

Table 23. Coal Mining Productivity by State, Mine Type, and Mine Production Range, 2010
(Short Tons Produced per Employee per Hour)

Coal-Producing State, Region ¹ , and Mine Type	Mine Production Range (Thousand Short Tons)							Total ²
	1,000 and Greater	500 to 1,000	200 to 500	100 to 200	50 to 100	10 to 50	Less Than 10	
Alabama	1.98	1.66	2.43	1.97	1.86	1.12	1.65	1.93
Underground.....	1.98	1.02	-	1.79	1.02	0.23	-	1.78
Surface.....	-	2.42	2.43	2.00	1.99	1.81	1.65	2.23
Alaska	6.96	-	-	-	-	-	-	6.96
Surface.....	6.96	-	-	-	-	-	-	6.96
Arizona	7.84	-	-	-	-	-	-	7.84
Surface.....	7.84	-	-	-	-	-	-	7.84
Arkansas	-	-	-	-	-	0.48	0.59	0.49
Underground.....	-	-	-	-	-	0.48	-	0.48
Surface.....	-	-	-	-	-	-	0.59	0.59
Colorado	5.70	3.95	6.38	3.18	-	-	-	5.60
Underground.....	5.92	3.95	-	3.18	-	-	-	5.76
Surface.....	4.98	-	6.38	-	-	-	-	5.05
Illinois	4.52	4.53	2.70	2.45	-	0.42	17.77	4.22
Underground.....	4.42	4.07	1.88	-	-	0.42	-	4.16
Surface.....	5.51	5.74	5.59	2.62	-	-	17.77	4.59
Indiana	4.40	4.53	4.23	-	2.17	1.45	-	4.21
Underground.....	3.60	3.82	-	-	-	0.95	-	3.40
Surface.....	5.44	4.74	4.51	-	2.17	2.14	-	5.04
Kansas	-	-	-	1.39	-	-	-	1.39
Surface.....	-	-	-	1.39	-	-	-	1.39
Kentucky Total	3.94	2.59	2.77	2.06	1.98	1.73	0.90	2.55
Underground.....	3.66	2.21	2.16	1.81	1.79	1.29	0.52	2.32
Surface.....	5.03	3.80	3.32	2.50	2.24	2.12	1.16	3.00
Eastern	3.23	2.63	2.70	2.05	1.99	1.71	0.90	2.18
Underground.....	2.39	2.23	2.16	1.81	1.81	1.31	0.52	1.80
Surface.....	4.30	3.80	3.23	2.50	2.24	2.08	1.16	2.78
Western	4.23	2.05	4.23	2.36	1.52	2.29	-	3.71
Underground.....	3.98	2.05	-	-	1.20	-	-	3.53
Surface.....	6.15	-	4.23	2.36	2.14	3.01	-	4.70
Louisiana	7.30	-	-	-	-	2.26	-	7.23
Surface.....	7.30	-	-	-	-	2.26	-	7.23
Maryland	-	-	3.38	3.51	2.18	2.31	0.79	2.73
Underground.....	-	-	2.82	-	-	-	1.33	2.00
Surface.....	-	-	3.75	3.51	2.18	2.31	0.65	3.14
Mississippi	8.27	-	-	-	-	-	-	8.27
Surface.....	8.27	-	-	-	-	-	-	8.27
Missouri	-	-	9.68	5.09	-	-	-	7.12
Surface.....	-	-	9.68	5.09	-	-	-	7.12
Montana	17.15	-	13.45	-	-	-	-	17.12
Underground.....	6.88	-	-	-	-	-	-	6.88
Surface.....	20.51	-	13.45	-	-	-	-	20.42
New Mexico	8.55	-	-	-	-	-	-	8.55
Underground.....	5.66	-	-	-	-	-	-	5.66
Surface.....	10.15	-	-	-	-	-	-	10.15
North Dakota	13.43	-	-	-	-	-	-	13.39
Surface.....	13.43	-	-	-	-	-	-	13.39
Ohio	4.90	3.76	2.78	2.56	1.97	2.05	0.39	3.96
Underground.....	4.94	3.56	2.77	1.67	1.07	-	-	4.32
Surface.....	4.72	3.87	2.79	3.63	3.44	2.05	0.39	3.42
Oklahoma	-	-	2.35	2.32	-	1.67	1.36	2.27
Underground.....	-	-	2.98	2.47	-	-	-	2.75
Surface.....	-	-	2.10	2.17	-	1.67	1.36	2.04
Pennsylvania Total	4.24	2.94	3.17	2.47	2.01	2.14	1.18	3.19
Underground.....	4.34	2.94	2.92	2.80	1.20	0.77	0.70	3.65
Surface.....	2.36	-	3.57	2.39	2.08	2.25	1.30	2.05
Anthracite	-	-	4.07	-	1.57	1.85	0.97	0.98
Underground.....	-	-	-	-	1.20	-	0.70	0.60
Surface.....	-	-	4.07	-	1.65	1.86	1.22	1.04
Bituminous	4.24	2.94	3.14	2.47	2.29	2.32	1.33	3.42
Underground.....	4.34	2.94	2.92	2.80	-	0.80	-	3.70
Surface.....	2.36	-	3.52	2.39	2.29	2.54	1.33	2.45
Tennessee	-	-	1.32	1.91	1.66	2.08	0.49	1.47
Underground.....	-	-	-	1.50	1.58	-	0.72	1.25
Surface.....	-	-	1.32	2.38	1.68	2.08	0.40	1.59
Texas	7.10	2.18	-	-	-	-	-	6.81
Surface.....	7.10	2.18	-	-	-	-	-	6.81
Utah	5.87	2.89	1.34	-	1.51	-	-	5.04
Underground.....	5.87	2.89	1.34	-	1.51	-	-	5.07

See footnotes at end of table.

Table 23. Coal Mining Productivity by State, Mine Type, and Mine Production Range, 2010 (Continued)
(Short Tons Produced per Employee per Hour)

Coal-Producing State, Region ¹ , and Mine Type	Mine Production Range (Thousand Short Tons)							Total ²
	1,000 and Greater	500 to 1,000	200 to 500	100 to 200	50 to 100	10 to 50	Less Than 10	
Utah (continued)								
Surface.....	-	-	-	-	-	-	-	-
Virginia.....	2.81	3.78	2.23	1.81	1.72	1.15	1.31	2.01
Underground.....	2.81	-	1.80	1.51	1.79	1.13	1.22	1.77
Surface.....	-	3.78	3.34	2.74	1.61	1.21	1.43	2.61
West Virginia Total.....	3.74	3.02	2.24	1.55	2.17	1.25	0.70	2.70
Underground.....	3.51	2.43	2.04	1.35	1.77	0.94	0.40	2.38
Surface.....	4.17	4.00	3.60	2.65	3.49	1.95	0.91	3.46
Northern.....	3.87	3.63	2.21	1.63	2.80	2.13	0.54	3.52
Underground.....	3.81	2.72	2.21	0.85	2.10	1.23	0.35	3.50
Surface.....	4.81	7.45	-	3.23	3.48	2.58	0.73	3.69
Southern.....	3.63	2.98	2.24	1.54	2.05	1.17	0.75	2.45
Underground.....	2.87	2.40	2.03	1.39	1.74	0.93	0.42	1.90
Surface.....	4.11	3.90	3.60	2.53	3.50	1.81	0.97	3.44
Wyoming.....	30.93	-	10.38	-	-	3.25	0.02	30.81
Underground.....	7.14	-	-	-	-	-	-	7.14
Surface.....	31.86	-	10.38	-	-	3.25	0.02	31.72
Appalachian Total.....	3.63	2.84	2.50	1.90	1.97	1.59	0.90	2.58
Underground.....	3.48	2.36	2.13	1.58	1.73	1.09	0.60	2.42
Surface.....	4.15	3.76	3.17	2.51	2.15	2.02	1.02	2.89
Northern.....	4.19	3.36	3.05	2.34	2.07	2.14	0.94	3.42
Underground.....	4.19	3.03	2.77	1.75	1.33	0.91	0.64	3.67
Surface.....	4.15	4.19	3.41	2.62	2.19	2.25	1.00	2.68
Central.....	3.44	2.85	2.39	1.82	1.95	1.42	0.86	2.27
Underground.....	2.76	2.31	2.02	1.57	1.79	1.13	0.59	1.84
Surface.....	4.14	3.85	3.28	2.53	2.17	1.87	1.04	3.03
Southern.....	1.98	1.66	2.43	1.97	1.86	1.12	1.65	1.93
Underground.....	1.98	1.02	-	1.79	1.02	0.23	-	1.78
Surface.....	-	2.42	2.43	2.00	1.99	1.81	1.65	2.23
Interior Total.....	5.05	3.44	3.71	2.39	1.89	1.15	1.58	4.60
Underground.....	4.05	2.99	1.98	2.18	1.20	0.48	-	3.70
Surface.....	6.56	4.07	4.16	2.43	2.16	2.27	1.58	5.83
Illinois Basin.....	4.37	3.64	3.91	2.42	1.89	1.30	17.77	4.02
Underground.....	4.05	2.99	1.59	-	1.20	0.48	-	3.72
Surface.....	5.59	5.04	4.46	2.55	2.16	2.75	17.77	4.89
Western Total.....	19.56	3.19	4.12	3.18	1.51	3.25	0.02	18.95
Underground.....	6.02	3.19	1.34	3.18	1.51	-	-	5.62
Surface.....	24.79	-	9.41	-	-	3.25	0.02	24.65
Powder River Basin.....	32.59	-	-	-	-	-	-	32.59
Surface.....	32.59	-	-	-	-	-	-	32.59
Uinta Region.....	5.77	2.89	1.34	3.18	1.51	-	-	5.36
Underground.....	5.89	2.89	1.34	3.18	1.51	-	-	5.43
Surface.....	4.98	-	-	-	-	-	-	4.89
East of Miss. River.....	3.90	2.91	2.56	1.91	1.97	1.58	0.90	2.83
Underground.....	3.67	2.41	2.12	1.58	1.72	1.07	0.60	2.66
Surface.....	4.72	3.86	3.28	2.51	2.15	2.04	1.03	3.21
West of Miss. River.....	17.43	2.76	3.57	2.53	1.51	1.13	0.38	16.60
Underground.....	6.02	3.19	1.80	2.82	1.51	0.48	-	5.54
Surface.....	20.86	2.18	5.06	2.33	-	2.02	0.38	20.25
Subtotal.....	8.70	2.90	2.58	1.92	1.96	1.57	0.88	5.55
Underground.....	4.00	2.43	2.12	1.60	1.71	1.05	0.60	2.89
Surface.....	15.29	3.80	3.33	2.50	2.15	2.04	0.99	9.47
Refuse Recovery.....	-	-	9.40	15.95	9.59	5.54	0.86	8.15
U.S. Total.....	8.70	2.90	2.60	1.96	2.00	1.62	0.88	5.55

¹ For a definition of coal producing regions, see Glossary.

² Includes all employees at preparation plants and tipples not co-located with a mine.

- = No data are reported.

Note: • Productivity is calculated by dividing total coal production by the total labor hours worked by all employees engaged in production, preparation, processing, development, maintenance, repair shop, or yard work at mining operations, including office workers. Excludes preparation plants with less than 5,000 employee hours during the year, which are not required to provide data.

Source: • U.S. Energy Information Administration Form EIA-7A, "Coal Production and Preparation Report," and U.S. Department of Labor, Mine Safety and Health Administration Form 7000-2, "Quarterly Mine Employment and Coal Production Report."