

dogs to create a mixed DNA but why is that? How does DNA play into the **Future of Breeding?** What is Selective Breeding? The procedure of breeding purposefully selected Selective breeding vs. natural selection as dogs with the intention to produce, preserve, or although genetic changes over generations, sective breeding and naturalk selection are remove specific physical characteristics, mental different; it is driven by enviromental factors traits, health conditions, skills, and aptitude. that limit survivial and reproduction. When **Overall History** talking about genetic engineering it makes use Humans have selectively bred animals for of existing, naturally present gene variants in a specias and the natural process of breeding. Breeding dogs for particular characteristics, or British Agriculture Revolution in the 18th phenotypes, has been going on for centuries. Dogs are companions and workers, in service to Asia. But new discoveries in Siberia suggest that humans, and they have thus been bred to humans may have bred dogs for a specific accentuate desired traits. For instance, purpose even earlier, at least 9,000 years ago. Dalmatians have long been coach dogs, in part With that using dogs with particular physiques because of their striking looks and their comfort around horses https://www.nature.com/scitable/topicpage/genetics-of-dog-breeding-434/

thousands of years; it was established as a scientific practice by Robert Bakewell during the century. around 7,000 years ago in southwest and temperaments, suited to do jobs like herd sheep or collect pheasants. How does it work? an organism's characterics are partly determined by the combination of gene variants that are passed on from one generation to the next. Now in our society dogs are often a reason why a breeder wants these two dogs to breed together, and they include: true breeding – breeding dogs from the same breed to have purebred puppies. https://www.yourgenome.org/facts/what-is-selective-breeding

Evolution of Dog Breeding Below shows the evolution of selcective dog breeding which started with the ancestry of dogs who is the gray wolf then in specific parts of the world has branched out.

Genetic Diseases? More disireable?

Since there are differnent types of selective breeding like Inbreeding, Linebreeding, Self-pollination, and Crossbreeding all do have consequences regarding the genetic mutation fro dogs over time. Similar genetics means the population will have the same strengths and weaknesses also infectious diseases are more likely to spread therough similar population of dogs because they are vulnerable to the same diseases. It makes certain dogs more desireble espoecially with purebreeds as they can be expensive since they have breeded with the simialr DNA has the opposite sex. https://futureofworking.com/6-advantages-and-disadvantages-of-selective-breeding/



