

# S2 Computing Science

Course Information

# Course Content



Computer Graphics



Animation



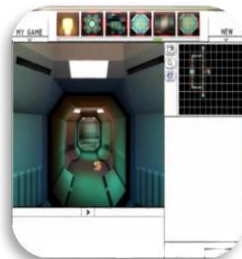
Computer Hardware



Computer Security



Website Design



Game Design



Database



Problem Solving with VB.NET

# Resources



- ▶ S2 Notes Booklet
- ▶ Homework booklet - now online and available through Microsoft Teams
- ▶ Teams for each class
- ▶ Interactive presentations in glow
- ▶ Tutorial booklets and online videos
- ▶ Most Software can be downloaded and used at home on a PC:
  - ▶ Office 365(install through GLOW)
  - ▶ Construct 2 for Game Design
  - ▶ Visual Studio Express from Microsoft site

# Timelines



- ▶ Issued to all pupils at start of the year
- ▶ Electronic copy available from Departmental Website and GLOW
- ▶ What is in a timeline?
  - ▶ Topic and breakdown of what is taught on a period by period basis
  - ▶ Written Assessment Dates (November and March)
  - ▶ Graded Homework Dates (every 3 weeks)

# Forms of assessment



- ▶ 2 written tests to assess knowledge and understanding and problem solving
- ▶ 4 projects / investigations to assess practical skills and problem solving
  - ▶ Hardware Project - recommend hardware required to solve a real life problem with reasons
  - ▶ Safety and Security Website - Design and create a website on cyber security with animations created by the student
  - ▶ Games Design - Create a game and create and edit appropriate media
  - ▶ Scotland's Got Talent - Programming based task to create a voting system for a TV show

# Skills developed



- ▶ Problem Solving (programming, game design, hardware selection)
- ▶ Critical Thinking (all units)
- ▶ Creativity (website, animation, programming)
- ▶ Planning and organising technological activities
- ▶ Teamwork
- ▶ Presentation

# Additional support



- ▶ ICT3 open at 8.00 for pupils to work on any project or use computers for other subjects.
- ▶ Websites - BBC Bytesize & GLOW
- ▶ Most software available at home.
- ▶ Use of S6 tutors to support pupils when available.
- ▶ Homework and test dates given in advance.
- ▶ Teachers available before school and lunchtimes to answer questions.

# Third year and beyond



- ▶ Follow a Broad General Education to feed into National courses (1 to 5)
- ▶ Most pupils will start a National 5 course and only move to National 4 if there is overwhelming evidence.
- ▶ Higher Computing Science
- ▶ Advanced Higher Computing Science
- ▶ NPA Computer Games Development
- ▶ NPA Cybersecurity



# What can pupils do at home?



- ▶ Read over their notes on a regular basis.
- ▶ Prepare for tests and homeworks (use timeline).
- ▶ Enhance practical skills.
- ▶ Investigate aspects of technology through their daily use of IT.

# Additional Information

- ▶ International Game Jam
- ▶ EGX Trip
- ▶ Cyberskills competition
- ▶ BAFTA YGD