

Module Code	19349008	Course Term
Course Subject Name	<b>Physical Mathematics and Practices</b>	<b>Autumn Semester</b>
Course Tutor	<b>Ton V. TA</b>	
Credit	3	Taught Day
Schools	School of Agriculture	<b>MON-3,4</b>
Taught Year	<b>The second year</b>	
Campus	Ito campus	
Subject Area	Lecture	
Course Subject Classification	Common basic subject	
Course Requirements	Class attendance	
Course Requirement (Pre-requisite)	None	
<b>Course Outline</b>		
To study basic concepts and techniques of mathematics, and their applications in other fields		
<b>key words</b>		
Differentiation, Integration, Matrices, Differential Equations		
<b>Study Objectives (General)</b>		
How to use mathematical tools for solving realistic scientific and engineering problems		
<b>Study Objectives (Specific)</b>		
To learn and practise		
a) fundamental concepts on calculus, algebra, and ordinary and partial differential equations		
b) applications of mathematics in physics and engineering		
<b>Course Plan</b>		
1. Infinite Series and Power Series		
2. Complex Numbers		
3-4. Differentiation		
5-6. Integration		
7. Matrices and Determinants & Midterm exam		
8. Vector Analysis		
9. Fourier Series & Transforms		
10. Ordinary Differential Equations and Applications		
11. Partial Differential Equations and Applications		
12. Functions of a Complex Variable & Final exam		
<b>Course Approaches</b>	Lectures, class exercises, assignments, exams	
<b>Textbooks</b>	Mathematical Methods in the Physical Sciences, Third Edition, Mary L. Boas	
<b>Reference Books</b>	Higher Engineering Mathematics, Sixth Edition, John Bird	
<b>Study consultation (office hour)</b>	Make an appointment with the instructor by email or phone	
	Office: Rm 786, Bldg W5, Ito campus	
	Email: ta.viet.ton.050@m.kyushu-u.ac.jp	Phone: 092-802-4770
<b>Exams/Results Evaluation Method</b>	Attendance: 20%	Assignments: 20%
	Midterm exam: 30%	Final exam 30%
<b>Others</b>		

