Background
Over 1 million persons in the United States are estimated to be living with human immunodeficiency virus (HIV) infection, and ~50% of those infected persons are men who have sex with men (MSM).1 Human Immunodeficiency Virus (HIV) is transmitted through unprotected sexual activity, the sharing of injection equipment for intravenous drug use, and from mother to child during childbirth and breastfeeding. Both HIV and acquired immune deficiency syndrome (AIDS) are reportable conditions in Alaska. Persons at greatest risk for acquiring HIV in Alaska are MSM, high risk heterosexuals, and injection drug users (IDU).2 We describe here an outbreak of HIV in the Fairbanks area beginning in 2011.

Methods
The Section of Epidemiology receives reports from health care providers and laboratories for newly diagnosed cases of HIV and for persons living in Alaska who were previously diagnosed out-of-state. All persons newly diagnosed with HIV infection are interviewed to identify sexual and needle-sharing partners that need to be tested. Case and interview data are recorded in two Section of Epidemiology (SOE) databases, the HIV Management Information System and the Enhanced HIV/AIDS Reporting System.

Results
The HIV infection case count in Fairbanks remained stable from 2007 through 2010 and then spiked in 2011. A total of 9 cases of HIV were reported to SOE between January 1, 2011 and January 31, 2012. Eight (89%) of the persons whose infection was reported in 2011 or 2012 were MSM (Figure 1), and four (44%) were aged ≤20 years (Figure 2). Seven (88%) of the eight persons who were identified as MSM reported meeting anonymous sexual partners through internet sex-seeking sites.1

Discussion
We describe an outbreak of newly diagnosed cases of HIV infection in the Fairbanks area, primarily involving MSM that are epidemiologically linked to the U.S. Army and who report having anonymous unprotected sex involving both U.S. Army personnel and civilians. A substantial proportion of the recent cases are among younger men. Because many of the persons reported in 2011 and 2012 appear to be newly infected with HIV, there is heightened concern regarding the potential for increased transmission as persons with acute HIV infection often have higher levels of viremia.3

Internet sex-seeking sites have emerged as important venues for high risk sexual behaviors in association with acquisition of both HIV and syphilis. In Alaska, unprotected sexual encounters with online partners are not uncommon among MSM. Due to the largely anonymous nature of these sexual encounters, public health staff are often unable to identify, notify, and test exposed partners.

As part of the U.S. Army’s HIV screening and education program, soldiers receive annual education on the risks for contracting sexually transmitted diseases. Additionally, they are required to be tested for HIV every 2 years and prior to and upon return from deployment. Over the last 2 years, Fort Wainwright has conducted more than 12,000 HIV screenings. All other military beneficiaries can get free testing on base through their primary care or preventive medicine clinic.

Infection with HIV is not disqualifying for continued military service. Once a soldier has been identified as positive, they are counseled by preventive medicine and behavioral health staff and are case-managed by a U.S. Army public health nurse to ensure they receive all of the necessary medical care. Additionally, the U.S. Army gives them a legal order stating that they must inform any potential sexual partners that they are positive for HIV before engaging in any sexual activity.

Recommendations
1. Health care providers should promptly report all confirmed or suspected cases of HIV infection to the Alaska Section of Epidemiology via fax (907) 561-4239 or telephone (907) 561-4234 or 800-478-1700. All newly identified cases are offered partner services.
2. All persons with risk factors for HIV should use condoms when having sex and should seek testing to determine their HIV status.
3. All persons who request to be tested for HIV should also be offered gonorrhea, chlamydia, and syphilis testing.
4. Patients with risk factors for HIV who present for medical evaluation with symptoms of fever, malaise, lymphadenopathy, and skin rash should be tested using HIV plasma RNA testing to rule out acute retroviral syndrome.4

References
1. CDC MMWR Weekly October 28, 2011 / 60(SS14); 1-34. Available at: http://www.cdc.gov/mmwr/preview/mmwrhtml/ss6014a1.htm?s_cid=ss6014a1_e
3. CDC MMWR Weekly November 27, 2009 / 58(46); 1296-1299. Available at: http://www.cdc.gov/mmwr/preview/mmwrhtml/mm5846a3.htm