Lassa fever outbreak - NE Nigeria

51/0901 Borno state in northeast Nigeria has recorded its first Lassa fever outbreak in almost five decades. The last confirmed outbreak of the deadly disease was in 1969. WHO is supporting the government to contain the outbreak in an area of the country which is already coping with a humanitarian crisis resulting from years of conflict. The case which was isolated from a middle-aged woman from Zabramarri village near Maiduguri represented the first confirmed outbreak of Lassa fever in Borno State in 48 years.

In order to contain the outbreak, the WHO emergency humanitarian health team in the state has taken a number of actions. This includes rapid training on clinical case management, contact tracing, mobilising a network of healthcare workers at the hospital, and building public awareness.

Fifty-four people who had contact with the index case have been identified and will be monitored for 21 days according to WHO protocols to ensure that any Lassa fever-related incidence is immediately contained. In addition, WHO has provided the State Ministry of Health and the hospitals with personal protection equipment including gloves, boots, goggles and masks, decontamination supplies, infrared thermometers as well as medical and laboratory supplies.

Lassa fever is an acute viral haemorrhagic illness with a 2-21 days’ incubation period that occurs in West Africa including Nigeria. The Lassa virus is transmitted to humans via contact with food or household items contaminated with a specific rodent (*Mastomys* multimammate rat) urine or faeces. Person-to-person infections and laboratory transmission can also occur by body fluid contacts, particularly in hospitals lacking adequate infection prevention and control measures. [Source: WHO Press Release, 3 March 2017. http://www.afro.who.int/en/nigeria/press-materials/item/9421-borno-state-reports-first-lassa-fever-outbreak-in-48-years.html]

Persons at greatest risk are those living in rural areas where *Mastomys* multimammate rats are usually found, especially in...
communities with poor sanitation or crowded living conditions. Health workers are at risk if caring for Lassa fever patients in the absence of proper barrier nursing and infection prevention and control practices.

Lassa fever is known to be endemic in Benin, Ghana, Guinea, Liberia, Mali, Sierra Leone, and Nigeria, but probably exists in other West African countries as well.

Since November 2015, Nigeria, Benin, Sierra Leone, Liberia and Togo have reported more than 300 cases of Lassa fever and 167 deaths. Nigeria accounts for the majority of the cases with 266 cases and 138 deaths reported in 22 of the country’s 36 states as at 21 March 2016. Benin has recorded 51 cases and 25 deaths. Togo and Sierra Leone each reported two cases. More recently, since February, Liberia has reported seven confirmed cases including three deaths.

For further details, go to http://www.who.int/csr/disease/lassafever/en/.

Vaccine Safety Net

51/0902 When members of the public need advice about topics like health, careers, or relationships, the first place they look is often the internet. The same is true when parents and caregivers are seeking credible information about whether vaccines are safe for their children. However, finding that information is not always easy. In recent years a number of websites providing unbalanced, misleading, and alarming vaccine safety information have been established, prompting a wave of undue fears.

WHO’s Vaccine Safety Net, a global network of vaccine safety websites, aims to make sure that all parents, caregivers, and health care professionals can easily access accurate and trustworthy information about vaccines. Currently, the network (http://www.vaccinesafetynet.org/) has 47 member websites in 12 languages. It is estimated that more than 173 million users every month access VSN websites that contain, among other information, credible vaccine safety information.

WHO evaluates candidate websites using criteria defined by the Global Advisory Committee on Vaccine Safety - an independent, authoritative and scientific committee that advises the Organization on vaccine safety issues of global or regional concern that could impact national immunization programmes. An initial check ensures that sites have a public health focus, contain current evidence-based and unbiased information on vaccine safety, are clearly written, and easily navigated.

Websites also are ineligible to join the network if they represent industry. VSN sites must be reviewed and updated at least every two years. Once through the initial screening process, the VSN evaluation team then examines the website using a set of 34 formal assessment criteria.

To become part of the Vaccine Safety Network, websites must be transparent in saying who owns, manages, and pays for the content they host, and also have processes in place to validate the sources of the information they publish. Vaccine Safety Net is now working to grow the number of evaluated websites, especially in additional languages, such as Arabic, or from a geographical location not yet covered by the network such as the Balkans.

The network is also expanding its evaluation criteria to cover social media channels. It is currently piloting the process for reviewing Facebook pages to help get trustworthy vaccine safety messages to more diverse audiences. [Source: WHO webpage, March 2017. http://www.who.int/features/2017/vaccine-safety-website/en/]

Immunisation Scotland (http://www.immunisationscotland.org.uk/) is one of three UK members of the network.
EU report on antimicrobial resistance in zoonotic and indicator bacteria

51/0903 According to the latest report on antimicrobial resistance (AMR) in bacteria by the European Food Safety Authority (EFSA) and the European Centre for Disease Prevention and Control (ECDC), bacteria found in humans, animals and food continue to show resistance to widely used antimicrobials. The findings underline the serious threat AMR poses to public and animal health. Infections caused by bacteria that are resistant to antimicrobials lead to about 25,000 deaths in the EU every year.

The report shows that in general multi-drug resistance in Salmonella bacteria is high across the EU. However, experts note that resistance to critically important antimicrobials used to treat severe human cases of Salmonella infection remains low. Salmonellosis, the disease caused by these bacteria, is the second most commonly reported foodborne disease in the EU.

The report also highlights the continued variation of antimicrobial resistance levels by geographical region, with countries in Northern and Western Europe generally having lower resistance levels than those in Southern and Eastern Europe.

This year, the publication of the report is accompanied by a data visualisation tool, which displays data by country on antimicrobial resistance levels of some bacteria found in foods, animals and humans.

The report also includes the following findings that may have a public health impact:

- Resistance to carbapenem antibiotics has been detected for the first time as part of EU-wide annual monitoring in animals and food. Carbapenems are usually the last remaining treatment option for patients infected with multi-drug resistant bacteria to other available antibiotics. Very low levels of resistance were observed in E. coli bacteria found in pigs and meat from pigs.
- Extended-spectrum beta-lactamase (ESBL)-producing E. coli has been detected in beef, pork, pigs and calves. Bacteria that produce ESBL enzymes show multi-drug resistance to β-lactam antibiotics, which include penicillin derivatives and cephalosporins. The prevalence of ESBL-producing E. coli varied across countries, from low to very high.
- Resistance to colistin has been found at very low levels in Salmonella and E. coli in pigs and cattle. Colistin may be commonly used in some countries for the control of infections in animals, especially in pigs. In some circumstances it may be used as a last-resort antibiotic in humans.
- More than 10% of the tested Campylobacter coli bacteria in humans showed resistance to two critically important antimicrobials (fluoroquinolones and macrolides), which are used to treat severe cases of Campylobacter infections in humans. Campylobacteriosis is the most commonly reported foodborne disease in the EU.


NHSScotland Waste Management Action Plan 2016-2020

The NHSScotland Waste Management Action Plan 2016-2020 draws on the requirements of the previous 2013-2016 Action Plan which was issued to assist NHS boards prepare for the requirements of the Waste (Scotland) Regulations 2012. The 2016-2020 Action Plan has been prepared to assist NHS boards in continuing to meet their statutory obligations. It also aims to improve practice through identifying options for greater efficiency and, where possible, gaining value from the services in place and reducing costs where possible.

The NHSScotland Waste Management Action Plan 2016-2020 supersedes all previous versions with immediate effect. Chief executives and other recipients have been asked to ensure that the NHSScotland Waste Management Action Plan 2016-2020 is brought to the attention of all staff within their area of responsibility.

The Action Plan identifies the requirements that NHS boards should already have in place. Those boards that do not have all these requirements in place are being asked to treat them as priority actions and adopt appropriate measures to address any gaps.

Public health risks from illegal pesticide use

51/0905 Officers from Police Scotland are visiting farms and agricultural suppliers across the country to warn of the dangers which illegal and counterfeit pesticides pose to the integrity of the food chain, and to peoples' health.

Although there is no evidence that the use of illegal pesticides is widespread in Scotland, the move is in response to an emerging threat in Europe, which has already seen the loss of farmland in Poland worth three million euros as a direct result of their use there.

Working in partnership with a range of bodies including Trading Standards, HMRC and the Health and Safety Executive, the officers are raising awareness of the threats which the use of such chemicals pose to farmers and staff working for agricultural merchants. The two-week campaign is part of a European-wide initiative co-ordinated by Europol against the trade, often run by serious and organised criminal gangs, in which it estimates the global market for counterfeit and illegal pesticides is 4.4 billion euros.

Around 10% of all pesticides in use throughout Europe are thought to be illicit or counterfeit, and as these products have not undergone any form of safety checks, their use poses serious human health risks as well as environmental damage by polluting water courses with potentially very toxic chemicals. In addition to the risks posed to humans, their use can also have serious implications for wildlife and the environment.

A previous operation in 2015 by Europol carried out at ports and airports across seven EU countries recovered 190 tonnes of illegal or counterfeit pesticides, and while the UK has remained free from the dangers until now, authorities in Scotland are very keen to stop the problem occurring here. [Source: Police Scotland News Release, 28 February 2017. http://www.scotland.police.uk/whats-happening/news/2017/february/police-scotland-warns-of-risks-to-public-health-from-illegal-pesticide-use]

Grain industry risks to respiratory health

51/0906 The Health and Safety Executive (HSE) has recently published the results of a detailed literature search which was carried out to summarise evidence about respiratory disease caused by exposure to grain dust. Long-term epidemiological studies examining the risk for respiratory disease in grain workers were undertaken in Canada and the USA from the 1970s to the late 1990s. Smaller studies were undertaken in the UK and Europe but mostly focussed on respiratory disease in arable and livestock farmers.
The review concluded that the damaging effects of grain dust on the respiratory tract are accumulative and occur at high concentrations of exposure. Acute responses also occur and include declines in lung function as well as irritation and inflammation of the airways. There is less evidence that grain dust exposure causes occupational asthma despite the dusts containing allergens. This may be due to a ‘healthy worker’ effect with those already having, or developing, asthma leaving employment earlier than others. There is stronger evidence that the long-term effects of exposure include emphysema, chronic obstructive pulmonary disease and interstitial fibrosis of the lung. The risk of developing extrinsic allergic alveolitis has reduced through preventing damp conditions in stored grain.

Research Report RR1083 ‘Risks to respiratory health in the grain industry’ is available at http://www.hse.gov.uk/research/rhtm/rr1083.htm. The report and the work it describes were funded by the Health and Safety Executive (HSE). Its contents, including any opinions and/or conclusions expressed, are those of the authors alone and do not necessarily reflect HSE policy.

Environmental incidents - SEISS reports (Glasgow - major fire, Helen Street scrapyard; acetone spillage, Finnieston)

51/0907 The Scottish Environmental Incident Surveillance System (SEISS) recorded the following incident in the past week:

- A fire at a scrapyard in Glasgow sent a huge plume of smoke above the city and left about 3,000 homes without power. The blaze at Japanese Autoparts, in Helen Street, near Ibrox stadium, broke out at about 16:30 GMT on Sunday (5 March). Scottish Power said one of its buildings was involved in the fire, which was still burning on Monday morning, and power was shut off in the area as fire crews assessed the damage. Power was restored to customers at 21:50, the firm said. At its peak, about 50 firefighters tackled the blaze, which was put out around 09:30 (Monday 6 March) (http://www.bbc.co.uk/news/uk-scotland-glasgow-west-39177858).

- A pub was evacuated after a chemical spill at a nearby nail bar in Glasgow. Several fire crews attended Lebowskis in Finnieston after members of the public reported a ‘chemical smell’. Police Scotland also attended the incident on Argyle Street around 11.30am on Friday (3 March). The Scottish Fire and Rescue Service advised people in neighbouring properties to keep their windows closed while the source of the smell was established. A police spokeswoman said the odour that sparked the emergency response had come from the ‘spillage of acetone from a nearby nailbar’ (https://stv.tv/news/west-central/1382181-pub-evacuated-after-chemical-spill-at-nearby-nailbar/).

For more detailed information on SEISS, go to http://www.hps.scot.nhs.uk/enviro/ssdetail.aspx?id=107 or contact either Ian Henton or Colin Ramsay at HPS on 0141 300 1100.