

## **Should we make attempts to change the Human Genome?**

Question by: Lord Robert Winston



### **SOS: An urgent message for the humans of 2040.**

I am writing to you from the year 3040: 'The Correction' has brought humanity to the brink of extinction and I am the only one conscious enough to convey this message.

Today marks 1000 years since the 'correcting' officially started - the transition into a genetically 'enhanced' human race.

#### ***STAGE 1 – The conception of a revolutionary 'correction' technology to help eradicate debilitating diseases***

Setting out with good intentions, many countries offered hope for those suffering with genetic defects through the legalisation of CRISPR\* technology. Scientists could control the human genome in such a way that they could modify a person's biological characteristics even before birth.

This had a significant impact over the next 5 years: 10% of the global population affected by genetic defects were saved; over 600 diseases were eradicated; millions worldwide lived a better quality of life. These medical advances further led to an exponential growth in global development by significantly decreasing the number of sufferers and hence patients. This in turn, reduced the burden on health services around the world. Valuable healthcare resources, otherwise reserved for genetic diseases, were now available for other causes.

A secondary gain was the redirection of taxes, previously required for healthcare, to combat key issues such as poverty, climate change and access to education. Millions benefited from 'The Correction'. The world was flourishing. The population, thriving and most of all, those suffering from the lifelong debilitation of genetic diseases were able to lead a full, vibrant life.

#### ***STAGE 2 – The demise: Correction for non-essential reasons***

Unfortunately, the lust for perfection caused unforeseen circumstances to arise. The CRISPR technology had revolutionised altering the human genome, as you would expect.

With surmounting pressure from the public, CRISPR technology was slowly but surely, made available to all. At first there were advantages: near-perfect immunity, superior intelligence and an excellent physical condition led to an increase in productivity as well as life expectancy.

Overall, this contributed to a rapid growth in innovation, with the money and the intelligence, leading to scientists making new discoveries every day.

## **STAGE 2.5 - Abuse for non-essential reasons**

However, the previously inconceivable, debated possibilities were now a reality. The theoretical was now within hands-reach.

The ruthless world has always been full of people exploiting others for their own gain. Once they saw the chance to improve frivolous traits, like their athletic ability and appearance (and seemingly, since the applications of CRISPR knew no bounds), they grasped the opportunity. Malicious people will go to any lengths for perfection, destroying their relationships and emotional intelligence in the process.

This toxicity spread throughout the globe like an abnormal growth of cells. In the way that malignant tumours invade neighbouring tissues, unsuspecting parents were drawn into the trap of 'correcting' their own children. Gradually, the tumour poisoned organs, symbolic of the individuality within society, until they were unable to function on their own.

Our family is one of the handful that decided to hold back from the process, as my ancestors did not believe in changing our genes. We wanted to keep our heritage and not succumb to these abnormal standards that had plagued the rest of the world. I am the only remaining member from my family; therefore, I feel obliged to inform you of this injustice.

Now, our society has been stripped of life; this is not a planet of humans anymore, but one of robots - designed to perform past the natural limit of their athletic, intellectual and creative capabilities, with hardly any purpose. With the retirement age now at 140, they have all come to terms with their fate – to continue doing their tedious jobs till what feels like an eternity. They no longer think for themselves; they no longer take risks; they no longer do things that make them happy. They have forgotten how to live.

Despite being one of the only living people who has not been 'corrected', I try to live life to the fullest. Therefore, it is essential that I write this message to you, in hope that your future will not be entangled in this horrifying illusion.

## **STAGE 3 – The Re-correction: Convincing you to see reason and prevent what could be**

Consider the following question: does editing the human genome to extend life expectancy necessarily enhance the *quality* of one's life?

If other factors of life are equal, someone who is 'enhanced' and someone who is not, have similar qualities of life until approximately 75 years. After this, as the unenhanced humans begin to die - the 'enhanced' individuals live the rest of their lives with reduced quality.

This is due to the fact that humans are fundamentally social beings and greatly value their relationships with others, so the loss of close relations consequently leads to widespread unhappiness and loneliness. Over time, these feelings of despair turn into feelings of emptiness as these 'humans' are desensitised in their solitude.

I have seen this happen in front of my own eyes and I do not want humanity to be led down the same path which has resulted in despair, destruction and dehumanisation.

***STAGE 4 – The Goodbye: Hope for a better tomorrow***

Is this what we want from our future generations? A country that must robotically follow orders; a country unable to think for itself? Unless this unsettling tumour is treated now, it will continue to grow and when we finally realise our fatal error, it will be too late.

I beseech you to think about your decisions thoroughly; I have laid out the events that have unfolded from an initially revolutionary discovery - used solely to help and improve.

From the future,  
The Uncorrected

\* 'clustered regularly interspaced short palindromic repeats'