ogy of rhinovirus pneumonia in humans with isolation of rhinoviruses from lung tissue [5, 6]. One [5] reports that specific histological changes attributable to the infection were not found in pulmonary tissue, and the other [6] reports that the scattered zones of interstitial pneumonia with hyaline membranes covering some of the affected alveoli were present throughout the lungs.

In our case, examination of the lung showed remarkable histological changes, including hyperplasia and desquamation of the alveolar lining cells, as well as immunohistochemical localization of rhinovirus antigen in the alveolar epithelial cells and macrophages. These findings may suggest that rhinovirus can attack primarily the alveolar lining cells. They are dramatically different from previous descriptions of the pathology associated with rhinovirus infection; however, the nature of our patient’s underlying illness and his multisystem failure may have complicated the lung pathology and made its interpretation difficult.

Coccidioidin Skin Testing in Kern County, California: Decrease in Infection Rate over 58 Years

Skin test surveys in the late 1930s indicated that many people in Kern County, California, had been previously infected by Coccidioides immitis. We report the results of serial coccidioidin skin test surveys conducted since 1959 and compare them with the results of the 1937–1945 studies [1–7]. Both sets of surveys were done in the Bakersfield-Delano area, centrally located in California’s southern San Joaquin Valley. We considered a positive test to be 5 mL of induration read at 48 h. Coccidioidin was used until the 1980s (lot 64 from C. E. Smith [Stanford University School of Medicine, Stanford, CA] and, in the first study, some from J. Kessel [University of Southern California School of Medicine, Los Angeles]), when it was replaced by spherulin (ALK Laboratories, Wallingford, CT). For epidemiological purposes, the difference between these 2 reagents is negligible.

Results of the serial coccidioidin skin test surveys (figure 1) are expressed as the infection rate (IR), that is, the number of people infected by C. immitis each year. This number is determined from the percentage of positive reactors in subgroups whose members have lived in the study area for different specified periods.

Among students who had lived in the area 10–14 years, the IR was just over 10% in 1937–1939. In 1959, the IR was >4%, and it dropped to ~1% by 1971. It declined further in 1978 and 1984 but returned to the 1971 level in May 1992, early in what proved to be the 1991–1994 epidemic [8]. Among children in kindergarten and first grade who had lived all of their 5–7 years in the area, the IR approached 10% in 1937–1939, then dropped to 2% by 1959 and to ~1% thereafter. Our 6 student surveys from 1959 to 1992 (8491 students were tested) showed an even more dramatic decrease in IR than was seen in the adult studies whose data are presented in figure 1.

Among adults who were 15-year residents, the IR dropped from >10% per year in the late 1930s to ~4% in 1979–1984 and to ~2% in 1995. For 5–9-year residents, the values were >10% in the 1930s, ~5% in 1979–1984, and ~4% in 1995 (with higher levels of exposure during the 1991–1994 epidemic). The IR among adults was greater than that among high school students, which was greater than the IR among children.

Waning of skin test reactivity with time has long been observed, even in areas of endemicity. Maddy et al. [9] found that this waning occurred after 12 years of residence, and Sievers and Fisher [10] used 14 years of exposure for comparative purposes, noting that coccidioidin reactivity decreases in many people after that. Our similar observations suggest that using 15 years of residence as the comparison point may avoid the uncertainties introduced by waning reactivity.

Increasing cultivation, irrigation, and urbanization over the years, all activities expected to decrease the amount of C. im-

References
Figure 1. Rate of *Coccidioides immitis* infection in Kern County, California. ●, 1937-39: students (n = 3400). Over 8000 adults showed a higher infection rate (IR), but the data are incomplete. △, 1979-82: adults (n = 893). Six student surveys from 1959 to 1992 (n = 8491) showed an even more dramatic drop in IR over the years. Curved dotted line, annual IR, showing rates of 10%, 4%, and 2%.

Uncomplicated Postoperative Lipoid Meningitis Secondary to Autologous Fat Graft Necrosis

Autologous free fat grafting is a common and effective method of reconstructing skull base surgical defects and has been associated with minimal morbidity. To our knowledge, only 3 cases of postoperative aseptic lipoid meningitis have been reported. All of these patients had complicated courses. We report a case of uncomplicated postoperative lipoid meningitis following subarachnoid fat migration from an autologous fat graft after resection of an acoustic neuroma.

A 67-year-old woman with history of hypertension and type II diabetes mellitus complained of a 2-month history of progressive left-side hearing loss. MRI of the brain revealed a left-side acoustic neuroma, and she underwent translaybyrinthine resection and autologous abdominal free fat grafting of the surgical defect. After the surgery, she developed CSF rhinorrhea that required 2 therapeutic lumbar punctures (days 15 and 24.

References


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