# Summer Math Review for Students Entering Pre Calculus The Christian School at Castle Hills

Dear Students and Parents,

I am so excited to be serving as your Pre Calculus teacher this coming school year. To ensure that you are equipped with pre-requisite knowledge, and to help you avoid the "Summer Slide" that often comes with a summer away from school, I am asking that all students complete the attached summer math homework. This assignment is <u>required</u> and will be due at the beginning of the school year. It will serve as your first TWO quiz grades.

Please do not try to complete the packet all at once, but rather pace it out over the course of the summer to keep your mind sharp and working all summer long.

For each section, **complete the problems on a separate sheet of paper** with the title and section number clearly marked at the top of your page. **Show all work in pencil** and box in your answers or provide an answer column to assist me in grading. When you have completed a section, check your answers against the provided answer key and then **correct any problems that you missed in grading pen or pencil.** You will get full credit for corrected answers. The goal is to make sure you are comfortable with each topic. You may work the sections in any order, but **please be sure to turn in your packet with the pages in the order given.** If you get stuck, I have linked reference materials and notes for each section. If you need or want additional practice, you can go to the IXL additional practice link. IXL has video instructions as well that you may find helpful.

It is my hope that this packet will help you to enter your Pre Calculus coursework with confidence. If you have any questions about the assignment, feel free to email me. I will be checking email once a week over the summer. You can also reach out to the secondary office if you need a quick reply.

In His Service,

Ms Patricia Harrison Secondary Mathematics pharrison@castlehills.schooll

# Summer Math Review for Students Entering Pre Calculus The Christian School at Castle Hills

### Summer Math Practice and Recommended Pacing:

June: Exponents and Radicals

Week 1: Solving Equations on both sides

- → Resources/Notes:
  - <u>Video on Solving equations</u>
  - Equations Cheat Sheet

### Week 2: Factoring Polynomials

- → Resources/ Notes
  - ♦ <u>Video on Factoring</u>
  - <u>Cheat Sheet Factoring</u>

# Week 3: Radicals and Rational Exponents

- → Resources/Notes
  - Rational ExponentsCheat Sheet
  - Extra Practice Worksheet
  - Video on Radicals and Rational Exponents

#### Week4 Simplifying Radicals

- → Resources/Notes:
  - Simplifying Radicals Notes
  - ♦ <u>Video on Radicals</u>

#### July: Graphing Functions

#### Week 1: Graphing Systems of Equations

- → Resources/Notes:
  - Notes on Linear Systems
  - Video on Linear Systems for graphing

# Week 2: Substitution and Elimination odds only

- → Resources/Notes:
  - Notes on Substitution
  - Video on solving systems of linear equations

#### Week 3: Graphing Quadratic Functions

- → Resources/Notes:
  - Notes on Graphing Quadratics
  - Video on Parabola

#### Week 4: Graphing Radicals

- → Resources/Notes:
  - ◆ Notes on graphing radicals
  - <u>Video on graphing Radicals</u>

August: Basic Trigonometry

Week 1: <u>Right Triangle Trig Ratios</u>

- → Resources/Notes:
  - ◆ <u>Trig Cheat Sheet</u>
  - ♦ <u>Video on Ratios</u>

# Week 2: <u>Right Triangle Missing Sides and Lengths</u>

### → Resources/Notes:

- Notes on Solving for missing sides
- <u>Video on Right Triangle side lengths</u>