

Attitude toward Math

Circle the statement that *best represents* how you *feel* about math.
Please answer honestly!

- (a) Math is all about *substituting* numbers into formulas. To achieve a great math mark, it is only necessary to memorize all the formulas and know when to use them.
- (b) Math is all about *memorizing* all the examples given in the textbook and those given by the teacher. A great mark can be achieved just by doing this. It isn't necessary to understand the examples and their solutions.
- (c) Math is a *four-letter word* almost as obscene as the famous "w" word ("work"). Both of these words are far viler than the "f" word ("ΦAKK").
- (d) Math doesn't need to make sense; in fact, math *doesn't make sense* at all! It's just a set of meaningless rules and symbols. Students use the symbols and rules blindly for the sole purpose of pleasing their teachers and parents.
- (e) Without the answers at the back of the text book, students have *no hope of understanding* math. The greater the percentage of answers obtained that match those at the back of the book, the better the understanding of math.
- (f) I only take math courses because they're required for my *college/university* programme.
- (g) *Mathematics* is the *investigation* of *axiomatically defined abstract structures* using *logic* and *mathematical notation*. Accordingly, mathematics can be seen as an extension of spoken and written natural languages, with an extremely precisely defined vocabulary and grammar, for the purpose of *describing and exploring physical and conceptual relationships*.
- (h) In the solution of any problem, the *final answer* is more important than anything else. Therefore, I do not need to show my work.
- (i) I only care about my *final mark*.
- (j) I only care about getting a *credit*.

Subtract $3\% \times (\text{Math Average Adjustment Factor}) -$

Adjusted Average Math Mark:

Use a Web browser to load the following Web page: <http://www.actstudent.org/sampletest/index.html> . On the left side of the page you will see a vertical link bar entitled “Sample Tests.” Under the heading “Mathematics Test” there are links to five sets of math problems at the grade 11 level or lower. Do each set of problems and record your results in the table given below. *In addition, write full solutions to each problem in your notebook.*

	Question	1	2	3	4	5	6	7	8	9	10	11	12	Scores
Set 1	Your Answer													/12
	Correct Answer													
Set 2	Your Answer													/12
	Correct Answer													
Set 3	Your Answer													/12
	Correct Answer													
Set 4	Your Answer													/11
	Correct Answer													
Set 5	Your Answer													/12
	Correct Answer													
Overall Score														/59

Calculating your Estimated Final Mark in MGA4U0

Using the data collected on the front of this sheet, it is possible to calculate a *rough estimate* of what your final mark will be in MGA4U0. *You should use this rough estimate, in addition to a few other factors, to decide whether this course is appropriate for you.*

Now complete the following table: **(Be honest or the estimated final mark will be meaningless.)**

Adjusted Average Math Mark (A %)	Overall Score on ACT Sample Tests (S %)	Answer to "Attitude toward Math"	Attitude Reduction (R%)	Homework Adjustment Factor (H)	Estimated Final Mark in MGA4U0																												
= ____ %	<u>59</u> %	(a) (b) (c) (d) (e) (f) (g) (h) (i) (j)	<p>If you chose (a), (b), (d), (e) or (h), then <i>reduction = 10%</i></p> <p>If you chose (c), (f), (i) or (j), then <i>reduction = 15%</i></p> <p>If you chose (g) but you don't understand its meaning, then <i>reduction = 15%</i></p> <p>If you chose (g) and you do understand its meaning, then <i>reduction = 0%</i></p>	<p>How much time <i>will you</i> devote to this course <i>each night</i>? Circle <i>one</i> of the following.</p> <table border="1"> <thead> <tr> <th>Time</th> <th>Value of H</th> </tr> </thead> <tbody> <tr><td>0 – 5 min</td><td>0.1</td></tr> <tr><td>6 – 10 min</td><td>0.2</td></tr> <tr><td>11 – 15 min</td><td>0.3</td></tr> <tr><td>16 – 20 min</td><td>0.4</td></tr> <tr><td>21 – 25 min</td><td>0.45</td></tr> <tr><td>26 – 30 min</td><td>0.5</td></tr> <tr><td>31 – 35 min</td><td>0.55</td></tr> <tr><td>36 – 40 min</td><td>0.7</td></tr> <tr><td>41 – 45 min</td><td>0.8</td></tr> <tr><td>46 – 50 min</td><td>0.85</td></tr> <tr><td>51 – 55 min</td><td>0.9</td></tr> <tr><td>56 – 60 min</td><td>0.95</td></tr> <tr><td>> 60 min</td><td>1</td></tr> </tbody> </table>	Time	Value of H	0 – 5 min	0.1	6 – 10 min	0.2	11 – 15 min	0.3	16 – 20 min	0.4	21 – 25 min	0.45	26 – 30 min	0.5	31 – 35 min	0.55	36 – 40 min	0.7	41 – 45 min	0.8	46 – 50 min	0.85	51 – 55 min	0.9	56 – 60 min	0.95	> 60 min	1	<p>Let</p> <p><i>A</i> represent the adjusted average math mark in %</p> <p><i>S</i> represent the overall score on the ACT Sample Tests in %</p> <p><i>R</i> represent the "attitude reduction" in %</p> <p><i>H</i> represent the homework adjustment factor. Then,</p> <p><i>Estimated Final Mark in %</i></p> $= H \left(\frac{A + S}{2} - R \right)$ <p>Calculate your Estimated Final Mark Here</p>
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The BIG Decision

- ☐ Is your estimated final mark $\geq 65\%$?
- ☐ Did you obtain at least 65% in MCR3U0? (Replace 65% with 80% if MCR3U0 taken in night school or summer school.)
- ☐ Do you focus on *understanding mathematical concepts*?
- ☐ Do you *avoid blind memorization of facts and formulas*?
- ☐ Do you have *well developed critical thinking skills*?
- ☐ Do you have *well developed problem solving skills*?
- ☐ Are you *mature, hard working, ambitious, responsible and driven*?
- ☐ Do you *do your homework regularly*?
- ☐ Do you *do your homework soon after it is assigned*?
- ☐ In university, *will you be studying math or a math-related field such as engineering, physics, chemistry or computer science*?
- ☐ Do you *enjoy mathematics*?

YES!

NO!

If you answered a resounding "YES!" to all the above questions, then MGA4U0 is probably the right course for you.

If you answered a resounding "NO!" to *any* of the above questions, then MGA4U0 is probably *not* the right course for you.