

Next Generation Bioweapons: Genetic Engineering and BW

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the contributions of scientists to problems of national security and public benefit.” Their meeting concentrated on the near-term future threat of biological warfare, specifically on genetically engineered pathogens and weapons.

The **JASON Group that met in 1997** grouped potential genetically engineered pathogens into six broad groups of potential futuristic threats.⁸⁵

- *Binary biological weapons*
- *Designer genes*
- ***Gene therapy as a weapon***
- *Stealth viruses*
- *Host-swapping diseases*
- *Designer diseases*

3) Gene Therapy as a Weapon:⁹⁶ Gene therapy will revolutionize the treatment of human genetic diseases. The goal is to effect a permanent change in the genetic composition of a person by repairing or replacing a faulty gene. Genes have already been spliced into bacteria to produce “human” insulin in large quantities.⁹⁷ The eventual goal is to splice a gene that codes for the production of insulin into human pancreatic tissue to cure diabetes. Similar research is progressing on adding in the missing gene to prevent the symptoms of cystic fibrosis. However, **the same technology could be subverted to insert pathogenic genes.**