Book reviews

Geoffrey Channon, *Railways in Britain and the United States, 1830–1940: studies in economic and business history*, Ashgate, Aldershot (2001), 353 pp., £45.00.

Geoffrey Channon is one of Britain's leading post-war transport historians. His ambitious new monograph comes as something of a surprise. As the preface suggests, scholars have been waiting for this publication for some time now, and in the event it is not quite the book they were led to expect. The author, we had assumed, was writing a definitive modern history of the Great Western Railway, a business historian's alternative to MacDermot, perhaps, but here only about a third of the text is concerned with that company. Instead Channon has provided a much more valuable contribution to scholarship, a wide-ranging foray into comparative transport history, embracing two of the most interesting countries, Great Britain and the United States. In fact this book is as much a matter of business history as railway history. It is subtitled *Studies in economic and business history*, and the approach of that outstanding American business historian Alfred D. Chandler, Jr, appears at centre stage.

The first two chapters deal with Chandler's typology and the railway industries in the United States and Britain. Readers may be familiar with Channon's review article of *The Visible Hand* in this journal in 1981. His new material, drawing on subsequent contributions from scholars such as Gerald Crompton, Frank Dobbin, Robert Dawson Kennedy, Greg Thompson and Olivier Zunz, takes the analysis much further. In chapter 1, which deals with the United States, he provides a succinct literature review of railroad development while also highlighting the distinct limits to the contribution which the companies made to management practice generally. He also makes the very valid point that the intervention of the State in railroads represented another kind of 'visible hand', something which Chandler fails to emphasise. In chapter 2, which examines the British case, there are some percipient observations which counter the once familiar view that nothing in Britain matched the importance which American railroads exerted in their economy. Channon makes good use of Peter Wardley's listing of the largest British companies, which is dominated by the railway industry, to point out that in the early twentieth century three British railway companies were larger (in employment terms) than all the US railroads with the exception of the Pennsylvania. High concentration levels and the complexities of oligopolistic competition came earlier in Britain and should not be underestimated. Chandler has asserted that the managerial challenge in Britain was less testing than in America, where the route mileage was ten times greater. Channon's response is that the nature of the challenge was different. British managers had to grapple with the operation of a comparatively dense, intensive and, above all, expensive network. Furthermore the industry was established in a comparatively short time, a case of 'compressed development', and the acquisition of land was a much more complex affair. Given the recent revisionism to which Chandler's work has been subjected, there are few surprises here. Nevertheless, it should be recognised that Channon was one of the earliest critics of Chandler, and both scholars and students will welcome his more mature thoughts on the subject.

It has to be said that a fair amount of the material in this book has been published before. For example, there is the promotion of the Great Western Railway by Bristol capitalists, a substantial chapter that is as much a contribution to the economic and social history of Bristol as a piece of mere 'railway history'. Subsequent chapters will also be familiar: on the Midland Railway's strategic extension to London St Pancras (still a classic dissection of decision making within Britain's railway companies), on railway competition and pooling, and on the Great Western after the Railways Act of 1921, which exposes the deep-seated failure of railway companies to combine responsibility for commercial and operating functions in their organisations. However, it should be emphasised that all this work has been subject to revision, and in particular to juxtaposition with subsequent scholarship. Its appearance in one place in a new form taking on board contributions such as those of Dresser and Ollerenshaw (on Bristol), Lamoureax, Raff and Temin (on theoretical perspectives in business history) and Crompton (on Britain's inter-war railways) greatly strengthens Channon's contribution to transport history. The book also contains newer material. There are three chapters on the recruitment, functions and interlocking business relations of the British railway director, based on the experience of the Great Western. Catching the eye here is a short but provocative piece on English landed society which reveals how the flagging fortunes and waning influence of some aristocrats were shored up by involvement in the railway industry, which was used as a stepping stone to broader links with commerce and industry. Last, but certainly not least, there is Channon's American work, the product of his fruitful studies at the Hagley Museum and Library in Wilmington. In chapters 10 and 11 the Pennsylvania Railroad is put under the microscope of a British historian. Unlike the Great Western, which may be taken to be representative of a large British railway company, the Penn was not typical of America's larger railroads; indeed, in many ways, and especially organisationally, it was exceptional, and it would be dangerous to infer too much from such a case. However, in examining the company's industrial relations record Channon is able to point out that this exemplar of best practice had a labour management system which was less rule-bound than its organisational handbooks suggested. It allowed local practices to develop, and standardised only when pressed by organised labour to do so. Finally, the author addresses that old conundrum: why did British railway companies build most of their own locomotives while the American companies, by and large, did not? The path-dependence of the repair function provides one convincing hypothesis, but, of course, there are others, and readers interested in this topic are invited to consult the much fuller account of the British locomotive building industry in David Boughey's recent University of London Ph.D. thesis.

One hesitates to be critical about such a brave and wide-ranging book. However, regulatory issues could have been explored in more depth, along with the different systems. In both countries economic imperatives were counterbalanced by welfare constraints. However, as public policy towards the railways developed, in the United States collusion was banned but mergers were condoned, while in the United Kingdom (before 1914) the reverse was true, which made the British government's volte-face in 1921 all the more extraordinary. The basic characteristics of railway operation were also different. In the United States long freight hauls predominated, presenting very different operational dynamics from those of the British industry, where passenger operation has become more important. The primacy of the passenger business has influenced the setting of objectives for Britain's nationalised railways, where the expectation is one of traffic maximisation, limited by financial constraints. Indeed, it is a pity (at least to this reviewer) that the book stops in 1940. Since the war there has been some evidence of convergence in Anglo-American railway history. Britain's railways were nationalised, then privatised, though the latter process left a lot to the State, not least a large financial responsibility. In the 1980s the engineering workshops were sold, and public interest in passenger railways is very much alive in the United States' Amtrak Corporation. American incursions in Britain have included locomotives from General

Motors in the 1980s and Wisconsin Central's purchase of railway freight in the 1990s. The pre-1940 story would have been heightened by reference to these later developments. The publishers don't always support their author properly, as can be seen in a rash of typographical errors in chapter 2, a puzzling change of font (p. 82), references to 'Croase' and some infelicities in the bibliography. Nevertheless, this is a minor criticism. Channon provides transport history at its best, aligned with both economic and business history to provide a satisfactory whole. It is to be applauded.

Terry Gourvish, Business History Unit,
London School of Economics

Laurent Tissot, *Naissance d'une industrie touristique: les Anglais et la Suisse au XIXe siècle*, Payot, Lausanne (2000), Sfr 39.00.

Historiography is generous with tourism and tourists, but it is not evenly focused. There are numerous historical monographs on tourist resorts, and the subject has also been studied in the context of railway and airline history, urban history, gender studies (travelling women), and cultural and medical history (spas). However, the actual history of tourism as an industry is still in its infancy and Marc Boyer's *Le tourisme* (1972) remains one of the few books with a global view of the topic. The reason for this relative neglect lies mainly in the heterogeneity and international character of tourism itself: it is, after all, an activity which brings together transport, accommodation, catering and various complementary services. Moreover most of the players in the tourist industry have traditionally been small and medium-size companies, and access to archives has been difficult.

This study by Laurent Tissot – one of the leading historians of tourism – is therefore to be welcomed. His book explains why tourism has been an industry 'with no restrictions' for over a century, and his cross-disciplinary approach helps to guide the reader through its complexities. It is a case study of nineteenth-century English tourism to Switzerland, the first mass tourist destination. Understandably, the biggest tourist flows came from the most advanced country at the time and one that was a leader in railway transport; consequently it was British entrepreneurs who shaped the organisation of tourism.

One of the most original aspects of *Naissance d'une industrie touristique* is its close analysis of travel guides, to which the first part of the book is entirely devoted. Tissot has used an impressive number of these guides and pamphlets, starting with John Murray's famous *Handbook*. The guides acquired their modern utilitarian form in the 1830s. Contrasting sharply with the romantic *Weltanschauung* variety which dominated the scene before then, they focus on sightseeing and practical travel tips, developing a range of codes and symbols to classify resorts, hotels and restaurants. From 1843 onwards they also included advertisements. Tissot's careful study of this specialised literature increases our understanding of how the Swiss tourist industry was encouraged. The competition, similarities and, not surprisingly, plagiarism between the different guides from Murray, Bradshaw and, after 1860, Baedeker are clearly illustrated, and the guides themselves make fascinating reading if only for the personal involvement of their authors.

The second part of the book looks at the tourists' experience and its organisation, the latter being increasingly handled by professional travel agents. Using railway company sources in the Public Record Office in London, the French National Archive (CARAN) and the Swiss Federal Railways archive in Lausanne, as well as correspondence between the Chamber of Commerce in Calais and hotel keepers in Basle, the author highlights the role of transport and other services in the development of tourism between England and Switzerland. The fact that the journey time between London and Geneva decreased from sixteen days in 1816 to just eighteen hours in 1900 shows the extraordinary degree to which railways facilitated tourist movement. There are also fascinating insights into the behaviour of that novel nineteenth-century phenomenon, *homo touristicus*. Tissot's research in the Thomas Cook archive helps us understand how the pioneer of modern tour operators grew. Cook's first aim was to offer the working class a leisure alternative to the pub, then in 1863 he began excursions to Switzerland. Like many other industries, Cook and tourism owed their dynamic growth to the integration of new technologies: hotel vouchers and travellers' cheques, for example, protected the anxious tourist from fraud and theft.

Written in a clear and fluent style, the book contributes to our knowledge of the tourism industry and is an education for all potential travellers.

Laurent Bonnaud, University of Paris

Jim Pike, *Track*, Sutton Publishing, Stroud (2001), 154 pp., £19.99.

Serious writers on the social and economic history of transport are apt to deplore the way certain transport lovers devote so much of their time and space to the hardware of the business – locomotives, rolling stock, stations, signalling and equipment of one kind or another. One of these amateurs (the word is used here with no derogatory tone) has felt that the essential of the railway, the track, has been overlooked in all the outpouring of railway literature, and indeed, he can find only one book on the subject for his bibliography. With this book Jim Pike, who declares himself to be a railway enthusiast 'with a meticulous approach to the minutiae of railway history and an infectious enthusiasm for the subject', seeks to fill the gap.

After Early Railways follow chapters on Edge Rails, 'other systems and oddities', Points and Crossings, Sleepers and Fastenings, 'Along the Track' (lineside equipment), Civil Engineering (which goes a good way beyond the track itself), Electrified Track, Temporary Track, Tools of the Trade, Accidents, Tramways, and 'Track of old railway', all very briskly done in 150 pages. The illustrations, mostly from the author's own collection of photographs, are well selected and only occasionally blurred in reproduction.

Within such a broad field, inevitably some things are treated in more detail than others. Unlike many railway writers, Mr Pike is not much interested in chronology; 'the early years of the twentieth century' is sufficient for his description of Thermit welding; 'one early railway' is said to have tried to avoid the use of sleepers altogether in a rock cutting – but which one and when? He writes that the practice of creosoting sleepers was 'soon found' useful, without giving a date or mentioning the name usually given to the process – 'kyanizing', from John Kyan, its inventor.

This is clearly not a technical manual; but sometimes the reader will feel that he or she might have been told a bit more. What was it about the manganese element in steel that was so important for rails? And the story of welded rail joints, which 'became available about the beginning of the twentieth century' is worth more than the brief mention it gets here.

Certainly there is little in railway literature about track, apart from B. Baxter's *Stone Blocks and Iron Rails* and Charles E. Lee's *The Evolution of Railways* (neither of which is mentioned in Pike's brief bibliography); however, this is an enthusiast's attempt to fill the gap. And his enthusiasm shows, especially in the marginal addenda enclosed in 'tablets' outside the text, where he jovially brings in anecdotes (told by 'your Author') that would not fit conveniently into the main text. The need still remains for a survey of permanent way – rails, sleepers and ballast – with a somewhat fuller historical background than the one provided here.

Michael Robbins

Stefano Maggi, *Politica ed economia dei trasporti, secoli XIX–XX: una storia della modernizzazione in Italia*, Il Mulino, Bologna (2001), L45,000.

As Stefano Maggi rightly points out in his introduction, studies of transport are few and far between in Italy, so the publication of a work which offers a synthesis of the development of Italian transport can only be welcomed. Although Britain, France, Germany and Spain have seen the development of historiographical schools devoted to transport, Italy still awaits proper studies of fundamental aspects of transport history such as company history, government policy, the interaction of different modes, labour action and the link between transport, economic development and modernisation. Unfortunately Italy has only a handful of researchers working on transport themes, although the work of these scholars is supplemented to some extent by the outpouring of popular books from transport enthusiasts. Moreover the late development of interest in economic and social history has allowed enormous damage to be done to archives, particularly in fields such as transport which until recently were regarded as of only secondary importance. Italy has only one important transport archive, the Ferrovie dello Stato, and this is still largely inaccessible, while ACI (the Italian Automobile Club) has no archive at all. Meanwhile ministerial papers and those produced by government departments are difficult to trace and consult.

Given these limitations it is not hard to appreciate the importance of Maggi's book. To begin with, it has a thorough bibliographical section which provides a valuable analysis of the most important works on transport. The first three chapters, devoted to the railways, the motor car, and water and airways, follow the chronology of events and provide technological, economic and social analyses of the development of different transport modes. The fourth chapter deals with economic policies and transport as a catalyst of mobility and social change. Herein lies the strength of Maggi's book, with its examination of transport as one of the determining forces in Italy's modernisation. An important case is private motoring, which represented a real watershed between the generations and was a trigger of social change. In the decade from 1955 (the year in which the Fiat 600 was launched) to 1964 the motor car succeeded in transforming the life style of Italians and ensuring the triumph of the urban over the rural model in Italy's social development.

Maggi takes the view that decisions regarding Italy's industrial infrastructure were not given priority in comparison with those concerning monetary policy, the struggle against monopolies and structural reforms. The upshot was that after the Second World War transport planning became dominated by the private sector and motor vehicles – the car being identified with freedom and progress. From 1948, the year in which ANAS (the national road board) was reorganised, there was an expansion of road transport which created a production and social system 'almost entirely tied to road transport'. This brought about an imbalance which has been a permanent feature of transport infrastructure in Italy ever since. The result has been the absence of competition for road transport from the railways and inadequate intermodal sea, rail and air transport connections. To this day the Italian transport system, despite new economic policies introduced since the late 1980s, has been characterised by structural deficiencies and the lack of any attempt to consider the transport infrastructure in terms of 'networks'. Maggi's book greatly increases our understanding of how Italy arrived at this juncture.

Federico Paolini, University of Siena

Curt McConnell, *Coast to Coast by Automobile: the pioneering trips*, Stanford University Press, Stanford CA (2000), 349 pp., £35.00.

Coast to Coast is an exhaustive description of eight pioneering American transcontinental car journeys. Historians have been reluctant to investigate such trips because of the difficulty of providing accurate information. Now Curt McConnell has painstakingly examined numerous local sources, especially newspapers, to provide automobile enthusiasts and historians alike with an authoritative account. No one else is likely to revise or to replicate his study. Where there are some doubts about dates, times of arrival and departure, hazards, accidents and the spelling of names he has judiciously noted the range of possibilities and from his in-depth knowledge suggests the best answer. At times the particulars of specific incidents and mishaps, of the cars themselves or the weather become overwhelming, but the author is determined to be accurate at all costs. Thus information that otherwise might have been consigned to the endnotes or to an appendix litters the text and encourages readers to browse rather than read. The same cannot be said for the 140 photographs, which are a joy to behold and which provide a 'feel' for the journeys which no narrative can rival. The whole effect would have been enhanced, however, by some maps with which to follow the individual trips more easily and compare the early voyages.

So what does the volume tell historians about pioneer long-distance motoring in the United States? Basically that it was a difficult, hazardous, uncomfortable, tiring, physically arduous and weight-losing experience. Those men and women who were brave enough to make the journeys may not have been as adventurous or as courageous as those who pioneered the waggon trails west in the 1830s and 1840s, but they too were trail blazers. In the nine years between 1899 and 1908 those who drove an automobile, or who were driven in one, across the continent, paved the way for millions of travellers and tourists. The early drivers demonstrated that it was possible for the emerging automotive technology to be useful, and they simultaneously deflated the car's critics. Meticulous planning, aided by the telephone, the telegraph, the railroad and a dealer network ensured that supplies of gasoline, spare parts and even relay drivers were near by when needed. Yet the best planning in the world could not provide a dependable system of mapped roads or reasonable surfaces and could not guarantee favourable weather. Sand, mud, severe slopes, bridgeless rivers and the lack of paths, let alone roads, in the region west of Denver made even the later trips risky ventures. High temperatures, snow, rain, floods and blizzards impeded progress. Local communities, some of which had never seen a car before, welcomed all the early sojourners with much acclaim. The car manufacturers who officially sponsored some of the trips ensured further publicity in the interest of sales. Though the first successful transcontinental trek in 1903 took sixty-three and a half days and demonstrated what was possible, it was the first *family* trek in 1908 which pointed the way for the average motorist in an ordinary car.

Margaret Walsh,
University of Nottingham

Graham West, *The Technical Development of Roads in Britain*, Ashgate, Aldershot (2000), 173 pp., £39.95.

This book is described by its author as primarily 'an examination of the development of the construction of the *road pavement*, by which is meant the structure of the road', as opposed to subjects such as embankments and cuttings, bridges and tunnels and road layout. A secondary theme is said to be 'the need for roads' and the consequent development of 'the road network in Great Britain'. The author spent his professional life in the Transport Research Laboratory and is therefore particularly well qualified to write on the technical aspects.

The book is best considered in two parts. The earlier chapters (on prehistoric trackways, Roman roads, 'the years of neglect', military roads in Scotland and eighteenth and nineteenth-century roads) are a disappointment, mainly because the author is not up to date with the secondary literature. On turnpike roads, for example, the bibliography omits the standard works by Albert and Pawson, citing instead work by the Webbs (published in 1913) and a schools resource pack from Berkshire. The entire corpus of work in the *Journal of Transport History* has eluded him. Consequently various fallacies appear, such as that all goods transport prior to four-wheeled waggons was by packhorse, and that the turnpike system came about primarily to serve the stage coaches. The secondary theme, on the relationship of roads and traffic, is not addressed at all effectively. This is especially unfortunate, as the author's expertise could have yielded valuable analysis on matters such as the early nineteenth-century controversy concerning broad wheels and their effect on road surfaces.

The parts of the book dealing with roads since the internal combustion engine are much more useful. The author knows his subject and provides much information and analysis not easily available elsewhere. Both here and in the introduction there are excellent descriptions, clearly written, of technical matters such as the impact of frost, the importance of road pavements, the invention and importance of bitumen, the merits of different types of modern road surface, and much else. The second half of the book and the descriptions of technical matters make the book worth reading.

Dorian Gerhold, London

Glen Norcliffe, *The Ride to Modernity: the bicycle in Canada, 1869–1900*, University of Toronto Press, Toronto (2001), 304 pp., £16.00 (US$24.95).

Glen Norcliffe presents an engaging account of the early days of Canadian cycling and of the different themes associated with it – industrial activity, transport politics, leisure – and transport-based cycling cultures, and the changing landscapes (both urban and rural) that shaped and were shaped by the bicycle in Canada during this period. His underlying argument is that the bicycle played a minor, but essential, role in the development of modernity at this time. The book consequently veers across a variety of disciplines, including geography (Norcliffe's own disciplinary base), cultural studies, innovation studies and the history of technology and transport.

Norcliffe's basic premise rests on the notion that a small number of 'carrier wave' innovations spawn a series of related innovations, spreading also into other industries and impacting not just on industry but also on consumer culture. He argues that the bicycle formed just such a carrier wave – albeit a minor one – in Canada during the late nineteenth century. He describes how the initial interest in imported bicycles in the 1860s gradually led to the foundation of local manufacture, which itself expanded from small-scale craft production to much larger-scale industrial enterprises. These spawned a range of related products – in fact the revenue from bicycle accessories matched that from the bicycles themselves. Accessories served furthermore to mark out the bicycle as an elite consumer product, something Norcliffe sees as a key moment in the development of modern consumption. Finally, the bicycle carrier wave rippled into other industries. These included tourism, photography and road construction. Norcliffe concludes that the bicycle carrier wave pushed modernity forward in terms of transport and travel, leisure, consumption and production, but was itself marginalised again as the cycling elite moved on to new pursuits once mass production had taken away its exclusivity.

The claim that cycling was important to modernity is not new. The bicycle first appeared at a time of great enthusiasm for engineering and innovation, and its design and commercial progress were shaped in large part by several typically Victorian entrepreneurs. The bicycle was both a product and, as Norcliffe stresses, an agent of modernity, something that has been explored to some degree in specialist bicycle histories as well as in studies of modernity. Most notable among the latter is David Hounshell's 1984 account of the role played by the American bicycle manufacturer Albert Pope in the development of modern production and marketing. Norcliffe moves beyond Hounshell's focus on manufacturing industries by analysing in detail the cycling culture that Pope believed had to be nurtured in order to allow mass production. The book therefore examines various Canadian cultures of cycling that can be found in this period – the modernist culture of the *flâneur* (on wheels), militarist cycling clubs, high-society cycling and long-distance touring.

One of the best moments in the book appears in a passage dealing with cycle touring, where Norcliffe exposes the dreariness that can be integral to historical research. He describes a vanity publication from 1887 by an American cycle tourist, Lyman Hotchkiss Bagg, whose

Ten Thousand Miles on a Bicycle – 'possibly the most boring book ever published' – included substantial portions covering a trip to Canada. Norcliffe's experience following 'in withering detail every mile that this monomaniac rode' will strike a chord in anybody who has ever questioned their career choice whilst poring over battered documents in a dingey archive. At the same time, Bagg's meticulous attention to detail is invaluable in the light it throws on the state of the roads and the attitudes of local people to bicycles at a time when cyclists were rare and could expect to be harassed or even beaten by other road users.

What the Bagg story exemplifies most is Norcliffe's interest in the role that cycling played in expanding and transforming people's relation to space. The bicycle enabled individuals to explore both locally and more distantly in ways that had not been so easy before. Campaigns for better road surfaces made such exploration easier still, and created new possibilities in both social and working life. However, Norcliffe stresses the importance of treating such changes – and also the broader role of the bicycle in shaping modernity – as being played out always in locally specific ways. His account of the bicycle in Canada bears many similarities to the situation in Britain, the United States and elsewhere, but there are important differences. An indigenous industry came late to Canada compared with other countries, and its subsequent development is crucially linked with Canada's colonial relation with Britain. Most significantly, the Canadian climate has been especially influential both in restricting the number of months during which cycling is possible and in providing an impetus to the development of specifically Canadian innovations, in the form of bicycle-based forerunners of the contemporary snowmobile.

My one complaint with Norcliffe is his insistence that the Canadian bicycle story effectively ends in 1900, by which time bicycles had lost their interest for the elite, whom he sees as crucial to the project of modernity. This claim begs the question of how modernity is defined, which for Norcliffe seems to be primarily in terms of the culture of elite consumption; thus, once bicycles became an everyday item for the masses, they no longer held any relevance to modernity. Yet there are other dimensions of modernity deserving of consideration, although dismissed here, not least, of course, mass production and consumption – refined at Henry Ford's car plant a decade and a half after this story ends. Moreover the continual transformation and reinvention of modernity (as postmodernity, for example) means that bicycles have again come to play a significant role in its cultural dimensions. The prominence of Montreal's cycling advocacy and cycle courier cultures means that the Canadian context remains relevant a century on. Whilst I would not have expected Norcliffe to explore this here, I would have preferred a broader conceptualisation of modernity and at least an acknowledgement that his cut-off point is not absolute.

Aside from this point, though, *The Ride to Modernity* is a very enjoyable read, with dozens of illustrations, including photographs of cyclists both outdoors and in the studio, landscapes and street scenes, and bicycle advertisements. Conceptually the book makes a valuable contribution to transport and technology studies, whilst at the same time treating the theoretical discussion with a lightness of touch that should appeal also to non-academics interested in the histories of cycling, transport, leisure and Canada.

Paul Rosen, University of York

Jim Fitzpatrick, *The Bicycle in Wartime: an illustrated history*, Brassey, Washington DC and London (1998), 252 pp., £14.99 paperback.

Tracing, as he does in this book, the deployment of the bicycle for military purposes over the last century or so, it is not wholly surprising that Jim Fitzpatrick has found his topic generating abhorrence among some civilian cyclists. How, as they have put it to him, could such a benign technology be implicated in 'dealing death to others'? This sentiment was in my own thoughts as I began the book, combined with a suspicion that aside from detailed specifications of military bicycle design there would be little of interest to tell. On the contrary, however, Fitzpatrick shows that there is a great deal to be learned from such a study – for military history, for transport history and for the history of technology.

The book tells the story chronologically, initially linking military and other tests of bicycle endurance with the design developments that preceded the technological stabilisation of the bicycle in the 1890s. Such tests proved the bicycle was a useful and versatile device for traversing inhospitable terrain – it has great carrying capacity but can also be carried itself when necessary, it requires no fuel or food, and it is faster than soldiers travelling on foot or horseback.

The earliest – and most enduring – uses of bicycles in a wartime context were for dispatch delivery and other support roles behind the lines. Fitzpatrick refers to reports of early 'velocipedes' being used for this purpose in the Franco-Prussian War of 1870–71, when the bicycle industry was barely out of its infancy. Such a role continued for the high-wheeled 'ordinaries' (or 'penny-farthings') that followed, but it was not until the development of the smaller-wheeled 'safety' bicycle, with pneumatic tyres and gears, that a bigger part could be played. Since then the bicycle has served military purposes in an impressive but hitherto largely untold variety of roles. These have not just been behind the lines but also in the movement of troops and equipment on the battlefield – as well as resistance fighters under occupation. The book's story thus spans most of the major wars of the twentieth century – the Boer War, the First and Second World Wars, and finally the Vietnamese wars with France and then the United States.

What emerges is a tale that at one level appears to confirm some of the assumptions that often go alongside a sense of discomfort with the juxtaposition of 'bicycles' and 'war'. Fitzpatrick shows how military commanders have often underestimated the value of the simple, low-tech bicycle option. This underpins the commitment to centralised, expensive and resource-hungry technologies that has been so central to the defence-oriented economies of the last century. It is, then, at one level gratifying to see low-tech solutions often win out over high-tech ones in the stories Fitzpatrick tells. This is most striking in the way Asian forces have repeatedly confounded Western strategists who regarded bicycles as a largely redundant technology for warfare. In the Japanese invasion of Malaya in 1941, and Vietnamese endurance against two successive Western enemies, the bicycle was a crucial means of getting men and equipment through terrain that was inaccessible to motor transport. (In Vietnam even bicycles sometimes had to be abandoned to the mud in the rainy season.)

Likewise the book highlights time and again the arrogance of military commanders who in dismissing the utility of the bicycle condemned their troops to defeat. This attitude was closely linked with the assumption that military success depended wholly on technological 'progress', and that in transport terms such progress would always equate with motorisation. Fitzpatrick, however, produces ample evidence to support his argument that the bicycle has an important role to play in certain military niches – as do horses, jeeps and tanks – depending on the characteristics of the particular engagement. Rather than supporting a position that bicycles and war should not go together, the book instead presents something far more complicated. It shows that the use of bicycles in war often works in favour of the underdog, particularly when their opponents are not sufficiently alert to alternative strategies. It is important to note also that, other than favouring the capacity to be open to such strategies, the successful deployment of bicycles has never been the exclusive preserve of any particular side. Whilst benefiting, say, the British army in one war, bicycle-based strategies may work against them in the next.

On a broader level, the book also illustrates the way the trajectories of technological change cannot be taken for granted. From the Boer War onwards, military decision makers have repeatedly declared the bicycle no longer relevant, only to learn otherwise, to their cost. Consequently the lessons of previous wars have seldom been recalled in new engagements. Cycling units would commonly be disbanded when hostilities were over (especially the First World War) and army bicycle manuals often had to be based on outdated information because no account had been taken of more recent experience. And yet the bicycle continued to reaffirm its important – if niche – role in warfare.

Unfortunately Fitzpatrick does not throw much light on the future role of the bicycle, or even on events more recent than the mid-1970s. Consideration of how – if at all – bicycles were used in the Gulf War would have been useful, and in more local areas of conflict such as the Middle East, the Balkans or Northern Ireland. Without such information the technological upscaling that characterised the Gulf War may suggest that the views of earlier generals have finally been confirmed – notwithstanding the impressive new Swiss army bicycle fleet depicted in the book.

That question aside, *The Bicycle in Wartime* is an intriguing and compelling read, complemented by a multitude of archive photographs which give added life to the stories. Most important, the book brings together the strategic side of military policy and the experiences of cyclists on the ground.

Paul Rosen, University of York

A. J. Arnold, *Iron Shipbuilding on the Thames, 1832–1915: an economic and business history*, Ashgate, Aldershot (2000), 198 pp., £49.95.

This slim volume tells the story of the rise and fall of iron shipbuilding on the river Thames. The enterprise is examined both from an industry-wide viewpoint and from the standpoint of the individual firm. Arnold divides the whole period into six sub-periods and devotes a chapter to each. The first part of each chapter traces and explains the fortunes of the industry as a whole, and this is followed by a review of activities in each of the major firms that were involved in the trade in the period. The book is pioneering in as much as no whole book has been devoted to this topic; previously there was only Banbury's volume of 1971, which devoted a few pages to iron ships.

Arnold contends that the traditional view of the causes of the decline and demise of iron shipbuilding on the Thames centres on dubious company flotations, pushed by shady promoters in the boom of the 1860s; the fall of Overend & Gurney in 1866 brought these companies down. The view propounded by Arnold differs in three respects. Firstly, some of the failures occurred well before 1866 and were caused by the rapid inflation associated with the Crimean War. Secondly, the number of Thames-side shipping businesses seeking incorporation in the 1860s boom was small – three, to be precise – and so there was no rush by shady financiers. Thirdly, Overend & Gurney collapsed partially because of loans extended to London shipyards (about £500,000) which were already failing but even more because of loans to London shipping companies (about £1.4 million). So the causation is reversed: shipyards caused the bank failure, not the other way round.

In addition to the narrative, the book contains a number of useful appendices. One is a list of all Admiralty ships built on the Thames between 1832 and 1915 which totals 280 vessels of an aggregate tonnage exceeding 380,000. The others are lists of the main yards, with details of each of the ships they built. There is also a full bibliography.

This is a well written, highly detailed, scholarly work. It tells us almost more than we need to know about iron shipbuilding in London and reminds us just how large and significant it was. My only criticism is that at times the detail swamps the overall picture, but I believe the book will stand as the definitive work on the topic for many years.

John Armstrong, Thames Valley University

Andrew McQueen, *Clyde River Steamers 1872–1922*, Strong Oak Press, Stevenage (2001), 147 pp. £10.95 paperback.
Andrew McQueen, *Echoes of old Clyde*

Paddle Wheels: the first sixty years from the Comet *of 1812*, Strong Oak Press, Stevenage (2001), 208 pp., £11.95 paperback.

The first of these two volumes can be dealt with quite quickly, since it is a reprint of the 1991 edition, which was reviewed in the pages of this journal in Vol. 13, No. 2 (1992). Nothing has been altered in this edition and the comments made in 1992 still apply.

The second volume, by the same author, is almost a ‘prequel’ to the first in that it covers the period up to 1872, thus drawing less on McQueen’s own experience and memories. The sources he uses are a combination of oral history – that is, he talked to many old-timers – and an assiduous search of local newspapers in the Clyde area. To the historian’s delight many of the latter are attributed, so that in theory they could be checked and followed up. The former are now beyond testimony.

There is no attempt to develop a comprehensive narrative but rather a series of vignettes are given of the main themes, in roughly chronological order. One thing that comes over clearly is the disasters befalling the steamboats, perhaps emphasised because of the drama inherent in such tales. Drunk captains, engine breakdowns, collisions, strandings, boiler explosions and fires all took their toll. Another aspect which stands out is the early emergence of mass tourism on the Clyde. As early as the 1820s there were steamboat excursions, especially at holiday weekends, with much advertising, including ‘knocking copy’, and in 1850 one firm ran a trip from Glasgow to Belfast and back in one day. The number of ships and passengers involved was large and this gave rise to two other aspects: speed and sabbatarian disapproval. Racing and fast journeys were seen as an advertising point, and one boat, the *Mutineer*, was measured at fifteen knots in 1852 over a sixteen-mile course.

Racing and high boiler pressures brought danger. The desire to maximise the use of the expensive steamboats caused companies to try running excursions on Sundays in 1853. This brought forth the wrath of the strict Sunday observers, and pitched battles, using potatoes, turnips and bottles, were fought between deckhands and smartly – but soberly – dressed sabbatarians. The other point raised worth some reconsideration is the economics of the excursion traffic. Into the 1860s at least, because of the seasonality of the tourist trade, most boats were tied up, out of service, for more than half the year. This seems a poor use of expensive capital equipment, and also suggests that excursion traffic was very profitable in the season.

There are a large number of illustrations, several lists of steamers plying on the Clyde at a number of dates with their size, power and routes, and a list of steamers plying on the Clyde from 1849 to 1869. The book is well produced and laid out. It is a fascinating read and an essential source for anyone researching early steamboats and their social milieu.

John Armstrong, Thames Valley University

Peter Clarke (ed.), *The Cambridge Urban History of Britain* II, *1540–1840*, Cambridge University Press, Cambridge (2000), 933 pp., £90.00.

In 1540 possibly only 5 percent of England’s inhabitants lived in towns; by 1841, it seems, over half of Britain’s population was urban. This, the second volume of the *Cambridge Urban History*, covers the period of this major transformation in which discernibly urban values and structures came to dominate national life, but which was also marked by diversity, complexity and difference between and within towns. To do justice to the significance, range and scope of the urban experience in England, Wales and Scotland over a chronological span of three centuries which features among other things a civil war, an economic and political union and an industrial revolution, even in just over 900 pages, is no mean undertaking, as the editor, Peter Clarke, recognises. The structure of the volume is therefore designed, largely successfully, to provide an analytical framework in which an extensive range of developments and themes can be exposed and explored. Bounded by an expert introduction and conclusion by the editor, Part I surveys in a series of separate chapters the urban history of English regions, of Scotland and of Wales over the entire period. Chapters in Part II deal with 'urban themes and types' for the period to 1700, while Part III similarly approaches 1700–1840, though the subjects of the chapters in each section are not identical.

Much could be said about this volume as a whole, though no reviewer could hope to give due attention to the work of all thirty-one contributors. In the present context the focus must be the place accorded to transport as an aspect of urban history. Ports are given due attention. Early modern seaports are the subject of a chapter in which David Harris Sacks deals with England and Wales and Michael Lynch with Scotland, since separation by distinct legal and administrative systems until the 1707 Act of Union was reflected in independent national transport networks, trading less with each other than with foreign economies. Eighteenth and early nineteenth-century seaports are dealt with in Part II by Gordon Jackson. Otherwise transport and communication feature intermittently in the volume as part of a broader narrative of urban development in which commerce, exchange and services feature as much as industrial advance, itself seen as an incremental dynamic. Transport improvements are acknowledged, but seldom specified, as factors in town growth, though only in the case of the chapter by Alan Dyer on the Midlands are these emphasised as particularly significant. Transport towns other than seaports, those associated with canal and waterway interchanges, are accorded only a couple of paragraphs, though rather more is said about the special characteristics of naval dockyard towns.

In compensation for the rather shadowy presence of land transport, less than those interested in the subject might want but arguably justified by their actual importance for the urban history of the period, there are the two substantial chapters on seaports. In his discussion of English ports from the early sixteenth century to the early eighteenth, David Harris Sacks begins by placing ports in the hierarchy of towns with a population over 5,000. The list lengthens from ten to thirty-two over his period but ports continue to account for half of such towns – an indication of the close identification between the urban and maritime in the early modern period. Sacks characterises the larger ports as serving both the traditional agrarian and the emerging industrial sectors for links with regional, national and international markets. Fitting together a series of local studies into a wider geographical framework, moving systematically around the coast from east to west, through the changing business of the seaports he traces with clarity the major reorientation of English and Welsh commercial activity towards the Atlantic. This synthesis, well done as it is, is trade history rather than urban history, and there is little attention to physical or geographical aspects other than orientation towards other land masses. It is followed by a discussion of the social and political life of seaports (there is less on economic aspects) where the author allows himself more scope. His argument, that the tension between internal orderliness and the access to external influences and new value systems associated with the development of a market-based society was felt first in the large and growing Atlantic ports, is stimulating.

Michael Lynch's section on Scotland similarly shows ports to have been a central feature of early modern Scotland's town development, though with far smaller populations, geographically concentrated rather than dispersed and facing recurrent physical problems from silting and storm damage. In the late sixteenth century, with the port towns of Edinburgh/Leith, Dundee, Aberdeen and Perth the four largest urban centres, most towns were ports, though maritime-related employment, heavily oriented towards fishing and coastal trade, was dominant only in the many smaller settlements which served as ports. He demonstrates that a small number of specialised industry-based ports were however emerging, presaging future developments.

Gordon Jackson's chapter takes the story of ports further on, both chronologically and thematically. Jackson identifies and traces the progress of the business of virtually every type of port in the period of industrialisation. He goes on to look at the development of port facilities and at port-based industries. This is done with unrivalled authority and expertise but, in large part as a result of Jackson's own earlier published work, is necessarily familiar territory. Far less familiar in terms of subject matter is a valuable section somewhat misleadingly entitled 'The port elite' but in fact rather wider in its discussion of the port community. Another section dealing with seamen and dockers is less careful in its analysis, seemingly endorsing myths about the impact of the press gang and the unskilled nature of waterfront labour.

Concluding these comments on the two chapters on ports, paradoxically it seems that they may offer less to those with interests in the history of towns and cities than to those whose prime focus is transport. Neither really confronts other than tangentially how being a port distinctively shaped the urban environment and the urban experience. That said, the volume as a whole offers a challenging context for increasing our understanding of the relation between transport and urban development before the well known impact of the railway.

Sarah Palmer, Greenwich Maritime Institute, University of Greenwich

David M. Young, *Chicago Maritime: an illustrated history,* Northern Illinois University Press, DeKalb IL (2001), 260 pp., US$39.95.

Under the pretext of furnishing an 'illustrated' history Young gives us a sound, comprehensive survey of all matters nautical which have had the remotest bearing on transport in and around Chicago. As a matter of course he also strays farther afield, both geographically (down the Mississippi to New Orleans) and across the modes to embrace road and rail cartage. Central to Chicago's importance is its strategic position, occupying the pivot between the eastward-tending Great Lakes and the southward-flowing Mississippi. Much of Young's story revolves round the issue of overcoming this awkward 'land gap' and thus linking two natural inland waterways.

To begin with, he sketches the canoe routes, touching on the fur trade and the penetration of the continent by the *voyageurs*. A minor trading post, Chicago established its value as a portage point between Lake Michigan and the northernmost tributaries of the riverine system controlled from St Louis. Riverboats eclipsed canoes in the early nineteenth century, the 12–15 ton carrying capacity of the *bateau* proving more alluring than the five tons carried by the largest canoe. By mid-century the rivers were thick with flatboats and keelboats; the former lifted loads up to 100 tons while the latter typically hauled forty-ton cargoes along the shallower streams. Young now shifts his attention to canals, providing a discourse on the crucial Erie and the 'mania' which followed it. The frenetic canal building instituted by the states threw up several cities – Pittsburgh, Louisville, Cincinnati and St Louis – each vying for a commanding role. All would present challenges to a neophyte Chicago, but it was St Louis which mounted the most potent threat. Overreliance on river transport proved St Louis's undoing, for Chicago, aided by the inception in 1848 of both the Illinois & Michigan Canal and its first railroad, was able to push out its hinterland over 100 miles to garner the headwaters of the Mississippi. By 1865 Chicago had become the country's 'railroad capital', a vital junction on the route connecting prairie farmers and ranchers with northeastern consumers. A few years later, in 1873, the Illinois Central was running through trains to New Orleans, offering a north–south artery in opposition to the river services controlled from St Louis.

At this juncture Young focuses on Chicago itself, specifically its advantages and disadvantages – and the latter seem to have predominated – as a budding port. Reminiscent of aspiring ports the world over, Chicago was hampered by both landside space restrictions and severe draught limitations. Deepening of the mouths of the two rivers (the Chicago and the Calumet) constituting the port, together with pier building, involved the usual funding problems (and, interestingly, federal help was not forthcoming until the end of the century). Shallows notwithstanding, the port successively handled swarms of schooners and steamers, the latter evolving into the giant ore boats ('boat' is the preferred term) of the twentieth century which achieved lengths of 1,000 ft. Digressions recording the experiences of travellers – most notably Charles Dickens, Abe Lincoln and Rudyard Kipling – to say nothing of vivid descriptions of shipwrecks and pirates occupy three chapters before the story reverts to the tussle between waterborne and railway modes. Thoroughly trounced by aggressive railroads, the canals sank into obscurity, only to be rescued by an enlarged metropolis desperate to solve its sewage disposal problem. Several canals, accomplishing the dual purpose of sanitation and transport, were endowed in the twentieth century with wider dimensions, permitting them to accommodate bigger barges. A revival followed, river and canal traffic grew dramatically and innovations such as tug barges took hold. This momentum was partly nipped in the bud by the failure of the St Lawrence Seaway, opened in 1959, to live up to expectations. Built to take 'handy-size' ocean-going ships, it was obsolescent on completion, condemning Lake ports like Chicago to look on idly as ports on the Pacific and Atlantic captured the big-ship traffic while being stitched together with land-bridge train services. Ironically, in a reversal of fortune particularly bitter for Chicago, the port of St Louis surpassed it in terms of tonnage handled in 1984. As if to set the seal on this decline, the original Chicago river port was transformed into office space and recreational property, confining shipping activities to the Calumet river.

The regional focus of this work is at one and the same time its strength and its weakness. As for the former, Young sets great store by the location of Chicago and unequivocally demonstrates the influence of that situation on its rise to prominence. He is favourably disposed to rivers and canals, exhibiting an impressive grasp of detail. He also pays due attention to Lake traffic, although, given his wide latitude to dwell on what particularly interests him, he seems reluctant to delve very far into industrial cargoes, especially the ore and coal trades so vital to the fortunes of south Chicago. A celebrated general work which contrives to fill that void is K. J. Bauer, *A Maritime History of the United States* (1988). The weakness of Young's book is more evident in two other respects. First, and perhaps understandably in a book geared to maritime matters, the railroads receive light treatment. However, since they constituted the mainspring of change for Chicago the omission compels the reader to look elsewhere for clarification. One such supplement is J. F. Stover, *American Railroads* (second edition, 1997), which succeeds in placing Chicago in proper historical context as a railway centre. Secondly, the inclusion of large-scale maps of Chicago, oddly absent from a work liberally sprinkled with maps covering the entire eastern United States, would have done much to elucidate the local detail.

Daniel Todd, University of Manitoba

Robert Conlon and John Perkins, *Wheels and Deals: the automotive industry in twentieth-century Australia*, Ashgate, Aldershot (2001), 190 pp., £45.00.

The automobile is one of the defining elements of the twentieth century. Given its central role in modern industrialisation, the automobile industry has also been viewed by governments as a key to national economic development. In the aptly named *Wheels and Deals* Robert Conlon and John Perkins focus on the relation between the State and car manufacturers, and highlight how this interaction has shaped the historical development of the Australian car industry. The authors argue that the industry was fundamentally shaped by government policy, specifically a range of industry protection which included tariffs, local content schemes, subsidies, import restrictions and other measures. Rather than producing an efficient and sustainable industry, the authors argue, the pattern of government intervention encouraged the development of a fragmented industry which lacked sufficient economies of scale, involving too many manufacturers for the available market. It is a history which highlights many mistakes and missed opportunities. The specific forms of State intervention that developed around this industry are shown to have often been badly thought out, expedient and *ad hoc*.

The analysis is well written and clearly structured, and the authors mount a convincing critique of the various stages of industry protection based upon an extensive range of government archival materials, trade journals, government reports and statistical sources. Moreover the analysis is extended to explore overseas developments which shaped the Australian industry, most notably in the United States, Canada and Britain.

The book is structured around nine chapters. Chapter 1 sets out the argument regarding the limitations of protectionism and provides a summary of the developments reviewed in detail in the following chapters. Chapter 2 examines the early years of automotive manufacture, from the turn of the century to the end of World War I, and highlights the early reticence of Australians to embrace the motor car, the rapid success of the imported Ford Model T, and how the early tariff protection directed the car industry towards inefficient production and outdated technology. Changes in industry protection during the 1920s and 1930s are reviewed in chapters 3 and 4. Key developments during this period included the establishment of local subsidiaries of the big three American producers, Ford, General Motors and Chrysler, as well as the emergence of a car manufacturing 'lobby' which came to have a powerful influence upon government policy. Chapter 4 also retraces the fascinating, albeit largely forgotten, story of the federal government's attempts to promote complete car manufacture through legislative enactment. Although this initiative failed, it spurred the foreign manufacturers into the expansion of their operations, resulting in the eventual complete manufacture of Australian cars, beginning with GM-H's Holden in 1948. Chapters 5 and 6 expand on the themes developed in the earlier chapters through comparison with the Canadian car industry and the influence of the British car companies. Finally, chapters 7 and 8 cover the history of car industry development during the post-Second World War decades and the 1980s and 1990s respectively. Here government strategies shifted to issues of 'local content' as well as more recent industry plans which sought to incrementally reduce protection, increase competitiveness and rationalise the number of manufacturers.

The authors do a good job in supporting their argument that protectionism has been one of the influences, if not the major influence, upon the structure of the car industry. However, other factors do emerge in their analysis which explain the deficiencies of local manufacture. In particular the small size of the domestic market and its remote geographical location appear to have had a significant impact. For instance, transport costs underpinned a large part of the different trajectories of the car industries of Australia and Canada during the 1930s. While car bodies were bulky and costly to ship, making them more suited to local manufacture, the chassis and engines (the core of the motor car) were more amenable to importation. The authors argue that in the inter-war period Australian tariffs reinforced the logic of production that flowed from transport costs, by providing higher protection for car bodies and lower duties on chassis.

However, while the analysis of the impact of government policy upon the car industry is excellent, the policy implications of the history are somewhat muted. Free-market advocates could easily interpret this study as providing support for a general critique of State involvement when in fact the research appears to highlight the need for a more carefully planned approach to industry assistance. Clearly the specific forms of protection that were introduced failed to achieve many of their publicly proclaimed goals.

As a result, the authors argue, protectionism benefited the vehicle manufacturing lobby while acting as a substantial tax upon consumers. However, it is unclear from the authors' analysis what alternatives could or should have been adopted. It seems doubtful whether car manufacturing in Australia would have been viable without protection; General Motors, Ford and Chrysler did after all establish local subsidiaries in order to operate inside the tariff wall. Indeed, in the absence of the early tariff protection, one can ask, would Australia have had a car industry at all, and what sort of society would Australia now be in the absence of industry protection? Potentially a very different society, given the pivotal role of car manufacture in the development of Australian manufacturing industry, as well as a major employer of post-war labour.

A second shortcoming of the analysis for this reviewer was the neglect of labour issues within the historical development of the industry. While this may be outside the book's immediate focus, some reference to the role of the work force and their representatives is perhaps warranted. The car industry was a core employer of manufacturing labour, particularly the post-war influx of non-English-speaking migrant workers. In the 1960s and 1970s these employment practices became a source of violent industrial disputation that paralysed the industry. In the last two decades, trade unions have also been key actors in the development of industry policy and work restructuring. While the authors make reference to the early 'corporatism' that emerged in the 1930s, trade union involvement in more recent corporatist manifestations could have received greater attention.

These criticisms aside, *Wheels and Deals* offers a fascinating insight into the political processes and lobbying that underpin industry policy and real-life economics. The book will be essential reading for anyone interested in the Australian car industry, its past and its future.

Christopher Wright, University of New South Wales

Dipendra Sinha, *Deregulation and Liberalisation of the Airline Industry: Asia, Europe, North America and Oceania*, Ashgate, Aldershot (2001), 176 pp, £39.95.

The author is an economist who provides both an overview of the world airline industry and a succession of case studies of deregulation in Asian countries, Australia and New Zealand, Canada, Europe, and the United States. Of the case studies, the United States looms largest, with almost half the book devoted to that country's experience.

The author provides a considerable number of useful and informative tables and statistics alongside what is largely a review, though by no means a comprehensive one, of the work of other scholars in this field. There is little in-depth analysis, but the author has the ability to summarise basic economic theory and apply it to the airline market. The book is mainly a narrative, reporting what other scholars have either argued or empirically discovered.

The overview of the international airline system is inadequate. There are some useful sections, for example the summary of the General Agreement on Tariffs and Trade and the General Agreement on Trade in Services, but often the author does not explain things properly. For example, the reference to the many bilateral and multilateral agreements that dominate the international airline system does not give enough of substance to inform the uninitiated about the industry's overall character. A brief outline, of both the Chicago conference's outcome and the main subject matter of subsequent bilateral agreements, i.e. in terms of air freedoms or rights, needs to be given. In addition, there should be a brief analysis of how the industry has changed since the 1970s (for example, the virtual demise of the International Air Transport Association's price fixing), when deregulation gathered pace.

In the chapter on Europe, when the author does mention more about the Chicago conference of 1944, the information is either inaccurate or misleading. The claim that the Chicago conference 'led to the adoption of a general policy that a country would have only one airline' is difficult to reconcile with the fact that the United States, which was the dominant force at the conference, had a specific policy of encouraging more than one overseas carrier. Among other things, this was to break Pan American Airways' virtual monopoly of US foreign routes. Furthermore, Britain had three overseas carriers immediately after the Second World War: British Overseas Airways Corporation, British European Airways and British South American Airways. The claim that price competition was negligible because of capacity controls is also misleading. There were capacity controls, but, more important, IATA was used to set prices through tariff conferences. This is important because price fixing was agreed to by the United States after the war even though it had opposed it at Chicago. Sometimes the author is so ambiguous or opaque in expression that it is difficult to work out the meaning: 'The most profitable routes for these airlines are not the intra-European flights but the inter-European flights' (p. 71). 'Intra' assumes one entity, i.e., in this context, Europe. 'Inter' assumes two entities, but only one is named here: Europe. This could mean flights between two states within Europe, but that possibility has seemingly been excluded by the category of intra-European flights.

Overall there is a lack of coherent argument. Reasons and evidence are rarely offered to substantiate claims, and no clear picture emerges either in the individual case studies or in the wider perspective of the worldwide airline industry. The case studies lack sufficient context; that the author could attempt to account for the development of US regulation policy in the 1940s and not mention Pan American Airways is quite astonishing. Often concepts are mentioned without adequate explanation. And, finally, the book is peppered with grammatical mistakes and lapses into very poor style: for example, 'US was and remains so the place in which different theories of regulation were and are being tested' (p. 71). Elsewhere we are told that the European market is segmented 'because of the vast number of relatively small number of countries that comprise Europe' (p. 69).

The book concludes with the following: 'Some commentators have argued for re-regulation of the airline industry. However, re-regulation does not seem to be the right policy to adopt.' This 'conclusion' comes at the end of a chapter that reviews the impact of deregulation in the United States in terms of effects on labour productivity, safety, the profits of airlines, etc. However, there is no attempt to draw the data together into a coherent picture. Consequently, the claim that re-regulation is not the right policy to adopt appears more like an assertion than a well reasoned conclusion.

Sadly, the book suffers from rather slipshod presentation, and the scholarship is not always effectively delivered. This is a great pity, because the author has enthusiasm and has clearly spent considerable energy in this field of study, but the arguments need to be developed and polished more, the historical context needs far more breadth and depth, and the presentation needs more painstaking attention.

Alan Dobson, University of Dundee

Cliff Edwards, *Railway Records: a guide to sources*, Public Record Office, Kew (2001), 232 pp., £14.99.

Although there is a short chapter on the other principal collections of railway records in the United Kingdom, this is essentially a guide to the Public Record Office's own holdings. They are of two types. Firstly there are the records of the English and Welsh railway companies that passed at nationalisation to the British Transport Commission (the RAIL class), together with the 'After nationalisation' records of the BTC and the British Railways Board (the AN class). Secondly there are the public records of the various government departments' dealings with the railway industry. The stated aim is 'to introduce railway records to the newcomer and to provide further help to those who may already have used the PRO to research railway history . . . to help the user learn about the basic record series . . . and to open other avenues of research'. In the judgement of this reviewer this succeeds only in part.

The best chapter is the one which deals with the records of government. Here there are lists and descriptions of a large selection of files on railway matters scattered through the records of departments concerned with high policy (Prime Minister's and Cabinet Offices), railway regulation (Board of Trade and Ministry of Transport and its successors), finance and tax (Treasury, Inland Revenue and Customs and Excise) and the armed services (Admiralty, War Office and Air Ministry). Inevitably there are omissions. For example, another of the PRO Guides has drawn attention to the liquidation proceedings of insolvent railway companies in Class J. The Exchequer Bill Loan Commissioners, whose records are in Class PWLB, played a significant role in financing some of the early railway companies. More surprising is the omission of the substantial body of railway material in the records of the Post Office; these are public records and appear in the PRO catalogue (class POST) although housed at the Post Office Archives and Record Centre at Mount Pleasant. Overall, however, the author has succeeded in providing a useful introductory guide to this part of the PRO's collection.

Maps, plans, technical drawings and photographs are dealt with at some length and there is a separate chapter on railway staff records as a source for family history research. However, the guide to the rest of RAIL and AN records is devoted almost entirely to a lengthy index, which takes up 40 per cent of the book, showing where the principal records of each railway company can be found. This would have been a useful feature when the book was conceived, but in the meantime PROCAT, the PRO's computer catalogue with a keyword search facility, has made it largely redundant. There is only the broadest indication of the types of record that can be found in these classes and no analysis of the sort of information they contain or discussion of how readers, particularly newcomers, may find them useful.

Grahame Boyes, Railway and Canal
Historical Society