

Manpower in Mining – Some Reflections

Employment has been the biggest challenge for a country as diverse and as vast as India. The rural hinterland is a hub of diverse resources including variety of minerals. The average daily employment¹ in [non-fuel \(excluding coal, lignite, petroleum & natural gas\) and non-atomic major minerals](#) is 1.24 lakhs (2010-11 provisional). Looking at two other statistics i.e. of Economic census and National Statistics Commission on unorganized sector reveals in depth the other facets of workers in mining.

The fifth economic census puts the figure of workers engaged in mining and quarrying (by type of establishments²) at [5.81 Lakhs](#), majority i.e. 69.50% in rural areas. 77% of the workforce in mining and quarrying is engaged with establishments where employment is 6 or more persons daily on a fairly regular basis. Coal mining is the biggest employer in the mining sector (416800 [72.82%] workers average daily employed out of total 572300, a diminishing trend from 1991 where 554000 workers were employed out of total 789700). Mining has increased manifolds but one can clearly make out the lowering workforce in mining sector over the last two decades. Another aspect is the large unorganized workforce which plays a major role in terms of labour input as well as economic input. In contrast, the National Statistics Commission estimates the total input of informal or unorganized labour at [64.40%](#) in the mining sector which is also true for other sectors like construction, hotels etc. The gross value added to the economic activity of mining (61st round 2004-05 based on 1999-00 old series estimates) indicates 18% contribution of the total value added by the economic activities. The absolute number stands at [8446 Crores!](#)

Questions:

- *But is it enabling employment intensity and fair wages at a level in contrast to resources and environmental impacts which are extreme where gains are only one sided and not for workers and environment.*
- *Can enterprises or operations so vastly spread be better monitored for constitutional and environmental due diligence which includes compliance as well as respecting human rights including workers safety.*
- *Mechanisms for unorganized and contract workers to be registered and counted for a fair idea of gross workforce to draw out a strategy – need for an integrated data and information system*

Above questions are only few to give a macro perspective of workforce using secondary data, you can send your feedback on the situations known to you.

¹ The expression 'average employment' means the average per day of the total employment of the mine during the preceding quarter (obtained by dividing the number of mandays worked by the number of working days)

² Establishments with hired workers:

(i) Directory Establishment - An establishment with hired worker employing 6 or more persons daily on a fairly regular basis is termed as Directory Establishment.

(ii) Non Directory Establishment: An establishment with hired worker employing less than 6 persons daily on a fairly regular basis is termed as Non Directory Establishment.

(iii) Own Account Enterprises

**STATEWISE AVERAGE DAILY EMPLOYMENT
(for non-fuel and non-atomic major minerals)**

State	2007-08	2008-09	2009-10 (Provisional)	2010-11 (Provisional)
Jammu & Kashmir	60	59	61	25
Assam	235	190	572	665
Bihar	434	281	288	181
Meghalaya	392	397	408	367
West Bengal	770	677	623	351
Himachal Pradesh	704	738	620	589
Uttar Pradesh	1569	1108	1077	1305
Uttaranchal	1369	1309	1161	1245
Kerala	1726	1880	1671	1588
Maharashtra	5689	4926	6681	5497
Tamil Nadu	5496	5635	5766	5096
Goa	5532	6331	6269	6076
Andhra Pradesh	6598	7801	8518	7288
Madhya Pradesh	9450	9402	10793	9775
Gujarat	10578	10170	7640	5833
Jharkhand	9935	10322	12413	14211
Chhattisgarh	14686	10884	10078	9860
Karnataka	13713	13030	14115	14428
Rajasthan	12250	13172	13076	14300
Orissa	31014	31043	27149	25402
Total	132200	129355	128979	124082

Source: LOK SABHA STARRED QUESTION NO. 104 FOR 16.11.2010
Note: Provisional figures will be replaced once final figures are available.

Table 5.20 : Average Daily Employment in Mines in India

Mineral	('000 number')				
	1991	2001	2002	2003	2004 *
Coal	554.0	438.1	422.5	416.8	411.0
Copper Ore	12.8	3.9	3.3	2.5	3.7
Chromite	10.6	6.5	6.9	6.6	6.7
Diamond	0.4	0.2	0.2	0.2	0.2
Gold	9.3	3.6	3.3	2.7	2.8
Gypsum	0.6	0.5	0.4	0.3	0.4
Iron Ore	40.1	32.3	33.6	35.8	32.5
Limestone	43.5	24.3	25.2	24.2	24.0
Magnetite	6.6	2.9	2.2	2.1	2.2
Manganese Ore	17.9	13.6	13.7	13.2	13.9
Mica	2.2	0.6	0.6	0.6	0.6
Stone	11.2	6.3	7.8	7.9	6.4
Oil	35.5	24.5	22.3	18.5	20.1

Others	45.0	41.9	39.8	40.9	39.8
Total	789.7	599.2	581.8	572.3	564.3
Note : Total may not tally due to rounding off. * Provisional					
Source : Statistical Pocket Book, India - 2005, P 38.					
Central Statistical Organisation, Ministry of Statistics & Programme Implementation, Government of India, New Delhi.					

Mining Information Clearinghouse of India

Table - A 4.5: Number of workers engaged in Mining and Quarrying by type of establishments & by States/UTs

Sl. No.	States\ UTs	Rural				Urban				Combined			
		OAE	NDE	DE	ALL	OAE	NDE	DE	ALL	OAE	NDE	DE	ALL
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Jammu & Kashmir	184	735	1,092	2,011	223	568	393	1,184	407	1,303	1,485	3,195
2	Himachal Pradesh	78	203	2,563	2,844	43	17	70	130	121	220	2,633	2,974
3	Punjab	290	289	1,802	2,381	93	254	375	722	383	543	2,177	3,103
4	Chandigarh	1	0	0	1	0	4	0	4	1	4	0	5
5	Uttarkhand	90	266	827	1,183	53	133	44	230	143	399	871	1,413
6	Haryana	661	642	3,429	4,732	288	718	2,007	3,013	949	1,360	5,436	7,745
7	Delhi	2	4	16	22	37	189	2,346	2,572	39	193	2,362	2,594
8	Rajasthan	2,684	5,556	35,563	43,803	666	2,873	4,472	8,011	3,350	8,429	40,035	51,814
9	Uttar Pradesh	5,774	3,335	1,852	10,961	3,901	6,215	7,875	17,991	9,675	9,550	9,727	28,952
10	Bihar	471	512	2,113	3,096	197	280	551	1,028	668	792	2,664	4,124
11	Sikkim	6	18	216	240	0	0	0	0	6	18	216	240
12	Arunachal Pradesh	17	12	359	388	2	19	0	21	19	31	359	409
13	Nagaland	11	45	318	374	2	5	165	172	13	50	483	546
14	Manipur	241	74	230	545	265	18	0	283	506	92	230	828
15	Mizoram	20	12	15	47	3	51	221	275	23	63	236	322
16	Tripura	104	137	708	949	6	17	8	31	110	154	716	980
17	Meghalaya	295	2,292	4,578	7,165	35	120	113	268	330	2,412	4,691	7,433
18	Assam	224	384	2,520	3,128	29	83	377	489	253	467	2,897	3,617
19	West Bengal	1,580	1,553	14,064	17,197	462	654	28,208	29,324	2,042	2,207	42,272	46,521
20	Jharkhand	788	1,094	37,285	39,167	322	854	15,117	16,293	1,110	1,948	52,402	55,460
21	Orissa	4,096	1,654	15,523	21,273	392	519	5,055	5,966	4,488	2,173	20,578	27,239
22	Chattisgarh	1,457	747	14,213	16,417	221	485	2,092	2,798	1,678	1,232	16,305	19,215
23	Madhya Pradesh	2,185	1,271	15,059	18,515	1,255	1,788	14,436	17,479	3,440	3,059	29,495	35,994
24	Gujarat	2,505	1,366	13,591	17,462	857	970	3,036	4,863	3,362	2,336	16,627	22,325
25	Daman & Diu	0	4	14	18	0	2	0	2	0	6	14	20
26	D. & N. Haveli	0	0	12	12	0	0	0	0	0	0	12	12
27	Maharashtra	2,068	2,975	16,090	21,133	924	1,994	11,459	14,377	2,992	4,969	27,549	35,510
28	Andhra Pradesh	14,524	6,297	69,755	90,576	1,339	2,063	23,308	26,710	15,863	8,360	93,063	117,286
29	Karnataka	5,661	4,710	19,037	29,408	1,304	2,291	5,948	9,543	6,965	7,001	24,985	38,951
30	Goa	33	299	2,500	2,832	22	80	478	580	55	379	2,978	3,412
31	Lakshadweep	0	0	0	0	0	0	0	0	0	0	0	0
32	Kerala	1,018	2,232	11,711	14,961	452	511	850	1,813	1,470	2,743	12,561	16,774
33	Tamil Nadu	4,018	3,537	23,658	31,213	2,271	2,192	6,755	11,218	6,289	5,729	30,413	42,431
34	Puducherry	0	4	75	79	2	9	6	17	2	13	81	96
35	A & N. Islands	22	22	246	290	0	0	0	0	22	22	246	290
All State/Uts		51,108	42,281	311,034	404,423	15,666	25,976	135,765	177,407	66,774	68,257	446,799	581,830

Source: 5th Economic Census, GoI

Table A 3.5 : Number of establishments engaged in Mining and Quarrying by type of establishment & by States/UTs

Sl. No.	States\ UTs	Rural				Urban				Combined			
		OAE	NDE	DE	ALL	OAE	NDE	DE	ALL	OAE	NDE	DE	ALL
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1	Jammu & Kashmir	133	217	106	456	210	205	48	463	343	422	154	919
2	Himachal Pradesh	48	60	147	255	42	6	5	53	90	66	152	308
3	Punjab	146	158	116	420	78	97	14	189	224	255	130	609
4	Chandigarh	1	0	0	1	0	2	0	2	1	2	0	3
5	Uttarkhand	83	98	34	215	46	48	6	100	129	146	40	315
6	Haryana	372	191	334	897	214	289	182	685	586	480	516	1582
7	Delhi	2	2	1	5	33	61	61	155	35	63	62	160
8	Rajasthan	1568	1931	1722	5221	491	967	271	1729	2059	2898	1993	6950
9	Uttar Pradesh	4183	1367	167	5717	2991	2360	199	5550	7174	3727	366	11267
10	Bihar	381	202	150	733	147	113	29	289	528	315	179	1022
11	Sikkim	6	4	14	24	0	0	0	0	6	4	14	24
12	Arunachal Pradesh	7	4	14	25	1	5	0	6	8	9	14	31
13	Nagaland	9	12	36	57	1	1	20	22	10	13	56	79
14	Manipur	151	21	11	183	194	6	0	200	345	27	11	383
15	Mizoram	16	4	2	22	3	15	16	34	19	19	18	56
16	Tripura	50	54	60	164	5	6	1	12	55	60	61	176
17	Meghalaya	186	591	551	1328	32	40	11	83	218	631	562	1411
18	Assam	158	142	133	433	24	25	15	64	182	167	148	497
19	West Bengal	1081	595	565	2241	267	230	147	644	1348	825	712	2885
20	Jharkhand	428	513	1035	1976	250	381	116	747	678	894	1151	2723
21	Orissa	2449	699	564	3712	297	191	109	597	2746	890	673	4309
22	Chattisgarh	585	287	480	1352	185	191	78	454	770	478	558	1806
23	Madhya Pradesh	1049	498	668	2215	774	617	184	1575	1823	1115	852	3790
24	Gujarat	980	448	670	2098	391	369	221	981	1371	817	891	3079
25	Daman & Diu	0	2	2	4	0	1	0	1	0	3	2	5
26	D. & N. Haveli	0	0	2	2	0	0	0	0	0	0	2	2
27	Maharashtra	1269	985	1007	3261	761	690	257	1708	2030	1675	1264	4969
28	Andhra Pradesh	8100	2768	2203	13071	872	787	530	2189	8972	3555	2733	15260
29	Karnataka	3644	1709	1157	6510	945	887	292	2124	4589	2596	1449	8634
30	Goa	28	94	99	221	22	31	20	73	50	125	119	294
31	Lakshadweep	0	0	0	0	0	0	0	0	0	0	0	0
32	Kerala	846	729	912	2487	414	170	76	660	1260	899	988	3147
33	Tamil Nadu	2902	1274	1069	5245	1741	838	240	2819	4643	2112	1309	8064
34	Puducherry	0	2	2	4	1	3	1	5	1	5	3	9
35	A & N. Islands	13	7	17	37	0	0	0	0	13	7	17	37
	All State/UTs	30874	15668	14050	60592	11432	9632	3149	24213	42306	25300	17199	84805

Source: 5th Economic Census, Go

Tabulation category/Description	2004-05
	Share of Unorganised Sector
A: Agriculture and forestry	99.9
B: Fishing	98.7
C: Mining	64.4
D: Manufacturing	87.7
E: Electricity, Gas, Watersupply	12.4
F: Construction	92.4
G: Wholesale and Retail Trade,	98.3
H: Hotel & Restaurants	96.7
I: Transport, Storage & Communication	82.2

Source: Report of National Statistics Commission on Unorganised Sector Statistics

Economic activities	55th Round (1999-2000)			61st Round (2004-05)		
	GVA		share of Informal Sector	GVA*		share of Informal Sector
	Informal Sector	Total		Informal Sector	Total	
Agriculture	431131	446515	96.55	506990	536629	94.48
Mining	12478	41594	30.00	15204	84464	18.00
Manufacturing	77579	268927	28.85	123859	461531	26.84
Electricity, Gas & Water	1781	44526	4.00	1818	60607	3.00
Construction	45559	102007	44.66	86024	185669	46.33
Trade	179349	231878	77.35	318753	424552	75.08
Hotels & Restaurants	12511	22265	56.19	20211	39781	50.80
Transport & Storage	76381	133373	57.27	111220	250214	44.45
Banking, Finance & Insurance	7852	105662	7.43	15588	167831	9.29
Real est. & Business Services	98778	127887	77.24	155620	245298	63.44
Public Administration & Def	4467	122384	3.65	710	177496	0.40
Education	9608	69563	13.81	13145	106580	12.33
Health & Social Work	6026	27640	21.80	12323	53137	23.19
Comm.,social &pers. servs.	23527	38545	61.04	38860	55961	69.44
Pvt. Hhs & extra-terr. Orgns.	3014	3762	80.11	5894	6185	95.29
Total	990041	1786528	55.42	1426218	2855934	49.94