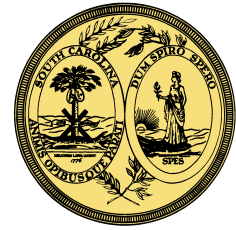


SPRINGS OF SOUTH CAROLINA

by
H. Lee Mitchell
2004



HYDROLOGY/GEOLOGY MAP 6

SOUTH CAROLINA DEPARTMENT OF NATURAL RESOURCES

John E. Frampton, Director
Alfred H. Vang, Deputy Director

Hydrology/Geology Map 6 "Springs of South Carolina" is a 1-page, 26-inch by 17-inch publication. The contents of that report have been reproduced in this 5-page, 8½-inch by 11-inch report for the convenience of those wishing to print that report on letter-size paper. The contents of this version are identical to the contents of the original report.

SPRING LOCATIONS AND NAMES

South Carolina has an abundant water supply, both in its surface water—in streams and lakes—and in its ground water—in wells and springs. Early explorers and settlers and, of course, the Native Americans who came before, depended on this plentiful water supply.

Traditionally, communities were founded near streams or springs, and many towns indicate the important role of springs in their origin by including the springs in their names. Boiling Springs in Spartanburg County is a good example, as are the towns of Cherokee Springs (also in Spartanburg County), Heath Springs (Lancaster County), and Sandy Springs (Anderson County). Other towns were founded around springs,

although they may not have the same name as the spring, such as Mineral Spring at Williamston (Anderson County).



Boiling Springs, Spartanburg County



Mineral Spring, Williamston, Anderson County

Many springs were named after trees such as Beech, Cedar, Holly, and Poplar, or other natural features near the springs, giving names such as Rock, Rocky, Sandy, or Mountain, for example. Then, of course, there are descriptive names such as Double, Clear, Cold, Cool, Grunting, and Stomp, to name some. The names Badwell Springs, Buzzard Spring, and Dismal Spring may not appeal to some folks, but names that communicate their special properties, such as Iron Springs, Standing Springs, and Sulphur Springs, and springs with unusual names such as Jews Harp Springs and Nail Springs (as well as the hopeful Love Springs) certainly pique the interest and invite visits.

HISTORICAL SPRINGS

Besides the historical impact of springs on the settlements that later became towns, springs also figured prominently in events such as the Revolutionary War. Both British and American soldiers used Liberty Springs in Cross Hill, Laurens County. One tradition is that during a smallpox outbreak soldiers from both sides remained near the spring for several weeks, and by agreement no fighting occurred near this spring. Another story is that the “Sons of Liberty” used the spring as a meeting place to plan strategy against British rule. Similarly, soldiers used Limestone Spring in Gaffney, Cherokee County, in the revolution. A hotel built near this spring in 1835 later became Limestone Springs Female High School, which is now Limestone College. There is archeological evidence that a spring at William Bates House in Greenville County was in use by Native Americans as much as 3,000 years ago.



Limestone Spring, Gaffney, Cherokee County

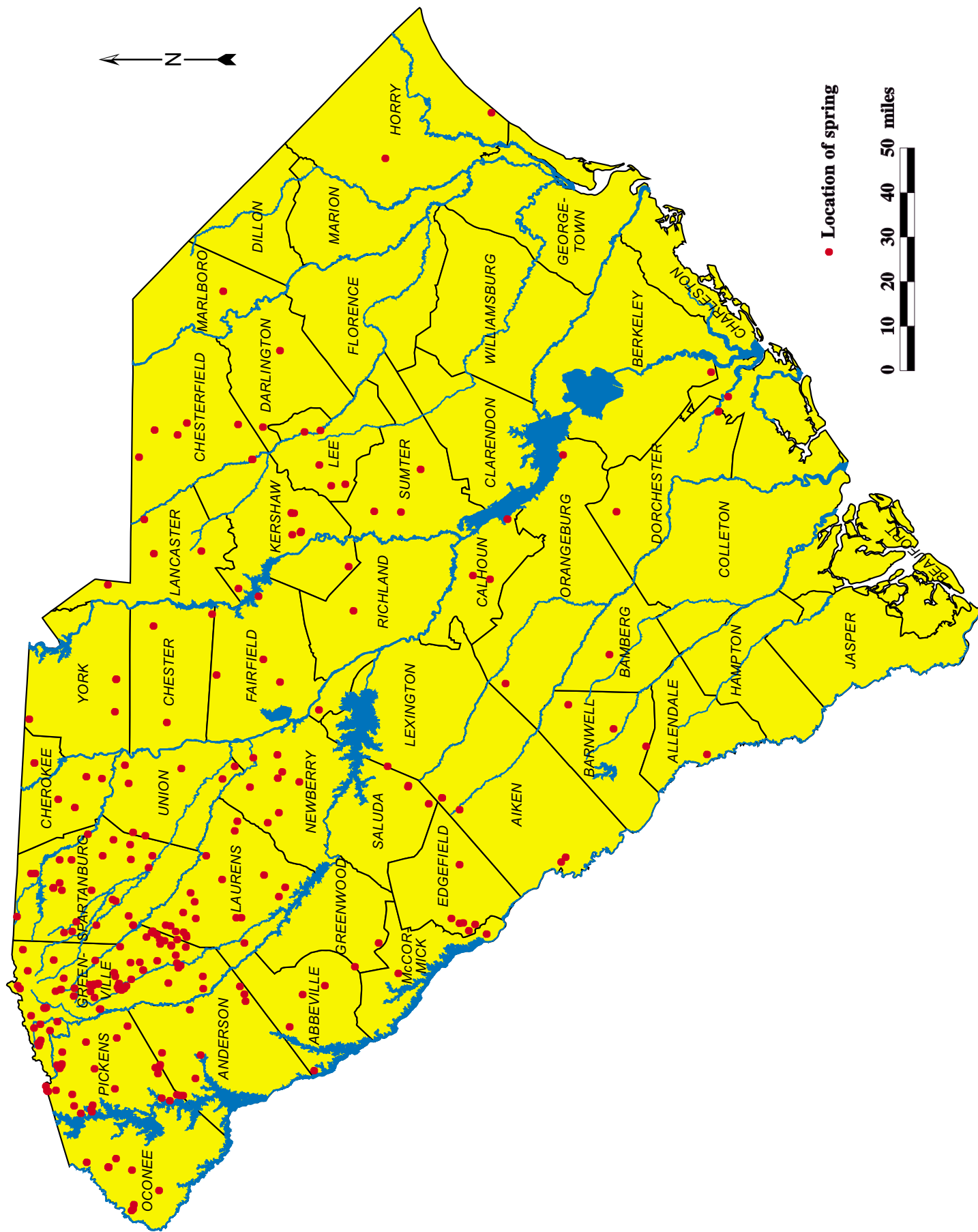
Healing Springs in Barnwell County has some of the oldest stories, which date to the 1700’s and the Native Americans who believed in the springs’ healing powers. An interesting part of the history of these springs is a Revolutionary War story about four wounded British soldiers brought to the springs after battle. Left to die, the soldiers drank the water, recovered from their wounds, and rejoined their comrades in Charleston. Perhaps most interesting, however, is the name of the present owner of Healing Springs. The previous owner, L. P. Boylston, deeded Healing Springs and one acre of land to ALMIGHTY GOD in 1944. He stated that he



Healing Springs, Blackville, Barnwell County

“should return forever a part of which He, my God, has allowed me to possess and enjoy according to the laws of my country for many years, and feel that I should return to Him the most treasured piece of this earth that I have ever owned. . .in Trust . . .for the diseased or afflicted to use the precious healing water that flows from this God-given source.” That one acre of land with Healing Springs is known as God’s Acre.

There are many other springs, all over the State, with equally interesting historical backgrounds.



WHAT IS A SPRING?

A spring is a place where ground water flows naturally from rock or soil onto the land surface or into a body of water. A well, on the other hand, is an artificial, or manmade, excavation into the ground deep enough to reach ground water, allowing it to flow or be pumped out. A flowing well, often confused with a spring, is a well from which the water flows out under pressure—but it is not a spring. The headwaters of essentially all streams are technically springs, although generally the springs of interest are those that flow out of rock or the ground in such amounts as to be useful or at least noticeable.

WHERE ARE SOUTH CAROLINA'S SPRINGS?

Most of the State's springs are located in the Piedmont and Blue Ridge provinces, or the upper one-third of South Carolina, northwest of the Fall Line. This is because the igneous and metamorphic rocks of this area have many fractures and faults, which allow the movement of ground water from depth to the surface, in addition to the greater topographic relief, which facilitates the flow of spring water. There are numerous springs in the Coastal Plain also, of course, although most ground water reaching the surface naturally in the lower two-thirds of the State shows itself as creeks and marshy areas. Many of the State's springs were inventoried for this report, but by no means all of them.

BOTTLING PLANTS AND RESORTS

Many springs are known for their mineralized water and perceived medicinal or restorative powers, either in bottled form or in spas and swimming pools. Blenheim Ginger Ale reportedly was bottled at Mineral Springs in Marlboro County, which were discovered in 1781 by a revolutionary soldier escaping from Tory troops. He lost a shoe in a water hole and, returning later for it, noticed the strong mineral taste of the water.

Whitestone Spring in Spartanburg County was also bottled, as was the water at Harris Springs in Laurens County. Many resorts and hotels were built around springs; some better-known locations are Glenn Springs in Spartanburg County and Chick Springs in Greenville

County. The following testimonial for the water from Big Springs in Kershaw County helps to explain the popularity of these resorts:

McBee S. C. April 3, 1914

Big Springs Resort Co.,

Bethune, S. C.—

Gentlemen:

I can heartily recommend Big Springs water for rheumatism, chronic indigestion, Bright's disease and other kidney and bladder troubles, as I have seen it tried in a good many instances and have noted beneficial results.

I believe if this water is used for a reasonable length of time it will produce a permanent cure in such cases.

Yours truly, J. D. Ingram, M. D.

In addition, the former proprietor of Big Springs explains some more of its benefits:

Big Springs water should be used to bathe the affected parts (external) as well as drank [sic]. Recognizing the inability to do this successfully at the home, there (are) now large swimming pools for the pleasure-seekers, where the sick or well can have any kind of a bath needed or wanted. This is something that but few health resorts have, but this Spring, as the name implies, flows over 300 gallons per minute—ample for all needs, with a temperature of 57 degrees. You don't need ice in this water.

Indeed, more recent measurements reportedly showed the spring to flow at least 300 gallons per minute, if not more. It was enough to easily fill a 100,000-gallon swimming pool that was enjoyed not only at the turn of the century but even into the early 1960's. In the late 1940's, then-governor Strom Thurmond and his wife Jean visited and enjoyed the pool fed by Big Springs.

The high rate of flow for this spring is unusual, however, as most of the springs in the State average less than 10 gallons per minute. While most springs flow at a constant rate and have been flowing for centuries, if not longer, many springs have decreased their output during dry times, and some have dried up entirely. On the other hand, there are still many springs that are seemingly unaffected by drought.

WATER QUALITY

The chemical properties of springs in South Carolina are similar to those of well water in the same area, which is logical given that they both usually come from the same aquifer. The springs sampled for this study have a median pH of 5.7 and a median hardness of 6.4 parts per million (milligrams per liter), which makes it “very soft” water. The median dissolved solids, calculated from measured temperatures and conductivities, is 25 parts per million, which is very low mineralization. Of great interest to partakers of spring water at the source is the temperature; most spring owners seem to believe theirs is the coldest in the region. Median spring-water temperature sampled was 62 °F (16.6 °C), with the coolest measured at 53 °F (11.4 °C). As for water potability, that is left to the discretion of the person drinking it, as bacteria and other possible contaminants were not evaluated for this study.



Moody Springs, Oconee County



Waddy Thompson Spring, Greenville

As long as springs are protected they should continue to be a source of pleasure and inspiration for years to come. Perhaps a better understanding of the characteristics and history behind each spring will help bring about such protection and stewardship of this valuable resource.

For more information, please contact Lee Mitchell at 864/467-2770 or mitchell@dnr.state.sc.us.

This report is dedicated to Mr. Rodney N. Cherry, former Chief of the Hydrology Section—Land, Water and Conservation Division, South Carolina Department of Natural Resources.
