



QPHS Year 10 Design Technology Curriculum Map

Half term	Title	Unit summary	Assessment
1	Wood Joints Trinket box	Students will develop their practical skills and understanding of different wood joints to produce a wooden trinket box. They will also explore the use of CAD/CAM and use the laser cutter to produce a lid for their box.	Portfolio work is assessed holistically and will evidence students ability to: AO2 Design and make prototypes that are fit for purpose AO3 Analyse and evaluate: design decision and outcomes AO4 Demonstrate, apply knowledge and understanding of: <ul style="list-style-type: none"> • technical principles • designing and making principles
2	Pewter Casting Jewellery	Students will work from a brief to produce a range of jewellery designs, working with metals, casting and finishing techniques to produce a piece of pewter jewellery. They will use CAD/CAM and the laser cutter to produce a mould for their jewellery.	Portfolio work is assessed holistically and will evidence students ability to: AO1 Identify, investigate and outline design possibilities AO2 Design and make prototypes AO3 Analyse and evaluate: design decision and outcomes AO4 Demonstrate and apply knowledge and understanding of: <ul style="list-style-type: none"> • technical principles • designing and making principles
3	Ergonomic Handle Smart materials	Students will produce a range of ergonomics handle designs, developing prototypes in a range of different materials and be able to test and evaluate their prototypes against a specification. Students will gain understanding of ergonomics and anthropometrics and understand the importance of these issues when designing.	Portfolio work is assessed holistically and will evidence students ability to: AO1 Identify, investigate and outline design possibilities AO2 Design and make prototypes AO3 Analyse and evaluate: design decision and outcomes AO4 Demonstrate and apply knowledge and understanding of: <ul style="list-style-type: none"> • technical principles • designing and making principles
4 5	Designer Influenced Small Storage/lighting	Students will produce a small storage or lighting product influenced by a designer of their choice. Students will develop and explore creative designing techniques when selecting and working with materials and processes suitable for their design justifying their reasons. Students will evaluate skills and suggest alternatives based on wider issues in design technology.	Portfolio work is assessed holistically and will evidence students ability to: AO1 Identify, investigate and outline design possibilities AO2 Design and make prototypes AO3 Analyse and evaluate: design decision and outcomes AO4 Demonstrate and apply knowledge and understanding of: <ul style="list-style-type: none"> • technical principles • designing and making principles
5	Start NEA	Students will select 1 design problem from the exam board. They will complete research, write a design brief and specification and start to produce designs to solve the problem.	Portfolio work is assessed holistically and will evidence students ability to: AO1 Identify, investigate and outline design possibilities to address needs and wants