Input — Instructions → Processing — Results → output

Year 10: Computer Science

Michaelmas 1	**1.4 -Network security & 2.3 – Producing robust programs** • Threats to computer systems and networks • Identifying and preventing vulnerabilities • Utility software • Defensive design
Michaelmas 2	**1.4-Network security & 2.3 – Producing robust programs** • Defensive design & Testing • Identify common errors • Trace tables
Lent 1	**1.5 – Systems software & 2.4 – Boolean logic** • Operating systems, The purpose and functionality of operating systems: • User interface, Memory management and multitasking • Peripheral management and drivers • User management, File management • Simple logic diagrams using the operators AND, OR and NOT
Lent 2	**1.5 – Systems software & 2.4 – Boolean logic** • Simple logic diagrams using the operators AND, OR and NOT • The purpose and functionality of utility software • Utility system software: • Encryption software • Defragmentation • Data compression
Trinity 1	**1.6 – Ethical, legal, cultural and environmental impacts of digital technology** **2.5 – Programming languages and Integrated Development Environments** • Ethical, legal, cultural and environmental impact • Legislation relevant to Computer Science: • Characteristics and purpose of different levels of programming language: High-level languages, Low-level languages
Trinity 2	**1.6 – Ethical, legal, cultural and environmental impacts of digital technology** **2.5 – Programming languages and Integrated Development Environments** • The Data Protection Act 2018 • Computer Misuse Act 1990 • Copyright Designs and Patents Act 1988 • Software licences (i.e. open source and proprietary)