rately to shock and amuse the rich in their drawing rooms and tavern patrons in their stews—remain the major pictorial record of the times.

In this handsome volume, first published 21 years ago, George, an English social historian, brought together prints from the Hogarth era (1720–64), the "golden age" of caricature under George III (1765–1810), and the Regency period (1810–35), the last ending with the advent of *Punch* magazine and illustrated journalism.

Products of the Age of Reason, artists such as George Cruikshank and William Hogarth condemned social abuses and called for reform, yet, catering to the superstitious masses, ridiculed "progress." With no libel laws, everyone was fair game: young surgeons robbing graveyards (*The Anatomist Overtaken by the Watch Carrying off Miss W—in a Hamper*, W. Austin, 1773) or society dandies practicing the "art of not knowing people" (*The Cut Direct*, M. Egerton, 1827).

COLUMBIA LITERARY HISTORY OF THE UNITED STATES
Emory Elliott, general editor
Columbia, 1988
1263 pp. $59.95

Robert Spiller, editor of the 1948 *Literary History of the United States*, maintained that "each generation must define the past in its own terms." The *Columbia Literary History of the United States* handily meets the challenge. Not only does it reflect the "diversity, complexity, and contradiction" of critical opinion that has emerged during the past 40 years; it also manages to be both authoritative and provocative.

Without stinting on acknowledged masters such as Emerson and Faulkner, Elliott, the general editor of the volume, has broadened the scholarly canon to include previously neglected aspects of America's rich literary heritage. Nontraditional media, such as songs and prayers, are given their due as influential expressions of national identity.

Women, minority, and ethnic writers' contributions are given more than perfunctory nods. Wendy Martin's essay on Emily Dickinson disputes previous "distorted" analyses that focus on the poet's reclusiveness and its alleged causes (mental illness, repressed homosexuality). Robert Stepto finds that much criticism of black writers consigns them to "periods" or "movements," assuming that their "significance is more social than literary." Ignored, Stepto charges, are blacks' stylistic contributions and diversity.

The volume is divided chronologically into five parts, but the editors resist imposing "an image of continuity." Indeed, the section on origins includes four essays examining the distinct yet complementary contributions of native American literature, the writing of early explorers, and the English and Puritan traditions. As a result, some unexpected congruities emerge: In both American Indian and Puritan culture, the concept of "literature" is fundamentally spiritual. For the native American, words are "magical," and a person who utters a prayer or recounts a tale "is dealing with forces that are supernatural and irresistible." To the Puritans, the "central emphasis was on the Word," and the sermon united both artistic and divine impulses.

Science and Technology

**THREE SCIENTISTS
AND THEIR GODS:
Looking for Meaning in an
Age of Information**
by Robert Wright
Times Books, 1988
324 pp. $18.95

Science and religion, like the lion and the lamb, seldom lie down together. But when a scientist stumbles upon a plausible unifying principle behind the world's workings—Darwin upon natural selection, say, or Einstein upon relativity—he transforms himself from searcher into believer. "The scientist," says Wright, an editor at *The New Republic*, "enthralled by the principle's power, tries to expand that power" and "looks everywhere for manifestations and affirmations of its unity."

The three scientists profiled in this wide-ranging book labor in different fields—Edward Fredkin in computer science, E. O. Wilson in sociobiology, and Kenneth Boulding in economics and general systems theory. But Wright sees in their individual efforts to find patterns of meaning in the physical, biological, and human worlds an intellectual convergence. Moreover, the language that best describes this convergence comes from the theory of information. The brainchild of Bell Laboratory scientist Claude Shannon, information theory reverses (or restates in a subtler way) the second law of thermodynamics, which holds that the amount of disorder, or entropy, in the universe increases over time. But according to Shannon, the more disorder within a system, the more information—and therefore, paradoxically, the greater potential for structure and order.

With calculated ingenuousness, Wright induces