

DT Department Remote Learning Plan

Week 1	Week 2		Week3	Week 4	Week 5	Week 6	Week 7		Week 8	Week 9	Week 10	Week 11	Week 12	Week 13	Week 14
23rd March	30th March		20th April	27th April	4th May	11th May	18th May		1st June	8th June	15th June	22nd June	29th June	6th July	13th July

Year 7

Topic	Weeks	Resources and Activities	Assessment
Computing 1: TINKERCAD	1&2	1. Basic modelling tutorials (intro for students with no experience in school & refresher for those already completed Tinkercad project earlier) 2. Design challenge (Reverse engineering)	Record of work (Google slides)
D&T 1: Spring Innovation Challenge	3&4	User Centred Design: Cleaning equipment redesign 1. Materials analysis 2. User investigation 3. Design sketches & concept communication	Design pages submission
D&T 2: Practical STEM tasks	5&6	Design & Make Challenges: Practical tasks to complete at home	Record of making & evaluation (Google Slides)
Computing 2:	7&8	Digital design tasks (Under development: Graphic Design task)	Record of key stages (Google slides)
D&T 3: Engineering Analysis task	9&10	Engineering Principles & Analysis: Aerodynamic design & Bridge Building.	Worksheet & Google form quiz
Food 1: Basic Practical Skills	11&12	Students not yet completed food in school: - Complete 2 of 5 core recipes (depending on availability) - Core healthy lifestyle theory content Students already completed food rotation in school: - Extend and adapt recipe(s) task - Additional healthy lifestyle content Competition: Baking challenge	Practical Record & Evaluation

Year 8

Topic	Weeks	Resources and Activities	Assessment
Computing 1: TINKERCAD	1&2	1. Basic modelling tutorials (refresher from y7 experience) 2. Design challenge (Reverse engineering)	Record of work (Google slides)
D&T 1: Innovation challenge - wearable tech	3&4	Design task based on wearable tech. Research and design activities completed on Google Slides template with design sketching photographed and added into work.	Design pages submission
D&T 2: Practical STEM tasks	5&6	Design & Make Challenges: Practical tasks to complete at home	Record of making & evaluation (Google Slides)
Food: Y8 Recipes	7&8	Complete 2 of the range suggested recipes for family meals (depending on availability of ingredients) Theory task: Keeping fit & healthy using resources from GCSE pod	Record of making & evaluation. Google Form theory quiz
Computing 2: Video editing	9&10	Create a short clip video using editing software. (Details under development - subject to technical details)	Video submission (Hopefully share with class)
D&T 3: Ergonomics investigation Project	11&12	Design & model an ergonomic improvement to a tool found at home (e.g. garden tool, kitchen utensil) Investigation into user (Video analysis) Product Analysis Model temporary adaptations with card, paper, plasticine, tin foil and tape to improve its ergonomics.	Record of research investigations & Modelling (Google Slides)

Year 9 Project work (Equivalent of 3 periods per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Onshape CAD Training	1&2	Basic tutorials to transfer existing capability from Fusion 360 (studied earlier in the year) Following learning pathway on Onshape website to develop CAD capabilities.	Certificate of completion of Learning pathway.
MOCK NEA: Investigations	3 & 4	Investigating design context "Helping users with disabilities" 1. User Analysis - Using clip from 'big life fix' 2. Practical task simulation - Complete tasks at home with simulated visual impairment	Google Slides design folder (continually added to by students in following weeks and reviewed by teachers)
MOCK NEA: Design brief & Specification	5 & 6	3. Task analysis & context review 4. Design brief and specification	Ongoing design folder. Feedback comments given.
MOCK NEA: Idea Generation	7 & 8	5. Generating design ideas through sketching	Ongoing design folder. Feedback comments given.
MOCK NEA: Development of ideas	9 & 10	6. Initial modelling of design ideas. Modelling by any means at home (Modelling @ Home Guide) 7. Design review (Class collaborative task)	Ongoing design folder. Feedback comments given.
MOCK NEA: Further Development	11 & 12	8. CAD model of design using ONSHAPE	Ongoing design folder. Feedback comments given.
MOCK NEA: Evaluation	13 & 14	9. Review idea against design specification 10. Future modifications	Design folder assessment following GCSE Assessment Objectives

Year 9 Theory work (Equivalent of 2 periods per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Mr Hawkins Classes: Unit 7 (Making Principles)	1 - 6	1 Lesson of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 7: Selection of materials & components, tolerances, tools, material management, equipment & techniques, surface treatments & finishes.	Google Form Assessment Unit 3
Mr Reay, Mr Kemp & Miss Manktelow Classes: Unit 3 (Materials & Their working properties)	1 - 6	1 Lesson of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 3: Papers & Boards, Timbers, Metals, Polymers & Textiles	Google Form Assessment Unit 7
All Classes: Unit 1 (New & Emerging Technologies)	7-14	1 Lesson of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 1: Industry and enterprise, Sustainability & the environment, people, culture & society, Production techniques & systems, Informing design decisions.	Y9 Overall Google Form Assessment Units 1,2,3,6, & 7

Year 10 Project work (Equivalent of 3 lessons per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Onshape CAD Training	1&2	Basic tutorials to transfer existing capability from Fusion 360 (studied earlier in the year) Following learning pathway on Onshape website to develop CAD capabilities.	Certificate of completion of Learning pathway.
2nd MOCK NEA: Investigations	3 & 4	Investigating design context "Helping users with disabilities" 11. User Analysis - Using clip from 'big life fix' 12. Practical task simulation - Complete tasks at home with simulated visual impairment	Google Slides design folder (continually added to by students in following weeks and reviewed by teachers)
2nd MOCK NEA: Design brief & Specification	5 & 6	13. Task analysis & context review 14. Design brief and specification	Ongoing design folder. Feedback comments given.
2nd MOCK NEA: Idea Generation	7 & 8	15. Generating design ideas through sketching	Ongoing design folder. Feedback comments given.
MOCK NEA: Development of ideas	9 & 10	16. Initial modelling of design ideas. Modelling by any means at home (Modelling @ Home Guide) 17. Design review (Class collaborative task)	Ongoing design folder. Feedback comments given.
MOCK NEA: Further Development	11 & 12	18. CAD model of design using ONSHAPE	Ongoing design folder. Feedback comments given.

Year 10 Theory work (Equivalent of 3 periods per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Unit 6 (Designing Principles)	1 - 3	1.5 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable	Google Form Assessment Unit 6

		Unit 6: Investigating primary and secondary data, The work of others, Design strategies, Communication of design ideas	
Unit 7 (Making Principles)	4-6	1.5 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 7: Selection of materials & components, tolerances, tools, material management, equipment & techniques, surface treatments & finishes.	Google Form Assessment Unit 7
Unit 4 (Common specialist technical principals)	7-8	1.5 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 4: Forces and stresses, Improving functionality, Ecological and social footprint, The six R's, Scales of production	Google Form Assessment Unit 4
Unit 5d (Polymers)	8-10	1.5 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Some use of GCSEpod resources where applicable Unit 5d: Sources origins and properties, Working with polymers, Manufacturing and finishing.	Google Form Assessment Unit 5d

Year 12 - Project work (Equivalent of 6 periods per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Completion of Learning to look Assignment	1&2	Completing and finished design assignment set whilst school was still open. Detailed instruction and resources on Google Classroom.	Submission of design pages
NEA project: Context Exploration	3-4	- Initial context analysis - Client interview (remotely conducted) Project Proposal Pages 1-2 slides	Feedback on NEA project proposal
NEA: Initial Investigations	5 - 6	- Client profile - Task analysis - Product analysis - User observation	Folder Feedback and arranged group crit
NEA: Design brief & Spec	7 & 8	- Initial research & context summary - Design brief and initial design spec	Comments & Feedback of design folders
NEA project: Design ideas	9 -12	Early concept development, sketching & modelling. Class group crit remote conference (Small groups)	Feedback on design folder.

Year 12 - Theory work (Equivalent of 4 periods per fortnight)

Topic	Weeks	Resources and Activities	Assessment
Theory Unit 11: Product Design Considerations	1-3	2 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Lessons: - Product Development - Inclusive design - Safe working practises - Protecting Designs - Manufacture & Efficient Manufacture - Design for Disassembly - ASSESSMENT	Google Form assessment
Theory Units 3&8: Woods	4-6	2 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Lessons: - Stock Forms - Performance - Testing & Finishing - Working with Woods - Forming woods - Finishing woods - Assessment	Google Form assessment
Theory Unit 12: Product Design	7-9	2 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete	Google Form assessment

		attached worksheets. Lessons: - Feasibility Studies - Enterprise - Communicating Data - Design communication - Assessment	
Theory Units 1&6: Paper & Boards	10-12	2 Lessons of theory per week alongside project work as per lessons delivered in term time. Follow lesson slides with narration from teachers. Complete attached worksheets. Lessons: - Performance - Recycling - Applications - Forming Processes - Banging, jigs & fixtures - Finishing	Google Form assessment