



Cycle on the up

LONG-TERM PRODUCTION TRENDS SUGGEST THE
RESOURCES SECTOR IS ON THE VERGE OF ITS
STRONGEST UPTURN IN DECADES BY JENNIFER MEAD

Australia's resources sector is showing signs of what might become its strongest growth cycle in 40 years. The "boom" word is still only being spoken quietly, but long-term production trends indicate that a strong revival has already begun in some resource industries and others are on the verge of joining them. BRW expects the sector overall, and mining in particular, to markedly increase its contribution to the economy, as measured by gross domestic product (GDP), over the 10 years between 2005 and 2015.

Capital spending on resource projects is rising strongly, and Australia's world-competitive advantage in most mineral and energy sectors continues to improve, stemming from an impressive long-term record in development and supply, political stability and closeness to Asia.

There has been a dramatic shift in industrial production to the Asia-Pacific region, especially China.

Two mining industries, iron ore and nickel, are already in new phases of growth. They have been relatively unscathed by the sluggish world economy over the past two years, and the demand for iron ore and nickel has surged because of China's extraordinary spurt in industrial growth. A recovery in world economic growth, this year or next, should result in other key Australian resources — notably oil and gas, coal, and copper — entering new growth cycles in 2003-04 and 2004-05. That would lead the overall resources sector into a new era of strong and sustained growth.

Long-term cycles in resources are usually about 40 years, and the path to a boom is usually blazed by just one or two of the sector's industries before others catch up. The last cycle in Australia began in the early-to-middle 1960s, when the resources sector was at a low point, contributing only 1.6% of GDP, and went on to an apogee of 6.7% in the early 1980s. After that, there was sharp decline, to a low point in 1998-99 when resources contributed 4.1% of GDP, largely because of the Asian economic crises. The late 1990s is expected to mark the bottom of the cycle; by June 2001 the share of GDP had gone above 5%, although it dipped slightly in the following 12 months. (See chart of the resources sector's share of GDP, 1955-2002, on page 54.)

One of the best leading indicators for a new cycle is capital spending or investment in big new projects: buildings and structures, machinery and equipment, and intangible fixed assets. (But not mineral-processing facilities, because they are considered to be part of the manufacturing industry.)

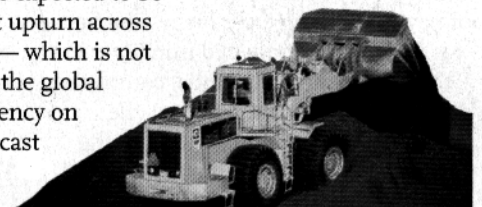
Capital spending across the resources sector is always volatile but now it is clearly rising. A spike over the three years to 1998-99 was followed by a sharp fall in 1999-2000, but even then spending was above that in the first half of the 1990s. Certainly, a 20-year

pattern of falling investment has been reversed. Capital expenditure declined sharply, to about \$6 billion a year, in line with the sector's relatively poor performance in the early and middle 1980s, and remained flat through to the mid-1990s. But by 1998-99, annual spending had risen to \$14.5 billion. (See chart of capital spending, page 54). The big spenders were miners of nickel, iron ore, copper and coal. Big projects included development of the Murrin Murrin nickel deposits (\$1.5 billion) and the Yandi iron ore mine (\$720 million) in Western Australia, expansion of mostly copper production at Olympic Dam (\$1.9 billion) in South Australia, and eight new coal mines (\$1.4 billion) in Queensland and New South Wales.

All indicators suggest that this capital spending spike is not a one-off, but the start of a more sustained period of investment. Capital expenditure in all resource industries increased from \$10.3 billion in 2000-01 to \$13.8 billion in 2001-02. A list of big projects under way, compiled by the Australian Bureau of Agricultural and Resource Economics (ABARE), suggests that spending will be up again, by at least 10%, in 2002-03: in December 2002 there were 28 projects that had firm commitments, with total estimated capital costs of \$11.7 billion. A further \$3.5 billion was committed to associated mineral-processing facilities. The increased investment in resources is heavily skewed towards the energy-source industries, particularly gas and coal. Projects include a fourth production line for liquefied natural gas on the North-West Shelf and Phillips Petroleum's gas project in the Timor Sea.

Equally impressive is the total number of less-advanced projects: ABARE says that in December there were 17 projects in this category, with estimated potential capital spending of about \$60 billion, and a further 25 mineral-processing projects with potential capital spending of about \$22 billion. Some of these are only at the feasibility stage and will never proceed. Nevertheless, the number of potential projects added to the list over the past six months is well above the average of recent years, and the value of committed projects is also increasing.

Future capital spending is forecast to remain heavily skewed towards energy projects, particularly gas. Of the \$60 billion forecast to be spent on less-advanced projects, \$40 billion is accounted for by coal, oil and gas. Energy projects, especially for the export of liquefied natural gas, are expected to be the mainstay of the next upturn across the resource industries — which is not surprising, considering the global shift away from dependency on oil. Other key areas forecast to attract strong capital spending in the



medium term include nickel, iron ore and copper.

A strong growth cycle in the overall resources sector will not be confined to one or two industries, although it usually starts that way. The 1960s boom was a staggered affair. It began with heavy activity in iron ore, coal and bauxite in the mid-1960s, followed by nickel in 1967, and oil and gas in the late 1960s.

This time, the iron ore and nickel industries are setting the pace. Both satisfy the key tests for a new cycle: a new technology, new geography (investment in new mines) and a new market (China). Iron ore is the fourth-largest of the resource industries and annual sales are running at about \$6 billion. (The three top earners are coal, oil and gas, and gold.) Iron ore exports have increased from 142.2 million tonnes in 1997-98 to 156.0 million in 2001-02, and ABARE forecasts 173.5 million in 2002-03 because of increased capacity from new mines completed in 2002. This represents an average annual growth rate of 6.8% over the five years to 2002-03. The value of iron ore exports is forecast to be \$5.2 billion in 2002-03, up from \$3.8 billion in 1997-98.

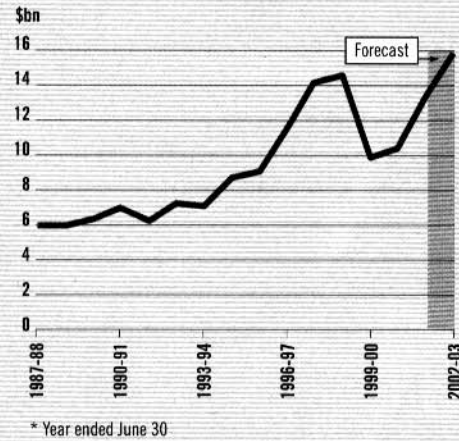
And the story here is China, which is rapidly becoming the world's factory. Over the past three years, Australia has averaged 23% annual growth in iron ore exports to China. Five years ago, the Japanese market for iron ore was twice the size of China's, but China is now expected to pass Japan as the world's largest market for iron ore some time this year. This reflects the rising importance of the Chinese economy and the increasingly globalised nature of production. United States and Japanese manufacturers are shifting their manufacturing base to China because of its low costs, and China is rapidly modernising its domestic industrial base.

Doug Anderson, the managing director of the Brisbane consultancy Lee-Anderson Group, says: "The Japanese have made a decision to place their production in China. Even Toyota is going in."

One of the spurs for Australia's iron ore mining has been the development of new processing technology. The first was BHP's hot briquetted iron plant in Boodarie, Western Australia, completed in 1998-99. More important is the revolutionary direct iron ore smelting technology, named HIsmelt, developed by Rio Tinto and CSIRO. The first plant

Big spenders return

Resource industries' capital spending*

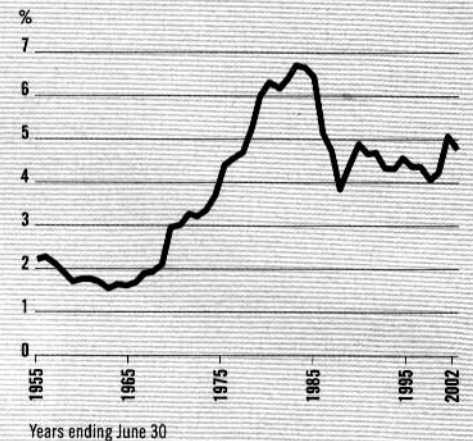


* Year ended June 30

SOURCE: AUSTRALIAN BUREAU OF STATISTICS / GETWISE

The cycle turns

Resource industries' share of GDP

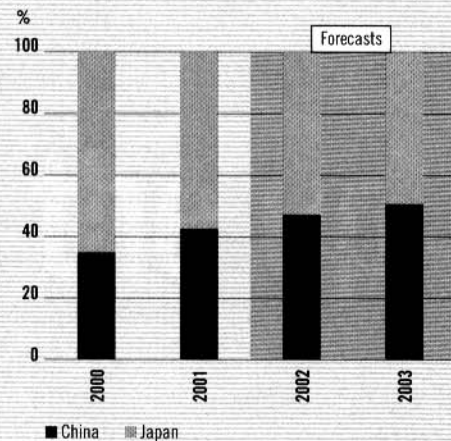


Years ending June 30

SOURCE: AUSTRALIAN BUREAU OF STATISTICS

China surges ahead

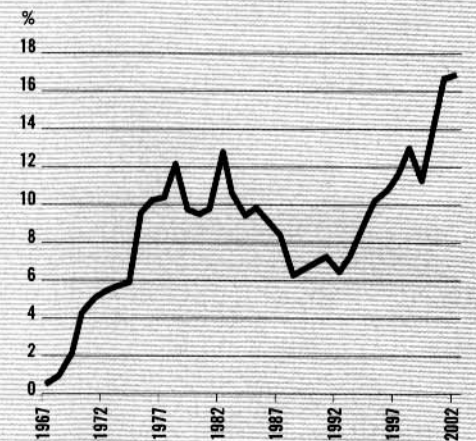
Share of world iron ore imports by Japan and China



SOURCE: AUSTRALIAN BUREAU OF AGRICULTURAL AND RESOURCE ECONOMICS

No stopping nickel

Australia's share of world nickel production



SOURCE: AUSTRALIAN BUREAU OF AGRICULTURAL AND RESOURCE ECONOMICS



ROB HONER

China is rapidly becoming the world's factory, and is expected to pass Japan as the world's largest market for iron ore

at least in nominal terms, is possible. World iron ore trade is increasingly being concentrated in the hands of three main competitors: BHP Billiton, Rio Tinto and CVRD of Brazil. This concentration of ownership gives Australia a stronger bargaining position at a time of strong growth in China.

Robin Chambers, senior partner of the Melbourne international law firm Chambers & Company, says: "China is becoming the engine of Asia, sucking manufacturing out of all the other Asian countries." Chambers says the Chinese regard Australia as an attractive source of raw materials because of the quality and diversity of its resources base.

This diversity can be seen in nickel, which earns revenue of about \$2.2 billion. Nickel exports rose from 161,000 tonnes in 1997-98 to 190,000 tonnes in 2001-02. ABARE forecasts that exports will increase by 10% in 2002-03 to 209,000 tonnes. The value of nickel exports is forecast to rise by just under 20% in 2002-03 from \$1.77 billion to

with the technology is under construction at Kwinana in WA. These new high-technology plants are expected to dramatically increase domestic use of iron ore and exports of iron and steel in the medium term.

The large volume increases from new low-cost mines have offset the marginal decline in iron ore prices in 2002-03. Any further downward pressure on prices is forecast to ease from 2003-04 and a price increase,

\$2.12 billion. Prices are forecast to rise sharply in the short term in response to a temporary demand-and-supply imbalance. This will take the average annual growth rate in export volumes over the past five years to 5.4% and in export values to 13.9%.

The development of Australia's vast laterite nickel deposits with new technology is, and will continue to be, a feature of the present growth cycle. The Murrin Murrin development by Anaconda is the largest new mine, with a projected output of 40,000 tonnes. However, the new mining process has had serious problems. Shareholders have suffered and Anaconda is a takeover target. The timing of the bid, in light of the outlook for nickel, suggests it should be a very profitable venture for the new owners should the present offer succeed. More than \$2.5 billion has been invested in new nickel mines over the past few years, and a further \$5 billion in new projects is on the list of less-advanced projects compiled by ABARE.

In the nickel sector, China and other Asian countries (excluding Japan) are the new markets for the new century. The region continues to increase its share of world manufacturing and, in turn, its consumption of most minerals and energy. The chart (see page 54) shows Australia's share of world nickel production since the industry began here in 1967. On a trend basis, Australia has been increasing its share of world nickel production since the early 1990s, and the trend is likely to continue. ●

