

## The Heartbreak of *Psoralea*

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Many first-time visitors to the UNC Herbarium ask, “Do you have any really rare plants?” My answer is, “Yes, hundreds! This is the main repository for rare plants inventoried by the North Carolina Natural Heritage Program.”

If that fails to impress, I show them Accession #566869: *Psoralea stipulata*—now categorized as *Orbexilum stipulatum* (Torrey & Gray) Rydberg—collected by C. W. Short in 1842.

*Orbexilum stipulatum*, commonly called Falls-of-the-Ohio Scurfpea, is an Ivory-billed Woodpecker of the plant world: it was last seen in 1881 and is presumed extinct. Biologists cling to the hope that it too will be rediscovered.

All known specimens of *Orbexilum stipulatum* were collected between 1835 and 1881 from a single location: Rock Island, Falls of the Ohio. Though some herbarium specimens claim this location as Indiana or Ohio, the river channel is within the Commonwealth of Kentucky (the Northwest Ordinance of 1787 defined the Indiana state line as the north bank of the Ohio River<sup>1</sup>). The Falls of the Ohio is a 26-foot drop over a series of rapids and rock shelves in a 2-mile stretch of the Ohio River. Louisville, Kentucky, and Clarksville, Indiana, grew up at this navigational barrier. Rock Island, one of the larger islands in the cataract, “is (or was) a small Devonian limestone island of the Falls of the Ohio River and within the Louisville, Jefferson County, Kentucky corporate limits. Most of the island was destroyed in the 1920s as a consequence of building U.S. Dam No. 41 . . . and the Louisville Hydroelectric Plant.”<sup>2</sup>

Charles Wilkins Short, M.D. (1794–1863) made many collections of *Orbexilum stipulatum* over a 20-year period, all from Rock Island. The UNC Herbarium specimen, collected by Short in 1842, is in perfect condition. Asa Gray (1810–1888) praised Short as “the first in this country to prepare on an ample scale dried specimens of uniform and superlative excellence and beauty . . . the vast improvement in the character of the dried specimens now generally made by our botanists may be mainly traced to the example and influence of Dr. Short.”<sup>3</sup>

Will Falls-of-the-Ohio Scurfpea be rediscovered in the wild? Suitable habitats—flood-scoured riverbank bedrock, gravel bars, and limestone barrens and glades—exist nearby in Kentucky

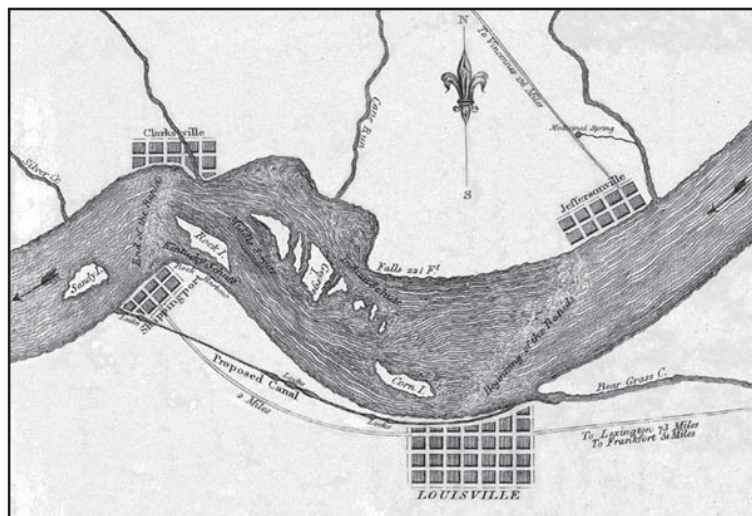
and Indiana. Happily, another Rock Island refugee was recently discovered in Indiana. *Solidago shortii*, named in honor of C. W. Short by Asa Gray, had disappeared from Rock Island by the late 1860s. It was believed extinct until a population was discovered in 1939 by Dr. E. Lucy Braun in Kentucky more than 160 km east of Rock Island. In 2001, during a botanical inventory of the Blue River in Indiana, researchers found a population of *S. shortii*. This site is “perhaps Indiana’s largest and most diverse example of the brush prairie gravel wash community. . . situated at the base of a south-facing slope bordering the Blue River . . . 18 km upriver from the Ohio River.”<sup>4</sup>

Is *Orbexilum stipulatum* alive and well, lurking on some gravel island in southern Indiana or northern Kentucky, awaiting rediscovery like *Solidago shortii*? Perhaps, but optimism must be tempered by the probably lack of a seed source: although he observed the plant over a span of 20 years, Short never saw it in fruit, nor was he able to cultivate it.<sup>5</sup> For now, all we have are herbarium specimens.

While the UNC Herbarium is proud to be the conservator of such a rare specimen, we sincerely hope not to add many more species to our “exist only as herbarium specimens” list. Our goal is to preserve the flora of forests, streams, dunes, and islands so we can enjoy them where they belong—in the wild.

## References

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Falls of the Ohio, map ca. 1812 by John Melish (1771–1822)<sup>6</sup>