Cycle ……. Practical Skills Board—Assessment & Development of skills

My Expected Grade				
Teacher Assessed Grade (circle)				
SBE	BE	E	AE	SAE
Comment:				

Grade		Knowledge Prior	Knowledge Post
8 - 9	I can… Explain the difference between natural and manufactured boards and provide at least 3 or 4 examples of each Recognise and identify numerous timber joining methods, demonstrating full understanding of their applications Define what thermoplastics are using appropriate language to include: thermosetting and thermoforming Recognise a multiple natural timbers from the two sub groups and correctly identify at least 5+ timber types from each category (hardwoods & softwoods) Explain, identify and examine a range of polymer processes accurately, making links to industrial processes Annotate my research in detail; making links to materials properties and their characteristics Carry out research that is analysed and evaluated effectively in order to inform my manufacturing decisions Evidence my deep understanding of material properties and technical principles via the production of high quality; accurate and highly skilled practical work		
6 –7	I can… Explain the difference between natural and manufactured boards and give at least one example of each Identify a range of timber joining methods, explaining the advantages and disadvantages of each type Define the term s thermoforming,; thermoplastic and thermosetting using a range of appropriate key words Recognise a range of natural timbers from the two sub groups and correctly identify at least 3 timber types from each category (hardwoods & softwoods) Explain and identify a range of polymer processes used to thermoform plastics Explain what a jig is used for and identify specific manufacturing processes where jigs are used Respond effectively to research and apply technical knowledge o my practical work, evidencing knowledge and understanding of material properties Use annotation skills in order to communicate research clearly Carry out effective research and use this to develop and inform my manufacturing decisions Evidence my practical knowledge and ability via the production of accurate and high quality practical work		
4 –5	I can… Explain the difference between natural and manufactured boards Identify at least three different types of timber joining methods Recognise the two types of natural timbers, giving at least one example from each group (hardwoods & softwoods) Define the terms thermosetting and thermoforming Explain what a jig is used for Explain at least two different polymer processes Respond to research and apply knowledge gained in my practical work Use annotation skills by adding notes to explain my research Research within the topic and provide evidence of this Evidence my practical knowledge by demonstrating at least some degree of skill and accuracy to my work		

Practical Skills Board

Week	Content	Completed? Y / N	EFFORT
1&2	Lesson 1 • Introduction to skills board and relevance of practical skill development. • Identify & describe the process task: AQA Command Words intro • Groups identified for hm/wrk task ***Homework1:*** *Research how to carry out your first chosen practical task: present instructions* ***Challenge:*** *Research includes limitations of chosen process or difficulties which may be faced* ***Further Challenge:*** *Advantages and disadvantages are explored and analysed* Lesson 2 • Researching timber types • GCSE specification introduction Lesson 3 • MIB of homework: check peer work for improvements. • Practical : students to use own instructions as a guide. ***Homework 2:*** *Research min of 2 polymer processes: flipped learning task* ***Challenge:*** *Research includes example products for each process* ***Further Challenge:*** *Costs of each process are considered and research relating to this is included* Lesson 4 • MIB of homework • Student presentations of homework • Different types of polymer • Polymer processes—research task Lesson 5 • Teacher Demo • Practical tasks		
3&4	Lesson 6 • Continue Polymer fact finding tasks • Examination Question 1 on polymers Lesson 7 • Teacher demos • Practical Tasks ***Homework 3:*** *Timber conversion worksheet* ***Challenge:*** *Identify natural timber types by recognising their leaf type* ***Further Challenge:*** *Research includes limitations of chosen process or difficulties which may be faced*		

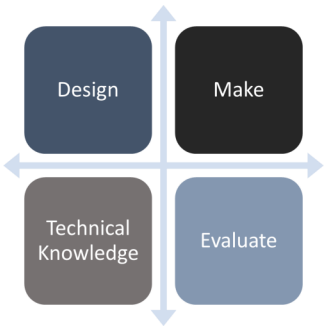
THE BIG PICTURE

Why are we developing our practical skills?

You are enhancing your skills so that you:

- Can begin to work more independently in the workshop
- Can plan your own manufacturing schedules using previous knowledge and experience
- Are ready for the NEA project

Challenge!



What areas of the four key concepts for Design & Technology have you worked in during this cycle?

Circle your response

Practical Skills Board

Week	Content	Completed? Y / N	EFFORT
3&4 cont	Lesson 9 • Teacher demos • Practical Tasks • Progress Check ***Homework 4:*** *Research products made from manufactured board* ***Challenge:*** *Material choices are explained and show an understanding of material properties* ***Further Challenge:*** *Research shows comparisons to the use of natural timber and demonstrates understanding of quality and cost implications* Lesson 10 • MIB of homework: peer review & improve • FSC logo • Student & teacher demos		
5&6	Lesson 11 • Teacher recap H&S • Practical Continued • Test discussion ***Homework 5:*** *Research products made from natural timbers* ***Challenge:*** *Material choices are explained and show an understanding of material properties* ***Further Challenge:*** *Research shows an understanding of aesthetic qualities in the use of natural timbers and evidences understanding of this in their own words* Lesson 12 • MIB of homework: peer review & improve • Google Sketch Up skills—drawing timber joints in 3D Lesson 13 • Practical recaps and progress: finishing techniques ***Homework 6:*** *Material properties and their meanings.* ***Challenge:*** *Help yourself learn these material properties by creating a physical way to remember them* ***Further Challenge:*** *Research how each of these properties can be TESTED* Lesson 14 • MIB of homework: peer review & improve • Final practical • Test—revision list Lesson 15		

Student Self Evaluation

WWW
EBI

Tick when you think you are able to define the meaning of the keyword

KEYWORDS	Lap joint
Natural timber	Conversion
Line bender	Thermoset
Dowel	Manufactured board
Jig	Former
Polymer	Grain
FSC	
Thermoforming	

Can you add more keywords you have covered?