BICENTENNIAL CONTRASTS • THE CHARLESTON EXCHANGE AND SCETV HEADQUARTERS
BEFORE LONG, PEOPLE ARE GOING TO BE TALKING ABOUT LOAD-BEARING BRICK IN THE SAME BREATH WITH MOM’S APPLE PIE.

Given today’s economy—and tomorrow’s as well—architects and builders are going to be singing the praises of load-bearing brick for quite a few years to come. Because, all things being equal, you can put up a building faster with load-bearing brick than with concrete and steel—maybe even a lot faster. And you can put it up for less money—maybe even a lot less money. Without sacrificing a thing aesthetically.

At Richtex, we’re uniquely equipped to help you take advantage of the boom in bearing-wall construction, because we’ve got a newly automated plant turning out big brick. Which means that now you can design a bearing-wall building with complete assurance the brick will be there when you need them.

So give us a call today, and find out what’s cooking at Richtex P.O. Box 3307 Columbia, South Carolina Zip 29230 (803) 786-1260.
Featuring

Quaker Maid
Kemper

OVERTON
KITCHEN & BATHROOM CABINETS
CUSTOM APPLIANCES

ROMARCO®
Marble Tops

And we are the only fashion kitchen operation in South Carolina serving the entire state, with a complete selection of cabinets and counter tops stocked in our own warehouse for immediate delivery. Our reputation is based upon our reliability, experience, and proven performance in hundreds of home, apartment, and condominium installations. Our designers are at your service...to assist you throughout design, bid and installation. We offer a complete remodeling and installation service from our two locations in Columbia, and Greenville...everything from exotic design layouts to countertops and accessories. Large job...or small...give us a call. You'll be glad you did.

Hampton Kitchens

1220 Lincoln Street
Columbia, S.C.
Phone (803) 256-7221

108 Greenacre Road
Greenville, S.C.
Phone (803) 232-7951
We'd Like To Send You A Genuine Quarry Tile From Mount Gilead.

It may not be the same as owning a piece of Gibraltar, but we think you'll be impressed with the quarry pavers we're turning out in our new facility in Mount Gilead, North Carolina. That's why we want you to have a sample, so you can see what we think is the best-looking extruded tile on the market.

Our new tiles have a textured surface and are cut slightly irregular to give them a handcrafted look. So we named them "Old Colony."

With the introduction of the new quarry pavers, we are now able to offer a complete range of tiles, including glazed, white-body wall and floor tiles, and unglazed mosaics. Which means that you have to deal with only one supplier, Mid-State, for all your tile needs.

Just send us this coupon and we'll send you a sample.

Mid-State Tile Co.
P.O. Box 627, Lexington, N.C. 27292

Please send me a genuine quarry tile from Mount Gilead and more information on the "Old Colony" line.

Name
Address
City
State Zip

Mid-State Tile Co.
P.O. Box 627, Lexington, N.C. 27292
1975 REVIEW OF ARCHITECTURE

Without gimmicks like a red, white and blue cover and within its limitations, this Bicentennial issue of the Review attempts to show a glimpse at architecture in South Carolina on the eve of the Revolution as presented in several special articles contrasted with the state's architecture today as shown in its regular features.

COVER
A blow-up of a section from Thomas Leitch's crazed 1774 painting of Charleston showing the Exchange is in marked contrast to a gleaming model of LBC&W's proposed SCETV Headquarters.

PERSPECTIVE Page 7
News, views and comments about architecture and the architectural profession in South Carolina during 1975.

PREVIEWS Page 10
Some of the new buildings designed by South Carolina architectural firms during the past year.

SOUTH CAROLINA 200 YEARS AGO Page 20
FORT MOULTRE, An Archeological Reconstruction Page 24
"A MOST NOBLE APPEARANCE" A Brief Architectural History of the Charleston Exchange Page 26
A CULTURAL CENTER BY COINCIDENCE Page 32
USC AUDITORIUM Page 34
SCETV HEADQUARTERS Page 36
AS BUILT Page 38
Some of the new buildings designed by SCAIA members and completed during the past year.

SCAIA ROSTERS Page 47
Listings of all fellows, corporate members, associate members of the South Carolina Chapter of The American Institute of Architects and of the firms with which they are affiliated.

CLEMSON SEMESTER REVIEW Insert
A reprint of portions of the latest issue of The Semester Review of the Clemson College of Architecture.

OFFICIAL PUBLICATION SOUTH CAROLINA CHAPTER AMERICAN INSTITUTE OF ARCHITECTS
Review of Architecture is published annually by the South Carolina Chapter of the American Institute of Architects. Circulation is to all members of the Chapter and to professional engineers, interior designers, contractors, planning agencies, finance institutions, and church, hospital, school and governmental officials in the State. Issues are available from the publishers for $1.00 per copy. Opinions expressed by contributors are not necessarily those of the South Carolina Chapter of the American Institute of Architects. Advertisements do not constitute an endorsement by the South Carolina Chapter of the American Institute of Architects. Review of Architecture is printed by The R. L. Bryan Company, Post Office Box 368, Columbia, South Carolina 29202.
Fine architecture requires windows from a specialist.

Cove Point Condominiums, Virginia Beach, Va.
Thomasville Junior High School, Thomasville, N.C.
Ramada Inn, Winston-Salem, N.C.
Holiday Towers, Myrtle Beach, S.C.
Dentist office, Lexington, N.C.

Binning's engineering and manufacturing expertise can provide you with the flexibility you require to design your architectural project within a reasonable budget.

Binning's Building Products, Division of N.C.
P.O. Box 868
Lexington, N.C. 27292
Telephone (704) 249-9193
PERSPECTIVE

PROFESSIONAL RECESSION

As the economic recession wound up its second year, South Carolina's architectural firms continued to suffer without relief as construction declined in the governmental as well as the private sector due to the freeze imposed on bonding for state governmental building.

Large scale layoffs hit some of the bigger offices. Twenty hour work weeks with corresponding decreases in pay are being tried in some cases. Some firms report no activity in design or working drawings. Strangely enough, thirteen new firms have been listed on the SCAIA roster by reason of isolated good fortune, blind optimism or no other option on the part of the principals.

In October, a particularly bleak month, statistics released by the F. W. Dodge Division of McGraw-Hill Information Systems showed nonresidential construction contracts (accounting for most of the work done by architects) dropped 84 per cent compared to the previous October.

Just before the end of its last session The General Assembly voted to hold the annual authorization of construction bonds to five per cent of the general fund revenue for the previous fiscal year.

Soon after adjournment of the Legislature, it was discovered that new projects under contract and bond issues already approved added up to $3.5 million above the five per cent limit. At the time of the freeze state projects under construction totaled $72 million with another $11.5 million committed, $11.3 million in planning, but uncommitted and $186.3 million projected for future work.

In late December the Budget and Control Board in a further effort to cut spending and avoid a deficit at the end of the year reclaimed $5 million of an $8.4 million appropriation for an auditorium at the University of South Carolina (see page 34) and $6 million for a continuing education center at Clemson.

An anxious architectural profession is wondering if relief will be forthcoming from the 1976 session of the Legislature.

TUNNELVISION. Visual schizophrenia became an architectural feature in Columbia during the fall when a mural depicting a tunnel cut through a mountainside was unveiled on the rear wall of the neo-classic Farm Credit Bank Building. Artist Blue Sky painted the unusual 75 by 50 foot work with a grant from the South Carolina Arts Commission. With unbelievable realism it shows the crystalline structure and mineral content of the mountainside. Through the tunnel can be seen mountain peaks coming out of a cloud layer, drifting clouds, blue sky, the rising sun and Venus, the first star of the morning. A parking lot in front of the wall sets the proper scale for what is seen in the mural. Painted details such as a road through the tunnel with lane markings, a road sign, black and white stripes on the rocks and a guard rail blend with the real markings and railings of the parking lot to add to the overall effect.
MUSEUM COMPETITION

Many architectural firms in the state have been busy at work on designs for a new museum for the City of Charleston to be entered in a competition approved by the American Institute of Architects. Local voters approved a six million dollar bond issue to finance the building which will replace the existing museum, a venerable and creaky edifice, erected in 1899 as an auditorium for the United Confederate Veterans' Reunion. The site for the project is at the corner of Meeting and John Streets adjacent to the noted Manigault House to which it will have to relate as a design requirement. Winners in the competition will be chosen in February by a jury composed of architects Hugh Stubbins FAIA of Cambridge, Massachusetts; Ambrose Richardson FAIA of South Bend, Indiana; and Charleston attorney Robert Hollings with Dean Harlan McClure of the Clemson College of Architecture as professional adviser. The cash prize of $25,000 awarded to the winning design will be a part of an architectural fee of approximately $400,000.

Such competitions have had mixed success in the state in recent years. Charleston was successful with its competition for a municipal auditorium in 1965, but Greenville had trouble several years later. The jury's winning design for its city hall was rejected by the public and local authorities alike, the competition abandoned, and other architects selected to begin anew. Prize winning designs will be published in the next issue of the Review.

FIRM CHANGES

Avery Wood—Larkin Jennings Associates, Inc., Greenville—a merger of the two principals named.

Keane/Sherratt, Architects, Hilton Head Island — formerly Keane Associates; James T. Keane and Peter T. Sherratt, principals.

Barnard/Kennedy/Hancock, Hilton Head Island—formerly Dave Kennedy/Architect.

Lafaye Associates, Inc., Columbia — formerly Lafaye, Lafaye & Associates; founded by the late George E. Lafaye in 1903; principals J. D. McCall, Jr., Charles F. Carter, Jr., James L. Tupper and Bond R. Sedberry, Jr., with the retirement of George E. Lafaye, Jr.

NEW SCAIA FIRMS

Overstreet and Watt Architectural Associates, Inc., Anderson

Martin B. Buckley, Architect, Columbia

The Low Country Design Associates, Ltd., Edisto Island

Green H. Giebner, AIA, P.E., Greenville

John Bulcken, III, Architect, Hilton Head Island

Joseph K. Hall, Architect, Hilton Head Island

Wallace L. Clontz, Architect, Loris

Witherspoon & Knowland, Architects, Pendleton

Gardner, Edelblut and Associates, Seneca

Albert Bailey Jolley, Jr., Architect, Spartanburg

Charles L. Pitts, Architect-Planner, Spartanburg

Brady & Brannon, Architects, Tryon, N.C.

William G. Lyles, FAIA, founder of LBC&W, Inc., (formerly Lyles, Bisset, Carlisle and Wolff) was honored in August when his portrait was placed in the firm's executive board room. Over the years since its opening in 1947, LBC&W has gained national prominence, accomplishing more than 2,000 projects costing some two billion dollars.
The Andersen family just moved in.

We're proud to welcome the family of Andersen® Windows and Gliding Doors into our inventory of quality products.

There's low upkeep Perma-Shield® Windows and Gliding Doors for beauty without bother. Their treated wood core is sheathed in rigid vinyl that doesn't chip, crack, flake, or peel. Doesn't blister.

And Andersen Primed Wood Windows and Gliding Doors offer the charm and character of natural wood, treated against insect attack.

Meet the Andersen family before you start your next job. We'd be happy to introduce you.

MORGAN BUILDING PRODUCTS
MORGAN MILLWORK CO. — A DIVISION OF COMBUSTION ENGINEERING, INC.
1930 Blanding Street
Columbia, South Carolina 29201  803/252-4545

A New Cement provides Type S Mortar with 3 parts sand

"Makes Up Better Mortar"
CRAIG AND GAULDEN

The Lander College Center will be composed of the Student Center (First Phase) and Performing Arts—Administrative Wing (Second Phase). The first phase is designed to stand alone visually until the addition of the second phase at the completion of which a skylight will be installed to join the buildings and to create a covered "street".

FREEMAN, WELLS AND MAJOR

The Lander College Library, presently under construction, is the first building designed to implement the new Lander Master Plan above. Facing a broad plaza which will be the center and focal point of the new Campus, the Library is designed to be the termination of a multi-level pedestrian spine which will run through the entire complex. The 60,000 square foot building uses skylights, multi-story spaces, and strong colors to create a stimulating environment for study.

NEAL ARCHITECTS

Anderson Village Center will be a compact group of shops featuring wooden structure and siding highlighted with supergraphics. Lofty ceilings with exposed framing will give some interiors a bazaar-like atmosphere.
Reedy River Plaza, a renewal of the Reedy River area in Greenville is proposed to give new life to this section and to become the Southern anchor of downtown. This would be accomplished by making maximum use of the existing warehouse type buildings and interspersing new structures in a compatible manner. A unique ownership system has been proposed to the property owners in which each property will be given a value rating, not in dollars, but in relation to the total where the total represents a number of units, not a number of dollars. The property owners then would own appropriate shares in the total number of units. Reedy River Plaza consists of approximately 14 acres located on South Main Street and bounded by Camperdown Way to the south, River Street on the west, and Broad Street on the north side of the property. The Reedy River flows through the center portion which is also bisected by a railroad line.
Litchfield Beach Development is a proposed project of 1,048 mid-rise multi-family resort condominiums designed for a moderate pricing structure. A 5,200 foot, 219 acre stretch of oceanfront at North Litchfield Beach, the site is the designated maximum density parcel of a larger planned resort community which will include low and medium density housing at other locations. The beach frontage is separated from the mainland by a saltwater marsh and a freshwater lake. The overall density has been held to less than six units per acre. The form is a distribution of two types of basic building elements. One element terraces longitudinally; the other terraces laterally. The elements are connected by single loaded open galleries which intersect cylindrical service cores.

The Benedict College Humanities Center is another building for the "new campus" which is emerging on the existing site. The exposed concrete and bronze glass exterior is intended to blend with the existing all bronze glass Learning Resources Center directly adjacent.
MARTIN BRAUN BUCKLEY

The Hackett House at Oristo on Edisto Island is being built as a vacation house, later to be used as a primary dwelling. It has vertical cypress panelling inside and out.

The Tobias House in Spring Valley near Columbia has wing walls to protect glass areas, gardens and swimming pool. It also has cypress siding along with stucco.

KEANE/SHERRATT

Christ Lutheran Church is to be located on a heavily wooded site in the geographical center of Hilton Head Island. Masonry walls inside and out have a stucco finish with the timber roof structure stained. The nave is designed for its ultimate capacity, but seating is provided for current needs only.
Gambrell Hall, the $6 million social sciences center at USC, is five stories in one portion and two stories in another and connected to each other a six-story central service and elevator core. The 120,000 square foot center, which will be the site for national and international meetings in the social science field, will feature an auditorium seating 335 persons and several classrooms with a capacity of 150 students each. Interesting design aspects of the facility include three two-story interior lobbies.

The Agricultural Engineering Building at Clemson with the distinct white louvered cupola on the roof will be unrecognizable after its current renovation and enlargement. The new design is such that it ties the other buildings in the area together and remains a "quiet" building. The cantilever on the right side counters a similar cantilever effect of the adjacent and recently constructed School of Forestry Building and related agricultural buildings.

TRIAD

A new high school for Richland County School District 2 is being planned to accommodate 1,500 students in seven component buildings joined by covered passages at ground level and enclosed passages on the second level. These departmentalized buildings are grouped around a central outdoor student commons area.
LUCAS AND STUBBS

The student center at the Medical University of South Carolina in Charleston will contain some 60,000 square feet. This facility will house dining areas, lounges, recreational spaces and meeting areas all working around an atrium space.

A regional correctional center, the first combined medium and minimum center in the state, is planned for Greenwood. The facility is designed as a response to the basic criteria established by this concept. The required separation between the two securities is created by connecting the various functional units into a continuous structure by entrance security links. These links provide the separation required, yet allow maximum flexibility in scheduling room occupancy for the two securities.

The Westvaco Chemical Division Headquarters at Charleston has as a major design element the requirement that a security barrier separate the “front” of the site from the “back”. This security barrier takes the form of a brick wall traversing the entire site. The building is set on this wall in such a way that the wall leads to the entrance. Major offices occupy positions around the perimeter of the building. An open lobby and service functions have been given the central space.
A four building complex is being built in Columbia for training of the adult blind with emphasis on lessening the individual's anxieties created by his handicap. The scale and feel of the architecture is designed to create a more residential and less institutional atmosphere. The Bureau of Laboratories of the SCD-HEC will be housed in this 86,000 square foot structure. Laboratories are laid-out on a 10' x 20' module allowing for greatest space usage and flexibility reflecting the current guidelines of the U. S. Communicable Disease Center in Atlanta. The elaborate mechanical system required for 100% outside air with no return dictated much of the exterior appearance of the building, as vertical mechanical shafts break-up the facade and reflect the interior space module.

The supply and laundry center at the Crafts Farrow State Hospital campus outside Columbia will be sited so that the given area is maximized and an effective transition between campus and community is provided. Precast structural design takes advantage of the terrain and separation of function. The materials and type of construction were selected for their basic characteristics of low maintenance and long physical life.
GILL, WILKINS & WOOD

The Gulf Stream Yacht Club at Garden City will accommodate locker facilities as well as a lounge and dining room. The larger areas are raised above grade to allow for flooding and at the same time to take advantage of the magnificent views. The structure is to be typical pole construction with standard wood frame used for stair tower and mechanical spaces.

A Community Recreational Complex for Leroy Springs & Company at Fort Mill houses over 40,000 square feet of recreational facilities, including an indoor-outdoor pool with operable roof, gym, handball courts, saunas, meeting rooms, and arts & crafts studios. Everything but the handball courts is completely accessible to the physically handicapped.

CUMMINGS & McCRADY

A Business Service Building for the Medical University of South Carolina at Charleston will have 6 floors and 59,000 square feet with a potential growth of 5 more floors and 49,000 square feet. The first phase will be a complete center housing security, business, and personnel administration for the Medical University.

The Forestry Science Laboratory will have 12,000 square feet and a potential growth of 5,000 square feet. The one story facility will be for the study of South Carolina’s forest and plant life.
RILEY BULTMAN COULTER

Columbia Metropolitan Airport Terminal will have its automobile front excavated to provide a two-level approach scheme and a new baggage claim wing will be added at the existing lower level opened up by the excavation. This wing is designed for future additions on top at the existing main entrance level; the deck at this level will be used for parking initially.

Saint James Lutheran Church in Sumter is planning a completely new suburban facility to replace an older one downtown. The complex contains the church proper, fellowship hall, educational wing and office area, all grouped around an entrance court designed for multiple usage and accented by a bell tower. Future additions will expand the education and office areas and will add a gym.

PEARLSTINE/ANDERSON

The new Squadron Operations Building for McEntire ANG Base will expand existing facilities and will meet seismic Zone 3 requirements.

3621 Wilmot Apartments, a ten-unit one bedroom project, is located near the downtown area of Columbia in an older residential neighborhood. The site was developed to take advantage of the maximum density permitted by zoning while preserving the numerous large existing trees. Wood siding and brick exterior colors were selected to be complimentary with the surroundings.
PIEDMONT ENGINEERS, ARCHITECTS & PLANNERS

The Industrial Careers Center for Greenville Technical College will house the college's industrial electronics, HVAC, welding, plumbing, building trades, automotive, and heavy equipment departments. Diagonal open stairways connect the four-building complex, creating an outdoor laboratory court for the building trades. On-grade access is available to each department due to the sloping terrain. The structural system for the 86,000 square foot complex, consisting of pre-cast double tees, beams, columns and retaining walls, was chosen for both speed of erection and fire protection.

LAFAYE ASSOCIATES

Columbia District Headquarters Building for Southern Bell, is being located on a hill which allows for ground floor parking under three floors of office space with additional parking provided on site for 230 cars. All energy saving features possible were a prime design requirement.

Charles Towne Square Shopping Center is an enclosed shopping mall of 555,000 square feet located on the intersection of 1-26 and Montague Avenue, North Charleston. Included are Montgomery Ward, J. C. Penney, Edwards and 57 smaller shops. Its developer desired to echo old Charleston.
At the eve of the Revolution, South Carolina was a place of great physical contrasts. In the colony there were 170,000 people, half of whom were slaves. Most of these people lived on farms and plantations stretching from the ocean to the Indian territory just north of present-day Anderson. Much of the land in the state had been surveyed, divided into individual holdings, and connected with a network of roads, trails, and navigable waterways. Though Charleston, the colony's capital and only city, had a population of just 10,000 people, it was regarded as one of the most modern cities in the world.

Josiah Quincy, the worldly Bostonian, after a lengthy visit in 1773 placed Charleston above every American city. A well traveled Hessian officer who served there with the British Army wrote: "The city itself consists of 1,020 houses, which are built along broad unpaved streets intersecting one another at right angles; each house having a garden and standing twenty to one hundred paces from any other. The warm climate makes the open spaces necessary. They permit the cool breeze to play through the city. ... Broad Street is the most beautiful street. It is 100 feet wide ... and extends from the Cooper to the Ashley, dividing the city into two parts. ... No other American city can compare with Charleston in the beauty of its..."
houses and the splendour and taste displayed therein. The rapid ascendency of families which in less than ten years have risen from the lowest rank, have acquired upward of $100,000, and have moreover, gained this wealth in a simple and easy manner, probably contributed a good deal toward the grandiose display of splendour, debauchery, luxury, and extravagance in so short a time.

Around 1680, Charleston had been laid out in parallel streets running along the peninsula crossed by streets running from one side of the peninsula to the other. These broad streets became lined with two and three story buildings, either facing the streets or at right angles to the streets. Behind the buildings lots ran to the center of the blocks, where there might be gardens and smaller service buildings, and occasionally tenement houses (apartments) on narrow alleyways. By 1770 Charleston was a hundred years old and the Georgian buildings then in vogue were the third generation to be built there. The earliest buildings as seen in a harbor view painted in 1738 appeared to have had strong Jacobean and Dutch influences. After deterioration or destruction in a series of devastating hurricanes and fires, these were replaced by a distinctive colonial style which lasted from 1740 to 1760. For the most part these sturdy structures, often asymmetrical and stuccoed, had bold and simple decoration.

The ascendancy of the Georgian style which reigned for the next fifteen years is well described by Albert Simons FAIA in The Early Architecture of Charleston: “From about 1760 to the outbreak of the Revolution, which caused the cessation of building, houses were erected of larger dimensions and greater richness of detail than formerly. The first story is raised well above grade, so that more head-room is gained in the basement, and the entrance is reached by an imposing flight of steps. This elevation of the first floor arose from the desire for greater coolness, and to lift the house above the danger of flooding by storm tides. The drawing-room still occurs on the second floor and is now high enough to enjoy the sea-breezes that sweep across the city and keep the air fresh and cool all during the long summers.

There was, at this time, a great regard for everything British so that the tastes and fashions of London were adopted in the colony soon after their inception in the capital. Most of the young men of wealthy families were sent to England to be educated, and upon their return home must have desired the same amenities to which they had grown accustomed in the mother country. Instances are recorded of houses erected by London builders attracted to the colony by the opportunities for plying their trade. As a result of all this close contact, many of the houses of this period have little of that tentative and naãve quality that is usually associated with colonial work but are very definitely a transplanted manifestation of English-Georgian architecture.

This is especially the case in respect to the well-proportioned paneled rooms and the dextrously carved woodwork of mantels, doors, and cornices, following frequently the elegant manner of Chippendale with rococo and Chinese motifs skillfully blended. This gay and spirited architecture ceased before Sir Peter Parker’s ship (1776) appeared in the harbor to attack Fort Moultrie, and when, at last, peace was restored and prosperity gradually revived, a new manner and a different taste inspired the builders of the day.”

The last of the great Georgian houses were the William Burrows House (razed in 1928) and the William Gibbes House (still existing), both begun after 1772. Homes in both the Colonial and Georgian eras (and up until the Civil War, in fact) fell roughly into two general types—the “single-house” and the “double-house.” The first uniquely Charleston, was described at the time as “standing sidewaies backward into their yards and only endways with their gable towards the street.” It was only one room deep and was entered from the side yard. The square double house was entered directly from the street. Both types were divided by a central hallway with a staircase at its end visible from the entrance door.

The interiors of these buildings usually had plastered walls and ceilings, wood plank floors, wood or stone carved mantel’s, mouldings along the ceiling line and wood wainscots three feet high, or sometimes full panelling. Materials used in buildings varied widely. Nearly all were framed with wood on brick or stone foundations. Wood siding, brick, stone, stucco, tabby, were all used for exterior walls. Roofs were made of tile, slate, or wooden shingles. Most of the houses were furnished with locally made, and imported furniture in the Queen Anne, Chippendale, and Hepplewhite styles with many variations.

Individual differences in design and materials in each house made the city visually interesting and colorful. There were all kinds of roofs—gable, mansard, hipped, etc., and many variations on the wooden and iron railings on porches, cornice decorations, shutters, entrance-ways, and steps. In many cases the lower stories and foundations had arched openings that contrasted with the basically rectangular lines of the houses above. Because of the relatively warm climate and ocean breezes in Charleston, houses there were designed to capture sunlight, provide shaded areas, and maximize ventilation. In the northern cities they were designed more compactly to seal off the interiors from the cold weather.

Most of these houses and buildings were not designed by architects as they are known today, but by builders who had learned to design houses from their experience in the trade, their own reading and curiosity, the demands of their clients, and the plans found in English pattern books or “Treasuries.” Usually, the “architect” would also be the contractor, carpenter and wood carver for the elaborate woodwork. Perhaps the most famous of these was Ezra Waite, “Civil Architect, House-builder in general and Carver, from London.” His masterpiece was the Miles Brewton House in which he claimed to have “carved all the said work in the four principal rooms, also calculated, adjusted and draw’d at large for to work by, the Ionic entablature, and carved the same in front and round the eaves.” The only professional architects whose work is recorded are Naylor of The Exchange Building (see page 26) and Gibson of St. Michael’s Church, and each is known today, but by builders who had learned to design houses from their experience in the trade, their own reading and curiosity, the demands of their clients, and the plans found in English pattern books or “Treasuries.” Usually, the “architect” would also be the contractor, carpenter and wood carver for the elaborate woodwork. Perhaps the most famous of these was Ezra Waite, “Civil Architect, House-builder in general and Carver, from London.” His masterpiece was the Miles Brewton House in which he claimed to have “carved all the said work in the four principal rooms, also calculated, adjusted and draw’d at large for to work by, the Ionic entablature, and carved the same in front and round the eaves.”
for these buildings along. Skilled craftsmen, many of whom were slaves, and their apprentices, included carpenters, masons, plasterers, roofers, cabinetmakers, and iron workers.

In the city, there was no zoning to regulate different land uses in different areas such as modern cities have. Shops, houses, apartments, and civic buildings would be on the same block. However, certain parts of the city spontaneously developed into areas for particular uses. Broad Street, with the New Exchange Building at one end and the statue of William Pitt at its center, became the main governmental avenue. At the intersection of Broad and Meeting streets was the State House and St. Michael's Church whose spire along with that of St. Philip's pierced the skyline. Bay Street, now East Bay Street, was the warehouse area with the docks and wharves just on the Ashley River along one side. Probably none of the streets were paved, although crushed oyster shell and sometimes cobblestones were used on top of the dirt. They were often crowded with pedestrians, horses, wagons, and carts; and, in contrast to the fine buildings, cluttered with filth that even the meanest village would not tolerate today.

Charleston's gardens were probably the best stocked and most varied anywhere in the world. Most of these gardens were in the side yards of houses perpendicular to the streets, or in the back yards of houses. A few houses with large lots had gardens on all sides of the house, but this was very rare. Plants included herbs and flowers brought over from Europe, native American plants, and exotic and semi-tropical plants that could grow in Charleston's warm climate much better than in European cities, or northern American cities. Some of these gardens were laid out in formal brick walls and hedges in geometrical patterns, but the luxuriant climate made neatly controlled plantings hard to manage. Lush trees, shrubs and flowers in small clusters and along walls were more common.

Since the main avenues of communication with the outside world, and of wealth, was by ships, the waterfront played an important part visually in Charleston. Most of the docks and wharves were along the east side of town on the Cooper River, outside the old fortification walls. Even in the 1700s, land was being filled in as more warehouses and wharves to accommodate the ships were built. The ships themselves were important parts of the city's landscape. There were large, three masted, squarerigged warships and traders from across the oceans, smaller schooners, sloops, ketches and dinghys for coastal transportation, and rowboats, flatboats, and dugout canoes for river transportation. Nearly all of the available drawings and prints of Charleston in the 1700s are views of the waterfront taken from a ship in the harbor, or from the harbor islands. Many of the buildings in Charleston were built to accommodate sailors and their cargoes—which included slaves, soldiers, liquor, lumber, manufactured goods, cloth, sugar, and spices. Lining the rivers and coastal waterways in the low country, and even as far north as Columbia and Augusta, were many large plantations growing rice, lumber, indigo, and cotton, as well as numerous vegetables, cattle, fruit and grain. Some of these plantations covered over a thousand acres, but most of the large grants given in the Proprietary period had been broken up into smaller holdings, or rearranged by sales and marriages. Nearly all of the plantations were like small towns, often miles from the nearest town and from other plantations. The plantation buildings centered around a main house, and included slaves, houses, barns and sheds, kitchens, workshops, and sometimes mill houses. The houses were usually built on high ground between the roads and the rivers, to allow for easy access by both boat and horse or wagon. Some attempts were made in formally planning the layout of these plantations, especially as their owners became wealthy and built new houses to replace the original pioneer dwellings. Often rows of trees were planted on either side of the avenue leading from the road to the main house, or trees were planted along the main road itself if the houses were very close to the main road. Sometimes formal gardens were planted, but more often shade trees and shrubs were either planted or left standing to decorate the house site.

In the floor plan, most of these plantation houses were like the Charleston townhouses. They were either 1 1/2, 2 or 2 1/2 stories tall, above the raised basements. Ashley Hall plantation, now in ruin, was unusual in being over 3 stories tall. Porches covering the entire fronts of the houses were not as common as they were to become later, and columns rising to the roofline from the ground were very rare. Although almost all of the houses were either one or two rooms deep, a central hallway, symmetrical, with porches or porticos, there were many variations in materials, lines, and added features that made no two houses exactly alike. Fenwick Hall plantation, on John's Island, has a mansard roof, and chimneys and an octagonal wing, while Fairfield, on the Santee River, has a hipped roof, interior chimneys, and bay windows that may have been added in the 1800s.

In the upcountry, above the coastal and riverline plains, the houses were not usually either as large or as refined as the lowcountry houses. The area had just been settled only 20 years before the Revolution by Scotch Irish, German, and French immigrants and pioneers from the coastal colonies. Their houses were often the first houses built on the farms and plantations, while in the lowcountry many of the simpler first houses had been replaced with larger and more elaborate houses.

The typical upcountry house was built with hewn logs and boards, and was only one room deep. Some of the upcountry houses did not feature the central hallway, but nearly all had some kind of porch, brick chimneys, plank flooring, and outbuildings. Most of these houses have been replaced and are not as evident as the many lowcountry plantations which have been preserved and restored. One that has survived and been restored is Walnut Grove near Spartanburg.
Most of the slaves’ houses, especially where the plantation owner was wealthy, were built of matching materials to a uniform scale. The slaves’ houses on plantations were usually laid out in small clusters or streets along the plantation avenue or to the side of the main house. Many were built of logs and clapboard, some were brick. Some had plank floors and brick chimneys, but most had dirt floors with chimneys built of sod and wood. Especially in the cities, the slaves and servants lived in the main houses, in the attics or in the basements.

With the exception of Beaufort and Georgetown, most of the towns before the Revolution did not fully develop into the envisioned planned communities. Although they were surveyed and laid out in streets and squares, the towns developed into small clusters of houses, stores, and warehouses along a riverbank or on a main road. Some towns, like Camden, Ninety Six, Dorchester, and Granby developed around forts and Indian trading posts.

Churches were located either in these towns or in the country along the main roads. They were almost universally one storied, meeting-house style buildings in the upcountry. In the lowcountry, they were sometimes planned in the cross pattern of larger churches. Several of the lowcountry churches featured small towers, arched doors and windows, and cool, quiet interiors provided by brick walls. In Georgetown and Beaufort, architectural styles for townhouses different from the Charleston styles began to develop before the Revolution. In both these cities, lots were generally larger and houses were designed with porches facing the water rather than small courtyards. Large oak trees were left around the houses for shade, and high raised basements were almost universal. Most of the Indians in the state had been killed by disease and warfare by 1770, but the Indian towns remaining were larger than any towns in the state except for Charleston, Beaufort, and Georgetown. The Catawbas, with only several hundred people and remnants of other Souixian tribes, were settled on a reservation near Rock Hill, on the Wateree River. The Cherokees still controlled the mountainous country in what is now Anderson, Oconee, and Pickens Counties, and continued to foray and hunt as far south as Newberry.

Indian towns in both these areas were clusters and strings of houses, community buildings, and storage houses surrounded by plots of corn and beans, located on the fertile river and creek plains. There were basically two types of houses, the round winter house, and the rectangular or round summer house. Both types were built by setting poles or beams in holes in the ground, lashing them together with other poles for support, to form the walls, and adding more poles to form the rafters for the roof. Sometimes the poles were bent or tied together near the top to form conical roofs. Spaces between the poles were filled with twigs and branches, and the whole structure was often coated with several inches of wet clay or a stucco made from clay and grass. A hole in the top of the winter house allowed smoke to escape from a fire built in the center of the house. Some of the rectangular summer houses were divided into rooms, and sometimes had porches and open sides for ventilation. Roofs were made of split wood shingles, bark, and thatch. These Indian houses were warmer in the winter and cooler in the summer than the colonists’ houses, but they usually had no windows. The Indians’ houses didn’t last more than a few seasons, except for the larger communal and ceremonial structures which were more sturdy built.

Although the roads in the 1700s were narrow, one-lane dirt roads much like unimproved county roads today, with few bridges and drainpipes to keep them dry, these roads did connect most of the towns, farms, plantations, and forts with each other. In several days it was possible to travel the length of the entire state, stopping for the night at plantations or taverns, which were usually farm houses that took in boarder roomers for a fee. During the Revolutionary War, soldiers moving quickly could cover almost 50 miles a day on horseback. travelling along one of the roads, evidences of civilization would appear quite frequently, even in the upcountry where the population density was fairly low. Mills on the creek banks, cleared fields, farms and plantations, mines, shops, and forts would appear at least every five or ten miles. However, travellers weren’t as well insulated from the natural environment as they are today, and the boundary between the wilderness and civilization wasn’t as smoothed over by technology. Travelling always involved risks of exposure, attacks by bandits, Indians or wild animals, or inconveniences such as being stuck in the mud for several hours. Even in settled areas and towns, the natural environment was brought indoors in many ways. Wood for fires and cooking, water, many foodstuffs, and wild game were brought indoors from the outside. Many farms and plantations were completely surrounded by swamps, woods, and rivers. Technology had not yet reached the stage of being able to isolate men from the natural environment, and therefore houses were designed and located to take the maximum advantage of the natural surroundings, constructed with local materials. South Carolina has much physical evidence remaining from the pre-Revolutionary period as of the thirteen colonies. Charleston has changed very little in street layout or in the scale of the buildings. Old fields, canals, roads, and houses from the period can be found in almost every county. Many of the houses have been preserved and restored, especially in Charleston, Beaufort, and Georgetown. In other areas, archeological excavations have led to reconstruction of houses and forts that would have scarcely been recognizable ten years ago.
FORT MOULTONIE

An Archeological Reconstruction as Seen in Palmetto Papers

Perhaps the most important structure built in South Carolina at the time of the Revolution had little architectural grace or beauty, but the clever ingenuity of its design and the great strength of its construction may have forestalled a quick British conquest of Charleston and the collapse of the effort for independence in the state in 1776. That structure was Fort Moultrie, the renowned palmetto log battlement built on Sullivan’s Island to protect the north entrance to Charleston Harbor.

While much has been written about the skill of Moultrie, the bravery of Jasper and the resiliency of the palmetto logs, little was known about the actual appearance and construction of the fort until a recent archeological exploration and the publication of its findings. The exploration was conducted by a team from The Institute of Archeology and Anthropology at the University of South Carolina headed by archeologist Stanley South.

Palmetto Parapets, a 355 page report on the 1776 fort and later forts on the same site, was written by South and published by the Institute. It gives detailed analyses of the archeological findings including the methods and materials of construction and makes interesting reading for archeologists, historians and architects, professional or amateur alike. In June, 1776, the fight for independence looked dim. There was little enthusiasm in the low country and none in the up country. Towards the end of the month a British fleet of fifty-five ships with a 2,000 man army appeared off Charleston Harbor. Its commander Commodore Sir Peter Parker expected to take Charleston and the state easily since his ships outgunned by 270 cannon to 75 the Americans in their unfinished log fort protecting the city. He was amazed, however, when his broadsides thudded into the soft palmetto logs encasing sixteen feet of sand with little damage to the fort or its occupants who returned the fire with deadly accuracy. At nightfall Parker withdrew, his fleet battered and his breeches blown off. After that, enthusiasm for independence soared in South Carolina.

The drawings reproduced here and the following excerpts from South’s report give a clear picture of the appearance and constitution of the fort:

SUMMARY OF THE APPEARANCE OF THE FIRST FORT MOULTONIE

The First Fort Moultrie was far more than a hastily erected battery of sticks and sand on Sullivan’s Island. The size of the fortification was quite large, being 550 feet from one bastion to the other. It was positioned on the island at the most advantageous point to command the deep-water channel approach to Charleston that passed directly in front of the fort. The positioning of the fort in relation to the channel was so important that the fort was built in a marsh. The British fort of 1782, represented by the timbers found east of the Third Fort Moultrie was only two feet above sea level, reflecting the similar low-lying location of Fort Moultrie to the west.

Fort Moultrie was a double battery work, though at the time of the battle only a single battery may have been employed, with a second battery possibly being added before 1780 when the parapet height was raised to 20 feet. The guns were mounted on a wide platform, probably 25 feet wide, as revealed in the timbers archeologically revealed for the British fort of 1782. We might assume that similar construction was used in the First Fort Moultrie and in...
the British fort of 1782, since both are of the same Revolutionary War time period, even though the British fort was apparently considerably smaller than the First Fort Moultrie. The architectural size would not likely affect the width of the gun platform. A sixteen foot thick parapet of cribbed palmetto logs is well documented, and protected the gun platform and the room beneath. These rooms, complete with chimneys, were likely the officer's quarters, with some rooms below the platform being used for a lower battery of guns, probably only on the sea face of the fort.

The area inside was fort was a morass, as it was before the fort was constructed, and it was so marshy that the garrison could not fall into formation inside the fort if the tide was high. There was said to be no ditch around the exterior of the fort, though a section of fortification ditch was discovered in front of the north curtain wall of the first fort, filled with midden thrown from the fort by Americans and British. We know, therefore, that at least part of the First Fort Moultrie had a ditch accompanying it. Flanking cavaliers were attached to the northernmost bastions, and a traverse was built across the center of the fort before the battle. A canal was cut from the south toward the north curtain of the fort.
In spite of all our looking, we have discovered little primary documentary evidence concerning the practice of architecture in colonial America. We know only a handful of signed drawings, like William Buckland's design for Whitehall in Annapolis (1763), or we may refer to a motley assortment of contracts, letters, wills and bills—the collection related to the Thomas Hancock house (1737) is exemplary, or we might cite descriptive passages in diaries or travel books such as the Journal of Josiah Quincy (1744-1775):

We were off Charles Town bar, and, the wind being right in our teeth, we were the whole day beating up. The number of shipping far surpassed all I had seen in Boston... about three hundred and fifty sail lay off the town, which struck me very agreeably, and the new Exchange which fronted the place of my landing made a most noble appearance. 1

Due to research sponsored by the South Carolina Department of Archives and History this Charleston Exchange must now be ranked as one of the more thoroughly documented colonial buildings. 2 Extant are two elevations and two plans signed "W. Rigby Naylor, Inv. & Del." and dated "10 Dec. 1766," a building contract and specifications, letters and bills concerning the acquisition of materials, a discussion of the building in the minutes of the South Carolina Commons House of Assembly and in the Journal of the South Carolina Council, and contemporaneous diary and newspaper accounts. 3 Collectively these items constitute a notable body of materials related to one colonial building. This collection tells us a great deal about the practice of architecture in colonial Charleston.

William Rigby Naylor (c. 1720-1773) came to Charleston prior to 1765. It is a matter of record that he was paid for drafting plans for several buildings, for surveying and laying out streets in the developing city, that he offered to teach architectural drawing and that he advertised himself as being an "architect of London". Although we know little

---

3. For their help with these materials, I would like to thank Mr. Jack Jackson and Mr. David McKibbin of the Boston Athenaeum, Mr. Russell MacBeth of the Gibbes Gallery, Charleston, Mr. E. L. Inabinett of the South Caroliniana Library, the staff of the South Carolina Department of Archives and History, and Mrs. Prior and Mrs. McCormick of the South Carolina Historical Society.
4. The Builder, October 2, 1869, p. 781.
concerning his English background, the records of the Royal Institute of British Architects do show that from Charleston he submitted plans, unsuccessfully, in 1769, for the design competition of the Royal Exchange in Dublin. This attempted transatlantic practice makes Naylor an exceptional figure in the history of the arts in colonial America.

Naylor's Charleston Exchange at the junction of Broad and East Bay Streets, has undergone three major modifications since its completion in 1772: projecting bays on the west facade were removed to accommodate traffic in 1805; an original cupola was removed about 1822, and the arcade of the lower level was filled in prior to 1830. In Naylor's plan for the structure, we see the open, arced market area on the lower level, its open wall facing eastward to the sea breezes, staircases housed in the projecting bays lead to a central, cross ventilated assembly room which is flanked by auxiliary offices. Given this program, Naylor's elevations are as one would expect. In the east elevation we note a clear articulation of the exchange floor, the central assembly hall and the flanking offices. The strong central axis of the western facade serves as a visual exclamation point, a terminus for Broad Street, which was then the city's major commercial thoroughfare. Indeed, the Exchange was distinguished by the prominence of its site, for the site of the Exchange was the center of the city's waterfront, as conceived by the original city plan of 1680. This piece of land where streams of maritime and inland traffic converged, was a symbolic point in the life of Charleston, and from the city's beginnings this spot seems to have been occupied by a major civic structure: first by the Court of Guard, which was destroyed to make way for the Council Chamber, which in turn was torn down to make way for the Exchange. Naylor and the Charlestonians constituting the Exchange committee appreciated the significance of this site and the important role which the new structure would play in the life of the community. They specified that the street markets near the site were indecorous and must therefore be removed. This attempt to harmoniously relate spaces and uses is one of the bases of urban planning: the siting of the Exchange represents an early example of governmental authority being used to this end in North America.

In erecting an exchange as a central and orderly setting in which to transact business, the Charlestonians were acting within a well defined tradition; therefore, it is not surprising that Naylor's building should reflect the idiomatic characteristics of the English exchange—town hall genre. This building type, characterized by an open arcade (serving as a trading floor) surmounted by enclosed upper floors (serving as office space) was introduced into England by Sir Thomas Gresham when he sponsored the construction of the Old Royal Exchange in London (built 1566-1571). In the years that followed, this practical, multipurpose plan was adopted in cities and towns throughout England—in Bridgetown on the Isle of Wight, in Bath, in Bristol, and in Chipping Campden, Gloucestershire. It was natural that such a common building type was repeated in the colonies, and it is precisely Naylor's competence within this tradition that establishes the preeminence of the Charleston building among the colonial structures of this type. Beyond its design and the implications of the site, a generous budget, a high standard of craftsmanship and the extensive use of imported materials helped to insure that the Charleston Exchange would be a notable achievement.

From the earliest mention of the Exchange project, on May 9, 1766, one can trace through contemporaneous documents the planning and construction of the building until the final payment to the builders on January 4, 1772. Following the acceptance of Naylor's plans, the "full Board of Commissioners for the building the New Exchange and Custom House agree to have Peter and John..."


5. Idem.
Horlbeck, Charleston builders complete that edifice for the sum of forty thousand, nine hundred and thirty-five pounds." The Horlbeck brothers' contract was sealed on March 14, 1768. Upon obtaining the contract, John Horlbeck journeyed to England to obtain materials for the building, and by mid-winter we find in the South Carolina Gazette that:

"Last Thursday evening arrived, in the brigantine Jolleff . . . a large quantity of portland stone for the new Exchange in this town, with Mr. John Horlbeck, one of the contractors for building that edifice. This is the third importation of this kind for that work." 8

The detailing of the facade, the stairs, banisters, balusters and akroteria, as well as the bases and plinths of the pilasters were of English portland stone, the roofing was a Welsh carnarvon slate, the wood work in the basement and at grade was of cypress, mahogany was evident on the interior and the best London Crown glass was used in glazing the windows. In short, having adopted English building types, the Charlestonians attempted to meet English standards of construction. In this, of course, the Charleston Exchange is exceptional in the colonies. Three notable buildings of the exchange type preceded Naylor's building in North America. The earliest of these was the Old Court House or Town Hall in Philadelphia which was built in 1707. It was a simple brick structure with three arches on each side and one on each end defining the covered market place; above this was a meeting hall. Its roof was crowned by a simple cupola. The second colonial arced market with assembly rooms above was Boston's Faneuil Hall designed in 1740 by the English painter John Smibert. Like the Philadelphia structure, Faneuil Hall is of brick. It lacks an elevating basement story, and its Paladian devices are severely limited. Perhaps the third such structure, the Brick Market in Newport, most nearly approaches the dignity of the Charleston Exchange. 9 The Brick Market, constructed in 1761-1772 to the design of Peter Harrison, is contemporaneous with Naylor's work. The articulation of the Brick Market facade possesses an assurance not found in Faneuil Hall, but like Faneuil Hall it is unable to overcome the diminutive scale of its materials and the isolated nature of its ornament. The Charleston Exchange, on the other hand, makes an impression through the extensive use of large units of stone, cut, dressed, and imported from England. Naylor's building is exceptional in the colonies for adhering to the materials necessary to present effectively the linear precision of the Palladian style.

8. South Carolina Gazette, January 26, 1769.

Historically as well as architecturally the Charleston Exchange is important, for it was the site of many stirring events related to the Revolution. Indeed, the very origins of the building itself are bound up in the pattern of pre-Revolutionary tensions. During the mid 1760s the Charleston merchants were active in the increasingly bitter intrigues which led to the repeal by Parliament of the infamous Stamp Act. News of the repeal of the Stamp Act was received in Charleston on May 3, 1766. The Exchange project was initiated by the Commons House on May 9, 1766. It is significant that the Exchange was undertaken during the first flush of victory, for the Commons House envisioned a building which would house their meetings and would also provide a space for the transaction of their private business. It is telling that in their minutes the structure is initially referred to as "the Exchange," that is, in its private, not its civic function, and subsequently it is often called the "Exchange and Custom House" (in that order). Only rarely is the term "Custom House" used alone. Thus from the outset, one presumes, the Commons House viewed the proposed building primarily as a provincial facility and not as a seat or symbol of royal authority.

As tensions increased the large hall of the Exchange provided a site for a series of meetings which evolved from ad hoc assemblies of the disaffected into ongoing committees and ultimately into new governmental organizations. Thus handbills announced a meeting to be held here on Friday, December 3, 1773, to consider the English tax on tea and to determine a course of action concerning the 257 chests of tea which had arrived in Charleston aboard the ship London two days earlier. Dr. D. D. Wallace describes this meeting saying:

"This meeting is of great importance, for from it has linearly descended in a sense the government of South Carolina. The legislature of the State had its legal predecessor the colonial Assembly; but it actually developed without a break from this mass meeting of December 3, 1773." 10

Those assembled "resolved not to import or buy any tea taxed for raising a revenue in America." At least two more meetings were held on this issue, then on December 22, 1773, the Custom officers, working at dawn before the city awoke, unload the London and stored her tea in the basement of the Exchange. Another load of tea was stored there in June, and another in July. Tensions did not abate as:

"Captain Maitland brought a lot of tea in July, which he promised the general committee he would either

burn or carry away. On its being landed by the Customs officers, Maitland was pursued by a mob of several hundred men, who entered his ship from one side as he escaped to a man-of-war from the other. His ship was removed from the wharf the next morning for fear of its being burned."

As a climax of the tea tax demonstrations the Charlestonians dumped a shipment arriving on November 1, 1773, into the harbor.

The Exchange was the setting of several notable events during the Revolution. Before Charleston fell to the British in 1780, General Moultrie hid a large quantity of gunpowder in a portion of the cellar of the building. He had the access to this area bricked up, and the British, even though they used the cellar as a dungeon, did not discover Moultrie's cache. In its capacity as a prison the building was not a complete success: from it the Capers brothers made good their escape by leaping from an upper story window. Not so fortunate was Col. Isaac Hayne, the most famous prisoner held here. He was led from the Exchange and hanged without trial in 1781.

In happier times after the Revolution it was in the Exchange that Charlestonians staged the festivities surrounding George Washington's visit to the city in 1791. Washington's Diary notes that on May 2, 1791, upon entering the city, he reviewed a procession from the Exchange. Then, he writes, on May 4th "... in the evening went to a very elegant dancing Assembly at the Exchange—At which were 256 elegantly dressed & handsome ladies." The following day he "... went to a Concert at the Exchange at wch. there were at least 400 ladies the number & appearance of wch. exceeded anything of the kind I had ever seen."¹²

Thus, in the Charleston Exchange we are fortunate to possess a building which is not only architecturally distinguished but which is also associated with the Revolution, George Washington, and, by his own account, with hundreds of beautiful women.

¹¹ Ibid., p. 111.
"Most American cities are approached in a singularly unattractive manner. There are only rare examples of a beautiful and exceptional initial vista of a major metropolitan center. Columbia, as entered from the west, has unusual potential, which at present is by no means exploited."

— Harlan E. McClure, Dean College of Architecture

As the skyline of the city looms up with the riverbanks in the foreground, the Congaree River forms a true sense of threshold. Despite this potential, the area has not been satisfactorily developed even though it is only a stone's throw from the Central Business District and the State House.

The following article, written by students Jerry Higsby and Michael Spivey, concerns the Fifth Year Design Studio's research and design proposals for the Canal Quarter in Columbia, S.C. Additional student participants were Brad Bauss, Mary Bissett, Chris Coffin, Warren Eng, Phil Gibson, John Heyrlich, Jacques Legette, James Simmons, Jim Spell, John Walters, Paul Whitaker, and John Wilson. The project was directed by Dean Harlan McClure and Professor Olgun Ersenkal.
The South Carolina State Commission of Corrections is implementing a reorganization of the State prison system. A major thrust of this program is the decentralization of existing prison facilities along the Columbia Canal in favor of smaller, more regional facilities throughout the state. At the suggestion of John C. West, former governor of the state of South Carolina, and William D. Leeke, director of the South Carolina Department of Corrections, the Commission of Corrections invited the College of Architecture, through the Clemson Architectural Foundation, to undertake planning and architectural studies to project a possible future land use for the Central Correctional Institution site. The detailed study includes a proposal for the area surrounding the institution as well as the CCI property itself. The central city, regional, and state influences of the site were taken into consideration, as were the previous studies of Doxiadis, COATS, Seaboard Park, and Central Midlands.

The study area is bounded on the north by Elmwood Street, on the east by Assembly Street, on the south by Gervais Street, and the west by the Congaree River and the Columbia Canal. The prison site is located on the Columbia Canal, north of the Hampton Street Bridge construction. Since this northwest quarter of the central city is the only quarter bounded by the Columbia Canal, it will be referred to hereafter as the Canal Quarter.

The Canal Quarter is the least efficiently used portion of Columbia due to large areas of vacant and under-utilized land. Riddled with vacant warehousing, seldom-used railroad spurs, transient and slum housing in contrast with buildings of historic and political importance, Canal Quarter is the quadrant of Columbia with the greatest potential for future use.

Census figures and economic research indicated that Columbia was contracting in the areas of manufacturing but expanding in governmental, commercial, service, and residential requirements. According to projections from previous studies, the future square footage requirements by the year 2000 are:

<table>
<thead>
<tr>
<th>Categories</th>
<th>Sq. ft. increases</th>
</tr>
</thead>
<tbody>
<tr>
<td>Government</td>
<td>1,073,000</td>
</tr>
<tr>
<td>Service</td>
<td>150,000</td>
</tr>
<tr>
<td>Commercial</td>
<td>2,302,000</td>
</tr>
<tr>
<td>Residential</td>
<td>7,341,000</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>0</td>
</tr>
</tbody>
</table>
Existing and projected land cost and future square footage requirements determined the density and massing of buildings. This led toward an optimum proposal making use of existing land and facilities to provide the area with an ultimate development in land use capability and intensity.

The proposal consists of:

Expansion of the existing downtown area composed of shopping, government, service, and high-density residential facilities.

The retention and further development of a pronounced historical district, presently known as Arsenal Hill.

The re-routing of a proposed north-south freeway.

The unification of seldom-used rail lines into a common corridor presently occupied by the Seaboard Coast Line (AMTRAK).

A transportation center in the heart of the expanded downtown area.

The conversion of the existing canal front and river into a public recreational area.

High and medium density housing with supporting commercial over the rest of the area forming separate vehicular and pedestrian links to the riverfront.

Columbia has a potential for future growth because of its geographical location and its performance as a governmental center for the state of South Carolina.

Development of an area as large as the study area would be almost impossible to accomplish in one giant building program. It is proposed instead that the study area be developed in five phases. These phases are to be accomplished over a period of years, causing a minimum disruption to the city's necessary functions. Within each phase are certain action areas which should be implemented immediately.
Phase 1 — Historic Area Development
Establish a conservation program designating buildings and areas for preservation.

Phase 2 — Riverfront Development
Improve services to the area, and clean and improve the natural environment.

Phase 3 — North-South Expressway and Transportation Center
Designate and purchase land according to determined right-of-way (coordinate actions with railroads to reduce the duplication of rights-of-way).

Phase 4 — CBD Expansion
Establish zoning for the area in accordance with the study area and Central City plans.
Establish public transportation to increase access to the area.

Phase 5 — Housing
Prepare vacant and deteriorating areas for development.
Establish zoning for residential development.
Improve services to the environment within functioning neighborhood units in this area.
Establish communication and participation by residents within the planning process for the area.

Our proposal is a reassessment of existing proposals and a projected image of the study area with design decisions made at this point in time. The study area and the city as a whole must reflect the wishes of those who live and work there.

Our proposal for the development of the CCI site is only an image of optimum development of the site. It is important to realize that regardless of what form the development of the CCI property will take, the canal and riverfront are and will remain a very real and compelling opportunity.
The accompanying photographs represent one scheme for a planetarium and observatory for Clemson University. The concept was dictated by an existing water storage tank and was designed by Tony Keith, a fourth-year Pre-Architecture student.
When you think it's too soon to call an architect, maybe you should.

Before long you’re going to need more space, or remodeled space, or new facilities in another location.

Your construction plans may have been delayed or set aside recently because of the economy. Now things are looking better—but not so rosy that you’re ready to rush out and start building.

Now’s the time your architect can help you most—by taking time to plan with you, to analyze the facilities you have, and explore with you the space needs you’ll be facing in the future.

There are a lot of situations where it pays to give your architect, and yourself, some extra planning time. We have a booklet that describes some of them. It’s free for the asking.

Ask The American Institute of Architects, 1735 New York Avenue, N.W., Washington, D.C. 20006
A CULTURAL CENTER BY COINCIDENCE

On the 200th anniversary of the beginning of the American Revolution South Carolina stands on the brink of another revolution of a completely different nature. This time it will be cultural, rather than political, in the form of a cultural complex covering most of five city blocks practically in the shadow of the State Capitol dome.

Quite by coincidence, a few years ago several state agencies and institutions needed new facilities and agreed to build on adjoining sites in the Senate Street Historic and Cultural District. This area already contained the Columbia Art Museum, the State Archives and History Building and the State Library and adjoined the northern perimeter of the University of South Carolina.

These new facilities included a headquarters building for South Carolina Educational Television, the new State Museum and a "variable volume" performing arts auditorium and 1200 car parking garage for the University. Though each facility was to be funded, designed and constructed separately, then Governor John West appointed a Cultural Center Steering Committee in an effort to bring about more coordinated results.

This Steering Committee was composed of representatives of the agencies and institutions involved and of the executive and legislative branches of state government. Working under the philosophy of flexible cooperation, rather than of strict master planning and design coordination, it selected landscape architect Edward D. Stone, Jr., to work out a site plan tying together the works of four architects. Some design guidelines, mainly the use of the same color and finish for all exposed concrete, were agreed to by the architects.

One of these facilities, the University parking garage, is under construction and scheduled to be completed by this coming summer. Because of the economic slow down and consequent revision of state spending policies construction of the other buildings may be delayed. Though funds for the SCETV building and the auditorium were initially appropriated and details of the plans are revealed in this issue, no funding for the State Museum has yet been made and officials have made little known about the building other than its general shape and location.

In spite of the uncertainty surrounding its immediate future, the cultural complex, when completed, will be unique in the world because of the presence of the ETV facility at its center. This will make possible the instantaneous transmission and/or recording of performances, exhibitions and programs taking place within the various buildings. Through modern television and radio communications systems this group of buildings on a relatively small area of land in Columbia could become the educational and cultural resource center for the entire state.

UNIVERSITY PARKING GARAGE. This 1200 car parking garage for the University of South Carolina, designed by Wilbur Smith & Associates—Columbia Architectural Group, is the only new building in the Cultural Center to get under construction so far. It was partially completed and providing parking at the end of the year.
CULTURAL CENTER SITE PLAN. This scheme worked out by landscape architect Edward D. Stone, Jr., of Miami, Florida, shows the relative locations of the buildings located in, and adjacent to, the Cultural Center. Unfortunately, at the time of publication, this plan had not been updated to show the finalized shapes of any of the new buildings with the exception of the SCETV Headquarters.
The $8.4 million auditorium planned for the University of South Carolina campus will actually be four theatres in one. Through the use of movable lights and acoustical materials, the "variable volume" auditorium will be readily adaptable to four different theatre sizes ranging from 700 to 3,000 seats.

The flexibility of the auditorium will not only fill a University need, but it will also meet the needs of state groups such as the S. C. Art Commission and community groups such as the Columbia Philharmonic. Several other state and community groups have expressed active interest in using the new auditorium. It will be available for events such as lectures, meetings, theatre, opera, symphony and other musical performances held by the University, Carolina student
groups, state agencies or community groups. Its location on the edge of campus on the block bounded by Pickens, Pendleton, Henderson and College streets, will give ready access to the community.

The flexible design is a creation of internationally-known theatre designer George Izenour of Yale University. Instead of using expensive movable walls and ceilings to vary the size of the auditorium, movable lights and acoustical materials (drapes) will be used to change the volume of space. To make the volume smaller, the drapes and lights, which will be suspended from the ceiling, will be lowered to block off rear portions of the auditorium, this providing proper acoustics and giving the illusion of a small theatre.

There will be basically four different sizes depending on the use of the drapes and lights—700 seats, 1,400 seats, 2,400 seats, or 3,000 seats.

The auditorium is designed not only for flexibility, but also to assure that there will not be a bad seat in the house. The balcony will be suspended from the ceiling and the walls so there will be no pillars to obstruct the view. The seating arrangement will be "continental style"—that is, there will be no radial aisles and the audience will enter and leave the auditorium from side doors. The seat farthest from the stage will be only 125 feet away.

The side doors from the auditorium will open into corridors connected to a multi-level entrance lobby area which will be covered by a slanted metal frame and glass enclosure in the "greenhouse" vernacular popular with many contemporary designers.

On the exterior the auditorium will be connected by a raised plaza to the SCETV Center on one side and on the other to future buildings of the performing arts group—a music building and recital hall and a drama building and theatre.
The South Carolina Educational Television Network's program calls for a headquarters building to house approximately 500 employees (by 1982). This building will enable ETV to centralize its operations from its present thirteen buildings which house more than twenty various departments into one major headquarters for television production and transmission. The ETV headquarters will occupy the functional and graphic focal point of the cultural complex. In order to accommodate the internal requirements of ETV, create a gathering place and establish all of the necessary external relationships of architectural compatibility and pedestrian flow to, from, and through the building, a complex, yet simple structure has evolved. The ETV building will be four stories high and will rest on a 360 foot podium. It will have semi-contained plazas on the north and south sides created by huge angular recesses taken out of an otherwise square floor plan. At the apex of these angular plazas will be clear glass canopies which will lead into a great glassed over court. It will be the commons for all 500 ETV staff members, and at the same time will be open to other pedestrian traffic. This modern day galleria is intended to become the heart of the total cultural complex. It is envisioned as also being an additional major studio, a place to film outdoor scenes, crowd scenes, etc. The building and its two plazas will house approximately twenty separate departments or functions including new executive offices, five large production studios, art and photo departments, set construction and storage, numerous required engineering departments, a radio station, TV and radio transmitting facilities and
many needed additional departments such as scheduling, programming, finance, shipping, field services, tape and cassette storage, a large printing plant, and a conference and visitor center.

ETV being the central building in the complex relates in some manner to every other building. Therefore selection of materials required very careful consideration. Several of the other buildings were to a large extent monolithic by function, i.e.; the auditorium, the garage, and the museum, yet at the same time within the ETV organization there was a great desire to take advantage of the numerous excellent views and have glass in many areas. The solution was to use a total skin of dark bronze glass in combination with a warm colored concrete with a medium sandblast finish for the podium and the precast parapet.

This concrete selection related in color and texture to the exposed concrete surfaces of the other buildings and the connecting bridges because all architects had agreed to specify the same color and finish for all exposed concrete. The dark bronze glazing with the accented horizontal mullions of bright metal will reflect the buildings on the adjacent sites and allow vision glass wherever desired while still providing a very unified exterior appearance. This highly controlled use of glass for a building whose function is as technical as the total creation, production and transmission of educational television serves to express the function of ETV and hopefully become its symbol.

Close-up views of model.
FREEMAN, WELLS AND MAJOR

First Federal Savings and Loan Association, sited on an entire triangular block in downtown Greenville, is designed to be an important visual part of the Cultural Center located directly across the street. With customer convenience in mind, direct access is provided from any of three parking deck levels into the various departments of the Savings and Loan. The building reflects the progressive image of the Association. Its unique appearance is an expression of a very straightforward structural grid, and the solid masonry walls in the facade provide sun control and create constantly changing patterns of sun and shadow.

Fike Recreation Center at Clemson University featuring the recently completed 113,000 square foot addition to the Old Field House, gives a Physical Education Complex of some 170,000 square feet to be used primarily for intramural activities. The renovation of the “Big Gym”, for years the scene of Clemson’s basketball games, provides four full-sized basketball courts interchangeable for volleyball. The largest segment of the new addition contains a competitive NCAA swimming pool and adjacent diving well, seating for 1000 spectators, as well as
sun deck and locker rooms. Facilities have been provided for competitive fencing, judo, wrestling, and gymnastics, as well as areas for weight lifting, boxing, creative dancing and several large multipurpose spaces. One wing of the new addition houses ten handball courts to provide for this rapidly growing activity. The exterior of the building is primarily of brick with one facade of bronze spandrelite glass. The interior spaces are of concrete and exposed concrete block, and the natatorium features the largest single postensioned span in the country. Tartan decking is utilized throughout the dressing rooms, natatorium, activity areas and gymnasium, giving these areas a quality seldom found in spaces utilized for student activities.

University Square Shopping Mall in Clemson is a mini-mall of specialty shops all opening into a central interior courtyard. Parking is provided at the perimeter of the site and entrance into the shopping space is located conveniently at each corner. The landscaped central space is designed to be a very busy and active place with redwood decks provided for various entertainment activities. To blend the building into its natural wooded surroundings, rustic cedar siding was used along with redwood decks.
Architectural offices of the firm in the Bankers Trust Tower exemplify the concept of architects and interior designers working hand in hand for a better environment. An open landscape system of four-foot-high natural oak partitions is employed in all design and drafting areas to provide the kind of flexibility that has always been needed while at the same time offering greater individuality, dignity and privacy for the professional staff. Modern "sit down—tilt up" drawing boards are used by all departments and live plants add color and interest in both the offices and the large open areas. The executive offices also reflect this open landscape concept with partitions of dark bronze transparent glass along the main interior corridors. Oak parquet flooring defines traffic areas while dark brown carpeting is used in the offices and general work areas.
Fort Jackson EM Training Barracks is a new type of facility for the Army. Each barracks is actually a three-story complex, housing under one roof an entire battalion of five 224-man companies. The ground floor of each building is devoted to support functions including administration, supply, covered training areas for each company, and shared battalion functions such as two large lecture halls, complete dining facilities, and battalion administrative offices. The second and third floors consist of company sleeping areas and separate training staff quarters. Each building contains seven large courts around its perimeter and six courts within the plan. Prefabricated sloped brick sills, utilizing high-strength mortar, were extensively throughout the project as a design feature, thought to be a first in military construction.

WILLIAM BAILEY KAURIC

Renovations and additions to R. G. Bell Camp, the University of South Carolina recreational facility built in the 1930's, were designed to maintain a quality and rhythm of proportion while providing for the needed expansion and attitude change. Stained plywood siding and rough textured shingles help sustain the rustic atmosphere while large skylights provide natural lighting inside.
The Women Marine Complex at Parris Island has all buildings organized around a series of interrelated courtyards, each different in size and expression. This results from an attempt to produce a compact, cohesive and functional organization without sacrificing the identity and variety factors. The first and largest courtyard is essentially a paved space surrounded by a single row of trees and functioning as a drill and formation area. Relating to this space are battalion administration, classrooms, recruit barracks, mess hall, and exchange facilities. This area spills into a slightly smaller courtyard, more intimate in nature, containing numerous trees, a reflecting pool and seating areas. Clothing issue, physical education, and headquarters barracks define this area. The last and smallest...
courtyard is formed by the headquarters barracks and functions as an area of privacy, although nevertheless strongly interlocked with the other elements of the Complex.

**Interior design** in the SCN Building in Greenville for 60,000 square feet of space occupied by the South Carolina National Bank was handled by Sirrine. In the 70 foot square clear span, two story main banking lobby, sculptor John Acorn of Clemson was commissioned for the centrally placed sculpture which rotates one revolution per hour on the check writing desk. The sculpture features twenty vertical elements, all different in shape and carved out of laminated mahogany. The radial patterns of warm toned brick denote various major areas of activities and is particularly dominant when viewed from the mezzanine.

**North Greenville General Hospital** at Travelers Rest is a 26,000 square foot one-story building containing 15 patient rooms accommodating 29 patients. Kitchen-dining, operating, emergency, radiology, and lab facilities are also included in this satellite hospital. The exterior design is of one material, a light beige colored brick, which allows the massing and window treatment to express the architectural statement.
First National Bank at Florence with intersecting sculptured masses of tan, textured split-rib block and off-white aggregate panels with reflective glazing, reflecting different nodes of spatial activities, helps to relieve the commercial strip image along the busy thoroughfare of this section of US 76. The second floor mass extends below the glazing to form a canopy over drive-up teller units, looping traffic away to a quieter side collector street. Landscaping also helps soften the site. Inside, normal commercial bank activities fill the first floor; while operation activities occupy the second floor, where private access is also available to a multi-purpose room for community services.

The Temple Residence in Florence uses natural lighting and materials to complement the key features of this beautifully wooded hill site. Warm stained yellow pine reverse board and batten cladding is punctuated by the shadow box detailing of vertical casement windows. Clerestory light brightens over 60% of all interior spaces. Interior circulation is multi-level, flowing outside through the use of decks, balconies, and patio. The 4,000 square feet encloses a large living and dining space which opens down to a recreation room and spins underneath to a bar by the patio. There is a library/study upstairs by the master bedroom and downstairs by the kitchen is a spacious pantry and breakfast room.
The Robert Freeman Residence on Hilton Head Island was designed to produce a contemporary setting, compatible with the owner's antique furniture and oriental rugs, and spacious and casual interior areas with maximum views of the surrounding amenities (lagoon and Harbour Town golf course). The owner requested a large family style kitchen area, segregated circulation plan with all major areas of the house accessible from the entrance foyer, private exterior space from the master bedroom suite and outdoor entertaining spaces. The 3600 square foot structure has tabby stucco walls and a cedar shake roof.

The Fox Residence, designed for a large family on a secluded spot off the Inland Waterway near Charleston, is inspired by the local environment. The exterior is of Coquina stucco and carefully oriented glass. The interior is expanded by panoramic views. The one story section houses open-plan living, dining, and kitchen spaces, while the two story section contains private areas for each family member.
LAFAYE ASSOCIATES

Marion Street Apartments in Columbia is a 95,000 square foot apartment house for the elderly of moderate means containing 117 apartments on 15 floors and a ground floor of offices and community rooms. The site is approximately one half of a city block not far from Downtown Columbia. The structure is reinforced concrete with brick veneer.

CRAIG AND GAULDEN

Northwest Middle School is located in the foothills of the Blue Ridge Mountains in upper Greenville County. It features large open areas for team teaching. Toilets with mechanical spaces above are enclosed in separate roofed building forms set adjacent to the main school unit. There is a total of 102,360 square feet accommodating 1,000 pupils.

RILEY BULTMAN COULTER

Medical and dental offices are housed in this building adjacent to the Lexington County Hospital in a development devoted to allied usages. In addition to the owner's suite, designed for the practice of dentistry, the building contains other rental suites. The basic design has 2 two-story buildings with an open connecting entrance/stair/elevator area. The building is located in the center of the property with a parking area on either side, both with access to each of two fronting streets. The structure is steel frame. Exterior and interior walls are steel studs; the exterior is veneered with face brick. Projecting double-door rooms on the building exterior are "service spaces" to house gas cylinders, pumps, maintenance equipment, etc.
SCAIA
As of January 1, 1976

FELLOWS
CARLISLE, W. A.
LBC&W, Inc.
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

FREEMAN, W. E., Jr.
Freeman, Wells and Major, Architects
401 Webster Street
Greenville 29601
233-1642

HARMON, G. THOMAS, III
Harmon & Keenan
3350 Millwood Avenue
Columbia 29205
254-3904

HEMPHILL, JAMES C., Jr.
James C. Hemphill, Jr.
428 Cothran Street
Greenwood 29646
223-2571

LYLES, W. G.
LBC&W, Inc.
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

McCLURE, HARLAN E.
Dean, College of Architecture
Clemson University
Clemson 29631
654-2862, 656-3081, 3082, 3083

WOLFF, LOUIS M.
LBC&W Inc.
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

MEMBERS EMERITUS
BISSETT, T. J., FAIA
5629 Lakeshore Drive
Columbia 29206
787-3716

BOOTH, LOUIS S.
Lockwood Greene Engineers, Inc.
Box 491
Spartanburg 29301

ALLEN, PAUL
Wade H. Barber, AIA
400 Pettigru St.
Greenville 29601

BARNES, JAMES P.
James P. Barnes, AIA, Architect
505 W. Cheves Street (P. O. Box 790)
Florence 29501
669-0014

BARNES, Read
Read Barnes, Architect
155 East Bay Street
Charleston 29401
577-5791

CORPORATE MEMBERS
AIKEN, RALPH H.
J. E. Sirrine Company, Architects-Engineers
252 South Pleasantburg Dr.
(P. O. Box 5456)
Greenville 29606
271-9350

ALEXANDER, FRANK EUGENE
Alexander & Moormann, Architects, AIA
218 Newberry Street, S.W.
Aiken 29801
648-6833

ALLEN, PAUL
Paul E. Allen, Architect
731 Santee Avenue (P. O. Box 5762)
Columbia 29250
771-0327

ANDERSON, RICHARD N., JR.
Darlington County School District
Information & Publication Center
255 Blue Street
Darlington 29532
393-7411

ANDERSON, WILLIAM H.
Pearlstone and Anderson, Architects, AIA
3106 Devine Street
Columbia 29205
779-5480

BANKES, BARRY A.
Barry A. Bankes, Architect
14 E. Plaza
Lewis Plaza Shopping Center
Greenville 29605
235-3449

BARBER, WADE H.
Wade H. Barber, AIA
400 Pettigru St.
Greenville 29601

BASHOR, MELVIN
Vickery, Allen, Bashor Architects/Engineers/Planners
2720 Wade Hampton Boulevard
Greenville 29607
244-8344

BATES, CHARLES L.
Bates Associates, Architects-Planners
P. O. Box 1037
Hilton Head Island 29928
785-2183

BAYLESS, CHARLES N.
Charles N. Bayless, Architect
69 Meeting Street
Charleston 29401
723-3593

BEAMAN, WALLACE DAN
Neal Architects, Inc.
11 Cleveland Court
Greenville 29607
235-0405

BENNETT, JAMES L.
LBC&W, Inc.
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

BLUME, EDWARD S., Jr.
Blume, Cannon & Ott, AIA
2230 Devine Street
Columbia 29205
771-4706

BOUDREAUX, JOHN A.
LBC&W, Inc.
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

BOWDEN, WILLIAM A.
3710-1 Lodge Drive
Birmingham, Alabama 35216

BOYKIN, HENRY D., II
Henry D. Boykin, II, Architect, AIA
605 Monument Square
Camden 29020
432-3233

BRANNON, MICHAEL J.
Brady & Brannon
P. O. Box 1362 (114A North Trade Street)
Tryon, North Carolina 28782
(704) 852-4905

BROWN, BRUCE K.
The Architectural Office of Bruce Klee Brown
511-B Wilton Street
Greenville 29609
233-5868

BROWNING, VICTOR S., Jr.
Neal Architects, Inc.
1 Cleveland Court
Greenville 29607
235-0405

BRUCE, JAMES E.
Columbia Architectural Group
Bankers Trust Tower
P. O. Box 92
Columbia 29202
799-8856

BUCKLEY, MARTIN B.
Martin B. Buckley, AIA, Architect
1724 Green Street
Columbia 29201
799-8884

ARCHITECTURE / 47
UPSHUR, ROBERT I.,
Director, Office of School Planning & Building
State Department of Education
1112 Rutledge Building
Columbia 29201
733-2724

VAUGHN, WALLACE DAN, JR.
Springs Mills, Inc.
Fort Mill 29715
547-2901

VICKERY, ROBERT O.,
Vickery, Allen, Bashor
Architects/Engineers/Planners
2720 Wade Hampton Boulevard
Greenville 29607
242-3700

WARLICK, WILLIAM M.,
Frederick M. Ehni and Associates
66 Society Street
Charleston 29401
723-2284

WASHBURN, JAMES R.,
Wells and Fleetwood, Architects
143 Laurens Street, S. W.
Post Office Box 5898
Anderson 29621
401 Webster Street
Greenville 29601
277-2106

WEBB, JAMES R.,
LBCM, Inc.,
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

WELL, LONNIE D., JR.,
Lambert & Yates, Architects, Inc.
Post Office Box 761
Greenville 29609
225-5711

WEBB, JAMES R.,
Joe W. Hiller, AIA, Architect
Post Office Box 5898
Greenville 29601
277-2106

WEEMS, JOHN W.,
Hallman and Weems, Architects and Landscape Architects
143 Laurens Street, S. W.
Aiken 29801
648-1348

WELLS, JAMES R.,
Freeman, Wells and Major, Architects
401 Webster Street
Greenville 29601
233-1642

WELLS, JOHN WALTER
Wells and Fleetwood, Architects
234 Richland Avenue
Aiken 29801
648-9612

WESTBURY, CHARLES E.,
McMillan, Bunes, Townsend & Bowen
Architects-Engineers
669 N. Academy St. (P. O. Box 1508)
Greenville 29602
242-3700

WESTMORELAND, JAMES B.
Lillard-Westmoreland-McGarity
364 E. Main Street (P. O. Box 2685)
Spartanburg 29302
583-3691

WHITE, MILTON V.,
Ledbetter, Earle and White, Architects
500 North McElwiel Street (P. O. Box C)
Anderson 29621
225-7211

WILKES, GENE C.,
Riddle and Wilkes, Architects, Inc.
Post Office Box 806
Myrtle Beach 29577
449-5202

WILKINS, RICHARD I.,
Gill, Wilkins & Wood, Architects and Planners
Post Office Drawer 3868
Florence 29501
669-8266

WILLIAMS, JESSE P.,
LBCM, Inc.,
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

WILLIAMS, JERRY
Gill, Wilkins & Wood, Architects and Planners
Post Office Drawer 3868
Florence 29501
799-4748

WINESETT, J. DEAN
McGinty & Dye, Architects
Lagoon Road
Hilton Head Island 29928
785-2444

WITHERSPOON, GAYLAND B.,
Head, Dept. of Architectural Studies
Clemson University
Clemson 29631
665-3081

WOOD, ALLEN P.,
Gill, Wilkins & Wood, Architects and Planners
Post Office Drawer 3868
Florence 29501
669-8266

WOOD, AVERY W., Jr.
Avery Wood-Larkin Jennings Associates, Inc.
One Wade Hampton Boulevard
Greenville 29609
242-5450

WOOD, FREDERICK W.,
Piedmont Engineers & Architects
Post Office Box 1717
Greenville 29606
242-1717

YATES, WILLIAM J.,
Lambert & Yates, Architects, Inc.
121 Sharpe Street (P. O. Box 761)
Anderson 29621
225-5711

YOUNG, JOSEPH L.,
College of Architecture
Clemson University
Clemson 29631
665-3081

ZACHMAN, MARK T.,
The Sea Pines Company
Hilton Head Island 29928
785-3333

AIA ASSOCIATE MEMBER
MARSHALL, ALLEN S.,
Columbia Architectural Group
Bankers Trust Tower (P. O. Box 92)
Columbia 29202
799-8856

ASSOCIATE MEMBERS
ALTMAN, DONALD J.,
Geiger/McElveen/Kennedy
1715 St. Julian Place
Middleborough Office Park
Columbia 29204
779-4630

AVENT, HENRY E., JR.,
William Bailey Kauric, AIA, Architect
2908 Devine Street
Columbia 29205
771-0417

BAKER, CLAY E., JR.,
Lucas and Stubbs Associates Ltd.
255 East Bay Street
Charleston 29401
577-4444

BARNHART, CLARENCE M., JR.,
Geiger/McElveen/Kennedy
1715 St. Julian Place
Middleborough Office Park
Columbia 29204
779-4630

BELLAMY, GLENN L.,
LBCM, Inc.,
Bankers Trust Tower (P. O. Drawer 7)
Columbia 29202
779-3000

BOYCE, O. DOUGLAS, Jr.,
Lucas and Stubbs Associates Ltd.
255 East Bay Street
Charleston 29401
577-4444

BRACKETT, ROBIN
William Bailey Kauric, Architect
2908 Devine St.
Columbia 29205
771-0417

BROOM, ROBERT D.,
William Bailey Kauric, Architect
2908 Devine St.
Columbia 29205
771-0417

BRUNER, J. F.,
Piedmont Engineers-Architects-Planners
Post Office Box 1717
Greenville 29601
242-1717

BRYAN, JOHN R., Jr.,
Riley, Bultman, Coulter Associates
6941 North Trenholm Road
Building Q, Suite 2
Columbia 29206
787-0200

CARSON, WILLIAM S.,
McGinty & Dye, Architects
Lagoon Road
Hilton Head Island 29928
785-2444

CARTER, ALLEN R.,
Columbia Architectural Group
Bankers Trust Tower (P. O. Box 92)
Columbia 29202
799-8856

ARCHITECTURE / 53
<table>
<thead>
<tr>
<th>City</th>
<th>Name</th>
<th>Address</th>
<th>Phone</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aiken</td>
<td>Alexander &amp; Moorman, Architects</td>
<td>218 Newberry Street, S.W. 29801</td>
<td>648-6833</td>
</tr>
<tr>
<td></td>
<td>Hallman &amp; Weems, Architects</td>
<td>143 Laurens Street, S.W. 29801</td>
<td>648-1348</td>
</tr>
<tr>
<td></td>
<td>Wells and Fleetwood, Architects</td>
<td>234 Richland Avenue 29801</td>
<td>648-9612</td>
</tr>
<tr>
<td>Anderson</td>
<td>Fant and Fant, Architects</td>
<td>109 1/2 Sharp Street 29621</td>
<td>226-6171</td>
</tr>
<tr>
<td></td>
<td>Lambert &amp; Yates, Architects</td>
<td>Post Office Box 761 29621</td>
<td>225-5711</td>
</tr>
<tr>
<td></td>
<td>Ledbetter, Earle &amp; White</td>
<td>Post Office Box C 29621</td>
<td>225-7211</td>
</tr>
<tr>
<td></td>
<td>Overstreet and Watt Architectural Associates, Inc.</td>
<td>P. O. Box 2392 29621</td>
<td>225-0141</td>
</tr>
<tr>
<td>Beaufort</td>
<td>George J. Madlinger, Jr., Architect</td>
<td>Post Office Box 192 29902</td>
<td>524-5087</td>
</tr>
<tr>
<td></td>
<td>Camden</td>
<td>605 Monument Square 29020</td>
<td>432-3233</td>
</tr>
<tr>
<td></td>
<td>Robert D. Burbank, Architect</td>
<td>Knights Hill Road 29020</td>
<td>432-9331</td>
</tr>
<tr>
<td>Charleston</td>
<td>Silance, Robert T.</td>
<td>William Bailey Kauric, Architect</td>
<td>2908 Devine Street Columbia 29205 771-0417</td>
</tr>
<tr>
<td></td>
<td>Simpson, David Monroe</td>
<td>McMillan, Bunes, Townsend &amp; Bowen, Architects-Engineers</td>
<td>669 North Academy Street (P. O. Box 1508) Greenville 29602 242-3700</td>
</tr>
<tr>
<td></td>
<td>Young, Otto James, Jr.</td>
<td>Riley, Bultman, Coulter Associates</td>
<td>6941 North Trenholm Road Building Q, Suite 2 Columbia 29206 787-8290</td>
</tr>
<tr>
<td></td>
<td>Proffessional Affiliate</td>
<td>Coulter, Richard R.</td>
<td>Riley, Bultman, Coulter Associates</td>
</tr>
<tr>
<td></td>
<td>McElveen, H. Donald</td>
<td>Geiger/McElveen/Kennedy</td>
<td>1735 St. Julian Place Middleburg Office Park Columbia 29204 779-4630</td>
</tr>
<tr>
<td></td>
<td></td>
<td>firms</td>
<td>Firm</td>
</tr>
<tr>
<td></td>
<td>Alexander &amp; Moorman, Architects</td>
<td>218 Newberry Street, S.W. 29801</td>
<td>648-6833</td>
</tr>
<tr>
<td></td>
<td>Hallman &amp; Weems, Architects</td>
<td>143 Laurens Street, S.W. 29801</td>
<td>648-1348</td>
</tr>
<tr>
<td></td>
<td>Wells and Fleetwood, Architects</td>
<td>234 Richland Avenue 29801</td>
<td>648-9612</td>
</tr>
<tr>
<td></td>
<td>Anderson</td>
<td>Fant and Fant, Architects</td>
<td>109 1/2 Sharp Street 29621</td>
</tr>
<tr>
<td></td>
<td>Lambert &amp; Yates, Architects</td>
<td>Post Office Box 761 29621</td>
<td>225-5711</td>
</tr>
<tr>
<td></td>
<td>Ledbetter, Earle &amp; White</td>
<td>Post Office Box C 29621</td>
<td>225-7211</td>
</tr>
<tr>
<td></td>
<td>Overstreet and Watt Architectural Associates, Inc.</td>
<td>P. O. Box 2392 29621</td>
<td>225-0141</td>
</tr>
<tr>
<td></td>
<td>Beaufort</td>
<td>George J. Madlinger, Jr., Architect</td>
<td>Post Office Box 192 29902</td>
</tr>
<tr>
<td></td>
<td>Camden</td>
<td>Henry D. Boykin, Jr., Architect</td>
<td>605 Monument Square 29020</td>
</tr>
<tr>
<td></td>
<td>Robert D. Burbank, Architect</td>
<td>Knights Hill Road 29020</td>
<td>432-9331</td>
</tr>
</tbody>
</table>

**A name to grow on.**

METROMONT MATERIALS

Greenville • Spartanburg • Charlotte
<table>
<thead>
<tr>
<th>Name</th>
<th>Address</th>
<th>Phone</th>
</tr>
</thead>
<tbody>
<tr>
<td>JOHN TABB HEYWARD, JR.,</td>
<td>2320 Devine Street 29205</td>
<td>771-4254</td>
</tr>
<tr>
<td>Architect</td>
<td></td>
<td></td>
</tr>
<tr>
<td>JACKSON, MILLER &amp; Associates</td>
<td>2717 Devine Street 29205</td>
<td>799-6526</td>
</tr>
<tr>
<td>Architects</td>
<td></td>
<td></td>
</tr>
<tr>
<td>WILLIAM BAILEY KAURIC,</td>
<td>2908 Devine Street 29205</td>
<td>771-0417</td>
</tr>
<tr>
<td>Architect</td>
<td></td>
<td></td>
</tr>
<tr>
<td>JACKSON, MILLER &amp; Associates</td>
<td>2717 Devine Street 29205</td>
<td>799-6526</td>
</tr>
<tr>
<td>Architects</td>
<td></td>
<td></td>
</tr>
<tr>
<td>WILLIAM BAILEY KAURIC,</td>
<td>2908 Devine Street 29205</td>
<td>771-0417</td>
</tr>
<tr>
<td>Architect</td>
<td></td>
<td></td>
</tr>
<tr>
<td>LAFAYE ASSOCIATES, INC.</td>
<td>2500 Devine Street 29205</td>
<td>799-3805</td>
</tr>
<tr>
<td>Architects</td>
<td></td>
<td></td>
</tr>
<tr>
<td>LOVE, CORB, McELVEEN,</td>
<td>No. 1 St. Julian Place,</td>
<td></td>
</tr>
<tr>
<td>Architects</td>
<td>Middleborough 29204</td>
<td></td>
</tr>
<tr>
<td>WILLIAM BAILEY KAURIC,</td>
<td>2908 Devine Street 29205</td>
<td>771-0417</td>
</tr>
<tr>
<td>Architect</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FRANK LUNDY, JR., ARCHITECT</td>
<td>618 Ott Road 29205</td>
<td>254-4057</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>LBC&amp;W, INC.</td>
<td>Architect-Engineers-Planners</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Drawer 7 29202</td>
<td>779-3000</td>
</tr>
<tr>
<td>MAYNARD PEARLSTINE/WILLIAM</td>
<td>3106 Devine Street 29205</td>
<td>779-5480</td>
</tr>
<tr>
<td>ANDERSON, ARCHITECTS/PLANNERS</td>
<td></td>
<td></td>
</tr>
<tr>
<td>A. A. RICE, ARCHITECT</td>
<td>2065 Blossom Street 29205</td>
<td>771-6944</td>
</tr>
<tr>
<td>RILEY, BULTMAN, COULTER</td>
<td>Building Q, Suite 2</td>
<td></td>
</tr>
<tr>
<td>ASSOCIATES</td>
<td>6941 North Trenholm Road 29206</td>
<td>787-8290</td>
</tr>
<tr>
<td>THE TRIAD ARCHITECTURAL</td>
<td>7130 Frontage Road (US at 1-20)</td>
<td></td>
</tr>
<tr>
<td>ASSOCIATES</td>
<td>29204</td>
<td>788-6290</td>
</tr>
<tr>
<td>WEST COLUMBIA</td>
<td>29 Meeting Street 29169</td>
<td>779-7720</td>
</tr>
<tr>
<td>EDISTO ISLAND</td>
<td>THE LOWCOUNTRY DESIGN ASSOCIATES, LTD.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Box 342 29438</td>
<td>869-2330</td>
</tr>
<tr>
<td>FLORENCE</td>
<td>JAMES P. BARNES, ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>505 W. Cheves Street (P. O. Box 790) 29501</td>
<td>669-0010</td>
</tr>
<tr>
<td></td>
<td>WILLIAM S. DOWIS, JR., ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Box 368 29501</td>
<td>669-5223</td>
</tr>
<tr>
<td></td>
<td>GILL, WILKINS &amp; WOOD, ARCHITECTS-PLANNERS</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Drawer 3868 29501</td>
<td>669-8266</td>
</tr>
<tr>
<td></td>
<td>ERIC M. McCLANAHAN, ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Box 4008 29501</td>
<td>665-5154</td>
</tr>
<tr>
<td>SMITH &amp; FULLER, ARCHITECTS</td>
<td>310 West Pine Street 29501</td>
<td>662-9891</td>
</tr>
<tr>
<td>GEORGETOWN</td>
<td>EDWARD P. GUERARD, ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Post Office Box 463 29440</td>
<td>546-9761</td>
</tr>
<tr>
<td>GREENVILLE</td>
<td>THE ARCHITECTURAL OFFICE OF</td>
<td></td>
</tr>
<tr>
<td></td>
<td>BRUCE KLEE BROWN</td>
<td></td>
</tr>
<tr>
<td></td>
<td>511 Wilton Street 29609</td>
<td>233-5868</td>
</tr>
<tr>
<td></td>
<td>BARRY A. BANKES, ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>14 E. Plaza Lewis Plaza Shopping Center 29605</td>
<td>235-3449</td>
</tr>
<tr>
<td>CRAIG &amp; GAULDEN, ARCHITECTS</td>
<td>12 Washington Park East Washington Street 29601</td>
<td>242-0761</td>
</tr>
<tr>
<td></td>
<td>FREEMAN, WELLS AND MAJOR,</td>
<td></td>
</tr>
<tr>
<td></td>
<td>ARCHITECTS</td>
<td></td>
</tr>
<tr>
<td></td>
<td>401 Webster Street 29601</td>
<td>233-1642</td>
</tr>
<tr>
<td></td>
<td>ROBERT FOSTER &amp; ASSOCIATES,</td>
<td></td>
</tr>
<tr>
<td></td>
<td>ARCHITECTS</td>
<td></td>
</tr>
<tr>
<td></td>
<td>232-4972</td>
<td></td>
</tr>
<tr>
<td></td>
<td>CHARLES F. GENTRY, Jr.,</td>
<td></td>
</tr>
<tr>
<td></td>
<td>ARCHITECT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Downtown Airport Terminal (P. O. Box 5534) 29606</td>
<td>232-2641</td>
</tr>
</tbody>
</table>

---

**MAC KOHN PRINTING, INC.**

207 PICKENS ST. • COLUMBIA, S. C. 29205

Fine Quality Commercial Printing

- BROCHURES
- BUSINESS FORMS
- PUBLICATIONS
- SOCIAL STATIONERY
- MENUS
- WEDDING INVITATIONS
- BOOKLETS
- LETTERHEADS

**TWO CONVENIENT LOCATIONS**

Main Plant: 207 Pickens Street – Phone 799-4496

Insta-Print Plant: 2307 Devine Street – Phone 799-8530
“Green H. Giebner, AIA, P.E.
Post Office Box 2698 29602
232-4671

E. Lonzo Greene & Associates, Architects, AIA
Post Office Box 5559 29606
232-7381

Joe William Hiller, Architect
Post Office Box 5559 29606
232-7381

James R. Lawrence, Architect
Post Office Box 5898 29606
232-5411

Liles, Clarke, Architects, Inc.
Century Plaza (P. O. Box 5023) 29606
235-6361

J. Harold Mack & Associates, Architects
408 N. Church Street 29601
235-6362

McMillan, Bunes, Townsend & Bowen, Architects-Engineers
669 North Academy Street (P. O. Box 1508) 29606
242-3700

James D. Miller and Associates, Architects and Planners, LTD
1010 East North Street 29601
242-0177

Neal Architects, Inc.
11 Cleveland Court 29607
236-0405

Piedmont Engineers, Architects, Planners
Post Office Box 1717 20602
242-1717

J. E. Sirrine Company
Post Office Box 5456 29606
271-9350

The Tarleton-Tankersley Architectural Group, Inc.
Post Office Box 5265 29606
235-1611

Townes, Associates, Ltd., Architects
Post Office Box 5396 29607
233-4556

Vickery, Allen, Bashor Architects/Engineers/Planners
2720 Wade Hampton Boulevard 29607
244-8345

James R. Washburn, Architect
522 S. Main Street 29601
582-0380

Avery Wood-Larkin Jennings Associates, Inc.
One Wade Hampton Boulevard 29609
242-5450

Greenwood
Greenwood Associates, Inc., Architects-Engineers
Post Office Drawer A 29646
223-0855

James C. Hemphill, Jr., Architect
428 Cothran Street 29646
223-2571

J. Alison Lee, Architect, AIA
303 Montague Avenue (P. O. Box 3195) 29646
229-3709

Hartsville
Clark & McCall, Architects
Post Office Box 788 29550
332-7443

John D. Leach, Architect
Post Office Box 866 29550
332-7812

Hilton Head
Charles L. Bates, Architect
Post Office Box 1037 29928
785-2183

John Bulcken, III, Architect
71 Plantation Lane, Sea Pines 29928
671-4676

Robert H. Christian, Architect, AIA
139 Wagon Road 29928
785-2376

Corkern and Associates, Inc.
Post Office Box 5340 29928
785-4236

Joseph K. Hall, Architect
Post Office Box 5216 29928
785-4750

Kurt E. Herrman, Jr., Architect
Post Office Box 5415 29928
785-2733

Keane/Sherratt, Architects
Post Office Box 6067 29928
785-4752

Barnard/Kennedy/Hancock
Palmetto Bay Road 29928
785-2576

Southeastern
Concrete Products Co.

P. O. Box 104 Phone 794-7363 Cayce, S. C. 29033

All Types Concrete Masonry Units
Concrete Block • Brick • Pipe

Concrete Parking Areas
A new architectural dimension. Only comment that combines economy with good de- crete enables the architect to provide a pave- sign and years of uninterrupted service. And now, due to the increase in oil prices, the economy is greater. For information, call

Pro Photo Specialists
1106 Hagood Avenue • P.O. Box 11677 • Phone (803) 799-0446

A Lot Happens Before and After the Click! Before the shutter’s click, the photographer has already started the job. First, the right idea, research and consultation with the client, selecting a location or a studio setup. Then the camera choice—matching the format to the subject—adjusting perspective and composition, balancing the light and making sure the film is right for the task.

After the click there’s the lab work, creating the final images, for display or reproduction, in color or black and white prints or the new Cibachromes, and from wallet to wall size.

A lot goes in to a professional photograph. Pro Photo Specialists does all of the work before and after the click. So, get clicking and call us for a look at our portfolio.
With a full depth asphalt pavement structure, you can have your cake and eat it too!

Use the asphalt base as a weather proof deck for construction equipment and for stockpiling building materials.

With asphalt base, mud is a thing of the past. The asphalt base is placed directly on the prepared subgrade and can be used almost immediately. It requires no protection from bad weather.

When building construction nears completion, the tough, but smooth, asphalt surface is placed on the durable asphalt base. Then you have a new asphalt pavement surface to complement the grand opening.

S.C. Asphalt Pavement Association
Box 11448
Columbia, S.C. 29211
DO YOUR CLIENT'S PI
CALL FOR THE
PROFESSIONAL
OF AN AUDIO-VID
EO SYSTEM

The R. L. Bryan Company's Audio-Visual/Video Sys-
tems Group has designed installations for business,
industry, education and government—from sophisti-
cated CCTV security/surveillance, video production and
RF distribution systems to elaborate conference and
media room installations.

Contact The R. L. Bryan Company for your audio-
visual and video systems design needs.

The R. L. Bryan Company
301 Greystone Boulevard / P. O. Box 368
Columbia, South Carolina 29202
S. C. Toll-Free Number (800) 922-2708