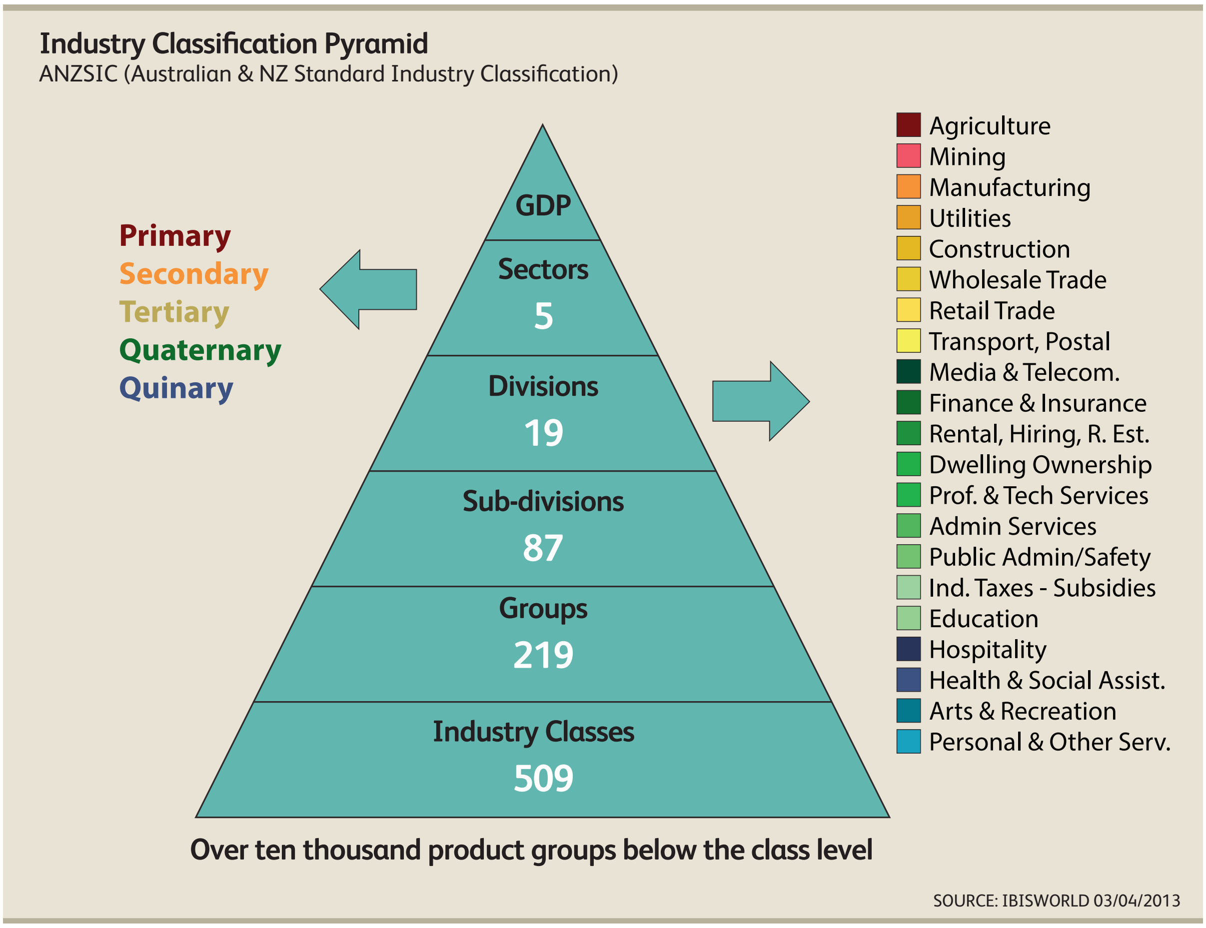
The Phenomenon of Industry Cycles

IBISWorld Newsletter
April 2013
Phil Ruthven, Chairman

Australia's economy houses 509 classes of industry that generated revenue of around $4.4 trillion in 2012 and GDP of some $1.5 trillion, after removing the double counting down the nation's input-output chain from resources to end consumers at home and abroad. A nation's GDP, after all, is the final value of all goods and services produced as they reach the ultimate consumers here and overseas (around one-fifth in the form of exports).

These hundreds of classes of industry are aggregated by the Australian Bureau of Statistics (ABS) using the Australian & New Zealand Standard Industry Classification, as shown in the first chart. The penultimate aggregation (sectors) is an IBISWorld construct as an addition in this aggregation process.



We have highlighted and named the 19 industry divisions (and two other components of our GDP, being imputed dwelling ownership value and indirect taxes less subsidies) that house the 87 industry subdivisions, which house the 219 industry groups that house the 509 industry classes. Below that level, there are over 10,000 primary activities or product groups of goods and services.

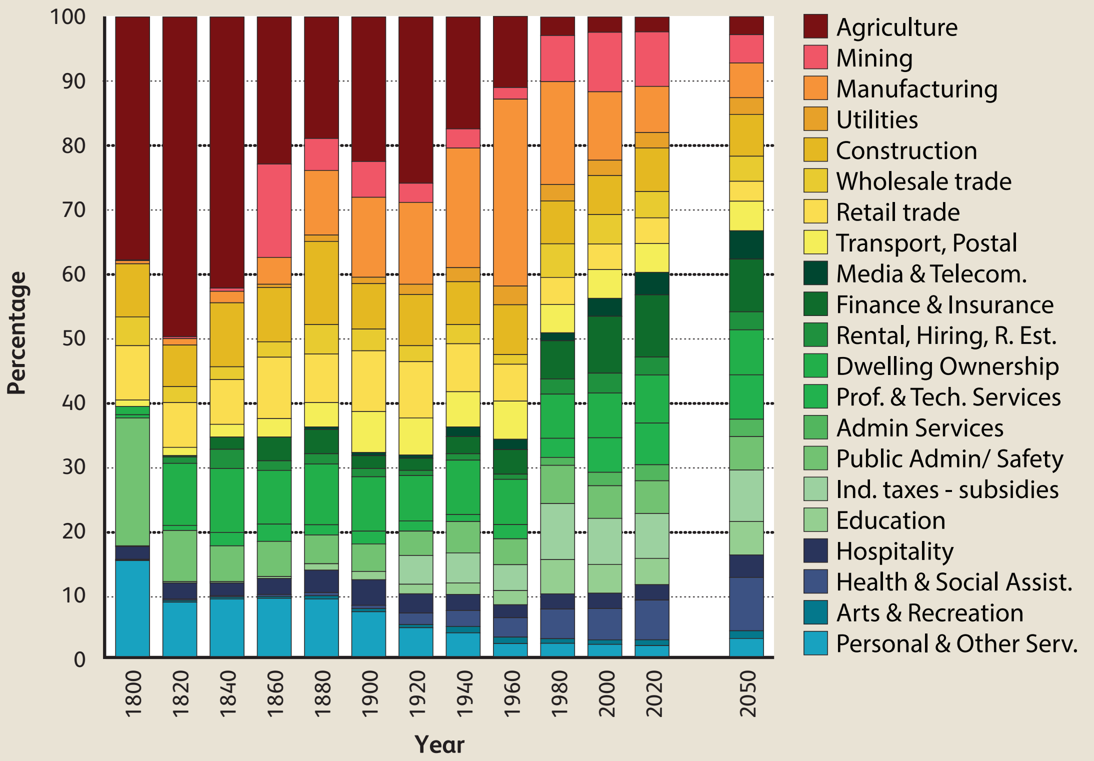
At any level on this pyramid there are long cycles stretching out for decades for the individual industries. At the GDP level we tend to use the term “ages” to describe the long periods of progress such as the Hunting and Trapping Age, the Agrarian Age, the Industrial Age and the current Infotronics Age, where service industries dominate and information and communications technology (ICT) is the underpinning pervasive utility.

These ages are getting shorter. The Hunting and Trapping Age went for tens of millenniums, the Agrarian Age for over four millenniums and the Industrial Age (still underway in some developing economies) will have lasted three centuries. The Infotronics Age began only in the mid-1960s and only in the developed economies, which account for half of the world’s GDP but less than one-quarter of the world’s population. It should last for half the length of the Industrial Age, or 150 years or less. And the next new age – the Enlightenment Age – perhaps only half that again.

The relative importance of the five sectors shown on the pyramid has run in cycles, as the second chart shows with the five colours used to highlight the clusters of industry divisions that make up the sectors.

Importance of Industries

Shares of GDP by industry division



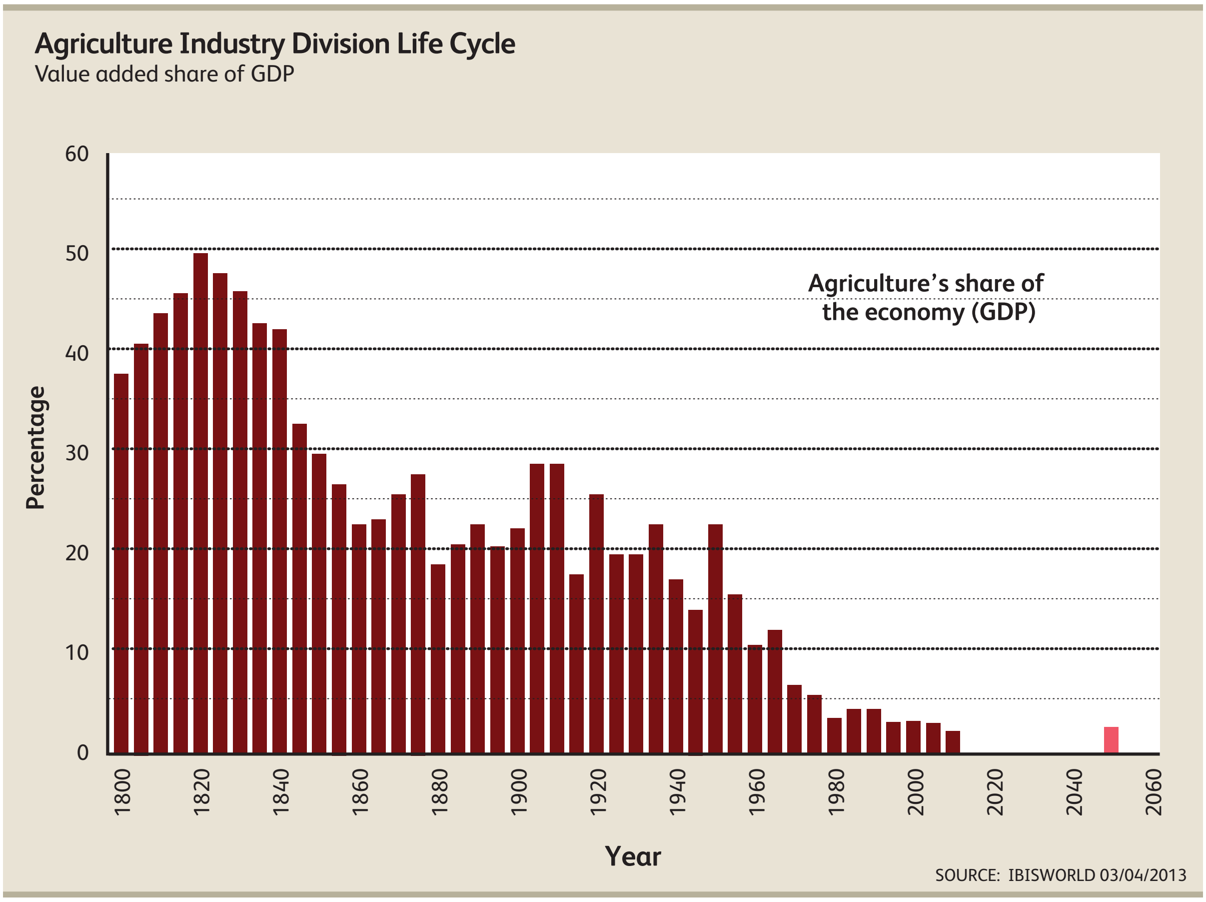
Note: at market prices to 1940, at factor cost thereafter

SOURCE: N.G. BUTLIN, ABS & IBISWORLD 03/04/2013

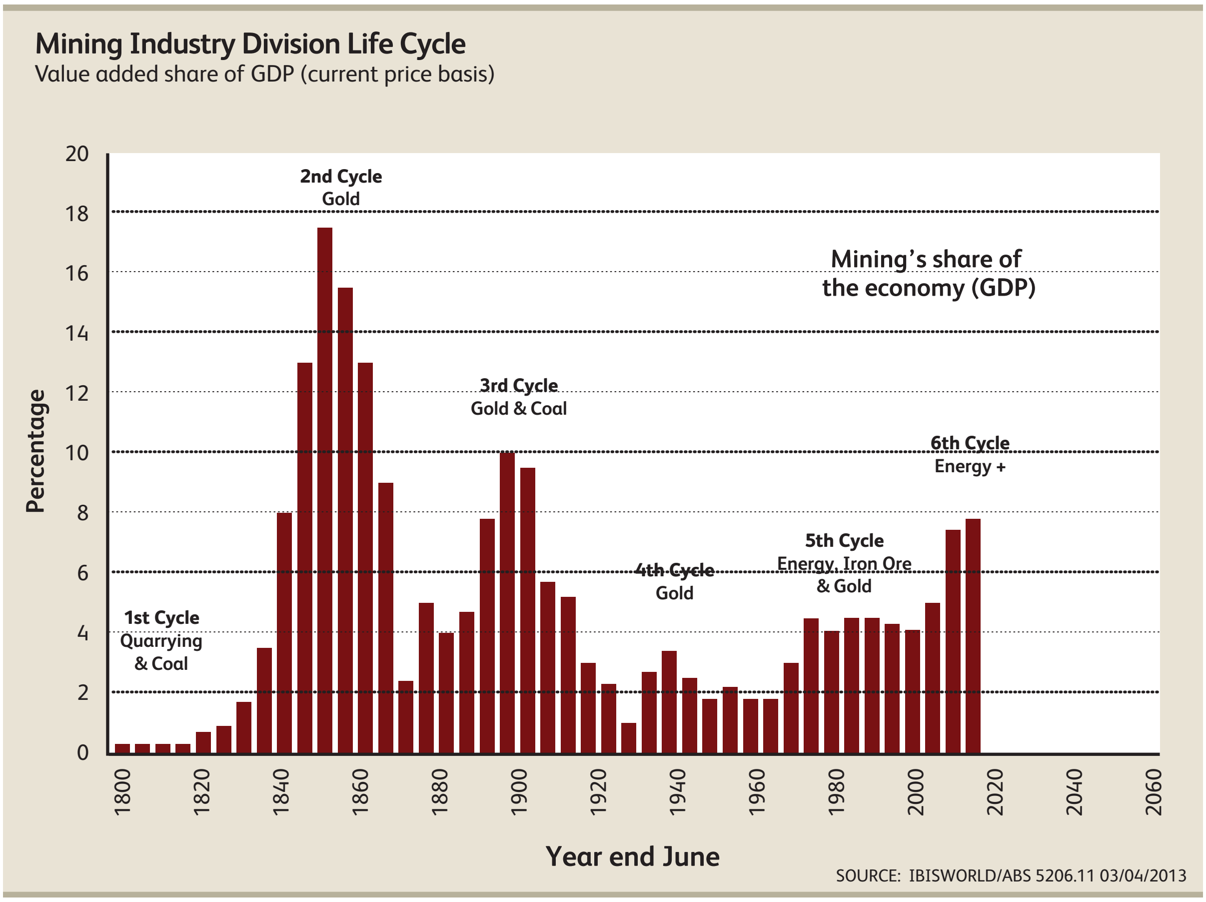
However, the cycles in the 19 divisions have their own lengths and character. We have chosen three of them to show these unique patterns, albeit with each having reasonably defined long cycles of 40 or more years.

Agriculture has been in long-term decline, Mining in a horizontal pattern and Finance & Insurance on an ascendant trajectory (but close to peaking over the next decade).

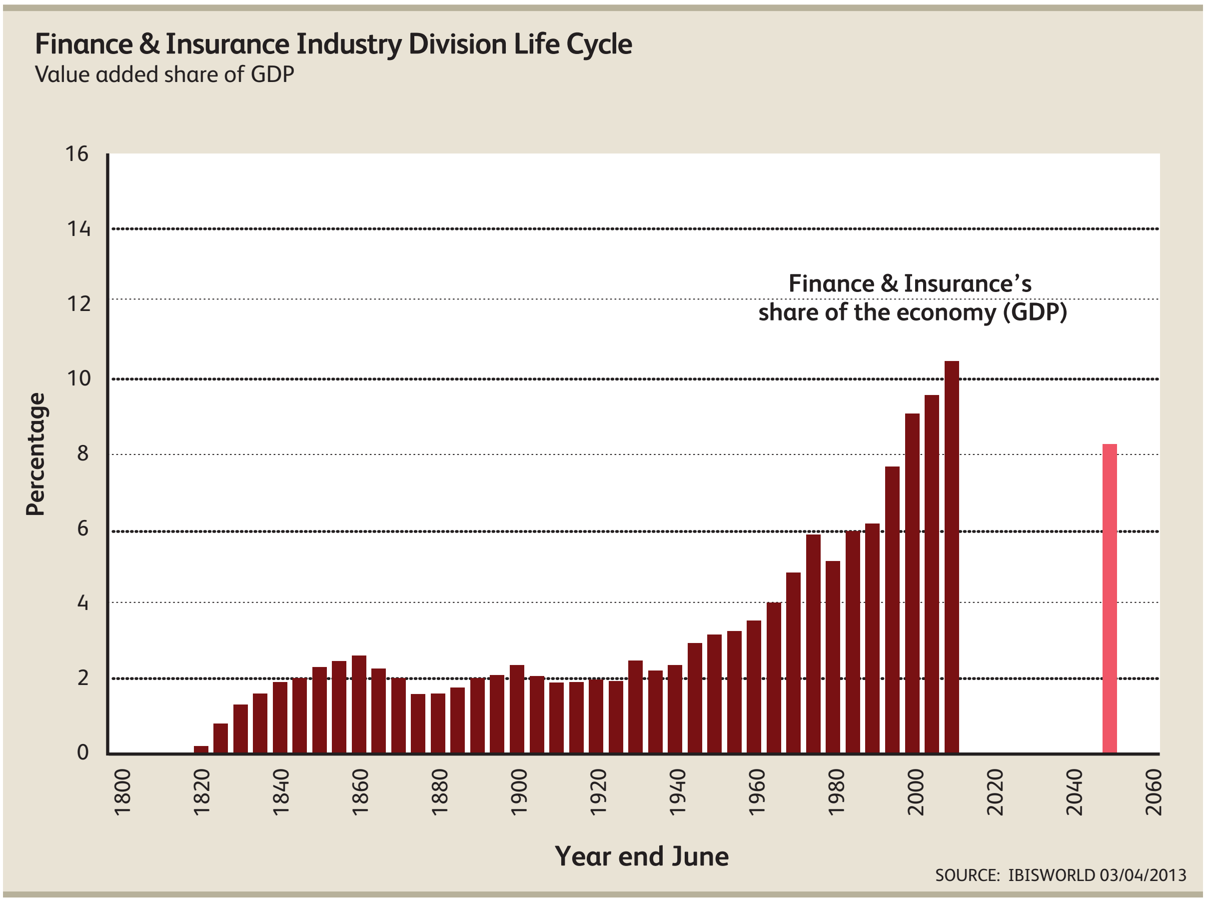
Agriculture has had two clear cycles of around 100 years each, with a weak third seemingly beginning around 1990, then fading. Food security issues across Asia seem to favour a new cycle emerging in the next decade or so, or a rejuvenation of the current weak and depressed cycle. The third cycle is likely to be progressively dominated by corporate agriculture.



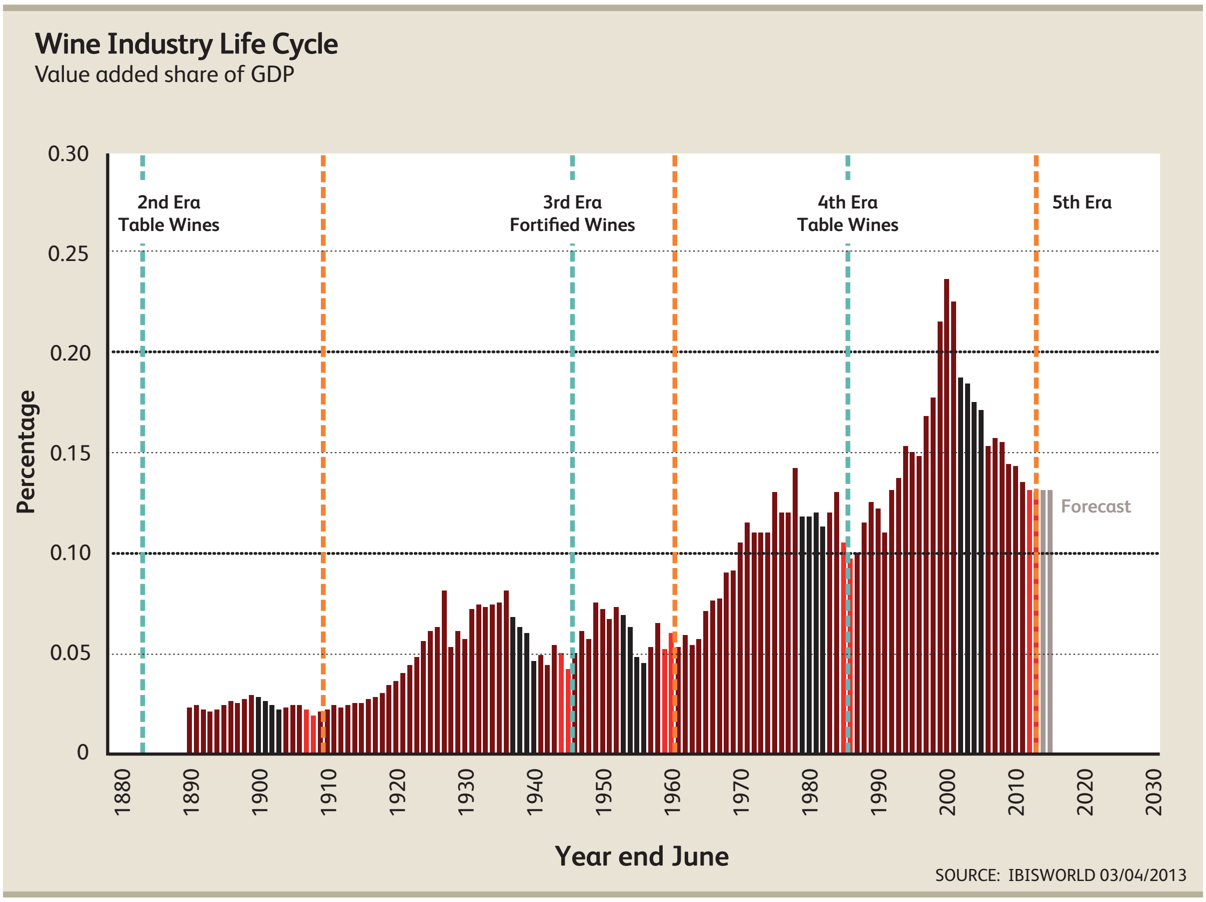
Mining has a more pronounced set of cycles: six of them since European settlement in 1788, averaging some 43 years in length. Gold has featured in four of these cycles, and coal also in four of them. The 5th and 6th cycles, however, are important because of the profound shift from mineral ores to energy ores (oil, natural gas, uranium and coal). By the middle of this century, 80% of the industry division will be in energy resources.



The Finance & Insurance industry division seems to run in 55-year cycles, with the current 4th cycle being dominated progressively by managed funds, displacing the dominance of banks in one form or another over the past cycles. The current cycle is due to rise a little further as a share of GDP, then bottom out before the middle of the century.



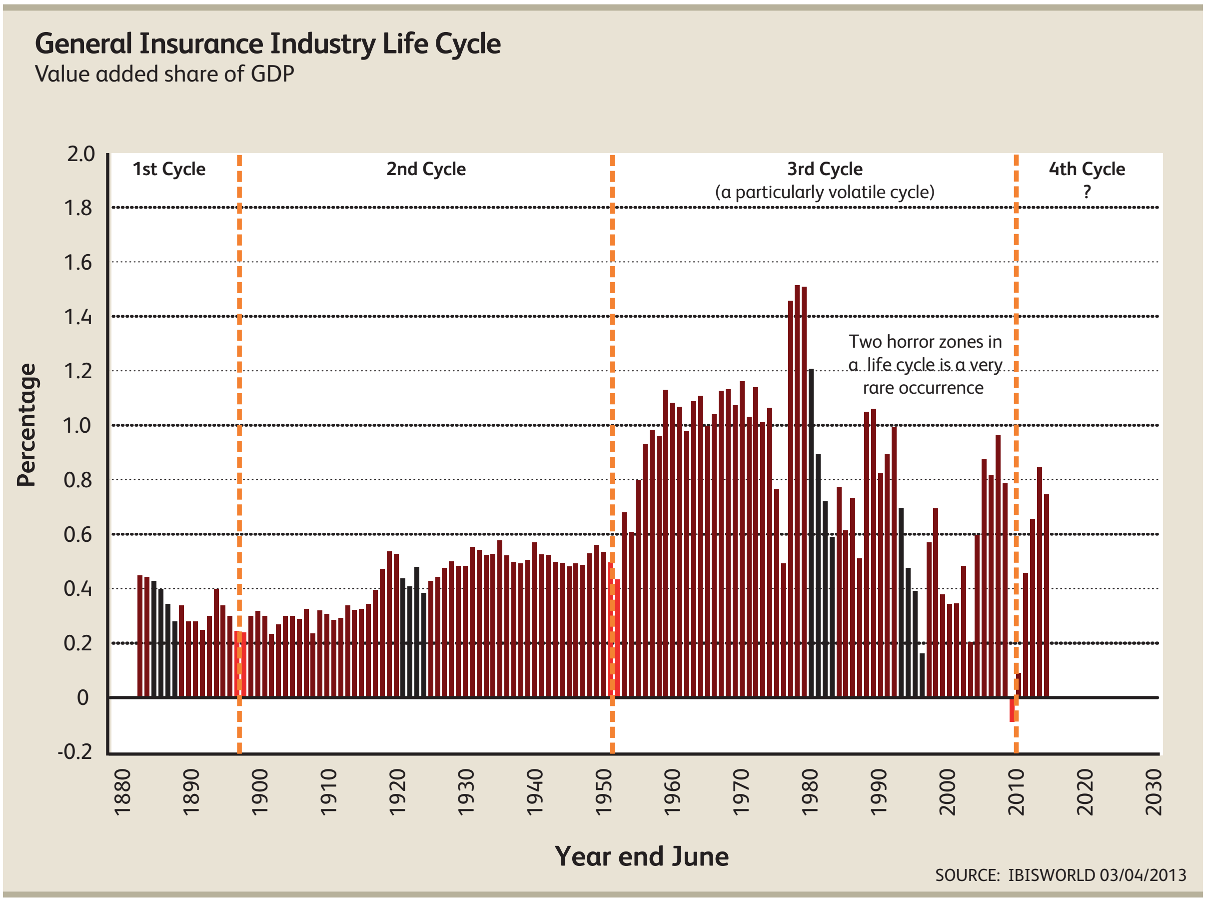
If we now drop down to the class level, where there are 509 industries and where most businesses define their prime activities (apart from the small number of conglomerates among the nation's 1.6 million businesses), we can again see unique cyclical behaviour. We begin with an industry that started, falteringly, with the arrival of the First Fleet in 1788: the Wine industry.



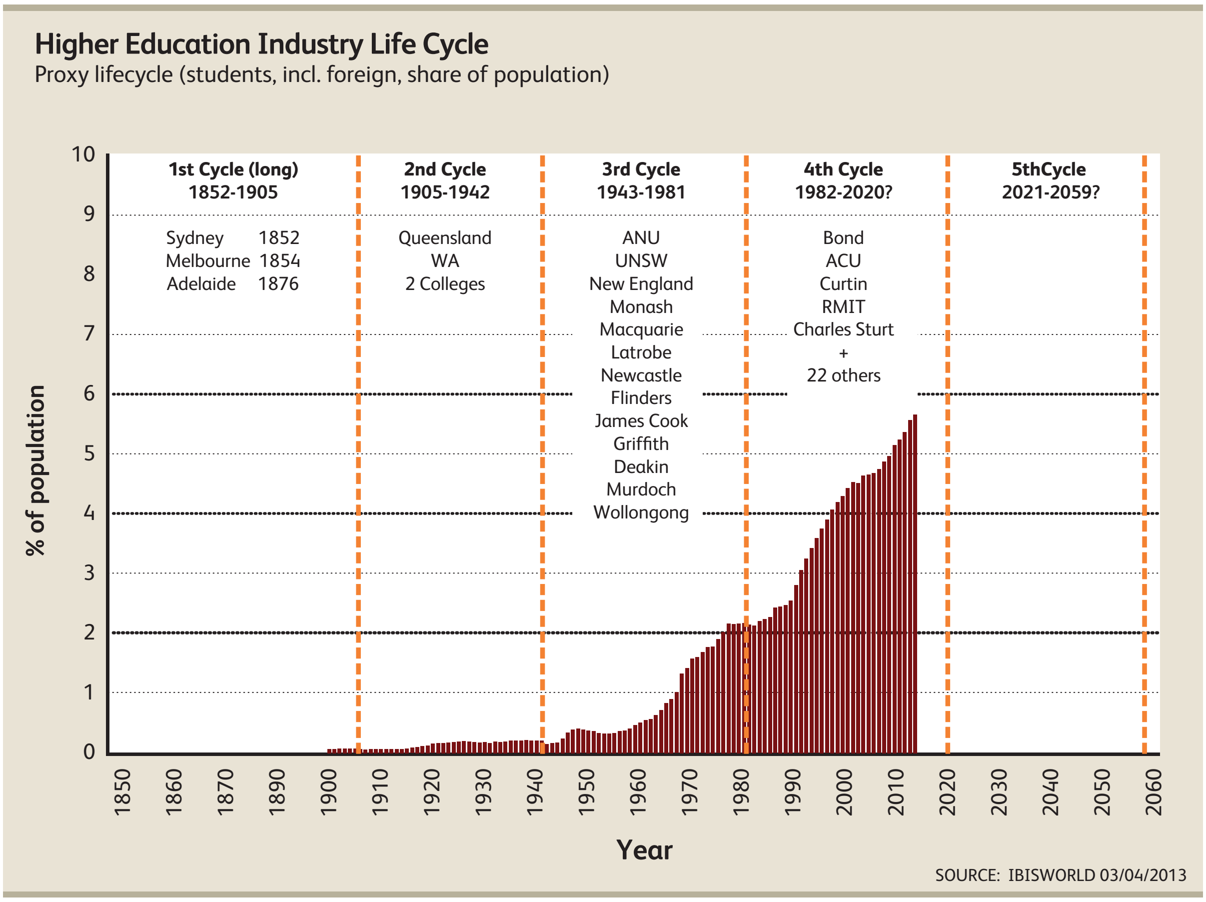
This industry is now into its 5th era and 9th life cycle (the earliest being off the chart above). The red and black emphasised columns are periods of particular difficulty that IBISWorld terms "horror zones" and "terror zones" that lead to heavy falls in profitability, shake-outs and rationalisation. Every class of industry experiences them, so knowing where you are on the cycle is critical to strategic planning.

The next two examples are different: General Insurance and Higher Education.

The General Insurance industry seems to be in its 4th cycle since inception, but what a volatile pattern over the last three decades of its 3rd life cycle! No wonder there is hardly a player that survived the complete cycle without being taken over, failing or aggregating a cluster of smaller insurance companies. In the process, many foreign companies left the industry altogether.



The Higher Education industry has been on an ascendant trajectory and seems to be close to completing its 4th cycle (since the 1850s) around 2020. It is about to experience all the challenges of the closing years of this cycle including rationalisation among the 38 players and their diverse faculties and schools, the huge system and technology changes involving virtual classrooms, the emergence of corporate and global universities, and the need to reduce real costs of degrees by at least one-third if not half.



Ignoring the reality of cyclical behaviour in one's own industry or supplier and customer industries is dangerous, especially given the narrower margins today compared with decades ago and the many sources of volatility, both local and global.

Knowing the shape, direction and phase of one's own industry class, on the other hand, provides a measure of comfort and a little more certainty in longer range planning. This is particularly true when it comes to capital expenditure, which is – after all – a long-term commitment to a perceived industry direction.