YEAR 11 COMPUTER SCIENCE

SRI KDU International School SUBANG JAYA

PROGRAMME OF STUDY - TERM 2

DATABASES

- **Understanding Databases:** Gain an introductory understanding of database concepts and structures.
- **SQL Basics:** Learn the basics of SQL (Structured Query Language), particularly focusing on SELECT queries.
- **Advanced SQL Queries:** Delve into more complex aspects of SQL, including the use of clauses like ORDER BY, and functions like SUM and COUNT.
- **Practical Application:** Apply knowledge through practical examples and tasks, solving real-world problems using SQL.

PROGRAMMING

- **Foundational Concepts:** Understand key programming concepts including data types, variables, and constants.
- **Conditional Statements:** Learn to use IF and CASE statements for making selections in programming.
- **Loop Structures:** Gain knowledge of iteration mechanisms, including count-controlled, pre-condition, and post-condition loops.
- **Working with Arrays:** Explore the concept and implementation of arrays in programming.
- **String Manipulation and Library Routines:** Understand string manipulation techniques and the use of common library routines.
- **Practical Programming Exercises:** Engage in practical programming tasks to reinforce learning and apply theoretical concepts.
- **Procedures and Functions:** Start with an understanding of procedures and functions in programming.
- **File Handling Techniques:** Learn about various techniques for handling files in programming.

EXAM PREPARATION

- **Past Paper Review:** Engage in extensive review sessions using past IGCSE Computer Science exam papers to understand exam patterns and question types.
- **Pseudocode Mastery:** Enhance the ability to write clear and effective pseudocode, a crucial skill in computer programming assessments.
- **Development of Computational Thinking:** Focus on improving computational thinking skills, essential for problem-solving and logical reasoning in computer science.
- **Core Principles Reinforcement:** Deepen understanding of the core principles of computer science covered throughout the course.
- **Exam Readiness:** Build confidence and preparedness for the IGCSE Computer Science examination, with a special focus on techniques and concepts outlined in Paper 2.