TAURANGA GIRLS' COLLEGE
YEAR 12 MATHEMATICS (12MAT), 2019
Course Outline to students

General:
The course is designed for those students who have completed either 11MAE or 11MAT in Year 11 and who do not intend to study *Calculus* or *Statistics* in Year 13. This course leads on to 13MAT in Year 13, which is an approved subject for University Entrance.
Students from 11MAT need to have achieved all internal credits and got at least one of the two external Achievement Standards.

Achievement Standards, Credits and Course Endorsement:
This course is based on six achievement standards derived from Level 7 of *The New Zealand Curriculum.* There are five internal AS (91258 v3, 91259 v3, 91260 v3, 91264 v3, and 91265 v3, totalling 14 credits), and one external AS (91267 v3, 4 credits), giving a total of 18 Level Two credits.
Students can gain further recognition of their achievements in this course by attaining an Endorsement with Merit or Excellence. An Excellence Endorsement requires 14 or more credits at Excellence level, while students gaining 14 or more credits at Merit or above will gain a Merit Endorsement. For Course Endorsement, at least 3 of the 14 credits must be from internally assessed standards, and 3 from the external assessment.

The following table notes if the AS contributes towards Level 1 numeracy and literacy and which Vocational Pathway the AS may be credited towards. The Vocational Pathways are: Primary Industries (PI), Service Industries (SI), Social and Community Services (S&C), Manufacturing and Technology (M&T), Construction and Infrastructure (C&I), and Creative Industries (CI).

General Expectations, Calculators and Costs:
Students are expected to arrive at class promptly, prepared for work, with the required books and stationery. Scientific calculators are vital for the work to be undertaken in this course. Remember that if you miss class for a legitimate reason then **you** are responsible for catching up on missed work and for meeting any assessment requirements given during your absence. As part of the course students are required to purchase workbooks for AS 91258, AS 91260 and AS 91267, at a total cost of $18. We also offer students the opportunity to purchase an optional workbook for AS 91264 at $6, or a more extension oriented book which covers all Achievement Standards at a cost of $29.

Course Assessment Requirements and Reassessment:
Students are reminded that they need to be familiar with the requirements set out in the 'Tauranga Girls' College handbook for students' in regard to assessment.
In particular, it is noted that no reassessment is offered for any of the internal standards. Where appropriate students will be given the opportunity to complete at least one practice before each internal AS and have this formally assessed. Student work will need to be held by the school for assessment requirements.

Homework

Completing all set homework is vital. The type of homework will vary depending on the topic. Some homework will help students reinforce and learn to apply the skills that are fundamental to the topic. Some homework will require students to do complete questions that will help develop an understanding of the assessment.

Topics and Assessment:

The schedule below summarises the six topics which make up the course, and the number of credits for the Achievement Standard assessed as part of each topic.
An "I can do" sheet is issued at the beginning of each unit, which gives the key skills covered in that topic and form the basis of the material assessed in the AS.

YEAR 12 MAT MATHEMATICS COURSE TOPICS AND ASSESSMENT SUMMARY, 2018

Topic	Achievement Standard	Int / Ext	L2 Credits	Numeracy / Literacy and Vocational Pathways	Week	Result
TERM ONE						
Trigonometry	AS2.4 (91259 v3) Apply trigonometric relationships in solving problems	Int	3	Numeracy, C&I, M&T, CI	T1 wk6	
Sequences and Series	AS2.3 (91258 v3) Apply sequences and series in solving problems	Int	2	Numeracy, C&I, M&T, PI, S&C, CI	T1 wk10	
TERM TWO						
Probability	AS 2.12 (91267 v3) Apply probability methods in solving problems	Ext	4	Numeracy, Literacy, PI, SI, S&C, CI	T2 wk6	
Statistical Inference	AS2.9 (91264 v3) Use statistical methods to make an inference	Int	4	Numeracy, Literacy, PI, SI, S&C, CI	T2 wk11	
TERM THREE						
Statistical Experiment	AS2.10 (91265 v3) Conduct an experiment using statistical methods	Int	3	Numeracy, Literacy, PI, SI, S&C, CI	T3 wk6	
Term 3 Examination	2 hour examination covering the external AS2.12				Exam week 8	
TERM FOUR						
Networks	AS 2.5 (91260 v3) Apply networks in solving problems	Int	2	Numeracy, C&I, PI, S&C, CI	T4 wk2	
	Total credits		**18**	Numeracy (18), Literacy (11), C&I (7), M&T (5), PI (12), S&C (15), CI (18)		