



Year 7-9 Curriculum 2009/2010

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Head Master's Introduction

This booklet, which presents the Immanuel College curriculum for Years 7 to 9, shows the range and depth of the courses our pupils follow and is intended to give parents a fuller picture of the education their children receive.

Crucial to pupils' success at every stage in their studies is involvement in their learning. Without the sense that their classroom activities and homework assignments are enlarging their understanding of the world and adding to the fulfilment they can find in life, their experience as learners will be shallow.

Explaining Hillel's teaching in *Ethics of the Fathers* that a shy student cannot succeed academically, Rabbi Joseph Telushkin in his book, *Jewish Wisdom*, cites the text from *Shulchan Aruch, Yoreh De'ah 246:11* that "a student should not be embarrassed if a fellow student has understood something after the first or second time and he has not grasped it after several attempts. If he is embarrassed because of this it will turn out that he will come and go from the house of study without learning anything at all."

At Immanuel we try to create a culture in which pupils feel confident to ask for assistance when they find a concept difficult to grasp or a task hard to perform and know that when they take part in lessons their views and ideas are valued and listened to carefully. Please do encourage your child to seek help from his or her teachers and to take part in lessons by asking and answering questions and volunteering his or her views. In this way pupils gain the confidence that is essential to successful learning.

I doubt that I shall ever find a better description of success in teaching and learning than that given by George Eliot in 1855 when she writes in an essay on Thomas Carlyle, collected by John Gross in *The Oxford Book of Essays*, that "the highest aim in education is analogous to the highest aim in mathematics, namely to obtain not *results* but *powers*, not particular solutions, but the means by which endless solutions may be wrought."

This aim underlies our work with your children as we seek to lay the foundations of a lifetime of successful study in the course of their first three years at Immanuel College.

Philip Skelker

ART & DESIGN

HEAD OF DEPARTMENT
DEPUTY HEAD

Mrs Alison Ardeman
Miss Susan Ribeiro

Aims

Art and Design at Immanuel is taught to all pupils in their tutor groups from Year 7 to 9. The Art department offers students a range of opportunities to develop their knowledge and skills both within lessons and through homework assignments.

Pupils will develop their technical and conceptual skills through practical experience and by examining the works of past and present artists and designers such as Pablo Picasso, Andy Goldsworthy and Banksy. In this way pupils acquire an understanding of the context in which works of art are created.

Pupils will work on themed based exploration throughout these year groups. The choice of themes may vary yearly as projects evolve and are enriched by the inspiration of new and increasingly influential artists.

Organisation of Subject

In the course of their exploration of the themes studied, pupils learn how to work with different materials, equipment and techniques and to develop essential skills. They explore colour, tone, pattern, texture and form in a variety of ways and thereby strengthen their grasp of vocabulary and grammar of visual language. Pupils are able to identify their strengths and acquire the confidence and skills required to produce creative works independently. The skills gained within the lower school act as the foundation to allow pupils at GCSE and A Level to become independent creative learners who can tackle theme based projects.

Learning Outcomes

Pupils learn how to organise and present information in different ways through submission of homework and by presenting works within their logbook. They gain an understanding of the importance of written and visual analyses of their own and artists' works, expressing opinions and making reasoned judgments. Pupils also gain experience of different forms of visual enquiry.

Throughout the year drawing is a fundamental way of recording and documenting, as it promotes visual enquiry through analysis and direct response. During the lower school course, as all themed based projects start as an observational drawing, pupils refine their ability to draw from first-hand observation. They learn to use art materials, tools, techniques for practical work safely and how to evaluate their own work and the works of other artists.

Year 7

Pupils refine their ability to enlarge to scale, gaining an understanding of proportions and the need to maintain accuracy. They develop their techniques and refinement of B pencils/fine liners to create tone and explore the application of tone to create a series of textures.

Pupils learn to become resourceful when selecting interesting collage materials, extending their knowledge of the visual and tactile qualities of collage and how these can be manipulated and matched to ideas.

Year 8

Pupils learn to record and analyse first-hand observations of features, acquiring an understanding of how the structural elements of abstract portraits fit together to form compositions. They learn to select from these experiences and to use their imagination to explore the ideas of artist's abstract portraits, developing the ability to record these observations and ideas when producing their own abstract self-portrait.

Linear variation is investigated and explored through the use of black fine liners and Berol pens, developing further their understanding of contrasting shapes and patterns to represent a chosen emotion, when producing their abstract self-portrait.

Pupils develop their skills in the handling of watercolour pencils when applying colour to their abstract self-portraits and gain an understanding of colour mixing through the use of colour blending. They refine their selection of appropriate colours that relate to their chosen emotion, referring to colour theory knowledge gained throughout the year using the colour wheel.

Year 9

Pupils explore the difference between two and three dimensional shapes through the use of perspective and develop skills in creating works with a sense of depth through the use of vanishing points. This enhances their ability to draw still life from observation, developing their techniques and refinement of B pencils when producing a detailed line drawing.

Pupils identify the characteristic features of branding and recognise the contribution manufacturers make when producing logos and brand names. They refine their ability to recreate brand names through the use of highlights and drop shadows.

Pupils learn to evaluate their own and other's work when selecting a viewfinder section from their drawings, developing their selection skills and creating interesting compositions. They also refine their ability to enlarge to scale, gaining an understanding of proportions to maintain accuracy.

Pupils gain an understanding of the construction and use of stencils and the function of positive and negative space. They also develop and improve their technique when working with scalpels.

Teaching Methodology

The Art department facilitates the development of pupils' understanding using all available senses and experiences. Materials such as visuals boards, laminated works and examples of previous students' and artists' work allow pupils to identify how they might change their current works or develop their future works.

Visual, tactile stimuli or the physical object itself, supported by descriptive Art specialist vocabulary, allow pupils to make connections where they may lack a specific first-hand experience or knowledge of a stimulus.

A guest speaker, Anthony Slinn, puts themes into context through lectures that are animated and visually rich. In Year 7 Mr Slinn becomes Van Gogh himself as his talk on Van Gogh's life unfolds and in Year 8 he talks about Pablo Picasso's *Guernica*.

The logbooks pupils keep from Year 7 onwards until the end of Year 9 form a record of each pupil's creative development over their first three years at Immanuel College. These books become works of Art in their own right, reflecting lovingly crafted pieces of homework.

Displays around the school are used to acknowledge pupils' attainment within projects and homework. These works can be seen by their peers and visitors to Immanuel, enabling pupils to develop a sense of pride that their hard work and high attainment are acknowledged.

Assessment

Assessment within the classroom occurs through questions and answers relating to lesson objectives and group demonstrations. Throughout the lesson teachers will have one-to-one discussions to enhance the development of individual skills. Through group discussion or class critiques, pupils assess their own work and that of their peers. Teachers observe each individual's contribution, thereby assessing each pupil's understanding.

Homework may vary from weekly to fortnightly pieces. It is set to enrich learning and to reinforce or extend works that are completed during class and to enable pupils to develop the skills involved in independent study. It is assessed through written commentary, target setting and grade.

There are also end of unit tests such as in Year 8, a Colour Theory test. There is also an end-of-year practical Art examination, split across two Art lessons. Tests and examinations are assessed and moderated by the whole department, overseen by the Head and the Deputy Head of department.

DESIGN & TECHNOLOGY

HEAD OF DEPARTMENT

Mr Roger Hazell

Aims

Years 7-9 provide an opportunity to experience a range of practical processes through individual design and manufacturing projects.

Organisation of Subject

The subject is taught in tutor groups throughout Years 7-9 with one lesson timetabled every fortnight.

Learning Outcomes

Pupils are introduced to a wide range of processes, materials and equipment over the three years. Pupils are encouraged to be creative in their design work and to have a regard to quality in realising products. Safety training is ensured throughout the curriculum, so pupils can be confident and assured when working with metals, wood and plastic.

Teaching Methodology

Teaching is facilitated by progressively introducing more demanding projects and processes. Projects allow scope for individual design and realisation.

Current projects are:

Year 7: Clock (wood/vacuum formed plastics)
 Fuse tester (plastic and soldering)

Year 7 pupils design a themed clock face and then transfer this paper design on to wood using hand tools (saws, chisels and files). The resulting wooden former is then used in the vacuum forming machine to produce a clock face in styrene plastic, to which a mechanism and hands are handed.

The fuse tester is manufactured from flat Perspex acrylic, which is drilled, heat bent to shape and has electronic components soldered to produce a fuse/continuity tester.

Year 8: Mechanisms (card)
Barking dog (wooden cams/followers)

The pupils design a mechanism, typically a cardboard figure with moving limbs, which they assemble after cutting each design to shape. The arms and legs are linkages, connected by butterfly clips in punched holes.

The barking dog project is a marking out and realisation project, using manufactured board and softwood, to produce a toy that works on the cam and follower principle.

Year 9: Steady hand game (metals/soldering)

Pupils cut external threads on wire, and bend it to the shape of a hand on a production jig. A vacuum-formed cover is produced and electronic components are soldered to make a buzzing game.

Assessment

All projects are graded on completion.
All year groups have an end-of-year written examination.

DRAMA & THEATRE STUDIES

HEAD OF DEPARTMENT

Mrs Joanna Fleet

Aims

Pupils are taught a range of performance and technical skills and the correct terminology associated with each. They use drama as a vehicle of expression to explore a variety of situations. They are also introduced to a range of genres and playwrights. The skills acquired directly underpin the syllabus studied at GCSE. Drama lessons provide a secure foundation for a plethora of life skills. We aim to increase confidence and promote self-esteem through performance work as well as challenge pupils to work as part of an ensemble, exploring their leading and listening skills. We also include lessons in other theatrical disciplines such as lighting, sound and stage make-up.

Organisation of Subject

Drama is taught in tutor groups. They follow an identical curriculum and have one lesson per cycle.

Learning outcomes

Year 7

Pupils complete exercises to establish ground rules and expectations, and cover the basic skills necessary for drama to take place. They are given opportunities for diagnostic work and assessment and complete a unit of work that focuses on settling into a new environment. They explore this topic whilst learning various acting techniques to communicate meaning and circumstance. They use stimuli that include still pictures and text. They aim to perform a small group piece which includes a monologue and freeze-frame.

They are then introduced to different performance techniques and skills, all of which contribute to the pupil's understanding of how atmosphere on stage is created. They experience how to communicate, without dialogue, using gibberish and story-telling as a basis for drama. They also learn how to create sound-scapes. The final lesson brings all these elements together, introducing picture stimuli to pupils.

Pupils move on to a unit entitled 'Evacuation' which brings the class together on a whole group project. They create still pictures and are introduced to the technical aspects of theatre by lighting each other's work.

Year 8

Pupils use their knowledge of performance work to carry out a mixture of solo, pair, small and whole group work, moving from spontaneous improvisation exercises to analysis of duologues from plays. They explore the concept of status fully and are given opportunities to show their understanding of it by completing a range of tasks involving both improvisation and scripted work. They develop their improvisation skills and consolidate understanding of how movement, space, facial expression, gesture, body language and posture convey meaning. They use imagination and empathy to create stereotypical characters and briefly look at the use of the 'stock character' throughout the history of drama. They also study various stage configurations and the advantages or disadvantages of each. They move on to look at staging a carefully chosen selection of atmospheric 'beginnings' and suspenseful 'endings' of well known plays.

Year 9

Pupils start the year using acquired skills to rehearse and perform a duologue. They work on setting up and using a rehearsal space, annotating a script, performing to an audience and assessing their peers. They progress towards a team project which requires them to read, understand and revise a scene from Shakespeare. They participate in a series of workshops on the technical skills involved in theatre and choose how to present their final piece which may include lighting, sound, make-up, costume and set design.

They are assessed on their final presentation which must be based on the Shakespearian scene, but may be presented in any chosen format.

Teaching Methodology

The Department incorporate a variety of teaching methods which include: demonstration; teacher in role; literacy fast reaction games; numeracy warm up exercises; voice exercises; group work; solo work; pair work; lighting and sound workshops and, occasionally, social and historical research using the wireless network in the theatre. The Joyce King Theatre has readily accessible resources to enable pupils to create sound tracks and run the lighting box. We aim to lead very much by teacher example, especially with regard to role play and scripted character work.

Assessment

Pupils are encouraged from the start to embrace a culture of self and peer assessment. They have are given a list of assessment criteria, written as a simpler version of GSCE performance targets, and are invited to analyse and appraise each other's work in most lessons. They are formally assessed and graded in bands at the end of each unit, approximately once per term. They have no homework in Years 7 and 8 but are expected to learn lines for performances in Year 9.

HEAD OF DEPARTMENT

Mr Gordon Spitz

Aims

Pupils in Key Stage Three are introduced to literary analysis by reading and studying novels, plays and poems. Analysis includes an understanding of the writer's craft by focusing on how language, imagery, structure and form shape meaning. Creative writing is encouraged and there is a particular focus on descriptive and persuasive writing tasks. Oral participation is encouraged through specific Speaking and Listening activities in which pupils present and respond to ideas in a variety of contexts. To promote this aim the English Department runs a public speaking and debating club enabling pupils to participate in competitions on a regional level.

The study of Shakespeare forms an important part of the Key Stage Three curriculum.

Organisation of subject

Year 7, 8 and 9 pupils are taught in form groups and as such are mixed ability sets. Focused assessment ensures all pupils are sufficiently supported and challenged.

Learning outcomes include:

- Producing structured arguments using the 'point, evidence, analysis' method.
- Understanding of theme, character, setting, form and structure of texts.
- Using correct sentence structure, paragraphing and punctuation.
- Showing awareness of contexts in which texts are written and received.
- Producing well-written pieces of creative writing.
- Developing confidence when speaking to a group or class.

Year 7:

Pupils are introduced to a selection of Shakespeare's texts with a focus on thematic concerns, characterisation and setting. Pupils are taught textual analysis and are expected to support their ideas with quotations from the text. The language component of the unit ensures that pupils understand basic grammar and poetic techniques.

Reading: A novel is studied and class work is designed to develop active, critical readers who search for meaning in texts. Pupils should be able to trace the development of themes and characters, and understand the significance of setting.

Poetry: Pupils read and analyse poems and experiment with using the techniques learnt in their own writing.

Year 8

Shakespeare: Pupils focus on Shakespeare's Language, Elizabethan England, thematic concerns, characterisation and setting. Pupils are taught to engage in textual analysis and are expected to support their ideas with quotations from the play.

Reading: Pupils study a novel and are taught to comment in detail on the writer's presentation of themes and characters. We encourage pupils to become active and critical readers. Comprehension tasks are an important component of reading in Year 8.

Year 9

Reading: Pupils study a novel and are taught how to write essays demonstrating the ability to structure a clear argument which traces the development of themes and characters in a text. Pupils will have to analyse how the writer's choice of language and techniques shapes readers' responses. At Year 9 level pupils are expected to explore the significance of the context in which the text was written.

Media: Pupils are exposed to a variety of print media. They examine persuasive language and presentational devices used by writers including the ability to distinguish between 'facts' and 'opinions' in newspaper articles and advertisements.

Teaching Methodology:

Lessons are carefully planned to provide a varied, stimulating and challenging array of activities which improve speaking, reading and writing skills. Regular library visits in Year 7 form an important part of the English curriculum. Theatre trips and visits by authors and poets also enhance the teaching of English.

Assessment

Assessment takes place in the form of detailed responses to work produced. Clear targets are suggested for pupils to improve and develop their work. Pupils are expected to re-draft work where appropriate. Peer assessment and self-assessment tasks are used where appropriate, particularly during the development stages of a piece of work. Formal testing takes place at the end of the academic year.

GEOGRAPHY

HEAD OF DEPARTMENT

Mr Paul de Naeyer

Aims

We aim to provide pupils in Years 7, 8 and 9 with a broad geographical knowledge that includes knowledge of their local area and the wider world about them. They gain an understanding of the inter-relationships that influence the world and have an appreciation and understanding of different landscapes. The desire to educate pupils about issues relating to sustainable development plays a major role in formulation of the geography curriculum and ensures that pupils explore the cultural, moral and spiritual aspects of this topic.

Field work plays a central role in inspiring the pupils and in developing their understanding and appreciation of the variety of landscapes.

Organisation of Subject

Year 7 and 8 Geography:

Pupils are taught in mixed ability tutor groups. There are two periods of Geography across the fortnightly timetable. Homework is set twice in the fortnightly cycle; where possible on a weekly basis.

Year 9 Geography:

Pupils continue to be taught in tutor groups. There are now three periods of Geography across the fortnightly timetable cycle. Homework is set once per week.

Learning Outcomes

Across the lower school curriculum, the purpose of Geography is to ensure that pupils develop an understanding of how the world around them works and of how we impact on the world. The course introduces them to different cultures and social perspectives.

Each year group will study one continent, focussing on a single country, enabling them to gain an insight into the demographic, economic and social aspects of a different society. Year 7 pupils examine South America and Brazil, Year 8 pupils investigate Africa and Kenya and Year 9 pupils study Asia and China.

In the first term pupils learn to read maps proficiently by gathering information from a variety of maps, and producing their own maps. This is an important introduction to Geography, as these skills are central to their geographical studies and daily lives. After pupils have grasped the core map skills the course enables them to develop a range of writing techniques, including investigative, narrative and descriptive writing. The course teaches pupils to evaluate ideas and to develop an understanding of the relationship between theory and real life.

Teaching Methodology

Within the department we incorporate a wide variety of teaching methods, and within each lesson a range of activities will be used to enhance pupils' learning.

Extensive use is made of Interactive Whiteboards, PowerPoint presentations, videos and animations and visits are made to a plethora of websites.

All lessons include differentiated work, either by outcome or by task, and are designed to allow each student to be actively engaged in learning.

Each year group undertakes investigative work and goes on a fieldtrip. Year 7 examines a local settlement, in conjunction with the Modern languages department Year 8 visits Paris for 4 days and Year 9 studies a local river. In this way the subject is brought to life and pupils develop their fieldwork skills and their ability to relate class work to real places.

Assessment

Formal Assessment:

Each year group is assessed at the end of each year by a formal examination that tests the pupils' knowledge and understanding and follows a similar style to the external examinations at GCSE and GCE.

As part of the formal assessment, pupils produce a piece of course work that examines their ability to investigate an idea and analyse and evaluate the data collected.

Informal Assessment:

A. Classwork

Informal assessment is ongoing during all lessons in response to oral work, team work, practical experiments, skill development, and project work.

B. Homework

Homework is set each week with several days between setting and collection for practice, research or clarification of issues.

Homework and **classwork** is marked using a common framework; explanatory comments and suggestions for improvement are entered into pupils' books. Grades are usually awarded and within any particular strand of learning, pupils are given a clear understanding as to what is required to achieve each grade.

HISTORY

HEAD OF DEPARTMENT

Mrs Sharron Shackell

Aims

The aim of the History Department is to stimulate interest and enthusiasm about History and to promote the acquisition of knowledge and understanding of human actions in the past. All topics are taught through rigorous historical enquiries which engage the pupils and encourage them to think and work independently and critically. The Key Stage Three Curriculum also aims to ensure that pupils' knowledge is rooted in an understanding of the nature and use of historical evidence and that they appreciate second-order historical concepts such as historical interpretations, change and continuity, causes and consequences, similarities and differences. By the end of the Key Stage, pupils have gained the essential second-order skills needed for further study at GCSE. The department houses a small, but growing library from which pupils may borrow books of historical significance or enjoy an historical novel.

Organisation of Subject

History is taught in mixed-ability tutor groups. There are plenty of opportunities for cross-curricular links, for example with Religious Studies, French, Biology, Art, and Geography and of course, English

Learning Outcomes

Learning Outcome	By the end of Year 7, all pupils will be able to:	By the end of Year 8, all pupils will be able to:	By the end of year 9, all pupils will be able to:
Knowledge and Understanding	Demonstrate factual historical knowledge and describe the key features of past societies and periods.	Demonstrate an in-depth historical knowledge with some appreciation of its wider historical context and explain key features of past societies and periods.	Demonstrate detailed answers, which are set in a wider historical context and make links to previous topics studied.
Cause and consequence	Categorise causes/consequences into simple headings and develop a simple multi-causal argument.	Develop more sophisticated methods of categorising causes and make links between different causes.	Develop a fully substantiated, multi-causal response, which makes links between factors and argues, convincingly, the relative importance of a factor.

Change and continuity	Identify different patterns of change and begin to use historical language to describe change.	Explain the nature and extent of change, begin to use accurate historical language to explain the change and identify why these changes occurred.	Judge the nature and extent of change, using historical language to describe change and explain why change has occurred and place it in a wider historical context.
Interpretation	Appreciate that people have different interpretations about past events and individuals and give reasons for this.	Analyse why different historical interpretations are held.	Analyse how and why different interpretations are held.
Source Evaluation	Evaluate sources of information and select information for its usefulness. Select sources to support a point.	Evaluate sources of information and use them critically to support conclusions.	Use a range of sources of information critically, to reach and support detailed conclusions. Use sources of information critically, assessing them in relative terms for usefulness and reliability.

Teaching Methodology

The History Department strives to teach in a varied way in order to cater for all learning styles. Role plays are used to engage the more kinaesthetic learner, for example a whole-class role play is undertaken at the start of “Why did William win the Battle of Hastings?” enquiry. The department increasingly uses ICT in the classroom and pupils are encouraged to display their oral ability through Power Point Presentations and class discussions.

The department promotes independent learning from the outset. Pupils are taught how to write well-structured, coherent essays in Year 7 by active modelling, writing-frames and sentence starters. Writing aids are slowly removed as pupils become more confident in writing analytically. By the end of the Key Stage, pupils are writing complex historical arguments using relevant evidence to support their claims.

In Year 8, pupils undertake a whole-term study of the changes brought by the English Reformation by investigating Professor Eamon Duffy’s research of a small farming village called Morebath, in Devon. Pupils have the challenging task of understanding the overview of the ‘big’ religious changes that occurred throughout the period and writing an historical fiction based on Duffy’s research. The best three in the year group are entered into a national competition.

Assessment

Assessment takes place at the end of each enquiry (usually around 3–5 lessons) after pupils have undertaken a concluding task, which can be anything from an essay to a debate. Peer and self-assessment are used to promote self-reflection on learners’ progress at various points throughout the Key Stage.

INFORMATION & COMMUNICATION TECHNOLOGY

HEAD OF DEPARTMENT

Mr Mario Brzezinski

Aims

During this Key Stage, pupils develop techniques in a range of applications:

- Word processing
- Desktop publishing
- Spreadsheet processing and modelling
- Database modelling
- Presentation software
- Control

The techniques acquired across the key stage are designed to equip pupils with the ICT foundation in functional skills that will enable them selectively to apply methods that support their work in all subject areas.

These techniques underpin more advanced studies at Key Stage 4.

Organisation of Subject

Pupils are taught in mixed ability tutor groups:

Yr 7: 1 lesson per week

Yr 8: 1 lesson per fortnight

Yr 9: 1 lesson per week

Learning Outcomes

Yr 7:

Pupils are given a broad introduction into the use of ICT in general and to the Academic Network in particular. Pupils learn the basics of network navigation, creating and using folders, basic IT etiquette, hardware devices and software applications. Touch-typing using a package called 'KAZ' is introduced. Pupils then move on to cover formal word processing techniques that enable them to apply their typing skills.

Pupils investigate spreadsheet modelling using a series of integrated assignments. In particular, they learn how to set up basic templates that enable them to model different input values and to consider the differing output results. Pupils learn to use simple formulae that calculate row and column totals and then how to use the chart wizard to create charts based on their data. Pupils also learn to use desk-top publishing (DTP) software to manipulate and present information, to apply cropping and editing techniques to images and to use a variety of different templates to produce documents such as promotional leaflets and restaurant menus.

Year 8

Pupils focus on reinforcing those functional skills acquired during Year 7. Their knowledge of word processing skills is extended to cover mail-merging using both database software and desk top publishing software. Pupils learn the fundamental concepts of control programming using the 'Flowol' application.

Pupils also develop their skills in the use of presentation software, specifically PowerPoint; they prepare a storyboard from an assigned task incorporating the full range of PowerPoint techniques acquired and present their work to their peers.

Year 9

Pupils extend their knowledge of database construction. They learn about the three basic file update techniques: insertion, deletion and edit, the need for a unique key field when designing record structures and how to design simple and complex queries. Use of the report generator and forms is also covered.

Pupils learn how computers can be used to monitor and control events using hardware devices linked to software. They learn to appreciate that computers can be used to record physical information over a period of time (data logging) and learn also to write program instructions using two applications: 'Visual Control' and 'LOGO'. Within data logging, pupils learn about types of sensors and where they can be used.

Pupils are encouraged to extend and to enhance their individual presentation skills by developing and presenting podcasts based upon news reviews and advertisements. Pupils learn these techniques using the 'Audacity' application.

Teaching Methodology

Techniques are demonstrated and then pupils are given assignments to complete. In many cases, pupils are given individual extension work; for example, once the basic commands of LOGO have been acquired, pupils relish the opportunity for experimentation.

The assignments set are not limiting; they give pupils the opportunity to demonstrate their understanding of a range of techniques and applications, with some pupils excelling in their application of formatting and other techniques.

Assessment

After each assignment, pupils complete a self-evaluation form. This form covers the techniques learnt and invites the pupil to consider any improvements in the outcome that could have been applied to the work produced. The form submitted by each pupil forms the basis of a teacher-pupil dialogue which is used to govern future direction.

All assignments are graded and end-of-topic tests are used to review and support individual progress.

HEAD OF DEPARTMENT

Mrs Mazal Nisner

Aims

The aim of the Ivrit Curriculum is three fold: to prepare pupils to sit the GCSE examination, to provide them with an understanding of what is currently happening in Israel and to ensure that they are able to gain maximum advantage from the Israel trip that takes place at the end of Year 9.

Organisation of Subject

From Year 7 to 9 the pupils are taught in sets according to their ability. They follow an identical curriculum and depth of knowledge increases as pupils progress through the years. Movement between sets may take place at various points in the year following end-of-unit tests.

The units taught in these years are repeated again in the GCSE syllabus except for Year 7 Set 2 which studies Ivrit as a new subject, (starting with the learning of letters and Hebrew reading before continuing with the curriculum), and Year 9 Set 1 which sits the GCSE exams a year earlier.

Teaching Methodology

A variety of teaching methods is used. Effective use is made of Israeli newspapers, tapes and television programmes as well as the internet. Text books appropriate to the level of ability of the pupils are provided. The Ivrit department plans to make use of the language laboratory to enhance teaching and learning.

Learning Outcomes

	Year 7	Year 8	Year 9
Term 1	Unit 1: About Myself and The Family; Unit 2: The House and the Neighbourhood:	Unit 1: Personal description Unit 2: Hobbies	Unit 1: Professions, What do you want to be? Unit 2: Local environment, Shops

			and Money
Term 2	Unit 3: School; Unit 4: Food:	Unit 3: Daily Routine: Unit 4: Shopping (clothes and fashion):	Unit 3: Menus and Meals Unit 4: Health
Term 3	Unit 5: Holidays; Unit 6: The Weather:	Unit 5: Different types of Holidays in different Countries; Unit 6: Special Occasions, Bar and bat mitzvah;	Unit 5: The Modern World and Technology Unit 6: Israel (Preparation before going on Israel Tour):

Assessment

Pupils are assessed throughout the course and by examination at the end of each year on their listening, reading comprehension, writing and speaking skills.

JEWISH STUDIES

HEAD OF DEPARTMENT

Rabbi David Riffkin

Aims

Our overall aim in the 7-9 curriculum is to familiarise our pupils with the primary texts pertaining to Judaism, and also to attempt to impart to our pupils knowledge and love of the many facets of our religion.

We introduce those who come from a limited background in Jewish Studies to the world of Judaism, using a vibrant curriculum as our medium. Simultaneously, we aim to enhance the skills of those who already have a comprehensive primary school Judaic background by furthering their knowledge and interest in Judaism and increasing their ability to familiarise themselves with Judaic texts.

All pupils study Jewish Studies in Years 7-9. In Years 10 and 11 pupils choose between GCSE courses in Religious Studies (RS) and the Biblical Hebrew.

Organisation of Subject

Years 7 & 8

Pupils have 9 periods of JS per cycle. This is divided into 5 periods of Torah shebe-al peh (TP) and 4 periods of Torah shebichtav (TC).

Year 9

Pupils have 8 periods of JS per cycle. This is divided into 4 periods of Torah shebe-al peh (TP) and 4 periods of Torah shebichtav (TC).

All pupils are taught in ability sets; movement between sets is possible at any time, depending on the recommendation of the class teacher in consultation with the Head of Department.

Learning Outcomes

Year 7

In TC, we concentrate on building pupils' Hebrew reading skills and their ability to navigate the Chumash. We expect them to gain an understanding of Sefer Bereishit and an overview of Tenach. The higher sets learn Sefer Bamidbar with commentaries.

In TP, through the medium of the Jewish Curriculum Partnership and the Jewish Living Materials, a set of resources developed at Immanuel College, we expect pupils to learn about Tefillah, Kashrut and Chaggim. The higher sets follow the Mipasul el hapesak curriculum which introduces the pupils to topics in Judaism, whose development is followed by study of texts from the Torah sources through to contemporary texts stating current practice in Jewish Law. The topics we teach are:

- The Rosh Hashana Machzor
- Relationship with Parents
- Kashrut
- The Bet Knesset
- Tefillah

Year 8

In TP, the higher ability pupils continue with the Mipasul el hapesak programme and study different and more age-appropriate topics.

- The Yom Kippur machzor
- Tzeddakah
- Business ethics
- Returning lost objects
- Rosh Chodesh
- Pesach: the Haggadah and Pesach in the Torah
- Looking after property

In TC, the higher sets study Sefer Devarim

In TP, the lower ability pupils are taught the following topics using a modified form of the Mipasul el hapesak programme:

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- Shabbat
- Jewish Lifecycle- Bar/Bat Mitzvah
- Tzeddakah
- Returning lost objects
- Rosh Chodesh

In TC, these pupils study Sefer Shemot.

Year 9

In TP, the higher ability pupils are taught the following age-appropriate topics, based on the Mipasul el hapesak programme:

- Sukkot, Chol Hamoed, Shemini Atseeret and Simchat Torah
- Chessed
- Melachot of Shabbat
- Purim and its Mitzvot
- Ecology
- Relationship to animals
- The Mitzvot that are directly connected to Land of Israel
- Shavuot and its Mitzvot

In TC, these pupils are taught an overview of Tenach through detailed study of the following nine topics:

- Joseph and his brothers
- The Israelites and their confrontation with authority
- Joshua and Jericho
- Gideon and his war with Midian
- Saul, David and Jonathan
- Isaiah and his use of language
- The Book of Yonah
- The Book of Psalms
- The Book of Ruth

In TP, the lower ability pupils are taught the Ten Commandments in detail using material devised by the Taryag Legacy Foundation. In this way the pupils learn the practical and relevant lessons that can be derived from them. In TC, pupils are taught selected passages from Bamidbar, with an emphasis on the following topics:

- The laws of Lashon Harah
- The Power of Prayer
- The Spies
- The Importance of The Land of Israel
- The Leadership of Moshe

Whilst we are committed to teaching the courses described above, we maintain a degree of flexibility and on occasion we may choose to teach a different topic if in our view a group of pupils' specific needs are better met by such a change.

Teaching Methodology

A variety of activities take place in JS lessons, ranging from the traditional to the more creative and innovative.

We use a range of educational tools, such as acting and role play, pupil presentations in front of peers, for example, when a Dvar Torah is researched and shared, the invention of games that adhere to the Shabbat rules and model building to reinforce the laws relating to Sukkoth. DVDs, for example, programmes relating to the lives of Rashi and Rambam, complement teaching. ICT is also used; for example, in a task in which pupils design the ideal kosher kitchen using computer graphics.

Years 7-8 participate in a Shabbaton, which reinforces in an informal way, much of their formal curriculum

In Year 9, pupils spend three to four weeks in Israel, on a school trip. In the course of this unique trip, much of the formal learning that takes place in the TP classroom is put into practice and many of the settings of texts studied in TC are visited.

Assessment

Pupils in Years 7-9 are regularly assessed through evaluation of their progress in lessons. Teachers offer feedback and guidance when appropriate and break-time tutorials are given when needed. Homework is set once a week per subject and is assessed orally and by written

feedback. In addition to the end-of-year examinations in both TC and TP, regular short tests are used to assess pupils' progress

MATHEMATICS

HEAD OF DEPARTMENT

Miss Donna Bartlett

Aims

During KS3, Years 7–9 pupils build on the learning skills that provide the foundation needed for further study in KS4 and KS5. We plan for learning rather than teaching and foster the development of skills that are transferable to all classrooms and include the active involvement of pupils as learners. Teaching methodology includes problem solving and work based learning in order to develop, not only the mathematical skills needed for further study, but also the learning power, tools and techniques required to maximise achievement and understanding in many other areas.

Organisation of Subject

From Years 7-9, pupils are grouped and set according to ability. Year 7 pupils are initially set from the entrance examination results; these sets are re-assessed at the end of the first term when some re-setting may take place.

Regular assessment and some re-setting takes place throughout the year in Years 7-9

Learning Outcomes

All pupils follow a core scheme of work with extension and support material attached according to the level of work required for the set group. Pupils are led through the four main areas of Mathematics: Algebra, Shape and Space, Data Handling and Number. Topics are introduced, reviewed and extended throughout the 3 years. The ethos of the department is to develop not only the mathematical skills needed for specific topics studied, but also to enhance and strengthen skills that are transferable across the curriculum. Within the teaching guidelines, we try to build upon learning based around the four R's, Resilience, Resourcefulness, Reciprocity and Reflectiveness, working on skills that include collaboration, listening, perseverance and meta-linking.

Teaching Methodology

The Mathematics department has a wide range of teaching styles, good access to ICT resources and varied and enthusiastic teaching staff. The introduction of interactive whiteboard equipment has created the opportunity to develop exciting new resources that enable Mathematics lessons to have a more visual and practical impact. Within each set, teachers recognize pupils are still of differing abilities and learn in different ways; therefore, lessons are differentiated and designed to cater for all three learning styles, audio, visual and kinaesthetic.

Assessment

Classwork and homework are regularly marked with both grades and comments, and individual targets are set and recorded with a review at later stages. Pupils are assessed at the end of each unit and any movement between sets is based both on the test results as well as teacher assessment. Pupils also regularly self evaluate their own work. The department recognizes the importance of both self and peer assessment, as this allows pupils to reflect on their own learning, develop an understanding of the level at which they are working and what they need to do in order to progress further.

MODERN FOREIGN LANGUAGES

HEAD OF DEPARTMENT

Mr Paul Abrahams

Aims

The nature of the GCSE courses in Modern Foreign Languages means that the GCSE syllabus effectively starts as soon as pupils begin to study a language. At Immanuel College, this is Year 7 for French and Year 9 for Spanish. Therefore, all vocabulary topic areas and grammar studied during Years 7-9 feed directly into the GCSE course and can and will be tested in the GCSE examination at the end of Year 11.

It is now a legal requirement that all primary school children learn a foreign language in Key Stage 2, so some of our Year 7s may have learnt some French prior to starting at Immanuel College. Where this is the case, we find that they benefit from the revision and consolidation of topics that they have already learnt and that very soon we are covering language that is new to them. Pupils who may have learnt a different language in primary school are at no disadvantage as French is taught *ab initio* to all pupils.

All pupils begin Spanish in Year 9. As Spanish, along with French, is one of the option subjects that Immanuel College pupils may chose to study to GCSE, this allows them to make a more informed decision about whether to study Spanish.

Organisation of Subject

Year 7 French: pupils are taught in tutor groups, which by nature are mixed-ability. There are 5 periods of French across the 48-period, fortnightly timetable cycle.

Year 8 French: pupils are taught in ability sets. This allows us to tailor our teaching more closely to the needs of pupils of differing abilities. There are 5 periods of French across the 48-period, fortnightly timetable cycle.

Year 9 French: pupils continue to be taught in ability sets. There are 2 periods of French across the 48-period, fortnightly timetable cycle.

In both Years 8 and 9 French, movement between sets is possible at any time, depending on the recommendations of the class teacher.

Year 9 Spanish: pupils are taught in tutor groups. There are 2 periods of Spanish across the 48-period, fortnightly timetable cycle.

Learning Outcomes

Languages are living, evolving entities and there is an authentic, real-world purpose to learning them. In all year groups, for both French and Spanish, the emphasis is on developing pupils' ability to comprehend and manipulate the language that they are studying. The four skill areas of listening, reading, writing and speaking are given equal importance, not only as these are tested at GCSE but also because they are the pillars upon which successful communication rests.

The Years 7-9 French course, along with the Year 9 Spanish course in abbreviated form, are designed to give the pupils the chance to learn how to speak about themselves, communicate key information about themselves and be able to use authentic language in societies and countries that speak French and Spanish. In this way, our hope is that even pupils who do not continue to study the language to GCSE level will still have had a meaningful experience and be able to apply in a real-life setting what they have learnt.

Teaching Methodology

A variety of activities takes place in each lesson, from the traditional to the more innovative, such as language games and on-line interactive exercises.

We use the Target Language as much as possible as our medium of communication with pupils, but such use is pragmatic and never at the expense of pupils' ability to understand what is happening in a lesson and being asked of them.

ICT is used extensively in lessons. PowerPoint presentations are a powerful way of putting across new language, as are language websites offering fun, engaging and interactive activities.

Each group in Years 7-9 is timetabled for one lesson per fortnightly cycle in our audio-visual language suite, allowing pupils to undertake listening activities individually through headphones and to develop oral skills by recording and playing back their own spoken work through microphones attached to the headphones.

All lessons include differentiated work to take into account the ability and learning profiles of individual pupils, so that all are actively engaged in lessons.

In Year 8, pupils are given the opportunity to take part in a 3-day visit to Paris, the purpose of which is to add a cultural dimension to the course and to allow pupils to use the French that they have acquired in an authentic setting.

Assessment

Pupils in Years 7-9 are assessed informally throughout lessons, receiving help and feedback from their teacher whenever possible and appropriate.

Homework is set once a week (except in Year 9 Spanish where it is set once per fortnightly cycle). Each homework requires pupils to learn a set of vocabulary or a grammatical device. Formal assessment takes place in the next lesson after the homework has been set in the form

of a test. Teachers monitor carefully the performance of pupils, as does the Head of Department, and offer individual help and advice where necessary.

Pupils undertake a task requiring them to complete a piece of extended writing once a fortnight in lessons and teachers take this in to mark and give appropriate feedback and comments designed to allow pupils to see what they have done well and how they could improve their work in the future.

In addition, in Years 7 and 8 French end-of-unit tests are taken approximately once every half term.

HEAD OF DEPARTMENT

Mr Nicholas Garman

Aims

The programmes of study in Music in Years 7-9 seek to develop pupils' musical understanding, knowledge and experience through a variety of practical, compositional and analytical tasks. The work pupils undertake enables them to develop a perceptive, sensitive and critical response to the main historical periods and styles of Western 'classical' and 'popular' music. It further gives them opportunities to understand and recognise the music of various non-Western traditions, and thus to form an appreciation of cultural similarities and differences. Through these activities, pupils gain a foundation for the development of an informed appreciation of music and acquire a secure basis for the further study of music at IGCSE level in Years 10 and 11.

Organisation of Subject

Music is taught in form groups from Year 7 to 9 inclusive. All form groups within the same year group follow the same schemes of work.

Learning Outcomes

Year 7:

By the end of Year 7, pupils will have learnt how to:

Practical – perform a well-known melody (with accompaniment or other resources, depending on the pupil's existing musical skills and aptitude), demonstrating knowledge of standard, western musical notation; pupils also have opportunities to sing as an ensemble;

Compositional – describe how musical textures, instruments and devices can be used to depict a variety of characters, moods, landscapes and objects;

Analytical – through independent research, develop a project on the instruments of the orchestra.

Year 8:

By the end of Year 8, pupils will have learnt how to:

Practical – perform a well-known melody (more demanding than that of Year 7), making appropriate use of the technology available on the electronic keyboard synthesisers, whilst also developing their reading of musical notation.

Compositional – use different musical textures, instruments and devices to depict a variety of characters, moods, landscapes and objects in a composition;

Analytical – through independent research, develop a project on the ancient, medieval, renaissance baroque, classical, romantic or modern eras of music history, providing a detailed bibliography.

Year 9

By the end of Year 9, pupils will have learnt how to:

Practical – perform a well-known melody and accompaniment, using both left and right hands, demonstrating the resources of the keyboard, making good use of the technology learnt in Year 8.

Compositional – work with others to create a Blues improvisation and composition

Analytical – through independent research, develop a project on Jewish music.

Teaching Methodology

Pupils undertake a variety of tasks and activities in order to develop their musical skills and knowledge and through these have the opportunity of utilising and developing a range of learning styles. Pupils improve their aural skills not only by regularly undertaking listening exercises, but also through group-singing activities (which also help to develop their pitch discrimination). Pupils' analytical skills are nurtured by the scrutiny and emulation of the strategies and devices used by the great composers of the past. Pupils have many opportunities not only to perform individually but also to collaborate, for instance through ensemble work, group improvisation and group composition. They engage with live music videos and develop ICT skills through the use of compositional software and electronic resources such as keyboards. There are many opportunities for pupils to develop their aptitude for independent learning, for instance through a variety of written and composition projects.

Many trips are organised for pupils throughout the year, for example, to concerts, operas and musicals. Pupils also have the opportunity of taking part in compositional workshops through visits to such venues as the Handel House Museum and the Gamelan Project at The Barbican.

Assessment

Peer and self-assessment are used in addition to teacher assessment of homework and class work, end-of-unit tests, and plenary question-and-answer sessions at the end of lessons.

HEAD OF DEPARTMENT

Ms Laurel Endelman

Aims

In Year 7, we focus on helping pupils settle into and become part of Immanuel College. This is achieved by encouraging the development of learning skills and the skills required to build good relationships, and by developing the pupils as citizens. During Year 8 we continue our work through consideration of peer relationships, independent learning skills and what it means to be a positive member of the wider community. This work is further developed during Year 9, when pupils consider decision making, the effect of their behaviour on others and their role in political life. The PSHE department aims to work alongside the Jewish Studies department and the Social Action programme, to develop pupils who will learn to contribute positively to their Jewish communities and to their wider community. We aim to develop pupils who think and question the world around them, including the global world.

Organisation of Subject

Pupils are taught in form groups and have PSHE lessons once every two weeks. Assemblies often highlight areas within the PSHE curriculum and form tutors continue to discuss and promote activities in the subjects raised in PSHE. Focus weeks also provide pupils with the opportunity to explore citizenship areas through assemblies, visitors, PSHE lessons and form time.

Learning Outcomes

Year 7

Term 1:

Pupils learn to:-

Organise and time keep

Scan and skim read

Write effective and accurate summaries and notes

Revise effectively

Term 2:

Pupils learn to:-

Build friendships

Distinguish between teasing and bullying

Resolve conflict

Look at the multi-cultural world around them and the meaning of diversity
Articulate their values and beliefs

Term 3:

Pupils learn about:-

The changes that take place during puberty
The dangers of smoking
Staying healthy through a balanced diet and exercise
The value of ethical buying
Becoming involved in volunteering

Year 8

Pupils are encouraged to research and consider each topic from different perspectives and to articulate a point of view, both orally and in writing.

Staying Healthy and happy

Image and beauty
Eating disorders
Puberty/growing up
Alcohol awareness

Developing relationships

Family relationships
Friendships; avoiding cliques and loneliness
Tolerance, prejudice and discrimination

Developing as a Citizen

The media and its influence
You and other people –people with disabilities
Being a good neighbour
Youth crime

Year 8 pupils also take part in The Year 8 Independent Project and the Take Your Child to Work Day

Year 9

During Year 9 we expect pupils to undertake detailed research, to be able to write and discuss using facts and statistics to justify their arguments and to question the facts and knowledge that they may have taken for granted.

We expect Year 9 pupils to gain an understanding of:-

The government and political parties in the United Kingdom
The election process
The difference between local and national government

The law
Money and ethics
Human Rights
The dangers of drug taking
First Aid

We also expect pupils to think about:-

Responsibilities to family and friends
Volunteering in the Local Community
Making Decisions and choosing options
Becoming an adult
The difference between assertive and aggressive behaviour

Teaching Methodology

The PSHE classroom is active and lessons are taught through group and pair discussion and debate, role play, quizzes and questionnaires. Written work includes poems, play scripts and stories and articles.

Visitors are invited to take assemblies and PSHE lessons; these have included Jcore, JWA and Tzedek.

Assessment

Assessment is through discussion, homework marking, and peer assessment of presentations prepared and given by pupils throughout the year. At the end of each unit pupils complete an evaluation assessing their own learning and setting targets for the next unit.

PHYSICAL EDUCATION

HEAD OF DEPARTMENT

Miss Leann Swaine

Aims

The main objective of the Physical Education Department is to give each student the opportunity to attain the maximum of his/her individual capabilities by participation in variety of practical activities. In order to achieve this objective there are a number of specific aims:

- To ensure that every individual has the opportunity to develop their skills to the full.
- To encourage enjoyment and self-fulfilment.
- To promote healthy active lifestyles.
- To encourage individuals to participate in a range of physical activities and sports. During curriculum time pupils are exposed to a range of activities, which include Athletics, Badminton, Basketball, Cricket, Netball, Rounders, Table Tennis, Tennis Trampolining, Outdoor and Adventurous Activities.
- To provide a wide ranging extra-curricular programme, which allows pupils to develop resources for leisure time and also enables the department to train teams for fixtures and tournaments. We pride ourselves on being increasingly competitive in the local Watford District league and Maccabi events. Pupils take part in a variety of extra curricular activities and competitions including Athletics, Badminton, Basketball, Cricket, Fitness, Football, Netball, Tennis, Table Tennis, Trampolining and Rounders.

Organisation of Subject

Students receive three hours of high-quality physical education every fortnight. They are taught in singles sex tutor groups during their single lesson but during the two hour sports afternoon that groups are often spilt into ability groups to ensure that all students have the opportunity to experience success and to take part in activities with pupils of a level of proficiency similar to their own.

Learning Outcomes

During Years 7 – 9, pupils are learning to acquire and develop skills. Once they have the requisite skills the focus becomes more fixed upon selection and application of the competencies, along with the development of tactics and compositional ideas. An integral part of Physical Education is being able to evaluate and improve performance and this is achieved through a variety of peer and self assessment. The final learning outcome is that pupils gain knowledge of health and fitness and are aware of how this can affect sporting performance as well as everyday life.

In Year 7 pupils will learn the basic techniques and rules of each sport. For most sports they will do so in a fixed practice environment which means that they will be repeating the skills in order for them to become habitual and second nature. Pupils will learn the basic rules in order to play in a modified version of the game at the end of each lesson. During the course of the year the pupils will learn the importance of warm-up exercises and be able to participate fully in one sport with the correct techniques.

In Year 8 we expect the pupils to learn the full rules of each of the games taught. The emphasis is still on the pupils improving the basic skills learnt during the previous year, but now the pupils are expected to perform some of the complex skills with some degree of accuracy. During Year 8 more time is spent in small group situations which enable the pupils to learn about the decision making skills that are needed in most sports. When warming up pupils will learn about the basic muscle groups in the body and will begin to lead the warm-ups themselves.

In Year 9 P.E. is organised into more game situations.. The pupils also learn about different positions, tactics and rules, and are asked to observe and analyse each other's performance in the role of coach; this involves giving constructive feedback.

Pupils will be asked to officiate at games and matches, thereby improving their knowledge of the game. They are expected to lead the warm-ups and have a clear understanding of the relevant skills and techniques including knowledge of the muscles involved.

Teaching Methodology

The range of activities offered is extensive, and throughout the year the sports change each half term. Teachers use a range of teaching styles and approaches including practical demonstrations and DVDs to demonstrate the strengths and weaknesses of each other's performances.

Independent learning and the practising of skills learnt in lessons is encouraged through links with local sports clubs and by getting the pupils involved in Sunday fixtures and practices.

Assessment

Pupils are involved in a variety of peer and self assessment tasks through out the year. Formative feedback is given to the pupils regularly throughout the lessons and a final summative assessment is completed at the end of each half-term when the pupils are awarded a grade in line with the national curriculum levels:

Level 3

Students can select and use skills, actions and ideas and understand tactics. They can see how their work is similar to and different from others. They understand why warming up is important and why exercise is good for health.

Level 4

Students can link skills, techniques and ideas, applying them accurately and appropriately. Their performance shows precision and control and that they understand tactics. Students can

compare skills, techniques and ideas from their work and that of others. They can explain basic safety principles and can explain what effect exercise has on the body.

Level 5

Students can select and combine skills, techniques and ideas and **apply** them appropriately. Their performance shows precision and control and understanding of tactics. Students can compare skills, techniques and ideas from their work and that of others. They can explain basic safety principles and can explain what effect exercise has on the body.

Level 6

Students select and combine skills, techniques and ideas **and** apply them in ways that suit the activity. They plan their work and draw on what they know about strategy, tactics and composition in response to **changing** circumstances. Through analysis they can suggest ways to improve performance. They understand how different types of exercise may benefit certain sports / activities.

Level 7

Students select and combine advanced skills, techniques and ideas to suit the activity. They consistently show precision, control and originality. They analyse and comment on performance, demonstrating an understanding of how skills, tactics and fitness relate to quality. They are able to plan ways to improve performance by planning their own exercise and activity programme.

Level 8

Students can distinguish and apply advanced skills, techniques and ideas constantly showing high standards. They apply tactics with proficiency and flair and can adapt their tactics to suit match situations. They can evaluate their own and others' work showing that they understand the impact of skills, strategy and tactics and fitness on the quality and effectiveness of performance

HEAD OF DEPARTMENT (ACTING)

Mrs Ruth Solomons

Aims

The aim of Year 7 Science is to introduce pupils to the laboratory, to learn how scientists investigate ideas and to study three key ideas of Science: Particle theory, Energy and Life Cycles.

The aim of Year 8 is to develop these areas further, while at the same time enriching the pupils' interest in the Science around them.

Year 9 is when we commence aspects of IGCSE Science providing both a firm foundation and a head start in the course.

Immanuel College is not bound by the National Curriculum. We pride ourselves on constructing our own curriculum, hand-picking areas of study that we feel will provide both a firm knowledge base and relevance for our pupils.

Organisation of Subject

Year 7 is taught in form groups with one teacher teaching all three Sciences

Year 8 is taught in sets but with all sets following the same curriculum. Setting is reviewed in January and April. Each set has three teachers, one for each Science.

Year 9 is taught in sets but with all sets following the same curriculum. Setting is reviewed in January. Each set has three teachers, one for each Science.

Learning outcomes

Year 7 Science

- Measuring, recording and analysing techniques
- Particle theory to explain dissolving and separation techniques
- Energy transfers and the need for energy resources
- How to construct and use simple electrical circuits and devices
- The human life-cycle and understanding puberty
- The periodic table and the construction of chemical equations

Year 8/9 Biology

- Types of food groups leading to issues of anorexia and heart disease
- Respiration leading to how asthma affects breathing
- The mechanics of the heart and how high blood pressure can cause heart disease

- The skeleton structure, joints and understanding sports injuries
- Contrasting respiration and photosynthesis
- The use of microscopes and using them to identify types of cells
- Predicting, observing and explaining the effect of enzymes
- Research into microbes and disease and how this can lead to careers in Science
- Ecology, habitats and our effect on the environment

Year 8/9 Chemistry

- Chemical and physical changes and their application to oxidation and rusting
- Chemical accounts and the law of conservation of mass
- The structure of the atom, interpreting the numbers on the periodic table and determining chemical formulae
- Observations of how metals react in water, acids and how they displace each other to determine the reactivity series
- How electricity can be used to split compounds
- Predicting chemical formulae and communicating using chemical equations
- Ions to explain electrolysis
- Acidity leading to salt making
- Investigations into indigestion medicines and solubility to practise planning, observing, analysis and evaluation skills

Year 8/9 Physics

- How we see and how this can be applied to photography and colour
- How boats float leading to density calculation
- How planes fly leading to balanced and unbalanced forces
- The term pressure and how it relates to weather forecasting
- How we hear, leading to sound as waves
- How glasses correct vision leading to refraction of light
- What is light leading to wave theory
- How physics is used in hospitals, broadcasting and for predicting and analysing earthquakes
- Energy efficiency in the home and carbon emissions

Teaching Methodology

- Development of practical skills and confidence in choosing and using standard laboratory equipment
- Use of *predict-observe-explain* to develop concepts
- Gathering, evaluating and using data
- Collaborative working
- Discussion of how Science relates to society
- Problem-solving to develop quantitative skills
- Writing-up to develop qualitative skills and vocabulary
- Research and information gathering to develop literacy skills

Assessment

- Learning objectives are clearly stated and shared with pupils,
- Self and teacher assessments take place by the appropriate use of questioning
- Pupils' work is regularly marked and feedback is provided on how to improve.
- There are regular end-of-topic/end-of-term testing with skills reviewed in class
- Formal recognition of achievement through re-setting and awards
- Lunch-time surgeries to assist improvement in learning
- Development of gifted and talented students through our science society