



**Final Report of Project**

**Project No. : 2009 / 0099**

**Part A**

Project Title: iAssessment (移動學習評估)

Name of Organization/School: St. Paul's Secondary School (聖保祿中學)

Project Period: From 5 / 2010 (month/year) to 8 / 2011 (month/year)

**Part B**

*Please read the Guidelines to Completion of Final Report of Quality Education Fund Projects before completing this part of the report.*

Please use separate A4-size sheets to provide an overall report with regard to the following aspects:

1. Attainment of objectives
2. Project impact on learning effectiveness, professional development and school development
3. Cost-effectiveness – a self-evaluation against clear indicators and measures
4. Deliverables and modes of dissemination; responses to dissemination
5. Activity list
6. Difficulties encountered and solutions adopted

*\* Final Report of Project prior to the 8<sup>th</sup> call should be signed by the supervisor of the school/the head of the organization or the one who signed the Quality Education Fund Agreement for allocation of grant on behalf of the organization.*

*\* Final Report of Project under the 8<sup>th</sup> and subsequent calls should be submitted via "Electronic Project Management System" (EPMS). Once submitted, these reports are regarded as already endorsed by the supervisor of the school/the head of the organization or the one who signed the Quality Education Fund Agreement for allocation of grant on behalf of the organization.*



## Final Report of Quality Education Fund Projects

### 1. Attainment of Objectives

Objective statement	Activities related to the objective	Extent of attainment of the objective	Evidence or indicators of having achieved the objective	Reasons for not being able to achieve the objective, if applicable
(i) To develop effective school-based online assessment strategies to integrate into both inside and outside classroom learning and teaching	Highlighted Activity	Fully achieved	CAITE, CUHK Research Report#  Section 12.1 Section 12.2	N/A
(ii) To promote students' learning through effective monitoring of their progress and the provision of feedback to them upon such monitoring	Highlighted Activity	Fully achieved	CAITE, CUHK Research Report#  Section 12.1 Section 12.2	N/A
(iii) To increase students' motivation through the use of familiar technology and latest contents	Activity 5 Activity 6 Activity 7 Activity 8 Activity 11 Activity 12 Activity 21	Fully achieved	Table 1: Project Activities	N/A
(iv) To enhance teachers' professional development in the areas of assessment and mobile learning	Activity 9 Activity 10 Activity 15 Activity 20	Fully achieved	Table 1: Project Activities	N/A

#### Highlighted Activity: Use of iAssessment Portal in classrooms

##### *English*

- 8 custom made learning modules, 2 chapters in each modules, i.e. a total of 16 learning chapters

##### *Liberal Studies*

- 5 custom made learning modules, 2 chapters in each modules, i.e. a total of 10 learning chapters

Reference materials: <http://aero.spss.edu.hk/~mlai/qef/lessons.pdf>  
<http://aero.spss.edu.hk/~mlai/qef/appendixI.pdf>  
<http://aero.spss.edu.hk/~mlai/qef/appendixII.pdf>

# [http://aero.spss.edu.hk/~mlai/qef/research\\_report.pdf](http://aero.spss.edu.hk/~mlai/qef/research_report.pdf)

**Table 1: Project Activities**

Activity	Date	Time	Venue	Name of Activities	No. of Participants
1	3 Jun	2:30 – 4:30 p.m.	Rm. A121	Meeting with the (Confirmation of programme and contents requirements)	10
2	21 Jun	2:30 – 4:00 p.m.	Rm. A121	Meeting with the (Reporting the development progress)	9
3	4 Aug	2:30 – 4:00 p.m.	Rm. A121	Meeting with the (Reporting the development progress and it was informed by the that they had consulted the university consultant about the research, the first meeting would be held in Dec 2010)	8
4	20 Aug	10:00 – 11:15 a.m.	Rm. A121	Meeting with the (Confirmation of developed features of the portal)	8
5	21 Sept – 8 Oct	1:05 – 1:35 p.m.	Lang. Lab	tutorial classes (Exploring the usage of in learning)	350
6	21 Sept – 8 Oct			Writing Competition on the usage of (Topic: write an English article in about 200 words to describe how can be used in Education for learning and teaching effectively)	15
7	21 Sept – 29 Oct	3:55 – 5:10 p.m.	Library	Promotion on the features of the portal (Students had first-hand experience by borrowing and exploring the portal)	107
8	11 Oct – 29 Oct	Computer Literacy Lessons	Computer Room	Lessons on the portal (Introduction of the portal to Form 1 to Form 3 students)	Form 1 to Form 3
9	15 Oct	2:30 – 3:45 p.m.	Hall	Staff Development Day – “Workshop on in Learning” (Training given to teachers)	65
10	19 Oct	1:45 – 2:25 p.m.	Lang. Lab	Workshop for Geography Department (Introduction of specific applications, such as the Google Map and Google Earth)	4
11	Nov onwards	Weekly		Weekly Apps Promotion (Two students were responsible for describing four applications every week on how those applications could be used in learning and teaching)	
12	1 Nov – 19 Apr	4:00 – 5:15 p.m.	Library	Promotion on the features of the portal (Students had first-hand experience by borrowing and exploring the portal)	95
13	2 Dec	4:10 – 5:15 p.m.	Rm. A121	Meeting with the (Confirmation on and review of questions for LS and English lesson materials)	8



14	4 Jan	2:30 – 4:00 p.m.	Rm. A121	Meeting with the (Reporting the development progress)	8
15	6 Jan	2:30 – 5:30 p.m.	Hong Kong Productivity Council	Sharing of the QEF project (Organized by the Mobile Learning Specialist Group of WTIA)	150
16	14 Mar	4:00 – 5:30 p.m.	Rm. A121	Meeting with the (Confirmation on the developed features of the portal)	3
17	13 Apr	12:45 – 1:40 p.m.	Rm. A121	Meeting with the (Arrangement for CUHK lesson observation)	7
18	19 Apr	2:00 – 5:30 p.m.	Rm. A121	Meeting with the QEF Staff (Review of all project documents)	2
19	3 May	8:50 – 4:40 p.m.	Rm. A126	The CUHK school visit (Lesson Observation and Interviews)	10 teachers and 10 students
20	20 May	8:45 – 9:30 a.m.	Hall	Staff Development Day – “Sharing of the QEF project” (Presenting the project summary to teachers)	65
21	18 May – 5 June			apps competition (Topic: Suggest some useful apps for the in the aspect of learning and teaching)	10

## 2. Project Impact on Mobile Technology Makes Learning Engaging and On Demand

The goal of this project is to improve student performance and teaching in English and Liberal Studies. The objectives are (1) to promote students’ learning through effective monitoring of their progress, and (2) to increase students’ motivation through the use of familiar technology and the latest contents.

Students need to sharpen their English listening skill in order to prepare for the HKDSE Examination. Extracting the critical issue and identifying details from listening are two skills that this project targeted. Another subject that is targeted by this project is Liberal Studies. This project provides vast volume of learning resources on Liberal Studies to enable students to make connections among different disciplines, examine issues from a variety of perspectives, and construct personal knowledge.

A learning portal, named the Media Sharing Portal (M.S. Portal), was designed to empower students through a series of educational tools for optimal learning. On the M.S. portal, students can:

- select learning resources of their interest
- learn from text-based and multimedia materials to cater to the needs of visual and auditory learners
- discuss and share comments on learning materials
- answer open-ended questions designed by teachers
- learn collaboratively and cooperatively with other students under teachers’ guidance

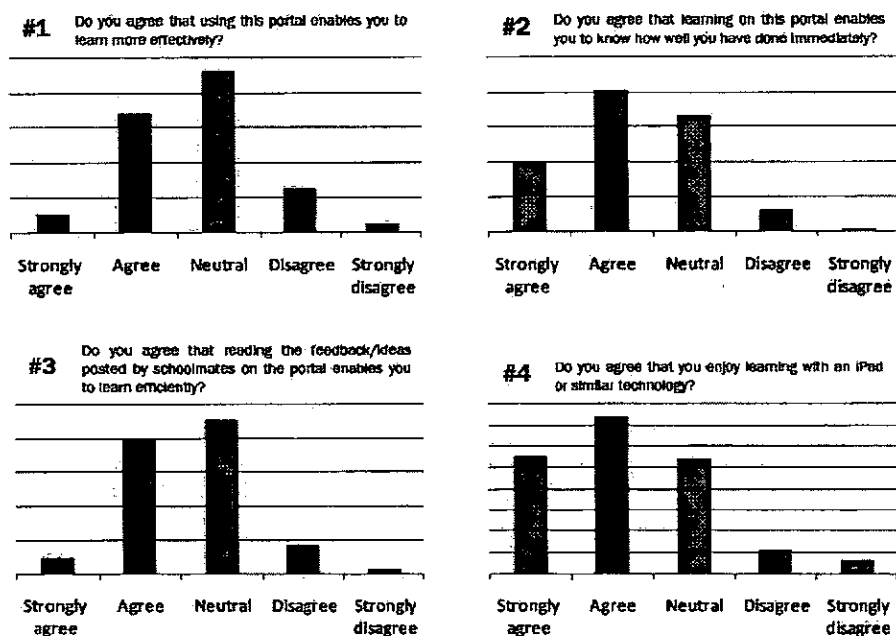


The M.S. Portal makes use of mobile technology that students can access anytime and anywhere. While our school has provided iPads for students to use in class, they can always access the portal from other computing devices such as desktop computers or notebook computers.

The features of the portal are as follows:

1. Sharing of Multimedia elements e.g. video, photo and audio
  - o Teachers can upload subject-related video, photo or mp3 audio clips to the portal. The elements are classified into different categories and can be searched by key words.
2. Discussion forum
  - o Students can comment on video, photo or audio clips uploaded by teachers and express their own opinions.
3. Key question
  - o Teachers can post questions related to subject matters and invite students to give responses. Students' responses will be used for formative assessment.
4. Collaboration board
  - o Students form their own groups and comment on a given topic. Students' comments will be automatically organized according to their respective groups and saved in the portal.
5. Assessment Report
  - o The portal generates an easy-to-read summary in spreadsheet format for teachers to review students' progress. The summary can assist teachers in streamlining their assessment tasks.

An independent research has been conducted by the Centre for the Advancement of Information Technology in Education, CUHK, from May to June 2011 to measure the effectiveness of this project. According to the survey results, the majority of students agree that the portal helps.





### 3. Cost-effectiveness

**Table 2: Budget Checklist**

<b>Budget Items</b> (Based on Schedule II of Agreement)	<b>Approved Budget</b> (a)	<b>Actual Expense</b> (b)	<b>Change</b> [(b)-(a)]/(a) +/- %
Staff Cost	\$13,500.00	\$13,500.00	0%
General Expenses	\$24,000.00	\$26,000.00	+8.3%
Services	\$384,100.00	\$375,000.00	-2.4%

### 4. Deliverables and Modes of Dissemination

**Table 3: Dissemination Value of Project Deliverables**

<b>Item description</b> (e.g. type, title, quantity, etc.)	<b>Evaluation of the quality and dissemination value of the item</b>	<b>Dissemination activities conducted (e.g. mode, date, etc.) and responses</b>	<b>Is it worthwhile and feasible for the item to be widely disseminated by the QEF? If yes, please suggest the mode(s) of dissemination.</b>
iAssessment portal for formative assessment, data analysis and report generation	A total of 16 LS lesson plans and 10 English lessons plans developed.  400 online resources have been bookmarked.  200 subject-related questions have been composed.	To be used at school for the next three years by LS/Eng and other subject departments.	Other schools can set up their own iAssessment portal or use the existing portal <a href="http://ms2.wiseman.com.hk">http://ms2.wiseman.com.hk</a>  Demonstration Account:  Username: student.1 Password: spss  Technical manual: <a href="http://aero.spss.edu.hk/~mlai/qef/tech_manual.pdf">http://aero.spss.edu.hk/~mlai/qef/tech_manual.pdf</a>
Assessment kits (formative assessment tools, peer assessment criteria, assessment of student thinking)	A variety of assessment modules were built to evaluate the performance of students which will be used to calculate the term marks of students.	To be used at school for the next three years by LS/Eng and other subject departments.	No. The assessment kits have been tailor-made for the school, other schools are recommended to develop their own rubrics.

Training manual for teachers and student user guide	It is a comprehensive user guide for teachers and students to learn how to use the portal.	Sent as attachment by email to all teachers and students of the school.  Teacher Manual <a href="http://aero.spss.edu.hk/~mlai/gef/teacher.pdf">http://aero.spss.edu.hk/~mlai/gef/teacher.pdf</a> Student Manual <a href="http://aero.spss.edu.hk/~mlai/gef/student.pdf">http://aero.spss.edu.hk/~mlai/gef/student.pdf</a>	Other schools can download to learn how to use the portal.
Multimedia learning library	About 400 subject-related online learning resources and 200 questions were created and used by various subject teachers who found them useful.	Uploaded to the portal as a resource bank for various subjects.  <a href="http://aero.spss.edu.hk/~mlai/gef/technician.zip">http://aero.spss.edu.hk/~mlai/gef/technician.zip</a>	
Newsletter	It is the summary of the project.  Brief introduction to new users.	1079 copies have been distributed to students and parents in November, 2011.  Other schools could access through school website at <a href="http://www.spss.edu.hk/QEF2009_0099.pdf">http://www.spss.edu.hk/QEF2009_0099.pdf</a>	Share this good practice with other local and overseas schools.
Project Report	The Pros and Cons of the project have been addressed in the report.	Shared the report findings with 68 school teachers.  <a href="http://aero.spss.edu.hk/~mlai/gef/research_report.pdf">http://aero.spss.edu.hk/~mlai/gef/research_report.pdf</a>	A good reference for other schools which are going to carry out similar project.

Based on the research report, it was worth nothing that the portal could provide an auto-scoring feature and it saved teachers' effort. With this feature, students could know their scores once they had completed the online tasks. However, this feature cannot improve students' learning. It has been proved that active participation of the teachers and their feedback are more important than the auto-scoring feature.

The iAssessment portal is also a video sharing portal with up-to-date content, such as video clips and animations, which did increase students' learning motivation.

In this project, teachers were given the opportunities to teach in the way of one-to-one computing, teachers learnt and found a way to support students to learn individually and collaboratively in order to achieve increasing students' participation, collaboration and interaction. All these were new experiences to the teachers which were beneficial to their professional development.



## 5. Activity List

**Table 4: Activity List**

Types of activities (e.g. seminar, performance, etc.)	Brief description (e.g. date, theme, venue, etc.)	No. of participants				Feedback from participants
		schools	teachers	students	others (Please specify)	
Tutorial	Tutorial Class 21/9 – 8/10 1:05 – 1:35 p.m. Lang. Lab			350		Refer to the survey below
Competition	Writing Competition on the usage of 21/9 – 8/10 Online Submission			15		
Lesson	Lessons on the iAssessment portal 11/10 – 29/10 Computer Room			525		
Workshop	Workshop on in Learning 15/10 2:30 – 3:45 p.m. School Hall		68			
Workshop	Workshop for Geog. Dept. 19/10 1:45 – 2:25 p.m. Lang. Lab		4			
Seminar*	Sharing of the QEF project 6/1 2:30 – 5:30 p.m. HKPC				100 members of WTIA	* <a href="http://aero.spss.edu.hk/~mlai/qef/wtia.pdf">http://aero.spss.edu.hk/~mlai/qef/wtia.pdf</a>
Seminar	Sharing of the QEF project 20/5 8:45 – 9:30 a.m. School Hall		68			Refer to the survey below
Competition	apps competition 18/5 – 5/6 Online Submission			10		



A survey had been conducted in April 2011 for both students and teachers, the results were as follows:

For students:

		Disagree				Agree
1.	I agree that the portal can provide different topics for discussion so as to enhance my critical thinking and analytical skills.	4.49%	17.77%	42.09%	27.73%	7.92%
2.	I agree that the portal should be used more frequently to enhance the effectiveness of teaching and learning.	3.60%	15.51%	43.71%	28.59%	8.59%
3.	I agree that the portal has enhanced self-directed learning.	3.99%	17.82%	44.01%	25.12%	9.06%

**More than 30% of students agreed** that the portal was useful in learning and teaching.

For teachers:

		Disagree				Agree
1.	I agree that the Media Sharing Portal can provide students with a portal to see different perspectives and to enhance their critical thinking and analytical skills.	10.20%	2.04%	34.69%	44.90%	8.17%
2.	I agree that the Media Sharing Portal should be used more frequently to enhance the effectiveness of teaching and learning.	8.00%	8.00%	32.00%	36.00%	16.00%
3.	I agree that the Media Sharing Portal has enhanced self-directed learning.	10.00%	6.00%	24.00%	48.00%	12.00%

**More than 50% of teachers agreed** that the portal was useful in learning and teaching.

## 6. Difficulties Encountered and Solutions Adopted

The project was carried out according to the proposed schedule and objectives.

**Appendix: Functionality Test Result and Letter of Confirmation of Copyright Matters of the iAssessment Portal**