

Practical Math!

Why math is important for real life, and calculating your GPA and what it means!



How I see math word problems:



**If you have 4 pencils and I
have 7 apples, how many
pancakes will fit on the roof?
Purple, because aliens don't
wear hats.**

ONLY IN MATH PROBLEMS CAN YOU BUY
60 CANTALoupES AND NO ONE ASKS
WHAT THE HELL IS WRONG WITH YOU.



SCHULZ

PEANUTWEETER.COM

@KARIMI

I'm not sure how many
problems I have because
math is one of
them.



som^{ee}cards
user card

Why Math?

- Why do we care about math?
- Skills for breaking down complex statements into reasonable ones.
- Skills for logical reasoning and evidence based arguments.

Let's Calculate our GPA!

- Find the section on the worksheet designated 'Spring 2014 grades'
- I want you to assign yourself a realistic letter grade for each class.
 - **DON'T GIVE EVERY CLASS AN A+**
 - **DON'T GIVE EVERY CLASS A D-**
 - **THINK ABOUT WHAT GRADE YOU NEED TO PASS THE CLASS**
- Next, we're going to talk about grades and how averages are calculated

You will receive grades

GRADES AND INDEX

WHAT DO THE LETTER GRADES REPRESENT?

Grade	Point Value	Achievement Level
A+	{ 4.0 }	Excellent
A		
A-		
B+	{ 3.3 }	Good
B		
B-		
C+	{ 2.3 }	Satisfactory
C		
C-		
D+	{ 1.3 }	Passing
D		
F	0.0	Failure

Graduation Requirements

WHAT ARE GRADUATION REQUIREMENTS?

To graduate with any of the degrees offered, you must be a matriculated student at the time you apply for graduation and complete the required number of credits for your major with a minimum cumulative grade point index of 2.00, which is at least a “C” average.

Student Handbook p 19

Calculating GPA

Course	Grade	Value
English 12	B	3.0
Mathematics 15	D	1.0
Psychology 11	D	1.0
Phys Ed 6	B	3.0

$$\bar{x} = \frac{1}{n} \sum_{i=1}^n x_i$$

$$GPA = \frac{\text{sum of grade value}}{\text{number of courses}}$$

$$GPA = \frac{1 + 3 + 3 + 1}{4} = \frac{8}{4} = 2$$

PASSING? 

GRADUATING? 

GRADES AND INDEX

WHAT DO THE LETTER GRADES REPRESENT?

Grade	Point Value	Achievement Level
A+	{ 4.0 }	Excellent
A	{ 4.0 }	
A-	{ 3.7 }	
B+	{ 3.3 }	Good
B	{ 3.0 }	
B-	{ 2.7 }	
C+	{ 2.3 }	Satisfactory
C	{ 2.0 }	
C-	{ 1.7 }	
D+	{ 1.3 }	Passing
D	{ 1.0 }	
F	0.0	Failure

What About Credits?

Course	Credits
English 101	3
Mathematics 101	4
Psychology 101	3
Phys Ed 101	2

$$\bar{x} = \sum_{i=1}^n w_i x_i$$

GPI =

INDEX
GRADES REPRESENT?
Achievement Level

$$GPI = \frac{9 + 4 + 3 + 6}{3 + 4 + 3 + 2} = \frac{22}{12} = 1.83$$

A	{ 4.0 }	Excellent
A-	{ 3.7 }	
B+	{ 3.3 }	Good
B	{ 3.0 }	
B-	{ 2.7 }	Satisfactory
C+	{ 2.3 }	
C	{ 2.0 }	Passing
C-	{ 1.7 }	
D+	{ 1.3 }	
D	{ 1.0 }	Failure
F	{ 0.0 }	

● **PASSING?** 

GRADUATING? 

Who Cares?

- GPA is important for your academic career: your choice for major, your choice for school, your choice for career.
- If you let your GPA slide too long you may have a hard time getting it up!
 - [Kingsborough GPA Calculator](#)
 - [GPA Calculator](#)

• **Bigger picture! Why did I just make you calculate your GPA?**

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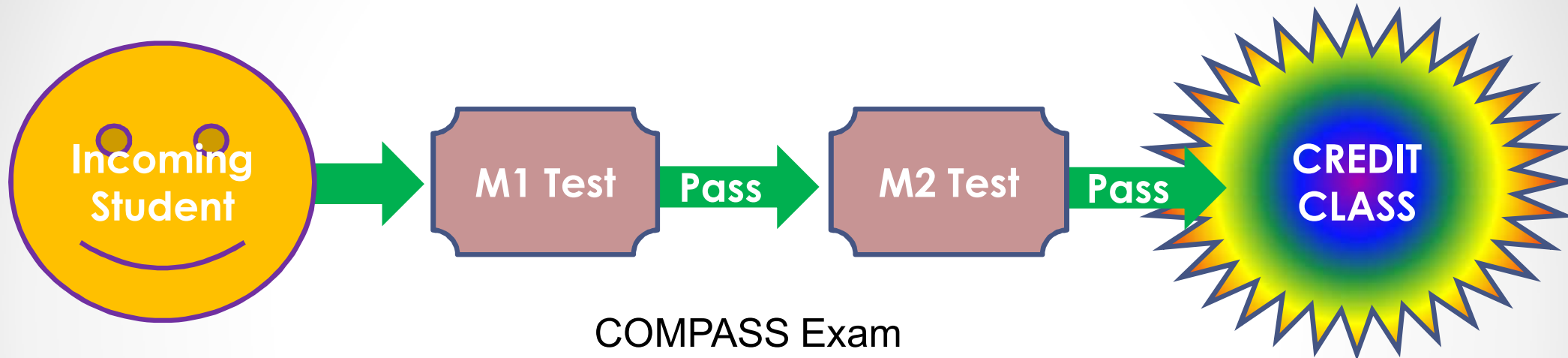


“Algebra class will be important to you later in life because there’s going to be a test six weeks from now.”

Math at Kingsborough

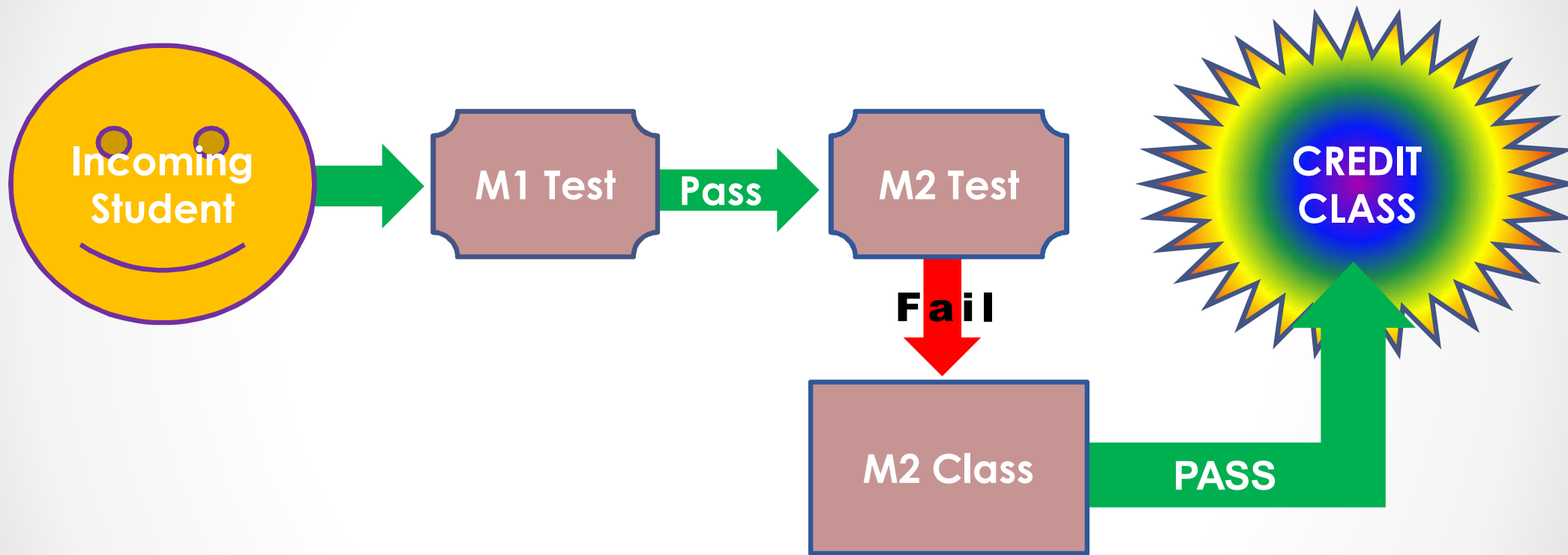
- Based on how you did on your math placement exam and your desired major you will need to follow a specific math sequence.
- Everybody must pass the M1 and M2 as well as take a credited math course at Kingsborough to graduate.

Math at Kingsborough



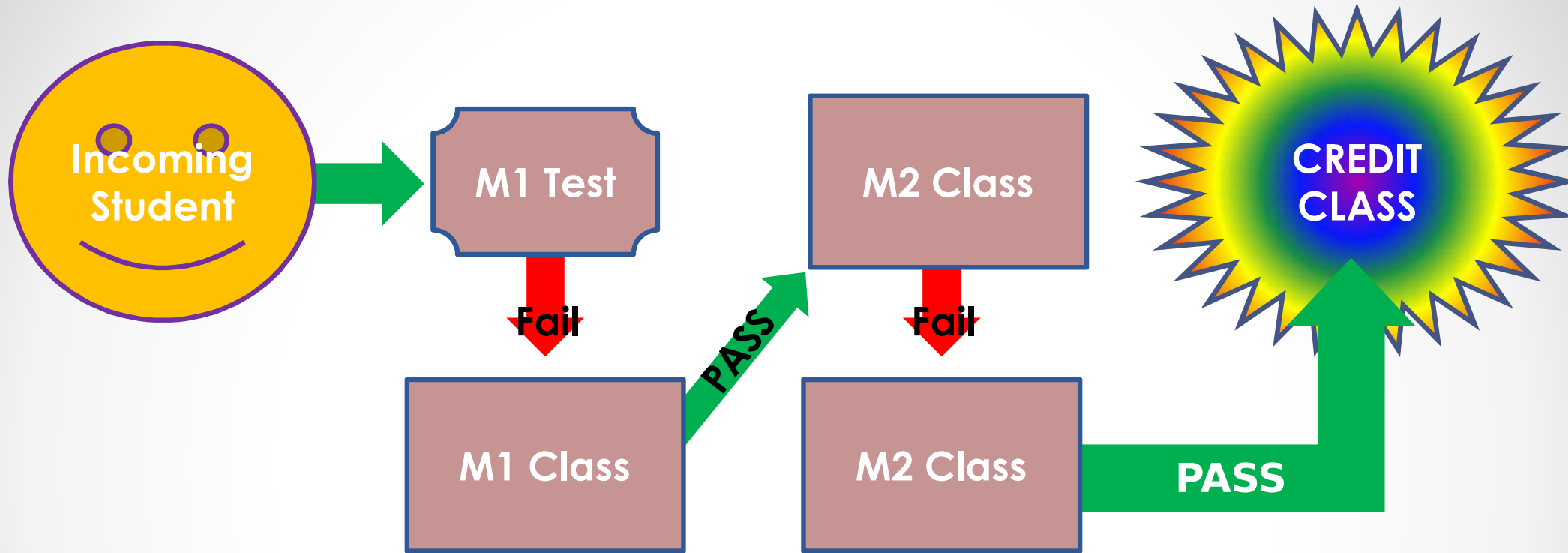
- Best Case Scenario!
- How long will this take? 1 semester!

Math at Kingsborough



- Less optimal scenario!
- How long will this take? 2+ semesters (1 year!)
-

Math at Kingsborough



- Even less optimal scenario!
- How long will this take? 3+ semesters (1-2 years!)
- Sometimes classes aren't available, making this timeline even longer!
- This is why it's important for you to talk to your advisors and plan your classes early!
-

Tips for Math Success!

- Your goal is to graduate as soon as you can! Only take math courses that are required
- Be realistic about your major: How many math courses do you need to finish?
- More advanced courses could wait when apply for senior college
- Plan for the **long term**, not just for the semester
- *Check **prerequisites** as you plan your courses



Tips for Math Success!

- Begin taking math sequence (M1 and M2) **as soon as you can**
 - Taking too long is very costly (tuition, time)
 - Math builds on itself: The longer the gap between courses, the more likely you'll forget the material
- Register for classes **early** before they close
- Buy **textbook** for each math class
- Go to **free tutoring** (F209)
- Questions? **Ask your Advisor!**