

Cloning

[Literature](#), [Russian Literature](#)



CLONING Cloning in biology is the process of producing similar populations of genetically identical individuals that occurs in nature when organisms such as bacteria, insects or plants reproduce asexually. Cloning in biotechnology refers to processes used to create copies of DNA fragments (molecular cloning), cells (cell cloning), or organisms. The term also refers to the production of multiple copies of a product such as digital media or software. Cloning is the process of making a genetically identical organism through nonsexual means. It has been used for many years to produce plants. What is a clone? A clone is a group of cells or organisms which are genetically identical and have all been produced from the same original cell. If you know any identical twins, you know some clones. Identical twins are natural clones of each other.

1. Cloning requires an egg cell, and an adult donor cell. The (unwanted) chromosomes are removed from the egg cell and discarded. The nucleus, containing the DNA to be cloned, is removed from the donor cell. | |
2. The donor nucleus is inserted into the empty egg cell, a process called somatic cell nuclear transfer (SCNT). Afterwards the egg contains a full (adult) set of chromosomes as if it had been fertilised normally. | |
3. A pulse of electricity, or a chemical 'shock', kick-starts the development process, and the embryo begins to grow. | |
4. Cell division begins. The subsequent development of the embryo depends upon how successfully the donor nucleus has 're-programmed' the egg. | |

Summary of arguments against Therapeutic Cloning Human cloning is a violation of human dignity because human beings are made an object of experiment and a human embryo would be used only as a means to an end. It creates a class of humans who exist only as a means to achieve the end of others. An act violating human dignity

is not rendered ethical by its purpose. Human cloning leads to the commodification and commercialization of human life. It destroys the dignity of person and is the gateway to genetic manipulation and control of human beings. Overall Human embryos should not be created for experimentation or grown for body parts.