

Background Brief No. 1

The History of Offensive Biological Weapons Programmes

Biological and Toxin weapons are devices which disseminate disease-causing organisms or poisons to kill or harm humans, animals or plants. There is a long history of disease or poison being used in warfare in a variety of different methods, by a range of actors over the course of history. Much of the material related to offensive biological weapons programmes conducted by states remain classified or inaccessible, however there is evidence of several programmes conducted over the course of the 20th century, including:

- Japan (1932 and 1945). Under the auspices of General Ishii's Unit 731, Japan developed and used crude biological weapons over China up until the programmes termination at the end of World War II.
- The UK (1940-1970). In response to erroneous concerns over German development of biological weapons, the UK began research on BW during the Second World War and conducted trials of agents over several uninhabited islands.
- France (1947 -1967) France engaged in some limited research and development of biological weapons after the Second World War before effectively terminating the French BW programme in 1967.
- Canada (1942) Canada embarked on a BW programme in response to concerns over aggression from Germany and later the USSR. Much of the activity was conducted with the UK and the USA.
- The US (1942-1969) the US embarked on a significant offensive biological weapons programme during the early years of the Cold War using a range of agents. The programme included conducting tests on volunteers and, using innocuous stimulants, tests on dispersal over cities. The US programme was terminated in 1969 by President Nixon.
- The USSR and Russia (1973-1992) The Soviet Biological Weapons programme is widely believed to have been the biggest BW programme with a range of agents and delivery mechanisms developed under the guise of benign civilian research.
- Iraq (1974/5 – 1991) the Iraqi BW programme was initiated in response to a perceived threat from Iran and Israel and looked at a comprehensive range of agents and munitions.
- South Africa (1981-1995) code named "Project Coast", the South African programme "focussed on the production of poisons intended for the assassination of State enemies within and outside the country"

The scale, nature and motivations driving these programmes varied considerably. On the one hand, the Soviet Programme is likely to have been driven by concerns over US superiority in biological warfare and at its peak is believed to have employed an estimated 25,000 to 60,000 individuals although the programme was compartmentalised and whether all these individuals were aware they were contributing directly or indirectly to the production of weapons is not clear.

On the other hand, the post-war French BW programme was a much more limited response to concerns over a perceived Soviet threat, however research was seemingly limited with a considerably smaller staff than the Soviet programme.

In addition to the state programmes identified above, there is also some evidence of non-state actors attempting to develop biological weapons for the purpose of terrorism, something evidenced most recently with the Anthrax Letter attacks which were most likely to have been perpetrated by a US biodefence scientist Dr. Bruce Ivins in the US in 2001. Other attempted acts of bioterrorism include the unsuccessful attempts to use disease by the Japanese cult Aum Shinrikyo and the “successful” attempts to use salmonella for the purposes of incapacitation by the US based Rajneeshee cult in Oregon.

The *development, production, stockpiling or otherwise acquiring or retaining* of biological or toxin weapons is illegal, and prohibited under the Biological and Toxin Weapons Convention whereas the *use* of such weapons is prohibited under the Geneva Protocol of 1925. More recently these more traditional arms control measures have been supplemented by 21st century legislation such as UN Security Council Resolution 1540 which obligates states to “take and enforce effective measures to establish domestic controls to prevent the proliferation of ...biological weapons and their means of delivery, including by establishing appropriate controls over related materials.” These international measures have been augmented by national measures, such as laws and regulations governing the life sciences, but also control and monitoring of the export and transfer of agents, equipment and expertise.