

B8595
2.I.53-8
Copy 1

SOUTH CAROLINA INFRASTRUCTURE STUDY

— REPORT 5 (REVISED) —

RECOMMENDATIONS OF THE
LEGISLATIVE INFRASTRUCTURE COMMITTEE

STATE OF SOUTH CAROLINA
STATE BUDGET AND CONTROL BOARD
ADVISORY COMMISSION ON INTERGOVERNMENTAL RELATIONS

CENTER FOR URBAN POLICY RESEARCH (CUPR)
RUTGERS, THE STATE UNIVERSITY OF NEW JERSEY
CIVIC SQUARE • 33 LIVINGSTON AVENUE • SUITE 400
NEW BRUNSWICK, NEW JERSEY 08901-1982
(908) 932-3133, EXT. 542

Robert W. Burchell
Alex Zakrewsky

WILBUR SMITH ASSOCIATES
1301 GERVAIS STREET, SUITE 1300
COLUMBIA, SOUTH CAROLINA 29201
(803) 758-4500

Robert J. Zuelsdorf
Arno Hart

SIEMON, LARSEN & MARSH
433 PLAZA REAL, SUITE 339
BOCA RATON, FLORIDA 33432
(407) 368-3808

Charles L. Siemon
Wendy U. Larsen

SANDSTONE ENVIRONMENTAL ASSOCIATES, INC.
15 CLYDE ROAD, SUITE 202
SOMERSET, NEW JERSEY 08873
(908) 873-3732

Nancy C. Neuman

S. C. STATE LIBRARY

28 FEBRUARY 1997

SEP 10 2009

STATE DOCUMENTS

DRAFT: NOT FOR QUOTATION OR ATTRIBUTION

SOUTH CAROLINA INFRASTRUCTURE STUDY

— REPORT 5 (REVISED) —

**RECOMMENDATIONS OF THE
LEGISLATIVE INFRASTRUCTURE COMMITTEE**

**STATE OF SOUTH CAROLINA
STATE BUDGET AND CONTROL BOARD
ADVISORY COMMISSION ON INTERGOVERNMENTAL RELATIONS**

CENTER FOR URBAN POLICY RESEARCH (CUPR)
RUTGERS, THE STATE UNIVERSITY OF NEW JERSEY
CIVIC SQUARE • 33 LIVINGSTON AVENUE • SUITE 400
NEW BRUNSWICK, NEW JERSEY 08901-1982
(908) 932-3133, EXT. 542

**Robert W. Burchell
Alex Zakrewsky**

WILBUR SMITH ASSOCIATES
1301 GERVAIS STREET, SUITE 1300
COLUMBIA, SOUTH CAROLINA 29201
(803) 758-4500

**Robert J. Zuelsdorf
Arno Hart**

SIEMON, LARSEN & MARSH
433 PLAZA REAL, SUITE 339
BOCA RATON, FLORIDA 33432
(407) 368-3808

**Charles L. Siemon
Wendy U. Larsen**

SANDSTONE ENVIRONMENTAL ASSOCIATES, INC.
15 CLYDE ROAD, SUITE 202
SOMERSET, NEW JERSEY 08873
(908) 873-3732

Nancy C. Neuman

28 FEBRUARY 1997

DRAFT: NOT FOR QUOTATION OR ATTRIBUTION

CONTENTS

INTRODUCTION.....2

GROWTH IN SOUTH CAROLINA.....3

INFRASTRUCTURE NEED4

**SAVING INFRASTRUCTURE COSTS:
TECHNOLOGY RELATED.....4**

**SAVING INFRASTRUCTURE COSTS:
COSTS OF SPRAWL SAVINGS.....5**

**REVENUES TO SERVE INFRASTRUCTURE NEEDS:
WHAT IS THERE? WHAT MUST BE RAISED?5**

**AN INFRASTRUCTURE BUSINESS PLAN FOR THE
STATE OF SOUTH CAROLINA6**

**EDUCATING THE PUBLIC ON
INFRASTRUCTURE NEEDS8**

CONCLUSIONS—FUTURE ACTIVITIES9

INTRODUCTION

The Legislative Infrastructure Committee oversaw and provided comments on the work of the Infrastructure Study Research Team from July 1996 to March 1997. Over this period of time the Research Team provided the Infrastructure Committee with multiple drafts of five reports. These reports were:

- (1) *Gross Infrastructure Needs and Costs—1995-2015*
- (2A) *Reducing Infrastructure Costs through Alternative Means of Provision, Technology Improvements, and Regionalization.*
- (2B) *Reducing Infrastructure Costs through Costs of Sprawl Reductions.*
- (3) *Revenue and Finance Alternatives and Projections.*
- (4) *Summary of Findings and Activities of Other States: An Infrastructure Business Plan*

The report that follows summarizes the findings and recommendations of the

Infrastructure Committee. The aforementioned reports are available as appendices to this report. The report of the Infrastructure Committee contains this committee's recommendations. Although the report is structured along similar lines as the Infrastructure Study Research Team's *Report #4—Summary of Findings and Activities of Other States*, this is the report that contains the Committee's recommended actions to the Governor and State Legislature.

The South Carolina Infrastructure Study reflects the in-depth study of four major research organizations over a nearly one-year period. The resulting product is a comprehensive look into the infrastructure needs of the State of South Carolina for the next twenty years. These needs are significant, and never has it been more important or timely to come to grips with them. Infrastructure need exists in South Carolina; it must be addressed if the state's quality of life is to be preserved.

LEGISLATIVE INFRASTRUCTURE STUDY COMMITTEE

Rep. William D. Boan, Chairman
 District #44

Luther F. Carter, Executive Director
 State Budget & Control Board

Robert V. Royall, Jr., Secretary
 Department of Commerce

Grace G. Young, Executive Director
 Parks, Recreation & Tourism

B.K. Jones, Executive Director
 SC Department of Transportation

Senator J. Yancey McGill
 District #32

Kit Smith
 Richland County Council

Dan Mackey, Executive Director, ACIR

Peter H. Arnoti, Manager
 Office of Economic Development

Chris Bickley, Executive Director
 Lowcountry Council of Governments

Patricia Edmonds, Executive Director
 Upper Savannah Council of Governments

Bob Strother, Executive Director
 Appalachian Council of Governments

Rep. Henry E. Brown, Jr.
 District #99

Rep. Thomas G. Keegan
 District #106

S. Hunter Howard, Jr., President & CEO
 State Chamber of Commerce

GROWTH IN SOUTH CAROLINA

FINDINGS OF THE
INFRASTRUCTURE STUDY

South Carolina is one of the fastest-growing states in the United States. The state's 1995 population of 3.7 million and job base of 1.6 million has increased by one-third and one-half, respectively, since 1970. In the next twenty years these numbers will increase by another 23 and 30 percent. By the year 2015, the state will have a population of over 4.5 million and a job base of 2.1 million. South Carolina is the tenth fastest-growing state in the nation and the fifth fastest-growing state in the South. This indicates that the state is rapidly developing and, as well, that significant competition for growth exists within the region. Three-quarters of the growth will take place in the state's established regions. The Appalachian Region will be the growth leader, at double the growth of the next fastest-growing region (Midlands), followed by the Berkeley-Charleston-Dorchester, Waccamaw, and Catawba Regions. At about two-thirds the level of growth of the latter regions are the Lower Savannah and Low-country Regions. Trailing at one-third of these levels are Santee Lynches, Upper Savannah, and Pee Dee Regions.

South Carolina attracted \$5.4 billion in nonresidential development investments in 1995, exceeding the previous yearly record by 45 percent. The jobs emerging from this growth paid an average wage of \$28,500—\$6,000 higher than the state average and \$2,000 higher than the national average.

Premier international companies such as BMW, Hoffman-LaRoche, Amoco Chemical, Nucor, Michelin, and Fuji now call South Carolina home. With a strong

and stable business climate, the state has become competitive as a center for regional and corporate headquarters. This is evidenced in Greenville-Spartanburg, Columbia, and Charleston. Tourism, too, is a pillar of the state's economy. Myrtle Beach, Charleston and Hilton Head are internationally recognized tourist destinations.

As of February 1997, South Carolina has more than 1,000 prime industrial sites ready to be developed and 250 spec-built buildings ready to be occupied. Counties in the state will issue 15,000 new residential building permits this year.

This development can draw on 16,000 megawatts of state electricity, 33 billion gallons of waterflow per day, and 160,000 miles of fiber optics. Eighty percent of the United States's population and retail sales are within 1,000 miles of Columbia, South Carolina.

RECOMMENDATIONS OF LEGISLATIVE
INFRASTRUCTURE COMMITTEE

- Continue to support growth and its outcomes in the State of South Carolina.
- Attempt to channel growth equitably and fairly.
- Adopt a guiding concept of "Strategic Economic Development" within the state that allows development to flourish while not causing either regional dysfunction (too much growth) or diminishment (too little growth).
- Direct growth to emphasize both areas where it is already taking place and other rural centers where it needs to take place.

INFRASTRUCTURE NEED

FINDINGS OF THE INFRASTRUCTURE STUDY

Infrastructure need in the state of South Carolina will be close to \$57 billion for the period 1998 to 2015. About 58 percent (\$33 billion) of this need is related to new growth, 25 percent (\$14 billion) to ongoing rehabilitation (repair of existing and added infrastructure) and 17 percent (\$10 billion) to backlog (various projects that should be completed).

This \$57 billion of need for a twenty-year period encompasses twenty-eight categories of infrastructure that range from roads to libraries. These are grouped into seven larger categories which comprise the following percentages of need:

Transportation	(51%)	\$28.8 billion
Commerce	(7%)	\$3.9 billion
Public Safety, Administration/Welfare	(5%)	\$2.6 billion
Education	(18%)	\$10.2 billion
Health	(14%)	\$7.8 billion
Recreation and Culture	(2%)	\$1.5 billion
Environment	(3%)	\$1.9 billion

Given the above, it is clear that half of all infrastructure need is in transportation, one-third is in education and health, and one-sixth is in the sum of the remaining categories of: commerce, public safety/ administration/welfare, environment, and recreation/culture.

RECOMMENDATIONS OF LEGISLATIVE INFRASTRUCTURE COMMITTEE

- The magnitude of infrastructure need must be recognized, planned for, and communicated.
- The relative components of need must be comprehended to prioritize and direct resources.
- It must be understood that *rehabilitation* of infrastructure cannot always be deferred or thought of as second in priority.

SAVING INFRASTRUCTURE COSTS: TECHNOLOGY RELATED

FINDINGS OF THE INFRASTRUCTURE STUDY

Infrastructure costs can be reduced by providing infrastructure in alternative ways, improving technology, and sharing infrastructure.

- \$1.2 billion can be saved through the use of new composite materials.
- \$1.3 billion can be saved by modularization and standardization of the construction process.
- \$2.9 billion can be saved using "best practices" and Design-Build-Operate-Maintain ("DBOM") in new construction and management efforts.
- \$1.3 billion can be saved through increased computerization and improved telecommunications.
- \$1.3 billion can be saved by streamlining state and local capital design requirements (agency standards and local zoning ordinances).

- \$2.3 billion can be saved by creating public-private partnerships to plan and develop infrastructure.

**SAVING INFRASTRUCTURE COSTS:
COSTS OF SPRAWL SAVINGS**

**FINDINGS OF THE
INFRASTRUCTURE STUDY**

Infrastructure costs can also be saved by channeling growth closer to where growth has already taken place or to rural centers where new growth can be more efficiently serviced. Growth management enables all projected growth to take place but in a way that conserves resources because lands are not skipped over and infrastructure underutilized.

Savings of \$2.7 billion can be realized by developing near existing neighborhoods for traditional suburban development and in predesignated peripheral centers for rural development.

**RECOMMENDATIONS OF LEGISLATIVE
INFRASTRUCTURE COMMITTEE**

- Have a designated agency^{*} review, analyze, and if appropriate, recommend for adoption by state and local government agencies, items from the technology infrastructure savings lists.
- Have a designated agency review, analyze, and if appropriate, recommend for adoption by state and local government agencies, items from the costs of sprawl growth management techniques list.

**REVENUES TO SERVE
INFRASTRUCTURE NEEDS:
WHAT IS THERE?
WHAT MUST BE RAISED?**

**FINDINGS OF THE
INFRASTRUCTURE STUDY**

About one-half of future infrastructure needs of \$2.0 billion per year for 20 years (after savings) can be met from current sources of state and local revenues from existing and new residents.

Another one-half of the revenues must be raised from other sources, or a substantial portion of infrastructure will be delayed or not done.

A list of potential sources of revenue and projected revenue (assuming some of the sources are employed) has been included in the Infrastructure Study.

**RECOMMENDATIONS OF LEGISLATIVE
INFRASTRUCTURE COMMITTEE**

- Have a designated agency review the revenue findings of the Infrastructure Study and recommend a course of action to either reduce infrastructure need or narrow the revenue gap.
- The current underfunded, fragmented, and duplicative way of funding state and local capital facilities must be replaced.

^{*} This agency is designated in a later section.

AN INFRASTRUCTURE
BUSINESS PLAN
FOR THE
STATE OF SOUTH CAROLINA

FINDINGS OF THE
INFRASTRUCTURE STUDY

Infrastructure and economic development must take place within a framework. Almost all private businesses, even the smallest, have a business plan for the future. This plan lays out how much they will grow and what they need for growth. On the other hand, few local governments in a state—or even the state as a whole—have a “business plan” for their future. Most local governments that engage in capital planning do so without regard for regional growth issues and are primarily concerned with development taking place strictly within their boundaries. Without judicious planning, local governments live from day to day and must respond to crises rather than avoiding them. Without infrastructure planning, there are no mechanisms to ensure that scarce resources are being used in the best possible way. Developing local, regional, and statewide infrastructure plans is the cornerstone for the state’s policy for future growth.

A business infrastructure plan involves the identification of needed improvements along with short- and long-term plans for financing these improvements. Ideally, infrastructure planning results in a business plan that provides a framework for decision making. Such a plan would address the spectrum of land use issues including how and where growth will occur and who will pay for the

infrastructure necessary to serve new development. The plan must carefully balance the needs of new development against the needs of existing development.

A business infrastructure plan creates a more predictable environment for public and private investment and avoids unrealistic expectations about the timing of development and future levels of service on existing and new capital facilities.

A business infrastructure plan further ensures discipline in public-sector expenditure decisions. Scarce future resources must be allocated among competing interests. A business plan provides an overall roadmap for future development decisions so that all involved can simultaneously understand where future development will take place and how public capital facilities will be programmed to service this development.

No business plan can be implemented nor meaningful priorities established without a designated administrative body to make decisions that will benefit all. A Division of Regional Development within the State Budget and Control Board could serve as a central authority and coordinating body responsible for establishing an infrastructure prioritizing process.

The Division of Regional Development would act in an advisory role to assist local and regional planning agencies. It would comprise several current subsidiary agencies with an executive director approved by the executive director of the State Budget and Control Board.

RECOMMENDATIONS OF LEGISLATIVE
INFRASTRUCTURE COMMITTEE

State Government

- Empower and fund procedures that are results-oriented and deal specifically with the issues of growth, economic development, and infrastructure need.
- Create a Division of Regional Development to be subsumed under the South Carolina Budget and Control Board. Authorize the Budget and Control Board executive director to recommend both a professional staff and an advisory board.
- The mission of the Division of Regional Development will include infrastructure planning, capital budgeting, and technical assistance to COGs to encourage strategic land use policy. The Division of Regional Development must contain a high level of technical expertise for technical assistance consisting of GIS, modeling, and trend analyses.
- The Division of Regional Development will be overseen by an Advisory Committee with statutory powers to develop, advise, and monitor the process.
- The state, through the Division of Regional Development, will develop standards for uniform and consistent data collection.
- The State, through the Division of Regional Development, must acknowledge and recognize local capital plans and their priorities.
- The State, through the Division of Regional Development, must establish incentives to ensure local

"buy-in" but must not undermine the authority of county, regional, or other state agencies. State funding incentives will be used to encourage common standards and procedures.

- The State, through the Division of Regional Development, must be willing to spend time and money educating local governments and the public as to why such an infrastructure development process is necessary.
- The state will co-locate regional infrastructure planning representatives at Council of Governments offices to help ensure coordination and education.

Regional Governments

- Councils of Governments (COGs) must be central to the development of regional infrastructure plans. Regional plans will define state and local road infrastructure responsibility. For instance, there must be a clear distinction between state and local roads.
- COGs must have the ability to coordinate and to resolve disputes among local jurisdictions.
- COGs must receive some financial support from the state to undertake these additional activities.
- COGs must work under clear standards of established performance. These will be developed by the Division of Regional Development for state, regional, and local governments.
- COGs will have direct communications with state agencies that direct and control various pieces of

infrastructure development. These agencies will coordinate their capital development efforts with the overall business plan of the Division of Regional Development.

- COGs must solicit key elected officials and business leaders of the region for board representation to ensure the success and implementation of their plans.
- Recommendations of the Division of Regional Development, in addition to reflecting bottom-up consensus, must be flexible enough to accommodate unusual or innovative circumstances.
- An individual region may be involved in capital facilities beyond its bounds. For instance, a region may sell water beyond its boundaries or even statewide.

Local Governments

- Local infrastructure business plans must involve both the public and private sectors and not just govern purely public activities.
- Municipalities and counties must jointly develop a county-wide business infrastructure plan.
- All local business infrastructure plans must be developed with minimum criteria; they must contain the same basic components. Local interests may be added as necessary, and all plans must allow for considerable flexibility.
- A method of arbitration must be developed to resolve disputes and eliminate potential duplication.

- All local plans must use similar criteria for setting infrastructure priorities.
- Local governments must accept their responsibilities for infrastructure planning.
- Multiple local-jurisdictional packaging of infrastructure will receive funding priorities.
- Water system permits will be subject to renewal review every five years.

EDUCATING THE PUBLIC ON INFRASTRUCTURE NEEDS

FINDINGS OF THE INFRASTRUCTURE STUDY

At the heart of the challenge of infrastructure finance is a lack of general understanding regarding the relationship between the presence of infrastructure and the level of a community's quality of life, and practically no understanding of the costs of infrastructure and the sources of revenue upon which infrastructure depends. The public view is that infrastructure "is there and lasts forever." Further, "infrastructure is expensive to fund; avoid it so that taxes don't go up." Obviously, a key element of a successful infrastructure program is educating the public (including elected and appointed officials) about the nature of infrastructure and the costs/benefits of maintaining and improving it.

Unfortunately, infrastructure is not an exciting subject to the average citizen. Roads, water and sewer, courts, public buildings, solid waste, and beach erosion projects do not rivet voter attention. Further, the idea that someone must pay for any of these activities is one that is likely to be avoided.

It is the responsibility of the Division of Regional Development to initiate an educational program. The Division of Regional Development must understand who the audience is, what the needs are, and how best to communicate the need message to the identified audience.

RECOMMENDATIONS OF THE LEGISLATIVE INFRASTRUCTURE COMMITTEE

- Give to the Division of Regional Development the task of infrastructure information dissemination.
- Require that the Division of Regional Development set up a speakers bureau, business leaders program symposia, and other mechanisms as per recommendations of the Infrastructure Study to get the message out to the general public.
- The education process must be ongoing. Newly elected or appointed officials must be scheduled for regular infrastructure briefings.
- The public, through this process, must be assured that the process is equitable, honest, and addresses priorities efficiently and effectively.
- Milestones (1 year, 2-3 years, 5 years) must be established for creating state and local business plans and educating the public about infrastructure need.

CONCLUSIONS—FUTURE ACTIVITIES

It is absolutely essential that the State of South Carolina not miss the opportunity to plan and provide for infrastructure at a time when infrastructure is needed. The state will undergo significant and sustained growth for the foreseeable future; not to provide, or to cut back, on infrastructure during this critical period will cause congestion and overload on each and every aspect of the system. Quality of life will decline, and those now seeking out South Carolina as a location for business development and residence will go elsewhere.

One of the most important lessons of our time is that "quality sells." This dictum means that to the degree something is done well, people will seek it out and buy into it. This should be the byword for South Carolina in the future. The necessary accompaniment to development, i.e., infrastructure, must be done well. Transportation, education, recreation, the arts, and the public justice system should be funded to the degree that they work exceedingly well. If this is done, the state will flourish and mature, and people will continue to be attracted to it. If it is not done, South Carolinians will pay the price of growth competition, and other regional growth participants will emerge as leaders. All of the evidence that has been produced to date confirms that growth is directly related to quality of life. To the degree that growth diminishes because of lack of infrastructure, so will quality of life.

Roads that work, an educated labor force, prime recreational facilities, adequate utilities, and cultural amenities attract businesses and taxpaying citizens to an area.