

ior, he argues, is work during the day, recreation during the evening, and sleep at night. So ingrained is this pattern that fully 20 percent of shift workers voluntarily give up their jobs rather than suffer the physical and mental consequences of having their "normal sleep-wakefulness cycle" disrupted.

Sleep deprivation leads to problems beyond loss of employment. Each spring, when we lose an hour of sleep changing to daylight-saving time, the death rate from automobile accidents in the United States jumps seven percent. In the fall, when we gain an hour, the pattern is reversed. Observes Coren: "As a society we must be running a fairly heavy sleep debt if the loss of one hour more of sleep can make it seven percent more likely that we will have a mishap on the road."

On how much sleep we actually need, the authors differ. Lavie states that five or six hours is enough if the individual "is alert and energetic during the day, and does not feel either chronic fatigue or a strong desire to sleep." Coren disagrees. He finds that "our normal efficiency, alertness, and creativity is not as good with eight hours of sleep as it is with 10."

Thus we face a conundrum: like the mutual fund manager, we want to use our time most efficiently. Yet to function at an optimal level, we need to invest more time in a reputedly inefficient, self-indulgent activity. "It is truly an odd feature of our society that short sleepers are idolized," writes Coren. "Today the person who runs on little sleep is seen as mentally tough, ambitious, and admirable." It's hard to imagine a successful person in any field advising a junior counterpart to get more sleep. Yet that may be just the right prescription. Both of these books underscore the point made by Aldous Huxley: "That we are not much sicker and much madder than we are is due exclusively to that most blessed and blessing of all natural graces, sleep."

—Richard Restak

**THE INTERNET &
WORLD WIDE WEB:
*The Rough Guide.***

By Angus J. Kennedy. Rough Guides.
224 pp. \$8

According to the futurists, we are on the verge of living in an electronic, paperless Information Age. But the paradox of this age

is that most of us learn about the new on-line world by reading books—a medium the "digerati" would have us believe is all but obsolete.

Among the dozens of volumes available, there are books about etiquette (*Rules of the Net: Online Operating Instructions for Human Beings*, by Thomas Mandel and Gerard Van der Leun), books about where to go in cyberspace (*Netchick: A Smart-Girl Guide to the Wired World*, by Carla Sinclair), books offering the vicarious experience of cyberspace for people still making up their minds (*Networld!: What People Are Really Doing on the Internet and What It Means to You*, by David H. Rothman), and books about falling in love on-line (*Throbbing Modems: How to Find Romance and Adventure on Your Personal Computer*, by Joshua Bagby).

Now the Rough Guide series of travel books has come up with *The Internet & World Wide Web*. It's hip-pocket- (or purse-) sized, which seems a conceit; this is arm-chair traveling, not real adventuring. That quibble aside, Kennedy's guide is a useful introduction to the arcana of getting connected to the various components that make up the Internet.

For starters, the author discusses the difference between on-line services such as CompuServe and Internet Service Providers (ISPs). He outlines the basics of making an initial connection and lists the software that would-be Net surfers will need (though anyone who has ever tried to install Internet software will testify that it can be pointlessly frustrating). Helpfully, Kennedy lists 15 questions to ask a prospective ISP. For example, he advises inquiring when the ISP is busiest, whether it charges a flat fee, and (this is important) whether it will supply the connection software and walk the customer through the installation.

Elsewhere, Kennedy explains Internet services such as e-mail, newsgroups (electronic bulletin boards to which people post messages), list-serves (electronic mailing lists), file transfers, and the World Wide Web (what most people think of when they think of the Internet). He also lists selected newsgroups and World Wide Web sites, as well as a glossary of terms and an introduction to "Net Language." And finally, a list of ISPs in the United States, Great Britain, Europe, Asia, and Australia is offered.

Just as it is paradoxical to learn about the

Internet from a book, so it is absurd to spend too much time reading about Net surfing. The knowledge needed to log on is not that complex, and once you've logged on, you

learn at the keyboard, not by turning pages. That said, this Rough Guide has the virtues of concision and thoroughness.

—David Nicholson

Arts & Letters

CHARLES IVES:

A Life with Music.

By Jan Swafford. W. W. Norton. 450 pp. \$27.50

Why, after being discovered, rediscovered, revived, and celebrated for three-quarters of a century, is Charles Ives's music still new and challenging? Perhaps because of its contradictions. Of all expressions by an American in any field of the arts, it is at once the most backward looking and the most forward looking, the most concrete and the most abstract, the most rooted and the most soaring. Even more than Walt Whitman or Winslow Homer, Ives is the quintessential American artist, as elusive in character as the country itself.

Until now, that is. Benefiting from a generation of first-rate Ives scholarship, both historical and musicological, composer and writer Jan Swafford has produced a striking biography that meets the toughest challenge facing any biographer of an artist: elucidating the links between the life and the work without trivializing either.

Here is a vivid depiction of the commercial and musical world of Danbury, Connecticut, where Ives (1874–1954) was raised. His eccentric father, George, director of the municipal band, appears playing his echo cornet and experimenting with half-tone scales—a radical experiment for the time, inspired both by his boundless imagination and, it turns out, by his reading of the work of the German acoustician Hermann von Helmholtz. Here also is an affecting portrait of Harmony Ives, one of history's most devoted artistic spouses. And, of course, Ives himself: a jock at Yale, a superb church organist, an innovator in the field of estate planning (which won him a fortune in the insurance business), a campaigner on behalf of the League of Nations and other lost causes, and, finally, an irasci-

ble old man spending a small part of that fortune promoting his music.

During Ives's early career, Americans were too swept up in the automobile, the radio, and the other accouterments of progress to focus on the music of this radical who dwelt on the past. One exception was Gustav Mahler, who chanced upon a score of Ives's Third Symphony in 1911. Mahler, then winding up an unhappy stint at the New York Philharmonic, recognized a kindred spirit in the Yankee composer and took the score back with him to Europe. It might have been Ives's big break, but it was not to be. Within months, Mahler was dead, and 35 more years were to pass before the Third Symphony was first performed in public. Ives received a Pulitzer Prize for it in 1947.

Swafford does an admirable job of discussing Ives's work, especially the programmatically rich Concord Sonata (his first success) and the Fourth Symphony, which drew upon his entire life's work. Free of technical jargon, Swafford's text demands nothing from the reader but curiosity and willing ears.

Like his would-be champion Mahler, Ives used music to express a complex vision of loss and transcendence. Both composers used commonplace sounds to create extraordinary new landscapes of sound. But there the similarity ends. With Ives, the "found sounds" of daily life were unscrubbed and raw, at times wildly dissonant. And the musical quotations included such drastic departures from approved European models as camp meeting spirituals, brass band marches, turn-of-the-century croon songs, and ragtime.

Here is the essence of Ives's Americanism. His taste was omnivorous, and he possessed a keen ear for the authentic and passionate in all types of music. Yet he refused