

twelve western states, with 33,000 of them leaking contaminated water. In 2012 Colorado listed seven mines that needed cleanup. The cost per year for the cleanup of each of these mines ranged from fifty thousand to one million dollars. Current laws tend to deter most cleanup efforts because groups that make some progress in cleaning up a site can still be sued and held responsible for the entire cleanup. Numerous bills have been introduced in Congress to address this problem, but none have been enacted. The authors discuss potential solutions to this litigation problem.

The divergent perspectives on the acid mine drainage problems on the upper and lower Animas River Watershed among stakeholders are discussed in Chapter 10. Historically, Silverton, in the upper watershed, has opposed any federal intervention, while Durango, in the lower watershed, has supported it. The work of several groups trying to address the problem is discussed.

The final chapter sums up the overall problem of acid mine drainage with its title “We All Live Downstream.” As Andrew Gulliford states: “The Old West of no rules, no regulations, and every man for himself has left a legacy of 161,000 abandoned mines, 33,000 of which leak acidic toxins. . . . We learned the hard way that there is municipal water, agricultural water, recreational water and tribal water and it is all the same.”

Since the book contains a dizzying array of acronyms, a glossary would have been useful. While this book does not provide a solution to the problem of acid mine drainage in the American West, it does provide a new framework for how we might react to future spills.

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Eleanor Herz Swent. *One Shot for Gold: Developing a Modern Mine in Northern California*. Reno: University of Nevada Press, 2021; 254 pp., 20 b&w illus., 1 map, append, ref., ind., cloth, \$45. ISBN: 9781647790066

Eleanor Herz Swent’s *One Shot for Gold* chronicles the first attempt at full-scale mining in California after the enactment of federal and state environmental laws late in the twentieth century. The book offers a riveting account of how the open pit McLaughlin Mine in northern California produced 3.4 million ounces of gold while setting a new standard for American mining. And it is fun to read!

Having said fun, one hastens to add that the book draws from a lode of primary materials, including contemporary articles and publications, company and public documents, and thirteen volumes of interviews with the active participants—corporate executives, geologists, engineers, attorneys, government officials, academics, environmentalists, mine workers, merchants, and neighbors.

A table of references reveals that the materials come from the University of California, Berkeley’s Oral History Center, where Swent herself directed the oral history series on western mining. Many of the excerpted interviews are available online from the history center. Swent was the sole interviewer for this book.

Thus, one hears the story of modern mining and reclamation from a hundred voices, each singular and clear, entering on cue from the conductor’s baton. Swent bridges the vocals with transitions and themes, harmonizing the whole.

One voice no reader will forget belongs to Billy Wilder, a hard scrabble entrepreneur turned miner who developed a mercury mine near the junction of California’s Lake, Yolo, and Napa counties. Good natured as he was, he allowed geologists from Homestake Mining to drill core samples which validated their ideas about the nexus of mercury, hot springs, and gold. Even as he

drove a hard bargain with Homestake, its corporate executives could not help liking Wilder, and the local community testified to his generosity.

Another important voice belongs to an unlikely mining man, Raymond Krause, who had been inspired when young by the first Earth Day celebration in 1970. He had served as a county planning director and dreamed “about how we’d make a better world.” He became Homestake’s environmental manager for the project and helped the mine to obtain the 327 permits needed to begin operations. He had the vision which transformed the McLaughlin Mine, after the gold was extracted, into the McLaughlin Natural Preserve, managed by the University of California, Davis.

A chorus of voices, including metallurgists and mechanical engineers, tell of the global effort to develop the autoclaves, the continuous-pressure oxidation system that beneficiated gold ore in compliance with environmental regulations. Although Homestake produced over a billion dollars in gold from the McLaughlin between 1985 and 2002, its profits proved negligible due to a huge capital investment, high operating costs, and the price of gold sometimes slumping below three hundred dollars per ounce.

Many women speak in these pages, including the office secretary at the mine, Marion Onstad, who encouraged women to apply for mining jobs and created a coloring book to teach children about the project. Another was a spokeswoman for the local Sierra Club chapter. A third was Sylvia Cranmer McLaughlin, wife of Homestake’s chairman of the board and founder of an early environmental group called Save San Francisco Bay.

One Shot for Gold is a kind of *Spoon River Anthology* without the remorse because it tells the redemptive story of how a historic mining company endeavored to sow grasslands even as it struggled to reap profits. Not lost in the story is how the families of Homestake workers made a lasting impact on towns near the mine by aiding community projects, sending kids to local schools, and simply being neighbors.

The people of the McLaughlin Mine are characters who found their author in Swent. She was born and raised in Homestake’s hometown of Lead, South Dakota, and lived for many years in mining communities. She is a past president of the Mining History Association and winner of the Rodman Paul Award for her contributions to mining history. In 1998 the South Dakota School of Mines and Technology awarded her an honorary doctorate.

One Shot for Gold is right on target. Swent wastes no words in telling the McLaughlin Mine’s story. She repeats a phrase only when offering a useful reminder. Over about two hundred pages, she tells the story with dispatch, with the deliberate haste of a business enterprise and the clarity of a gifted historian. Having visited the McLaughlin Mine repeatedly herself and having worked with these materials for decades, Swent had one shot to tell this story. She hit a bullseye.

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Priscilla Wegars. *Polly Bemis, The Life and Times of a Chinese American Pioneer*. (Asian American Comparative Collection Research Report, No. 5.) Caldwell, ID: Caxton Press, 2020; 556 pp., 134 b&w illus., 10 maps, append., notes, bib., ind., paper, \$29.95. ISBN: 9780870046407

Polly Bemis was a legendary figure in the history of the Warren, Idaho, mining district. Well-known among the tellers of local tales, her story reached a wider audience with the 1981 publication of Ruthanne Lum McCunn’s biographical novel *Thousand Pieces of Gold*, and an award-winning 1990 film of the same name. Priscilla Wegars’ comprehensive study of this extraordinary Chinese immigrant is equally award-winning. The Mining History Association awarded it the Mary Lee Spence Documentary Book Award for 2019-2020.

Wegars is a prominent archaeologist and his-