



## ISS Course Syllabus

Teacher: **Mr. Marcus**  
Course Title: **Pre-Algebra**

Grade: **7**  
HS Credit Value:

### Course Objectives:

Each level listed on the under fold is an integral part of a complete and comprehensive Course in **Pre-Algebra**. This Course is designed to meet the needs of students of all abilities.

Each section has a specific theme, in which the students will continuously review and integrate previously mastered concepts.

The students will be given the opportunity to develop self-confidence while broadening their scope of appreciation for **Pre-Algebra**.

The Course Sequence is specially structured so that each month has a specific objective. When these objectives are met and mastered, the students will be able to apply these acquired skills to problem solving in a wide range of applications as it prepare them for **Algebra 1**.

## General Course Contents:

**Throughout this course sequence, the students will learn the following concepts and their applications.**

### **Whole Numbers**

- . Numbers concepts
- . Addition
- . Subtraction
- . Application

### **Multiplication & Division**

- . Basic Factors
- . Procedures
- . Practice
- . Applications

### **Geometry**

- . Segments, lines and angles
- . Triangles
- . Quadrilaterals
- . Circle and hexagons

### **Rational Numbers**

- . Common fractions
- . Improper fractions
- . Mixed numbers
- . Decimal fractions

### **Sets and Numbers**

- . Set concept and operations
- . Early number systems
- . Decimal number systems
- . Factors and multiples

## **Fractions**

- . Like denominators
- . Unlike denominators
- . Decimal fractions
- . Word problems

## **Fractions**

- . Common fractions
- . Decimal fractions
- . Per cents
- . Word problems

## **Formulas & Ratios**

- . Writing formulas
- . A function machine
- . Equations
- . Ratio & proportions

## **Sets and Numbers**

- . Gathering and organizing data
- . Central tendency and dispersion
- . Graphs of statistics
- . Graphs of points

## **Review**

- . Whole numbers
- . Geometry, sets, and systems
- . Fractions
- . Formulas, ratios and statistics

**Evaluation System:**

- The students will be given formal end of term examinations.
- The students will be informally assessed in the following ways:
  - a. Weekly or by unit, informal teacher generated tests.
  - b. Daily, this includes class work, participation, and behavior.
  - c. Homework assignments

|                          |             |
|--------------------------|-------------|
| <b>Examination</b>       | <b>30%</b>  |
| <b>Graded Class Work</b> | <b>25%</b>  |
| <b>Home work</b>         | <b>20%</b>  |
| <b>Participation</b>     | <b>15%</b>  |
| <b>Behavior</b>          | <b>10%</b>  |
| <b>Total</b>             | <b>100%</b> |

**Strategies and Instructional Methods**

- Demonstrations
- Direct problem solving
- Note taking
- Review and practice
- Weekly quizzes

**Resources/ Textbooks:**

- **Pre-Algebra;** Prentice Hall Mathematics