Recent advances in antiretroviral therapy have raised hopes that in time HIV disease can be transformed from an almost inevitably fatal immunosuppression to a chronic but usually manageable condition, much like diabetes. Some optimists have even bruit the possibility of cure if viral replication can be suppressed long enough. The latest “wonder drugs” (the protease inhibitors; e.g., ritonavir, indinavir, saquinavir) are expensive, have sometimes intolerable side effects, and may have a limited effectiveness because of increasing drug resistance. Real hope for controlling the epidemic, both here and abroad, still lies with stopping HIV transmission.

How can we reduce the spread of HIV? While an effective vaccine would be nice, vaccine development has been deferred until if and when these technical questions are resolved. At least for the foreseeable future, vaccines are not the answer.1 The latest “wonder drugs” (the protease inhibitors; e.g., ritonavir, indinavir, saquinavir) are expensive, have sometimes intolerable side effects, and may have a limited effectiveness because of increasing drug resistance.2,3 Real hope for controlling the epidemic, both here and abroad, still lies with stopping HIV transmission.

Since 1987, the proportion of reported AIDS cases who are MSM has steadily declined. Among women has increased (from 3% to 8%). For women with AIDS, as their only risk factor; and 6% reported no identifiable risk. The proportion of total AIDS cases who are MSM has steadily declined. Overall, 411 (92%) were men.

Since 1987, the proportion of reported AIDS cases who are women increased from 3% to 8%. For women with AIDS, having sex with an HIV-infected man was also the most common risk factor. Among the 35 women reported as having AIDS, 8% who were also injection drug users (IDU); 10% were heterosexual IDU; 16% reported heterosexual contact with a partner at risk or infected with HIV; and 8% had no identifiable risk. The number of MSM who tested positive at public clinics has decreased nearly every year since 1990.

Sero-Surveys
The Health Division monitors the prevalence of HIV infection in selected populations through a number of anonymous sero-surveys, in which blood samples taken for other purposes are anonymously tested for HIV antibodies. In 1995, HIV seroprevalence in these populations were: 9.9% among MSM attending Multnomah County STD clinics; 2.3% among clients entering drug treatment/detox centers; 1.2% among new correctional facility inmates; 0.05% among childbearing women (Jan to mid-April, 1995); 0.04% among military recruits; and 0.0015% among blood donors. These data confirm that those at greatest risk in Oregon continue to be MSM and IDU. Spread of the epidemic beyond these populations remains limited.

AIDS Surveillance
In 1995, 446 Oregonians were reported as having AIDS. By self-reported risk category, 70% were MSM; 11% were MSM and IDU; 11% were heterosexual IDU; 1% were hemophiliac; 1% reported heterosexual contact as their only risk factor; and 6% reported no identifiable risk. The proportion of total AIDS cases who are MSM has steadily declined. Overall, 411 (92%) were men.

Since 1987, the proportion of reported AIDS cases who are women increased from 3% to 8%. For women with AIDS, having sex with an HIV-infected man was also the most common risk factor. Among the 35 women reported as having AIDS in 1995, 18 (51%) reported heterosexual sex as their only risk factor; 14 (40%) were IDU; 1 (3%) had received blood or blood products; 2 (6%) had no risk factor identified.

Although Multnomah County continues to have the highest AIDS incidence, most other counties have been affected by the epidemic (see map). Since 1989, 2,080 AIDS related deaths has been reported in Oregon. AIDS has become the second leading cause of death (after injuries) for men aged 25-44.
CONCLUSIONS

Have prevention programs had an impact on the epidemic in Oregon? It’s hard to say. The decline in new diagnoses does appear to be largely driven by a declining incidence among the subpopulations that have been the target for many such programs (i.e., MSM and IDU). While this is gratifying, there are several caveats to this story. First, public sector counseling and testing programs were set up to reach those at highest risk. An increasing proportion of HIV tests are being done in the private sector, however, where no risk factor information is collected. Thus, the decline in new diagnoses could have resulted from fewer high-risk persons getting tested, and the apparent decrease in HIV diagnoses among MSM could stem from a greater proportion being tested in private sector settings.

Second, some private sector tests are done at out-of-state laboratories, which have no legal obligation to report test results to the Health Division. Of course, Oregon physicians and other providers who order HIV tests are required to report the [generally anonymous] results (both positive and negative) to the Health Division, but difficult as it may be to comprehend, we suspect that such reporting may not be complete. Lastly, the advent of home collection kits for HIV testing—now available to Oregon residents by mail-order—promises to add a new wrinkle to these uncertainties. Some persons who perceive themselves to be at high-risk may use these kits rather than see a health care provider. If this manner of HIV testing becomes popular among high-risk groups, our ability to track trends in HIV incidence may be severely hampered.

While advances have been substantial, the epidemic continues to have devastating consequences. More than 400 Oregonians are becoming infected with HIV annually. AIDS is still the second leading cause of death among young men in Oregon. Because of the prolonged course of the infection, we will likely not see a substantial decrease in the number of persons presenting with AIDS in the near future. Only if the downward trend in new HIV diagnoses continues for several years will we finally begin to see a diminution of the AIDS epidemic. As of now, we have reached a steady state, with the number of new AIDS cases nearly equal to the number of new HIV diagnoses.

THE FUTURE

How will new therapies affect the rate of transmission? Will lower viral burdens in patients receiving therapy result in decreased infectivity? Will increased survival time result in an ever increasing population of infected persons? Will protease inhibitors be rendered useless by increasing viral resistance? Will recent advances in therapy result in an increasing number of high risk persons seeking diagnosis and treatment? There are simply too many unanswered questions to predict which way the epidemic will turn. One thing is certain: HIV and AIDS will be with us for many years to come. Excitement about new therapies should not be allowed to overshadow the need to emphasize primary prevention. If we become complacent, the dim light some now see at the end of the tunnel may be a train headed our way.

REFERENCES


Cumulative AIDS Incidence by County of Residence* 1985-95

* at time of AIDS diagnosis