Part B Project Summary

Project Title:	Project Number:
Meaningful E-Learning & Self-directed Learning - More Ubiquitous and Personalised	**2022/0144 (Revised)**

Name of Organisation: Ho Fung College

(1) Goals: Promoting meaningful English e-learning and self-directed learning for S.3-S.6 students by establishing ubiquitous and personalised learning with school-based e-learning system, resources and tools

The project aims to achieve the following objectives:

I. Introduce a meaningful school-based SMART e-learning model and e-system to support more ubiquitous and more personalised learning paths from S.3-S.6;
II. Develop and program school-based learning e-resources that support both classroom and personalised learning to cater for learning diversity; and
III. Tailor school-based e-learning tools to facilitate meaningful teaching and personalised learning;
IV. Strengthen teacher's competencies in ubiquitous and personalised teaching, and adopting a top-down approach for teaching reading comprehension through professional development training;
V. Involve and engage parents in supporting our school-based meaningful and personalised learning.

(2) Targets: S3 to S6 students, English teachers, Parents and School administrators
Expected Number of Beneficiaries: 480 students, 13 English teachers, 3 management representatives, 480 Parents

(3) Implementation Plan: (i) Duration: Jun 2024-May 2025; (ii) Process/Schedule:

Term 1 Jun-Aug 24	**Procurement** (Term 1); **Co-plan, review and develop:** School-based platform and tools, School-based resources, assessment key, new teaching curriculum framework; **Introduction & Preparation:** teacher, student and parent workshops	*Term 2* Nov-Dec 24
Term 1 Sept-Dec 24	**Implementation, & Ongoing review and development:** Pilot run, use and integration of developed e-platform and e-resources in classroom and self-learning; platform and tools review and enhancement; joint lesson planning and peer lesson observation etc.	*Term 2* Jan-May 25
Term 1 Dec 24	**Evaluation:** Mid-project (*Term* 1) and End-project (*Terms 1 &2*) evaluation **Dissemination**: Documentation, dissemination, publication, and sharing activities.	*Term 2* May 25

(4) **Products**: (i) Deliverables/outcomes:

Deliverables	Outcomes
• New integrated school-based e-learning curriculum and model for S.3-6 students; • New school-based e-system and e-resources; • New teaching, e-learning and assessment tools for classroom and self-directed learning; • 3 Professional Development Workshops, Student workshops and parent Workshop; and • A series of dissemination seminars & activities	• More comprehensive and structured school-based curriculum with e-learning and self-directed learning elements; • More supported self-directed and personalised learning for S.3-6 students, guided by e-system, e-resources and e-tools; • Improved school strategies and enhanced teacher's professional capacity in catering for learner diversity through levelled e-resources and diversified teaching on e-system; and • Clearer role for parents to support home self-directed learning

(ii) Dissemination of deliverables/outcomes:
Sharing workshops and publications with educators, school administrators, parents and students on Ho Fung College Staff Development Day, Joint School Development Day (if any), Sik Sik Yuen (SSY) Teaching and Learning Programme, New Territories School Heads Association (NTSHA) Education Seminar and QEF Dissemination Events

(5) **Budget**: $552,300 (One-off Development of E-platform, e-resources and e-tools) - (a) Staff (NIL); (b) Equipment (Supported by school); (c) Services: $542,260; (d) works (NIL); (e) general expenses: $10,040

(6) **Evaluation**:
(i) Performance indicators:
Teachers and students' usage of the e-platform, e-resource and tools - No. of classroom and self-directed e-learning core tasks and personalised tasks; Comparison of English performance between the first and last practices done in the year; Comparison of previous and new curriculum and teaching model and pedagogy; Teachers' and students' feedback on ubiquitous and personalised learning; parents' feedback on students' self-directed learning
(ii) Outcome measurements: Actual data from the E-platform, Mid- & End-project Survey with Teachers, S.3-6 students and parents

Part C

1. School's Mission, Present Status, Capability and Needs

Ho Fung College's mission statement is to provide students with quality education and help our teaching staff develop professionally. The building of a learning and teaching community which shares passion for academic excellence is the common goal for all stakeholders including the school sponsoring body, Sik Sik Yuen (SSY), the Incorporated Management Committee (IMC), parents, teachers and students. SSY attaches great importance to learning and teaching, thus has supported our school in many ways, including this proposed project. It is hoped that our school can share this project outcome with other schools in society and also the SSY community.

To provide quality education, our principal had the vision 10 years ago to bring in a more data-drive approach in school. We therefore have been making use of performance data to pull out needy students for enrichment programmes to cater for learner diversity. We have also been conducting detailed analysis of students' performance in tests and examinations to help place them in a better-supported learning environment (20-21 Annual School Report). To improve our current data-driven approach in learning and teaching, we need to **1) develop a model that helps collect more up-to-date and specific data that reflects students' learning progress, ability and needs, and not just their end results.**

Knowing that e-learning is the trend in education, our school has been acquiring better hardware and adopting more e-learning platforms in previous school years using the funding designated for IT in Education from the EDB. All classrooms are now well-equipped with Wi-Fi connection, that assists different e-learning pedagogies with mobile devices. Students have also developed the habit of learning on e-platforms. To make sustainable plans for e-learning in the coming years, given similar amount of staffing, we hope to seek innovative and effective ways to **2) better cater for each student's personal learning needs**; **not just the lower ability groups but also the higher ones** and **3) better support students' self-directed learning and provide clearer guided self-learn paths.**

Our school is ready to make some innovative changes to address the above three clear needs through this project. Aligning with our coming 3-year plan (22-25) of making learning meaningful, we are committed to adopting a stronger data-drive approach in learning and teaching; giving students' more personal assistance; and developing e-system and resources that make learning more ubiquitous and guides their self-directed learning.

With our past experience in good use of public grants and conducting QEF projects, we have track record of approved and well-completed projects. We last carried out the project "Fostering an Interactive E-learning Environment", which was approved by the QEF in 2018, supporting pedagogical change among teachers in the use of interactive touch panels and animations. The Virtual Campus TV Program was also successfully launched in 2013, enhancing teachers' skills in develop learning communities and students' communication and problem-solving skills. Our school applies for funding to improve teaching and learning every few years, as we understand our school needs, and can propose feasible plans and spare capacity to complete proposed projects. We prioritise approved projects and ensure our professional staff and students are capable of carrying out the plans.

Teacher's Capability and Needs

One of the key recommendations from the ESR reports in 2017 was to strengthen teachers' capacity with knowledge and skills to realise pedagogical change. Our competent teaching staff has been actively equipping themselves, so has our management in sourcing professional exchange opportunities and development for our staff. In 2020-2021, our school promoted "T-standard+" as the goals for teachers' professional development. Teachers not only developed the culture of conducting internal peer lesson observation and post lesson sharing, but also participated in Joint School Staff Development and Joint School Lesson Observation. This serves as a good foundation for this project as our staff can ride on existing co-planning and sharing cultures to conduct new pedagogy exchange within and outside school.

What our teachers currently need are practical ways to make e-learning effective. There are too many e-learning platforms available, such as Google classroom, and Schoology. Most of them are for assigning work and monitoring students' submission. We hope to take one step forward to assist our staff in using e-methods in actual teaching – a tailored platform that they can use before, during and after lesson for teaching preparation, assigning tasks, assessment and analysis, so their professionalism can shift to giving feedback and more personal assistance to individual students of different ability groups and paving different learning paths for students. This innovative change of role and pedagogy require staff's open-mindedness and acceptance, which are their strength, as mentioned in our annual school reports.

Students' Capability and Needs

Students from our school are in general motivated learners with high abilities. They adapt to new pedagogies swiftly and are willing to cooperate with learning change and new mode of learning. This can be seen in their steady

improvements in public exams and also internal exams under online teaching. Yet, there are students who are particularly weak in English Reading (as seen from our latest HKDSE School Reports), which affected their overall English proficiency and university entry. Our school hopes to address their needs through this Project.

Another key need is students' lack of ability as self-dependent learners. We identified much room for improvements as mentioned several times in recent School Reports. Students in general have been taught about setting personal goals and reflecting upon their performance. Yet, our school believes we could provide students, especially those in senior forms, with more learning data so they have stronger awareness of their own personal needs and strengths, and can have more guided assistance during self-directed learning sessions. Through this project, both high achievers and language-needy students will be able to receive more personal support that targets at their personal learning weaknesses, and experience guided self-directed learning that suit their level and give instant feedback.

Parents' Capability and Needs
Our parents have been very supportive to the school, hoping to help create a conducive learning environment together with us for their children. With the help of setting up an e-learning platform for learning, parents will be more confident that their children have well-supported e-resources to improve themselves at home. They will be able to know how they can support and monitor their children's home learning. Reports and learning analysis can also be shared with parents for their understanding of their children's learning. Parent engagement will be much strengthened.

This project is designed to meet the needs of our school, teachers, students and parents, as the all-in-one e-platform allows users to participate and oversee e-learning and self-directed activities; supports teachers to tailor levelled tasks for specific learners that suit their individual needs; collects and analyses students' ongoing learning data; supports teachers to adopt a more student-centred and data-drive teaching approach, professional exchange and guide students self-directed learning.

2. Goals and Objectives

The long-term goal of our school is to promote academic excellence in all forms. Use of e-learning is the approach we hope to adopt in this e-era. In the school's coming 3-year plan (22-25), we aim to promote meaningful learning by developing students' self-directed ability to grow their life-long learning competence; and supporting teachers' professional growth in supporting students' learning by giving personalised instruction to cater for learner diversity.

To help achieve the 3-year school goal, the short-term goals for this project is to provide concrete ways to help teachers and students achieve so. We aim at making learning and teaching more **ubiquitous** with the help of e-learning tools, expanding students' learning opportunities to receive guided and supported learning within and outside classroom time and space; and giving them more **personalised** assistance, by further diversifying teaching and learning content so individualised learning weaknesses can be catered.

We hope to start with S.4-6 students in this project, as their maturity and self-directed ability is higher. With the motivation to achieve better in the public exams, their motivation is also stronger. They also had some basic knowledge on self-directed learning learnt in lower forms. We hope to try out with the senior forms first before extending them to the junior forms. S.3 students will be included in Term 2 of this project as preparation for their bridging to the senior form curriculum and building their self-directed learning habits. We expect an increase of use of e-learning in class, increase self-directed learning periods, and more diverse instructions of learning practices to cater for individualised weaknesses. Senior form English teachers are expected to adopt new data-driven pedagogy in daily teaching and look into possibilities of giving personal assistance.

English has been one of our key development directions. We have stressed the importance of English reading as leisure for many school years. We would like to further strengthen it in terms of academic aspect, by giving students learning support in English acquisition and skills. Given more levelled resources in English on the e-system, and instant checking and feedback, students can attempt tasks that are more suited to their needs and levels, and learn from their own mistakes within a short time.

Objectives
To meet the above goals and needs, this project aims to achieve the following objectives:
I. Introduce a meaningful school-based SMART e-learning model and e-system to support more ubiquitous and more personalised learning paths from S.3-S.6;
To make learning meaningful by making e-learning ubiquitous, supporting better self-directed learning as well as provide more personalised learning support, the current learning model and pattern require changes. To achieve ubiquitous learning, learning tasks have to be moved online onto a centralised system to support learning in any sort of classroom or outside classroom condition. As long as students have an e-device, such as laptop or iPad, which have

been ready among our students due to our previous BYOD scheme and also in our school, with electronic devices purchased in earlier years to stand by and support, learning can happen in class, online, anywhere, anytime. A new e-learning community that shows clear learning portfolio and documents learning is much needed. We hope to develop a school-based e-system which is SMART to meet the school needs that have already been clearly identified:

Sustainable e-system – The e-system:

1. supports stable and simultaneous e-learning activities to be carried out in class and at home to ensure e-learning can take place anywhere, anytime, maximizing learning opportunities of all S.3-S.6 students;
2. is sustainable and reliable in documenting and keeping track of digital classroom and self-directed tasks, including both the results and progress, on students' personalised learning portfolio from S.3 till S.6 to make e-learning paths visible and traceable for students' self-monitoring and revision and teachers' better lesson planning;
3. allows teachers to pre-assign and re-assign tasks to make learning plans clear and structured;
4. enables instant viewing of students' learning data for teaching preparation purpose to facilitate real-time teaching;
5. allows teachers to understand students' standards, prior knowledge, performance, activities, difficulties, progress via the individual learning portfolio to give more personal assistance;
6. allows both experienced and novice teachers to share tasks created with other colleagues to foster internal professional exchange and strengthen co-plan culture within our English teaching community;
7. supports school management, English teachers, students and even parents to view progress and identify areas of strengths and weaknesses;
8. is compatible with other school-requested e-assessment features such as resource bank, auto-marking and search engine, reporting feature, which facilitates learning and teaching inside and outside class; and
9. documents and saves all work on school-based Cloud to avoid data loss.

Materials readily available (Connected with Objective II)- The e-system:

10. contains 28 core school-based sets of materials (each set takes around 45-50 minutes) specially developed for S.3-6 as core classroom practices and core self-directed practices for S.3-6;
11. stores a question bank with multi-levelled and pre-categorised e-resources (around 700 skill-based practice questions) to support personalised learning tasks; and
12. supports search engine to allow teachers to quickly look for target question type suitable to cater for specific ability groups' need and design personalised tasks to cater for their needs.

Auto-checking and **A**uto-analysing – The e-system:

13. supports e-submission and e-marking engine to automatically mark all core classroom and self-directed practices, as well as personalised classroom and self-directed practices to give students' immediate results to shorten learning waiting time;
14. has learning notes popped up after marking to provide detailed assistance on top of teachers' explanation in class, and to support self-directed learning;
15. has clear e-assessment criteria programmed for all e-resources developed on the e-system to ensure marking consistency and accuracy; and
16. has clear analysing criteria programmed to provide instant analysis of students' strengths and weaknesses such as question type strength, skill weakness, total time used etc.

Reporting – The e-system:

17. instantly synchronises students' progress and results to teachers' account to allow teachers to instantly view students' results to facilitate teaching;
18. provides instant performance results for students and teachers to view as assessment for learning;
19. presents instant analysis of students' skills, strengths and weaknesses and instant learning data; and
20. generates e-reports and e-analysis based on students' work and progress in a systematic format and school-based downloadable template for teachers' review and parents' share.

Teaching and Learning Benefits – The e-system:

21. synchronises students' answers with teachers' account instantly upon submission for teachers' review;
22. allows teachers to instantly read students' weaknesses statistics to conduct teaching;
23. allows teachers to instantly draw and display students' answer to teach with actual learning error;
24. supports teachers to retrieve past error as pre-teaching and post-teaching as teaching materials; and
25. facilitates teachers' data-based teaching and error-based teaching that addresses students' needs.

Behind the e-system is the design of a comprehension and structured school-based e-learning model, with clear specification of classroom and self-directed tasks (core tasks and personalised tasks), schedule of use of tasks and

assessment criterion, forming the backbone of our English panel's e-learning strategies in teaching English reading skills. This involves adaptation to our current school-based curriculum and use of resources Objectives II & III as well as pedagogy Objective IV.

Expected Outcome: Students are expected to have developed a clearer learning path and a clear personal learning portfolio on their personal account, for revision and review. Both teachers and students will be able to conduct learning and teaching in classroom, online and at home on the same platform. Teachers will have flexibility in creating tasks that support students' individual learning needs, without having too much addition teaching preparation loading because of the all-in-one system.

II. Develop and program school-based learning e-resources that support both classroom and personalised learning to cater for learning diversity;

We expect more students' learning opportunities with a more comprehensive e-learning model using the tailored school-based e-system and other assessment tools (Read Objective III). Teachers and students therefore have the capacity and need for more resources. We hope to develop school-based learning e-resources in this project. Unlike the paper-based resources, these school-based resources do not just 1) include texts or graphs, on top of it, they should align with our skill-based approach. We expect all resources to be 2) categorised by skill/function, 3) come with an e-assessment key; 4) can be auto-marked by the e-assessment tools on the system; 5) show answer discrepancy; and 6) include learning notes, especially for the challenging questions.

To cater for learning diversity, we will develop two types of school-based e-resources – core tasks and personal tasks for both classroom and self-directed learning to provide more diversity in teaching.

	Classroom	**Self-directed Capacity**
Core Learning Tasks • compulsory for every student; • cover essential skills; • selected based on teaching needs and consultant's advice	The content developer and IT developer will develop core tasks onto the e-system as classroom tasks. With the use of e-system and its e-assessment features, the tasks can be traced, well-documented, instantly checked, easily reviewed, and immediately analysed. Students receive feedback instantly and teachers can debrief and correct students' misconceptions on the spot in the classroom.	Core tasks will be developed with additional language support such as learning note, explanation, programmed answer key for e-system to give guided self-directed teaching.
Personalised Learning Tasks • created based on students' personal weaknesses • selected skills to meet students' different learning needs	The content developer and IT developer will create a school-based English question bank with around 700 e-questions that are thoroughly categorised based on difficulties and type for teachers to search and create personalised tasks. Based on reports and analysis generated from core tasks, teachers can now split the class into smaller ability groups that have different weaknesses and create personalised tasks for them to do in class as small group station learning and at home as meaningful self-directed learning. This new learning method requires new pedagogy that involves more flexibility and autonomy in teachers' new role (Connected with Objective IV).	

The estimated number of e-resources that we hope to develop via this project is around 28 core tasks and a question bank of around 700 questions. The 28 core tasks are planned to be used as core tasks from S.3-6, that should integrate well with our current scheme of work. The 700 questions will be co-developed and thoroughly categorised according to skills and levels, which will be accessed by all teachers across S.3-6 for them to search and sort questions to create personalised tasks to cater for learner diversity. We expect that through personalised tasks, high-flyers in each form can work on more challenging questions in the capacity of personalised tasks, while the weaker ones can work on easier tasks to consolidate.

	S.3	**S.4**	**S.5**	**S.6**
Core classroom and self-directed e-learning practices	2	10	10	6
Personalised classroom and self-directed e-learning practices taken from the question bank with 700 questions	1-2*	8-10*		4-6*

* *Actual number of practices depends on students' learning needs (See Appendix 1 for Samples)*

Form level teachers will decide the final number of practices to be used in class and as self-directed tasks depending on teaching schedule and class needs. These resources planned to be used for at least the coming 3 school year. Expansion and enhancement of e-resources will be considered after the first year based on teachers' and students' usage and feedback with school funding and other grants.

The school-based reading resources will be aligned and well-linked with our existing scheme of work in S.3-6, age-appropriate to our students and with close reference to the existing themes (e.g. Workplace Communication) and EDB learning areas in Key Stage 3 & 4.

They will be designed with mixed and target reading skills (Factual, Reference, Thematic, etc). The core reading sets, covering a range of skills, are designed vertically to progressively strengthen students' different skills in reading and to diagnose their reading strengths and weaknesses. The personalised and self-directed reading resources are to strengthen specific reading skills as follows:

Levels	**Themes** **The school-based resources will be aligned with the following themes*	**(Core Reading) Mixed Reading Skills with Progressive Levels of Difficulty**	**(Personalised and self-directed Reading) Specific Reading Skills**
F.3	• Helping Others • Innovations • Contemporary Arts • The Past and the Future • Society and Individual • Workplace Communication • Urban Development	Transitional	Skill-focused – Factual
F.4	• Entertainment • Nature and Environment • Global Cultures • Teenage problems • Sports Communication • Amazing People	Intermediate	Skill-focused – Factual, Reference, Vocabulary
F.5	• Global Cultures • Science, Communication and Technology • Space Exploration • Heritage Conservation • Animal Welfare • Pseudo-science	Upper Intermediate	Skill-focused – Vocabulary, Inference, Thematic
F.6	• Popular culture • Nature and Environment • Science, Communication and Technology • Global Cultures • Space Exploration • Heritage Conservation	Advanced	Skill-focused – Inference, Thematic

See Appendix 1.2 and 1.3 as example
**Levels of Difficulty – The levels of difficult can be reflected in terms of the length of the passage, question types, and the diversity and complexity of the reading topic as well as questions.*

Expected Outcome: With the resources developed, students, both high-flyers and weaker ones, are expected to have better English language proficiency after the use of e-resources, receive more sped-up feedback after each practice, more self-directed learning, better-supported self-directed learning tasks, and more personalised learning targeted at their learning needs. Teachers are expected to experience changes in pedagogy and lesson arrangement. Teaching effectiveness is expected to increase as time spent on marking has been shortened and used for teaching. Designing personalised tasks should be made easier and more practical for diversified instructions.

III. Tailor school-based e-learning tools to facilitate meaningful teaching and personalised learning

The e-learning tools are key to expanding learning space in classroom, increasing self-directed learning support at home, and allowing the shift of teachers' role and the adoption of new pedagogy. A few tailored school-based e-learning tools are specifically required to be developed for our school in this project that go hand in hand with the e-system and resources developed in Objectives I and II.

E-submission and E-marking engine

Given the increase number of practices and diversified tasks to be done in classroom and at home, an e-submission and e-marking engine are needed to support teachers and free up their professional human capacity in giving students personal and practical advice based on the marked results by the engine. Students are expected to have their work marked right away upon submission for instant learning and review. The time delay from submission to going over answers will be greatly shortened. Waiting time for feedback in learning can be much reduced.

The school-based system has to support simultaneous e-submission of answers and ensure all answers are well-documented and secured. The e-marking engine will then instantly mark students' work according to our developed e-assessment criteria. We expect the hired consultant and IT developer could offer advice and technicality on how long questions or complicated expressions can be marked. The e-assessment criteria will be co-standardised during the development stages together to standard engine marking for our school criteria.

Search Engine

In order to tailor tasks that are more personal and suitable for different students' needs and levels, a search engine is needed for teachers to look for specific type and level of questions to create as more personal tasks to address individual learning needs. As the e-questions will have been thoroughly categorised, the engine supports teachers' quick search of questions and auto-integrates selected questions as personal tasks to designed school-based format for teachers to assign to specific group of students.

Auto-analysing and Auto-reporting Tools

Apart from calculating the full score, the auto-analysing tool can help analyse students' skill development to a much greater extend and analyse language strengths and weaknesses with greater details, which contribute to meaningful learning. To facilitate understanding, these raw data will be presented neatly in a school-based format for teachers, students, parents and the academics team to access.

Unlike previous practices which only indicate students' final score, the auto-analysing tool allows students to undergo meaningful learning that focuses on their individual or collective weaknesses. Teachers can, based on the skill-based reports, generate personal tasks, either classroom or self-directed ones, that target at a certain type of questions for individual or smaller groups of students to work on. With the analysis and reports, students who are motivated will pay more attention on their weaknesses in core tasks. Parents who are more resourceful will better understand how they can assist their children. These reports can also be used in our existing enrichment classes as teaching backbone.

The collection of data further strengthens our current data-driven approach by giving teacher more daily and up-to-date learning data to adjust teaching focus and offer timely and personal help to students, truly catering for their diversity and learning needs.

Auto-saving Learning Data and Learning Error for Teaching

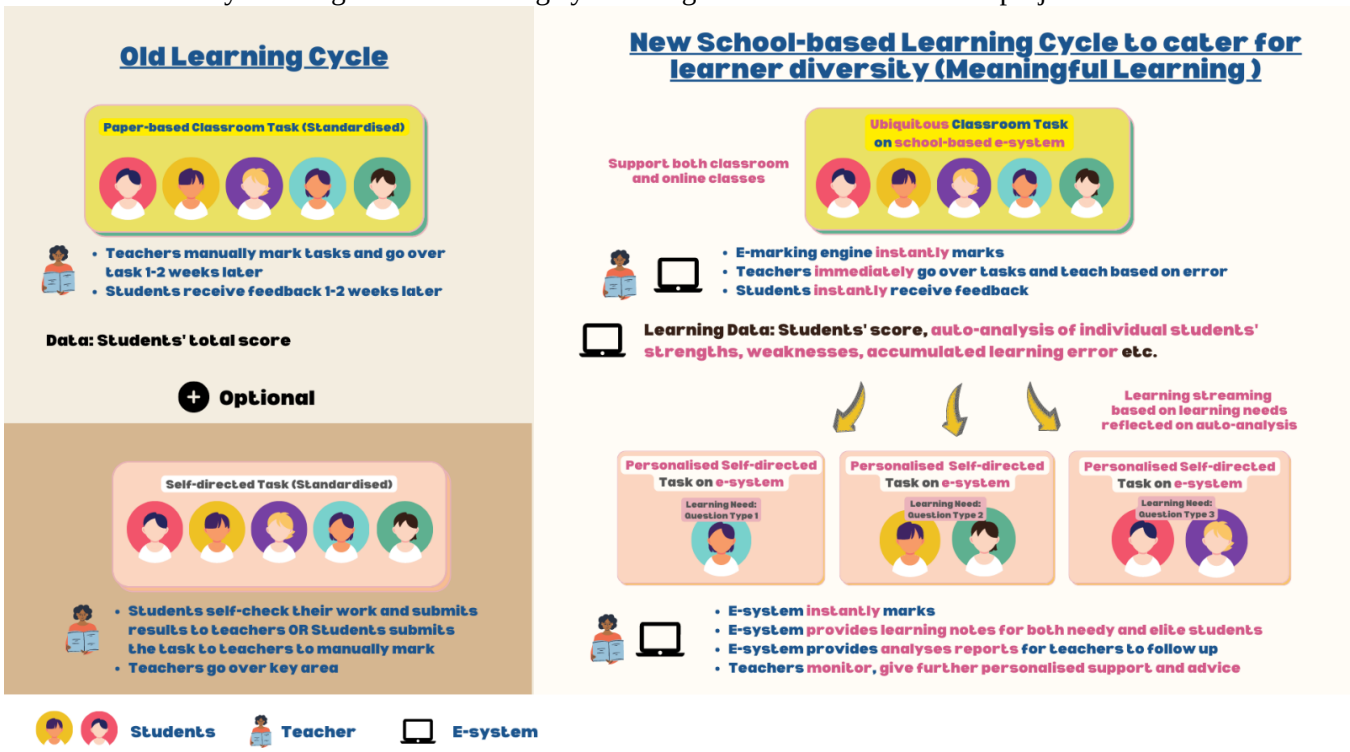
As learning and teaching can now be driven by students' learning data and needs, ongoing data has to be secured. There are two types of data that has to be well kept. One is students' progress and performance for skill analysis used as teachers' lesson preparation and creation of personal tasks (as mentioned above) and the other is students' learning error for teaching purposes. Learning error is seen as powerful and useful teaching samples and tools in the long-run. The accumulation of students' mistakes are good teaching materials of other classes or batches. We hope to systematically recycle them in our long-term teaching.

Instant display of Students' answers for Teaching

As students' answers are instantly synchronised with teachers' account, answers are instantly marked, we also hope that students' answers can be instantly and systematically retrieved to be displayed on our screen for teaching. This truly shortens feedback loop as teachers can assistance to students that is so timely that it comes upon their submission. This means learning can happen when students' memories of their mistakes are still fresh.

Teachers have to pick up professional skills in drawing and viewing data, adjusting their teaching preparation based on the mistakes their students make. Much flexibility is needed in teaching.

Here is a summary showing how the learning cycle changes after the launch of this project:



Graph 1 – Changes to Learning Cycle

IV. Strengthen teacher's competencies in ubiquitous and personalised teaching, and adopting a top-down approach for teaching reading comprehension through professional development training;

This project aims at enhancing teachers' professionalism, stretching our professional knowledge in teaching and flexibility in catering for learner diversity in several ways:

1) Designing a school-based E-curriculum
   When normally panel leaders or form coordinators are responsible for deciding or designing the school-based curriculum, through this project, we hope to equip each English teacher with professional knowledge on designing e-learning and designing e-curriculum. This prepares our teachers for their professional insight in making bigger and more long-term planning for the students.
2) Supporting self-directed learning
   Another professionalism strengthening lies in balancing and planning for both classroom and self-directed learning. While students may feel less supported learning in self-directed capacity, we hope to give our teachers more awareness on how they could better support students to learn on their own.
3) More personalised instructions
   To make learning meaningful, as our school's three-year goal says, we hope to deepen teachers' strategies in catering for learner diversity. Given the same teacher-to-student ratio, and class size and learning time, we believe our teachers can grow professionally in giving students more individual help without costing too much learning time of the bigger group. This requires help from digital learning, creating professional capacity from other areas to focus on giving personal assistance.
4) New Pedagogy and New Role
   As shown in Graph 1, changes are required in terms of teacher's roles and pedagogy in the new meaningful learning cycle:

From	To	How
Answer-Marking	Answer-Reviewing, Data-Reading	Teachers do not spend weeks marking. Instead, we spend time more professionally on reviewing marking accuracy, especially complicated questions or opinionated ones. We can spend time reading students' error,

Delayed Teaching	Instant Teaching, Data-driven teaching	identifying their misconceptions, preparing teaching based on students' needs. If resources are readily available and that our teachers are confident and flexible enough, we can even instantly teach upon students' submission of work.
Lesson Preparation	Learning path designer, multiple paths of learning	While we spend most time preparing lessons, we now try to cater for individual differences better by using the e-system and e-resources by designing personalised tasks for certain group/individual student based on their needs. There are options are teachers to conduct whole-class teaching or small-group teaching using ways such as station rotation etc. to provide personal learning assistance without hindering others' learning pace.

Through holding 3 professional development workshops in the early-mid stages of the project (Jun-Aug24 and Dec24-Jan25), we hope to ensure teachers understand the goals of the project and to build their confidence in learning and applying the concepts and knowledge learnt. Throughout the project period, we will dedicate more time on co-planning to align expectations and collectively adapt to curriculum and pedagogical changes. For instance, we still have internal meetings before project launch to align our expectations and needs towards e-system and e-resources; we will co-plan and co-review the e-resources to be developed with the hired consultants.

To better support our teachers and to ensure the knowledge learnt can be applied to actual classroom teaching, riding on our existing professional habits on conducting peer lesson observation, we will continue the practice and hope to observe or be observed at least once for professional exchange. The existing T+ standard, culture of peer lesson observation etc. strengthens teachers' ability to meet the project challenges for teachers. This project expands teachers' professional capacity.

Teaching insights and practices will be shared unofficially within the panel throughout the project period. Official sharing on curriculum design, project insight, pedagogical changes will be done with teachers from other panels in our staff development (Tentative: May 2025). If Joint School Staff Development Day is arranged again this year, we also hope to share with teachers from other schools on the e-system, e-resources and e-tools developed in this programme to share and collect insights from them. If possible, we may also consider recording a lesson, together with our other project materials for dissemination with educators from other schools for professional exchange and collective reflection.

In this project, our English teachers will participate throughout the project period with involvement in pre-project preparation, meetings with consultants, selection of materials, development and review of resources and questions, giving advice on platform development, implementation of resources in classrooms, unofficial peer observation and exchange for pedagogical insights and sharing, documentation of project success, preparation and arrangement of teacher and student survey and focus group interviews, as well as preparation of dissemination materials and participation in dissemination activities. Our teachers from the English Department are ready to lead and execute the project. Project lead and form level coordinators will assist in the progress of the project.

V. Involve and engage parents in supporting our school-based meaningful and personalised learning.

We aim at engaging parents in this project through project introduction (Jul-Sep 24), ongoing learning data share (throughout project period) and project dissemination (May 25). Through this project, parents can better support school-based learning in school by knowing how the school plans and adjusts curriculum for ubiquitous learning; gain awareness on how their children are better supported in self-directed learning via e-system; and have access to more of their children's learning data to know about progress.

Parents can rest assured that self-directed learning is better supported and their children can now receive more personalised learning assistance from school. For families that are more resourceful, parents can make use of reports on students' learning weaknesses to give additional support to their children.

3. Targets and expected number of beneficiaries

	Students	Teachers	Parents	Others
Direct	480 S.3-6 Students	13 English teachers 3 school administrators	480 S.3-6 Parents	/
Indirect	All future students after the project period	50 teachers from other panels and future teachers	All future students after the project period	200 educators through sharing
Outcome	Better English proficiency, shorter feedback cycle, More and better guided self-directed learning; more personal learning that meet their individual learning needs.	Easier search and creation of teaching materials; enhanced teaching efficiency and flexibility on all-in-one e-system; clearer teaching focus; more meaningful teaching with personalised help	Better support students' self-directed learning at home; more ongoing and up-to-date learning data	Innovate idea on developing a comprehensive and meaningful e-curriculum; new teaching roles and ideas to cater for learner diversity

4. Innovation

1) New learning method: Submission-Feedback Synchronisation
New teaching method: Delayed Teaching to Instant Teaching

We can innovatively shorten teaching delay. Students' learning memories are strong at the moment they make a mistake. Through the development of e-resources and auto-checking engine, the marking time can be much shortened. Teachers can make use of the instant marking results to quickly know about students' common mistakes, areas that they need help with and teach immediately.

Students can immediately feedback not just in classroom practices but also in self-directed tasks. With the use of developed e-materials on e-system, students will have feedback on their self-learning instantly even without the presence of teachers. This greatly maximise learning opportunities and makes learning more self-paced and flexible, making learning truly meaningful. The time of submission is also the time of receiving feedback. Given the short attention span on each learning tasks, the use of e-system can offer as much feedback as possible upon students' completion.

2) Strengthen existing approach: A Stronger Data-Driven Learning and Teaching Approach

Our school has started adopting a data-drive learning approach a decade ago. We have started incorporating data collection and adopting more data-based curriculum planning, especially on class streaming. The data we have been collecting is an internal system of documenting scores in tests and exams and analysing ability distribution and form comparison for future projection.

In this project, our data-driven approach can be much strengthened and officially be incorporated into daily teaching and self-directed learning purposes, which is a new element for our school. Weekly and even daily task-based data and analysis will be retrieved for teaching purposes. A clearer learning portfolio and learning path can be easily designed and traced on the e-system, for all students, teachers and parents to view.

Students will have more data from auto-analysis system to understand their personal learning needs, and can look for resources to help.

3) New Learning and Teaching Roles

Through this project, teachers will take up new professional roles as personal learning adviser and learning path planner. In the past, mainly panel heads and form coordinators were responsible for deciding the form curriculum in S.3-6. In this project, every single English teacher will have to develop professional skills in curriculum planning and learning path paving. These are new roles and skills for our S.3-6 English teachers.

Because of a clearer learning path present on e-system, this also bring in more connection in inter-form coordination's based on students' learning pace and needs. It also complements that existing practice of using Standard T+ in our peer-lesson observation. Unlike past teaching, through this project, teaching can be made more customised yet sustainable based on each batch's learning needs.

Teachers switch roles from marking machines, to e-assessment designer. Through developing e-assessment criteria in this project, S.3-6 English teachers' role as assessors for teaching will be strengthened.

4) More Guided and Personalised Learning in Self-directed learning

In the past, self-directed learning tasks are assigned by teachers. They are standardised for all students. Students self-check their answers. They self-learn by reading the model answers. Teachers will not be able to monitor their self-direct learning much due to limited class time. Individual students, especially the highly motivated ones, will take initiatives to look for further explanation and help from teachers. Both students and teachers

Through the launch of this project and development of e-system and e-resources, there could be options among self-direct learning tasks. Tasks do not have to be standardised. Each student can be working on tasks that are suitable for their level and needs. The assess accuracy will be high and reliable. This ensures that all students will receive performance results. Apart from model answers, there are pre-written explanations to guide their understanding. Teachers have transparent data over their self-directed status, their submission, their results. Teachers can now also take the initiative to approach needy students. The effectiveness of self-directed tasks can be greatly enhanced.

5) Use of E-resources to diversify personal tasks

This project is a pioneering move for our school, as well as other schools to look into personalising learning in a more cost-effective way through the use of e-resources and e-system. To truly make learning meaningful, we hope to further divide students into small groups of different abilities and needs.

5. Conceptual framework

To adhere to the school goal of making learning meaningful through e-learning, we have decided to adopt elements of ubiquitous learning and personal learning to create a school-based teaching and learning model that supports learner-centred teaching and truly caters for learner diversity. Ubiquitous learning and personal learning in fact go hand in hand in many research paper, with ubiquitous learning focusing on the tools and elements of e-learning and personal learning focusing more about pedagogy and strategies to cater for different learner styles and abilities.

Meaningful E-learning - Ubiquitous learning: This can be defined as an everyday learning environment that is supported by mobile and embedded computers and wireless networks in our everyday life (Ogata et al. 2009)[1]. It is aimed to provide learners with content and interaction anytime and anywhere (Hwang et al. 2008)[2]. Ultimately, ubiquitous learning aims at **customising content objects, activities, and interaction with the system and with other humans (including teachers and peers)** according to learner's current goals of learning, interests and preferences, cognitive characteristics, history and current state of competency in the subject matter in hand, the characteristics and demands of the location, the technology being used as the medium and facilitator for learning, and the context of the situation in which the learning is taking place (Graf, 2012)[3]. Findings have shown that ubiquitous significantly enhance learning effectiveness, especially for low-achieving students (Huang & Chiu, 2015)[4], which matches our school need of catering for large learner diversity.

Table 1. Comparisons of context-aware u-learning systems and m-learning systems

Item \ Learning system	M-Learning System	Context-Aware U-Learning System
Awareness of learner contexts	By accessing the learning portfolio database.	By accessing the learning portfolio database and sensing the personal contexts (e.g., location and body temperature) and environmental situations of the learner in the real world.
Accessing learning services or teaching materials	Learners actively access the system via wireless networks. That is, the learning system usually provides services passively.	The system actively provides personalized services to the learners based on the learner's contexts.
Content of the learning portfolio	Recording the online behaviors of the learner.	Recording the online behaviors, the real-world behaviors and the corresponding environmental information of the learner.
Personalized support	Based on the learner's profile and online behaviors in the database.	Based on the personal behaviors and environmental situations of the learner in the real world.
Seamless learning feature	Changing learning devices or learning in moving will interrupt the learning activities.	Learning services will not be interrupted even though the learner is moving from place to place and the environment (including the learning devices and the networks) is changing.

Instead of trying to incorporate all the above criteria to create a perfect ubiquitous learning environment, our school hopes to step-by-step take the merits of M-Learning and Context-Aware U-Learning, which are both narrower focus of ubiquitous learning. Elements such as **customising content subjects** via developing school-based materials and other supporting e-tools such as Search Engine, Auto-checking Tool) that **facilitates diverse classroom and out-of-classroom learning activities** on the e-system will be referenced in this project. An individual learning portfolio for each student will be developed on e-system, and shows learners' goals of learning and learning history. The past and current state of competency will also be analysed by the auto-analysing engine embedded in the e-system. As ubiquitous learning emphasises the flexibility of learning that can happen anywhere, anytime, the e-system should be developed to be easy to be accessed via electronic devices of all sorts.

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[2] Hwang, G.-J., Tsai, C.-C., & Yang, S. J. H. (2008). Criteria, strategies and research issues of context-aware ubiquitous learning. Educational Technology & Society, 11(2), 81–91.

[3] Kinshuk, Graf, S. (2012). Ubiquitous Learning. In: Seel, N.M. (eds) Encyclopedia of the Sciences of Learning. Springer, Boston, MA. https://doi.org/10.1007/978-1-4419-1428-6_224

[4] Huang, Yueh-Min & Chiu, Po-Sheng. (2015). The effectiveness of the meaningful learning-based evaluation for different achieving students in a ubiquitous learning context. Computers and Education. 87. 243-253. 10.1016/j.compedu.2015.06.009.

Meaningful E-learning - Personal Learning: Part of the ubiquitous learning touches on personal learning, which is another key of our project. Today, one primary task of educators involves determining how best to utilize available technology resources to enhance student learning. There is evidence showing that computers can help students improve their performance on standardized tests (Ringstaff & Kelley, 2002)[5], and that "student-centered approaches are better suited to fully realizing the potential of computer-based technology". To effectively teach with technology, teachers must shift their instructional practices from a teacher-centered lecture approach to a more student-centered learning or constructivist approach (Jonassen, 2000). Personal Learning approach is one of the student-centred approaches, where the school-curriculum leaves learning space for teachers to address learners' actual learning needs and problems. According to Shaikh and Khoja (2012)[6], setting up a Personal Learning Environments (PLE) requires considerable planning. Teacher needs to be innovative and knowledgeable regarding where and how to locate the resources he needs. He not only knows clearly why the need of a PLE should be introduced to students, but also, how learning technologies can be incorporated with curriculum to make possible collaborative learning (Peña-López, 2010)[7]. Instructive and cognitive skills raise new requirements to teacher competencies in knowledge and skill level. According to Mullen (2010)[8], "teachers need to get accustomed to and trained on their new role as partners and facilitators in learning processes, rather than lecturers". Minocha et al. (2011)[9] adds that one of the changing roles that this new learning phenomenon has created for teachers is that of a facilitator who help learners adapt their PLEs, scaffold learning, and manage the content before it becomes more complex (Global Teacher, 2010)[10].

A U.S. Department of Education (2000)[11] report indicates that: Teachers must be comfortable with technology, able to apply it appropriately, and conversant with new technological tools, resources, and approaches. If all the pieces are put into place, teachers should find that they are empowered to advance their own professional skills through these tools as well. We therefore have put heavy emphasis on teachers' professional training as one of the project goals, to equip our professional team with innovate knowledge of conducting more personal teaching.

New teaching strategy: A top-down approach for teaching reading comprehension

Due to the limited lesson time and the need to equip students with the necessary skills to tackle the reading exam, teachers tend to overlook the importance of activating students' schemata or prior knowledge of the target text. It is of paramount importance to provide students with background information in the pre-reading stage and emphasize the top-down approach to discourage students from focusing too much on words and sentences when processing the target text. Against this backdrop, teachers may merely work on the meaning of words and go over the reading comprehension exercise with students (AD-Heisat et al., 2009)[12], which does little to help students improve their reading proficiency.

That said, advocating the top-down approach may challenge students with mediocre language proficiency. For this reason, an interactive model which involves metacognitive reading strategies should come into play. With the interactive model, teachers can engage students with the text by combining their schematic knowledge and expanding the meaning of the text, especially when they need to figure out the attitude of the writer, the gist of the text, and the central idea that the writer intends to convey (Babashamsi et al., 2013)[13]. When the e-system is in place, teachers can adopt the best reading strategies that suit their students' needs and abilities. As our students are usually weak at answering questions that require an extended response or are related to the writer's attitude and the purpose of a particular paragraph, the e-system can serve as a tool for teachers to figure out what types of extended response questions need class discussion. As teachers adopt metacognitive reading strategies to monitor students' comprehension and support students in achieving global reading, students will be guided to keep the purpose of reading in mind when approaching a text (Ali & Razali, 2019)[14].

6. Implementation plan with timeline

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Schedule	Details	Relevance to Objectives (Ob)	People Involved
Pre-project	*Hold Internal Meeting for Project Preparation: Set school-based e-system criteria and directions within panel*	*Obj II: Align panel needs & expectations*	*Project Team and members*
Jun - Jul 24	• Undergo Procurement Process; Meet Consultants and I.T. Developer; Confirm Development Timeline and Direction • Co-plan, develop and review e-resources for Term 1 • Professional Training Workshop 1 (Theme: Designing E-curriculum and E-system & Self-directed Learning) • Professional Training Workshop 2 (Theme: Data-driven Teaching) • Finalise materials and develop e-content and e-assessment (See Appendix 1 Samples) • Form meetings and curriculum planning and fine-tuning • Project Introduction to Parents **via seminar/e-campus**	*Obj I-III: Align school expectations with service provider to ensure needs met, prepare students for self-directed and personalised learning support* *Obj IV: Enhance teachers profession capacity and prepare for project launch* *Obj V: engage parents and their support to the project*	*Project Team and members Consultants, I.T. Developer, Trainer, S.6 Students*
Aug - Dec 24	• Ongoing parallel co-plan, develop and review e-resources • S.4-6 Student Training and e-learning on e-system • Application of new pedagogy in teaching and learning (both classroom and self-directed learning) • Informal joint lesson planning and reflection on new pedagogy and use of e-system and e-resources • Ongoing peer lesson observation and professional exchange • Ongoing learning, analysis and reporting on e-system • Mid-project review with S.4-6 students and teachers • Ongoing documentation of project proof	*Obj I-III: Ensure quality of deliverables; review use and effectiveness* *Obj IV: Complement T+ Standard profession sharing and community* *Obj V: collect parents' feedback*	*Project Team and members Consultants, I.T. Developer, S.3-6 Students, S.3-6 Parents*
Dec 24 - Jan 25	• Professional Training Workshop 3 (Theme: Data-driven Teaching with Actual Data and Professional Exchange) Ongoing co-plan, develop and review e-resources for Term 2 (Priorities: S.6-S.5 > S.4 > S.3) • Form-level Curriculum adjustments • Mid-project sharing at Joint School Staff Development Day (if any)	*Obj I-III: Enhance quality of deliverables based on previous experience* *Obj IV: Complement profession knowledge*	*Project Team and members Consultants, I.T. Developer, Trainer, Other teachers and educators*
Dec 24 - May 25	• Develop, review resources for Term 2 and enhance e-system and e-resources • Continuous ubiquitous and personalised e-learning on e-system with newly developed resources • Design self-directed paths for classes, especially S.6 • S.3 Student training and conduct e-learning on e-system as bridging for senior form curriculum • Assign summer assignment on platform to S.3-5 • End-Project review with S.3-6 students and teachers • Document project proof and prepare for dissemination • Project evaluation, dissemination, publication and sharing	*Obj I-III: Make use of deliverables to further enhance learning and teaching* *Obj IV: Accumulate professional proficiency in conducting personalised e-learning teaching*	*Project Team and members Consultants, I.T. Developer, S.4-6 Students, Parents, Other teachers and educators*

Detailed schedule for co-planning, development and review of e-resources *(Priority: S.6 & S.5 →S.4 →S.3)*

	S.6	S.5	S.4	S.3
Jun 2024				
Jul 2024				

Aug 2024				
Sep 2024				
Oct 2024				
Nov 2024				
Dec 2025				
Jan 2025				
Feb 2025				
Mar 2025				
Apr 2025	Public Exam			
May 2025				

 : Teachers, consultants and service provider co-plan and develop e-resources
 : Teachers review E-resources
 : Teachers and Students conduct e-learning on school-based e-system
 : Feedback: Teachers Review/Student User Survey/ Parents Feedback

Blue: Term 1
Orange: Term 2

7. Teachers' and Principals' Involvement in the Project

Principal

Supervise overall project planning, development and design; Provide managerial and administration assistance; Allocate and mobilise resources needed for the project; Arrange with Sik Sik Yuen and N.T. Principal for possible project dissemination, Ensure sustainability of project activities.

Project Team

Project Lead: English Panel Chair

Lead project planning, development and design; Monitor and review project deliverables in accordance to timeline; Assist and plan sustainable use of project deliverables; Encourage project members involve in project participation

Key Members: S.6 Coordinator, S.5 Coordinator, S.4 Coordinator and Junior Form Panel Chair

Facilitate project development and monitor project status; Meet service provider and consultants; Co-plan and review project deliverables in accordance to timeline; Make internal and external arrangements for workshop, seminar and project dissemination; Prepare dissemination materials such as survey and project relevant proof

Project Members: (All English panel members and Teaching Assistants)

Assist leading team on project implementation, curriculum planning and co-planning; Co-review deliverables and provide feedback; Attend professional workshops and apply new teaching strategies in daily teaching; Arrange co-lesson planning sessions and peer observation; Collect student feedback

Language Consultant and Curriculum Planner (External)

Meet and provide advice on deliverable requirements; Share experience on curriculum adjustments and project execution; Conduct teacher professional workshop and introduce data-driven personalised teaching planning approach, assist panel members in applying new pedagogy.

8. Budget

Nature	Item	Justification	Amount ($)
Service	**Teacher Trainer for Professional Development Workshops (22 hrs) – *Obj IV*** - Preparation and Conducting Workshops (10 hrs) 1) E-curriculum Design, Self-directed Learning 2) Data-Driven Teaching 3) Data-Driven Teaching with Actual Data (2 hrs/workshop + 1-1.5 hrs/preparation) - Lesson Co-plan, Observation & Debriefing (3 hrs x 1 class x 4 forms = 12 hrs)	Professionalism: Approximately 8 years of experience in English Education; Experience in self-directed, data-driven learning and teaching, and other school-based developments is preferred. Each workshop has a unique focus and prepares and supports teachers' learning of new pedagogy and application	**22,660 ($1030*22hrs)**

	Learning/Language Consultant and the team of English editors (266 hrs) – *Obj II & III* **E-curriculum Design (12 hrs)** - Co-plan and co-design e-curriculum on use of core and personalised tasks **(3 hrs x 4 forms)** **E-resources Development (126 hrs)** - Co-develop, review and proofread 28 core tasks, and skill categorise each question (2 hrs x 28 tasks = 56 hrs) - Co-plan, review and proofread and skill categorise the 700 e-questions, its relevant reading sources + Write, edit, review and proofread learning notes (Estimated hours = 70 hrs) **Part-time Smart E-assessment Editor** **E-assessment Criteria & Accuracy (128 hrs)** - Co-develop, Co-plan and programme e-assessment criteria for 28 core tasks, each task around 20-30 questions/task (1 hrs x 28 tasks = 28 hrs) 700 questions (Estimated hours = 50 hrs) + Review accuracy + Test Run (with I.T. Developer) - Mid-& End-Project E-assessment Enhancement: Scanning 480 S.3-6 students' actual answers in all completed work (both 28 core tasks and 700 questions) throughout the year and enlarge e-assessment key scope based on students' answers (Estimated hours: 50 hrs) *Costs of extra/future hours of fine-tuning e-assessment key will be borne by the school.*	Professionalism: Approximately 6 years of experience in English Education and E-Curriculum Design. E-curriculum Design meetings for micro fine-tuning of form level curriculum, discussing strategies to meet the needs of different levels of learning and draft sample personalised tasks for future use. The hourly rate will be shared among the team of consultant and editors working on the project parallelly to speed up development (Jun-Aug24 & Dec24-Jan25). More development hours are spent on co-developing the e-assessment criteria, ensuring the marking accuracy. The marking accuracy is one crucial element of this project in facilitating self-directed learning tasks, thus the answer key will be enhanced with students' actual input during mid- & end-project. Future Mid- and End-Project fine-tuning of the language assessment criteria are expected to ensure accuracy in the long run.	**159,600 ($600*266hrs)**
Service	**IT System Builder – *Obj I & III*** **1) One-off E-system purchase/tailoring/license** School-based learning management system, individual accounts, account group communities, security, stability testing, feature plug-in, courseware, multiple device compatibility, system training/manual **2) Cloud service and database** Real-time synchronisation, auto-save data input, security, database, host content, e-resources bank, common error accumulation **3) Tailoring and Integrating e-assessment tools** - Search engine and auto-task creation for teachers to design and assign personalised tasks - E-marking engine that are compatible with all kinds of e-assessment criteria and complex marking - Auto-analysing students' results, strengths and weaknesses based on results	I.T. Developer with experience in building learning systems for secondary schools and proven technology /programming for e-assessment features is preferred. E-system continuation, maintenance and upgrade, as well as cloud storage after the project period will be covered by other school funding. It is expected to be used in the long-run for English learning from S.3-6. These tools are specially designed to assist school-based learning and teaching purposes, compatible with one another for all 28 core tasks and all tasks	**100,000** **30,000** **150,000**

	- Auto-reporting tool to convert raw analysis into school-based template (design included) for review and share use - Instant Display of students' answer in a systematic way for teaching purposes and giving individual assistance **4) Content Programming** - Content programming and adaptation Design school-based reader interface, adjustable to screen size, support text and graphic appearance; support different question format - Programming e-assessment criteria Programming commands that read answers, detect meaning, and make marking judgement based on a series of marking criteria (Meeting time and programme enhancement for marking accuracy included during project year)	created from the e-question bank with 700+ questions. Reading content involves a large variety of texts and graphics and also line number, which changes according to screen size. These have to be specially programmed to ensure readability. Due to the variations and large range of complexity in question format and criteria	**80,000**
General Expenses	Audit Fee Dissemination Materials - 500 Project Sharing Booklets - E-version of project highlights	A print/electronic form of project dissemination will be considered for external sharing, joint school professional development, QEF seminar (if invited), SSY & NTSHA programmes, with educators, parents and students.	**5,000** **5,040** *Other costs will be borne by the school.*
		Total:	**552,300**

9. Deliverables, Expected Project Outcomes and Evaluation

Objective 1 – Deliverables: 1.1 A more comprehensive and structured e-learning curriculum and learning model supported by a tailored school-based e-system and resources; 1.2 A tailored school-based e-system

Expected Outcome	1) Increased e-learning and self-directed learning opportunities; 2) New personalised learning elements in the school curriculum; 3) Systematic learning paths shown clearly on portfolios
Evaluation Method, Target, and Criteria	1) Survey with Project Team/Leader: i) All deliverables developed; ii) All of senior form teachers and students have their own individual account on system and more than 90% have conducted learning and teaching on e-system; iii) 100% e-learning during the project year are well-documented on their teaching and learning portfolio. 2) Teacher Survey (S.3-6 Only): Over 70% of teachers agree that i) more meaningful teaching space is created for catering for learner diversity; ii) curriculum becomes more meaningful and comprehensive with e-system tailored; iii) more instant and personalised assistance based because of instant auto-marked tasks and auto-reports.

Objective 2 – Deliverables: 2.1 Well-selected 28 sets of Core Practices (including reading materials, questions, e-assessment criteria, answer key, smart answer key, learning notes, skill categorisation);
2.2 Comprehensive e-question bank with 700 questions for personalised learning (categorised questions for teachers to search, and create personalised tasks for individual groups of learners)

Expected Outcome	1) Increased English practices and performance in general; 2) Increased self-directed learning tasks with much better support; 4) More well-suited tasks and levelled learning assistance
Evaluation Method, Target, and Criteria	1) Teacher and Student Survey: Over 70% of teachers and learners agree that i) self-directed learning is better guided and supported; ii) more personal learning chances are created; iii) there are more English reading opportunities. 2) Statistics from E-system: i) At least 70% of students show improvement in English (1st task VS last task completed); ii) Over 70% of target tasks are completed. 3) Focus Group Interview with Students: Collect qualitative feedback on the classroom and self-directed e-support in developing reading skills

Objective 3 – Deliverables: An integrated platform with tailored learning and assessment tools such as e-submission and e-marking engine, search engine and task creation function, auto-analysing and auto-reporting tool, auto-record and display of learner error; storing of ongoing learning data etc.

Expected Outcome	1) Much shortened feedback loop; 2) Better understanding of learners' individual strengths and weaknesses → more targeted teaching; 3) More transparent learning data for enrichment and enhancement; 4) Easier tailoring of personal task for catering learner diversity
Evaluation Method, Target, and Criteria	Teacher and Student Survey: More than 70% of teachers agree that i) feedback giving is more efficient, meaningful and targeted; ii) they have a better understanding on students'/self's reading strengths and weaknesses; iii) More learning data is obtained for adjusting teaching focus and pace and revision purpose; iv) More efficient in giving/getting personal assistance and personal support.

Objective 4 – Deliverables: 3 Teacher Training Workshops: 1) E-curriculum Design, Self-directed Learning (Jun-Aug 24); 2) Data-Driven Teaching (Jun-Aug 24); 3) Data-Driven Teaching with Actual Data (Dec 24-Jan 25)

Expected Outcome	1) More professional insight on e-curriculum design; 2) More knowledge and capacity on supporting students' self-directed learning and its integration with classroom learning; 3) More confidence in micro-adjusting teaching focus based on learners' needs and learning data
Evaluation Method, Target, and Criteria	1) Teacher Survey: i) More than 80% teachers have attended the workshops; More than 70% of teachers ii) have tried using or used e-system in classroom teaching or assigned personal tasks on e-system; iii) are able to conduct more effective teaching based on learners' weaknesses and errors; iv) are more confidence in a data-drive teaching approach and micro-tuning teaching focus based 2) Focus Group Interview: Collect qualitative feedback on i) Professional observations from students; ii) Pedagogical insights

Objective 5 – Deliverables: 5.1 Parents Seminar/E-Sharing on Project Introduction; 5.2 Ongoing reports

Expected Outcome	1) Better understanding on school-supported self-directed learning; 2) More ongoing learning data from school for review; 3) More parental engagement in school project
Evaluation Method, Target, and Criteria	Parents' Survey: More than 70% of parents agree that they have better understanding of their children's 1) self-directed learning; 2) performance, strengths and weaknesses

11. Sustainability of Project Outcomes

The major deliverables of this project, including the comprehensive school-based **e-system and e-resources,** which are all **one-off development** in this project, will be used for at least 5-7 years of our future years of teaching, learning and assessment. It is on our blueprint to make learning meaningful by integrating systematic e-learning and well-supported self-directed learning into our regular English curriculum to cater for learner diversity.

While we do not expect major changes of the e-system and its tools, we do have plans to spare **future funding**, be it from school internal resources or other sources, on **system maintenance, e-answer key enhancement, and e-resources content upgrade**. The 28 core practices are likely to be used continuously with the coming 5-7 cohorts, as these practices are chosen to be included in this project for their quality and effectiveness in enhancing students' English reading skills. We will consider expanding the question bank though, depending on learners' needs and teachers' feedback on tailoring personal learning tasks.

As for sustainability of teacher professionalism, we will **accumulate and pass on good data-driven teaching practices** on to future senior form teachers, therefore when designing the e-system with the IT programmers, we would ensure that **tailored practices can be transferred** among teachers' accounts. Good practices will also be shared internally, inter-panels and also during dissemination to benefit a larger group of educators. If necessary, we will also consider videotaping lessons for demo purposes. All reports and well-support self-directed materials will continue to be shared with parents of future batches via Parents' Night or other channels.

12. Dissemination/Promotion of Project Outcomes

We hope to disseminate our project journey, outcome and insights with teaching staff from our school and educators from other schools and organisations throughout the project period. Here is the tentative schedule and plan:

Time*	Occasion // Target Audience	Objectives
Term 1 and/or Term 2	Sharing during Joint School Staff Development Day (if any)	• To introduce project aims and direction

Dec 24 -Jan 25	Internal sharing with other subject panels in Ho Fung College	• To introduce and showcase developed deliverables such as e-system, e-resources and tools etc. • To share Term 1 outcome and insights on re-structuring e-learning curriculum and learning model with tailored school-based e-system and resources • To share some experience and plans on personalised teaching and learning and future enhancements • To exchange professional insights
Jan-Feb 25	Sharing at Sik Sik Yuen Learning and Teaching Enhancement Programmes	
May 25	Sharing at New Territories School Heads Association and its member schools	• To share publish project outcome and insights on ubiquitous e-learning and self-directed learning integration and catering for learner diversity through personalised teaching and learning • To publish project highlights in print form (500 copies) and upload electronic version for interested schools and teachers, and greater community • To inspire and encourage schools with similar developmental goals and vision
May 25	Seminar at QEF Dissemination Events with other interested educators (if invited)	
May 25	School Website – General public, parents, students	

**Subject to different parties' availability and the pandemic situation*

Report Submission Schedule

The school commits to submit proper reports in strict accordance with the following schedule:

Project Management (Should be submitted via the "Electronic Project Management System" (EPMS))		**Financial Management** (Hard copy together with supporting documents should be submitted to the QEF Secretariat by mail or in person)	
Type of report and reporting period	**Report due on**	**Type of report and reporting period**	**Report due on**
Final Report 01/06/2024 - 31/05/2025	31/08/2025	Final Financial Report 01/06/2024 - 31/05/2025	31/08/2025

Remarks

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Appendix 1 – Simple illustration of E-resources Development

1.1 Extract of Sample practice to be developed as core e-practices

S5 English Language: Reading Practice for Enhancement – Unit 1 – Question-Answer Book

Read the text and answer questions 1-15. (32 marks)

1. What is the tone of William Lee in paragraph 2?

A. sarcastic

B. assertive

C. indifferent

D. aggressive

2. Which phrase in paragraph 2 could be replaced with 'likewise'?

_____

3. The table below shows the reasons and its corresponding evidence for repatriation of cultural relics and antiques mentioned in paragraphs 2 to 5. Complete the table by using a maximum of TWO words that best fit the sentence. Your answers must be grammatically correct. (5 marks)

Reason	Evidence
The stolen cultural relics and antiques should be returned out of natural justice. It is (i) _____ to repatriate the items to the country of origin as the (ii) _____ of the cultural property is dubious and unlawful.	The Chinese bronze heads of the rat and rabbit were stolen by the (iii) _____ from the Old Summer Palace of Emperor Qianlong during the Second Opium War.
Natural justice can be (iv) _____ when repatriation happens.	A French art collector returned the heads to China, (v) _____ to preserve national heritage and (vi) _____ the historical and cultural importance of the cultural relics and antiques.

4. What does the 'bronzes' (line 29) refer to?

_____

5. According to paragraph 6, what are TWO arguments Betty Wong gives to argue against the repatriation of the bronze heads? (2 marks)

(i) _____

(ii) _____

6. What example is given in paragraph 7 to illustrate why cultural relics and artworks should belong to the country of origin?

_____

7. Find a word in paragraph 8 which has a similar meaning to 'delicate'. _____

8. What does Mike Lee mean when he says "in their original context" (line 76)?

_____

1.2 Rough Ideas and Examples of resources to be developed:
(1) Skills Categorisation
(2) Assessment Criteria: Model Answer
(3) Smart Answer Key
(4) Explanation to the question

(1) Skills Categorisation

<table>
<tr><td>Inference: Inferring Tone</td><td>1. What is the tone of William Lee in paragraph 2?
A. sarcastic
B. assertive
C. indifferent
D. aggressive
(2) Assessment Criteria: Model Answer</td></tr>
<tr><td>Vocabulary: Paraphrase</td><td>2. Which phrase in paragraph 2 could be replaced with ‘likewise’?
_____</td></tr>
<tr><td>Thematic: Summary</td><td>3. The table below shows the reasons and its corresponding evidence for repatriation of cultural relics and antiques mentioned in paragraphs 2 to 5. Complete the table by using a maximum of TWO words that best fit the sentence. Your answers must be grammatically correct. (5 marks)
(2) Assessment Criteria: Alternative answers
<table>
<tr><th>Reason</th><th>Evidence</th></tr>
<tr><td>The stolen cultural relics and antiques should be returned out of natural justice. It is (i) _____ to repatriate the items to the country of origin as the (ii) _____ of the cultural property is dubious and unlawful.</td><td>The Chinese bronze heads of the rat and rabbit were stolen by the (iii) Anglo-French/foreign soldiers from the Old Summer Palace of Emperor Qianlong during the Second Opium War.</td></tr>
<tr><td>Natural justice can be (iv) _____ when repatriation happens.</td><td>A French art collector returned the heads to China, (v) _____ to preserve national heritage and (vi) _____ the historical and cultural importance of the cultural relics and antiques.</td></tr>
</table></td></tr>
<tr><td>Reference: Noun phrases</td><td>4. What does the ‘bronzes’ (line 29) refer to?
_____</td></tr>
<tr><td>Factual</td><td>5. According to paragraph 6, what are TWO arguments Betty Wong gives to argue against the repatriation of the bronze heads? (2 marks)
(i) Pinault didn’t return the heads out of appreciation of the cultural value of the antiques.
(3) Smart Answer Key: Smart auto-checking engine to recognise long questions</td></tr>
<tr><td>Factual</td><td>6. What example is given in paragraph 7 to illustrate why cultural relics and artworks should belong to the country of origin?
_____
(4) Explanation to the question
Explanation:
The answer to Question 6 is …. Refer to line 88 in paragraph 7, it is said that the cultural relics…</td></tr>
<tr><td>Vocabulary: Synonym</td><td>7. Find a word in paragraph 8 which has a similar meaning to ‘delicate’.
_____</td></tr>
<tr><td>Inference – Inferring meaning</td><td>8. What does Mike Lee mean when he says “in their original context” (line 76)?
_____</td></tr>
</table>

1.3 Example of personalised tasks based on strengths and weaknesses

Personalised Task 1 (Classroom or Self-directed)
Target: Students weak in **Vocabulary** questions (extracted from data on the e-system)
Search: Search 'Vocabulary questions' from Question Bank
Search results:

Vocabulary: Paraphrase	2. Which phrase in paragraph 2 could be replaced with 'likewise'? _____
Vocabulary: Synonym	7. Find a word in paragraph 8 which has a similar meaning to 'delicate'. _____

Personalised Task 2 (Classroom or Self-directed)
Target: Students weak in **Factual** questions (extracted from data on the e-system)
Search: Search 'Factual questions' from Question Bank
Search results:

Factual	5. According to paragraph 6, what are TWO arguments Betty Wong gives to argue against the repatriation of the bronze heads? (2 marks) _____
Factual	6. What example is given in paragraph 7 to illustrate why cultural relics and artworks should belong to the country of origin? _____

Personalised Task 3 (Classroom or Self-directed)
Target: Students weak in **Inference** questions (extracted from data on the e-system)
Search: Search 'Inference questions' from Question Bank
Search results:

Inference: Inferring Tone	1. What is the tone of William Lee in paragraph 2? A. sarcastic B. assertive C. indifferent D. aggressive
Inference – Inferring meaning	8. What does Mike Lee mean when he says "in their original context" (line 76)? _____

Expected Outcome:

- Tailored task with clearer and more specific learning objectives based on students' latest learning needs (data-driven teaching and learning
- Tasks assigned to different groups of students with different weaknesses to better cater for learner diversity
- More bite-size and additional practices to consolidate and assist learners' diverse learning needs
- Auto-checked answers and explanation for learners to support self-directed learning
- Data recorded for students, teachers and parents' review and for ongoing data collection and performance analysis to support self-directed learning and data-driven teaching and learning