

USACHPPM
HEALTH INFORMATION OPERATIONS (HIO) UPDATE

20 December 2002

The HIO Update provides information regarding global medical and veterinary issues of interest to the United States (US) Army. The update does not attempt to analyze the information regarding potential strategic or tactical impact to the US Army and as such, should not be regarded as a medical intelligence product. Medical intelligence products are available at <http://mic.afmic.detrick.army.mil/>. The information in the HIO Update should provide an increased awareness of current and emerging health-related issues.

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HOT ISSUES

Air Pollution Responsible for 600,000 Premature Deaths Worldwide

14 December – The British Medical Journal published a study where health experts warn air pollution is a major burden on the developing world. Dr Michal Krzyzanowski of the WHO's Centre for Environment and Health told a conference to commemorate the 50th anniversary of the smog that enveloped London at the beginning of December 1952 that there were "striking similarities between developing countries and London 50 years ago." The World Health Report 2002, Reducing Risks, Promoting Healthy Life, looked at the impact of urban air pollution on ill health. Researchers studied air particles in 304 cities and found that air pollution globally was responsible for 1% of cardiopulmonary disease and 3% of cancers of the trachea, bronchus, and lung. This amounts to 600,000 premature deaths and 7.4 million disability adjusted life years (DALYs) worldwide every year. [View Article](#)

Antex Shigella Vaccine Safe and Immunogenic

16 December - Antex Biologics Inc. today announced that it has completed the required laboratory analysis for its Phase I human clinical trial of the Company's vaccine to prevent *Shigella sonnei* infection. The results of the trial demonstrate that the vaccine is well tolerated, and no serious adverse events were reported. The Phase I trial was funded under a U.S. Army contract. The U.S. Army's interest in a Shigella vaccine is to protect its troops deployed in endemic regions overseas, such as the Middle East. The Shigella vaccine is one of three components of the Company's combination ACTIVAX vaccine to prevent diseases caused by the consumption of contaminated food and water. ACTIVAX is a multi-component vaccine designed to prevent and eradicate travelers' diseases caused by Shigella, *Campylobacter jejuni* and enterotoxigenic *E.coli* (ETEC) bacteria. Diseases caused by the consumption of contaminated food and water are the most prevalent illnesses afflicting travelers and are serious problems for military troops deployed overseas. [View Press Release](#)

Birds May Spread Ebola Virus, Research Suggests

17 December – Reuters reported birds may be able to carry and spread the Ebola virus, a deadly African germ that has mystified doctors, U.S. researchers said. Writing in the Journal of Virology, Sanders and colleagues said their findings suggest bird viruses and Ebola have a common ancestor. They said Ebola, which has killed several hundred people in Congo Republic, the neighboring Democratic Republic of Congo, and Gabon since it was first identified in 1976, resembled some bird viruses. Specifically, the outer shell of Ebola is similar to those of several viruses carried by birds. "We knew these viruses were inwardly similar, and now we see their outer similarity as well," Sanders, a biologist, said in a statement. "While bird transmission of Ebola is by no means certain, the resemblance among all these viruses should encourage health officials to be on guard for it." Ebola kills an estimated 70 percent of victims, depending on the strain. Understanding Ebola is important, as it is considered a possible biological warfare or bioterrorism agent. [View Article](#)

Coley Pharmaceutical Group Awarded Defense Department Contract to Develop CpG Immunostimulatory Oligos for Enhancement of Vaccines

13 December – Stockhouse.com reported Coley Pharmaceutical Group announced that the US Defense Advanced Research Projects Agency (DARPA) has awarded \$6M to Coley to support the development of Coley's CpG immunostimulatory oligonucleotides (oligos) to enhance anthrax vaccines. The current anthrax vaccine requires six doses and 18 months to produce immunity. Coley's CpG oligos, used together with vaccines, have the potential to reduce the number of vaccine doses, induce protective antibody levels more quickly, produce higher affinity antibodies directed against a broader range of anthrax antigens, and to improve duration of protection. [View Article](#)

Filtering Office Lights Eases Workers' Eyestrain

16 December – Reuters reported filtering fluorescent lights in offices to produce light similar to natural sunlight reduces workers' eyestrain, a California optometrist reported at an American Optometric Association meeting. Dr. James LaMotte, an optometrist on faculty at the Southern California College of Optometry in Fullerton, and his research team evaluated the effect of filtered light on 49 data entry workers at California State University-Fullerton who worked under traditional fluorescent light. They first asked the workers to answer questions about eyestrain, then replaced the traditional panels over the fluorescent tubes with acrylic panels tinted to give off a more natural light. After 2 weeks working under the filtered lights, the researchers surveyed the workers again. Nearly 75% of the workers said they preferred the filtered light to the unfiltered. "We used a prismatic panel that is colored or dyed to absorb ultraviolet light and it changes it to a more natural light like sunlight," LaMotte explained. [View Article](#)

New Evidence That Diet Plays Role in Parkinson's

13 December – Reuters reported men, but not women, who eat a lot of dairy products appear to have a slightly higher risk of developing Parkinson's disease, but researchers cautioned that more study is needed to confirm the finding. In the newest venture into an understanding of the role of food in Parkinson's, Chen and colleagues at Harvard School of Public Health found that men who ate the most dairy products had a higher chance of developing Parkinson's than did men who ate the least dairy products. The authors report their findings in the December issue of

Annals of Neurology. Chen and colleagues base the findings on a follow-up of 47,331 adult men and 88,563 adult women from the 1980s to 1998, tracking what they ate and noting if any developed Parkinson's disease. During the study period, 210 men and 184 women developed Parkinson's disease. [View Article](#)

Part of AIDS Virus Can Hide Itself

16 December – The Washington Post reported a part of the AIDS virus that was considered vulnerable to attack can camouflage itself by changing shapes, says a study that helps show why HIV is so hard to target and kill. HIV cripples the immune system by infecting and killing T-cells. It uses a protein structure on its surface called gp120 to gain entry to the cells. In 1998, scientists announced that they had figured out much about the structure of gp120 and hoped that finding a vulnerability in it could lead to vaccines against HIV. But finding gp120's weakness has remained elusive, in part because the protein varies from strain to strain. Some scientists believed that the best hope was in targeting an area of gp120 common to all strains – a vulnerable region where it must expose its core in order to bind to a T-cell. But the new work shows that this region is more elusive than previously thought, because it is composed of very flexible parts that let it take on different shapes. That camouflages gp120 against the antibodies launched by the immune system as a defense, researchers report in the Dec. 12 issue of the journal Nature. Antibodies that do manage to latch on to the protein are less potent at killing the virus, possibly because of the trouble it takes to fix gp120 rigidly, said Joseph Sodroski of the Dana-Farber Cancer Institute in Boston, one of the researchers. [View Article](#)

Peptic Ulcer Linked to Anxiety Disorder

12 December – Health Scout News reported peptic ulcer disease and generalized anxiety disorder may have a common psychiatric/psychological link. A study in the November/December issue of Psychosomatic Medicine reports American researchers found that generalized anxiety disorder was associated with a greatly increased risk of self-reported peptic ulcer disease. The study also found people with generalized anxiety disorder that reported more anxiety symptoms were more likely to report they had peptic ulcer disease. The actual mechanism behind the link is unclear. Between 3 percent and 4 per cent of Americans have generalized anxiety disorder. Unremitting worry, lack of energy and a sense of dread are among the symptoms. [View Article](#)

Poinsettia Not Lethal, Experts Say

17 December – Reuters reported poinsettia plants are not poisonous, although eating the plant would likely cause upset stomach and possibly nausea and vomiting. "I wouldn't suggest eating them or using them to garnish a holiday meal--but eating the plant won't kill you," Dr. Frank McGeorge, an emergency room physician at Beaumont Hospital in Royal Oak, Michigan, told Reuters Health in an interview. So how did the pretty red plant that has come to symbolize the holiday season get such a bad rap? There was a single case report back in 1919 that attributed a child's death to eating some of a poinsettia plant, but some other factor was probably responsible, McGeorge explained. Since then, there have been numerous reports of poinsettia ingestion over the years but no case of death by poinsettia plant poisoning has ever been recorded. [View Article](#)

Static Electricity Can Ignite Vapors While You Pump Gas

16 December – The Sacramento Bee reported the Petroleum Equipment Institute, which makes and supplies pumps and other gas-station equipment, issued the first-ever warning about drivers suddenly catching fire while filling up. The culprit isn't cell phones, but rather static electricity that is generated when drivers slide out of their seats. When they reach for the metal nozzle, a zap of static ignites vapors released during fueling. In the last few years there have been 136 documented cases of static-caused fires nationwide ranging in damage from minor singes to severe burns and even one death. Most static fires occur in winter when heaters cut down the humidity inside the car. The best way to avoid static fires is to remain outside the vehicle during pumping. But if you have to go back in, touch something metal -- the door, the bumper or the hubcaps -- before handling the pump. [Additional Information](#) [View Article](#)

Two New Drugs for Influenza Developed

16 December – The Times of India reported Relenza (zanamivir) and Tamiflu (oseltamivir phosphate), two relatively new anti-viral medicines, could help minimize the misery of those suffering from influenza. However, the two drugs aren't for everyone, and they don't work if the flu has progressed too far. They're also expensive and aren't a substitute for getting a flu shot. But doctors say that in some patients, they're worth a try. Both Relenza and Tamiflu are known as neuraminidase inhibitors because they block the activity of the enzyme neuraminidase. If not barricaded, this enzyme breaks the bonds that hold new flu virus particles to the outside of infected cells, allowing new virus to be set free to infect other cells and spread infection. Relenza is approved to treat flu once it has occurred, and Tamiflu can be used to treat or prevent flu - for instance, if one member of the household already has flu and others don't want to catch it. [View Article](#)

UN Adopts Measures for Safe Disposal of Hazardous Waste

13 December – VOA News reported a United Nations conference has adopted measures to speed up global action to protect people and the environment from hazardous wastes. The measures were adopted at a conference in Geneva called to strengthen the Basel Convention, a U.N. treaty that laid down environmental standards for the disposal and management of hazardous wastes. The United Nations estimates the world produces about 150 million tons of hazardous waste each year. The major achievement of the conference was the adoption of a strategic plan to deal with all this waste. Over the next seven years, the plan aims to implement concrete measures to minimize risks from hazardous stockpiles of obsolete pesticides, used tools, toxic substances in ships, and so on. The conference also approved a series of guidelines on the disposal and recycling of batteries, plastic bottles, biomedical and health-care wastes. [View Article](#)

Vegetarian Diet 'Cuts Heart Risk'

15 December – BBC News reported researchers in Canada have developed a vegetarian combination diet, which they say cuts cholesterol by almost a third in just one month. The diet includes vegetables, such as broccoli and red peppers; soymilk and soy sausages; oat bran cereal and bread; and fruit and nuts. The researchers believe the food program could be a possible drug-free alternative to cutting cholesterol and protecting people from heart disease. The study is published in the journal Metabolism. [View Article](#)

USEUCOM

Measles Claims the Lives of 14 Zambians

17 December – AllAfrica.com reported a measles outbreak has claimed the lives of 14 Zambians in the country's northwestern province, where 485 cases of the virus have been reported in the past year. North West health director Dr Chipayeni Mtonga stressed that the outbreak was under control and that just 3% of those infected with the virus had died to date. The first measles case was reported at the Mayukwayukwa refugee camp in August last year. Mtonga said his department was conducting vaccination campaigns in the Solwezi and Meheba regions and would move to other areas until all children in the province aged between six and 15 years were immunized. [View Article](#)

Outbreak of Acute Respiratory Syndrome in the Democratic Republic of Congo

13 December – AllAfrica.com reported an outbreak of an acute respiratory syndrome in the northwest of the Democratic Republic of the Congo has now affected Bosobolo, Gbadolite, Gemena and Karawa, the World Health Organisation (WHO) reported. Preliminary studies report 1,245 cases of the illness, including 18 deaths, had been reported in Bosobolo alone. [View Article](#)

Portuguese Micro-Biologists Examine Strange Illness in Luanda

17 December – AllAfrica.com reported two Portuguese microbiologists took a sample of an unknown epidemic disease that is actually being observed in some children in Luanda, with an aim to make a genetic study and identify the disease. An infectious agent that invades the arterial wall and impedes blood flow may cause the illness. The symptoms presented are hard nails and the paralysis of some superior or inferior members. At the moment 11 cases were registered in the hospital, two of which need amputation. Officials consider the situation "worrying" because in most cases the children contracted the illness after being interned in the hospital. Thirty-four cases of the disease were registered in the same hospital last year. [View Article](#)

Swine Fever Strikes Masaka, Uganda

13 December – ProMed reported authorities in Masaka district of Uganda have imposed a quarantine on the movement of pigs after an outbreak of swine fever has left several animals dead. The District Veterinary Officer (DVO), Dr. Lawrence Mayega said at least 5 sub-counties have been affected by the fever. These include Kabonera, Kyamuliibwa, Kingo, Kisekka, and Malongo. [View Article](#)

USCENTCOM

Scientists Question Climate Change, Malaria Link

12 December – The Times of India reported climate change could be helping to fuel a rise in malaria in East Africa. Cases of the mosquito-borne disease that kills about 3,000 people a day around the world have surged in parts of the region during recent decades. Earlier research had suggested the upsurge was due to drug resistance and population growth, and not global warming. But scientists in the United States and Britain say it may not be just a coincidence that the rise in malaria parallels East African warming trends. Climate warming is thought to be a main contender because higher temperatures in the highland regions of East Africa could extend the transmission season so more people would be exposed to the malaria parasite. [View Article](#)

USNORTHCOM

Americans Still Don't Understand Smallpox

14 December – Reuters reported U.S. health officials said most people still do not understand how risky the smallpox vaccine is. Last week, President George W. Bush rolled out a long-awaited plan for starting vaccinations against smallpox in case of a biological attack, saying it would start with half a million troops and more than 400,000 doctors, nurses and health care workers. In a move that surprised many health experts, Bush also said the vaccine would be made available to anyone who really insisted on getting it. Health officials strongly discourage this, and said once people knew of the risks, they expected few to press for the vaccine. Dr. Anthony Fauci, head of the National Institute for Allergies and Infectious Diseases, said people's minds change when they find out about the side effects of the vaccine, which is based on the very first vaccine invented in 1790. [More Information](#) is available. [View Article](#)

Bush Orders Smallpox Vaccine for Military, Self

16 December – CNN reported President Bush announced that he is ordering some military personnel to be vaccinated against smallpox -- and that he himself will be inoculated. The vaccine will be administered to about 500,000 troops deployed in high-risk parts of the world in the first phase of the vaccination plan. The inoculations began Friday, 13 December, said Dr. Anthony S. Fauci, director of the National Institute of Allergy and Infectious Disease. The second phase will be to vaccinate about 440,000 public health-care workers, emergency room doctors, disease detectives and other hospital officials. It will also be made available to up to 10 million police, firefighters and other first responders on a voluntary basis. States could begin vaccinations by late January, taking about 30 days to complete, although it is expected some state programs will take longer. The State Department also will be administering the vaccine to its personnel in the Middle East. Bush said he himself would also receive the vaccination. "As commander-in-chief, I do not believe I can ask others to accept this risk unless I am willing to do the same," Bush said. "Therefore, I will receive the vaccine along with our military." The

Defense Department said vaccinations are mandatory, except for personnel who have medical exemptions. [View Article](#)

CDC: Initial Review of State Smallpox Vaccination Plans Complete

12 December - The CDC announced it has completed an initial review of plans developed by state health departments for pre-event vaccination of public health and healthcare response teams against smallpox. A preliminary review of the plans indicates that close to 450,000 public health and health care personnel may be offered the vaccine. The plan is voluntary. Hundreds of clinics around the nation would be set up to deliver the vaccine to those who choose to receive it. In addition, state health officials have identified over 3,300 health care facilities that would participate in the program. CDC, working closely with colleagues within the Department of Health and Human Services, state and local health departments, and hospitals, are taking steps to prepare for terrorism emergencies that would impact public health. [More Information](#) [View Article](#)

CDC Prepares Microbiologists for Detecting Increasing Anti-microbial Resistance

17 December – The CDC reported the Centers for Disease Control and Prevention (CDC) has developed a new training tool to assist laboratorians in selecting and using appropriate testing methods to detect anti-microbial-resistant strains of bacteria. The new tool, an interactive CD-ROM-based training course, provides the most extensive compilation of information on anti-microbial resistance testing available to date. The CDC estimates that more than 70 percent of the bacteria that cause hospital-acquired infections are resistant to at least one of the drugs most commonly used to treat those infections. CDC plans to distribute approximately 10,000 copies of its new training tool to microbiologists around the country. Upon completion of the course, scientists can receive up to eight hours of continuing education credits (CEUs), marking the first time the agency has offered CEU credits for programs designed to help in identifying anti-microbial-resistant bacteria. This training tool complements other CDC resources for microbiologists. [View Article](#) [View Other CDC anti-microbial information.](#)

Company Says It Will Test a Safer Smallpox Vaccine

18 November – The New York Times reported a California biotechnology company said that it had acquired the American rights to a Japanese smallpox vaccine it says is safer than the one the Bush administration plans to use. The company, VaxGen, said it hoped to begin clinical trials early next year and to win approval from the Food and Drug Administration to begin sales in 2004. If the vaccine is approved, the company plans to market it commercially, hoping it will appeal to millions of consumers who want some protection against bioterrorism but fear the side effects of the existing vaccine. Still, some American experts say there is not enough data to show that the vaccine is safe and effective. Like the conventional one, the Japanese vaccine consists of a live vaccinia virus, a cousin of the smallpox virus. But the Japanese virus is attenuated, chosen to be weak and to produce fewer signs of brain inflammation than the conventional vaccines in animal tests. Dr. Russell, special adviser on bioterrorism vaccines in the Department of Health and Human Services said that since the Japanese vaccine had been developed after smallpox was eradicated in Japan, "there's no historical proof that it works." He also said the vaccine was made in an unusual type of cell culture that might not pass muster with the drug agency. [View article](#)

FDA Approves GlaxoSmithKline's PEDIARIX(TM) First U.S. Combination Vaccine to Protect Infants Against Five Diseases

16 December – Stockhouse reported GlaxoSmithKline announced today that its combination vaccine, PEDIARIX(TM) [Diphtheria and Tetanus Toxoids and Acellular Pertussis Adsorbed, Hepatitis B (Recombinant) and Inactivated Poliovirus Vaccine Combined], received approval from the U.S. Food and Drug Administration (FDA) to be given to infants at 2, 4 and 6 months of age for the prevention of diphtheria, tetanus, pertussis, hepatitis B, and polio. PEDIARIX is the first five-in-one U.S.-licensed vaccine to offer protection against five serious diseases in a three-dose vaccination series. This combination vaccine results in up to six fewer injections for infants, which may reduce infants' pain and discomfort. [View Article](#), [View FDA Report](#)

EPA Announces Revision of Two Toxicity Test Guidelines to Include Alternative Test Methods

16 December – The EPA's Office of Prevention, Pesticides and Toxic Substances (OPPTS) is announcing the revision of two OPPTS Test Guidelines for toxicity testing. The revised guidelines, for Acute Oral Toxicity and Skin Sensitization testing, incorporate alternative test methods that enhance animal welfare while providing essential data needed to ensure protection of human health. Such guidelines had previously been developed internationally through the Organization for Economic Cooperation and Development (OECD). Harmonized OPPTS versions of these two methods were subsequently reviewed by external scientists serving on EPA's Science Advisory Panel. These actions will be published in separate Federal Register Notices of Availability and will be accessible through EPA's website at <http://www.epa.gov/fedrgstr>. The Notice of Availability for the Acute Oral Toxicity guideline will be published during the week of December 16, 2002. The Notice of Availability for the Skin Sensitization guideline will be published in January 2003. [View Article](#)

Health & Medicine New Program To Prepare US Nurses for Terrorist Attack

14 December – VOA News reported US communities and hospitals are training for a chemical or bio-terrorist attack. "Much of the knowledge and expertise to respond to a terror attack already exists in the United States, it's just a matter of learning how to "connect the dots." Terri Rebman, an infectious disease specialist at the St. Louis University Center for the Study of Bioterrorism and Emerging Infections, says it's especially important to connect nurses to the system. "I do a lot of disaster preparedness training, and nurses seem to be the one group that has been left out more than the other groups," she said. "And they're such a large piece in disaster preparedness and they were really lacking a lot of the training. Most of the training seems to be focused on first responders." Planning a post baccalaureate program on preparedness for biowarfare, the course will be made available through distance learning, online in January. [View Article](#)

Military Doctors Call for Reinstating Adenovirus Vaccination Program in Recruits

04 December – GEIS reported on a study that U.S. Army researchers performed. According to the study, an adenovirus immunization program needs to be reinstated for military recruits. "Outbreaks of adenovirus type 4 (Ad4) acute respiratory disease (ARD) have reemerged among

U.S. military personnel during the past decade," wrote S.A. Kolavic-Gray and colleagues. They provided evidence of this by conducting a prospective epidemiological investigation at Ft. Jackson, South Carolina. Of 678 military recruits, 115 (17%) contracted febrile ARD and had to be hospitalized. Adenovirus types 4,3, and 21 were recovered from the cultures of 70 (72%), 7 (7%) and 2 (2%) of 97 recruits. In addition, 69 (83%) of the 83 hospitalized and 82 (49%) of the 166 non-hospitalized unit contacts had seroconversion to Ad4, which indicates the very high susceptibility and communicability of Ad4 among military recruits. Source: Clin Infect Dis, 2002; 35(7): 808-818 [View Original Article](#)

Nearly 100 Marine Recruits Hit by Strep A

16 December – Reuters reported 126 Marines have been hospitalized and one Marine has died as a result of a potentially life-threatening form of streptococcus infections, a Navy spokesman said. The Marines, stationed at the Marine Corps Recruit Depot, started to become sick Wednesday, 11 December with *Streptococcus A*, a bacterium commonly found in the throat and on the skin. As a result, nearly 5,000 recruits and staff members at the depot were treated with antibiotics, inoculated and tested for Strep A. As a result, Marine officials decided to put a three-day hold on all physical training so recruits would not risk overexertion, which might make them more susceptible to infection. [View Article 1](#) On 17 December CNN reported at least 6 percent of the Marine recruits at the training depot came back positive for Strep A. Of 2,700 throat cultures taken Sunday, 185 were positive for Group A streptococcal bacteria. Most of the ill patients are improving on the antibiotics regimen, [View Article 2](#)

Smallpox Vaccine Booster Tested

14 December – CNN reported at seven research sites around the country, 927 people are taking part in a study sponsored by the National Institutes of Health. It will determine if diluted smallpox vaccine can boost the immunity of people vaccinated before 1972, when routine inoculation ended in the United States. Earlier studies on unvaccinated younger adults indicated the limited government stockpile of the 40-year-old smallpox vaccine some 15 million doses -- could be diluted five to 10 times and still be effective. Now researchers want to see if the same holds true in those already vaccinated. The results, to be published in the spring, could differ because previously vaccinated people might need stronger doses. "They'd be a little immune and may not get quite as vigorous a viral replication as you would see in people who had never been vaccinated," said Treanor, director of the Vaccine and Treatment Evaluation Unit at the University of Rochester Medical Center. [View Article](#)

Staph Infections Making Alarming Headway

16 December – The Houston Chronicle reported outbreaks of a common skin infection are becoming more common and occasionally life-threatening in Texas as the bacteria develop resistance to common antibiotics, officials say. It's called methicillin-resistant *Staphylococcus aureus*, or MRSA -- also known as a "staph" infection. Outbreaks of the bacterial infection have popped up locally and across the country, including the athletic teams of Houston-area and other Texas schools. "There seem to be outbreaks in schools, gyms and contact sports..." said Dr. Sheldon Kaplan, professor of pediatrics at Baylor College of Medicine in Houston and chief of infectious diseases at Texas Children's Hospital. In the Houston area, about 50 Pasadena school district students who have suffered staph infections are participating in a Harris County Health Department survey to try to determine why such cases in area districts are higher than

normal. Parents of athletes at Clear Lake High School as well as other citizens of Texas have also complained about staph infections. Neil Pascoe, an epidemiologist with the Texas Department of Health, said there might be more cases out there, since the infection is not one that doctors are required to report. [View Article](#)

USPACOM

Bird Flu Outbreak in Hong Kong can Prove Fatal to Humans

18 December – The times of India reported twenty dead chickens found in a Hong Kong market had the dreaded bird flu, a disease that can prove fatal to humans. The Hong Kong government said the chickens died Wednesday morning at a poultry stall in Mui Wo market on Lantau island and tests showed they carried the H5 avian influenza virus, a strain of which killed six people in the territory's first outbreak in 1997. "At our request the stall owner slaughtered all the remaining 60 chickens in his stall, following which thorough cleansing and disinfection was carried out by our staff," a spokesman for the Food and Environmental Hygiene Department said. "The situation in Mui Wo has not been discovered in other retail outlets. Operators, however, must remain vigilant," the spokesman said. He also complained that some stall owners were not cooperating in government efforts to ensure the markets were clean, which is necessary to prevent outbreaks of the bird flu. [View Article](#)

India Announces Plan to Inform HIV Infected Blood Donors

14 December – The British Medical Journal reported India's health ministry announced blood donors found to be HIV positive would be told of their infection and asked to seek confirmatory tests and counselling. This will end the existing policy of anonymous testing in which blood infected with HIV is discarded without repeating the test and without informing the donor. However, doctors working in blood transfusion services caution that the order will be "hard to implement" given the current decentralized, fragmented state of blood banking services in India. Public health experts in the country have been concerned that HIV positive donors have been living without knowledge of their infection and possibly transmitting it to their sexual partners. India's National AIDS Control Organisation has estimated that India has nearly four million people infected with HIV, 90% of who are aged 15-45 years. [View Article](#)

Mutation Against Malaria Discovered in Melanesians

11 December – Health News reported a genetic mutation has been discovered in Papua New Guineans that blocks off one of the pathways used by the malaria parasite, opening the door to new vaccines and treatments, Australian scientists announced. The naturally occurring mutation blocks a previously unknown pathway used by the malaria parasite to infect red blood cells, according to a paper to appear in the January 2003 issue of the journal Nature Medicine. The new pathway is via a surface protein not previously suspected. The mutation was discovered in people living in lowland coastal habitats of Papua New Guinea. It blocks one of the pathways, but people with the mutation may still be vulnerable to one of the other routes the disease takes. The new finding has implications for the development of new vaccines. To work best, all infection pathways need to be understood and blocked by a vaccine. [View Article](#)

Seoul's Air Pollution Linked to School Absenteeism

12 December - Reuters Health reported scientists in Korea are reporting that air pollution in the country's capital city, Seoul, may increase the amount of illness-related absenteeism among children attending elementary school. To investigate, Dr. Hyesook Park of Ewha Woman's University evaluated school absenteeism records for 1996 to 1999 for students attending one elementary school in Seoul. The researchers also analyzed air pollution data for the same time period in the city. Park's team found that as concentrations of ozone, particulate matter and sulfur dioxide rose, children were more likely to be absent from school due to illness. SOURCE: Archives of Pediatric and Adolescent Medicine 2002; 156:1235-1239. [View Article](#)

USSOUTHCOM

Congenital Transmission of *Trypanosoma cruzi* Infection in Argentina

12 December – The Journal of Emerging Infectious Diseases released a study on congenital transmission of *Trypanosoma cruzi*, the causative agent of Chagas disease, which infects 10–18 million people and may be transmitted to the newborn. Using various data sources, the authors estimated nearly 850 congenital cases occurred in Argentina in 1993, or 6.3 expected cases per each reported case in 1994 and in 1994–2001. Such cases cannot be prevented because the available drugs have adverse effects, but early detection and prompt treatment are frequently successful. However, as screening of pregnant women and newborns has not been routinely conducted in most *T. cruzi*–endemic countries, the magnitude of the congenital transmission of this pathogen as a public health problem has not been established. The report concludes congenital transmission of *T. cruzi* constitutes a sizeable public health problem in the region. [View Article](#)

Highly Endemic, Waterborne Toxoplasmosis in North Rio de Janeiro State, Brazil

10 December – The CDC's journal of Emerging Infectious Diseases will publish a study where reports of uveitis consistent with toxoplasmosis led to a survey of the prevalence and risk factors for *Toxoplasma gondii* infection in 1997–1999. Serum samples from 1,436 persons were tested. With results adjusted for age, 84% of the population in the lower socioeconomic group was seropositive, compared with 62% and 23% of the middle and upper socioeconomic groups, respectively ($p < 0.001$). When multivariate analysis was performed, drinking unfiltered water was found to increase the risk of seropositivity for the lower socioeconomic populations. The authors also found a high *T. gondii* seroprevalence in the community. Drinking unfiltered water increased the risk of *T. gondii* seropositivity, indicating the potential importance of oocyst transmission in water in this region. [View Article](#)

Please contact the below-listed POC for suggested improvements and/or comments regarding this report. This report is also available on the USACHPPM website at <http://chppm-www.apgea.army.mil/Hioupdate/>.

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ACRONYMS

AFMIC - Armed Forces Medical Intelligence Center
BBC – British Broadcasting Company
BMJ – British Medical Journal
BSE – Bovine Spongiform Encephalopathy
CIDRAP – Center for Infectious Disease Research and Policy
CDC – Centers for Disease Control and Prevention
CNN – Cable News Network
CSR – Communicable Disease Surveillance and Response – A branch of the WHO
DoD/GEIS – Department of Defense/Global Emerging Infections System
EPA – Environmental Protection Agency
FDA – Food and Drug Administration
IRIN - Integrated Regional Information Networks, part of the [UN](#) Office for the Coordination of Humanitarian Affairs (OCHA).
MMWR – Morbidity and Mortality Weekly Report
MSNBC – Microsoft National Broadcasting Company
NASA – National Aeronautic and Space Association
NIH – National Institute of Health
NIOSH- National Institute for Occupational Safety and Health
VOA-Voice of America
WHO – World Health Organization