

Integrated Programme Science

Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) Biology, Chemistry, Physics, Accelerated Class for Science & Computer Studies

Science Deans

- Mr See Boon Tiam
 - Dean, Biology
- Mr Dennis Sim
 - Dean, Chemistry
- Ms Colleen Ng
 - Dean, Physics



Anglo-Chinese School (Independent) A Methodist Institution

CURRICULUM AIMS

- To lay the foundation for IBDP Group 4 subjects
 - Attitudes & Skills acquisition towards the Sciences
 - Internal Assessment via course work with a look into *collaboration skills*.
 - STEM development
- Provide opportunities for *creative* and *specialized study*
- Detailed curricula can be found in the respective subject brochures





Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) 121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg

ASSESSMENT DETAIL (Year 3 & Year 4)

Common Test15%Coursework15%

Final Examination

70% **100%**



Total

Anglo-Chinese School (Independent) A Methodist Institution (Founded 1886)

121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg

Year-End Examination Format

Paper	Format	Marks	Duration
1	MCQ	40	1 hour
2	Structured, Data Based & Free Response Questions	80	1 hour 45 minutes



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) 121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg

Brief Subject **Descriptions**

- Chemistry
 - Explores the interactions between matter and energy
 - Currently the central discipline of science which is the main prerequisite for most university courses
- Physics
 - Explores the interactions between fundamental forces and energies from the macro to micro.
 - Provides foundation for engineering courses in universities and a problem-solving discipline to life.
- Biology
 - Explores life and living organisms
 - Provides foundation for medical and life science related courses in universities



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886)

COMBINATIONS OF SCIENCE SUBJECTS

- Chemistry & Physics
- Chemistry & Biology
- Chemistry, Physics & Biology
- Chemistry, Physics & Computer Studies



CONSIDERATIONS FOR SUBJECT CHOICES

- Grades obtained in Mathematics, Physical and Life Sciences in Year 2
- Students should have a genuine keen interest in the relevant sciences



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) 121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg

EXTURE PROSPECTS

- Pre-requisite for IB Subjects
 - Higher Level At least a grade 6 in the relevant science at Year 4 IP
 - Standard Level At least a **grade 4** in the relevant science at Year 4 IP
- Limitations for students who do not offer Physics
 - some limitations with respect to Engineering and technology-related courses.
- Medicine
 - Most medicine courses require Chemistry with one other science, which need not be Biology, although preferred.
 - It is important to note that these are general guidelines which may, and will, differ between universities. It is essential for students and parents to check the prospectus of universities which they are specifically interested in.



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) 121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg Information shared is accurate as of 14 July 2025 and is subject to change.



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) Accelerated Class for Science (ACS)



2-year talent development programme (Only for selected Year 3–4 IP students)

One in-tact class; timetabled time; no extended school hours

Accelerated Sciences - Biology, Chemistry and Physics

Relevant advanced level content & competencies introduced



Subject Combination

- 1. Language Arts
- 2. Mother-Tongue Language or Higher Mother-Tongue Language
- 3. Biology (IP and Accelerated)
- 4. Chemistry (IP and Accelerated)
- 5. Physics (IP and Accelerated)
- 6. Core Mathematics
- 7. Advanced Mathematics
- 8. International Studies

For Y3–4 IP Final Exams, an additional 1.5-hour combined paper comprising all 3 Accelerated Sciences.

Accelerated Sciences are individually reflected in the progress report as 'Distinction' or 'Merit'.



JOURNEYS

Programme highlights COMPETITIONS ENRICHMENT ENHANCED RESEARCH **STEM-INFUSED OPPORTUNITIES ACTIVITIES AND CURRICULUM** LEARNING

STEM-infused Curriculum and Research opportunities



Integrated STEM lesson at Science Centre Singapore



Gold awardees in the NTU Nanyang Research Programme Jr.



MOE Science Mentorship Programme students with their external mentor.



Exposure to Various Competitions

National STEM Championship winners



Singapore Junior Biology Olympiad Practical round



2023 National STEM Challenge finalists presenting to the judges





2024 National STEM Challenge First-runner up



Top performing Singaporean team at the ASEAN +3 Student Camp







Sakura Science High School Programme in Tokyo, Japan

Professional Sharing by Renowned Alumni



Nobel Prize Dialogue





Learning journeys to SSEF (above),



ExxonMobil (left)







Two Selection Criteria

Criterion 1: Do well for Final Exam

Final Exam	80% or higher	65% or higher
Y2 Exp	Physical Science, Life Science & Math	English Language

Subject Criteria will be strictly followed. Final Exam scores (not Overall) considered.

Criterion 2: Do well for Selection Test (Only Students who meet Criterion 1 are eligible)

Selection test to sieve out students who exhibit abilities beyond that tested in Final Exam.

Held post-final exam.

Parents of students who meet Criterion 1 will be notified via PG.

No make up test will be administered.



Computer Studies

Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886)

SUBJECT BRIEF: Computer Studies

- Involves solving problems in real world scenarios using principles of computing
- Logical problem solving is require: Solve problems logically using Python through decomposition and pattern recognition.
- Learn machine learning to analyze data and build predictive models.



SUBJECT NOTES

- Computer Studies can replace a *non-core subject*
- Cannot replace Physics, Chemistry or Biology in counting of the year-end aggregate score
- Leading to IB HL Computer Science
- Not a pre-requisite for HL Computer Science, but recommended



CLOSING THOUGHTS

- Holistic development aims to create well-rounded individuals who are not only academically competent but also socially, emotionally, and physically capable. It helps children develop a wide range of skills and knowledge that can be applied in real-life situations.
- Pursue development of student's attitudes, aptitudes and personal strengths through the subjects offered.



Anglo-Chineze School (Independent)

A Methodist Institution (Founded 1886)

ТНАИК ХОО



Anglo-Chinese School (Independent)

A Methodist Institution (Founded 1886) 121 Dover Road, Singapore 139650 | Tel: (65) 6773 1633 | Fax: (65) 6773 1433 | www.acsindep.moe.edu.sg