

P2 Topic 6 Revision tracker

PHYSICS

Learning objectives I can:	I can do this very well	I can do this quite well	I need to do more work on this
6.9 Demonstrate an understanding of the dangers of ionising radiation in terms of tissue damage and possible mutations and relate this to the precautions needed			
6.10 Describe how scientists have changed their ideas of radioactivity over time, including: a the awareness of the hazards associated with radioactive sources			
b why the scientific ideas change over time			
HSW 14 Describe how scientists share data and discuss new ideas, and how over time this process helps to reduce uncertainties and revise scientific theories			
6.11 Discuss the long-term possibilities for storage and disposal of nuclear waste			
6.12 Evaluate the advantages and disadvantages of nuclear power for generating electricity, including the lack of carbon dioxide emissions, risks, public perception, waste disposal and safety issues			
HSW 11 Present information, develop an argument and draw a conclusion, using scientific, technical and mathematical language			
6.4 Describe how the activity of a radioactive source decreases over a period of time			
6.5 Recall that the unit of activity of a radioactive isotope is the becquerel, Bq			
6.6 Recall that the half-life of a radioactive isotope is the time taken for half the undecayed nuclei to decay			
6.7 Use the concept of half-life to carry out simple calculations on the decay of a radioactive isotope, including graphical representations			
HSW 10 Use qualitative and quantitative approaches when presenting scientific ideas and arguments, and recording observations			
6.8 Investigate models which simulate radioactive decay			
6.1 Explain what is meant by background radiation, including how regional variations within the UK are caused in particular by radon gas			
6.2 Recall the origins of background radiation from Earth and space			
HSW 1 Explain how scientific data is collected and analysed			
6.3 Describe uses of radioactivity, including: b irradiating food			
c sterilisation of equipment			
e diagnosis and treatment of cancer			
HSW 13a Explain how and why decisions about uses of science and technology are made			
6.3 Describe uses of radioactivity, including: a household fire (smoke) alarms			
d tracing and gauging thicknesses			
HSW 12 Describe the benefits, drawbacks and risks of using new scientific and technological developments			