# Chapter 1: Radian Measure

Studying Tips: the radian measure is a brand new concept for most students taking this course. Make sure to 1) set your calculator to radian mode and 2) be able to convert back and forth between radian and degree. Always remember that pie = 180 degrees, and do your calculations for other angles based on this. Conversion questions are 1 mark questions. Another recurring concept in this chapter is angular velocity. There are no tricks to master this concept other than doing plenty of practice questions. Angular velocity questions can be worth 3-4 marks depending on their complexity.

# Chapter 2: Radian Measure and Angles on a Plane

Studying Tips: this chapter explains how basic trig ratios are expressed in radians. From this point and on, we recommend you to think in radians instead of degrees whenever you encounter a trig question. You will complete test questions much faster if you save the time you use to convert degrees into radians. Teachers usually ask you to 1) find exact value and 2) find equivalent expressions. These questions can be worth 2-4 marks.

# Chapter 3: Graphs of Primary Trig Functions

Studying Tips: this chapter outlines all the important elements of the three basic trig functions; this time, all the horizontal intercepts are expressed in radians. Teachers rarely test you on the properties of untransformed trig functions on tests. However, you should know all these basic properties by heart in order to deal with the transformations with less trouble.

# Chapter 4: Transformations of Trig Functions

Studying Tips: we recommend you to clearly label which transformation applies to which element of the graph. This will help you better graph the transformed function. Graphing questions are usually worth 4-5 marks. Make sure to label on the elements your teacher is looking for on the graph to get full marks.

# Chapter 5: Reciprocal Trig Functions

Studying Tips: teachers may or may not test you on graphing, but they will likely test on the characteristics of the three reciprocal functions. This is not the main focus of the unit, so we don’t recommend you spending too much time studying this chapter. Questions from this chapter may be worth up to 5 marks.

# Chapter 6: Modelling with Trig Functions

Studying Tips: this chapter mainly focuses on the word problems. Unless specified, you can model a scenario with either sine or cosine function; we recommend you choosing the one you are most good at or the one that is easier for you to model the scenario. Usually, teachers will ask you to graph the model (3 marks) and solve for something (3-4marks). Be sure to read carefully what the question is asking you to solve. If you realize that you modelled a question incorrectly and don’t have time to change your solution, don’t panic - you will get part marks if your calculations are done correctly.