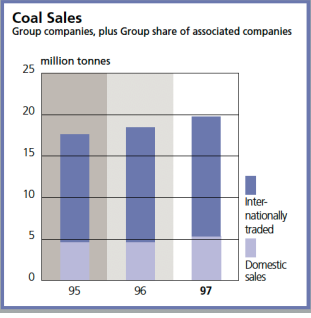


	A	B	C	D	E	F	G	H	I	J	K	L	M	N
1	Coal extraction data													
2	Richard Heede													
3	<i>Climate Mitigation Services</i>													
4	File started: 11 January 2005													
5	Last modified: May 2018													
6														
7														
8														
9	Royal Dutch Shell Group										yellow column indicates original reported units			
10	www.shell.com London													
11	Production / Extraction data													
12	Year	Lignite				Hard Coal				Total Coal				
13		Gross production		Gross production		Gross production		Gross production		Gross production		Gross production		
14		Million tons/yr		Million tonnes/yr		Million tons/yr		Million tonnes/yr		Million tons/yr		Million tonnes/yr		
15														
16														
17		1950												
18		1951												
19		1952												
20		1953												
21		1954												
22		1955												
23		1956												
24		1957												
25		1958												
26		1959												
27		1960												
28		1961												
29		1962												
30		1963												
31		1964												
32		1965												
33		1966												
34		1967												
35		1968												
36		1969												
37		1970												
38		1971												
39		1972												
40		1973												
41		1974												
42		1975												
43		1976												
44		1977												
45		1978												
46		1979												
47		1980												
48		1981												
49		1982												
50		1983												
51		1984												
52		1985												
53		1986												
54		1987												
55		1988												
56		1989												
57		1990												
58		1991												
59		1992												
60		1993												
61		1994												
62		1995												
63		1996												
64		1997												
65		1998												
66		1999												
67		2000												
68		2001												
69		2002												
70		2003												
71		2004												
72		2005												
73		2006												
74		2007												
75		2008												
76														
77		Total		-	-		123	460		507	460			
78														
79														
80		Coal Types:		Lignite:	0.00%		Thermal coal	100.00%		Metallurg./Anthrac.	0.00%		100.00%	
81														



Production attributed to Anglo American (acquired in 2000)

Production assumed to be "thermal coal" (US average)

		8.8		9.7	8.8
interpolated		11.8		13.0	11.8
interpolated		15.0		16.5	15.0
		18.0		19.8	18.0
		20.0		22.0	20.0
		23.0		25.4	23.0
Keystone, US prod'n		23.0		25.4	23.0
	8.7	28.0		30.9	28.0
	15.4	27.0		29.8	27.0
	24.4	30.0		33.1	30.0
	25.5	33.0		36.4	33.0
	24.6	31.0 int		34.1	31.0
	24.3	28.9 int		31.9	28.9
not included in sum		26.9 int		29.6	26.9
		24.8		27.3	24.8
		23.1		25.5	23.1
		17.7		19.5	17.7
		18.5		20.4	18.5
		19.8		21.8	19.8
		14.2		15.7	14.2
		17.1		18.8	17.1

Coal interests sold to Anglo American, July 2000

Shell's coal mines in South Africa (98% bituminous), Australia (78.6% bituminous, 21% lignite) -- AnnRpt1997.
Shell does not specify coal rank
CMS assumes US thermal coal heating value and carbon factor

Shell Coal

Cell: I9

Comment: Rick Heede:

Shell was formed in 1907 through the amalgamation of the Royal Dutch Petroleum Company of the Netherlands and the "Shell" Transport and Trading Company of the United Kingdom. Until its unification in 2005 the firm operated as a dual-listed company, whereby the British and Dutch companies maintained their legal existence but operated as a single-unit partnership for business purposes. Shell first entered the chemicals industry in 1929. In 1970 Shell acquired the mining company Billiton, which it subsequently sold in 1994 and now forms part of BHP Billiton. In recent decades gas exploration and production has become an increasingly important part of Shell's business. Shell acquired BG Group in 2016, making it the world's largest producer of liquefied natural gas (LNG).

Cell: D11

Comment: Rick Heede:

Coal production by coal mining companies and state-owned enterprises, including subsidiaries of oil and gas companies.

Coal types produced are not ordinarily reported by coal operators (except for metallurgical coal). We distinguish, where possible and reasonably well known, between hard (bituminous and subbituminous) and soft (lignite or peat) coals, especially for the larger companies operating in regions such as Australia and India where soft coals are predominant. Soft coals have lower carbon content per tonne than do hard coals.

Cell: H46

Comment: Rick Heede:

Coal SALES in 1979 from Royal Dutch Shell (1980) Annual Report, p. 18. "Sales of internationally traded coal reached 5.6 million tonnes, more than three times the 1978 figure. In addition, Shell Oil Company sold 3.2 million tonnes of domestically produced coal in the United States." Note: It is unclear if coal sales are equivalent to coal production by RDSG or its equity production.

Cell: H51

Comment: Rick Heede:

Coal production from Royal Dutch/Shell Group (1985) SEC Form 20-F, p. G-23.

Total production has to be inferred for 1982 and 1983 from the changes in coal reserves:
1982: 9 million tonnes plus ~9 million tonnes from Group equity production of associated companies = 20 Mt;
1983: 11 Mt plus 9 Mt = 20 Mt;
1984: 14 Mt plus 9 Mt.

Note: there are no details on coal types produced.

Cell: H54

Comment: Rick Heede:

Coal production 1985-1987 from Royal Dutch/Shell Group (1988) SEC Form 20-F, p. G-32-33.

1985: 14 million tonnes plus 9 million tonnes from Group equity production of associated companies = 23 Mt;
1986: 16 Mt plus 12 Mt = 28 Mt;
1987: 21 Mt plus 6 Mt = 27 Mt.

Cell: H55

Comment: Rick Heede:

Royal Dutch/Shell Group Annual Report for 1989. CMS lacks the pages showing coal production, but do have net changes to reserves showing approx production, on p. 49, for 1989 and 1988.

Cell: G58

Comment: Rick Heede:

Keystone Coal Industry manual for 1993, p. 372, shows Shell Mining Company coal production of 24.3 million tons. Shell does not appear the following year.

Cell: H60

Comment: Rick Heede:

Royal Dutch/Shell Group Annual Report for 1997, Operating Comparisons 1993-1997, p. 63, shows coal sales (international is ~73 percent of total, domestic ~27 percent in 1997, but roughly equal in 1993).

Cell: H64

Comment: Rick Heede:

Shell Annual Report 1997, page 33.

Coal

Coal earnings for 1997, at £24 million, included gains from the divestment of Shell's South African coal interests as well as the sale of the South Bulli mine and the sale of a 12% interest in the new Moranbah North mine (both in Australia). The Moranbah North mine commenced underground development in July and is planned to become fully operational as a coking-coal producer in 1999. Geological difficulties at two Australian mines adversely affected operational results. These results were further depressed by weak thermal and coking coal prices arising from a slow-down in demand growth in the Asia-Pacific region and excess production capacity within Australia.

Cell: H65

Comment: Rick Heede:

Shell Annual Report for 1998, p. 37: equity production of 14.2 million tonnes.

Cell: H66

Comment: Rick Heede:

Royal Dutch/Shell Group Annual Report for 1999, p. 29

Coal. The decision was taken in August 1999 to divest the coal business. The sale is expected to be concluded during 2000. Equity production from all mines rose 20% relative to 1998, to 17.1 million tonnes.

Cell: H67

Comment: Rick Heede:

"Anglo American Pty Ltd has announced it has acquired the Shell Coal assets. Price is reported to be between US\$850 to US\$900 million. While this includes all the coal mines, the 50% stake in the new Callide power station is being marketed separately."
www.energyminerals.com.au/news3.html, undated.