HIGH IMPACT MATHS REVISION

For Year 11 2017/18

St Alban's RC High School
Be the best you can be

November Exam Dates

Mathematics-Numeracy Unit 1 6th Nov 2017 am

Mathematics-Numeracy Unit 2 8th Nov 2017 am

Mathematics Unit 1 10th Nov 2017 am

Mathematics Unit 2 13th Nov 2017 am

Overall Plan

- All pupils have been given PLCs based on their June results.
- The SOW has been revised in response to our performance in the June exams.
- There will be an expectation that pupils will work independently at home.
- They are being given a past paper each week to focus on.
- There will be a program of voluntary RAG classes after school in the run up to the exams.
- There will be WTMs around the time of the exams.

PLCs

[redacted]

UNIT 1

Question Number	Topic	Max mark	My Mark
1a	Find the next 2 terms in a sequence	2	2
1b	Substitution into an expression	2	2
1c	Simplifying expressions	2	0
2	Ordering fractions, decimals and percentages	3	3
3a	Reflection in the x axis	1	0
3b	Enlargement by a positive scale factor (no centre)	2	1
3c	Translation (no vector notation)	1	1
4a	Calculating probability	1	1
4b	Calculation using probability	1	1
4c	Probability	1	0
5	Number problem	2	2
6a	Listing outcomes	2	0
6b	Using list to calculate probability	2	0
7a	Calculating angles in a quadrilateral using algebra	4	NA
7b	Using angle facts to decide if lines are parallel	2	0
8a	Estimation	2	2
8b	Calculation - Using known facts	3	0
9	OCW - Area problem	7	5
10a	Calculate missing probability from a table	2	2
10b	Probability - or rule	2	2
10c	Probability - and rule	2	0
11a	Quadratic graph - substitution in equation	1	0
11b	Quadratic graph - plot points and draw graph	2	1
11c	Quadratic graph - use graph to solve an equation	2	NA
12a	Express a number as a product of its prime factors	3	2
12b	Using powers to justify that a number is not square	1	1
13a	Straight line graphs - Identify equation	1	0
13b	Straight line graphs - Identify points on the line	1	NA
13c	Straight line graphs - Find the gradient	1	0
14	Number problem	3	3
15	Dimensional analysis	3	NA
16a	Venn Diagram - Complete a diagram	3	0
16b	Venn diagram - Interpret to calculate probability	2	0
17	Simultaneous equations - Solve algebraically	4	0
18	Calculate using standard form	2	0
19	Write and solve inequalities in context	5	NA
	Total	80	31

UNIT 2

Question Number	Topic	Max mark	My Mark
1a	Calculate a percentage of an amount	2	1
1b	Calculate a fraction of a quantity	2	0
1c	Division by a fraction	1	0
1d	Equivalent fractions	1	NA
1e	Identify a recurring decimal from its fraction	1	0
2	T/F - Properties of triangles	3	1
3	Number skills - Primes and factors	2	2
4a	Function machine - Calculate an output	1	1
4b	Function machine - Calculate an input	2	1
5	Averages - find values given mean and range	2	NA
6a	Sequences - generate sequence given nth term	2	2
6b	Sequences - find the nth term rule	2	2
7a	Probability - Relative frequency	1	0
7b	Probability - Expected outcomes	2	0
7c	Probability - Expected outcomes	2	1
8	Angles - Interior angles of polygons	4	2
9	Manipulating and simplifying algebraic expressions	3	1
10	OCW - Area problem including trapezium	6	NA
11a	Calculator skills - rounding to significant figures	2	1
11b	Calculate a reciprocal - rounding to decimal places	2	NA
12	Form and solve equations -angles in a triangle	5	0
13	Trial and improvement	4	NA
14	Pythagoras' theorem - Finding a missing side	3	NA
15	Construct a triangle - given angles and a pair of compasses	3	NA
16	Trigonometry - Finding a side length	3	NA
17	Probability tree diagram	5	1
18a	Factorise a linear expression - single bracket	1	0
18b	Expand - double bracket	2	0
18c	Factorise a quadratic expression	2	NA
19a	Straight line graphs - Identify parallel lines from equations	1	NA
19b	Straight line graphs - Identify perpendicular lines from equations	1	NA
20	Circle theorems	2	NA
21	Trigonometry - Find a missing angle	5	NA
	Total	80	16

Intervention

- Some students will hopefully be involved in intervention lessons to support their journey towards grade Cs.
- This will be set up in the next fortnight, once a new member of staff has been appointed.
- In the meantime I will be running sessions during registration and through RAG after school.

Revised SOW

- We have devised a program of topics in the run up to the exams
- They involve some revision of weaker topics and the introduction of some new topics
- All lessons follow the same format with lots of examples and exam questions
- Classes are given a past paper every week to do for homework to track progress.

Students working independently

- We highly recommend students to be working independently in preparation for the exams. Without independent revision, you are less likely to reach your target.
- Little and often is best!
- Practise not reading your notes.

- Mymaths

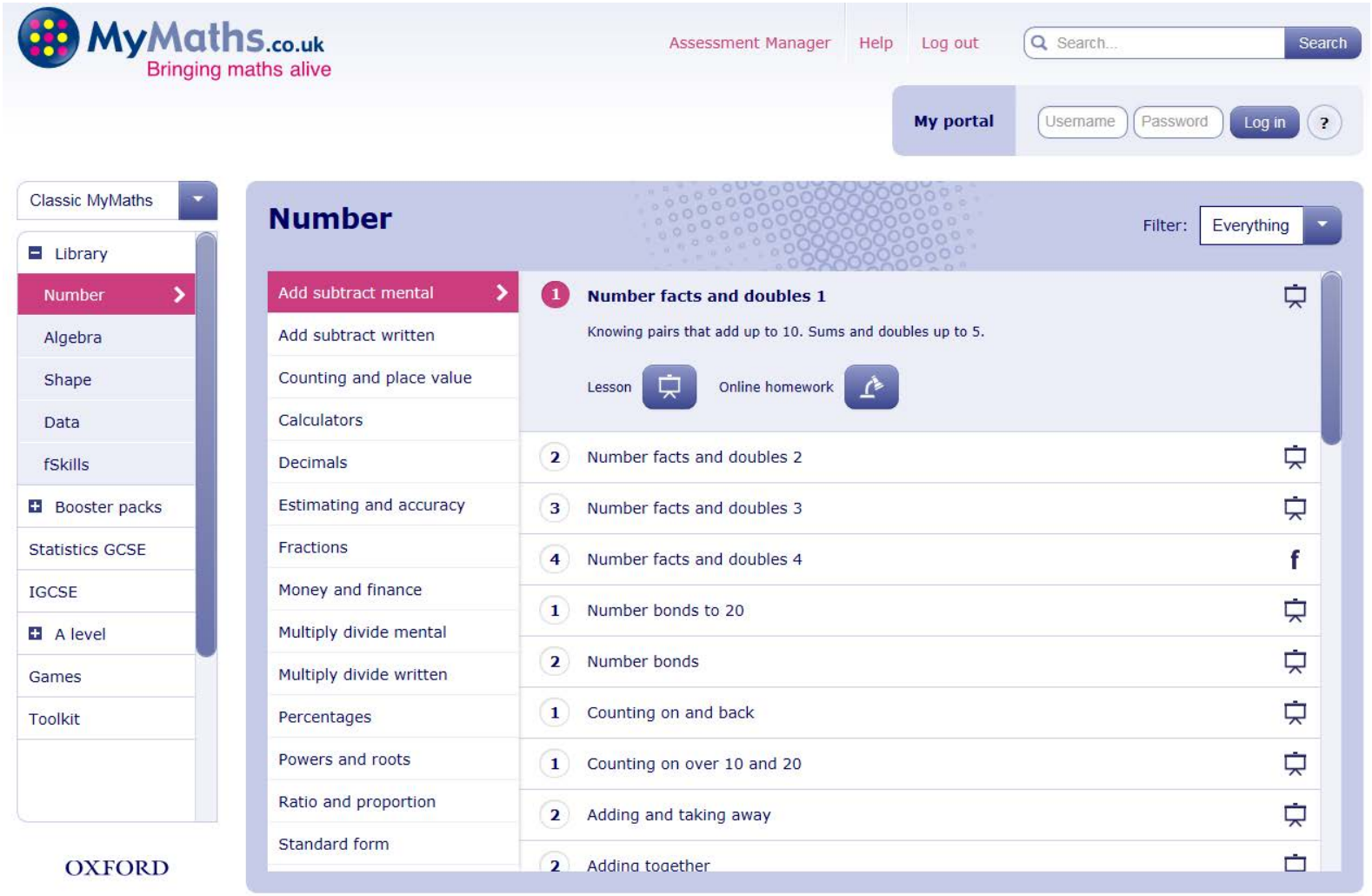
- Corbett Maths

Mymaths (www.mymaths.co.uk)

Login: albanrc

Password: kite

Mymaths (www.mymaths.co.uk)



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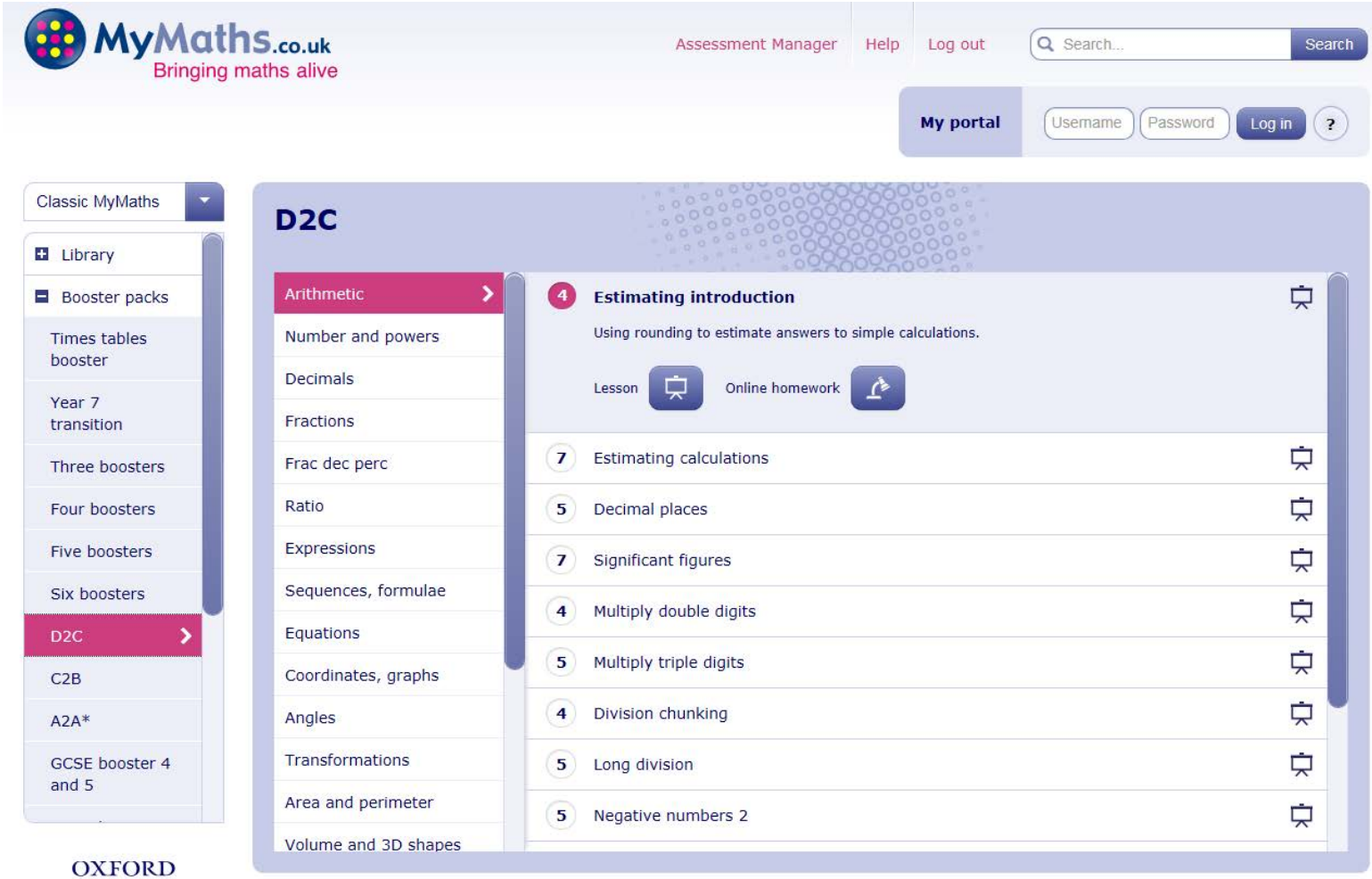
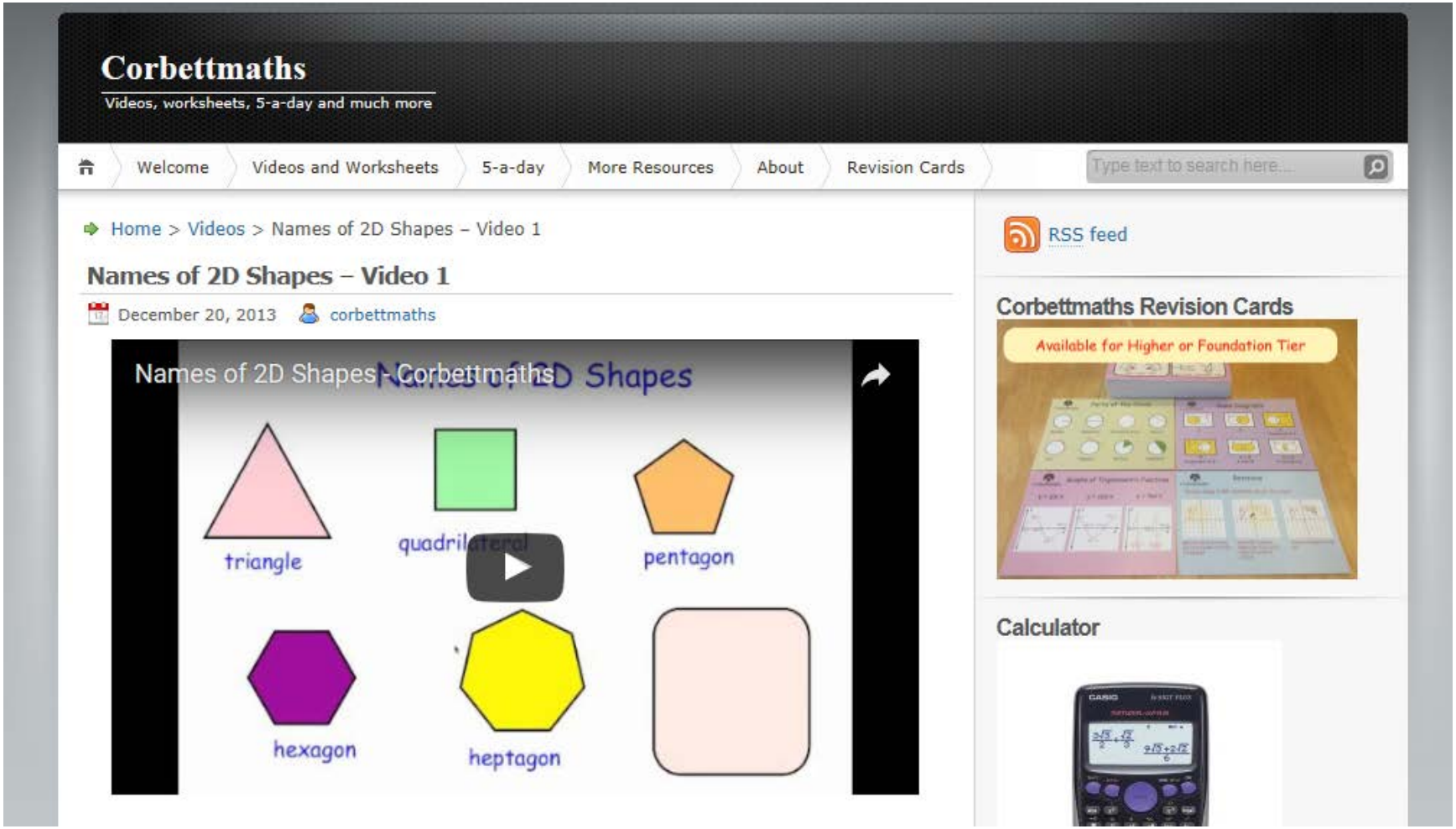


PIXL March 17 Maths Intermediate U1

Question	Topic	Video Clip	Max	Mark
1a	Powers	172	2	
1b	Multiplying decimals	94	1	
1c	Subtracting decimals	91	1	
1d	Subtracting fractions (different denominators)	133	2	
2a	Continue a sequence	286	2	
2b	Simplify an expression (two types of term)	9	2	
2c	Substitute into a formula	20	2	
3	Order fractions, decimals and percentages	131	3	
4	Find a percentage of a fraction of an amount	234/137	4	
5	Angles in triangles and quadrilaterals	37/33	5	
6a	Solve an equation with an unknown on both sides	113	3	
6b	Simplify using index form	174	2	
6c	Expand and simplify an expression involving brackets	13	2	
7	Properties of number	225	2	
8	Sample space diagram, probability, expected value	246	8	
9	Volume and capacity of a cuboid	355	4	
	OCW		2	
10	Using averages and range to find a set of values	50/53/56/57	4	

Corbett Maths (www.corbettmaths.com)



Corbett Maths (www.corbettmaths.com)

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2D Shapes

Video 1 on www.corbettmaths.com

Examples

Click here

Scan here

Workout

Question 1: Draw the following shapes

(a) A square (b) A rectangle (c) A circle (d) A triangle

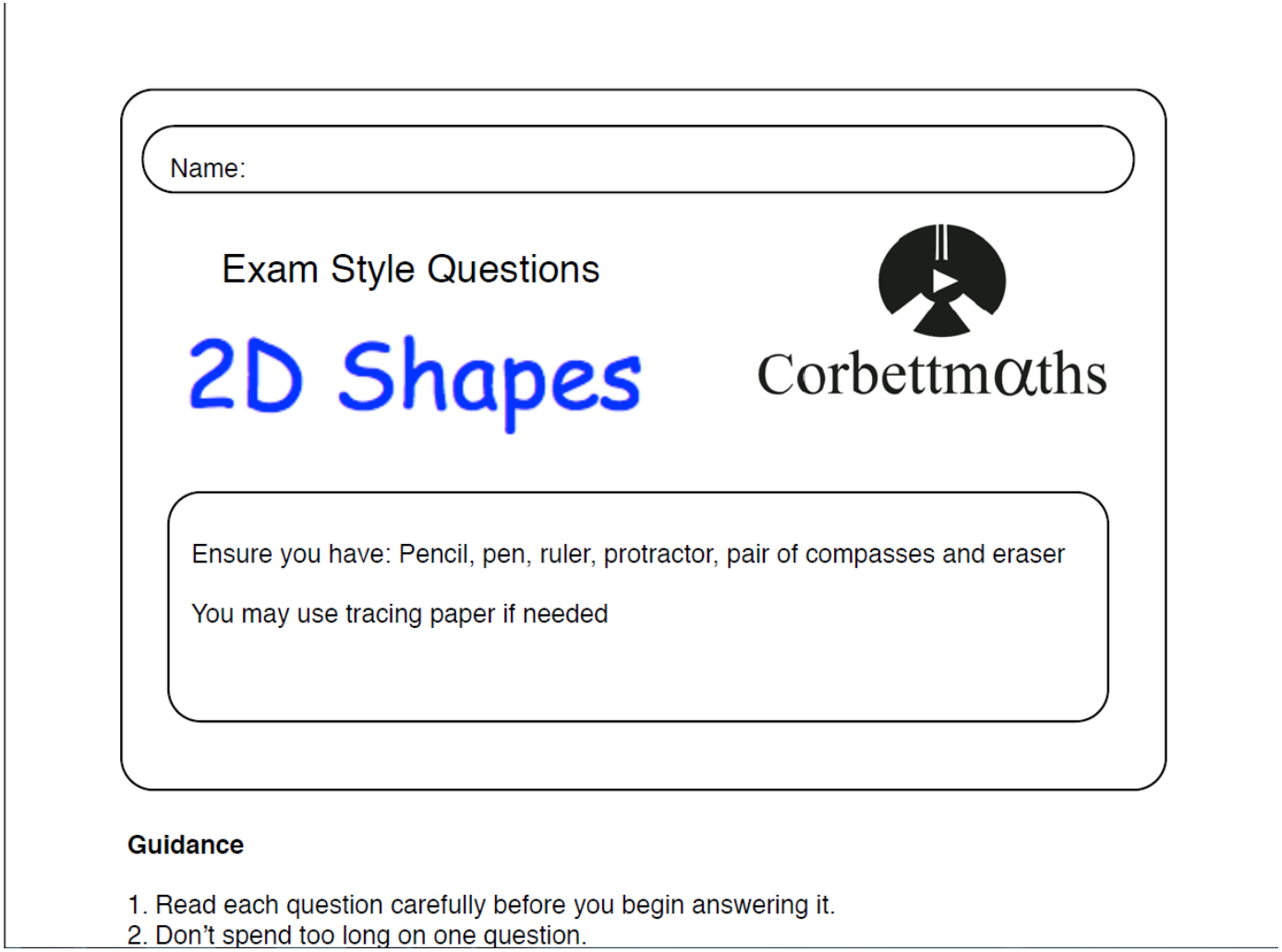
(e) A semi-circle (f) A pentagon (g) An octagon (h) A hexagon

(i) A decagon (j) A heptagon

Question 2: Name each of the shapes below

(a)  (b)  (c) 

Corbett Maths (www.corbettmaths.com)



Name:

Exam Style Questions

2D Shapes

Corbettmaths

Ensure you have: Pencil, pen, ruler, protractor, pair of compasses and eraser

You may use tracing paper if needed

Guidance

1. Read each question carefully before you begin answering it.
2. Don't spend too long on one question.

WTM

- Around the time of the exams we will be running Walking Talking Mocks with our classes.

- This is the process of giving hints and tips on a question, letting the pupils have a go and then modelling the correct answer so they get immediate feedback.

- We have found in the past that this has given pupils a lot of confidence in the days before their exams.