Fiscal Capacity

This article describes the problems that cities face in maintaining fiscal capacity. Bahl covers the following topics: social service provision, tax base capacity, government bureaucracy, infrastructure maintenance requirements.

Borgos explores the use of regression and curve-fitting analysis to empirical development and fiscal impact data. He notes that these techniques offer several advantages to the conventional approach, including enabling communities to use incremental instead of average cost data, direct computation of tax rate impacts, and orientation toward cumulative growth patterns. This is especially good for analyzing growth management measures.

The authors explore the notion that population growth increases property taxes. They develop an approach that improves upon existing property tax impact models by widening the scope of determinants. They suggest that their model could be used by local governments to calculate costs, and conclude that there are multiple impacts on different types of housing and homeowners.

This paper examines the impacts of growth management experiences by looking at the following impacts: infrastructure costs, housing costs, land consumption, fiscal impacts. Burchell relies on existing literature to draw his conclusions. He begins by contrasting typical suburban development with more managed development which features clustered housing and commercial areas, preservation of open space, reduced infrastructure costs, etc. He then discusses forces of growth, starting with economic growth, in which, in an ideal condition, infrastructure is in place where needed....further, there are reasonable relationships between existing and new growth...and there is an equitable balance of income groups paralleling job opportunities through the region. In the traditional sprawl development, however, the competition for market share leads to inefficiency, examples of which include commercial and industrial development location designed to maximize vehicular access but nearly always at the periphery of Metro...
areas. This becomes associated with demand for infrastructure. Increased costs result -- having to do with providing new infrastructure and maintaining the old infrastructure of abandoned areas, causing a regional rise in the cost of doing business in the region. In the short run, Burchell asserts that this is not bad because it maximizes individual economic benefit. Planned growth channels growth to efficiently-served locations and reduces long-term costs. Regarding infrastructure costs, Burchell reviews costs of providing infrastructure literature, including Franks ULI review and others. However, he doesn't discuss broader social costs such as regional economic equity, etc. To sum up his conclusions: Land consumption -- planned dev consumes 40% as much land as sprawl dev., 60% agri. acreage and 17% the level of dev. on frail lands; Infrastructure -- planned dev is 75% as expensive for roads, 95% w/ respect to schools, 85% w/ respect to utilities, parity with others; Housing -- doesn't increase costs, may yield small <6% savings; Fiscal Impact -- planned dev. is less costly on annual basis to both municipality and school district by 2%, requires less cap expenditure (about 3%) for school districts.

Burchell (principal investigator), Robert W. et. al., Impact Assessment of the New Jersey Interim State Development and Redevelopment Plan (Executive Summary), New Jersey Office of State Planning (OSP), 28 February 1992.
This study looks at the impacts of the New Jersey growth management plan which recommended denser development as an important step towards improving the states economy. The findings include: $400 million in savings to municipalities; $1.4 billion saved over 20 years; 130,000 acres not developed; sprawl requires 28% more farmland, 67% more other vacant land; 80% of environmentally sensitive and prime agricultural land would be saved; water pollution would decrease by 40%. As a result, this study supports the original recommendations of the state plan.

This report compares traditional (TREND) and planned (IPLAN) development projections for the state of New Jersey, assessing them in the context of five Impact Assessment categories: Economic, Environmental, Infrastructural, Community Life, and Intergovernmental Coordination. Economically, the report finds that planned development will shift far more jobs to urban areas, as well as create savings in provision of public services. Environmentally, IPLAN consumes far fewer acres of land (particularly frail and agricultural land) and offers a reduction in most water pollutants. The major savings are in infrastructure, as IPLAN requires much less road construction, provides greater access to existing transit services, and allows for more efficient sewer and water hookup. According to the Quality of Community Life index, initial decreases in QOL in IPLAN (compared to fringe)areas would be reversed over time as communities are restored.

Chernicks article discusses fiscal capacity. In it, he discusses how to measure a metro areas fiscal health, how this depends on everything from the services it can maintain to the revenues it can bring in. In central cities, low fiscal capacity is thenorm because these areas tend to have high public service burdens, the loss of middle to upper
income residents, degraded land value, the inability to attract major employers, declining funding from government agencies, and the tax exempt status of government entities, hospitals, religious, education, and cultural institutions, etc. He then asks if fiscal disparities exacerbate conditions -- in a cyclical fashion, and explores this incompletely. He also assesses the effectiveness of efforts to boost cities and notes that they are uneven performers - some even do more harm than good. The question of whether there is a suburban bias in transportation funding is raised, but not answered.


The author compares the fiscal health and outlook of a traditional "bedroom" community (West Springfield) and a "new town" of mixed uses (Reston) in Fairfax County, Virginia. Separating out West Springfield's higher education expenditures, Cuthbertson's fiscal analysis showed Reston to be a $1 million asset to the County, compared to West Springfield's $500,000 deficit. The author detailed how Reston was able to generate a much larger real estate tax revenue from its industrial/commercial tax base, which also allowed the city to keep its tax rate relatively low. Cuthbertson concludes (from a Fairfax County point of view) that sound fiscal policy would encourage mixed-use development and that the traditional philosophy that residential development "pays its own way" is misguided.


Some of Clevelands grand old suburbs are now experiencing decline, as efforts to maintain infrastructure, schools, and other services get increasingly more expensive and competition for homebuyers grows from new suburbs. This article discusses the efforts of citizens in Lakewood, East Cleveland, and other older Cleveland suburbs, where the wealthy and powerful once lived. Tom Bier predicts that outmigration will not cease, unless strong steps are taken to promote development near the central city. Timothy Hagan, president of Cuyahoga County Commissioners, believes that outmigration is facilitated by highway widening, and that the state legislatures decision to expand Interstate 90 will have this effect. Such a move will make it easier for suburban commuters to live in suburbs and commute to work from another county.


Research conducted while working at Urban Land Institute. This paper discusses the popularity of Adequate public facility ordinances (APFOs) in promoting growth management. This paper reviews case studies and other research to show that they can be very complex and burdensome to administer, but that they can help communities plan infrastructure better.

Orfield analyzes demographic and geographic trends that indicate the progression of suburban sprawl, outmigration, and the spread of urban pathologies in the Minneapolis-St. Paul area. He makes the case that federal subsidization and policy drives investment to be made at the periphery of urban areas and that this trend continues as city centers and inner ring suburbs decline. Orfield contends that the destabilization effect of increasing poverty on schools and communities generates a flight of middle-class families (and the tax base they provide) at the same time these communities need them to prop up the increased demand for social services. Ironically, the new areas the middle class flees to often lack the capacity to handle their arrival and public services there decline as well. The third variable in this equation, the upper-income suburbs, tend to capture the benefits of regional growth and become more homogeneous, exclusive, and isolated. The entire region suffers, as infrastructure becomes more expensive to maintain, urban problems spread, and the center deteriorates. Orfield offers six reforms attempting to reintegrate metropolitan regions trapped in this cycle, including the promotion of more affordable housing in suburbs, shared property-tax bases, growth management, and transportation reform.

Richardson and Gordon use the Lowry land-use model to examine possible employment, population, and public expenditure effects arising from either an infusion of new employment into a suburban area or a transfer of employment from an urban core to a suburb. The findings of the study are: that core-job decline effects the entire central city, and that attracting new employment to suburbs from outside the region benefits not only that suburb(s) but the central city as well in a spatial-multiplier process. Thus the authors conclude that central cities should cooperate with their suburbs in attracting industries from other regions, directing them to inner suburbs to mitigate the spatial-multiplier effect.

Robinson edits a volume of papers that emerged from a conference on growth. She and others discuss the extra burden that growth places on the already-strained revenue raising abilities of municipalities. They discuss the financial dimensions, political feasibility of actions, social costs of continued sprawl, and the breakdown of where the greatest burden of costs lie. Growth is addressed generically, not as different archetypes.

Rusk examines the social, demographic, and economic dimensions of metropolitan growth over the past forty years and argues that cities that have been able to extend their authority, boundaries, and influence (elastic cities) have fared much better by all indices than those cities that have remained wedded to geographic constraints, class
and racial segregation, and fragmented governmental structures (inelastic cities). Elastic cities have been able to capture a significant degree of suburban growth within municipal boundaries and have thus been able to retain a larger revenue base, enabling them to revitalize core areas. Rusk offers a number of possible approaches to "stretching" cities, including a national "urban triage", creation of metro government (general purpose and regional) structures to empower urban jurisdictions, and a federal urban policy offering incentives for municipal reorganization and requirements towards that end on grant programs.

This article discusses the new boom in public capital outlays and how that has impacted state and local governments. It notes that the fiscal capacity of these areas, however, is declining with increased regulatory and social service burdens, and bureaucracy. The author also notes that this trend tends to favor suburban and relatively affluent areas at the expense of low-income urban areas.

Sharkey, Mary Anne Lakewood Schools Learn a Lesson, The Plain Dealer, Cleveland, OH, 10 May 1995.
Lakewood residents are realizing that increasing their property taxes to improve their schools is a crucial step to preserving property values -- otherwise, schools will decline and will be unattractive to prospective homebuyers in the region. Sharkey notes that the issue of a school levy divided residents between older citizens, who fought the increase and have less interest in improving schools or maintaining property value, and baby boomers, who care both about schools and property values.
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6/19/1997
Land Use and Transportation

Compendium of articles from a conference -- see individual descriptions of articles by authors.

The authors evaluate the strength of the correlation between transportation investment decisions and land use patterns, arguing that sprawl critics have oversimplified a number of points to portray a strong link. They repudiate a number of widely accepted ideas, such as the notion that federal policies and investments have encouraged decentralized development, that metropolitan transportation planning has lacked consistancy, and that there are consumer preferences for other types of housing and transportation. The article presents the general position and arguments of sprawl critics—it is inefficient, costly, and divisive—as well as the opposing points of its defenders, who contend that particular concerns and criticisms are overstated and fail to justify interference with the market mechanism. The summary concludes that existing transportation and spatial realities are an expression of societies preferences, and that transportation measures have such a limited effect on metropolitan development that deviation from the status quo—the bountiful highway environment—would be foolhardy.

Blakely, Edward J., Shaping the American Dream: Land Use Choices for Americas Future, Cambridge, MA: Lincoln Institute of Land Policy Working Paper, 1993. This article notes that different forces are vying for status as land use determinants in America:

- Globalization of metropolitan economies,
- Mounting environmental and transportation concerns which drive new calls for national land use controls,
- Foreign investment in housing and real estate,
- Immigration, changing demographics, smaller households,
- Urbanization of land (rural and open space).

Blakely notes that globalization has made American cities more like ports to global markets, with different tiers of metro areas serving different purposes. The internationalisation makes cities more like systems than places, the forms of which are determined more by function than by sense of place. Proximity becomes less of an important determinant because the region develops speicalized nodes resulting decentralization. Some of these nodes are technospaces which reflect the growing importance of the information economy in shaping urban form and transportation needs. He also notes that these forces are being fought by calls for stronger land use regulation, even at the federal level, to combat environmental, transportation, and other problems. Even environmental rules that dont explicitly involve land use have some impact on it, such as air quality and other measures. Blakely calls the new city system the Metro-burbanization of America. Blakely asserts new suburbs are their own self-sufficient entities that are characterized by racial and economic segregation, and a new social order for communities across the country. He also notes that many environmental and other calls for land use control may have the effect of restricting people of color from migrating to suburbs, maintaining racial and class segregation. Blakelys conclusion: a research agenda that focuses on land use policy and social issues is needed. This should focus on internationalization, the effect of specialized economic functions, the flaxibility of spaces within the urban system, islands of deterioration within urban systems, environmental and land use issues.
Brand offers a new paradigm for examining the interaction between transportation and land use that incorporates individual behavior. This paradigm inserts available resources and individual needs into the equation of individual land use and transportation consumption. Because of this "third variable", Brand argues that simply offering alternative development schemes as an attempt to reduce travel may be ineffective and that shifting some of the costs incurred by travel choices to individuals may be necessary. The paper concludes by offering seven options for future urban mobility that reduces congestion and environmental impacts, focusing on information access and technology improvements.


This paper outlines the need for more extensive research to inform decision-making on five "high-priority" areas: individual trip generation decisions, investment decisions, financing, land-use planning, and development project selections. The authors go on to outline how transportation negatively affects land, air quality, and energy consumption and explains how these impacts can be addressed by providing increased information on their costs to decision makers.

Deakin asserts that transportation planners are "in the land use business" and have a potentially major impact on the quality of metropolitan structure and life. She explains the inverse relationship between transportation costs and land value and the centralization of economic activity/Dispersion of housing that results. Deakin concludes from empirical analysis that transportation development decisions have a major (but not the only) role to play in spurring economic growth, reducing pollution, and improving social equity.

Downs underscores the failings of the dominant low-density "vision", which not only exacts tremendous economic and social costs but also has conditioned American preferences toward the same patterns of development. Downs argues that the existing vision begs replacement due to its unsustainability and the "social inconsistancies" between what it promises and what it provides. He outlines many of the most pressing urban problems-economic and racial segregation, pollution, loss of open space, loss of
revenue sources--and explains how each is closely linked to low density growth. From a transportation standpoint, Downs advocates moderate approaches--higher densities in both new and existing housing developments to reduce VMT's and market incentives to encourage voluntary concentration of jobs to promote public transit and ride sharing are two examples--given consumer preferences for driving alone. He also supports inclusion of affordable housing in new growth areas to bring regional land and housing prices into equilibrium and direct growth inward.

Dyett, Michael V. Site Design and its Relation to Urban Form," Transportation, Urban Form, and the Environment, Washington DC: Federal Highway Administration, 1991. This paper stresses the necessity of incorporating site-specific transportation plans into community development. Dyett offers that planners need to make mixed-use communities work at various scales, with appropriate design objectives, to strike the right balance with the existing environment, both natural and built.

Ewing, Reid, Mary Beth DeAnna, and Shi-Chiang Li, Land-Use Impacts on Trip Generation Rates, prepared for TRB Application of Planning Methods Conference, Seattle, Washington. Authors note that traditional modeling exercises do not account for a number of things, including walking and bicycling. They suggest methods to reforming existing models.

Ewing, Reid, Padma Haliyur, and G. William Page, Getting Around a Traditional City, a Suburban Planned Unit Development, and Everything in Between, Transportation Research Record, 1466, Washington, DC: Transportation Research Board, 1994, pp. 53-62. This study presents findings from the statistical analysis of data from six communities to see if there are relationships between location and land use, and household travel patterns. Conclusion: sprawl areas generate nearly two-thirds more vehicle hours of travel per person than in traditional city design. The poor accessibility in sprawl areas is compensated for through trip chaining. Recommendations: developing facilities for pedestrians and transit isn’t enough to remedy access in the suburbs -- facilities and services must be integrated in communities to provide better access opportunities.

Giuliano, Genevieve Land Use Impacts of Transportation Investments: Highway and Transit, in The Geography of Urban Transportation, 2nd edition, Susan Hanson, ed., forthcoming (1995). The author refutes the traditional association of a consistent relationship between transportation investments and land development. Giuliano concludes from empirical evidence on a number of major metropolitan centers of similar transportation development history that land use changes do not follow investments, but rather are the result of dynamic and variable conditions specific to each locale. Giuliano uses elements of spatial mismatch theory to support this claim, arguing that the opposite effects transportation investment has on housing vs. business location mitigate the potential for transit oriented growth. The lack of a regional bound constraint, potential for political and community pressure, and the intricate transportation patterns already in place also support her critique of transportation as a precursor to development.
This literature review examines the connection between transportation and land use.

Handy explains the cyclical relationship between choice of transportation mode and retail accessibility; namely that automobiles were at some point chosen as the primary means of transit, after which retail and commercial facilities were designed with auto access in mind, which reinforces the initial transit choice. Further implications of this cycle are the collapse of the retail heirarchy (levels of stores differing by size, scope and location) and the decline of the central business district. This cycle of dependency also threatens to stamp out other means of transit, excluding those without access to autos, by the sheer amount of infrastructural resources devoted to it. Handy warns of the unsustainability of current accessibility patterns, and concludes with a mention of neo-traditional development and higher density settlement patterns as a way to combat current trends.

The author discusses the variety of social costs, automobile-related subsidies, and other factors that drive land use development (also known as sprawl). He contends that the federal governments direct subsidy of an automobile-oriented transportation system has blocked out other transportation opportunities. He also makes recommendations for reforming pricing policies to better reflect true social costs.

In this introductory chapter Hanson begins by explaining how access and mobility lead to a symbiotic relationship between land use and transportation, with increased access necessary given that land uses are spatially disjoint and enhanced mobility contributing to an increase in that separation. Hanson provides formulas for measuring both the accessibility of places and the level of accessibility available to people, and follows this with an overview of recent trends in residential and journey-to-work patterns. She finds that at the same time motor vehicle ownership and trip frequency and length has increased, there has been a rise in people with special transportation needs that have frequently not been met. Hanson also debunks the notion that metropolitan commuting is primarily suburb to central city and explains the effects this decentralization of workplaces has led to residential segregation, pollution, overburdened transportation systems, and problems of accessibility and opportunities to jobs for the urban poor.

This is the definitive compendium of writings on urban transportation and the geographic factors that effect it.

Holtzclaw, John Using Residential Patterns and Transit to Decrease Auto Dependence and Costs, San Francisco, CA: Natural Resources Defense Council, June 1994. Holtzclaw analyzes data from communities in Northern California to derive equations governing the relationship between density, transit accessibility, and household travel. He concludes that there is a strong relationship between these factors, and argues that his findings support the case for location-efficient mortgages. LEMs enable homebuyers to amortize larger mortgages if they buy in location-efficient areas, the rationale being that they would have more cash in pocket to finance a more expensive home.

Lynch, Kevin, Good City Form, Cambridge, MA: MIT Press, 1981. This comprehensive work takes into account a wide array of issues, including an historical overview of urban form and an evaluation of normative theory on good cities and what society wants and needs from its urban areas. Lynch than advances his own theory of a good city form, portrayed as a dynamic and comprehensive community with a sense of identity, a high degree of internal and external accessibility, and a focus on efficiency and social justice in its essential functionings. The final section of the volume moves toward articulating this vision, taking on practical concerns such as land use, integrating the city into the natural environment, optimum sizes and population (and managing these), and relating urban forms to urban goals. Although ambitious and a bit unfocused, Lynch succeeds particularly in his incorporation of qualitative development into the idea of a better city.

Meyer J. R. and J. A. Gomez-Ibanez, Autos, Transit and Cities, Cambridge, MA: Harvard University, 1981. The authors describe the evolution of American transportation patterns in the post-World War II era, emphasizing the policies and subsidies that contributed to the dominance of the automobile and the issues this reality has raised. The authors conclude that consumer predilection for cars is economically rational and will continue, and their discussion of transportation reform is structured around this. They advocate reengineered (smaller, safer, more efficient) cars, ride-sharing, and investment in increased mass transit efficiency for short, intra-urban trips (which they feel to be its only natural market).

Muller, Peter O. The Transformation of Bedroom Suburbia into the Outer City: An Overview of Metropolitan Structural Change Since 1947, in Suburbia Reexamined, B.M. Kelly, ed., No. 78, New York: Greenwood Press, 1989. Muller offers a history of urbanism, describing in particular how technological innovations such as the electric streetcar and particularly the automobile initiated flight from metropolitan cores and how economic and policy developments during the interwar years and after World War II turned this trickle into a mass exodus. Muller explains that the latter period saw an unprecedented expansion of retail and commercial activity to the formerly residential suburbs, to a degree in which they rivaled and in some cases
surpassed urban business districts--due largely, he argues, to the coming of age of the auto and the development of high-speed freeways and urban circumferentials.

Muller, Thomas, Economic Impacts of Land Development: Employment, Housing, and Property Values, Washington: The Urban Institute, 1976. Muller examines the three major impacts of land development decisions--employment, housing, and property values. He describes how development decisions intended to increase job opportunities often ignore variables such as residence choices. He also contends that land-use models are largely inefficient in assessing potential development impacts, describing their high costs as well as pitfalls associated with them. Muller stresses the importance when evaluating a project of considering employment, income, and housing effects concurrently, as these variables are difficult to separate.

Newman, Peter Planning in an Age of Uncertainty, for Urban Planning Seminar, Hobart, Australia: Hobart Metropolitan Councils Association, 12 November 1993. Newman begins by outlining several important values for the planner in the post-modern world. In a stark repudiation of modernism, Newman emphasizes the importance of the environment, social justice, heritage, public space, the urban economy and a sense of community in an age of uncertainty. Newman also stresses the importance of diversity to the planner, in styles of housing, transportation modes, use of fuels, infrastructural construction and culture. In remaining consistent to these goals Newman advocates that planners should incorporate elements of all three of post-modernism's predecessors (the Walking, Transit, and Auto cities) with heavy emphasis on developing a sense of community.

Parker, Jeffrey A. Does Transportation Finance Influence Urban Form? Transportation, Urban Form, and the Environment, Washington, DC: Federal Highway Administration, 1991, pp. 43-62. Parker suggests transportation no longer is the sole catalyst for economic development, nor is it the key to reversing decentralization in the location decisions of firms and households. Given this, Parker stresses the importance of improved budgeting decisions and focusing on high-benefit projects, as well as a cautious reliance on public-private partnerships as funding sources. Resources should be channeled through technological innovation to meet consumer preferences.

Pas, Eric I., "The Urban Transportation Planning Process, in The Geography of Urban Transportation (Susan Hanson, ed.), New York: The Guilford Press, 1986. This chapter provides an overview of urban transportation planning over the last thirty years, which Pas contends has hardly been one consistent "plan" following the rational model but rather a dynamic, ever-evolving response to demographic and social changes and geographic realities. Pas does apply a loose framework which has endured and in which most planning fits (pre-analysis, modeling and technical analysis, post-analysis) and emphasizes the need for transportation planning to be forward-looking as a major contributor to urban and regional development.
Plane begins by explaining what the goals of urban transportation policy have been—initially to meet ever-increasing auto use by expanding supply, and more recently, a manipulation of demand to maximize existing transportation facilities. Plane contends that the character of urban transportation problems has remained constant, but policymakers perceptions of how to solve them has changed. In this vein he describes crisis-driven management, future-oriented planning, planning to maximize growth, and normative/social goal oriented planning. Across this planning paradigm Plane describes ways of manipulating both transportation supply and demand in the post "highway laying epoch".

Porter contends that despite the dominance of market forces in metropolitan development, there is a need for effective and empowered regional transportation governance structures to create more holistic and responsive transportation strategies. He describes some limiting factors for regional transportation governing bodies (including the continued reliance on state and federal funding and problems of integrating local jurisdictions) as well as similar shortcomings in the land use sphere. Porter concludes that growth management through the relation of land use and transportation decisions requires coordinated action on three key points—the use of regional demographic and economic projections strategically; synthesis of local planning toward regional reconciliation; and provision of feedback to local jurisdictions.

This comprehensive study relates the supply and demand of urban transit with the density needed to sustain it. It begins by examining five main factors affecting transit use—its characteristics in relation to its main competition, the auto; the positive relationship between density and transit use; expenditures necessary to sustain a system; the linkage of expanded service with expanded ridership; and ways of reducing costs. The authors take on the subject of shifts in demand relative to price; break down density effects by specific types of traveller, trip, and mode; and attempt to match service availability of each mode with prospective demand by density level, taking into consideration demand and supply side variables. Pushkarev and Zupan conclude with an array of potential policy applications to address a supply-demand equilibrium.

The author attempts to determine if newer models of planning based on higher densities and mass transit would have the demand to make them viable alternatives. Shaw uses hedonic pricing methods and residential satisfaction data in an attempt to derive consumer preferences for housing types and locations and the value they attach to dwellings. He leaves the question of willingness to live in high density locales unanswered, however, advocating further research in particular market segments.
Stutz, Frederick P. Environmental Impacts, in The Geography of Urban Transportation (Susan Hanson, ed.), New York: The Guilford Press, 1986. Stutz begins by describing major environmental impacts stemming from transportation projects; namely noise pollution, air pollution, aesthetic impacts, and effects on water quality and plant and animal species. He then proceeds into a description and evaluation of various valuation techniques and of cost-benefit analysis. Stutz concludes the chapter with a description of the relevance and methodology of an environmental impact statement. Stutz unfortunately never links specific transportation modes with the types of environmental damage they would incur and therefore leaves the reader without a framework for comparison.

Transportation Research Board, Transportation, Urban Form, and the Environment, Federal Highway Administration, 1992. This collection of papers presented at a conference sponsored by the Federal Highway Administration covers such diverse topics as transportation finance, regional governance, and the linkage between land use and transportation. The resource papers are summarized in other entries.

Vesterby, Marlow and Ralph E. Heimlich, Land Use and Demographic Change: Results from Fast-Growth Counties, Land Economics, Vol. 67, No. 3, August 1991, pp. 279-291. The authors contend that the dispersal of population since WW II has been the biggest driving force in changing land use in America. However, the charge that Americans are consuming land at a greater rate seems to be false, according to the researchers examination of Fast-growing counties. They find that population consumption rates are relatively constant during this period. They encourage policy makers to pay attention to changes in demographics because they argue that those have a strong influence on land use decisions and changes. This study examines the effects of demographic changes on land consumption and metropolitan decentralization. It concludes from an analysis of two ERS data sets concerning fast growth counties in the U.S. that there was little change in marginal urban land consumption between 1960 and the early 1980s. The perception of rapid decentralization, the authors argue, stems from the large-lot early development characteristic of non-metro fast growth counties. The authors show the primary cause restricting marginal increases to be declining household sizes during this period, combined with increased numbers of household formation. They warn, however, that slight changes in these demographic trends in combination with current preferences for detached housing on large lots, could increase overall land conversion.

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This study is often referred to as the definitive "costs of sprawl" analysis. Stating that "current pressures upon the nation's finite resources cannot be accommodated without better planning", it offers a detailed cost analysis for a number of different development types. Visionary in its depiction of the perils of excessive auto use and the limitations of low-density, single-use communities, the study provides a thorough examination of sprawl's effects on air and water quality, land consumption, wildlife, vegetation, and quality of life issues. It concludes that public investment costs incurred through provision of social services are inflated by sprawling development patterns and could be reduced by up to 40% by planning higher density communities.

The Distribution of Subsidized Housing in Cuyahoga County, Cleveland, OH: Cuyahoga Metropolitan Housing Authority, September 1993.

This is a compendium of data relating rental and subsidized housing in the Cuyahoga County region. It includes the distribution of said housing by census tract and statistical planning area.


This article contends that communities across America have become disillusioned with the promise of suburban living because of the associated social, environmental, and economic costs. Instead, the article highlights a number of solutions that have been widely discussed and tested around the nation.


This bibliography is an attempt by the authors to provide a summary of often overlooked literature to provide a more objective appraisal of the concept of urban sprawl. Entries are classified by their subject matter and discipline. Audirac and Zifou include sources that object to traditional sprawl opponents and their advocacy of compact, higher density development on a number of levels.


Barnett explores suburban development and the psychological and social disjoint between "old" (central) and "new" (edge) cities that has been the result. He places much of the onus on outmoded planning regulations and development patterns "forcefed" on citizens by developers. He strongly emphasizes the role of a site-specific transportation
system to reintegrate the two. Barnett feels new transportation investments (as well as other reintegrating measures) can be funded from the savings inherent in abandoning inefficient sprawl development and can work in combination with higher density, neo-traditional development and innovative policy approaches to recreate a sense of "community".

This is a book that discusses the issues driving superstore development (WalMart, etc.) and how it contributes to sprawl. It argues that communities have choices about economic development, and that superstores are not necessary for the financial well being of municipalities. It also is an advocacy and grassroots mobilizing guide complete with media strategy, information, case studies, and contacts.

Bier, Thomas, Future Development of Cuyahoga County and the Cleveland/Akron/ Lorain Region, Cleveland, OH.
Bier argues that Cuyahoga County must constantly add real estate value through new development in order to maintain its tax base given the depreciation of existing housing and commercial stock. Since most development occurs at the periphery of the metro area, people have moved outward to take advantage of stable municipalities located at the fringe. Much development has occurred outside the county, including 55% of new homes built, three times as many industrial firms, 68% of county homesellers move further out - increasingly to another county, 40% of homebuyers in adjacent counties came from Cuyahoga County. Now that the county has little undeveloped land, Bier asserts that the key to maintaining its fiscal capacity is the redevelopment of previously developed areas. Without the maintenance of older areas, outmigration will continue to the detriment of the county and region. Steps should be taken to promote industrial, commercial, and residential activities to remain in the county, preferably near the center. The state government could play a large role in promoting redevelopment. He cites highway improvements funds as one way to rehabilitate the core.

Bier, Thomas and Ivan Maric, Cuyahoga County Outmigration, Cleveland, OH: The Urban University Program of the Ohio General Assembly, the Ohio Board of Regents and the Cuyahoga County Planning Commission, March 1993.
This report presents information on homeowners in the county who have purchased another home in the seven-county region surrounding Cleveland. The findings are:

Homesellers move to different communities -- 25% to another county,
71% move away from the metropolitan core,
They buy more expensive homes.

Bier asserts that outmigration is the main determinant behind urban decline, and argues that a balanced pattern of movement must be promoted to stem this. Government policies are largely to blame for outmigration, and include peripheral development funding for roads, highways, sewers, water, utilities, etc. The tax code (capital gains)
also contributes to this pattern. He also notes that centrally located facilities for recreation, religion, health care, transit, etc. will suffer if outmigration continues.

Bier, Thomas, Collaborative Research Project Involving Seven Ohio Urban Universities, Suburbanization of Ohio Metropolitan Areas 1980-2000, The Urban University Program of the Ohio General Assembly and the Ohio Board of Regents, 27 June 1990. This report looks at housing development patterns in the seven major metro areas of Ohio in 1980, 1990, and 2000. (projected). The trend is movement to suburbs, and the report recommends that the state examine the ways in which it promotes outmigration -- through highways, mortgage assistance for first-time buyers and school funding, public utilities that force existing rate payers to pay more to subsidize new facilities. Central cities could assess their ability to accommodate new high-value housing over the next few decades and identify obstacles to that goal. They also need to examine and take steps on the reasons why people leave central cities or why they are prevented from moving closer. Metro areas should review housing construction projections; carefully plan transportation, sewer, water, and other infrastructure changes; examine demographic changes; and develop a preferred vision for development over the next several decades.

Bier, Thomas and The Ohio Housing Research Network, Moving Up and Out: Government Policy and the Future of Ohio’s Metropolitan Areas, Cleveland, OH: The Urban University Program of the Ohio General Assembly and the Ohio Board of Regents, 19 September 1994. This study shows that in Ohio’s major metro areas,

Most home sellers move up in price at least 50% when they buy a new home,
Most move outward,
They do so because they don’t have much choice given capital gains tax codes and the availability of more valuable housing,
The seven cities studies vary in all of these factors,
Outmigration will contribute to urban decline and suburban sprawl,
More high-priced housing at the core is necessary for the well-being of metro areas.

Bier, Thomas and The Ohio Housing Research Network, The IRS Homeseller Capital Gain Provision: Contributor to Urban Decline, Cleveland, OH: The Urban University Program of the Ohio General Assembly and the Ohio Board of Regents, 5 January 1994. This contains a review of the IRS Code (Section 1034) that allows homesellers to defer tax liability on capital gain so long as the next home purchased is at least equal in price to the one sold. This code, combined with the lack of valuable real estate in central cities, limits peoples options to move closer into the city, thus promotes outmigration. The methodology was looking at the data covering homeselling in Ohio’s seven major metro areas.

Bourne critiques an earlier APA article (Gordon, Richardson, and Juns The Commuting Paradox) which had expressed support for the decentralization of housing and businesses, asserting that this process was most economically efficient for firms and had reduced commuting times for employees. Bourne takes issue with these assertions as well as the underlying notion that the impacts that have been perceived as social costs arising from the growth of edge cities will be addressed by an unfettered market. Bourne explains much of the "efficiency of decentralization" argument away as laissez-faire optimism and focus on the wrong evaluative variables.


Breckenfield describes the new phenomenon of the super shopping mall. Largely a by-product of decentralization and federal highway projects, these malls are touted as both a new urban form and the piazza of America by developers, at least for suburbanites no longer near or inclined to visit open public space. Breckenfield's characterization of the malls comforts and its sea of free parking support his assertion that, unlike traditional core business districts, suburban malls are directly attuned to the age of the private auto. The author marvels over the size and scope of many developments and concludes these centers may be the cornerstone of the new American community.


Ewing proposes a definition of sprawl by critiquing archetypes, and noting that sprawl is both a matter of degree and multidimensional. He further notes that sprawl patterns themselves are not the problem -- rather, it is the impacts that they engender. Ewing then defines sprawl as characterized by poor accessibility between land uses, and proposes that the measure of accessibility be the yardstick for determining sprawl. Also, he notes that this approach can be easily operationalized to fit into existing analytical frameworks (e.g. the four-step model, Florida Standard Urban Trans. Model Structure, etc.). Sprawl is also characterized by the lack of usable public open space. Ewing then discusses the causes of sprawl as a natural outgrowth of prosperity, technology, low transportation costs, and high travel speeds. He also notes that market forces drive sprawl through land speculation, the availability of low-cost land, and policies that favor driving. He notes, In effect, market imperfections define sprawl and provide the justification for public intervention to discourage sprawl. In reviewing the costs of sprawl literature, Ewing discusses psychic costs, excess travel and congestion, energy inefficiency and air pollution, higher infrastructure and public service costs, and land loss. His conclusion: the Florida Department of Consumer Affairs has developed a promising list of sprawl indicators that will help planners attack the characteristics, effects, and causes of sprawl.

Fernandez, Roberto Spatial Mismatch: Housing, Transportation, and Employment in Regional Perspective, prepared for Metropolitan Assembly on Urban Problems: Linking
This paper summarizes the research performed on spatial mismatch. This hypothesis argues that the limited housing choices of low-income people and people of color compromises their ability to secure employment because increasingly, job creation is concentrated outside their communities, mostly to suburbs. He discusses the extent to which the theory can be supported with empirical evidence. Recent literature reviews generally support the affirmative -- and that recent evidence is stronger than older ones. He also reviews policies that seek to ameliorate the effects of spatial mismatch and identifies three strategies for doing this:

- Creating incentives so that employers locate near low-income communities,
- Leveraging the housing market so that more low-income people can move to the suburbs, and
- Improve access and mobility to jobs (reverse commute, etc.). Fernandez recommends the pursuit of a combinatoin of all three.

This useful review of the costs of sprawl summarizes and analyzes a number of studies relating to the costs of sprawl, and concludes that nearly all are supportive of the notion that sprawl costs are greater than those of other (typically denser) developments. He also notes the mechanisms through which the costs of sprawl are masked.

The authors compare data from the American Housing Survey with 1980 census data to determine that commuting times fell during that period in the twenty larges US cities. They call the popular contention that congestion is increasing a myth or paradox.

Jackson describes what he feels to be suburbanizations most negative consequence--the decline of the sense of community. Jackson explains that suburbanites have disconnected themselves from urban cores, foregoing their renewal and the amenities they have to offer, and turned away from cooperation and coordination with the cities from which they exact their wealth. He offers four reasons for this: residential polarization of urban areas by race and income; the decline of municipal annexation; the dominance of the automobile; and home-centered entertainment and the lack of communal interaction. Jackson states that suburban today implies a distinction from rather than affiliation with the urban, and recommends not only an economic investment in the cities but an intellectual and moral one as well.

Janelle, Donald G. *Metropolitan Expansion and the Communications....* Janelle advances the notion of telecommunication technology in the post-industrial society and the potential functional and spatial implications for metropolitan regions and productive life. Janelle acknowledges this technology may support existing exurban dispersal but argues behavioral constraints will "set outer limits to physical separation from metropolitan life". In this event, Janelle views transportation technologies as more fundamental to urban form than communication technologies, and he contends transportation planning must accommodate the continued decentralization likely to occur due to these improvements in mobility and communication.

Jaquay, Robert. *Urban Sprawl: What's Happening to the Core of Cleveland? Affinity, A Collaboration of People with Environmental Concerns, Cleveland, OH, Summer 1994.* This article describes how particular post-World War II federal investments have opened up vast tracts of land on the fringes of Cleveland to development and injured the central core of the city. Jaquay explains how interstate highway development in the region led to the development of edge cities as sources of manufacturing, employment and commerce over ten counties in northern Ohio. Because population in the region is not expected to change in the near future, Jaquay characterizes the future of Cleveland as a rearranging of activity and wealth to the city's detriment.

Kasowski, Kevin. *The Costs of Sprawl, Revisited*, Developments, Vol. 3, No. 2, The National Growth Management Leadership Project, September 1992. Kasowski begins this article by detailing the additional costs sprawling development adds to state budgets as well as to housing prices. Because many of these costs arise from "off-site" (i.e. service provision), they are external and borne by society. Effectively, Kasowski argues, sprawl is subsidized by policies such as average cost pricing, which ignores the higher marginal costs of service provision in far-flung areas. Kasowski concludes that this de-facto subsidization of sprawl could be replaced by the use of impact fees (which in current practice are also assessed on an average cost basis) or least-cost development, which would transfer the savings from higher density, transit oriented patterns to the rate bases of public service providers.

Kinsley Michael J. and L. Hunter Lovins. *Paying for Growth, Prospering from Development*, Snowmass, CO: Rocky Mountain Institute, 1995. The authors argue that sprawl isn't the only solution to economic growth for communities -- that they need not grow geographically to have a robust, sustainable economy. Currently, many communities across the country don't realize that growth must come with sprawl, and therefore allow superstores, edge development and other things to occur. They note that communities often are willing to subsidize sprawl in anticipation that in the long term the economy will be buoyed by development. Ways to remedy this are available, but haven't been exercised on a large scale. Impact and user fees is one
way to do this, but only captures some of the social costs of sprawl. They then introduce the Institute's vision of sustainable community development, which emphasizes the role of natural resources, compatible business opportunities, equity, economic and resource efficiency, and other measures.


Moe, Richard Growing Wiser: Finding Alternatives to Sprawl, prepared for the Alternatives to Sprawl Conference, Washington, DC: The Brookings Institution, National Trust for Historic Preservation, Lincoln Land Institute, 22 March 1995. This speech discusses sprawl in the context of historic preservation. Moe touches upon federal and state subsidies of sprawl, its social costs, the types of spaces created in sprawl, and the fact that communities have choices when it comes to development. He discusses instruments to fight sprawl, including tax policy, urban growth boundaries, smart growth, and zoning.

O'Connor, Kevin and Dr. Edward J. Blakeley, Suburbia Makes the Central City: A New Interpretation of the City-Suburb Relationships, Berkeley, CA: Institute of Urban and Regional Development, University of California, 1988. The authors take an optimistic view of metropolitan spatial relations, arguing that urban cores can recapture their vitality as coordinators of regional economic activity. The position of suburbs as powerful socio-economic systems apart from cores, underscores their permanence to O'Connor and Blakeley, as well as the futility of policies designed solely to limit suburban growth. They assert that suburban growth is no longer driven by population decentralization but rather economic expansion, and that this expansion creates increased demand for other services specific to the urban core.

Pilla, Bishop Anthony M., The Church in the City, Cleveland, OH: Diocese of Cleveland, 19 November 1993. This document is an unprecedented statement against the costs of sprawl, made by Archbishop Anthony Pilla (based in Cleveland, OH). The rationale for this statement is multi-dimensional. First, many Catholic churches are losing followers in urban areas. Second, the urban areas that do remain have faced dramatic decline in certain cities, especially Cleveland. Third, the Bishop is convinced that outmigration and sprawl development plays a strong role in luring people out of the central city. Cleveland activist Len Calebrese helped develop this position.
Popenoe argues that the social costs of life in the suburbs include racial and economic segregation, inequitable distribution of social services, the regressive subsidization of sprawl, outmigration, tax base erosion in the central city, and cumbersome administrative structures. Hardest hit are teenagers, women, and the poor, aging, and disabled. Lack of access to nature is also cited as a cost of sprawl, and transportation, access and mobility are also discussed as being suboptimal.

In this speech, Richmond discusses four issues: trends that drive sprawl, who is affected by sprawl, how reforms will ripple throughout society, and how coalition building is important to combat sprawl. Trends are outmigration, expansion of metro areas, consequent loss of farmland, etc. Autodependency is discussed as a transit-precluding development form. Sprawls social costs are also covered (air, congestion, energy, water). Richmond notes we must start dealing with land use as the source of the problem rather than the symptoms. Disinvestment in urban areas is also cited as problem, and Richmond describes the dilemma that many developers face when deciding where to build projects.

This groundbreaking report tackled the difficult question of where and how growth in Florida should take place. It begins by acknowledging the financial, social, and environmental burdens that traditional development patterns have placed on the state, as well as the need to replace these with more efficient, compact, and planned models. The report examined eight study areas in the state, assessing capital and operating costs of service provision, environmental costs, revenues attributable to development, and demographic trends. The bulk of the report focuses on forty policy and planning recommendations for growth management in Florida. These fall under six major target goals for the state: combating urban sprawl, creating a state urban policy, enhancing the urban environment, land acquisition of sensitive and open space, improved intergovernmental coordination, and enhancing transportation systems and urban mobility.

Tucker reinforces the conventional wisdom about increasing decentralization and sprawl with an evaluation of demographic data from the 1960s and 70s. He acknowledges and deflates the notion that in the early 1980s young suburbanites began returning to central urban areas. Tucker discovered that in the aggregate, census data examined shows that older industrial Northern cities will continue to lose population to the suburbs, and that for the entire country, cities and suburbs will lose residents to non-metro areas.
Tucker concludes by issuing a warning for the impending decline of older suburbs to the economic and demographic character of the cores they surround.

This report of an Urban Institute study of the late 1970s purports to answer questions about the costs of sprawl and if changes in development patterns would have a significant effect on the nations economic, energy, and environmental goals. The paper contains a number of arguments (cheaper and more energy-efficient houses on the fringe, shorter work trips to new suburban job locales, better air quality away from industrial facilities, increasingly efficient cars) indicating sprawl may not be as detrimental as many assert. The general finding of the report, after examination of the effects of higher density development on travel behavior, air and water quality, energy use, and economic costs, is that the costs of structuring land use to locate housing and productive activity primarily in urban cores would be prohibitive. The authors also assert the superiority of regulatory and pricing policies over land use controls in obtaining energy conservation and environmental quality.

Spatial Mismatch

Alt attempts to find a middle-ground in the controversy over the effect spatial mismatch has on unemployment and poverty. She argues for separating out variables such as education, job training, and racial discrimination (after evaluating them) as well as for the inclusion of research on all transit modes to correctly isolate on worker mobility. She then discusses the type and length of commutes and the shortcomings of mass transit in relation to the location of employment opportunities. She also mentions the theory of a mutual causality between employment and educative characteristics and proximity to job opportunities.

This paper begins by explaining spatial mismatch theory and its economic and social impacts--namely that job growth is occurring in areas lacking in affordable housing. Gallardo posits that this "third wave" of suburbanization has created social costs ("costs of sprawl") that are generally unsustainable. She offers a possible remedy through the utilization of location efficiency measures in planning community expansion. Two techniques discussed are: "Transit Oriented Design "(TOD), which clusters mixed-use communities around mass transit stations; and Location Efficient Mortgages (LEM), which are designed to both capture the value of living in higher-density, transit focused areas and encourage settlement there. Gallardo concludes by calling for further
research in the Los Angeles region to determine optimal uses of location efficiency strategies.

Kain, the creator of the spatial mismatch hypothesis, looks back at three decades of debate over his original ideas. He painstakingly analyzes nearly every significant study on spatial mismatch and makes a strong case for supporting his theory. He contends that whereas many critics had strong arguments in the early decades of the theory, new data are demonstrating that the theory is valid.

The Impacts of Transportation Investment on Equity and Land Use

Transportation and Equity

This article from NGMLP contends that areas that are well integrated to include high-priced and moderately-priced housing, as well as other factors, are more likely to remain competitive and robust than other areas. They cite the great household revolution, which represents the changing demographics of suburbia, as a determinative factor. The revolution consists of increasing households, typically single parent, and more empty nesters. They recommend progressive housing policies and other programs to improve the economic health of communities.

Cameron, Michael W. Efficiency and Fairness on the Road, Oakland, CA: Environmental Defense Fund, 1994.
Cameron analyzes transportation modeling and fiscal impact data to determine the level of transportation cost and benefit distribution different parts of the population experience (by income quintile). He uses a spreadsheet model to determine the progressive impact of a 5-cent per mile roadway user fee, which would then be redistributed to service other transportation alternatives. He also calculates estimated environmental benefits.

The author details the lack of affordable housing available to those working in the suburban office park and how this has contributed to longer commutes, growing congestion, and increased air pollution. Beyond quality of life factors, Cook explains how the biggest challenge posed by spatial mismatch may be economic: post-industrial America has been developed on the metropolitan fringe, away from reasonably priced labor. Without nearby affordable housing for the changing face of Americas labor force, the inputs necessary to make these enterprises viable may be unaccessable.

Coulton, Claudia, Julian Chow, Edward Wang, and Marilyn Su, Geographic Concentration of Affluence and Poverty in 100 Metropolitan Areas, 1990, DRAFT,
The paper begins with a short analysis of spatial concentration of both the poor and affluent, examining the factors that have contributed to the segregation of the two and differences according to ethnicity or place-specific factors such as age of city and rate of out-migration. The authors identify the three major factors affecting both the concentration of poverty and affluence -- residential segregation of minorities, regional economic conditions, and the equality of opportunity between a city and its suburbs -- and explain how the three work in combination to exacerbate economic segregation. The paper then uses census data for 100 MSAs, characterizing them by affluence/poverty using a number of descriptive indices.

Article describes conflicting agendas of environmentalists and social justice advocates in transportation field. Fox argues that big public motor vehicle investments are bad for both and public transit investment benefits both. He also discusses instances in which environmental activists teamed up with poverty activists to oppose automobile-related building projects. Other topics include full cost accounting in transportation, pricing, parking, and mass transit. He concludes that through ISTEA, there can be improved communication between environmental and social justice groups. Tensions still exist, however. The National Urban League's 1991 "Marshall Plan for America" stressed need for "good highways mean good business and a strong economy" and attributes poor access to suburb jobs to unavailability of automobile. Lists leads for research material (TRB, Dept Energy's Minority Impact Program), as well as organizational contacts.

Geisler notes that in this century, the linkage between poverty and land ownership has been lost in the poverty literature. He makes a case for including land in the poverty/wealth equation again, and proposes ways to do this. Income-based measures of poverty fall far short of getting at the plight of a household -- assets must also be considered. He also argues that more research should be done to strengthen this connection.


This case study of the New York metropolitan region analyzes the feasibility of a regional transportation financing fund and alternative funding sources to address the
region's deteriorating transportation infrastructure. Hirschman examines the present distribution of costs and benefits in the region and finds financial burdens are disproportionately borne by the city, with benefits exceeding tax contributions in suburbs. The dissertation details the extent of revenue needed in an alternative funding source and assesses the viability of using a motor vehicle fuel tax, retail sales taxes, a payroll tax, business taxes, or highway user fees to meet said need. Hirschman concludes that any of the options would reduce spatial inequality more closely adhere to the benefit principle of taxation, but offers a mixed-tax package as a solution. This would provide a balanced revenue source by avoiding market distortions caused by major hikes in any one tax, while including the behavior discouraging character of fuel taxes and user fees and the equitable distribution of the sales, payroll, and business taxes.


Hodge explores the various social equity questions associated with urban transportation. He characterizes the issues as basically of two types: the costs of (or exclusion from the benefits of) auto ownership, and the costs and obstacles posed by design and operation of mass transit systems. Hodge portrays transit as the more favorable of the two options, but then explores the potential for discrimination and inequity in making decisions about where and how mass transit will operate. Race, class, and spatial dispersions are also discussed in relation to the distribution of expenditures as well as access and mobility. Hodge turns to a case study of the Seattle METRO to further explore equity questions.


Discusses mismatch between urban employment needs and suburban jobs. Argues that transportation (mobility) is the link, the win-win solution. Discusses reverse commute and other programs that have been successful:

- ACCEL Transportation of Le Clair Court RMC (Chicago),
- Wisconsin Job-Ride Program (Milwaukee),
- Suburban JobLink Inc. (Chicago),
- SEPTA's Route 200 Series (Philadelphia), & others.

Makes tentative conclusions of elements of successful programs -- that transportation projects need to focus on riders and outcomes not ridership. Tailoring connections to specific needs proves most successful. Hughes recommends demonstration projects.

Examines travel patterns of public assistance recipients. Authors had difficulty getting data from public assistance agencies, so had to rely on interviews with people at shelters, homeless, those who were receiving general relief (GR) and other very poor people. Focused on General Relief, a form of public assistance that is considered the last resort in Calif -- admin by state but funded by counties -- minimum assistance. Section 17001 of Calif Welfare and Institutions Code says that "minimum assistance" includes allocations for food, housing, utilities, medical care, and transportation. Counties determine amount of payment. In LA, trans is deemed a "special need" and is not automatically included in benefits, but given at discretion of case workers. Provides demographics of homeless in LA and profile of survey population. Had respondents fill out trip diaries. Modal and destination information collected. Found that 67% of respondents said there were places they wanted to go but couldn't get to. Walking primary mode -- 60% of daily trips made by foot -- avg was four trips per day. Next was transit -- avg monthly transit expend was $35 (nearly 10% of monthly income). Policy recommendations are travel allowance strategies, implementation of the current DPSS travel allowance system, cash subsidies, bus passes, punch cards, smart cards.

National Commission on Urban Problems, Building the American City, New York: Praeger, 1969. This report documents the social costs of highway construction -- notably, the displacement of households and businesses during the bulk of the highway construction period of the 1950s and 1960s. The authors note that compensation typically fell short of the costs of relocation, and that the vast majority of people impacted were poor, minority, and politically disenfranchised.

Santini, Danilo J. and Anant D. Vyas, A Model to Assess the Relative Impact of Policy in Transportation Energy Expenditures, Argonne, Illinois Argonne National Laboratory, Energy and Environmental Systems Division, Center for Transportation Research. Study tries to see if assumption that white and minority populations are similarly affected by oil price increases are true. Examine income effects (1977-1983), substitution effects, household characteristics, sample characteristics, transportation adaptation (1977-1983), preliminary transportation demand submodels, vehicle holdings results, and vehicle-miles of travel per vehicle. No useful conclusions.

Sanyika, Mtangulizi K. and James W. Head, Communities at Risk: Regional Transportation Issues in the Bay Area: The Concerns of Communities of Color and Low-Income Neighborhoods, San Francisco National Economic Development and Law Center Issue Brief #6, August 1990. Study focuses on transportation in low-income communities. Two deficiencies -- few efforts to document state of transportation services in communities and lack of community-based organizations that focus on transportation in such areas. As a result, public policy debate and benefits delivery don't address transportation concerns. The study also discusses the transportation characteristics of the poor and minorities. Transportation and employment is also covered, especially in the context of the Bay area evolution towards high-tech and business service economy.
Regarding transportation and community economic development, the Cypress Freeway in Oakland physically splits the community into east and west -- urban ghettos. The report also discusses child care and the environment. Recommendations include improving transit, lower fares, better coordination of schedules, better language service, reverse commute, need for regional trans coordination, economic development, environment and social impacts in poor communities need to be better understood, support pricing only if they are combined with benefits to poor communities, like better transit. Poor communities need to do own audit to reduce gridlock, improve child care, etc.

The Surface Transportation Policy Project is a nationwide network of more than 800 organizations, including planners, community development organizations, and advocacy groups, devoted to improving the nations transportation system.