of this transition that Titian Peale's report on the birds and mammals he collected and painted while on the Wilkes expedition became superseded by a second report by John Cassin, who had not been on the expedition but who was authorized to use Peale's drawings. On the second front, botanists led by New York's John Torrey and Harvard's Asa Gray turned toward Europe for their professional standards. Their new approach to taxonomy and the shift from wilderness collecting to herbarium studies is epitomized by Gray. Traveling west only in 1877 after he had become the undisputed leader of American botany, he collected “from a railroad car which carried his wife, a cook, a picnic table with a white tablecloth, and other accoutrements of civilized life” (p. 157).

Porter's story is a fascinating one and provides a general pattern in which to place the episodes and details of early frontier natural history. At times, however, the author gets so involved with the particulars—many of which are spirited and enchanting—that the reader easily loses the central point. Considering that illustrations play such an important role in the natural history of the period and that Porter describes some at length, more reproductions might have been included for the reader's benefit.

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Jeremy Atack and Fred Bateman have produced a valuable addition to the literature on northern agriculture during the late antebellum period. A very detailed analysis of a sample of farms from the 1860 census manuscripts, the book is more a statistical account of the economic characteristics of northern farms and farmers than a descriptive survey of northern agriculture in the tradition of Percy Wells Bidwell and John I. Falconer or Clarence H. Danhof. As such, the book does not make light bedtime reading, but it nonetheless rewards the reader with some important insights about the character of northern farming.

Drawing on a sample of northern farmers compiled by Bateman and James Foust, the authors examine the demographic profile of the farm population (family size, fertility, and migration), the distribution of wealth (found to be relatively equal), the costs of farm enterprises, crop yields and labor productivity, the self-sufficiency question, and agrarian profitability. Some of the findings
(e.g., fertility was higher in the Midwest than the Northeast) are conventional and unsurprising, while others (e.g., farming was more profitable in the Northeast than the Midwest) are perhaps more novel and controversial.

All farms in 102 randomly selected townships are included in the sample. Some areas are very clearly overrepresented, while others are not adequately included. A calculation taken from page 112 and the published census shows that farms in the sample were 4.39 percent of the Kansas total, measured by "cash value"; by contrast, in Ohio, the sampled farms had only 0.26 percent of the state's cash value, one-sixteenth as much. Moreover, the selected Ohio townships are from counties with below average productivity by most measures. While over 30 percent of the farms are in Indiana (making the work a reliable description of Indiana farming), Massachusetts is not represented at all. Since some of the key statistics measured vary dramatically between states, this introduces potential distortions in the conclusions.

The possible impact of the sampling problem is hinted at in the discussion of profitability. The rate of return on northern farms where the results are weighted by farm capital is estimated at 12.1 percent (p. 250); where sampled farms are simply weighted equally, the return is estimated at 7.1 percent (p. 257). In either case, the authors conclude (probably erroneously) that agriculture was much less profitable than manufacturing, and that farmer behavior was still governed perhaps as much by a Jeffersonian romantic ideal as by strict economic rationality.

Despite these reservations about sampling and some undis- cussed estimation procedures, the book on balance materially increases knowledge of antebellum northern agriculture, and is accordingly must reading for American agricultural historians and students of Indiana history.

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Treason, espionage, and conspiracy against the state are activities best conducted without leaving a detailed documentary record, and it might be argued therefore that fiction is better equipped than history to explore the psychology of the marginal characters who engage in such work. W. Somerset Maugham's Ashenden stories, for example, are widely regarded as the best things ever written on espionage.