Class – 7V – DT 1 double per week

Year	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	Unit 1	Unit 2	Unit 3	Unit 4	Unit 5	Unit 6
	Topic: Health and Safety and Mobile Phone Holder Suggested Key Questions: What are the rules for the workshop? When should the Emergency stop buttons be used? What are the features of the Shaker Design Style? What material are we using? What are the basic features of 'Sketchup'?	Topic: Shoe Tying Aid Suggested Key Questions: Can you research the name of a famous shoe designer? What is 'Ergonomics'? Why do we make and use templates? What tools/ machines are used to cut and shape MDF? Does your shoe tying aid look like your design?	Topic: Enamelled, Copper Pendant Suggested Key Questions: Who is Mondrian and explain what he is famous for? How many classes of metal are there? What are their properties? What are the H&S issues working with sheet metals and enamelling? What tools do we use to cut and shape sheet metals? Why are products enamelled?	Topic: Acrylic Key Tag Suggested Key Questions: Salvador Dali famous for? What are the two types of plastic? How can we bend and shape our acrylic? What are the H&S issues with the strip heater/ vacuum former? Does the key tag work? look good? be used?	Topic: Steel Bug 1 Suggested Key Questions: What are some of the features of Steampunk? What metal are we using? What is a permanent and non-permanent joint? What are the H&S issues with spot-welder/ glue gun?	Topic: Steel Bug / Shopping list holder Suggested Key Questions: What tools do we use to cut and shape steel? What are the H&S issues working with sheet metals? What steampunk features could you include in your design? Identify common products that are spot welded. Name one process we are using. How can we make rough wood smooth?
	Key Skills and	<u>Key Skills and</u>	<u>Key Skills and</u>	<u>Key Skills and</u>	<u>Key Skills and</u>	<u>Key Skills and</u>
	Knowledge:	<u>Knowledge:</u>	<u>Knowledge:</u>	<u>Knowledge:</u>	<u>Knowledge:</u>	Knowledge:
	Begin to select tools and materials; Sketch identifiable 2d shapes Begin to select tools and materials. Learn to use hand tools safely and appropriately. Evaluate their work against their design criteria identifying strengths and possible changes they might make.	Start to generate ideas by drawing on their own and other people's experiences. observation, drawing and modellingWith help measure, cut and score with some accuracy. Learn to use hand tools safely and appropriately.	Learn to use hand tools safely and appropriately. compare key features. Demonstrate how to cut and shape materials to make a simple product. Learn to use hand tools safely and appropriately. Start to evaluate their products as they are developed	Make templates and mock ups of their ideas in card and paper or using ICT. Demonstrate how to cut, shape and join materials to make a simple product. Demonstrate how to cut, shape and join materials to make a simple product. Learn to use hand tools safely and appropriately. Start to evaluate their products as they are	Develop their ideas through talk and drawings and label parts. Sketch identifiable 2D shapes Make templates and mock ups of their ideas in card and paper or using ICT. Learn to use hand tools safely and appropriately. compare key features. Start to evaluate their products as they are developed Use basic joining techniques. Start to	Identify a purpose for what they intend to design and make. With help measure, cut and score with some accuracy. Demonstrate how to cut, shape, join and combine materials to make a simple product. Learn to use hand tools safely and appropriately. Start to choose and use appropriate finishing techniques based on own ideas confidence talk about their ideas, saying what they like and dislike about them.

				developed, identifying strengths and possible changes they might make.	choose and use appropriate finishing techniques based on own ideas.	
Links to Gatsby Benchmarks:	6. Experiences of the workplaces. 4. Linking curriculum learning to careers. Safe working in a workshop/ workplace. Working in a joinery workshop: conditions, environment, skill set, organization-personnel. Designer: CAD Design in various industries.	3. Addressing the needs of each pupil. 4. Linking curriculum learning to careers. Express themselves through individual fashion, style, design. Students work to their ability: Explore what they can do and build on those skills. Experiment and experience new skills. Designers and designing for fashion: form and function.	3. Addressing the needs of each pupil. 4. Linking curriculum learning to careers. Safe working in a workshop/ workplace. Working in a jewellery/ metal workshop: conditions, environment, skill set, organisation. Express themselves through individual fashion, style, design. Students work to their ability: Explore what they can do and build on those skills. Experiment and experience new skills.	3. Addressing the needs of each pupil. 4. Linking curriculum learning to careers. Safe working in a workshop/ workplace. Working in a polymer/plastics workshop: conditions, environment, skill set, organisation. Designer: CAD Design in various industries.	 6. Experiences of workplaces. Addressing the needs of each pupil 4. Linking curriculum learning to careers Safe working in a workshop/ workplace. Working in an engineering workshop: conditions, environment, skill set, organisation. Paper Modelling in a variety of industries: Architecture, car design, product design Designer: CAD Design in various industries. 	 6. Experiences of workplaces. Addressing the needs of each pupil 4. Linking curriculum learning to careers. Safe working in a workshop/ workplace. Working in an engineering workshop: conditions, environment, skill set, organisation. Paper Modelling in a variety of industries: Architecture, car design, product design Designer: CAD Design in various industries.