Calculus Placement with ALEKS PPL

At California State University, Fresno

ALEKS PPL

Designed to help put you in the correct math course:

- Math 3 College Algebra
- Math 5 Trigonometry
- Math 6 Precalculus

- Math 70 Calculus for Life Sciences
- Math 75A Calculus 1 (year-long)
- Math 75 Calculus 1 (semester-long)
- The review is tailored specifically to students' personal math ability.
- There are multiple assessments no single high stakes placement
- No surprise questions review in the system shows you all the questions types with guides to solve them

Who takes it?

- Students who have decided to go to Fresno State.
- Students who plan to take an engineering, science, or mathematical major OR are undecided but leaning in that direction.

This is not a general placement for all incoming students, ONLY students who plan on going into the majors listed above.

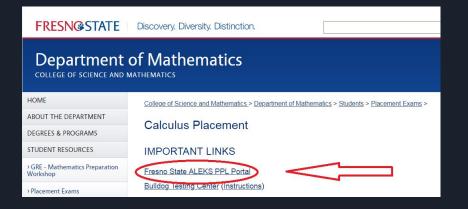
Multiple Measures Assessment still applies to all students: these students who are categories 3 or 4 will be sent to Math 3L, College Algebra with Corequisite Support UNLESS they place into a higher course via ALEKS PPL.

What do students need?

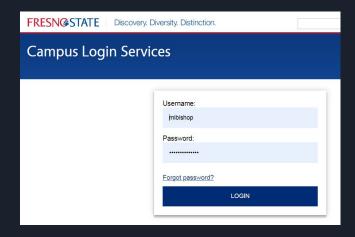
- 1. Fresno State Log in (comes with email address)
- 2. Photo ID
- 3. Computer or Tablet with internet and webcam
 - a. Chromebooks do NOT work
 - b. DiscoverE at Fresno State can assist with support https://www.fresnostate.edu/president/discovere/
- 4. Paper, Pen, and Pencil
- 5. 6-10 hours minimum time dedicated to placements.

This is offered at no charge to students.

How do they start? Log-in!



- Log in to the <u>Fresno State ALEKS PPL</u>
 <u>portal from the Fresno State</u>
 <u>Mathematics Calculus Readiness</u>
 <u>Webpage</u> your Fresno State login.
- 2. Bookmark this portal for future logins.



2. Register

Use the code provided here at the Fresno State Mathematics Calculus Readiness Webpage

The code is updated each semester. For incoming students in Fall 2023, it is

YECVK-P94LU

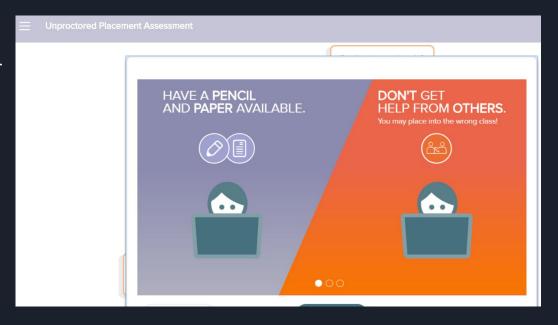
ALEK5°		
Add C		nange to below. You should have received this from your instructor.
Class Co	ode: ?	

Initial Placement

- 3. Download the lockdown browser and set up the Monitor service with webcam.
- 4. Take the initial placement.

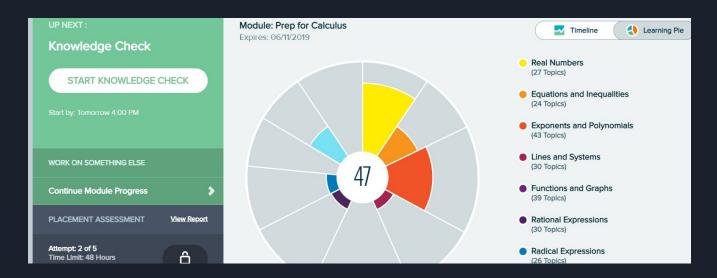
Set aside two hours and have pencil and paper ready.

Do not leave your seat.



Review

4. Spend time reviewing topics. At the start of each topic, take notes, then work on the exercises.



Their pie chart will fill as they learn new topics.

Topics Review

At the start of each topic, review the examples. Take notes on the Learning Page.



EXPONENTS AND POLYNOMIALS

Degree and leading coefficient of a univariate polynomial



? QUESTION

What are the degree and leading coefficient of the polynomial?

$$12v - v^4 + 6$$



EXPLANATION

We first rewrite this polynomial in standard form.

We rearrange the terms so that the exponents on the variable decrease from left to right.

$$12v - v^4 + 6 = \underbrace{-v^4 + 12v + 6}$$

standard form

The <u>leading term</u> is the first term when the polynomial is in standard form.

So, for this polynomial, the leading term is $-v^4$.

Degree

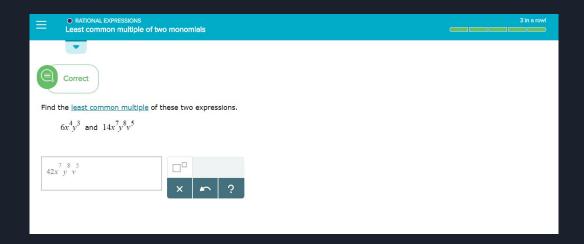
The degree of a term is the exponent of its variable. (When there is no variable, the degree is 0.)

The degree of a polynomial is the degree of its leading term.

For our polynomial, the leading term is $-v^4$. So, the degree of the polynomial is 4.

Problem Solving

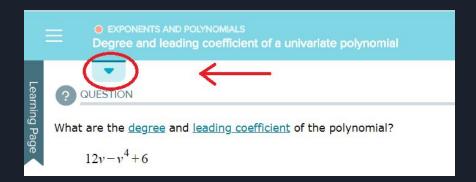
Do the problems carefully. If you answer several questions correctly in a row, the system gives you bonuses to skip questions.

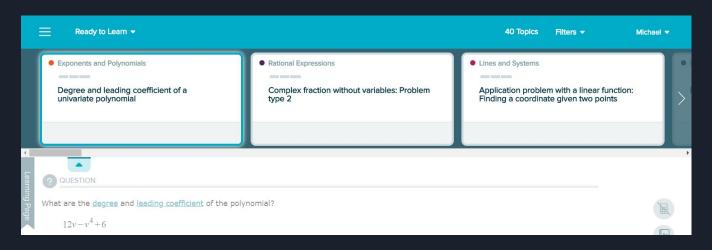


A student who gets three in a row gets treated as if they answered five correct questions.

Stuck?

If you get stuck or frustrated with a set of topics, click the blue arrow above to change the topic area.





Scroll right and choose another topic.

Placements

Each account has FIVE total placements, including the initial one.

Students may take another placement after five hours of study in the system and two days break from the previous placement.

Scores

COURSE	SCORE REQUIRED (best placement)
Math 75 Calculus	76 or higher
Math 75A Calculus, Year-long	66-75
Math 70 Calculus for Life Sciences	51 or higher (Life Sciences Major)
Math 6 Precalculus	40-65
Math 3 College Algebra/ Math 5 Trigonometry	0-39

Resources

Fresno State Mathematics Calculus Readiness Page: http://www.fresnostate.edu/csm/math/students/placement-exams/calc-readiness.html

Fresno State ALEKS PPL portal: https://secure.aleks.com/shiblogon/sso?sso account=7ee766b

DISCOVERe at Fresno State:

https://www.fresnostate.edu/president/discovere/