THIS REPORT WAS FINANCED IN PART BY A GRANT FROM THE APPALACHIAN REGIONAL COMMISSION, ADMINISTERED THROUGH THE NORTH CAROLINA DEPARTMENT OF COMMERCE, DIVISION OF COMMUNITY ASSISTANCE.
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Economic Development & Planning Office
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INTRODUCTION

The Swain County Planning Program was made possible by the generous contributions of the Appalachian Regional Commission, Swain County, and the North Carolina Department of Commerce, Division of Community Assistance. This document has been produced by the Swain County Economic Development and Planning Office, which operates under the advisement and the authority of the Swain County Economic Development Commission and the Swain County Board of Commissioners.

The Swain County Planning Program is part of the Mountain Area Planning Program, which is designed to allow communities within the western-most, mountain counties a vehicle to understand and direct their future development patterns. Through this program, each local government will be assured of addressing issues of both growth and stagnation. Most counties are plagued by uneven development consisting of pockets of expensive homes and boutique shops down the road from shanty towns of forgotten mountain people. The mountain counties are beginning to change at a rapid pace and without the proper guidance, the road ahead will be unclear and difficult.

FOCUS

One specific guideline of the Mountain Area Planning Program is that this "land use plan" include a land classification map which allows the reader to visually interpret the future land uses for the County. There are in addition, several other maps being utilized to graphically represent the present land uses within the County. As you read through this document, it will be helpful to refer to the maps at the beginning of each pertinent section. These maps are beneficial in illustrating the planning process, which is often a new concept to many land owners in the mountains of western North Carolina.

Organized land use planning with heavy involvement from the local community is a new concept for Swain County. Due to the novelty of planning, there has been and will continue to be considerable resistance to the government assisting or mandating changes in land use. Land use plans in North Carolina are often centered along traditional lines of a comprehensive and long-term format. This type of plan can easily run counter to the needs of a rural community. For many individuals both in and out of local government, planning has taken on a definite negative connotation. "The mythology of comprehensive planning can generate the appearance of action without the substance. The products of planning--maps, charts, projections--can lull planners into an illusion of improvement" (Libby 106). This sums up a widely held belief within this region.

Within the Swain County administration offices, there are plans for recreation, economic development, and
environmental improvement from such agencies as the National Park Service, the Tennessee Valley Authority, the U. S. Forest Service, the Division of Community Assistance, and the Southwestern North Carolina Planning and Economic Development Commission. This continuous plethora of plans, studies, and action committees has caused many to lose faith in the ability of the government to truly realize and act upon the needs of the community. A more personal and focused approach is often warranted.

A rural area is demarcated according to long-held lines which are difficult for a planner to discern from a cursory and yet, rational analysis. It is therefore important for the local planner to consider every undertaking from the citizen’s perspective. Within Swain County, the support or resistance to a subdivision ordinance or a junk car ordinance may change drastically from one community to the next. The needs of each community must be judged and considered separately from the whole for a successful land use plan to come about.

One very important difference in this land use plan from those which precede it, is the ability for local personnel to actually carry out as many of the recommendations as possible. In the past, sweeping comprehensive plans would look good on paper, but not really have much meaning to the realities of the community it was intended to serve. Many national, state, and regional organizations have the resources to design extremely worthwhile land use plans, but since they are based in cities many miles away, there is a gap in carrying out what has been recommended. By utilizing this land use plan as a means to an end and not an end unto itself, the perception of planning can be turned around into a meaningful and productive endeavor.

In considering this concept, the Swain County Economic Development and Planning Office has chosen to operate along a "Project Plan" format. Rather than attempting what could be perceived as an overhaul in land use within the County, there has been a deliberate effort made to identify and complete particular, high-profile, low-resistance projects.

Featured within this project plan format will be issues such as: Water Quality - an important component in Swain County’s ecosystem and economic development; Erosion Control - an especially troublesome problem in the mountain counties; A Scenic Corridor Plan - to introduce planning to the County and preserve and promote the countryside; and finally, Economic Development - without a healthy economy it is difficult for a community to hold together and plan for the future.

Rather than introducing a plan which may be seen as forcing land use towards one direction, the project plan format will help to guide land use in a less overarching manner. The local citizens will be involved at every level in order for a full understanding of the costs and benefits of land use decisions. The concept of a partnership is
important in fostering a good working relationship. By working together on a local level, solutions can be found in concert rather than from a far-removed departmental bureaucracy.

THE PROCESS

Thanks is owed to the members of the Land Use Planning Study Committee. By volunteering their time, they were able to give the Economic Development and Planning Office a clearer understanding of the issues. The Study Committee was appointed from each local community within the County. Care was also taken to ensure there was a broad representation of different occupations and viewpoints. With six to eight members of the Study Committee present at any one meeting, issues could be more fully explored and questions from the general public better anticipated. The commitment from this group over several months was greatly appreciated.

Thanks are also due to the efforts of the Division of Community Assistance; technical assistance was always merely a phone call away. By combining their know-how with the local citizen's understanding of the land, a unique perspective for land use planning was achieved.

HISTORIC BACKGROUND AND GENERAL INFORMATION

Swain County was formed in 1871 and is named after North Carolina Governor David L. Swain. It is located in the western end of North Carolina and is bounded by Tennessee in the north, Graham County to the west, Macon County to the south, and Jackson County to the east. The County encompasses approximately 339,200 acres of land and is home to 11,266 people as of the 1990 census.

The County seat of Bryson City contains approximately 1,147 people and is the only incorporated municipality within Swain County. Due to the severely mountainous terrain and the federal ownership of land, the further development of urban areas in the near future is unlikely. Swain County is relatively close to three metropolitan areas from which a steady stream of tourists add to the economy every year, these include:

- Asheville, North Carolina 85 miles/100 minutes
- Knoxville, Tennessee 90 miles/120 minutes
- Atlanta, Georgia 150 miles/180 minutes

Driving times to the east have been greatly reduced since the completion of Hwy 74, a four-lane intrastate highway connecting the County with Asheville, Charlotte, and Knoxville through I-40. Once Hwy 74 is completed on the western end, driving times are expected to decrease dramatically. This construction is scheduled to begin in
1995, but will probably not be finished for some 20 to thirty years.

POPULATION AND ECONOMY

A. Population

Based on 1990 census figures, Swain County had a population of 11,268. The 1920 census shows a high of 13,224 which had fallen to a low of 8,835 as illustrated by the 1970 census. This loss of population after the 1920's can be attributed to the purchase of land by the National Park Service and the Tennessee Valley Authority. From this increase in federal land purchases there was a general decline in lumbering and manufacturing industries. The downward trend in population has been reversed in large part because of the increasing number of retirees and tourists who are deciding to make the mountains their permanent home. While it is difficult for a mountainous region to support the services needed for a large population, let alone provide the land needed for development, this area will continue to grow as more "outsiders" discover the area.

By examining Exhibit 1, some balance within the population can be observed. It does not appear the County has become simply a retirement home from which the young people leave in order to find a better life. Although a substantial number of people leave the County in their early to mid-twenties, many of them return to the area in later life. There is a strong pull on the people who have lived in these mountains to return to their home.

With over 15% of the population over the age of 65, there will be an increasing need for services to the elderly. For Swain County to fully capitalize on its ability to attract retirees, there will have to be a stronger base of medical, recreation, and transportation services provided.

Having a full 25% of the population within school age has steered the County into providing a modern, hard-working school system which will be detailed later in this report.

Exhibit 1
SWAIN COUNTY
POPULATION BY AGE GROUP 1990

<table>
<thead>
<tr>
<th>Age in years</th>
<th>Total</th>
<th>Percentage of population</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-4</td>
<td>711</td>
<td>6.3%</td>
</tr>
<tr>
<td>5-17</td>
<td>2,156</td>
<td>19.1%</td>
</tr>
<tr>
<td>18-24</td>
<td>1,012</td>
<td>9%</td>
</tr>
<tr>
<td>25-44</td>
<td>3,151</td>
<td>28%</td>
</tr>
<tr>
<td>45-64</td>
<td>2,500</td>
<td>22.2%</td>
</tr>
<tr>
<td>65+</td>
<td>1,738</td>
<td>15.4%</td>
</tr>
</tbody>
</table>

Source: 1990 U.S. Census Report
E. Economy

The Swain County economy is poised between two separate paths. On one hand, there are many attributes which steer the economy towards one based on tourism. Such factors as the Great Smoky Mountain National Park, the Blue Ridge Parkway, the Cherokee Indian Reservation, Fontana Lake, and the Nantahala River Gorge all provide ample opportunity for recreation-based employment. There are several draw-backs to a recreation-based economy in this area. A tourism based economy within this area does not provide for year-round employment. Once the leaves are off of the trees in early November, there is a precipitous drop in tourism until the middle to late spring. Attempts to start a winter season would be futile because the amount of snow fall during the average winter is not sufficient to support a viable ski resort. Other problems associated with tourism include relatively low wages with little chance for advancement and the low skill level required for these jobs.

On the other hand, there is a push to attract industrial employment. In particular, many men are in need of high-wage, high-skill jobs to support their families. It is important to recognize the distinction here between the need for employment for men and women. While there can be no doubt there is a need for jobs for everyone, it appears that men are particularly lacking in employment within this area. While there are several textile operations which tend to employ large numbers of women, there is a lack of skilled manufacturing jobs due to remoteness and scarcity of manufacturing facilities, suppliers, and customers in the region.

The 163,000 square feet of basically empty space at the "Gichner Building" also produces pressure on the County to attract industry. This loss of this manufacturer illustrates the need for high-skilled, male dominated jobs in that it once employed well over 200 men in constructing metal-fabricated, mobile communication centers for the U.S. Army. Having closed in the summer of 1991, this plant now employs approximately 15 workers. This leaves a considerable void in several specialized job categories.

While the tax incentives provided by the State and the relatively low wages in this area do assist rural counties in attracting industry, there are serious draw-backs to be overcome: the lack of natural gas, relatively few high-skill workers in the area, little room for expansion, and the lines to suppliers and customers are extended in the mountains.

While it is a cliche to say a balance must be struck between these two paths, this would be the most prudent decision. In order to promote tourism, the County does not have to turn its back on the rest of the employment sector. In dozens of communities it has been found that aesthetic improvements in the surroundings correlate into a revitalized business and industry sector. Businesses want
to locate in communities which take pride in themselves and have a spirit of cooperation.

In order to gain a clearer understanding of the various sectors of employment, please refer to Exhibits 2 and 3.
Exhibit 2
SWAIN COUNTY
EMPLOYED PERSONS 16 YEARS AND OVER
BY OCCUPATION

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Total / %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Managerial &amp; professional specialty occupations:</td>
<td></td>
</tr>
<tr>
<td>Executive, administrative, &amp; managerial</td>
<td>315 / 7.1%</td>
</tr>
<tr>
<td>Professional specialty</td>
<td>509 / 11.4%</td>
</tr>
<tr>
<td>Technical, sales, &amp; administrative support:</td>
<td></td>
</tr>
<tr>
<td>Technicians &amp; related</td>
<td>114 / 2.6%</td>
</tr>
<tr>
<td>Sales</td>
<td>374 / 8.4%</td>
</tr>
<tr>
<td>Administrative support, including clerical</td>
<td>561 / 12.6%</td>
</tr>
<tr>
<td>Service occupations:</td>
<td></td>
</tr>
<tr>
<td>Private household</td>
<td>8 / 0.2%</td>
</tr>
<tr>
<td>Protective service</td>
<td>75 / 1.7%</td>
</tr>
<tr>
<td>Service, except protective &amp; household</td>
<td>586 / 13.2%</td>
</tr>
<tr>
<td>Farming, forestry, &amp; fishing occupations</td>
<td>140 / 3.1%</td>
</tr>
<tr>
<td>Precision production, craft, repair occupations</td>
<td>644 / 14.5%</td>
</tr>
<tr>
<td>Operators, fabricators, &amp; laborers:</td>
<td></td>
</tr>
<tr>
<td>Machine operators, assemblers, &amp; inspectors</td>
<td>615 / 13.8%</td>
</tr>
<tr>
<td>Transportation &amp; material moving occupations</td>
<td>222 / 5.0%</td>
</tr>
<tr>
<td>Handlers, equipment cleaners, helpers, &amp; laborers</td>
<td>287 / 6.4%</td>
</tr>
<tr>
<td>Total</td>
<td>4,450 / 100%</td>
</tr>
</tbody>
</table>

Source: 1990 U.S. Census Report
Exhibit 3
SWAIN COUNTY
EMPLOYED PERSONS 16 YEARS AND OVER
BY INDUSTRY

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Total / %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture, forestry, &amp; fisheries</td>
<td>140 / 3.1%</td>
</tr>
<tr>
<td>Mining</td>
<td>18 / 0.4%</td>
</tr>
<tr>
<td>Construction</td>
<td>564 / 12.7%</td>
</tr>
<tr>
<td>Manufacturing:</td>
<td></td>
</tr>
<tr>
<td>Nondurable goods</td>
<td>627 / 14.1%</td>
</tr>
<tr>
<td>Durable goods</td>
<td>333 / 7.5%</td>
</tr>
<tr>
<td>Transportation</td>
<td>98 / 2.2%</td>
</tr>
<tr>
<td>Communications &amp; other</td>
<td></td>
</tr>
<tr>
<td>public utilities</td>
<td>97 / 2.2%</td>
</tr>
<tr>
<td>Wholesale trade</td>
<td>66 / 1.5%</td>
</tr>
<tr>
<td>Retail trade</td>
<td>638 / 14.3%</td>
</tr>
<tr>
<td>Finance, insurance, &amp;</td>
<td></td>
</tr>
<tr>
<td>real estate</td>
<td>91 / 2.0%</td>
</tr>
<tr>
<td>Services:</td>
<td></td>
</tr>
<tr>
<td>Business &amp; repair services</td>
<td>130 / 2.9%</td>
</tr>
<tr>
<td>Personal services</td>
<td>315 / 7.1%</td>
</tr>
<tr>
<td>Entertainment &amp; recreation</td>
<td>86 / 1.9%</td>
</tr>
<tr>
<td>Professional &amp; related services:</td>
<td></td>
</tr>
<tr>
<td>Health services</td>
<td>408 / 9.2%</td>
</tr>
<tr>
<td>Educational services</td>
<td>309 / 6.9%</td>
</tr>
<tr>
<td>Other professional &amp; related services</td>
<td>284 / 6.4%</td>
</tr>
<tr>
<td>Public administration</td>
<td>246 / 5.5%</td>
</tr>
<tr>
<td>Total</td>
<td>4,450 / 100%</td>
</tr>
</tbody>
</table>

Source: 1990 U.S. Census Report

Exhibits 2 and 3 clearly illustrate the importance of both the service and the manufacturing sector to the local economy. The importance of the service sector is underscored by the fact that according to the 1990 U.S. Census Report, 775 people worked outside of Swain County. The large majority of these laborers were seeking skilled jobs which are lacking within the County. While the service sector continues to grow with the expansion of tourism and
the elderly population, many workers must continue to leave
the County in order to find jobs to match their skills.

**Exhibit 4**
**SWAIN COUNTY LABOR FORCE**

<table>
<thead>
<tr>
<th>Year</th>
<th>Labor Force</th>
<th>Employed</th>
<th>Unemployed</th>
<th>% Unemployed</th>
<th>% State Unemployed</th>
</tr>
</thead>
<tbody>
<tr>
<td>1981</td>
<td>4,990</td>
<td>4,180</td>
<td>810</td>
<td>16.2%</td>
<td>6.4%</td>
</tr>
<tr>
<td>1986</td>
<td>5,420</td>
<td>4,530</td>
<td>890</td>
<td>16.4%</td>
<td>5.3%</td>
</tr>
<tr>
<td>1992</td>
<td>6,240</td>
<td>5,300</td>
<td>940</td>
<td>15.1%</td>
<td>5.9%</td>
</tr>
</tbody>
</table>

Source: Employment Security Commission of North Carolina

From 1981 to 1992 there has been a 20% rise in the
labor force, with a drop of unemployment of 1.1% over the
same period. So while the unemployment rate remains
exceedingly high, there has been an overall increase in the
number of workers employed in the County.

The most disconcerting fact concerning the unemployment
rate within Swain County is its extreme fluctuations.
During the winter months, the percentage can reach into the
low 20's, while in the late summer, the numbers easily dip
below 8%. This range appears to be guided by two factors:
One, many of the textile operations fill their Christmas
orders during the summer and fall. During the winter
months, they are forced to lay off workers due to a lack of
orders. And two, the tourist traffic follows much the same
pattern of ebb and flow. During the summer and fall months,
millions of tourists enjoy the regional attractions, while
in the winter, the area becomes quite dormant.

Attempts have been made to lure businesses which are
not subject to the same cycles as the textile operations.
There is also an effort underway to develop a public golf
course with private memberships available. Some studies
indicate the presence of a golf course will assist in
extending the season tourists visit the area.
### Exhibit 5

**SWAIN COUNTY RETAIL SALES AND SALES TAX COLLECTION**

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Gross Retail Sales ($100,000)</th>
<th>Sales Tax ($100,000)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1980</td>
<td>$37,036</td>
<td>$696</td>
</tr>
<tr>
<td>1981</td>
<td>44,939</td>
<td>817</td>
</tr>
<tr>
<td>1982</td>
<td>47,750</td>
<td>861</td>
</tr>
<tr>
<td>1983</td>
<td>48,391</td>
<td>852</td>
</tr>
<tr>
<td>1984</td>
<td>49,438</td>
<td>920</td>
</tr>
<tr>
<td>1985</td>
<td>49,674</td>
<td>976</td>
</tr>
<tr>
<td>1986</td>
<td>52,325</td>
<td>1,001</td>
</tr>
<tr>
<td>1987</td>
<td>52,775</td>
<td>1,044</td>
</tr>
<tr>
<td>1988</td>
<td>54,702</td>
<td>1,100</td>
</tr>
<tr>
<td>1989</td>
<td>61,481</td>
<td>1,155</td>
</tr>
<tr>
<td>1990</td>
<td>56,280</td>
<td>1,248</td>
</tr>
<tr>
<td>1991</td>
<td>52,974</td>
<td>1,235</td>
</tr>
<tr>
<td>1992</td>
<td>52,003</td>
<td>1,578</td>
</tr>
<tr>
<td>1993</td>
<td>51,561</td>
<td>not available</td>
</tr>
</tbody>
</table>

Source: LINC System - N.C. Data Center

Swain County’s retail sales, as illustrated in Exhibit 5, show a steady increase in sales during the 1980’s with a decline beginning in 1990 and continuing on through 1992. Due to an increasing population, which continually needs services that are funded less and less by the federal and state government, the county has been forced to increase the tax rates in order to keep pace with the demand on services. Therefore, while the amount of money being spent in Swain County has been dropping, there has not been a corresponding decrease in the amount of taxes collected.

Unless there is an upsurge in economic growth, there will be a point at which the economy will be unable to bear the level of taxation needed to fill the needs of the populace.
### Exhibit 6

**SWAIN COUNTY**

**ESTIMATED INCOME FROM SALE OF FARM PRODUCTS & GOVERNMENT PAYMENTS**

<table>
<thead>
<tr>
<th>Commodity</th>
<th>1981</th>
<th>1986</th>
<th>1992</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tobacco-Burley</td>
<td>$153,007</td>
<td>$120,498</td>
<td>$116,734</td>
</tr>
<tr>
<td>Fruits &amp; Vegetables</td>
<td>$63,803</td>
<td>$176,160</td>
<td>$333,033</td>
</tr>
<tr>
<td>Greenhouse &amp; Nursery</td>
<td>$145,000</td>
<td>$39,500</td>
<td>$105,000</td>
</tr>
<tr>
<td>Hay &amp; Other Crops</td>
<td>$227,500</td>
<td>$35,000</td>
<td>$36,000</td>
</tr>
<tr>
<td>Farm Forestry</td>
<td>$142,000</td>
<td>$62,914</td>
<td>$317,400</td>
</tr>
<tr>
<td><strong>Total Crop Income</strong></td>
<td>$736,122</td>
<td>$438,104</td>
<td>$934,242</td>
</tr>
<tr>
<td>Hogs</td>
<td>$14,750</td>
<td>$17,250</td>
<td>$62,275</td>
</tr>
<tr>
<td>Cattle</td>
<td>$185,000</td>
<td>$183,207</td>
<td>$341,365</td>
</tr>
<tr>
<td>Other livestock &amp; IS/Products</td>
<td>$14,600</td>
<td>$5,840</td>
<td>$350</td>
</tr>
<tr>
<td><strong>Total Livestock Income</strong></td>
<td>$214,350</td>
<td>$206,297</td>
<td>$403,990</td>
</tr>
<tr>
<td><strong>Total Farm Income</strong></td>
<td>$950,472</td>
<td>$644,401</td>
<td>$1,338,232</td>
</tr>
<tr>
<td><strong>Government Payments</strong></td>
<td>$7,460</td>
<td>$12,966</td>
<td>$16,159</td>
</tr>
<tr>
<td><strong>Total Farm income &amp; Government Payments</strong></td>
<td>$957,932</td>
<td>$657,367</td>
<td>$1,354,391</td>
</tr>
</tbody>
</table>

Source: N.C. Cooperative Extension Service

The figures within Exhibit 6 indicate a farm economy which is unstable in particular commodity categories and as a whole. There are four basic components which cause farming to be of less importance as time goes on: One, approximately 80.8% of the County is owned and managed by the federal government; two, steep slopes inhibit many crops and livestock from utilizing the land; three, poor soils which are susceptible to erosion and are often of a shallow depth; and four, many farms are sold as land prices are continuously driven higher due to the demand for home sites for retirees and vacationers.

A farm protection ordinance would be an excellent tool in protecting the farms which are still located within Swain County. By allowing for tax breaks, development buffer zones, and aesthetic considerations such as noise and odor, farms can co-exist with other forms of development. In order for such protective measures to be passed there would need to be a lengthy and detailed public meetings schedule to carefully explain the finer points of such an ordinance.
COMMUNITY FACILITIES AND SERVICES

A. **Schools**

The Swain County school system consists of: West Elementary, with an enrollment of 430 students, was constructed in 1992 and designed to accommodate 450 students. East Elementary, with an enrollment of 387, was constructed in 1992 and as an identical school, it also was designed to accommodate 450 students. Swain County Middle School, with an enrollment 250 students was designed as an elementary school with a capacity of 200 students. The Middle School is being replaced by a newly constructed facility in early 1994. The newer facility is in a more central location, on "School House Hill" overlooking Bryson City. It is also better equipped to accommodate extracurricular activities and more students with a design capacity of 300 students. The Swain County High School was built in 1977 along the lines of an "open concept." This type of construction incorporated the theory of open classrooms with few walls and an easier interaction between classes and programs. This concept has not proved to be successful in Swain County and several walls have been added to separate various areas. The facility was designed on paper to hold 750 students, but with only 520 students, the school is seriously overcrowded. Along with the overcrowding, there have been noise and human traffic flow problems associated with this open concept design.

Overall, the Swain County school system receives good marks from the North Carolina Board of Education. From 1990 through 1993, it has been ranked "above par" and "above average" by the State’s Report Card. Twenty-eight percent of the students complete requirements for the North Carolina scholars program (State average, Twenty-two percent). Forty-one percent of teachers hold a graduate degree (State average, thirty-one percent). Fifty-two percent of the graduates complete required UNC admissions courses (State average, forty-six percent). Seventy-three percent of graduates enter two or four year colleges. Ninety-two percent of students in grades nine through twelve earn five or more units towards graduation each year (State average, eighty-even percent). The dropout rates for 1990, 1991, and 1992 are 4.76%, 2.62% and 3.49% respectively. The fluctuation in drop out rates can be explained by the small number of students. Only a few students dropping out can have a major impact on the overall system. Every student is treated with care, with a 17:1 student-teacher ratio at Swain County High School.

Education is an important key to the success of Swain County and when Western Carolina University and Southwestern Community College are factored in, the overall educational possibilities are excellent. This reality is often unable to overcome the stereotype many have of the educational levels in the Appalachian region. Therefore it is important...
for Swain County to be proud of and promote its fine school system.

B. Law Enforcement

Swain County is served by the Sheriff’s department, while the Town of Bryson City is served by its own force. The Sheriff’s department consists of eight deputies, a Chief Deputy and the Sheriff; three vehicles are utilized by the eight deputies and one each for the Sheriff and the Chief Deputy. There is also an U.S. Army surplus four-wheel drive vehicle used to reach remote areas during search and rescue efforts.

The considerable expansion of the County’s population during the summer months does cause a measurable strain on the Department’s manpower. Unfortunately, the County does not as yet have the funds available to increase the number of deputies serving the County.

The Town of Bryson City is served by five officers, equipped with three vehicles, and one canine/drug unit (one specially trained officer and one dog).

C. Fire Protection and Rescue Squad

Swain County is served through an all-volunteer fire and rescue department. Volunteer fire departments are located in Bryson City, Alarka, and Needmore. The two latter organizations are expected to begin operation in 1994. (Detailed information on the transportation and equipment utilized by these departments was not available.)

D. Emergency 911 Service

Swain County has implemented an Emergency 911 service which will move to the "Enhanced System" in January of 1994. This Enhanced System includes a mapping capability, by printing out directions and a map to the scene of an emergency. At present, the system is able to document vital information on every home, such as any chronic health problem in the home, the type of heating facility, the condition of the road, etc...

Emergency Medical Services is equipped with two ambulances and one crew from 8:00am to 5:00pm and half of a crew from 11:00pm to 7:00am (the ambulance is not able to respond until a full crew has been called in). It has been recommended by the Western Regional E.M.S. Office that the County add another crew during the day and fully staff the crew during the night. As of yet, the County has not allocated the funds necessary for these recommendations to be implemented.
E. Hospital Services

Swain County is served by Swain County Hospital, which was chartered in 1948 as a not-for-profit, community owned, acute care hospital. Governed by a Board of 21 Trustees from the surrounding community, the hospital opened its doors in 1950 with 20 inpatient beds. It has since served nearly 500,000 inpatients, outpatients, and emergency room patients.

The hospital has expanded several times since 1950 and today has a capacity of 48 inpatients. In 1987, the hospital underwent a four million dollar renovation to modernize the facility. The hospital employs approximately 95 people full-time and 10 people part-time. These figures add up to the hospital being one of the largest and highest paying employers within Swain County.

F. Public Transportation

Swain County does not provide a consolidated public transportation system. There are some individual organizations (senior citizens and drug rehabilitation) which offer transportation for their clientele, but this only reaches a limited number of people. There are plans being considered for the consolidation of the public transportation which is offered and perhaps also a partnership with Jackson County.

The lack of available transportation is a severe problem for senior citizens who are unable to go to the grocery store or have their prescriptions filled. Also, young mothers need to get their children to the doctor, while the family vehicle is used to go to work.

Efforts to meet these needs are overdue and should be supported as much as possible by the County as a whole and by the individual departments who serve segments of the public most likely to benefit.

G. Water & Sewer

There is a public water and sewer system serving Bryson City, while Whittier is served by a public water system only. The Bryson City water system is approximately 90 years old. It has a service area within the Bryson City corporate limits and the communities of Deep Creek, Lands Creek, Meadow Heights/Black Hill Road, Swain County High School, Bryson Branch, and the Swain County Industrial Park (See Map 1).

The Bryson City water system has been reliant upon the Lands Creek impoundment since it was constructed in 1976. The Lands Creek impoundment was designed to provide a safe yield of 300,000 gallons per day. During 1992, Bryson City exceeded this safe yield by an average of 78,000 gallons per day. This situation was allowed to continue only under a
special permit by the State. The Lands Creek source will be abandoned in 1995 when the new facility at Deep Creek becomes operational with a daily safe yield of 800,000 gallons.

In addition to the new intake at Deep Creek, there are plans for new pump stations at the Ingle’s grocery store just west of Bryson City off Highway 19, at Schoolhouse Hill, and at Sherrill Gap. These new pump stations will increase the current capacity by 725 gallons per minute and therefore increase the current delivery capacity by approximately 100%. The total storage capacity for Bryson City is 1,500,000 gallons with a proposed addition of 30,000 gallons on Bennet Hill in 1994.

The Bryson City sewer system was begun approximately 60 years ago. The two largest additions to the system was an expansion to 300,000 gallons per day in 1968 and an expansion to 600,000 per day in 1987. Both the water and sewer systems for Bryson City are predicted to reach capacity between the years 2010 to 2015.

The town of Whittier on the far eastern end of Swain County is served by a public water system, with all sanitary facilities being privately maintained. The Whittier Sanitary District constructed this 10,000 gallons per day system in 1983. Two deep wells serve as the source of this water system. The Tarheelia Heights storage facility has a capacity of 60,000 gallons. It is difficult to project when this system will be out-of-date due to potential agreements with the Cherokee Indian Tribe to augment this system.

Source: "Water Resources Infrastructure Needs Assessment Region A" Prepared by Southwestern North Carolina Planning and Economic Development Commission

H. Solid Waste Disposal

Swain County currently operates a landfill which is scheduled to be shut down in April 1994. The solid waste will then be collected by the County and sent through a transfer station to Cherokee County. This arrangement will entail a considerable change in the waste disposal habits of Swain County residents. At present, the County is served by approximately seventeen "green box" sites (dumpsters) set out near various communities along the roadside. These facilities cannot be carefully monitored, so refuse which could be recycled is thrown away and items such as washers and microwave ovens are left on the side of the roads near these facilities. Many residents are under the mistaken understanding that these items are not allowed within the landfill. In fact, white goods can be picked up free of charge by the County for residents who are unable to transport these items themselves.

The new waste disposal system would collect waste through two or three centrally located convenience centers which would be staffed ten to twelve hours each day and
closed at other times. At each center the staff would be charged with making sure all of the recyclables were separated out and the remaining solid waste was properly disposed of. Some residents will object to this interference with the habits they have grown accustomed and others will resent the extra effort in separating their waste and driving the longer distances to the centers. There will be a strong need for the public to be educated to the efficacy of this new collection program. A high correlation must be identified between the amount and manner of collecting and disposing of solid waste and the costs associated with this process. (In order to fund an educational program, the Economic Development & Planning Office has assisted in the writing of a grant from the Environmental Protection Agency for the sum of $4,465.)

For FY 1992-93, Swain County had a total of 6,152 tons of solid waste sent to the landfill. The smallest amount was during the month of February, with 200 tons and the largest amount was during the month of June with 853 tons. Recyclables including glass, plastic, metal, paper, and wood accounted for 492 tons during FY 1992-93. Items such as white goods and construction/yard debris accounted for another 206.5 tons of material for FY 1992-93.


I. Recreation

The City/County Recreation Department was formed in 1966 with an emphasis on youth oriented activities, especially in the summer. In 1971, the Bryson City/Swain County Recreation Commission was formed with the goal of providing public recreation opportunity for as many citizens as possible. What follows is a listing and description of the facilities operated by the Recreation Department (see Map 2 for the location of the various recreational sites within Swain County):

Swain County Recreation Park (Developed 1974 to Present) - This thirty-two acre park was created as the initial recreation facility for the Parks and Recreation Department. This area serves as a very versatile park by offering a wide variety of facilities and programs to every age and interest group. Initial components of this park consisted of two ballfields and four lighted tennis courts. Further development produced a 30’x 80’ picnic shelter (Morgan Pavilion), an olympic-size swimming pool complex, two playgrounds, basketball courts, horseshoe pits, beach volleyball court, multi-use field, walking trails,
maintenance facility and greenhouse. Expansion of this park is continuously ongoing.

Tuckaseigee River Parks System - A comprehensive river park system has become an essential part of the overall plan by the Parks and Recreation Department. With the Tuckaseigee River flowing through 19 miles of Swain County as well as directly through the downtown area of Bryson City, this river has become an important component in this area's vast natural resources. The Recreation Department has put together a river park system plan utilizing the river as a valuable natural resource and developing specific tracts of property into areas for public parks.

Specifically in the Bryson City area a four phase plan has been designed to interlock the existing Island Park and Riverfront Park to form a continuous riverfront walkway through the main section of town. The following is a description of existing parks operated by the Department.

Ela Riverside Park (Developed 1985) - The Ela Park was constructed with Tennessee Valley Authority funds and serves the eastern section of the County. Located four miles east of Bryson City on the Tuckaseigee River, this park consists of a canoe and kayak launch, picnic area, and is a favorite fishing area for many of the locals.

Bryson Island Park (Developed 1986-1989) - This unique seven acre park owned by the town of Bryson City lay idle for decades until 1986 when Land and Water Conservation funds were secured by the Parks and Recreation Department to preserve the island as a natural area and public park.

Construction began in the fall of 1987 by reconstructing the 150' suspended footbridge. Revitalization of the island included construction of bordered walkways, identifying and labeling trees and shrubs, restoration of the old Boy Scout hut for an interpretive center, canoe and kayak launch, and picnic areas. Bryson Island Park has received recognition from various groups including "Park of the Year" in North Carolina by the U.S. Congress in their report on parks and recreation in America.

Riverfront Park (Developed 1989-1993) - Riverfront Park is the newest addition to the park system. Its location on the Tuckaseigee River and proximity to the town of Bryson City creates a pleasant atmosphere for local festivals and special events. The park consists of bordered lighted trails, picnic areas with grills, kayak launch and take out, and a pavilion which doubles as a stage for special events. For large gatherings, the park offers parking for 300 vehicles. Construction of this park was planned in four phases, with the first two now completed.

Source: "Swain County Parks and Recreation Master Plan 2002"

In addition to the facilities owned and maintained by the County, there are numerous other opportunities for recreation within Swain County. With the Great Smoky
Mountain National Park, the terminus of the Blue Ridge Parkway, the Cherokee Indian Reservation, the Nanatahala River Gorge, and Fontana Lake there are a myriad of possibilities for rafting, kayaking, fishing, camping, hiking, and learning about the ways of indigenous people.

The environment in Swain County is certainly one of its main points as a place to live, work, and play.

EXISTING LAND USE

The Existing Land Use map for Swain County was prepared by using 1990 TIGER/Line Census files from the North Carolina Center for Geographic Information & Analysis (C.G.I.A.). The information from these maps was augmented by a windshield survey of the County to determine the general location of residential, agricultural, commercial, and industrial land uses (see Map 3).

There is a general lack of geographical information in the County which, if remedied, could move development along at a faster and more ordered pace. Because Swain County does not have tax maps, there is some difficulty in determining how much property a land owner controls. The requirement for a surveyed plat when a deed is recorded has only been in place since 1992, so many deeds are based on inaccurate information. And further, the last soil survey was completed in 1937, and copies are no longer available. Up-to-date soil surveys would allow for more ease in locating potential sites for development, assist farmers in fertilizing their fields, Environmental Health Specialists in sighting septic tanks, and so on.

Efforts are underway to complete the maps needed to improve the County's understanding of the resources at its disposal and under its care. An aerial survey is to be completed by January of 1994. These maps will be first utilized in the enhanced 911 service, later they could be employed for the creation of tax maps. Negotiations are also beginning on the cost sharing possibilities between the County and other governmental bodies for completing a soil survey.

When viewing a political map of Swain County, the most striking feature is the amount of property under federal ownership. The next section of this report will outline some of the outcomes of this situation.

A. Federal Ownership

The Issue and Surrounding Problems

Within this report, there have been several references made to the predominance of federally owned lands within Swain County. It is not possible to overstate the tension which has and still does occur over the federally owned lands within the County (please see Map 3). As illustrated by Map 3, the Great Smoky Mountains National Park and the
Blue Ridge Parkway account for some 64% of the total land acreage in Swain County. There are also several other federal entities with substantial land holdings: the Eastern Band of the Cherokee Indians owns approximately 8.6%, the Nantahala National Forest (managed by the United States Forest Service) contains approximately 6.2%, and the Tennessee Valley Authority holds approximately 2%. Of the 339,200 acres within Swain County, there are approximately 275,224 acres are owned and managed by the federal government.

Each of these organizations has a somewhat clouded history from the perspective of much of the citizenry within Swain County. The Great Smoky Mountain National Park, besides owning the majority of the County, is continually plagued by the issue of the "North Shore Road," also known as the "Road to Nowhere." This stems from an agreement signed in 1943 by the Tennessee Valley Authority, the National Park Service, the State of North Carolina, and Swain County. The "1943 Agreement" called for the U.S. Department of the Interior to build a road within the Great Smoky Mountain National Park to replace North Carolina Route 283, which was flooded by the construction of the Fontana Reservoir. As part of the 1943 Agreement, the National Park Service was to receive some 44,000 acres of land from the Tennessee Valley Authority for inclusion within the Park. The State of North Carolina was to build the road from Bryson City to the Park boundary which would connect with the "North Shore Road." The State's portion of the road was completed in 1966 (N.C. Department of Natural Resources).

To date, the U.S. government's portion of the North Shore Road in the Great Smoky Mountains National Park has not been completed. Nor have any subsequent plans been implemented to satisfy much of the general public that the issue of the 1943 Agreement has been laid to rest. It is difficult to gauge the full impact of the events such as the lack of resolution to the North Shore Road. The failure of the federal government to carry through its stated plan has led to a general mistrust of further actions. It matters not if these actions stem from the efforts of a Forest Service Ranger or from the County Tax Office. For many residents in Swain County, most government action is held under suspicion and often contempt.

During public meetings, the staff preparing this document was asked on several occasions to "take care of the 'Road to Nowhere' before bothering with any other plans for the future." This single issue has overshadowed much of the development potential within Swain County and will continue to divide the community until it is resolved.

The image of the National Park Service is further tarnished by the fact that a proper visitor's welcome center has never been constructed on the North Carolina side of Hwy. 441, the only road which leads through the Great Smoky Mountain National Park. Plans to develop a visitor's center on both the Tennessee and North Carolina side of the Park...
have been on the drawing table since the mid 1980's. The North Carolina side of the Park is forced to utilize a former courtroom built for the U.S. Commissioner in 1941. This facility is located in Oconaluftee, just outside of Cherokee, within Swain County. The 6,000 square foot building is used as a visitor's center, a ranger station, staff offices, and an artifact storage area. It is not able to properly serve the 4,000 - 5,000 daily visitors which come through the area every day during the peak season from May to October (National Park Service).

In terms of mistrust by some citizens in Swain County of other federal entities, the Cherokee Indian Reservation is associated with two major problems. One, the land owned by the Reservation is not taxable by the County, nor do businesses pay local sales taxes. And two, the Reservation has the power to buy real estate from private owners in Swain County and take it off of the County's tax rolls by incorporating it into their Reservation. Theoretically, the Reservation could purchase the County's largest employer, incorporate it into the Reservation through the Bureau of Indian Affairs and the County would lose a tremendous part of its limited tax base.

The U.S. Forest Service is often held in contempt by local hunters because of a lack of access to prime hunting areas. The idea that this property is first managed for the production and harvest of timber has somehow been lost to many within Swain County. While many of the Forest Service tracts are managed on a "multi-use" basis, their main function remains the protection and harvest of timber.

Finally, there is the Tennessee Valley Authority which is held in disregard for buying property once held by private land owners. There are two important differences in the Tennessee Valley Authority's situation. First, because much of the land they purchased was for the use of a dam (Fontana Dam, the tallest east of the Mississippi River) the low-lying areas were inundated with water, erasing the existence of many farms and settlements. With so little usable property, every valley and cove was and is prime land. The second difference with the Tennessee Valley Authority's situation is the psychological impact of the land being covered with water. In all but the memory of the old-timers and a few yellowed photographs, this land has been lost. While the property owned by the Park Service, the Cherokees, and the Forest Service is still somewhat accessible; people still know it is there, they can hike over it and say it was once theirs. The property flooded over by Fontana Lake is more profoundly lost to the families who once called it their home. This sense of loss is especially acute due to the many cemeteries which have been flooded over or made inaccessible except by boat. Mountaineers cherish the ties they have through their ancestors and to the connection they have with the land.

These events and others like them have caused many within Swain County to be suspicious of government
intervention in their lives. The history of the Appalachian family being "boondoggled" out of their land by logging, mining, or government interests is more than a quaint anecdote to the people of Swain County. At one public meeting attended by the Economic Development & Planning staff, a story was told of a family who had lived on property which would become part of the Great Smoky Mountain National Park. During their relocation from this site, they moved onto property which would eventually be controlled by the Tennessee Valley Authority. Having moved from this area, they were once again forced to move during the construction of Highway 74. While this example is no doubt an extreme, it does serve to illustrate the hardships many within this region associate with government actions, especially concerning land use.

Solution

Through the Appalachian Regional Commission grant, the County has been able to establish clearer lines of communication with the various federal agencies associated with Swain County. The human, technical, and financial resources contained within these many organizations far outweigh those of the County. All efforts should be made to develop and maintain a partnership which can be beneficial to all parties concerned.

The utilization of local staff to instigate and direct various planning and resource management plans will assist these federal agencies in serving the public and it will provide needed improvements to Swain County. There must be a concerted public effort to change the image of these organizations from that of an occupying force to one of a partner. Prior to this planning effort there was not any one department with the responsibility of planning future resource uses in Swain County.

B. Erosion Control

The Issue and Surrounding Problems

The mountains of Swain County are both a blessing and a curse. While serving as a major tourist draw, they have often acted as a barrier to the County's contact with the rest of North Carolina and the southeastern United States. The mountainous terrain presents several development problems which will continue to plague the area unless they are dealt with through increased awareness and regulation. The steep slopes combined with unstable soils, allow for a dangerous combination if not properly monitored.

Presently, the State of North Carolina does require an erosion control plan if a development is disturbing more than one acre of land. It should be noted this one acre also includes the amount of land disturbed by any road ways cut into the parcel. While this provision does serve to
control some development. Within mountainous regions, home sites are usually smaller than one acre due to their location on steep slopes. The one acre provision stands for the State as a whole and is unable to account for particular development patterns and their accompanying erosion problems in mountainous regions. While one acre may be sufficient to control erosion in the piedmont, this is not necessarily so for the mountains.

Through the years as a mountain hollow is settled, the wide, bottom valleys are developed and farmed first. As families grow and the need for more land or money becomes intensified, parcels are given to children or sold off to "outsiders." These new members of the community are often from areas without the dramatic vistas provided by the Appalachian Mountains. Therefore, many of them choose to locate their homes high atop ridges in order to enjoy the views. This pattern of development is relatively new to the area, with families in the past preferring to locate near the bottom lands for planting gardens and grazing small herds of livestock. Newcomers are often unaware of the many problems associated with hillside or hilltop development. They often pay a high price for this lack of information in the form of improperly functioning wells and septic systems, unstable foundations, and yards which tend to slide away from the front door.

With this additional ridge-top development, there has been a corresponding increase in erosion. Several streams have shown an up surge in siltation and a decrease in water quality. This has led to a documented degradation of the native brook trout, which is often used as a measurement of the overall quality of the stream-related environment. It is important to take the time to illustrate how the plight of the native trout population points to a larger problem which will continue to grow if measures are not taken to control problems associated with the growth patterns described earlier. There are clear associations with the quality of water and the health of trout populations. These indications do not bode well for a future without land use planning.

The clarity, or turbidity of the water is an important component in the survival of the native brook trout population; without clean, rocky bottoms they are unable to properly spawn. The exact conditions necessary for reproduction coupled with their particular sensitivity to the temperature and oxygen levels in the local streams allows for a delicate measure of the health of the stream’s ecosystem.

Many other problems may arise due to an influx in stream turbidity. Because trout are sight feeders, a reduction in visibility from an increase in water-suspended soil has been shown to impair the trout’s ability to locate food (Tebo 25-26). The ability of the brook trout to sustain a meaningful population is becoming more tenuous due to the introduction of the rainbow and brown trout to their
native habitat. The rainbow and the brown are a more aggressive and hardy species which enables them to push out the less dominant native species. Without clean, clear water, the brook trout will continue to decline. If this trend continues to progress, the "sport" of fishing will exclusively consist of "catching-out" non-native species placed in the streams by the Wildlife Resources Commission.

The preceding information concerning the trout population in Swain County is meant to do more than illustrate the plight of the trout. The trout are simply a barometer, indicating the presence of a larger and more serious problem. If careful control of erosion and therefore, water quality, is not assumed while land development in Swain County is in its early stages, later efforts will be futile to restore the mountains to an acceptable level of ecological health. Clean air and water are both commodities which are becoming increasingly important to communities nation-wide. Swain County has the opportunity to gain some measure of control over their erosion problems and water quality. Without proper action, this chance to better the environment and to directly benefit the local communities will be lost.

Solution

One solution many local governments have instigated to fight the erosion problem is that of an Erosion Control Specialist. Within North Carolina, over 40 municipalities and counties have passed more stringent regulations, which are enforced by local personnel. Cities such as Asheville, Boone, and Highlands have all begun their own programs. Also Avery, Buncombe, and Haywood counties have programs which are proving to be successful. An important component of most of these ordinances is that of the erosion control plan being required for any development disturbing one-half acre or more of land, as opposed to the one acre provision stipulated by the State. These more stringent regulations more closely match the type of development which occurs in the mountainous regions, as discussed earlier.

Local erosion control programs have proven to be effective in increasing the level of awareness as to where problems are occurring. With most erosion control plans, there is some difficulty in all sites being monitored adequately, if at all. Another advantage of a local program is that it places the code's enforcer more directly in touch with the local planner. Together, they are able to gain a better understanding as to where increasing development is occurring.

Many rural planners often find themselves "out of the loop" when it comes to a clear understanding of where development problems are occurring. By working closely with an erosion control specialist, the planner would be in a better position to disseminate information to other departments and to the Board of Commissioners. By knowing
exactly what type of development is happening where, the
planner can inform the water and sewer department, the
health department, law enforcement, and so on, as to where
their services need to be augmented in order to cover
increased service demands.

C. Water Quality

The Issue and Surrounding Problems

Next to the mountainous terrain, the second-most
dominant feature upon the landscape of Swain County is the
abundance of water in the form of streams, rivers, and
lakes. Fontana Lake, at over 20 miles in length, is one of
the largest lakes within the Tennessee Valley Authority’s
system. This impoundment of water serves to control flood
waters downstream and generate hydroelectric power. Within
Swain County the streams, rivers, and lakes are widely
utilized for such recreational purposes as fishing, power-
boating, rafting, and swimming. One of the most important
uses of this abundant water supply is for drinking and
irrigation. Fontana Village, a resort development in Graham
County utilizes Fontana Lake as its main water supply.

It is this concern for protecting the fragile drinking
supply of Swain County which is paramount. Many resident’s
water supply stems from a shallow, private well or in some
cases, a metal pipe jammed into a small spring. These water
systems are vulnerable to any pollutants filtering down
through the watershed. With many varied and below-standard
water systems to monitor, the District Health Department
(formerly the Swain and Graham County Health Departments) is
often unable to fully enforce the State’s regulations
concerning inadequate septic systems. At this time, two
Sanitarians serve both Swain and Graham County. A third
Sanitarian is to be hired early in 1994. Without sufficient
monitoring, several streams are being polluted from septic
systems filtering or directly emptying into waterways.

Solution

In order to combat this problem, the Swain County
Economic Development & Planning Office has received a
$15,000 grant from the Z. Smith Reynolds Foundation. The
grant application was supplemented by data collected by the
Upward Bound Math and Science Program at Western Carolina
University. Upward Bound is a hands-on learning experience
for outstanding math and science students from all over the
southeastern United States. Approximately ten of these
students, under the supervision of Dr. Dan Perlmutter,
collected water samples in order to measure fecal coliform,
ph, and temperature within various streams in Swain County.

The data collected in one particular stream was able to
show fecal coliform levels three times the level at which
the State would recommend fishing or swimming to be allowed. During this preliminary testing phase, one family admitted to being responsible for the pollution and began to work towards compliance with the relevant regulations.

The Swain County Water Quality Study will be implemented in early summer of 1994. The initial data will be gathered by four undergraduate students from Western Carolina University's Environmental Health Science program. These students will test streams in the more heavily populated areas of the County. In addition to testing streams for fecal coliform and various other pollutants, there will be an effort to survey residents. The survey will be conducted in order to determine the types of water and waste disposal systems being utilized in the testing areas. Efforts will also be made to dye-test individual well systems which have a propensity to become polluted due to improperly installed or maintained septic systems.

Once this data is gathered, areas which have shown unusually high readings will be investigated by a certified Environmental Health Specialist. Those residents found to be in violation of the State's septic regulations will follow the customary procedures to be brought into compliance.

The initial efforts by the Upward Bound students and the Economic Development & Planning Office during the summer of '93 were widely supported by the community. During the sampling process, several homeowners came down to the sites to lend encouragement. It is this type of community support and education through the media which is important to the success of such a program.

The need for the public's involvement and support has also been calculated into the long-range plans for the water quality survey. Once violations along the streams are brought into compliance, there are plans for a Stream Watch program to be set up in communities which have developed in watershed and stream areas. Stream Watch is organized by the North Carolina Department of Environment, Health, and Natural Resources and is intended to allow individual communities to monitor the quality of their water. Community Clubs, set up through the N.C. Cooperative Extension Service, will supply interested community members to be trained in how to best gather the necessary data.

This program has two main advantages. One, through recreational activities, much of the local economy is dependent upon the continued good health of the County's water supply. And two, protecting natural resources through land use planning or land use regulation is a misunderstood practice in much of western North Carolina. By participating in this program, community members will see first-hand how careful land use can translate into a better environment for all.

It should be noted that the Swain County Board of Commissioners adopted a County-wide watershed protection ordinance, effective January 1, 1994. In many ways this
ordinance will have little impact on the quality of the County’s drinking water supply, for now or in the future. Under the direction of the Department of Environment, Health, and Natural resources there are presently three watersheds to be officially designated by Swain County: Fontana Lake, which serves Fontana Village in Graham County; Mingus Creek, which serves the Great Smoky Mountain National Park and the Cherokee Indian Reservation; and Lands Creek, which serves Bryson City.

Both Fontana Lake and Mingus Creek are entirely within the boundaries of the Great Smoky Mountain National Park and so the land use surrounding these two watersheds will not be affected by these new State regulations. Within the Park there are no plans for development and if development were to take place, the National Park Service would not necessarily be bound to follow the State’s regulations. The same holds true for Lands Creek, of which more than 90% of the watershed lies within the already protected lands of the Great Smoky Mountain National Park. Once the new intake at Deep Creek is established, it too will have all but approximately 5% of its property located within the Park.

While this situation is fortunate for Swain County in that it will not have to further restrict development. It is true that there are other watersheds within the County which supply large numbers of people and vital ecosystems with the water they need to survive. There is no protection afforded to these watersheds not designated under the State’s water supply watershed protection program.

**FUTURE EFFORTS IN SWAIN COUNTY**

**A. Scenic Corridors**

The idea for a Scenic Corridor Plan grew out of the meetings held with the Land Use Planning Study Committee. Issues such as the “green boxes” (dumpsters used by the Sanitation Department to collect trash), roadside litter, and junk yards kept coming to the forefront as issues that needed to be dealt with. The implementation of a carefully organized Scenic Corridor Plan was felt to be the answer to many of these problems. It would also serve as another introduction to the positive aspects of land use planning.

To fully appreciate the difficulty of implementing a Scenic Corridor Plan, it must be understood that there are no locally generated land use regulations within Swain County. With this in mind, it should be realized that the most important underlying strengths of a Scenic Corridor Plan is that it affects the least amount of land, (and therefore, the smallest number of landowners) while creating a significant impact on the outward appearance of the most travelled areas within the County.

A careful combination of routes has been chosen (see Map 4 for Scenic Corridor routes) to bring together the many
different aesthetic elements which make up Swain County. Highway 74, spanning the County from east to west, serves as the backbone for the system. The approximate mid-point of US 74 is intersected by Hwy. 28, which runs north-south from the U.S.F.S. Tsali Recreation Area to the north almost directly south towards Macon County. From Hwy. 28 there is not only access to Tsali and Macon County, but also Fontana Lake and beautiful views of the Great Smoky Mountain Range and the Little Tennessee River. By heading further west along US 74, a traveller will head into the Nantahala River Gorge. This area is world-renown for its white water rafting and canoeing.

Heading back towards the east to Bryson City, a traveller will find three more routes as part of the Scenic Corridor System. The Great Smoky Mountains Railway is a beautiful scenic rail line which runs from Dillsboro in Jackson County to the Nantahala River Gorge in the west. The rail line is an important component in the tourism industry of Swain County. By including the railroad in the Scenic Corridor Plan, there can be an offer of support in preserving the unique scenic qualities along their route.

Just north of Bryson City a traveller will find Deep Creek Road, which passes by the County/City Recreation Park and into the Great Smoky Mountains National Park. While this is not one of the main entrances to the Park, it does serve well over 300,000 visitors each year. From the Deep Creek entrance, a visitor may find camping, hiking, and tubing as a means to escape from the rigors of day-to-day life.

The last leg on the Scenic Corridor System is that of Hwy. 19, which runs from an intersection with US 74 in the west, through Bryson City (the County’s Scenic Corridor Plan will have no jurisdiction within the Town’s limits) and finally parallelizing the Tuckasegee and the Oconaluftee Rivers into the Cherokee Indian Reservation. From this endpoint, there are only a few miles to be travelled to reach Cherokee, the Blue Ridge Parkway, and the Oconaluftee Visitor’s Center, which is the main southern entry point to the Great Smoky Mountains National Park.

With Hwy. 19 long serving as the principal connector between Bryson City and the Cherokee Indian Reservation, it has become the most highly developed road. There are many problematic commercial signs and areas with a high concentration of disorderly development. One problem site which has come to the special attention of this effort is a property surrounding a railroad trestle which spans the banks of the Tuckasegee River. To the east of the railroad trestle, along the riverbank, there are approximately 50 to 75 automobiles which have been positioned to control erosion below Hwy. 19. While the cars do their job of holding back the bank, they also create an eyesore to the 100,000+ passengers who ride the Great Smoky Mountain Scenic Railway into Bryson City. This scene is again detrimental to the tourist trade when viewed from all of the automobile
passengers on their drive between Bryson City and Cherokee. Within this area of the Tuckaseigee River there are several other less prominent areas in which rusting cars, half-submerged in the water dominate the view. While this roadway could be one of the scenic showcases of Swain County, it has been allowed to deteriorate to a state which no doubt discourages the tourist trade and damages the pride of those that call Swain County their home.

There have been several productive meetings between the Economic Development & Planning Office and the Tennessee Valley Authority on the possibilities of replacing these cars with rock or covering them over. The Tennessee Valley Authority is especially concerned about this clean-up project because they have created, in cooperation with the County, a public boat access area upstream and within sight of many of these cars. While Swain County is glad to be opening up the river to more of the public, it is unfortunate to promote a section of the river which has been so degraded.

In order for the project to proceed, budget estimates are being gathered and different options are being thoroughly considered. The scope of this undertaking has for the moment, overtaken the many concentrated efforts which would otherwise go into the Scenic Corridor Plan. But the results of this project would go far in representing the positive side of land use planning.

The importance of this project goes far beyond improving the aesthetic value of a one or two mile stretch of river. One of the first objections of business and property owners have to the concept of a scenic corridor plan or any other form of land use planning is that the County ought to take care of its own problems without telling others how to order their lives. It is difficult to ask a business owner to modify a 6' by 8' sign when he or she can point to the dozens of junk cars rusting in the river just down the road.

The full implementation of a scenic corridor plan will take patience and careful timing. Regulations to curb the numbers and size of signs along the road, to set back buildings from the road and from each other, and to simply clean up the refuse along the road side will be a great improvement in the environment most visible to those that live and visit in Swain County. The regulation of land use is an extremely sensitive issue in this area and so there must be a clear benefit shown for its taking place.

One of the most important hurdles to be overcome in a scenic corridor plan is the transformation of the citizen's thinking a road is simply a route to get from point A to point B. Many of the local citizens have grown up in these majestic surroundings and have driven these same roads all of their lives. They do not always see the wonder right outside their car windows. Once an automobile driver begins to see and understand the road as something special, as a
part of the community worth preserving and improving, then half of the battle is won.

B. Economic Development

For the purposes of this presentation, the question of which came first, the chicken or the egg is similar to that of economic development and land use planning. It is not unusual to drive through the County in the middle of the day and see several able-bodied, young men working in their yards or on their cars out of a simple lack of anything else to do. With Swain County having some of the highest numbers in unemployment and welfare in North Carolina, there is an acute need for jobs (see Exhibit 4 for more information on unemployment).

This situation creates two problems. First, it is difficult for the County government to muster financial assistance for planning because of a lack of revenue and a lack of public support. This lack of support is the knock-out punch against a planning program. And yet it is difficult for the general public to understand the many varied benefits of a land use planning program, benefits which are not often immediately apparent. The voting public wants results from action; they need jobs. Conceptual land and resource development plans looking twenty years into the future are not understood as a way to lay food on the table today.

Economically, Swain County does have the potential to create jobs and greatly improve the outlook for the County as a whole. There has been an active Economic Development Commission (EDC) since March of 1991. The EDC has worked diligently to understand the ins and outs of economic development. There are many difficulties in learning exactly what incentives are able to attract manufacturing clients. The assistance programs offered by the State are often difficult to apply for and have not always been fully funded by the legislature. The economic assistance the County can offer is often dictated by low finances.

The EDC has been successful in establishing a Capital Reserve Fund which is in the range of $175,000. While for Swain County this is a fairly substantial amount of money, in the larger scheme of industrial or manufacturing recruitment in the southeastern United States, much more money is usually required to meet the client’s needs.

The EDC has also been successful in posturing the Swain County Industrial Park for further development. There is a 24.3 acre tract slated to be partially graded in February to March of 1994. The site will accommodate a 30,000 square feet building with an expansion capability of another 30,000 square feet. The size of this building has been determined to be one of the most marketable in this region.
Unfortunately, this expansion at the Industrial Park comes at a time when two of the largest manufacturing sites in the County are dormant. A former manufacturer of mobile communication shelters for the U. S. Army has gone from over 200 employees to approximately one dozen after they lost their defense contract and laid off workers in August of 1991. The other business, a textiles operation, has been out of business since declaring bankruptcy in July 1993. Both of these buildings account for approximately 213,000 square feet of nearly idle manufacturing potential.

At this time there are efforts underway to begin an aggressive marketing campaign of these two buildings.

C. Water System Improvements

One aspect of improvement within the infrastructure (and therefore the possibilities of economic development) of Swain County has been that of the city-owned water system (see Map 1 for illustration of water and sewer lines). Since 1976, Bryson City has been operating a water system with a safe water capacity of 300,000 gallons per day. During 1992, the average demand for water was 378,000 gallons per day. Bryson City has been operating under a special use permit from the Department of Environment, Health, and Natural Resources in order to continue to provide amounts of water which exceed the permitted levels.

This 300,000 gallons per day water system will be abandoned as soon as the new intake and water treatment plan is ready to go on-line in late 1994 to early 1995. The new water system, located on Deep Creek, will provide 800,000 gallons per day with additional pumping and storage capacity designed to serve Bryson City and the surrounding area with water service well into the future. This development is considered very important to the further expansion and security of the Industrial Park. Poor infrastructure is often taken as a given in rural areas, this project helps to dispel that image.

D. Planning Board

While Swain County has an active Economic Development Commission, there is no corresponding public body on the side of land use planning. A Planning Board would be an important component in connecting the Economic Development & Planning Office with the needs of the community as it is perceived by the local population. In order for the cause of planning to be advanced and sustained, there is a need for more direct input from the public into the plans which are put forth to make advancements in the community.

E. Future Land Use Map

The Future Land Use Map (See Map 5) is an effort by the Swain County Economic Development Planning Department to
predict the future development of the County. At best, this should be viewed as an educated guess based on past and present development patterns, plans for water and sewer expansion, relocation trends with retirees, and other related observable tendencies.

The land classification categories on this map were developed by the North Carolina Division of Community Assistance. They are listed and described as follows:

1. Developed - The purpose of the Developed class is to provide for continued intensive development and redevelopment of existing cities, towns, and their urban environs. Areas meeting the intent of the Developed classification are currently urban in character where minimal undeveloped land remains and that have in place, or are scheduled for the timely provision of, the usual municipal or public services.

2. Urban Transition - The purpose of the Urban Transition class is to provide for future intensive urban development on lands that are suitable and that will be provided with the necessary urban services to support intense urban development. Areas meeting the intent of the Urban Transition classification are presently being developed for urban purposes or will be developed in the next five to ten years to accommodate anticipated population and urban growth.

3. Limited Transition - The purpose of the Limited Transition class is to provide for development in areas that will have some services but that are only suitable for lower densities than those associated with the Urban Transition class and/or areas that are geographically remote from existing towns and municipalities. Areas meeting the intent of the Limited Transition classification will experience increased development (primarily residential) during the planning period. They will be in a state of development necessitating some municipal type services such as community water or sewage systems.

4. Community - The purpose of the Community class is to provide for clustered, mixed land uses at low densities to help meet the housing, shopping, and employment needs of rural areas. Areas meeting the intent of the Community classification are presently developed at low densities that are suitable for private septic tank use. Municipal type services should be anticipated only to correct existing or projected public health hazards.

5. Rural - The purpose of the Rural class is to provide for agriculture, forestry, mineral extraction, and other allied land uses. Areas meeting the intent of the Rural classification are appropriate for or presently used for agriculture, forestry, mineral extraction, and other uses
that due to their hazardous or noxious nature should be located in a relatively isolated and undeveloped area. Very low density dispersed single family residential uses are also appropriate within the Rural class.

6. Conservation - the purpose of the Conservation class is to provide for effective long-term management and protection of significant, limited or irreplaceable areas. Management is needed due to the natural, cultural, recreational, scenic, or natural productive values of both local and more than local concern. Areas meeting the intent of the Conservation classification include lands significant because of their natural role in the integrity of the mountain region such as ridge tops, areas of excessive slope, floodplains, wetlands, areas with high potential for wildlife habitat, and areas that contain significant productive, natural, scenic, cultural, or recreational resources.

The Future Land Use Map has been included last within this report because it is meant as a visual guide to the future. All of the information within this report should serve Swain County by providing information which is useful in laying the foundation for land use development and resource allocation decisions which will be necessary for bringing about a newer and better Swain County.
BIBLIOGRAPHY


LINC System - North Carolina Data Center


Swain County/Eryson City Parks and Recreation Department. "Recreation Today and Tomorrow Swain County Parks and Recreation Master Plan 2002."

