
		Corundum	-	-	1	57.46	1	57.46
	Keonjhar	Chromite	-	-	3	1,933.64	3	1,933.64
		Iron ore	4	4,162.91	12	7,384.06	16	11,546.97
		Manganese ore	-	-	7	4,511.54	7	4,511.54
	Koraput	Bauxite	2	4,647.28	-	-	2	4,647.28
		Graphite	-	-	1	501.67	1	501.67
		Limestone	-	-	2	1,586.22	2	1,586.22
		Manganese ore	-	-	1	501.67	1	501.67
	Malkangiri	Limestone	-	-	1	1,694.13	1	1,694.13
	Nawapara	Corundum	-	-	1	33.95	1	33.95
		Limestone	-	-	3	343.00	3	343.00
	Rayagada	Bauxite	-	-	1	1,388.74	1	1,388.74
	Sundergarh	Dolomite	2	384.03	-	-	2	384.03
		Iron ore	6	487.64	3	2,039.69	9	2,527.33
	Lead & zinc ores	1	499.60	-	-	1	499.60	
	Quartz	2	47.93	-	-	2	47.93	
	Total	18	12,847.88	47	28,336.27	65	41,184.15	
Rajasthan	Ajmer	Lead & zinc ores	1	480.45	-	-	1	480.45
	Alwar	Copper ore	1	914.07	-	-	1	914.07
	Banswara	Graphite	-	-	2	383.55	2	383.55
	Barmer	Gypsum	2	1,100.66	2	389.85	4	1,490.51
	Bhilwara	Lead & zinc ores	1	1,200.00	-	-	1	1,200.00
	Bikaner	Gypsum	3	367.02	9	3,454.84	12	3,821.86
	Dungarpur	Fluorite	-	-	4	292.30	4	292.30
	Ganganagar	Gypsum	4	346.50	4	1,129.39	8	1,475.89
	Hanumangarh	Gypsum	-	-	5	7,084.65	5	7,084.65
	Jaisalmer	Gypsum	1	501.68	2	366.21	3	867.89
		Limestone	-	-	2	1,998.00	2	1,998.00
	Jalore	Fluorite	-	-	4	1,075.00	4	1,075.00
		Gypsum	-	-	1	178.50	1	178.50
	Jhunjhunu	Copper ore	4	803.88	-	-	4	803.88
	Nagaur	Gypsum	-	-	5	2,401.07	5	2,401.07
		Limestone	-	-	3	4,915.44	3	4,915.44
	Rajsamand	Lead & zinc ores	4	2,142.04	-	-	4	2,142.04
	Sirohi	Lead & zinc ores	-	-	1	63.00	1	63.00
	Udaipur	Barytes	-	-	1	31.00	1	31.00
		Calcite	-	-	1	49.50	1	49.50
	Lead & zinc ores	1	3,620.00	-	-	1	3,620.00	
	Phosphorite	1	143.13	6	2,108.75	7	2,251.88	
	Total	23	11,619.43	52	25,921.05	75	37,540.48	

(contd.)

State	District	Mineral	Central Govt.		State Govt.		Total	
			No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)	No. of leases	Lease area (Hect.)
Sikkim	Sikkim East	Copper ore	-	-	3	84.67	3	84.67
		Total	-	-	3	84.67	3	84.67
Tamil Nadu	Ariyalur	Limestone	-	-	4	374.06	4	374.06
	Chengai-Anna	Quartz	-	-	1	6.58	1	6.58
	Cuddalore	Fireclay	-	-	2	42.05	2	42.05
	Dindigul	Quartz	-	-	2	1.47	2	1.47
	Erode	Quartz	-	-	6	24.96	6	24.96
	Kanchipuram	Limeshell	-	-	1	190.00	1	190.00
		Silica sand	-	-	1	4.63	1	4.63
	Kanyakumari	Garnet	5	258.31	-	-	5	258.31
	Karur	Quartz	-	-	7	19.30	7	19.30
	Namakkal	Quartz	-	-	3	7.92	3	7.92
	Perambalur	Limestone	-	-	1	110.68	1	110.68
	Periyar	Quartz	-	-	2	3.59	2	3.59
	Ramnathapuram	Limeshell	-	-	1	539.05	1	539.05
	Salem	Magnesite	7	761.83	3	431.24	10	1,193.07
		Quartz	-	-	2	0.97	2	0.97
	Sivaganga	Graphite	-	-	2	242.46	2	242.46
	Tiruchirapalli	China clay	-	-	1	12.30	1	12.30
		Dolomite	-	-	1	62.07	1	62.07
		Limestone	-	-	1	9.95	1	9.95
	Tirunelveli	Garnet	-	-	1	4.36	1	4.36
		Limestone	-	-	2	27.80	2	27.80
	Vellore	Vermiculite	-	-	1	23.71	1	23.71
Virudhunagar	Limestone	-	-	2	446.58	2	446.58	
	Total	12	1,020.14	47	2,585.73	59	3,605.87	
Uttar Pradesh	Allahabad	Silica sand	1	33.58	-	-	1	33.58
	Lalitpur	Phosphorite	-	-	1	874.00	1	874.00
		Pyrophyllite	-	-	3	774.20	3	774.20
	Sonbhadra	Limestone	-	-	4	2,706.15	4	2,706.15
		Total	1	33.58	8	4,354.35	9	4,387.93
Uttaranchal	Bageshwar	Magnesite	1	53.20	-	-	1	53.20
	Dehradun	Limestone	-	-	1	97.00	1	97.00
		Phosphorite	2	222.05	-	-	2	222.05
	Pithoragarh	Magnesite	1	439.00	-	-	1	439.00
		Total	4	714.25	1	97.00	5	811.25
West Bengal	Burdwan	Fireclay	1	348.50	-	-	1	348.50
	Jalpaiguri	Dolomite	-	-	1	847.00	1	847.00
	Purulia	Phosphorite	-	-	1	29.13	1	29.13
		Total	1	348.50	2	876.13	3	1,224.63

3.7 YEARWISE STATUS OF EXPIRY OF MINING LEASES

Every mining lease is granted for a stipulated period and once this period expires the lessees shall have to apply for renewal to the respective State Governments as per the provisions under MCR, 1960. The period of leases varies from minimum 20 years to a maximum of 30 years. Further, renewal (s) are possible for period or periods not exceeding 20 years in each case. Out of the total number of leases in the Directory (6,941) more than 1,110 (10%) leases will expire between 2005 to 2009. The yearwise and Statewise break up of the position of expiry of lease are given in Tables -15 and 16.

TABLE - 15 : YEARWISE STATUS OF EXPIRY OF MINING LEASES

Year	No. of leases	Percentage	Lease Area (Hect.)	Percentage
2005	368	2.70	24279.95	2.58
2006	337	2.47	21109.09	2.25
2007	213	1.56	14519.99	1.55
2008	115	0.84	7223.93	0.77
2009	77	0.56	5722.14	0.66
2010	110	0.81	12314.98	1.31
2011	111	0.81	8084.71	0.86

**TABLE -16 : STATEWISE AND YEARWISE STATUS OF EXPIRY OF MINING LEASES
(BY STATE)**

Sl. No.	State	2005		2006		2007		2008		2009		2010		2011	
		No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)	No.	Lease area (Hect.)
1	Andhra Pradesh	52	2,055.35	30	1,805.64	15	1,831.30	7	244.73	11	164.33	15	601.98	12	125.61
2	Assam	-	-	6	150.83	1	35	-	-	-	-	1	40.00	-	-
3	Bihar	2	61.30	2	232.43	-	-	-	-	-	-	-	-	-	-
4	Chhattisgarh	11	981.11	11	641.28	10	3,343.42	-	-	2	22.43	1	6.47	-	-
5	Goa	1	40.92	-	-	6	406.82	1	9.49	-	-	-	-	-	-
6	Gujarat	55	724.65	74	741.17	48	716.72	25	379.96	10	115.74	8	27.67	19	60.72
7	Haryana	3	559.80	2	665.01	2	759.22	-	-	-	-	1	50.50	-	-
8	Himachal Pradesh	9	84.29	3	8.8	4	44.42	-	-	1	0.37	1	27.83	2	241.16
9	Jammu & Kashmir	-	-	-	-	-	-	-	-	1	140.80	2	43.56	-	-
10	Jharkhand	24	2,843.69	27	2,121.15	3	144.90	7	222.87	8	2,297.80	16	430.45	3	2,542.24
11	Karnataka	28	1,754.27	12	472.25	11	704.26	5	883.99	4	80.83	8	200.43	7	315.13
12	Kerala	6	241.03	5	6.72	7	11.42	4	5.93	2	8.07	1	0.27	2	3.37
13	Madhya Pradesh	71	2,033.78	48	538.04	27	254.02	4	20.16	3	94.57	14	98.00	13	123.30
14	Maharashtra	7	158.97	11	444.65	13	273.59	3	112.27	8	402.48	6	111.66	5	197.17
15	Meghalaya	-	-	1	86.00	1	221.44	1	11.08	-	-	1	384.00	-	-
16	Orissa	42	7,996.50	44	5,609.03	27	1,397.73	21	1,324.49	14	1787.31	19	3,570.02	20	862.95
17	Rajasthan	41	3,643.62	41	7,227.29	22	3,550.85	24	3,475.79	10	566.31	14	6,698.89	27	3,611.24
18	Tamil Nadu	7	453.78	9	197.72	12	681.12	13	533.17	3	41.1	1	7.06	1	1.82
19	Uttaranchal	3	165.4	-	-	2	89.43	-	-	-	-	-	-	-	-
20	Uttar Pradesh	2	450.15	4	78.25	-	-	-	-	-	-	-	-	-	-
21	West Bengal	4	31.34	7	82.83	2	54.33	-	-	-	-	1	16.19	-	-
	Total	368	24,279.95	337	21,109.09	213	14,519.99	115	7,223.93	77	5,722.14	110	12,314.98	111	8,084.71

4. PROSPECTING LICENCES

Under the Mines & Minerals (Development & Regulation) Act, 1957, "Prospecting Licence" (PL) means a licence granted for the purpose of undertaking "prospecting operations" with a view to exploring/locating or proving mineral deposits on surface/subsurface area. The State Governments and the Union Territories are empowered to grant/renew/voke prospecting licences (PL) under the provisions of Mineral Concession Rules, 1960.

The area restrictions for prospecting licences have been substantially liberalized by making such restrictions applicable statewise instead of the country as a whole.

4.1 STATEWISE DISTRIBUTION OF PROSPECTING LICENCES

As per information received from the State Governments/Union Territories, 133 prospecting licences were executed covering 13,250 hectares during 2003-04 as compared with 255 prospecting licences covering 35,385 hectares during 2002-03. The Statewise distribution of prospecting licences executed during 2002-03 and 2003-04 is given in Table-17. These prospecting licences, however, exclude reconnaissance permits executed for aerial prospecting.

TABLE - 17 : STATEWISE DISTRIBUTION OF PROSPECTING LICENCES EXECUTED, 2002-03 AND 2003-04

States	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Andhra Pradesh	12	1,285	10	1,628
Chhattisgarh	14	2 37	6	574
Haryana	-	-	11	806
Himachal Pradesh	-	-	1	21
Kerala	1	++	1	65
Madhya Pradesh	1	2	11	195
Maharashtra	8	537	26	842
Meghalaya	-	-	1	473
Orissa	13	427	2	78
Rajasthan	201	32,864	60	7,769
Uttaranchal	3	5	4	799
Uttar Pradesh	1	24	-	-
West Bengal	1	4	-	-
Total	255	35385	133	13250

Area figures rounded off.

The mineral rich States where prospecting licences so far executed during 2003-04 were Rajasthan (60), Maharashtra (26), Haryana and Madhya Pradesh (11 each), Andhra Pradesh (10), Chhattisgarh (6), Uttaranchal (4), Orissa (2), and Himachal Pradesh, Kerala and Meghalaya (one each). Rajasthan alone accounted for 45% licences while remaining ten States shared 55 per cent. Areawise, Rajasthan covered 59% while the remaining States accounted for 41 percent.

4.2 MINERALWISE DISTRIBUTION OF PROSPECTING LICENCES

Mineralwise in 2003-04, limestone accounted for maximum twelve prospecting licences executed followed by calcite (7), quartz (6), soapstone/steatite (5), dolomite (4), ochre (3), diamond, iron ore and manganese ore (2 each), amethyst quartz, barytes, bauxite, corundum, felspar, fluorite, gold & associated minerals, jasper, laterite, limeshell, moulding sand, pyrophyllite, semi-precious stones, silica sand, tin and white clay (one each). Other associated minerals accounted for 74 licences (56%) executed during 2003-04. The mineralwise distribution of prospecting licences executed during 2002-03 and 2003-04 is given in Table-18. The prospecting licences are executed for individual mineral or group of associated minerals, depending upon their nature of occurrences, such as iron and manganese ores; mica, felspar and quartz; copper, lead and zinc ores; dolomite and limestone and vice versa.

TABLE - 18 : MINERALWISE DISTRIBUTION OF PROSPECTING LICENCES EXECUTED, 2002-03 AND 2003-04

Mineral	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Amethyst quartz	-	-	1	1
Barytes	3	53	1	4
Bauxite	1	++	1	151
Calcite	11	1,526	7	828
China clay	2	428	-	-
Corundum	-	-	1	6
Diamond	-	-	2	225
Dolomite	4	13	4	32
Felspar	-	-	1	2
Fireclay	1	4	-	-
Fluorite	-	-	1	265
Garnet	1	113	-	-
Gold & associated minerals	1	4,310	1	793
Graphite	3	62	-	-
Gypsum	2	725	-	-
Iron ore	2	86	2	526
Jasper	3	685	1	20
Laterite	-	-	1	5
Limestone	9	1,087	12	1,938
Limeshell	-	-	1	65
Manganese ore	2	197	2	22
Moulding sand	-	-	1	11
Ochre	3	212	3	13
Pyrophyllite	1	59	1	138
Pyroxenite	3	74	-	-
Quartz	4	189	6	33
Quartzite	3	9	-	-
Semi-precious stones	-	-	1	4
Shale	1	2	-	-
Silica sand	2	72	1	50
Soapstone/steatite	10	1,123	5	329
Tin ore	-	-	1	24
White clay	-	-	1	7
Associated minerals	183	24,356	74	7,758
Total	255	35,385	133	13,250

Area figures rounded off.

4.3 AREAWISE DISTRIBUTION OF PROSPECTING LICENCES

Areawise analysis indicated that limestone occupied the first place, covering an area of 1,938 ha. followed by calcite (828 ha.), gold & associated minerals (793 ha.), iron ore (526 ha.), soapstone/steatite (329 ha.), fluorite (265 ha.), diamond (225 ha.), bauxite (151 ha.) and pyrophyllite (138 ha.). These minerals together accounted for 39% area while other minerals like amethyst quartz, barytes, corundum, dolomite, felspar, jasper, manganese ore, limeshell, ochre, quartz, semi-precious stones, silica sand, tin ore, white clay, moulding sand and laterite covered less than 100 hectares. Other associated minerals occupied 7,758 ha. or 59% area under prospecting licences.

4.4 SECTORWISE DISTRIBUTION OF PROSPECTING LICENCES

Out of the 133 prospecting licences executed in 2003-04, public sector accounted for 5 licences or 3.75% compared with 3 licences or 1.18% of the total in previous year. The remaining 128 prospecting licences or 96.25 % were executed in private sector compared with 252 licences or 98.82% in the previous year. The sectorwise distribution of prospecting licences during 2002-03 to 2003-04 is given in Table-19.

TABLE-19 : DISTRIBUTION OF PROSPECTING LICENCES IN PUBLIC AND PRIVATE SECTORS

Sector	2002-03		2003-04	
	No.	Area (Hects.)	No.	Area (Hects.)
Total	255	35,385	133	13,250
Public	3	5,035	5	417
Private	252	30,350	128	12,833
Public%	1.18	14.23	3.75	3.14
Private%	98.82	85.77	96.25	96.86

5. RECONNAISSANCE PERMITS

The provision of Reconnaissance Permits (RP) was introduced with effect from 20.12.1999 under the Mines & Minerals (Development & Regulation) Act, 1957 and from 18.1.2000 under the Mineral Concession Rules, 1960 and Mineral Conservation and Development Rules, 1988 made under the Act. RP is a permit granted for the purpose of undertaking "reconnaissance operations" which means any operation undertaken for preliminary prospecting of a mineral through regional, aerial, geophysical or geochemical surveys and geological mapping, but it does not include pitting, trenching, drilling (except drilling boreholes on a grid specified from time to time by the Central Government) or subsurface excavation.

Approvals have been granted by the Central Government to 23 reconnaissance permits covering 31,456 sq. km. in 2003-04 distributed in Andhra Pradesh, Chhattisgarh, Karnataka, Madhya Pradesh, Orissa and West Bengal for precious and high-value minerals like diamond, precious minerals, gold, silver, platinum group of metals & associated minerals; non-ferrous minerals like copper, lead & zinc ores; strategic minerals/ores like nickel, tungsten, arsenic, antimony, bismuth, cobalt, molybdenum & associated minerals and non-metallic minerals like ilmenite and garnet etc..

During 2003-04, approvals for grant of reconnaissance permits have been accorded to eight companies; viz., ACC-RIO TINTO Exploration Ltd., Anglo American Exploration (India) Pvt. Ltd., BHP Khanij Anveshan Pvt. Ltd., BHP Minerals (India) Pvt. Ltd., De Beers India Prospecting Pvt. Ltd., Geomysore Services (India) Pvt. Ltd., Metmin Finance & Holdings Pvt. Ltd., and WSIL Mineral Sand India Pvt. Ltd.,

5.1 MINERALWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

During 2003-04, four companies were granted 18 reconnaissance permits for diamond and associated minerals covering an area of 25,864 sq. km (82%) compared with 11 reconnaissance permits covering an area of 17,427 sq. km (35%) in the previous year. One reconnaissance permit has been granted for ilmenite, garnet etc. covering an area of 1,428 sq. kms (5%) against none in the previous year, 4 reconnaissance permits have been granted for copper, lead, zinc, gold, nickel and associated minerals covering an area of 4164 sq. km. (13%), and 7 reconnaissance permits with 11,634 sq. km. (23%) in the previous year. The mineralwise reconnaissance permits granted/executed during 2002-03 and 2003-04 are given in Table-20.

**TABLE-20: MINERALWISE DISTRIBUTION PERMITS,
2002-03 AND 2003-04**

Mineral	2002-03		2003-04	
	No.	Area (sq.km.)	No.	Area (sq. km.)
Copper, lead, zinc, gold, silver, bismuth, cadmium, nickel and associated minerals	7	11,634	4	4164
Diamond	1	2,010	-	-
Diamond and associated minerals	10	15,417	6	6,196
Dolomite and associated minerals	1	1,975	-	-
Gold	2	1,980	-	-
Gold and associated minerals	10	17,268	-	-
Diamond, Precious Stones & other associated minerals	-	-	12	19,668
Ilmenite, Garnet, etc.	-	-	1	1,428
Total	31	50,284	23	31,456

5.2 STATEWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

During 2003-04, twenty three reconnaissance permits were approved/granted/executed covering about 31,456 sq. km. in Andhra Pradesh, Chhattisgarh, Karnataka, Madhya Pradesh, Orissa and West Bengal for high-value minerals like gold, silver, copper, lead-zinc, nickel, cadmium, bismuth, diamond, precious stones and associated minerals & industrial minerals such as ilmenite and garnet. Chhattisgarh was leading in the number of RPs accounting for 7 RPs covering an area of about 11,693 sq. km. (37%) followed by 6 RPs in Andhra Pradesh 8,593 sq. km. (27%), 5 RPs in Madhya Pradesh 6,240 sq. kms (20%) and 3 RPs in Orissa covering 2,423 sq. km. (8%). These States together accounted for about 91% RPs covering 92% area. Karnataka and West Bengal States shared the remaining. The Statewise distribution of reconnaissance permits, 2002-03 and 2003-04 is given in Table-21.

**TABLE-21: STATEWISE DISTRIBUTION OF RECONNAISSANCE PERMITS,
2002-03 AND 2003-04**

State	2002-03		2003-04	
	No.	Area (sq. km.)	No.	Area (sq. km.)
Andhra Pradesh	4	8,725	6	8,593
Chhattisgarh	8	10,626	7	11,693
Jharkhand	1	1,870	-	-
Karnataka	8	11,626	1	2,130
Madhya Pradesh	8	16,623	5	6,240
Rajasthan	2	814	-	-
Orissa	-	-	3	2,423
West Bengal	-	-	1	377
Total	31	50,284	23	31,456

5.3 AREAWISE DISTRIBUTION OF RECONNAISSANCE PERMITS

Areawise, M/s BHP Khanij Anveshan Pvt. Ltd. held maximum area of about 11,776 sq. km., under 7 RPs followed by M/s ACC-RIO TINTO Exploration Ltd. 8,525 sq. km. under 7 RPs, M/s BHP Minerals (India) Pvt. Ltd. 5,892 sq. km. under 3 RPs, M/s De Beers India Prospecting Pvt. Ltd., 1,643 sq. kms. under 2 RPs, M/s WSIL Mineral Sand India Pvt. Ltd. 1,428 sq. km. under 1 RP and M/s Metmin Finance Holdings Pvt. Ltd. 1,330 sq. km. under 1 RP. These six companies shared about 97% area and the remaining two companies covered less than 1,000 sq. km. each or about 3% area. The companywise distribution of RPs during 2002-03 and 2003-04 are given in Table-22 and details of reconnaissance permits granted/executed during 2003-04 are furnished in Table-23.

TABLE – 22: AREAWISE/COMPANYWISE DISTRIBUTION OF RECONNAISSANCE PERMITS DURING 2002-03 AND 2003-04

Sl. No.	Company	2002-03		2003-04	
		No.	Area (sq. km.)	No.	Area (sq. km.)
1.	ACC-RIO TINTO Exploration Ltd., RCD Campus, Lal Bahadur Shastri Marg, Thane-400 064.	3	7,650	7	8,525
2.	Anglo American Exploration (India) Pvt. Ltd., 21, South Ex-Plaza-I, 389, Masjid Moth, South Ext-II, New Delhi-110 049.	4	8,499	1	377
3.	BHP Khanij Anveshan Pvt. Ltd., 7/F, World Trade Tower, Barakhamba Lane, New Delhi-110 001.	7	11,776	7	11,776
4.	BHP Minerals (India) Pvt. Ltd., 7/F, World Trade Tower, Barakhamba Lane, New Delhi-110 001.	1	2,293	3	5,892
5.	De Beers India Prospecting Pvt. Ltd., Advanced Business Centre, 83, Maker Chambers VI, Nariman Point, Mumbai-400 021.	4	6,629	2	1,643
6.	Emperor Granite Pvt. Ltd. Bhopal	1	1,000	-	-
7.	Geomysore Services (India) Pvt. Ltd., 120/45, 3rd Block, 6th Cross, 6th 'A' Main, Thyagaraja Nagar, Bangalore-560 028.	9	8,989	1	485

(contd.)

Table-22 (concl.)

Sl. No.	Company	2002-03		2003-04	
		No.	Area (sq. km.)	No.	Area (sq. km.)
8.	Hindustan Zinc Ltd., Yashad Bhavan, Yashadgarh, Udaipur-313 001.	1	361	-	-
9.	Hutti Gold Mines Co. Ltd., 6/13, Gurappa Avenue, Prime Rose Road Cross, Bangalore-560 005.	1	4,103	-	-
10.	Indophil Resources Exploration Services India Pvt. Ltd., 114, 5th Cross, 3rd Main Road, Girinagar, Bangalore-560 085.	2	4,995	-	-
11.	Metmin Finance & Holdings Pvt. Ltd., 161/162, Mittal Court, 'A' Wing, Nariman Point, Mumbai-400 021.	-	-	1	1330
12.	Minpro Corporation, 201, Gulmohor, Chitnavis Marg, Opp. Hislop College, Nagpur-440 001.	1	110	-	-
13.	Mira Exploration Pvt. Ltd., D-11/2251 Basant Kunj, New Delhi-110 020	1	481	-	-
14.	National Mineral Development Corporation Ltd., 10-3-311/A, Castle Hills, Masab Tank, Hyderabad-500 028.	2	3,304	-	-
15.	Phelps Dodge Explortion India Pvt. Ltd B-1, Defence Colony, New Delhi- 110 024.	1	1,870	-	-
16.	WSIL Mineral Sand India Pvt. Ltd., D-19, Press Enclave, Saket, New Delhi-110 024.	-	-	1	1428
Total		31	50,284	23	31,456

TABLE-23 : RECONNAISSANCE PERMITS APPROVED BY THE MINISTRY OF MINES AND GRANTED/EXECUTED BY VARIOUS STATE GOVERNMENTS, 2003-04

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
1	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Karnataka	Gulbarga and Raichur	Diamond and associated minerals	2130.00	i) 30.07.2003	-	3
2	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Madhya Pradesh	Chhatarpur and Panna	Gold, copper, lead, zinc, silver, bismuth and cadmium	1971.69	i) 30.06.2003	13.10.2003	3
3	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Chhattisgarh	Raigarh, Jashpur and Surguja	Diamond, gold and associated minerals	1000.00	i) 30.06.2003	19.12.2003	3
4	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Chhattisgarh	Raigarh and Jashpur	Diamond, gold and associated minerals	1000.00	i) 30.06.2003	19.12.2003	3
5	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh, Bolangir and Navapara	Diamond and associated minerals	798.00	i) 30.07.2003	-	3
6	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh and Navapara	Diamond and associated minerals	1360.00	i) 28.08.2003	-	3

(contd.)

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
7	ACC-RIO TINTO Exploration Ltd. RCD Campus, Lal Bahadur Shastri Marg, Thane- 400 064.	Orissa	Bargarh and Bolangir	Diamond and associated minerals	265.00	i) 28.08.2003	-	3
8	Anglo American Exploration (India) Pvt. Ltd., South Ex-Plaza, 389, Masjid Moth, South Ext-II New Delhi-110 049.	West Bengal	Medinipur and Purulia	Copper, nickel, and associated minerals	377.00	i) 30.07.2003	11.10.2003	3
9	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar and Rangareddy	Diamond, precious stone, iron, copper, lead, zinc, gold and associated minerals	1984.00	i) 30.05.2003 ii) 04.07.2003	17.10.2003	3
10	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar	Diamond, precious stone, iron, copper, lead, zinc, gold and associated minerals	1846.00	i) 30.05.2003 ii) 04.07.2003	13.10.2003	3
11	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Madhya Pradesh	Chhatarpur and Tikamgarh	Diamond, precious stone, copper, lead, zinc, nickel, gold and associated minerals	863.64	i) 02.06.2003 ii) 05.06.2003	01.07.2003	3
12	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar	Diamond, gold and associated minerals	1700.00	i) 30.06.2003	-	3

(contd.)

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
13	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar	Diamond, gold and associated minerals	1500.00	i) 30.06.2003	-	3
14	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Bastar, Durg and Kanker	Diamond, gold, iron and other associated minerals	1800.00	i) 30.07.2003	-	3
15	BHP Khanij Anveshan Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Dantewara	Diamond, gold, iron and other associated minerals	2083.00	i) 30.07.2003	-	3
16	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Anantapur	Diamond, precious stone, nickel, copper, lead, zinc, gold and associated minerals	1070.00	i) 30.05.2003 ii) 17.06.2003	13.08.2003	3
17	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Andhra Pradesh	Mahaboobnagar and Rangareddy	Diamond, precious stone, nickel, copper, lead, zinc, gold and associated minerals	2212.00	i) 30.05.2003 ii) 04.07.2003	13.08.2003	3
18	BHP Mineral (India) Pvt. Ltd., 3/F, World Trade Tower, Barakhamba Lane, New Delhi- 110 001.	Chhattisgarh	Dantewara	Diamond, gold, iron and other associated minerals	2610.00	i) 30.07.2003	-	3

(contd.)

Sl. No.	Name and address of Permit Holder	Location		Mineral (s)	Area in sq. km.	Date of Approval/Grant/Permission	Date of Execution	Period in Year
		State	District (s)					
19	De Beer India Prospecting Pvt. Ltd., Advanced Business Centre, 83, Maker Chambers VI, Narman Point, Mumbai-400 021.	Andhra Pradesh	Kurnool	Diamond and associated minerals	53.00	i) 30.05.2003 ii) 05.07.2003	-	3
20	De Beer India Prospecting Pvt. Ltd., Advanced Business Centre, 83, Maker Chambers VI, Narman Point, Mumbai-400 021.	Madhya Pradesh	Rewa	Diamond and associated minerals	1590.00	i) 05.12.2003	-	3
21	Geomysore Services (India) Pvt. Ltd., 120/45, 3rd Block, 6th Cross, 6th 'A' Main Tyagaraja Nagar, Bangalore-560 028.	Madhya Pradesh	Betul	Gold, copper, lead, zinc, silver, nickel, tungsten, antimony, bismuth, cobalt, molybdenum, platinum etc.	485.00	i) 30.06.2003	13.08.2003	3
22	Metmin Finance & Holding Pvt. Ltd., 161/162, Mittal Court, 'A' Wing Narman Point, Mumbai-400 021.	Madhya Pradesh	Betul	Gold, copper, lead, zinc, silver, nickel and associated minerals	1330.00	i) 30.05.2003	06.10.2003	3
23	WSIL Mineral Sand India (Pvt.) Ltd., D-19, Press Enclave, Saket, New Delhi- 110 024	Andhra Pradesh	Guntur and Prakasam	Ilmenite, garnet etc.	1428.00	i) 01.01.2004 ii) 24.01.2004	-	3

Note :

- i) *Approved by Central Government*
ii) *Granted by State Government*