

Reviews/Comptes rendus

The Periphery in the Knowledge Economy. Mario Polèse and Richard Shear-mur, in collaboration with Pierre-Marcel Desjardins and Marc Johnson. Montreal: Institut national de la recherche scientifique/INRS -Urbanisation, Culture et Société, 2002. ISBN : 237 p.

Sub-titled *The Spatial Dynamics of the Canadian Economy and the Future of Non-Metropolitan Regions in Quebec and the Atlantic Provinces*, this is a book on an extremely important topic, by highly respected and competent researchers. As is often the case in economics, theories of the likely impact of the knowledge economy on the spatial distribution of activities have arrived at contradictory conclusions. Some argue that information technology, in particular, means the end of distance; industries in the new economy will be able to locate anywhere. Others argue that the move to more high-tech industries will exacerbate the existing concentration of well-paying and high growth activities.

This book is interesting, insightful, and worth reading (or assigning to your students). Unfortunately, this is not the definitive resolution of the debate, although the authors come down unequivocally on the side of increased concentration. The evidence they provide - charts which often compare 1971 and 1996 or 1987, 1993, and 2000 - may confirm the already convinced but will not convert the skeptic. Their evidence is suggestive but they have not "amply demonstrated" (pp. 192, 199) their case.

Part of the problem may be that *The Periphery in the Knowledge Economy* tries to do too much in too little space. It "seeks to summarize" (p. xx) two years of research, including 17 background studies, various consultations with stakeholders, and a workshop. It may be that "this mass of information and accumulated experience" (p. xx) is definitive. However, the data presented are not overwhelming and lead to weak conclusions such as "...current technological change (at least, for the period studied) does not appear to have significantly modified existing location patterns" (p. 51). On its own, but in the light of the immediately prior charts - especially 3.1, 3.2, and 3.11, this highly qualified statement might have been phrased "appears to have only mildly modified existing location patterns", suggesting a quite different interpretation of the data.

As a summary, the study is not "an in-depth analysis" (p. xiii) because it fails to provide details of either its analytic framework or the (apparently) more extensive empirical analysis of the background studies. Instead, we are assured, for instance, that there is an "abundant literature on the subject of agglomeration economies" but it is confessed that "agglomeration economies are not easy to measure" (p. 26). The underlying assumptions are: 1. Economies of urban scale lead to the concentration of economic activities in larger cities making them still more efficient/competitive; 2. The market economy responds to this greater level

of efficiency in larger cities to further enhance their size and efficiency; and 3. Market “mega-trends” are inevitable. This leads to the authors’ main conclusions that concentration will continue, peripheral regions will lose population, and policy can do little but ease the transition.

From its beginning, there have been those who questioned this faith in urban scale economies and the efficiency of the private market (Friedmann 1972; Applebaum 1976). Moreover, the nature and sources of these scale economies need to be identified. ‘...Agglomeration theory is a powerful, if somewhat vague, notion... agglomeration cannot be held a universal tendency of industries...’ (Walker 1985: 248). There are at least 3 categories (Abdel-Rahman 1988), with a different terminology from that used in *The Periphery in the Knowledge Economy*: 1. Agglomeration economies - economies of scale internal to the firm - leading to large plant size and locations near large pools of labour and other inputs or to markets for their outputs; 2. Localisation economies - the savings in transport and specialized services from locating next to other firms in the same industry; and 3. Urbanisation economies - achieved by locating in large cities.

From an efficiency standpoint, this de-construction of the economies of scale argument puts in doubt the authors’ reliance on the market. Internal economies of scale to the firm can lead to imperfectly competitive markets which, by definition, fail to generate economic efficiency - the market price is always above marginal cost when the firm’s demand curve is down-sloping. The other two forms of urban scale economies are external to the firm and to the industry, respectively. When there are externalities, the market will not achieve efficiency. While we can debate whether this means cities will be too small or too large, it is easy to demonstrate that eventually market forces will lead to urban growth beyond the optimal size (Bradfield 1988: pp. 54-58). Yet the authors never raise the possibility that market imperfections may exist or that city size may need to be controlled. Yet they warn against subsidies to maintain inefficient smaller centres (p. 188) and say policy should “seek to reduce non-market obstacles...” (p. 189) - what about the obstacles generated by market imperfections?

Given the nature and sources of the three types of urban scale economies, it should be obvious that different industries will have varying degrees of sensitivity to them, even in parts of the knowledge economy. In addition, it may be possible to identify specific sources of attraction of large cities to particular industries, such as cultural amenities, and to provide them in smaller towns. Direct subsidies for provision of amenities may be far more efficient than ignoring the external costs of congestion, pollution, or social breakdown in large cities. Thus, the assumptions of the study actually mean there is room for policies limiting urban growth at the top end and stimulating it at the bottom.

There are also problems with the methodology used. A vast array of descriptive - and interesting - charts is presented, but for a fairly short time period, given that they wish to compare the trends in location before and after the information technology revolution. After all, major shifts in technology may take two generations to have significant aggregate effects. They present data which indicate correlations in the variables of interest; the lack of a detailed theoretical

base means they have not proven causation (or even the direction of the causation). With so few data points, the interpretation of evidence is often ad hoc - the contrary data are dismissed for a specific reason which is assumed convincing (see above discussion on Chapter 3).

The authors rely discussions with stake-holders to identify barriers to entrepreneurs. They only present those “highlighted in at least two regions” (p. 135) yet they dismiss (p. 203) the frequently raised concern about the lack of funding for small firms. It is claimed that the government has enough programs to provide access (p. 140) and the market imperatives will guarantee it, except for the problems of distance - again they seem to assume a perfectly competitive market when financial markets are dominated by a few firms.

The book presents interesting sketches of the 11 peripheral Canadian regions studied and of four successful regions - Tromsø, Norway; Oulu, Finland; Inverness, Scotland; and Moncton, N.B. The authors conclude that these regions' experiences support their conclusions that geography and agglomeration matter and policy can only build on these - “policy is marginal” (p. 159). This conclusion reflects their implicit assumptions about the efficiency of markets and the importance of urban scale economies. However, a variety of policies have been crucial to the current regional/urban configuration (Forbes and Muise 1993). Moreover, given the authors' emphasis on the importance of a highly educated and skilled labour force, it would seem that education policy will be vital for the future of peripheral regions.

This book deserves to be read, but it should be seen as a perspective on a question which remains a puzzle, with contradictory analytic conclusions and limited evidence.

References

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Knowledge Clusters and Regional Innovation: Economic Development in Canada. J. Adam Holbrook and David A. Wolfe. Montreal: Mc Gill-Queens University Press, 2002. ISBN: 0-88911-917-1 (cloth); 0-88911-919-8 (paper), 284 p.

This book is an edited collection of papers presented at the second annual conference of the Innovation Systems Research Network in May 2000. This network, which now has SSHRCC funding through the Major Collaboration Research Initiative (MCRI), is doing vast amounts of research on regional innovation systems, urban-based knowledge clusters, learning regions and, generally, trying to document and understand the ways in which space and knowledge interrelate and how this produces economic development. This book represents the second collection of papers coming from their annual conference and, as well, many of the principal researchers have done considerable publishing. There is therefore an emerging Canadian literature on this perspective on economic development which emphasizes innovation, physical proximity and social learning. This is a radical departure from the conventional view of economic development policy focused around federal-provincial areas of jurisdiction and little concerned with geographically clustered urban centres of learning. Even in thinking about the transition to the knowledge-based society and economy, conventional thinking focuses on the technological issues rather than, as is central in this collection, the social and political processes that create and sustain regional innovation systems.

Some of the most interesting work is that looking at why space matters and why clustering of activities produces stronger economic growth. David Wolfe's chapter on "Social Capital and Cluster Development in Learning Regions" does a very useful overview of the research on these questions, and underlines the importance of tacit, as opposed to codified, forms of knowledge. Tacit knowledge is that which is communicated by doing things together, by face to face interaction and therefore tacit knowledge does not travel well. Tacit knowledge is highly related to social capital as tacit knowledge builds trust and trust makes tacit knowledge more effective.

My particular interest in this area relates to the politics of regional innovation, understanding the ideological visions behind different strategies and, a related question, to understanding agency, what groups of social actors were involved and in what ways. For this reason I particularly enjoyed Neil Bradford's chapter on "Sectors, Cities and Social Capital: Social Democratic and Neo-Liberal Innovation Strategies in Ontario, 1990-2000" and Michael Gurstein's chapter on "Community Innovation Systems and the Chair in the Management of Technological Changes: A Solution for a Community Being Left Behind".

Neil Bradford compares the economic development strategies of the Rae and Harris governments, arguing that both tried to radically shift towards a knowledge-based economics but that the two strategies stemmed from very different ideological perspectives. The NDP's strategy can be seen to relate to the thinking of Karl Polanyi and the Conservatives to Frederick Hayek. The NDP's strategy was to attempt to work in terms of sectors, bringing people together with not only

from management and labour but also from wider groups from the community sector. The Conservative strategy was to reduce government, free the market and decentralise activities to the local level hoping to create urban regions striving for innovation for competitive advantage. Neither strategy really succeeded, and Bradford explains why, but both were ambitious attempts to restructure Ontario's economy, each of them based on a fundamentally different view of how economic growth occurs.

Michael Gurstein's chapter is quite different; it details the community innovation strategies that were used in Cape Breton, particularly by the Chair in the Management of Technological Change, attached to the University College of Cape Breton. What I liked about this article was that it gave a real sense of the community development processes that had been used, with what seemed to be a very realistic analysis of the reasons for successes and failures. It read like a real account of activities, not a theoretical model. It makes concrete the processes whereby social capital is built and learning regions developed.

One of the things that we can hope to see from the Innovation Systems Research Network is increasing numbers of studies that systematically compare different regional innovation systems across Canada. The beginnings are here in this book; Lisa Mills and Shauna Brail's chapter on the new media cluster in Toronto can be compared to Diane-Gabrielle Tremblay, Juan-Luis Klein, Jean-Marc Fontan and Daniele Bordeleau's chapter on multimedia in Montreal. Hopefully, these comparisons will continue to develop and become more systematised so that we can begin to build up useful knowledge about how to go about creating learning regions. There is concern in a number of the chapters in the book that the Putnam view that social capital develops over 1000 years is too slow or untrue; there is discussion of "swift trust". It would be useful to have rigorously developed comparisons across Canadian clusters that looked at questions of social capital and mechanisms of building trust. If economic growth is local, we need to base policy on good local information. This book is certainly a major step in the right direction.

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Services et métropoles : Formes urbaines et changement économique. Jean Philippe, Pierre-Yves Léo et Louis-M. Bouliane (dir.). Paris : L'Harmattan, Collection Villes et Entreprises, 1998. ISBN : 2-7384-8211-2, 300 p.

Cet ouvrage de 300 pages, réunissant les contributions de 16 auteurs principalement européens, se veut résolument comparatiste. Faisant suite à la tenue d'un colloque à Aix-en-Provence rassemblant les chercheurs travaillant dans le cadre du Réseau Européen sur les Services et les Espaces (RESER), dont le pilotage fut assuré par le Centre d'Economie Régionale, l'ouvrage se compose de deux parties d'ampleurs inégales.

La première intitulée « Tertiariation et systèmes urbains » place les services au cœur du changement des économies urbaines contemporaines en analysant les tendances observables de la croissance dans trois systèmes urbains : France, Amérique du Nord (Etats-Unis, Canada), Scandinavie (Danemark, Finlande, Norvège et Suède). La construction des trois chapitres la constituant s'avère très voisine. Il s'agit d'abord de faire l'état des évolutions de la tertiarisation puis d'examiner les profils tertiaires des métropoles avant d'aborder la question de la distribution spatiale intramétropolitaine des services. Ces trois analyses globales rappellent bien comment les services sont au cœur des mécanismes de la croissance urbaine, quels rôles ils jouent dans les processus de diversification sectorielle, combien il faut distinguer les activités inductrices (services à la production) de celles induites par la demande des ménages qui n'ont pas les mêmes effets multiplicateurs en nombre d'emplois et sur les revenus de ces derniers. Ces analyses montrent aussi comment la tertiarisation provoque des reconfigurations urbaines par les relations à la fois complémentaires et concurrentielles dans lesquelles se situent désormais les centres et périphéries des métropoles. À cet égard, l'économie de services étend et autonomise les économies périurbaines.

Pour suivre, huit chapitres forment la seconde partie intitulée fort simplement « Les services dans huit métropoles ». Par l'origine des chercheurs regroupés dans le RESER, il n'est pas surprenant de rencontrer là des monographies consacrées à une exception près (Montréal) à des métropoles européennes (Barcelone, Birmingham, Bordeaux, Genève-Lausanne, Marseille-Aix, Milan, Toulouse). L'intérêt de ces chapitres réside d'abord dans l'importance des données factuelles et de leur commentaire : chaque auteur se doit de montrer comment la tertiarisation fonctionne et avec quels effets induits, autant d'un point de vue économique que spatial. Ces zooms présentent l'intérêt également d'illustrer tout en les éclairant les analyses de la première partie. Même s'il n'existe pas de stricte correspondance entre elles : aucune métropole scandinave n'est ainsi présentée dans cette seconde partie et les métropoles sud-européennes ou britannique ne renvoient pas à des lectures plus globales. Enfin, les exemples retenus témoignent combien les processus de métropolisation contemporains renvoient à des trajectoires diverses. Ainsi s'expliquent les qualificatifs ajoutés par les auteurs au nom de la métropole étudiée. Certaines s'inscrivent dans un rôle régional (Bordeaux, Genève-Lausanne), d'autres sont placées dans un contexte national et continental très concurrentiel au point d'avoir vu leur position relative s'affaiblir (Montréal),

Birmingham illustre une autre trajectoire : celle de la reconversion drastique, Toulouse participe des métropoles technologiques alors que Milan reste la métropole-capitale économique de l'Italie. Bien sûr, ces choix apparaissent judicieux a posteriori, même si cela ne donne pas lieu à un essai de synthèse dans la conclusion générale limitée à quatre pages !

La brièveté de celle-ci constitue d'ailleurs le principal défaut de cet ouvrage. Mais, après tout, l'avant-propos et l'introduction, beaucoup plus copieux, ne sont-ils pas là pour aider le lecteur dans la formalisation d'une synthèse.

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Urban Competitiveness: Policies for Dynamic Cities. Iain Begg. Bristol, UK: The Policy Press, 2002. ISBN: 1-86134-358-2 (hardback); 1-86134-357-4 (paperback), 337 + ix p.

This book includes reports on 10 projects from British Economic and Social Research Council-funded research into the processes that shape urban competitiveness. Two North American studies (Montreal and Camden, NJ) are also included. The 'Cities: Competitiveness and Cohesion Research Program' consisted of 23 research projects in total and was completed in 2002. The editor, who is Professor of Economics at South Bank University in London, has contributed introductory and concluding chapters. The contributors, whose positions are not reported, apparently include a number of planners and geographers.

The foreword by a British cabinet minister nicely highlights the need for this type of research:

“The British Government believes that cities are central to the competitiveness of our economy and we have introduced many policies designed to improve their performance. Yet the concept remains elusive and its determinants are poorly understood”.

While it's not exactly clear what the 'concept' is, similar statements could be made by many other national, provincial, and local governments around the industrial world. The idea that cities are the places where the new economy will flourish and propel national economies to new levels of prosperity is commonplace and policies to exploit it abound. The important policy task is to identify what governments can actually do to facilitate this process. It is worth noting at the outset that not everyone believes that making cities more competitive by boosting their high tech sectors is a feasible objective. Michael Porter's contributions to regional and urban economic policy are not universally admired and other scholars such as Paul Krugman have scorned the notion that the concept of competitiveness has meaning beyond the firm level.

While this debate receives considerable attention in several of the chapters of this book, it is not necessary for the reader to make up her or his mind in order to learn something from the research that is reported in the book. Its chapters can be classified by subject matter, research approach, and city focus. The following list summarises the subjects of the various chapters.

- ▶ measuring the knowledge base of cities
- ▶ enhancing social cohesion, trust, and inclusion
- ▶ relationships between the property market, planning, and the urban economy
- ▶ factors influencing economic performance
- ▶ innovation and clusters

Most of the book's chapters deal with Britain. In a few chapters, the scope is broadened to Europe but generally this is a book about U.K. cities. Generally, this means the whole country but some chapters focus on particular areas such as the

London Metropolitan Region, Glasgow and Edinburgh, and Oxford and Cambridge. The chapters with a definite city focus seemed to offer more information and insight, a view perhaps echoed in the editor's conclusion that each city needs its own diagnosis and policy prescription. Canadian readers might find Peter Kresl's chapter on Montreal interesting reading, especially since it emphasizes the important roles of local government. (Although the connections between Montreal and the other cities featured in the book are unclear.)

A variety of methodological approaches are used. The dominant methodology is to rely on the conclusions of the literature, supplemented by descriptive analysis of statistics. Several chapters use surveys and interviews as their main source of information. Overall, it is these chapters that seem to contribute the most to a reader's understanding of this subject. It should be noted that there is little formal statistical analysis (but many statistics) and shift-share analysis and location quotients carry a large burden of proof for various conclusions.

Three chapters stand out in their value to wider understanding of the nature and importance of city competitiveness. A chapter by the editor, Barry Moore and Yener Altinbas presents a good overview of U.K. cities' competitive positions over the last 50 years. The authors find major change and conclude that the reasons for these patterns are various and complex. James Sinnie, James Sennett, and Peter Wood have a chapter that examines innovation differences in the London Metropolitan Region in the 1990s and surveys firms that received basic research grants from the EU to determine their networking behaviours. A useful chapter by Philip Cooke, Clare Davies, and Rob Wilson takes an in-depth look at clusters in Oxford (biotechnology) and Cambridge (biotechnology and information technology). Their findings suggest optimism for smaller cities that possess the right preconditions and catalysts.

The editor's conclusions emphasize the elusive nature of urban competitiveness, and suggest that expectations for consistent definitions of this term are mistaken. Rather, each city must be approached on its own terms with an appreciation for its own situation. A toolkit approach is recommended, implying that government policy, where needed, should be flexible and responsive to individual city circumstances. The editor believes that well-functioning property markets and social trust and inclusion are goals that are too often neglected and should, if given appropriate weight, improve the competitive position of at least some cities.

This book should appeal to scholars who want to know more about the competitive position of U.K. cities and are curious about the possible effects of various government policies. However, it is not a substitute for the burgeoning journal literature on this subject, much of which is based on more recent data and uses more rigorous analytical tools. In terms of the book's objective, to improve understanding of city competitiveness, it probably has succeeded, but only in part. The lesson for government policy intervention in this area is surely to be cautious in designing and funding programs that aim to assist cities, if only because their situations and needs are so diverse.

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