

Titre	SCIENTIFIC DEVELOPMENT
<p><i>Exemples</i></p>	<p>1. Facts and events</p> <p><u>Robocrop</u> : raspberry-picking robot ¾ cost-efficient, more efficient (bcs it can work 20 hours a day and pick 25,000 raspberries), tackles the issue of shortages of seasonal workers bcs of Brexit. Automation can create a drop in the number of low-skilled jobs but a rise in high-skilled jobs.</p> <p><u>Covid-19 vaccine</u> : an innovative vaccine was created hastily (using RNA) and is being inoculated. Its side effects are unknown. This leads to skepticism.</p> <p><u>Tesla</u> : According to Elon Musk, it's to limit the use of fossil fuels. + starship in order to create a colony on Mars.</p> <p><u>GMOs</u> : modification of the gene pool of an organism. Most of the GMOs (99%) are created to resist against insects and pesticides. Problems: increase of the use of pesticides because GMOs can resist Some GMOs are made to produce pesticides by themselves GMOs accumulate pesticides ¾ impact on animals which eat them and on human health Development of insects which are resistant</p> <p><u>CRISPR-Cas9</u> : “scissors” which cut DNA, discovered by Emmanuelle Charpentier and Jennifer Doudna, and could cure cancers and genetic diseases (HIV). It is the association of RNA which guides an enzyme to cut, modify or replace a defective gene. Problem: can be used to create lethal virus/ ethical problem can lead to a new legislation</p>
<p><i>Quelques problématiques et axes de réflexion</i></p>	<p>Should all scientific research be approved and developed ? What are the consequences of scientific development ? Is scientific development always done for a good cause ? Should scientific development be funded by private or public bodies ?</p> <ul style="list-style-type: none"> <input type="checkbox"/> Improves human life <input type="checkbox"/> Can be used only to make profit <input type="checkbox"/> impact human health and animals (disease, death...) <input type="checkbox"/> impact on work, environment, healthcare, people's trust
<p><i>Vocabulaire</i></p>	<p>GMO = OGM Gene pool = <i>patrimoine génétique</i> Genetic disease = <i>maladie génétique</i> Defective = <i>déficient</i> Lethal = <i>mortel</i> Research = <i>recherche</i> Inoculate = <i>inoculer, vacciner</i> Carry out research = <i>faire des recherches</i></p>