

添 付 資 料

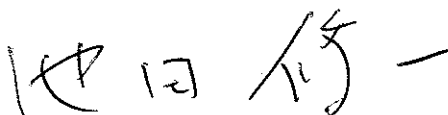
1. ミニッツ・合同評価レポート
2. PDM (2004年6月1日版)
3. PDM 2 (2005年7月12日版)
4. 評価の方法・評価グリッド
5. インタビュー結果概要 (教育省)
6. インタビュー結果概要 (教員教育・運営開発センター)
7. インタビュー結果概要 (TTC 教官)

**MINUTES OF MEETING
BETWEEN
THE JOINT MID-TERM EVALUATION TEAM
AND
THE AUTHORITIES CONCERNED OF THE GOVERNMENT OF
THE LAO PEOPLE'S DEMOCRATIC REPUBLIC
ON
JAPANESE TECHNICAL COOPERATION
FOR
THE PROJECT FOR IMPROVING SCIENCE AND MATHEMATICS
TEACHER TRAINING (SMATT)**

The Joint Mid-term Evaluation Team (hereinafter referred to as “the Team”), organized by both the Ministry of Education and the Japan International Cooperation Agency (hereinafter referred to as “JICA”), had a series of discussions to review the progress of the Project for Improving Science and Mathematics Teacher Training (hereinafter referred to as “the Project”) and to clarify the necessary actions for further improvement of the Project.

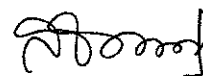
As a result of the discussions, the Team finalized the Joint Mid-Term Evaluation Report attached hereto and agreed to submit it to the Lao authorities concerned.

Vientiane, 19 May 2006



Mr. Shuichi IKEDA
Team Leader of Japanese Side,
Joint Mid-term Evaluation Team,

Deputy Resident Representative,
JICA Laos Office



Mrs. Sengdeuane LACHANTHABOUN
Team Leader of Lao Side,
Joint Mid-term Evaluation Team,

Director General,
Department of Teacher Training,
Ministry of Education,
Lao People's Democratic Republic

ATTACHED DOCUMENT

JOINT MID-TERM EVALUATION REPORT
ON
THE PROJECT
FOR
IMPROVING SCIENCE AND MATHEMATICS
TEACHER TRAINING (SMATT)

19 May, 2006

28

40

List of Abbreviations

C/P	Counterpart(s)
DGE	Department of General Education
DPC	Department of Planning and International Cooperation
DTT	Department of Teacher Training
ICT	In-Country Training
JCC	Joint Coordination Committee
JFY	Japanese Fiscal Year
JICA	Japan International Cooperation Agency
Lao PDR	Lao People's Democratic Republic
MOE	Ministry of Education
MOF	Ministry of Finance
PA	Pedagogical Adviser
PDM	Project Design Matrix
PMU	Project Management Unit
PO	Plan of Operation
TEADC	Teacher Education and Administration Development Center
TG	Teaching Guide
TIJ	Training in Japan
TOR	Terms of Reference
TTC	Teacher Training College
TTEST	Teacher Training Enhancement and Status of Teachers Project
TTS	Teacher Training School
WS	Workshop

TABLE OF CONTENTS

1. Introduction 1

1-1 Preface 1

1-2 Objectives of the Evaluation 1

1-3 Schedule of the Team 1

1-4 Joint Evaluation Team Members 2

2. Methodology of the Evaluation 3

2-1 Points of the Evaluation..... 3

2-2 Collection Methods of Information and Data..... 3

3. Results of the Evaluation 3

3-1 Achievements of the Project..... 3

3-1-1 Outputs 4

3-1-2 Project Purpose..... 4

3-1-3 Overall Goal 4

3-2 Implementation Process of the Project 4

3-3 Evaluation by Five Criteria 4

3-3-1 Relevance 4

3-3-2 Effectiveness..... 4

3-3-3 Efficiency 4

3-3-4 Impact 5

3-3-5 Sustainability..... 5

4. Recommendations..... 5

ANNEXES

ANNEX 1: Outline of the Project

- 1-1 Project Design Matrix (Version 2) revised in July 2005
- 1-2 Plan of Operation

ANNEX 2: Evaluation Grid

- 2-1 Table of Achievement
- 2-2 Implementation Process of the Project
- 2-3 Evaluation by Five Criteria

ANNEX 3: Inputs to the Project

- 3-1 List of Japanese Experts
- 3-2 List of Equipment Provided by JICA
- 3-3 Contribution by Lao Side and Japanese Side for Operational Expenses
- 3-4 Participants' List of Training in Japan (TIJ)
- 3-5 Number of Participants of Workshop (WS) and In-Country Training (ICT)
- 3-6 List of Counterparts Personnel Assigned for the Project

ANNEX 4 Implementation Organization Chart of the Project

ANNEX 5 List of Interviewees

ANNEX 6 Forms of Questionnaire (English and Lao)

1. Introduction

1-1 Preface

JICA has collaborated with the government of the Lao People's Democratic Republic in implementing the Project for Improving Science and Mathematics Teacher Training (herein after referred to as "the Project"). The Project started on 15 June 2004 with the cooperation period of four (4) years.

Since the first half of the cooperation period has passed, the Joint Mid-term Evaluation Team (hereinafter referred to as "the Team") was organized from 8 to 19 May 2006, for the purpose of evaluating the achievements of the Project. The mid-term evaluation has been jointly undertaken by the Team.

1-2 Objectives of the Evaluation

Objectives of the mid-term evaluation are as follows:

- (1) to review and evaluate the inputs, activities and achievements of the Project,
- (2) to clarify the problems and issues to be addressed for the successful implementation of the Project for the remaining period,
- (3) to assess the rationale of the continuation of the Project based on review and the comprehensive evaluation from the viewpoints of five criteria, and
- (4) to make recommendations for activities in the remaining period.

1-3 Schedule of the Team

Date	Activity
7 May (Sun)	Arrival in Vientiane
8 May (Mon)	Meeting among the Japanese Team Members, Project, and JICA Expert Courtesy Call on DPC, MOE (Director General) Courtesy Call and Interview with DTT, MOE (Director General) Interview with the Japanese Expert for the Project (SMATT)
9 May (Tue)	Meeting among the Joint Evaluation Team Members Interview with TTEST (Team Leader)
10 May (Wed)	Interview with TEADC Interview with Vientiane Capital Education Service (Director) (Previous Deputy Director, DTT, MOE) Interview with DTT, MOE Move to Luang Prabang
11 May (Thu)	Survey in Luang Prabang TTC
12 May (Fri)	Survey in Luang Prabang TTC Move to Vientiane Interview with the JICA Expert (Educational Advisor)
13 May (Sat)	Drafting Documents

Date	Activity
14 May (Sun)	Drafting Documents
15 May (Mon)	Meeting among the Joint Evaluation Team Members Move to Bankeun Survey in Bankeun TTC
16 May (Tue)	Survey in Bankeun TTC Move to Vientiane
17 May (Wed)	Meeting among the Japanese Team Members, Project, and JICA Expert Meeting among the Joint Evaluation Team Members Interview with Bankeun TTC (Director and Deputy Director)
18 May (Thu)	Meeting among the Japanese Team Members, Project, and JICA Expert Meeting among the Joint Evaluation Team Members
19 May (Fri)	Signing on Minutes of Meeting Reporting to Embassy of Japan / JICA Laos Office
20 May (Sat)	Departure from Vientiane

1-4 Joint Evaluation Team Members

<Laotian Side>

Mrs. Sengdeuane LACHANTHABOUN	Project Manager	Director General, Department of Teacher Training, MOE
Mr. Ly Foung	PMU Member	Deputy Director, Department of Teacher Training, MOE
Mr. Maaly VORABOUTH	PMU Member	Technical Staff, Department of Teacher Training, MOE
Mr. Keth PHANHACK		Technical Staff, Department of Teacher Training, MOE
Mr. Manosinh MASAVONGDY		Technical Staff, Department of General Education, MOE
Mr. Phonechanh KHAMBOUNPHANH		Deputy of Sciences Division, National Research Institute for Educational Science

<Japanese Side>

Mr. Shuichi IKEDA	Team Leader	Deputy Resident Representative, JICA Laos Office
Mr. Shigeru MIYAJIMA	Training Evaluation	Associate Expert, Department of Human Development, JICA Headquarter
Mr. Yoshihisa HARA	Evaluation/ Analysis	Researcher, VSO Co. Ltd.,
Mr. Hiroshi KAWAGOE	Cooperation Planning	Assistant Resident Representative, JICA Laos Office
Mrs. Vithanya NOONAN	Cooperation Planning	Assistant Program Officer, JICA Laos Office

2. Methodology of the Evaluation

2-1 Points of the Evaluation

Evaluation was implemented following JICA Guideline for Project Evaluation. The Team evaluated performance of the Project, implementation process of the Project, and five evaluation criteria based on the Project Design Matrix (hereinafter referred to as “PDM”) approved by Joint Coordinating Committee on 12 July 2005 as a guideline of the evaluation together with the Plan of Operation.

Five criteria are:

a. Relevance	Relevance of the Project is reviewed by the validity of the Project in connection with the development policy of the Government of Lao PDR.
b. Effectiveness	Effectiveness is assessed by the achievement of the Project Purpose clarifying the relationship with outputs.
c. Efficiency	Efficiency is analyzed with the emphasis on the relationships between outputs and inputs in terms of timing, quality and quantity.
d. Impact	Impacts of the Project are assessed in both positive and negative influences caused by the Project.
e. Sustainability	Sustainability of the Project is assessed whether the achievement of the Project will be sustained and expanded after the Project’s completion.

2-2 Collection Methods of Information and Data

The team collected the information and data by:

- review of the documents and reports
- questionnaire prior to interview
- interview

3. Results of the Evaluation

After the data gathering, the achievement of the Project is interpreted into the result of evaluation through discussions among the Team.

3-1 Achievements of the Project

3-1-1 Outputs

Most of the outputs are likely to be achieved with the conscious effort of both Lao and Japanese sides. However, the number of “good examples worth to be informed or praised” is considered less. The details are shown in ANNEX 2-1.

3-1-2 Project Purpose

The Project Purpose was not assessed on this evaluation based on the Objectively Verifiable Indicators described on the PDM. It is because the Objectively Verifiable Indicators are relied on the evaluation done by the short-term experts. However, the Team found the signs of improvement of the quality of TTC/TTS teachers and their positive attitude towards the continuation of the training programs.

Therefore, the Project is on the track to achieve the Project Purpose.

3-1-3 Overall Goal

Even it is too early to discuss the possibility of attainment of Overall Goal, there are appearances of the progress based on the Objectively Verifiable Indicators described on the PDM.

With reference to the logical relationship between Project Purpose and Overall Goal, however, the Team recognized the necessity of reconsideration.

3-2 Implementation Process of the Project

The details are shown in ANNEX 2-2.

3-3 Evaluation by Five Criteria

The result of the evaluation by five criteria is summarized below. For details, see ANNEX 2-3.

3-3-1 Relevance: High

The Project is considered relevant in the following regards:

- The government of Lao PDR gives priority to basic education as the way of human resource development in National Growth and Poverty Eradication Strategy and Millennium Development Goals Progress Report.
- Qualitative improvement of education is one of the prioritized sectors of Japanese ODA policy for Lao PDR.
- TTC/TTS teachers are willing to improve their teaching capability.
- The Project gives no conflict and no confusion on the TTC/TTS teachers even other projects which targets TTC/TTS teachers is running.

3-3-2 Effectiveness: Good

- Most of the outputs are likely to be achieved and contribute to the achievement of Project Purpose.

3-3-3 Efficiency: Good

- Inputs from both Lao and Japanese sides have been appropriate in terms of quantity, quality, and timing.
- Most of activities have been implemented as planned and were contributed to the accomplishment of the Outputs.

3-3-4 Impact: Positive impact observed

- TTC/TTS teachers have started the dissemination of the teaching methods introduced by the Project to primary/lower-secondary teachers. They also apply the acquired methods to their lessons for student-teachers.

3-3-5 Sustainability: Too early to say

- The teaching methods introduced by the Project has already been recognized and accepted by TTC/TTS teachers. It is considered to be settled through their lessons with some modifications to suit the situation of Lao PDR.
- Some TTC/TTS are trying to find the way of conducting their own training not only for TTC/TTS teachers but also for primary/lower-secondary teachers nearby.

4. Recommendations

The Team recommends that the PMU should establish a clear vision and strategy of the Project. In short, the PMU should discuss such as what the Project should achieve and how to utilize the achievements of the Project.

Based on the clarified Project strategy, then, the Team suggests consideration of the following points, in particular.

1) Revision of PDM

There are some points which are logically unclear and defined ambiguously. For example, relationship between Project Purpose and Overall Goal does not seem logical. Thus, after the clarification of the vision and strategy of the Project suggested as mentioned above, Narrative Summary and Objectively Verifiable Indicators for both Project Purpose and Overall Goal should be re-considered.

2) Effective Implementation of Class Observation

Although practice of class observation is regarded as an effective method to improve TTC/TTS teachers' capability, it seems that TTC/TTS teachers do not exactly understand what class observation is and how it should be implemented. Therefore, the Team recommends that the PMU clarifies the definition, implementing method, reporting system,

etc. and re-inform them to TTC/TTS for the promotion of effective implementation.

3) Re-confirmation of the Purpose of the Teaching Guides (TGs)

Though the PMU has instructed how to use the developed TGs in TTC/TTS, some TTC/TTS teachers are confused about the purpose of the TGs. The PMU expects the TGs to be used especially for teaching methodology classes in TTC/TTS, and also in primary/lower-secondary schools when student-teachers go to teaching practice and start their service as professional teachers. Thus, the Team requests that the PMU should re-confirm the usage of the TG for TTC/TTS teachers.

4) Re-identification of Project Implementation Structure and Its Roles

It is observed that roles of the PMU and each member's duties are not clear. This has led to the situation that planning and preparation of the Project's activities have mainly relied on the Japanese Long-Term Expert for the Project. It is proposed that the Expert should transfer her/his activities and duties to counterparts as much as possible. The similar situation has been observed at TTC/TTS counterparts' level. Although their responsibilities are defined, it is hard to say that they have played such roles in the Project implementation. Furthermore, some members of the PMU have been changed from the original members and organizational structure within DTT is considered to be changed.

Considering these circumstances, the Team suggests re-identification of Project implementation structure including PMU within MOE regarding the following points: members of PMU, duties of each PMU member, relation and cooperation with the concerned divisions and departments such as pre-service division and evaluation division in DTT and DGE. In addition, in order to enhance the communication and coordination among members of the PMU and the concerned personnel, the Team strongly recommends to hold weekly Project staff meeting, and organizing quarterly Project meeting, which JICA representatives and Japanese Educational Advisor in DTT also attend.

5) Effort for the Promotion of Knowledge/Information Sharing and Dissemination

The Project is planned to disseminate the acquired knowledge/information from TIJ. However, the measures to be realized this seem insufficient. For example, extension activities besides teaching in WS/ICT are also expected to be implemented more actively by the TIJ participants.

Since it is considered that the knowledge/information which TIJ participants acquired is useful for the improvement of teaching methodology in the primary/lower-secondary schools as well as TTC/TTS, the Team recommends that DTT should take possible measures to promote such initiatives.

6) Monitoring

Monitoring trip of the PMU members is essential activity to understand the progress of the Project and actual situation of the target group. This kind of activity provides the PMU with the opportunity to convey and confirm its instructions and suggestions, which helps better and effective Project implementation.

Moreover, the Team suggests that DTT continue to monitor the sustainability of the Project through MOE's inspection for TTC/TTS even after the Project is over.

SS

LP

<p>Project Design Matrix No.2 (PDM 2 : Revision of PDM 1) Project Title : Project for Improving Science and Mathematics Teacher Training Duration of the Project : 4 years (15/June/2004-14/June/2008) The target of the Project : TTS and TTC teachers, and those from TEADC and the Department of Teacher Training in the Ministry of Education, Culture, Sports, Science and Technology Overall Goal Teacher Training in the field of science and mathematics will be upgraded.</p>	<p>Version 2 12-Jan-03 Incomplete Assumptions</p>	<p>Means of Verification</p>	<p>Participants of TU, WS, and ICT do not quit their job. Enough budget for trainings is approved by MOP</p>
<p>Number of trainings held in each TTC/TTS</p>	<p>Until 2008 (at the end of the SMATT Project), average evaluation score of the class observation will be increased more than or equal to 10 % of the first score in all subjects. Until 2008, the score of indispensable knowledge test will be more than or equal to 50/100 in all subjects. Analyze the change of the relation between questionnaire for teaching method and indispensable knowledge test. To make it, draw a graph using data of questionnaire for teaching method as x axis, and indispensable knowledge test as y axis, and check which direction each teacher moves on the graph. Class observation will be implemented once a month in general classes of all TTC/TTS.</p>	<p>JICA experts and counterparts will jointly prepare evaluation sheets, questionnaire for teaching methodology, tests for indispensable knowledge. Conduct pre-project (baseline) survey and post-project survey. Analyze data of questionnaire and test. Reports from directors of TTC/TTS</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>
<p>Results of two evaluations, for lecturers by PMU and experts, and for evaluation to participants by lecturers, are more than 3.5/5.0 every year. As a result of the evaluation for activity reports submitted by TU participants, good examples worth to be informed or praised will be increased year by year.</p>	<p>Results of two evaluations, for participants of WS by PMU and experts and for participants of ICT by PMU are more than 3.0/5.0 every year. As a result of the evaluation of the requests and reports submitted by WS/ICT participants, good examples worth to be informed or praised will be increased year by year.</p>	<p>After WS, JICA experts and counterparts jointly evaluate the performance of lecturers. And after ICT, counterparts evaluate the performance of lecturers. TU participants submit activity reports not later than the end of May every year. Reports are translated into English and evaluated by both Lao side and Japanese side between WS.</p>	<p>After WS, JICA experts and counterparts jointly evaluate participants. And after ICT, counterparts evaluate participants. Participants of WS/ICT submit budget requests and reports for their activities.</p>
<p>When teachers teach the topics which is introduced in the teaching guides, at least 80% of TTC/TTS teachers use the teaching guides. At the final year of the Project, a collection of teaching guide is published.</p>	<p>When teachers teach the topics which is introduced in the teaching guides, at least 80% of TTC/TTS teachers use the teaching guides. At the final year of the Project, a collection of teaching guide is published.</p>	<p>Reports from directors of TTC/TTS Questionnaire to teachers Publication of the collection of teaching guides (final year)</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>
<p>To train candidates of science and mathematics leaders TU implementation organizations give lectures on Japanese school system, education system and teacher training system. TU implementation organizations make participants to compare educational situation of Lao PDR and Japan. TU implementation organizations give lectures and practices on subjects and method. TU implementation organizations give lectures on the knowledge which obtained in TU. Japanese short-term experts offer lectures necessary advices on their lectures and evaluation. TU Participants present their demonstration activities on Review meeting. Implement class observation in general classes.</p>	<p>To train people in the target except above-mentioned 1 [WS, ICT] Lecturers (participants of TU) give lectures on Japanese school system, education system and teacher training system. [WS, ICT] Lecturers (participants of TU) make participants to compare educational situation of Lao PDR and Japan. [WS, ICT] Lecturers (participants of TU) give lectures and practices on subjects.</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>
<p>To prepare teaching guides TU implementation organizations make participants to prepare tentative teaching guides on some topics which are difficult for TTC/TTS students and students of primary and lower secondary schools to understand. Lecturers and short-term experts make participants to confirm teaching guides. Lecturers give lectures by using teaching guides prepared after WS.</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>	<p>Participants of TU, WS, and ICT do not quit their job.</p>

Plan of Operation	2004												2005												2006												2007												2008											
	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12
Activities to implement																																																												
1. Training in Japan																																																												
2. Confirm topic planning of 2005 and 2006																																																												
3. Make General information (by JICA)																																																												
4. To select tentative applicants based on the past data																																																												
5. To send letters for request of recommendation to TTC/TTS																																																												
6. To receive reply of 1-4 from TTC/TTS																																																												
7. (on the workshop evaluation meeting) To select applicants of TIJ																																																												
8. To inform applicants to JICA HDQ																																																												
9. To inform TIJ participants for preparation																																																												
10. Make passport of participants																																																												
11. Meeting with participants of TIJ																																																												
12. To send participants to Japan																																																												
13. Implementation of TIJ																																																												
14. Meeting with participants after TIJ																																																												
15. To receive reports from participants of TIJ																																																												
16. To translate reports from participants of TIJ																																																												
17. To evaluate reports from participants of TIJ																																																												
18. Workshop																																																												
19. To decide venue																																																												
20. To select tentative applicants based on the past data																																																												
21. To open the preparation meeting to decide program																																																												
22. To request cooperation for practical classes to primary/lower secondary schools																																																												
23. To send tentative schedule to TIJ Implementation Organizations																																																												
24. To confirm schedule																																																												
25. To send letters to TTC/TTS to recommend participants																																																												
26. To receive reply of 2-7 from TTC/TTS																																																												
27. To decide participants																																																												
28. To list up necessary materials																																																												
29. To buy necessary materials																																																												
30. To implement Workshop																																																												
31. (on the workshop evaluation meeting) To select participants of TIJ																																																												
32. To prepare report																																																												
(Review Meeting)																																																												
33. To decide presenters on each subject																																																												
34. To implement review Meeting																																																												
35. In-country Training																																																												
36. To make program																																																												
37. To decide lecturers on each topic																																																												
38. Collect final lesson plans																																																												
39. Translate final lesson plans into English																																																												
40. To send lesson plans to TIJ implementation organization																																																												
41. To implement teaching guide meeting																																																												
42. To get approval of MOE on the teaching guide																																																												
43. To print the Teaching Guides																																																												
44. To decide participants																																																												
45. To list up necessary materials																																																												
46. To buy necessary materials																																																												
47. To implement ICT																																																												
48. To prepare report																																																												
49. other activities																																																												
50. Joint Coordinating Committee																																																												
51. Base-line survey																																																												
52. Meeting with Directors of TTC/TTS and evaluators																																																												
53. Class observation (in TTC/TTS level)																																																												
54. Monitoring																																																												
55. Activities to capacity building																																																												
56. Mid-term Evaluation																																																												
57. Final Evaluation																																																												

22

22

1. Table of Achievements

Evaluation Items	Confirmation Items	Sources	Results										
Overall Goal Teacher Training in the field of science and mathematics will be upgraded.	Number of trainings held in each TTC/TTS	Record of the Project	SMATT has supported the following number of training programs: Dongkhamxang 2, Salavan 2, Savannakhet 2, Luang Namtha 1, Khangkhai 1										
Project Purpose Quality of TTC and TTS teachers in science and mathematics will be improved	- Until 2008 (at the end of the SMATT Project), average evaluation score of the class observation will be increased more than or equal to 10 % of the first score in all subjects	Baseline survey (2004)	The result of baseline survey conducted in 2004 is as follows: <table border="1" data-bbox="359 772 494 987"> <tr><td>Math</td><td>2.5/5.0</td></tr> <tr><td>Physics</td><td>3.0/5.0</td></tr> <tr><td>Chemistry</td><td>3.1/5.0</td></tr> <tr><td>Biology</td><td>2.7/5.0</td></tr> <tr><td>Average</td><td>2.8/5.0</td></tr> </table> (Each subject's score is the average of 12 classes in 5 TTC/TTS.)	Math	2.5/5.0	Physics	3.0/5.0	Chemistry	3.1/5.0	Biology	2.7/5.0	Average	2.8/5.0
Math	2.5/5.0												
Physics	3.0/5.0												
Chemistry	3.1/5.0												
Biology	2.7/5.0												
Average	2.8/5.0												
	- Until 2008, the score of indispensable knowledge test will be more than or equal to 50/100 in all subjects	Baseline survey (2004)	There is no current survey result available to compare. A survey to measure the achievement of the Project is planned in October 2007. The result of baseline survey conducted in 2004 is as follows: <table border="1" data-bbox="550 772 686 987"> <tr><td>Math</td><td>16.0/100</td></tr> <tr><td>Physics</td><td>22.0/100</td></tr> <tr><td>Chemistry</td><td>34.3/100</td></tr> <tr><td>Biology</td><td>26.9/100</td></tr> <tr><td>Average</td><td>22.1/100</td></tr> </table> (Each subject's score is the average of 121 teachers in 8 TTC/TTS.)	Math	16.0/100	Physics	22.0/100	Chemistry	34.3/100	Biology	26.9/100	Average	22.1/100
Math	16.0/100												
Physics	22.0/100												
Chemistry	34.3/100												
Biology	26.9/100												
Average	22.1/100												
	- Analyze the change of the relation between questionnaire for teaching methods and indispensable knowledge test. To make it, draw a graph using data of questionnaire for teaching methods as x axis, and indispensable knowledge test as y axis, and check which direction each teacher moves on the graph	Baseline survey (2004)	There is no current survey result available to compare. A survey to measure the achievement of the Project is planned in October 2007. Result of the questionnaire to teachers for their teaching methods conducted in 2004 was 4.0/5.0 (The score is the average of 121 teachers in 8 TTC/TTS.)										
	- Class observation will be implemented once a month in general classes of all TTC/TTS	Reports from TTC/TTS	The total frequency of class observation reported as of May 2006 is: 25 times in 2004-2005 Academic year 51 times in 2005-2006 Academic year										
Output 1 Participants of TIJ got the knowledge of subjects, teaching method in TTC/TTS and guide/evaluate in WS/ICT	- Results of two evaluations, for lecture by PMU and experts, and for evaluation to participants by lecturers, are more than 3.5/5.0 every year	Evaluation sheets after WS and ICT	3.6/5.0 (2004 WS, Pakse and Luang Prabang) 3.8/5.0 (2005 ICT, Savannakhet) 3.6/5.0 (2005 WS, Bankeun) 3.8/5.0 (2006 ICT, Salavan)										
	- As a result of the evaluation for activity reports submitted by TIJ participants, good examples worth to be informed or praised will be increased year by year	Number of good reports selected after WS (2005)	TIJ participants are considered that they got the knowledge of subjects, teaching methods in TTC/TTS and guide/evaluate in WS/ICT. Three (3) good reports (Math 1, Chemistry 1, and Biology 1) were selected and three teachers got certificates and prizes.										

<p>Output 2 Participants of WS/ICT got the knowledge of subjects and teaching method in TTC/TTS</p>	<p>- Results of two evaluations, for participants of WS by PMU and experts and for participants of ICT by PMU are more than 3.0/5.0 every year</p>	<p>Evaluation sheets after WS and ICT</p>	<p>3.3/5.0 (2004 WS, Pakse and Luang Prabang) 3.8/5.0 (2005 ICT, Savannakhet) 3.2/5.0 (2005 WS, Bankeun) 3.6/5.0 (2006 ICT, Salavan)</p> <p>WS/ICT participants are considered that they got the knowledge of subjects and teaching methods in TTC/TTS</p>															
<p>Output 3 The collection of teaching guides for TTC/TTS is developed and utilized</p>	<p>- As a result of the evaluation of the requests and reports submitted by WS/ICT participants, good examples worth to be informed or praised will be increased year by year</p> <p>- When teachers teach the topics which is introduced in the teaching guides, at least 80% of TTC/TTS teachers use the teaching guides</p>	<p>Questionnaire to participants in WS and ICT</p>	<p>None</p> <p>Utilization of TG (teaching guides) For TG (2) – Product of TIJ in 2003 and WS in 2004 the result of questionnaire to the participants in WS (2005) and ICT (2006)</p> <table border="1" data-bbox="422 739 526 996"> <tr> <td></td> <td>2005 WS</td> <td>2006 ICT</td> </tr> <tr> <td>Math</td> <td>93.0%</td> <td>95.3%</td> </tr> <tr> <td>Physics</td> <td>100.0%</td> <td>100.0%</td> </tr> <tr> <td>Chemistry</td> <td>92.3%</td> <td>89.3%</td> </tr> <tr> <td>Biology</td> <td>100.0%</td> <td>100.0%</td> </tr> </table> <p>As the result of questionnaire, many TTC/TTS teachers use TG when they teach the specific topics covered by TG. On the other hand, some of TTC/TTS teachers considered that TG is not suited for themselves. This idea comes from that those TTC/TTS teachers have not yet understand the purpose and function of TG.</p> <p>TG (2), TG (3) has already published and distributed to all the teachers in TTC/TTS. Additionally, several copies of TG have already been distributed to primary and lower-secondary schools through TTC/TTS.</p> <p>Thus, the collection of TG would be published on the last year of the Project as the Activities continue.</p>		2005 WS	2006 ICT	Math	93.0%	95.3%	Physics	100.0%	100.0%	Chemistry	92.3%	89.3%	Biology	100.0%	100.0%
	2005 WS	2006 ICT																
Math	93.0%	95.3%																
Physics	100.0%	100.0%																
Chemistry	92.3%	89.3%																
Biology	100.0%	100.0%																
<p>Activities 1. To train candidates of science and mathematics leaders</p>	<p>1-1 [TIJ] TIJ Implementation organizations give lectures on Japanese school system, education system and teacher training system</p>	<p>Interview to TIJ implementation organizations</p>	<p>The implementation organization conducted the training on Japanese school system, education system and teacher training system in every TIJ.</p> <p>The following table shows: the training hours on Japanese education/ total training hours</p> <table border="1" data-bbox="526 593 574 739"> <tr> <td></td> <td>2004</td> <td>2005</td> </tr> <tr> <td></td> <td>44 hours / 207 hours</td> <td>64 hours / 234 hours</td> </tr> </table> <p>The implementation organization conducted the training which makes the participants compare educational situation of Lao PDR and Japan in every TIJ.</p> <p>The training for the comparison was conducted within the training on Japanese education.</p>		2004	2005		44 hours / 207 hours	64 hours / 234 hours									
	2004	2005																
	44 hours / 207 hours	64 hours / 234 hours																
	<p>1-2 [TIJ] TIJ Implementation organizations make participants to compare educational situation of Lao PDR and Japan</p>	<p>Interview to TIJ implementation organizations</p>	<p>The implementation organization conducted the training which provides lectures and practices on subjects and methods for specific topics in every TIJ.</p> <p>The following table shows: the training hours on the subject/ total training hours</p> <table border="1" data-bbox="574 593 622 739"> <tr> <td></td> <td>2004</td> <td>2005</td> </tr> <tr> <td></td> <td>163 hours / 207 hours</td> <td>170 hours / 234 hours</td> </tr> </table>		2004	2005		163 hours / 207 hours	170 hours / 234 hours									
	2004	2005																
	163 hours / 207 hours	170 hours / 234 hours																
	<p>1-3 [TIJ] TIJ Implementation organizations give lectures and practices on subjects and method</p>	<p>Interview to TIJ implementation organizations</p>	<p>The implementation organization gave lectures and practices how to evaluate a lesson in TIJ.</p>															
	<p>1-4 [TIJ] TIJ Implementation organizations give lectures on evaluation</p>	<p>Interview to TIJ implementation organizations</p>																

L8

	The training for the evaluation was conducted within the training on the subject. TIJ participants gave lectures on the knowledge which obtained in TIJ.	Interview to Short-term experts and evaluators		
1-5 [WS/ICT] Lecturers (participants of TIJ) give lectures on the knowledge which obtained in TIJ	Interview to Short-term experts and evaluators			Short-term experts provided not only suggestions or advice but also some lectures on teaching methods and Japanese education.
1-6 [WS] Japanese short-term experts offer lecturers necessary advices on their lectures and evaluation	Interview to Short-term experts, Project coordinator and Counterparts			On Review Meeting, TIJ participants presented their activities conducted. The number of the presentation was limited and the content of the reports did not meet the expectation of short-term experts. However, both of number of presentation and its content improved in WS in the succeeding year after the instruction given by the experts.
1-7 [WS] TIJ Participants present their dissemination activities on Review meeting	Reports from TTC/TTS			The total frequency of class observation reported as of May 2006 is 25 times in 2004-2005 Academic year 51 times in 2005-2006 Academic year
1-8 [ordinary] Implement class observation in general classes	Interview to Short-term experts and evaluators			TIJ participants gave lectures on Japanese school system, education system and teacher training system.
2. To train people in the target except above-mentioned 1	Interview to Short-term experts and evaluators			TIJ participants conducted the training which makes the participants compare educational situation of Lao PDR and Japan in every TIJ.
	Interview to Short-term experts and evaluators			TIJ participants train the teachers through the practice of trial class and practical class.
	Reports from TTC/TTS			The total frequency of class observation reported as of May 2006 is 25 times in 2004-2005 Academic year 51 times in 2005-2006 Academic year
3. To prepare teaching guides	Existing tentative teaching guides			Tentative TG (3) and TG (4) were prepared by 3rd TIJ participants and 4th TIJ participants respectively. 3 topics/subject × 4 subjects × 2 years
	Interview to Short-term experts and evaluators, Final lesson plan			The TG was confirmed through discussion.
	Evaluators			Evaluators recognize the usefulness of TG. The process of making TG is considered an effective way to improve teaching capability of teachers.
Input (Japan)	Lecturers give lectures by using teaching guides prepared after WS			The total number and M/M of long-term experts as of 19 May 2006: One (1) expert and twenty-three (23) M/M
	Dispatch of Japanese Experts			Japanese Fiscal year
				2004
				2005
				2006
				No. of experts
				4
				4
				0*
				* Four (4) short-term experts are planned to be dispatched in August 2006
				Equipment necessary for Project Activities such as computers, photocopier, and LCD-projector have been procured. For details, see ANNEX 3-2 (List of Equipment Provided by JICA)

			Total amount of equipment provided as of 19 May 2006: 14,700 US dollars and 240,988 Japanese Yen.									
	Local Operating Cost	SMATT Annual fiscal report to JICA	<p>The Japanese side has allocated necessary budgets for the Activities of the Project as of 31 March 2006 as shown in the following table.</p> <table border="1"> <thead> <tr> <th colspan="3">Unit: US Dollars</th> </tr> <tr> <th>Japanese Fiscal Year</th> <th>2004</th> <th>2005</th> </tr> </thead> <tbody> <tr> <td>Local Operating Cost</td> <td>57,084</td> <td>43,495</td> </tr> </tbody> </table>	Unit: US Dollars			Japanese Fiscal Year	2004	2005	Local Operating Cost	57,084	43,495
Unit: US Dollars												
Japanese Fiscal Year	2004	2005										
Local Operating Cost	57,084	43,495										
	Counterpart Training in Japan		Twenty (20) persons participated in the "Training in Japan" held in Japan. For details, see ANNEX 3-4 (Participants' List of Training in Japan (TIJ))									
(Laos)	Assignment of Counterparts Building and Facilities		See ANNEX 3-6 (List of Counterparts Personnel Assigned for the Project) A part of the pre-service division room in Department of Teacher Training of Ministry of Education is provided for the Project.									
	Project Running Cost		<p>The Lao side has allocated necessary budgets for the Project as of 31 March 2006 as follows.</p> <table border="1"> <thead> <tr> <th colspan="3">Unit: Lao currency (Kip)</th> </tr> <tr> <th>Japanese Fiscal Year</th> <th>2004</th> <th>2005</th> </tr> </thead> <tbody> <tr> <td>Local Operating Cost</td> <td>15,066,000</td> <td>100,291,200</td> </tr> </tbody> </table>	Unit: Lao currency (Kip)			Japanese Fiscal Year	2004	2005	Local Operating Cost	15,066,000	100,291,200
Unit: Lao currency (Kip)												
Japanese Fiscal Year	2004	2005										
Local Operating Cost	15,066,000	100,291,200										
Important Assumption at Project Purpose Level	Participants of TIJ, WS, and ICT do not quit their job. Enough budget for trainings is approved by MOF		<p>Eight (8) teachers quitted the job and it caused the least influences on the Project. The condition of assumption is satisfactory.</p> <p>Even the budget did not come from MOF, appropriate budget for the Project is provided by Lao government. The condition of assumption is satisfactory.</p>									
at Output Level	Participants of TIJ, WS, and ICT do not quit their job.		Eight (8) teachers quitted the job and it caused the least influences on the Project. The condition of assumption is satisfactory.									
Pre-conditions	The targeted members will understand this project and have commitments for improving quality of teacher training.		The condition of assumption is satisfactory.									

2. Implementation Process of the Project

Evaluation Items	Confirmation Items	Result
Progress of activities Technology transfer	Progress of the Activities in relation to the schedule Transfer of desired technology to counterparts	See Table of Achievement (ANNEX 2-1) and Plan of Operation (ANNEX 1-2) The counterparts at central level, who are listed in Record of Discussion signed on 9 June 2004, are expected to run the Project in close collaboration with the long-term expert assigned to DTT. However, the role and function of them are not mentioned clearly. Involvement of the counterparts at central level in the process of planning and preparation of activities has been less than expected. Under this circumstance, technology transfer to this level of counterparts does not seem to have been realized very much. On the other hand, the Team considered the TIJ participants, who are expected to perform as science and mathematics leaders, are considered as the counterparts of short-term experts. As of 19 May 2006, thirty-nine (39) TIJ participants out of forty (40 - one of them quitted the job in 2004) are actually playing their role in serving their skill to WS/ICT participants. They are continuously conducting meetings, seminars, or workshops for TTC/TTS teachers and primary/lower-secondary teachers to disseminate the teaching methods acquired in TIJ. Therefore, it can be said that the technology to improve the quality of TTC/TTS teachers in science and mathematics has been transferred.
	Change in idea and attitude of teachers on science and math lessons and teacher training	Teaching methods introduced by SMATT is accepted by TTC/TTS teachers and are considered effective. They help change teachers' attitudes and habits preferably towards the lesson preparation and implementation. Practice of class observation is also accepted by TTC/TTS teachers. The effectiveness of class observation is recognized to improve their lessons. TG is also appreciated not only as a product for a guide of lessons but also as a process of training which improve lesson planning and preparation.
	Appropriateness of the topics discussed in the training	Since the topics selected for TG for each subject are only three (3) every year, it might be considered quite few. The process of selection of the topic was done by the professors in Naruto University of Education at the beginning of the Project. Then TTC/TTS teachers requested to reflect their needs to the topic selection and it was done in Topic Meeting in 2004. This process is quite appropriate to reply the actual needs of teachers. Therefore, the appropriateness of the process of topic selection is high.
Management and implementation of the Project	Sufficient communication within the Project	JCC is held every half year. The agenda is well selected and prepared timely according to the progress of the Project. It functions well as milestones of the project implementation and reminds all the personnel concerned of the direction and the means of the Project. However, the daily communication and discussion among PMU members doesn't seem to be sufficient.
	Monitoring	The monitoring system was established on 12 July 2005 together with modification of PDM. According to the framework of monitoring, PMU is a key factor to run the system. It is highly recommended for PMU members to visit the sites to grasp the actual situation and understand the progress of the Project.
Ownership of Lao side	Change in attitude of counterparts	PMU members highly appreciate the performance of the Project especially the input of new teaching methods and the way of dissemination of TG. The methods are considered effective and meet the needs of Lao science and mathematics education. They show their willingness to promote the dissemination of the teaching methods into primary/lower-secondary schools. They started consideration for taking responsible approaches such as training programs after the Project, effective dissemination of TG, cooperation with PA in the field, and study of the collaboration with TTEST. It promotes their ownership increasingly.
	Budget allocation	Lao side allocated appropriate budget, which was mainly contributed by TTC/TTS, for the training programs.
	Cooperation between Japanese expert and counterparts	Despite of the busyness of counterparts, the Japanese long-term expert for the Project tried to create the close relationship and opportunity to work together. This effort has contributed to make counterparts recognize the importance of the monitoring of the Project activities and improve their management skills.

<p>Training in Japan</p>	<p>Feedback from participants of TIJ</p>	<p>The relation between short-term experts and TIJ participants are very close and cooperative. One of the major reasons for this is that the professors in Naruto University of Education care TIJ participants in Japan and the same persons come to Lao PDR as short-term experts for continuous assistance. This contributes to train TIJ participants as science and mathematics leaders.</p> <p>As mentioned above, the relationship between short-term experts and TIJ participants are very favorable. TIJ participants tell that the training environment was comfortable, the schedule and implementation were appropriate, the content met their needs. After TIJ, the participants have disseminated the acquirement of TIJ into TTC/TTS teachers.</p> <p>Therefore, TIJ can be considered effective and appropriate measures to improve the quality of science and mathematics teachers in Lao PDR. However, the language barrier is high. It is recommended to provide suitable measures to maximize TIJ.</p>
--------------------------	--	---

22

CPD

3. Evaluation by Five Criteria

1) Relevance	Evaluation Items	Necessary Information	Result
1-1	Consistency between the Project Purpose and the needs of the target group	1-1 Whether the approach of the Project meets the needs of TTC/TTS teachers	TTC/TTS teachers recognized the necessity of the improvement of their teaching capability. The Project introduced an effective way of teaching and the TTC/TTS teachers realized that it promoted comprehension of student-teachers. This effective way of teaching contributes to the improvement of teaching capability of TTC/TTS teachers.
1-2	Consistency between the Overall Goal and the development policy of the Lao PDR	1-2 Whether the teacher training in the field of science and mathematics needs to be upgraded	Policy papers such as Fifth Five-Year Socio-Economic Development Plan (2001-2005), the Draft of Sixth Five-Year Socio-Economic Development Plan (2006-2010), National Growth and Poverty Eradication Strategy (2004), and Millennium Development Goals Progress Report (2004) describe strong needs of human resource development and give top priority to education. The Lao government emphasizes the provision of enough number of teachers with higher quality. Therefore, the approach of the Project is considered one of the answers to assist the policy of Lao PDR.
1-3	Consistency with Japan's foreign aid policy	1-3 Whether the improvement of quality of teachers in TTC/TTS meets the Japan's Country Assistance Strategy for Lao PDR	According to Country Assistance Strategy for Lao PDR (2nd draft, 2005), the government of Japan gives one of the highest priorities to qualitative improvement of basic education. Since the quality of education much relies on the quality of teachers, the government of Japan targets the teachers for future-teachers.
1-4	Appropriateness of the measures	1-4 Whether the assistance provided by the Project is appropriate to improvement of teaching capability of TTC/TTS teachers	The Project is designed to maximize and maintain the acquirement of TIJ participants through WS/ICT and the production of TG. Those components are considered as an effective system to embed the knowledge and skill introduced in TIJ to all teachers in TTC/TTS. On the other hand, teacher education institutes in Lao PDR are only five (5) TTC, three (3) TTS for basic education and National University of Lao for higher education. The Project targets those eight (8) TTC/TTS because all of new teachers who start teaching in primary/lower-secondary schools have to graduate from those institutes. Thus, the methods taken by the Project is considered highly appropriate to improve teachers' capability.

2) Effectiveness

Evaluation Items	Necessary Information	Result
2-1	Achievement level of the quality improvement of science and mathematics teachers in TTC/TTS	The Objectively Verifiable Indicators to measure the achievement of the Project Purpose are mostly relied on the evaluation done by the short-term experts from Naruto University of Education, which implements TIJ. At the moment of Mid-Term Evaluation, therefore, the Team could not apply those measures. Instead, the Team tried to grasp the level of the improvement of the teaching capability of TTC/TTS teachers through the series of interviews and questionnaires. TTC/TTS teachers have improved their teaching capability in comparison with that of before the Project. They show the signs of improvement of teaching capability such as confidence, responsibility, and motivation. They have also changed their habits and behaviors. They are not afraid of observation, become creative, and try improvisation.
2-2	Contribution of Outputs to achieve the Project Purpose	The Project defines the quality of teachers as acquirement of knowledge and improvement of teaching methods. Those two (2) are conveyed to all the TTC/TTS teachers through TIJ, WS, and ICT. TG serves as complementary material to maintain their knowledge. This combination works to train teachers effectively. Therefore, the Outputs are considered sufficient to achieve the Project Purpose.
2-3	Factors affecting to achieve the Project Purpose	One of on-going projects in MOE, TTEST, also targets TTC/TTS teachers. TTC/TTS teachers make use of the benefit of two projects practically. This factor is considered to give positive effect to each other. As of 19 May 2006, no factor which impedes the Project is found.

88

ANNEX2-3

	5-3-2 Whether the teaching methods introduced by the Project is accepted and utilized in TTC/TTS	The teaching methods introduced to TTC/TTS teachers are effective to make student-teachers think, judge, and express their ideas. These methods are also expected to be utilized in primary/lower-secondary schools in the near future when those student-teachers start their service as professional teachers. Thus, it can be said that the introduced teaching methods will be utilized among the teachers in Lao PDR.
	5-3-3 Whether class observation is accepted and implemented continuously in TTC/TTS	Through the Project, TTC/TTS teachers have learned to regard class observation as one of the effective trainings for improvement of their teaching capabilities. More over, they have already been practicing it in the class and even voluntarily. Therefore, it is fair to say that class observation will be practiced continuously in TTC/TTS.

89

List of Japanese Experts

(1) Long-term experts

Subject	Name	Institute	Leave Japan	Arrive at Laos	Leave Laos	Arrive at Japan
Project coordination/ Training planning	Maki TANAKA	Expert, JICA	15-Jun-04	16-Jun-04		

(2) Short-term experts

(2)-1 Japanese fiscal year 2004

Subject	Name	Institute	Leave Japan	Arrive at Laos	Leave Laos	Arrive at Japan
Mathematics education	Noboru SAITO	Naruto University of Education	7-Aug-04	8-Aug-04	4-Sep-04	5-Sep-04
Physics education	Kozo ATOBE	Naruto University of Education	7-Aug-04	8-Aug-04	4-Sep-04	5-Sep-04
Chemistry education	Katsuo MURATA	Naruto University of Education	7-Aug-04	8-Aug-04	4-Sep-04	5-Sep-04
Biology education	Katsuyuki SATO	Naruto University of Education	7-Aug-04	8-Aug-04	4-Sep-04	5-Sep-04

(2)-2 Japanese fiscal year 2005

Subject	Name	Institute	Leave Japan	Arrive at Laos	Leave Laos	Arrive at Japan
Mathematics education	Noboru SAITO	Naruto University of Education	11-Aug-05	12-Aug-05	2-Sep-05	3-Sep-05
Physics education	Kozo ATOBE	Naruto University of Education	11-Aug-05	12-Aug-05	2-Sep-05	3-Sep-05
Chemistry education	Katsuo MURATA	Naruto University of Education	11-Aug-05	12-Aug-05	2-Sep-05	3-Sep-05
Biology education	Hirokazu ABE	Yamaguchi University	11-Aug-05	12-Aug-05	2-Sep-05	3-Sep-05

List of Equipment Provided by JICA

No.	Item	Specification	Serial No.	Price (USD)	Date of Purchase (received)	Remark
1	Desktop Computer	HP Pavilion a618L	THT434109X	755	4-Sep-04	Monitor;CNN4291HHT
2	Desktop Computer	HP Pavilion a618L	THT43011CH	755	4-Sep-04	Monitor;CNN4291FJT
3	Desktop Computer	HP Pavilion a618L	THT43410B0	755	4-Sep-04	Monitor;CNN4291HHT
4	UPS for computer	Atlanta 800VA	ALT807-0374005112JLM	70	4-Sep-04	
5	UPS for computer	Atlanta 800VA	ALT807-0374005101JLM	70	4-Sep-04	
6	UPS for computer	Atlanta 800VA	ALT807-0374005101JLM	70	4-Sep-04	
7	UPS for photocopy	Socomec Sicon 3000VA	SOCOTAH11900090	990	4-Sep-04	
8	Printer (black and white)	HP LaserJet 1015	SGFBL90152	300	4-Sep-04	
9	Mobile Printer (color)	HP DeskJet 450C	SG46H310YT	410	4-Sep-04	
10	Facsimile	Panasonic KX-UF590	FBP2B200009	400	4-Sep-04	
11	Photo copy	Sharp AR-M205	45146806	3,500	4-Sep-04	
12	Digital Camera	Cyber-shot DSC-P8	3027456	450	4-Sep-04	
13	Projector	Toshiba Data Projector TLP-T61M	80632638	4,000	4-Sep-04	
14	Scanner	HP ScanJet 4070	CN468AL02J	250	4-Sep-04	
15	Notebook Computer	HP Compaq Presario 2509AT	CNF4290621	1,325	6-Sep-04	
16	Printer (color)	HP Color LaserJet 2550L	CNHFC02253	600	8-Sep-04	
Total				14,700		
No.	Item	Specification	Serial No.	Price (JPY)	Date of Purchase (received)	Remark
17	Windows XP Professional	Version 2002		32,300	25-Jun-04	
18	Office Professional	Edition 2003		53,000	25-Jun-04	
19	FileMaker	Developer 7		79,800	2-Aug-04	
20	Japanese Textbooks	Total 119 Textbooks in Science and Math for Primary/Lower Secondary School		75,888		
Total				240,988		

Contribution by Lao Side and Japanese Side for Operational Expenses

(1) Operational Expenses for JFY2004 (15 June 2004 - 31 March 2005)

Amount	Lao Side		Japanese Side		Total	
	\$	Kip	\$	Kip	\$	Kip
	0	15,066,000	57,084	0	57,084	15,066,000

(2) Operational Expenses for JFY2005 (1 April 2005 - 31 March 2006)

Amount	Lao Side		Japanese Side		Total	
	\$	Kip	\$	Kip	\$	Kip
	0	100,291,200	43,495	0	43,495	100,291,200

(3) Contribution among the Lao Side

Amount (Kip)	JFY2004	JFY2005	Luang Namtha	Luang Prabang	Khangkhai	Bankoun	Dongkhamxang	Savannakhet	Salavan	Pakse	Total
			TTS	TTC	TTC	TTC	TTS	TTC	TTS	TTC	TTC
			0	9,521,000	0	0	0	1,300,000	0	4,245,000	15,066,000
			15,635,000	12,866,000	10,430,000	18,594,200	3,820,000	12,450,000	18,334,000	8,162,000	100,291,200

Participants' List of Training in Japan (TIJ)

Japanese Fiscul Year 2004 (11 October, 2004 - 19 December, 2004)

Organization	Sex	Name	Study Field
DTT	M	Mr. Khamphouang BOUNMIXAY	mathematics
Savannakhet TTC	M	Mr. Thongkhene KHAMSOUKTHAVONG	mathematics
Salavan TTS	M	Mr. Somchit PHENGSONVANAVONG	mathematics
Pakse TTC	M	Mr. Bounthong MUENSOPHA	physics
Salavan TTS	M	Mr. Sengaloun KHANASA	physics
Luang Namtha TTS	M	Mr. Khamting NORLAANG	physics
Luang Namtha TTS	M	Mr. Sivilay KEOPHILAVAN	chemistry
Luang Prabang TTC	M	Mr. Sengthong PHONGVILAY	chemistry
Bankeun TTC	F	Ms. Chanthamala SOUTHAMMAVONG	biology
Khangkhai TTC	F	Ms. Kenchan PHANTAVONG	biology

Japanese Fiscul Year 2005 (11 October, 2005 - 18 December, 2005)

Organization	Sex	Name	Study Field
DTT	M	Mr. Keth PHANHACK	mathematics
Bankeun TTC	M	Mr. Oudone THAPVONGSA	mathematics
Savannakhet TTC	M	Mr. Boonleuth JUNDEENOPARB	mathematics
Luang Prabang TTC	F	Ms. Viengkham NINESAVANG	mathematics
Khangkhai TTC	M	Mr. Vanny YANGCHIAMOUA	physics
Pakse TTC	M	Mr. Samlane THAVITHONG	physics
Savannakhet TTC	M	Mr. Sihanoulath THANAKHANTY	chemistry
Khangkhai TTC	F	Ms. Soutaphone RATSAVONG	chemistry
Savannakhet TTC	F	Ms. Bouakeo SOUMPHONPHAKDY	biology
Luang Namtha TTS	F	Ms. Amphone VILAYKHAMPAN	biology

Number of Participants of Workshop (WS) and In-Country Training (ICT)

	Luang Namtha TTS	Luang Prabang TTC	Khangkhai TTC	Bankeun TTC	Dongkhamxang TTS	Savannakhet TTC	Salavan TTS	Pakse TTC	PA/ Others	TEADC	DTT, MOE	Total
August 2004 WS												
Pakse	0	0	0	0	3	10	8	5	4	0	1	31
Luang Prabang	6	12	10	12	0	0	0	0	4	1	2	47
March 2005 ICT												
Savannakhet	6	14	9	3	3	14	4	7	5	0	0	65
August 2005 WS												
Bankeun	8	15	9	7	3	14	6	12	3	1	1	79
February 2006 ICT												
Salavan	4	14	16	9	5	10	4	6	5	0	0	73
Total	24	55	44	31	14	48	22	30	21	2	4	295

List of Counterpart Personnel Assigned for the Project

Central level

1. Mrs. Sengdeuane LACHANTHABOUN
Director General of Department of Teacher Training, Ministry of Education
2. Mr. Ly Foung
Deputy Director of Department of Teacher Training, Ministry of Education
3. Mr. Maaly VORABOUTH
Technical Officer of Department of Teacher Training, Ministry of Education
4. Mrs. Malichanh THAMMAVONG
Technical Officer of Department of Teacher Training, Ministry of Education

TTC/TTS level

LuangPrabang TTC

5. Mr. Hongkham BOUTHDOUANGTHIP
6. Ms. Viengkham NINHSAVANG

Khangkhay TTC

7. Mr. Phimphone SONEPHASOUK
8. Ms. Thian PHOUPHONETHONG

Bankeun TTC

9. Mr. Manivong SYBOLABAN
10. Ms. Phouttada LAVILAYSHENG

Savannaketh TTC

11. Mr. Chalrun NILABOUTH
12. Mr. Somphong SICHANHTHINGTHIP

Pakse TTC

13. Mr. Phone PHOUVANNO
14. Mr. Soulichanh THAMMAVONGSENG

Dongkhamxang TTS

15. Ms. Singthong SISAVATT
16. Ms. Souchita PATSAPHANH

Luangnamtha TTS

17. Mr. Norasing FONGMYXAY
18. Mr. Khamting NORLAANG

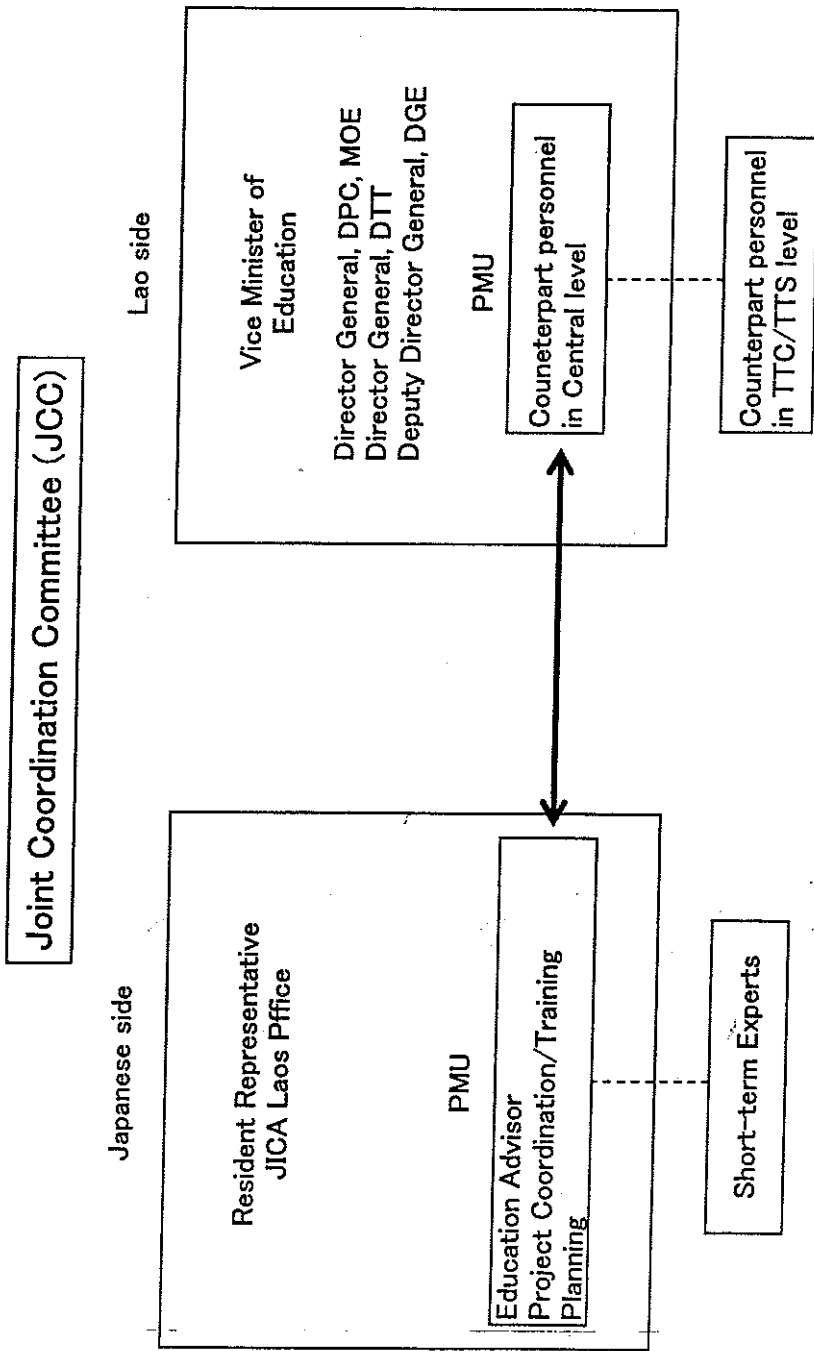
Salavan TTS

19. Mr. SengAloune KHANH-ASA
20. Mr. Souphanh Thepphvongsa

TEADC

21. Mr. Ngauay KEOSADA
22. Mr. Sounthone SENGSOURIYAVONG

Implementation organization chart of the Project



Note : DPC = Department of Planning and International Cooperation
 DTT = Department of Teacher Training
 DGE = Department of General Education

Handwritten signature/initials

List of Interviewees

DTT, MOE

Ms. Sengdeuane LACHATHABOUN	Director General
Mr. Ly Fong	Deputy Director
Mr. Keth PHANHACK	Deputy Head of Administration
Mr. Maaly VORABOUTH	Technical Staff
Mr. Khamphouang BOUNMIXAY	Technical Staff
Ms. Maki TANAKA	Japanese Expert for the Project
Ms. Satomi UENO	Educational Advisor

Vientiane Capital Education Service

Mr. Chandy PHOMMABOUTH	Director
------------------------	----------

TEADC

Mr. Bounchanh KHOUNPHILAPHANH	Head of Continuing Studies Unit
Mr. Sounthone SENGSOURIYAVONG	Deputy Head of Research and Post Graduate Division
Mr. Ngouay KEOSADA	Biology Teacher

Luang Prabang TTC

Mr. Bounsouvanh LATTANA	Deputy Director
Mr. Sengthong PHONGVILAY	Head of Science
Ms. Viengkham NINESAVANG	Mathematics Teacher
Mr. Bounseuth KHODSAY	Head of Science and Mathematics

Bankeun TTC

Mr. Bounxay CHANSINA	Director
Mr. Oudone THAPVONGSA	Deputy Director
Ms. Chanthamala SOUTHAMMAVONG	Head of Science
Ms. Phouthada LAVILAYSENG	Head of Biology-Chemistry Unit
Mr. Khamphao SIPANGAVONG	Deputy Head of Science
Mr. Outhai PHAVATHSADY	Biology Teacher
Ms. Lathdavanh SOUTHAMMAVONG	Mathematics Teacher
Mr. Khamphone KEOMOUNGSONG	Physics Teacher

TTEST

Dr. John BAILEY	Team Leader
-----------------	-------------

Forms of Questionnaires (English and Lao)

(List of Questionnaires)

Questionnaire for:

A: TTC/TTS Directors, Deputy Directors, and Heads of Science and Mathematics

B: TIJ Participants

C: TTC/TTS Teachers

D: TEADC and DTT Officials

24

A

Questionnaire for TTC/TTS Directors, Deputy Directors, Head of Science and Mathematics

Name of Study: Mid-Term Evaluation Study for JICA Technical Cooperation Project for Improving Science and Mathematics Teacher Training

Name: _____ Position/Title: _____ Office/Organization: _____ Telephone No: _____ Fax No: _____

This questionnaire is to be used in the mid-term evaluation of the above-mentioned study. Your answer and comments will be utilized to improve the implementation of the said project and technical cooperation for Lao PDR by Japan International Cooperation Agency (JICA) in the future. The answer what you give us is used only for the study and this response sheet is kept within JICA evaluation team.

What training programs in SMATT have you attended? Please encircle all of your experiences.

- TIJ (Training in Japan) 2002 2003 2004 2005
WS (National Work Shop) 2004 in Pakse 2004 in Luang Prabang 2005 in Bankkeum
ICT (In Country Training) 2005 in Savannakhet 2006 in Salavan

- 1. Does SMATT improve the teaching capabilities of TTC/TTS teachers? Yes No
2. Do you implement any training program for the teachers in primary/lower-secondary schools to disseminate SMATT achievement? Yes No
3. Do you meet any difficulty/problem when you implement training activities proposed by the teachers? Yes No
4. Do your teachers utilize SMATT teaching guides in their classes? Yes No
5. Have you distributed SMATT teaching guides to neighbor primary/lower-secondary schools? Yes No
6. Do you continue to teach the teaching method/skill introduced by SMATT at your TTC/TTS? Yes No
7. Do you implement class observation regularly? Yes No

Thank you very much for your cooperation

[Signature]

B

Questionnaire for TIJ participants

Name of Study: Mid-Term Evaluation Study for JICA Technical Cooperation Project for Improving Science and Mathematics Teacher Training

Name: _____ Position/Title: _____ Office/Organization: _____ Telephone No: _____ Fax No: _____

This questionnaire is to be used in the mid-term evaluation of the above-mentioned study. Your answer and comments will be utilized to improve the implementation of the said project and technical cooperation for Lao PDR by Japan International Cooperation Agency (JICA) in the future. The answer what you give us is used only for the study and this response sheet is kept within JICA evaluation team.

What training programs in SMATT have you attended? Please encircle all of your experiences.

- TIJ (Training in Japan) 2002 2003 2004 2005
WS (National Work Shop) 2004 in Pakse 2004 in Luang Prabang 2005 in Bankkeum
ICT (In Country Training) 2005 in Savannakhet 2006 in Salavan

- 1. Does TIJ improve your teaching capabilities? Yes No
2. Do the topics discussed in TIJ meet your needs? Yes No
3. Did you meet any difficulties/problems during TIJ? Yes No
4. Do you disseminate the study in TIJ to improve your class? Yes No
5. Have you implemented any training programs for TTC/TTS colleagues? Yes No
6. Have you implemented any training programs for primary/lower-secondary school teachers? Yes No
7. Do you improve your teaching capability through learning of the making process of SMATT teaching guides at TIJ? Yes No

Thank you very much for your cooperation

Questionnaire for TTC teachers

Name of Study: Mid-Term Evaluation Study
for JICA Technical Cooperation Project
for Improving Science and Mathematics Teacher Training

Name: _____

Position/Title: _____

Office/Organization: _____

Telephone No: _____ Fax No: _____

This questionnaire is to be used in the mid-term evaluation of the above-mentioned study. Your answer and comments will be utilized to improve the implementation of the said project and technical cooperation for Lao PDR by Japan International Cooperation Agency (JICA) in the future. The answer what you give us is used only for the study and this response sheet is kept within JICA evaluation team.

What training programs in SMATT have you attended? Please encircle all of your experiences.

- TIJ (Training in Japan) 2002 2003 2004 2005
- WS (National Work Shop) 2004 in Pakse 2004 in Luang Prabang 2005 in Bankeun
- ICT (In Country Training) 2005 in Savannakhet 2006 in Salavan

1. Do WS and ICT improve your teaching capabilities?
Yes No
2. Do the topics discussed in WS or ICT meet your needs?
Yes No
- 3-1. Are frequency WS and ICT appropriate to you to learn the topic?
Yes No
- 3-2. Are WS and ICT appropriate to your needs in terms of training period?
Yes No
- 3-3. Are WS and ICT appropriate to your needs in terms of number of participants?
Yes No
- 3-4. Are WS and ICT appropriate to your needs in terms of selection of teaching materials?
Yes No
4. Do you disseminate the study in WS or ICT to improve your class?
Yes No
5. Have you implemented any training programs for TTC/TTS colleagues?
Yes No

6. Have you implemented any training programs for primary/lower-secondary school teachers?
Yes No

7. Do SMATT teaching guides help you enough to improve your teaching capability?
Yes No

Thank you very much for your cooperation

28

D

Questionnaire for TEADC and DTT officials

Name of Study: Mid-Term Evaluation Study for JICA Technical Cooperation Project for Improving Science and Mathematics Teacher Training

Name: _____

Position/Title: _____

Office/Organization: _____

Telephone No: _____ Fax No: _____

This questionnaire is to be used in the mid-term evaluation of the above-mentioned study. Your answer and comments will be utilized to improve the implementation of the said project and technical cooperation for Lao PDR by Japan International Cooperation Agency (JICA) in the future. The answer what you give us is used only for the study and this response sheet is kept within JICA evaluation team.

What training programs in SMATT have you attended? Please encircle all of your experiences.

- TIJ (Training in Japan) 2002 2003 2004 2005
- WS (National Work Shop) 2004 in Pakse 2004 in Luang Prabang 2005 in Bankeum
- ICT (In Country Training) 2005 in Savannakhet 2006 in Salavan

1. Have you attended or observed any training programs provided by SMATT?
Yes No
2. Do the teachers who attended the training programs provided by SMATT improve their teaching capabilities?
Yes No
3. Are SMATT teaching guides worth to disseminate to all primary/lower-secondary schools in Lao PDR?
Yes No
4. Do you implement the monitoring of the activities regularly?
Yes No

If you have any other comments or suggestions regarding SAMTT that you would like to convey to JICA, please write them below.

Recommendation/Suggestion: _____

Thank you very much for your cooperation

28

A

ແບບສອບຖາມສຳລັບຜູ້ອຳນວຍການ, ຮອງຜູ້ອຳນວຍການ, ແລະທົ່ວໄປທາງກະຊວງຄະນິດສາດ-ວິທະຍາສາດ

ຊື່ຂອງການສຶກສາ: ສຶກສາການປະເມີນຜົນໄລຍະກາງຂອງໂຄງການ
ສຳລັບການຮ່ວມມືທາງດ້ານວິຊາການຂອງອົງການ JICA

ເພື່ອປັບປຸງຄູອາຈານຜູ້ທີ່ຄອບວິຊາຄະນິດສາດແລະວິທະຍາສາດຢູ່ໃນສະຖາບັນສ້າງຄູ

ຊື່: _____

ຕຳແໜ່ງ: _____

ຫ້ອງການ/ອົງກອນ: _____

ເວັບໄຊສະໜັບ: _____ ເວັບໄຊສູນ: _____

ແບບສອບຖາມນີ້ແມ່ນຖືກນຳໃຊ້ໃນການປະເມີນຜົນໄລຍະກາງໂຄງການຂອງການສຶກສາທີ່ໄດ້ກ່າວຂ້າງເທິງ. ຄຳຕອບຂອງທ່ານຈະຖືກນຳໃຊ້ໃຫ້ເປັນປະໂຫຍດເພື່ອປັບປຸງການດຳເນີນການຂອງໂຄງການ SMART ແລະການຮ່ວມມືທາງດ້ານວິຊາການສຳລັບ ສປປ ລາວ ໂດຍການຮ່ວມມືສາກົນຂອງປະເທດຍີ່ປຸ່ນ (JICA) ໃນອະນາຄົດ. ຄຳຕອບທັງໝົດທ່ານໃຫ້ພວກຂ້າພະເຈົ້າແມ່ນຈະຖືກ ໃຊ້ພຽງແຕ່ສຳລັບການສຶກສາເທົ່ານັ້ນ ແລະເຈ້ຍຄຳຕອບນີ້ຈະຖືກເກັບໄວ້ທາງໃນຫ້ອງການປະເມີນຜົນຂອງອົງການ JICA.

ທ່ານໄດ້ເຂົ້າຮ່ວມການຝຶກອົບຮົມໃດແດ່ຂອງໂຄງການ SMART ? ກະລຸນາໝາຍວິງມີນ້ອມເອົາຄຳຕອບ

ການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນ	2002	2003	2004	2005
ກອງປະຊຸມລະດັບຊາດ	2004	ທີ່ບໍ່ມີກະຂ	2004	ທີ່ຫຼວງພະບາງ 2005
ກອງປະຊຸມລະດັບທ້ອງຖິ່ນ	2005	ທີ່ສະຫວັນນະເຂດ	2006	ທີ່ສາລະວັນ

1. ການຝຶກອົບຮົມທີ່ໄດ້ຈັດຂຶ້ນໂດຍໂຄງການ SMART ໄດ້ປັບປຸງຄວາມສາມາດໃນການສອນຂອງຄູອາຈານຢູ່ໃນສະຖາບັນສ້າງຄູບໍ?

ເຈົ້າ ບໍ່

2. ທ່ານໄດ້ດຳເນີນການຝຶກອົບຮົມໃຫ້ແກ່ຄູອາຈານຢູ່ໃນໂຮງຮຽນປະຖົມ/ໂຮງຮຽນມັດທະຍົມເພື່ອຂະຫຍາຍຜົນຕາມຈຸດປະສົງຂອງ SMART ບໍ?

ເຈົ້າ ບໍ່

3. ໃນເວລາທີ່ຄູອາຈານສະເໜີຈັດກິດຈະກຳການຝຶກອົບຮົມທ່ານພົບຄວາມທຸ້ຍຮຸນຈາກບັນຫາບໍ?

ເຈົ້າ ບໍ່

4. ຄູອາຈານຢູ່ໃນສະຖາບັນສ້າງຄູຂອງທ່ານໄດ້ນຳໃຊ້ປຶ້ມຄູມີແບບນຳການສອນໃຫ້ເປັນປະໂຫຍດໃນເວລາສອນຢູ່ໃນຫ້ອງຮຽນບໍ?

ເຈົ້າ ບໍ່

(ກະລຸນາເບິ່ງດ້ານຫຼັງ)

5. ທ່ານໄດ້ແຈກຢາຍປຶ້ມຄູມີແບບນຳການສອນຂອງ SMART ໃຫ້ແກ່ໂຮງຮຽນປະຖົມ/ ມັດທະຍົມທີ່ຢູ່ອ້ອມຂ້າງສະຖາບັນສ້າງຄູບໍ?

ເຈົ້າ ບໍ່

6. ທ່ານໄດ້ສົບຜົນສອນໂດຍນຳໃຊ້ວິທີສອນທີ່ກສະທີ່ໄດ້ແນະນຳໂດຍ SMART ຢູ່ໃນສະຖາບັນສ້າງຄູຂອງທ່ານບໍ?

ເຈົ້າ ບໍ່

7. ທ່ານໄດ້ດຳເນີນການສັງເກດທ້ອງສອນຢ່າງເປັນວິກາະດີບໍ?

ເຈົ້າ ບໍ່

ຂອບໃຈຫຼາຍໆສຳລັບການໃຫ້ຄວາມຮ່ວມມືຂອງທ່ານ

29

B

7. ຂະບວນການໃນການສ້າງໂມງມືແມ່ນຈຳການສອນຜູ້ໃນການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນຊ່ວຍຮັບຜິດຊອບສາມາດ
ໃນການສອນຂອງທ່ານບໍ່?

ເຈົ້າ ບໍ່

ຂອບໃຈຫຼາຍໆສຳລັບການໃຫ້ຄວາມຮ່ວມມືຂອງທ່ານ

ແບບສອບຖາມສຳລັບຜູ້ທີ່ໄດ້ຜ່ານການຝຶກອົບຮົມຈາກປະເທດຍີ່ປຸ່ນ
ຊື່ຂອງການສຶກສາ: ສຶກສາການປະເມີນຜົນໄລຍະກາງຂອງໂຄງການ
ສຳລັບການຮ່ວມມືທາງດ້ານວິຊາການຂອງອົງການ JICA
ເພື່ອປັບປຸງຄູອາຈານຜູ້ທີ່ສອນວິຊາຄະນິດສາດແລະວິທະຍາສາດຢູ່ໃນສະຖາບັນສ້າງຄູ

ຊື່: _____
ຕຳແໜ່ງ: _____
ຫ້ອງການ/ອົງກອນ: _____
ເວີໂທລະສັບ: _____ ເວີແຟັກ: _____

ແບບສອບຖາມນີ້ແມ່ນຖືກນຳໃຊ້ໃນການປະເມີນຜົນໄລຍະກາງໂຄງການຂອງການສຶກສາທີ່ໄດ້ກ່າວຂ້າງເທິງ. ຄຳຕອບ
ຂອງພວກທ່ານຈະຖືກນຳໃຊ້ໃຫ້ເປັນປະໂຫຍດເພື່ອປັບປຸງການດຳເນີນການຂອງໂຄງການ SMART ແລະການຮ່ວມມື
ທາງດ້ານວິຊາການສຳລັບ ສປປ ລາວ ໂດຍການຮ່ວມມືສາກົນຂອງປະເທດຍີ່ປຸ່ນ (JICA) ໃນອະນາຄົດ.
ຄຳຕອບທີ່ພວກທ່ານໃຫ້ພວກຂ້າພະເຈົ້າແມ່ນຈະຖືກໃຊ້ພຽງແຕ່ສຳລັບການສຶກສາເທົ່ານັ້ນແລະເຈົ້າຕອບນີ້ຈະຖືກເກັບ
ໄວ້ຢ່າງຄັບຄັນເພື່ອເປັນຜົນຂອງອົງການ JICA.

ທ່ານໄດ້ເຂົ້າຮ່ວມການຝຶກອົບຮົມໃດແດ່ຂອງໂຄງການ SMART ? ກະລຸນາໝາຍວົງມົນອ້ອມເອົາຄຳຕອບ

ການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນ	2002	2003	2004	2005
ກອງປະຊຸມລະດັບຊາດ	2004	ທີ່ປຸງວາງພະບາງ	2005	ທີ່ປຸງວາງເກີນ
ກອງປະຊຸມລະດັບທ້ອງຖິ່ນ	2005	ທີ່ສະໜັບສະໜູນ	2006	ທີ່ສະໜັບສະໜູນ

1. ການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນໄດ້ປັບປຸງຄວາມສາມາດໃນການສອນຂອງທ່ານບໍ່?
ເຈົ້າ ບໍ່
2. ຫົວຂໍ້ຕ່າງໆທີ່ໄດ້ສົມທະນາໃນການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນແມ່ນກົງກັບຄວາມຕ້ອງການຂອງທ່ານບໍ່?
ເຈົ້າ ບໍ່
3. ໃນລະຫວ່າງການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນທ່ານໄດ້ພົບຄວາມຫຍຸ້ງຍາກຫຼືບັນຫາບໍ່?
ເຈົ້າ ບໍ່
4. ທ່ານໄດ້ນຳໃຊ້ບົດຮຽນຈາກການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນໃຫ້ເປັນປະໂຫຍດໃນການສອນຂອງທ່ານຢູ່ໃນຫ້ອງຮຽນບໍ່?
ເຈົ້າ ບໍ່
5. ທ່ານໄດ້ນຳໃຊ້ບົດຮຽນຈາກການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນເພື່ອເຊື່ອມຮ່ວມງານຢູ່ໃນສະຖາບັນສ້າງຄູບໍ່?
ເຈົ້າ ບໍ່
6. ທ່ານໄດ້ນຳໃຊ້ບົດຮຽນຈາກການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນໃນໂຮງຮຽນປະຈຳປະເພດ/ໂຮງຮຽນມັດທະຍົມບໍ່?
ເຈົ້າ ບໍ່

SA

(ກະລຸນາເບິ່ງດ້ານຫຼັງ)

ແບບສອບຖາມສຳລັບຄູອາຈານຢູ່ໃນສະຖາບັນສ້າງຄູ

ຊື່ຂອງການສຶກສາ: ສຶກສາການປະເມີນຜົນໄລຍະກາງຂອງໂຄງການ

ສຳລັບການຮ່ວມມືທາງດ້ານວິຊາການຂອງອົງການ JICA

ເພື່ອບັນຍັດຄູອາຈານທີ່ສອນວິຊາຄະນິດສາດແລະວິທະຍາສາດຢູ່ໃນສະຖາບັນສ້າງຄູ

ຊື່:

ຕຳແໜ່ງ:

ຫ້ອງການ/ອົງການ:

ເບີໂທລະສັບ: ເບີໂທ:

ແບບສອບຖາມນີ້ແມ່ນຖືກນຳໃຊ້ໃນການປະເມີນຜົນໄລຍະກາງໂຄງການຂອງການສຶກສາທີ່ໄດ້ກ່າວຂ້າງເທິງ. ຄຳຕອບຂອງພວກທ່ານຈະຖືກນຳໃຊ້ໃຫ້ເປັນບະໂຫຍດເພື່ອບັນຍັດຄູອາຈານດຳເນີນການຂອງໂຄງການ SMATT ແລະການຮ່ວມມືທາງດ້ານວິຊາການສຳລັບ ສປປ ລາວໂດຍການຮ່ວມມືສາກົນຂອງປະເທດຍີ່ປຸ່ນ (JICA) ໃນອະນາຄົດ.

ຄຳຕອບທີ່ພວກທ່ານໃຫ້ພວກຂ້າພະເຈົ້າແມ່ນຈະຖືກໃຊ້ພຽງແຕ່ສຳລັບການສຶກສາເທົ່ານັ້ນແລະເຈັບຄຳຕອບນີ້ຈະຖືກເກັບໄວ້ພາຍໃນຫມໍ້ງານປະເມີນຜົນຂອງອົງການ JICA.

ທ່ານໄດ້ເຂົ້າຮ່ວມການຝຶກອົບຮົມໃດແດ່ຂອງໂຄງການ SMATT ? ກະລຸນາໝາຍວົງມົນອ້ອມເອົາຄຳຕອບ

ການຝຶກອົບຮົມທີ່ປະເທດຍີ່ປຸ່ນ	2002	2003	2004	2005
ກອງປະຊຸມລະດັບຊາດ	2004 ທີ່ບຸນເຊ	2004 ທີ່ຫຼວງພະບາງ	2005 ທີ່ບ້ານເກີນ	
ກອງປະຊຸມລະດັບທ້ອງຖິ່ນ	2005 ທີ່ສະຫວັນນະເຂດ	2006 ທີ່ສາລະວັນ		

1. ກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນໄດ້ບັນຍັດຄູອາຈານໃນການສອນຂອງທ່ານ

ບໍ່

ເຈົ້າ

2. ຫົວຂໍ້ຕ່າງໆທີ່ໄດ້ລິນທະນາໃນກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນແມ່ນກົງກັນທົວຂໍ້ທີ່ທ່ານຍ່າກຝຶກອົບຮົມບໍ່?

ເຈົ້າ

3-1. ພາຍຫຼັງການຝຶກອົບຮົມເຖິງຕໍ່ເທິງຂໍ້ໃນກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນແລ້ວ ທ່ານສາມາດສອນຫົວຂໍ້ດັ່ງກ່າວໄດ້ບໍ່?

ເຈົ້າ

(ກະລຸນາເບິ່ງດ້ານຫຼັງ)

3-2. ໄລຍະເວລາຂອງການຝຶກອົບຮົມໃນກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນພໍດີແລ້ວບໍ່?

ເຈົ້າ

ບໍ່

3-3. ຈຳນວນຂອງສຳມະນາກອນໃນກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນພໍດີແລ້ວບໍ່?

ເຈົ້າ

ບໍ່

3-4. ການຄິດເລືອກອຸປະກອນຕ່າງໆສຳລັບກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນເໝາະສົມແລ້ວບໍ່?

ເຈົ້າ

ບໍ່

4. ທ່ານໄດ້ຂະຫຍາຍຜົນບົດຮຽນຈາກກອງປະຊຸມລະດັບຊາດແລະກອງປະຊຸມລະດັບທ້ອງຖິ່ນຢູ່ໃນຫ້ອງຮຽນຂອງທ່ານບໍ່?

ເຈົ້າ

ບໍ່

5. ທ່ານໄດ້ດຳເນີນການຝຶກອົບຮົມໃຫ້ແກ່ເພື່ອນຮ່ວມງານຢູ່ໃນສະຖາບັນສ້າງຄູບໍ່?

ເຈົ້າ

ບໍ່

6. ທ່ານໄດ້ດຳເນີນການຝຶກອົບຮົມໃຫ້ແກ່ຄູອາຈານຢູ່ໃນໂຮງຮຽນປະຖົມ/ໂຮງຮຽນມັດທະຍົມບໍ່?

ເຈົ້າ

ບໍ່

7. ບັນຍັດແມ່ນນຳການສອນຂອງ SMATT ໄດ້ຊ່ວຍທ່ານບັນຍັດຄວາມສາມາດໃນການສອນຂອງທ່ານຍ່າງພຽງພໍບໍ່?

ເຈົ້າ

ບໍ່

ຂອບໃຈຫຼາຍໆສຳລັບການໃຫ້ຄວາມຮ່ວມມືຂອງທ່ານ

ແບບສອບຖາມສຳລັບພະນັກງານຂອງສູນພັດທະນາຄູແລະຜູ້ບໍລິຫານການສຶກສາ ແລະກະກຽມສຶກສາທິການ

ຂໍ້ຂອງການສຶກສາ: ສຶກສາການປະເມີນຜົນໄລຍະກາງຂອງໂຄງການ

ສຳລັບການຮ່ວມມືທາງດ້ານວິຊາການຂອງອົງການ JICA

ເພື່ອປັບປຸງຄູອາຈານຜູ້ທີ່ສອນວິຊາຄະນິດສາດແລະວິທະຍາສາດຢູ່ໃນສະຖາບັນສ້າງຄູ

ຊື່:

ຕຳແໜ່ງ:

ຫ້ອງການ/ອົງກອນ:

ເບີໂທລະສັບ:

ເບີໂຟັກ:

ຂອບໂຄງຫຼາຍໆສຳລັບການໃຫ້ຄວາມຮ່ວມມືຂອງທ່ານ

ແບບສອບຖາມນີ້ແມ່ນຖືກນຳໃຊ້ໃນການປະເມີນຜົນໄລຍະກາງໂຄງການຂອງການສຶກສາທີ່ໄດ້ກ່າວຂ້າງເທິງ. ຄຳຕອບຂອງພວກທ່ານຈະຖືກນຳໃຊ້ໃຫ້ເປັນປະໂຫຍດເພື່ອປັບປຸງການດຳເນີນການຂອງໂຄງການ SMART ແລະການຮ່ວມມືທາງດ້ານວິຊາການສຳລັບ ສປປ ລາວ ໂດຍການຮ່ວມມືສາກົນຂອງປະເທດຊື່ນຸ່ມ (JICA) ໃນອະນາຄົດ. ຄຳຕອບທີ່ພວກທ່ານໃຫ້ພວກຂ້າພະເຈົ້າແມ່ນຈະຖືກໃຊ້ຢູ່ແຕ່ສຳລັບການສຶກສາເທົ່ານັ້ນແລະເຈ້ຍຄຳຕອບນີ້ຈະຖືກຖັກໄວ້ພາຍໃນທີມງານປະເມີນຜົນຂອງອົງການ JICA.

ທ່ານໄດ້ເຂົ້າຮ່ວມການຝຶກອົບຮົມໃດແດ່ຂອງໂຄງການ SMART? ກະລຸນາໝາຍວິງມືນອ້ອມເອົາຄຳຕອບ

ການຝຶກອົບຮົມທີ່ປະເທດຊື່ນຸ່ມ	2002	2003	2004	2005
ກອງປະຊຸມລະດັບຊາດ	2004	ທັບໆ	2004	ທີ່ຫຼວງພະບາງ
ກອງປະຊຸມລະດັບທ້ອງຖິ່ນ	2005	ທີ່ສະຫວັນນະເຂດ	2006	ທີ່ສາລະວັນ

1. ທ່ານໄດ້ເຂົ້າຮ່ວມຫຼືສົ່ງເກດການຝຶກອົບຮົມທີ່ໄດ້ກ່າວຂຶ້ນໂດຍ SMART ບໍ?

ເຈົ້າ ບໍ່

2. ຄູອາຈານຜູ້ທີ່ໄດ້ເຂົ້າຮ່ວມການຝຶກອົບຮົມເຊິ່ງໄດ້ກ່າວຂຶ້ນໂດຍ SMART ນັ້ນ ໄດ້ປັບປຸງຄວາມສາມາດໃນການສອນຂອງພວກເຂົາເຈົ້າບໍ?

ເຈົ້າ ບໍ່

3. ບັນດາບັນດາພະນັກງານສອນຂອງ SMART ມີຄຸນຄ່າໃນການຂະຫຍາຍຜົນໃຫ້ແກ່ທຸກໆໂຮງຮຽນປະຖົມ/ໂຮງຮຽນມັດທະຍົມຢູ່ໃນ ສປປ ລາວບໍ?

ເຈົ້າ ບໍ່

4. ທ່ານໄດ້ດຳເນີນການຕິດຕາມກວດກາກິດຈະກຳທ້ອງຖິ່ນເປັນປົກກະຕິບໍ?

ເຈົ້າ ບໍ່

(ກະລຸນາເບິ່ງດ້ານຫຼັງ)

2. PDM (2004年6月1日版)

Annex 1
1. June, 2004

Project Design Matrix (PDM) Project Title : Project for Improving Science and Mathematics Teacher Training Duration of the Project : 4 years The target of the Project : ITS and TTC teachers, and those from TEADG and the Department of Teacher Training in the Ministry of Education	Narrative Summary Overall Goal	Objectively Verifiable Indicators	Means of Verification	Important Assumptions
Teacher Training in the field of science and mathematics will be qualified.	Project Purpose Quality of TTC and TTS teachers in science and mathematics will be improved.	Number of trainings held in each TTC/TTS	JICA experts and counterparts will jointly prepare evaluation sheets, questionnaire for teaching methodology and tests for indispensable knowledge. Conduct pre-project (baseline) survey and post-project survey.	Participants of TIC, WS, and ICT do not quit their job. Enough budget for trainings is approved by MOE
1. Participants of TIC/TTS and guide/evaluate in WS/ICT.	Outlets Participants of TIC/TTS got the knowledge of subjects, teaching methodology in TIC/TTS and guide/evaluate in WS/ICT.	Average score of the evaluation of class observation will increase to more than 0 points. Result of the questionnaire for teaching methodology Result of the test for indispensable knowledge	JICA experts and counterparts will jointly prepare questionnaire for awareness of the education issues in the Lao PDR and conduct the survey after TIC/TTS. JICA experts and counterparts will jointly evaluate the performance of lecturers after WS/ICT. TIC participants ought to submit reports about activities in TIC and after TIC.	Participants of TIC, WS, and ICT do not quit their job.
2. Participants of WS/ICT got the knowledge of subjects and teaching methodology in TIC/TTS.	Participants of WS/ICT got the knowledge of subjects and teaching methodology in TIC/TTS.	Result of the questionnaire for awareness of the education issues in the Lao PDR (after TIC/TTS) Result of the evaluation for lecture/evaluation of lecturers (participants of TIC) Content of the report submitted by participants of TIC about their dissemination activities Examples of teaching methodology and teaching materials introduced by participants of TIC	Conduct questionnaire after WS/ICT. Conduct evaluation after WS/ICT Report and request from participants of WS/ICT for their own activities. Conduct ICT Report from TIC/TTS director, and questionnaire Publication of the collection of teaching guides	
3. The collection of teaching guides for TIC/TTS is developed and utilized.	Activities To train candidates of science and mathematics leaders 1-1 [TIC] Implementation organizations of TIC give lectures on Japanese school system, education system and teacher training system. 1-2 [TIC] Implementation organizations of TIC make participants to compare educational situation of Lao PDR and Japan. 1-3 [TIC] Implementation organizations of TIC give lectures and practices on subjects and methodology. 1-4 [TIC] Implementation organizations of TIC give lectures on evaluation. 1-5 [WS/ICT] Lecturers (participants of TIC) give lectures on the knowledge which obtained in TIC. 1-6 [WS] Japanese short-term experts offer lecturers necessary advices on their lectures and evaluation.	ICT using the teaching guides will be organized at least 8 times per year. At least 60% of TIC/TTS teachers who teach the same topics as those in teaching guides use teaching guides. Publication of the collection of teaching guides (final year of the Project)	Conduct ICT Report from TIC/TTS director, and questionnaire Publication of the collection of teaching guides	
2. To train people in the target except above-mentioned 1	2-1 [WS, ICT] Lecturers (participants of TIC) give lectures on Japanese school system, education system and teacher training system. 2-2 [WS, ICT] Lecturers (participants of TIC) make participants to compare educational situation of Lao PDR and Japan. 2-3 [WS, ICT] Lecturers (participants of TIC) give lectures and practices on subjects.	Inputs (Japanese Government) [personnel] 4 Short-term experts (Math • Physics • Chemistry • Biology) x 1 month x 4 years 1 Long-term expert (Project coordinator/Training planning) x 12 months x 4 years [training] TIC 10 people x 2 months/year x 3 years WS 10 people x 4 subjects x 2 times/year x 4 years ICT 10 people x 1 subjects x 8 times/year x 4 years On the job training for counterparts Study tour to similar JICA project Attend relevant conferences [local costs] Equipment for Project Office Necessary materials for WS, ICT Transportation expenses for WS, ICT	[personnel] Counterpart personnel [local costs] Organize WS (meeting places, accommodation allowance of participants etc.) Organize ICT (meeting places, accommodation allowance of participants etc.) Provide Project Office	
3. To prepare teaching guides	3-1 [TIC] Implementation organizations of TIC make participants to prepare tentative teaching guides on some topics which are difficult for TIC/TTS students and students of primary and lower secondary schools to understand. 3-2 [WS] Lecturer and short-term experts make participants to confirm teaching guides. 3-3 [ICT] Lecturer give lectures by using teaching guides confirmed in WS.			Pre-conditions The targeted members will understand this project and have commitments for improving quality of teacher training.

(*) O will be clarified after the baseline survey.

4. 評価の方法・評価グリッド

Method of Mid-Term Evaluation

1. Purpose of Evaluation

Mid-Term Evaluation examines;

- 1) whether the project is properly producing effects at the mid-term
- 2) whether the project is on the right track to attain the project purpose

Results of the evaluation are utilized to improve the project strategy for the latter part of the project period as well as lessons for similar type of projects.

2. Process of Evaluation

Mid-Term Evaluation consists of the following three steps;

Grasping the project implementation situation (data collection and analysis)

- 1) **check the achievement or performance of the project**
- 2) **check the implementation process of the project**

Interpretation of the data (value judgment and drawing conclusion)

- 3) **evaluate the project from the comprehensive viewpoints of five criteria**

To perform the evaluation, it needs to grasp the implementation situation of the project with the information on the performance and its implementation process. Information on performance includes the results of inputs, outputs, and the degree of achievement of a project's purpose and overall goal. Information on implementation process includes how far activities proceeded and what is happening at the project site. The analysis is implemented with the guide of Evaluation grid which tells how to collect data needed and the method to get them.

This evaluation grid refers to the modified Project Design Matrix (PDM) approved by Joint Coordinating Committee on July 12, 2005 as a guideline of the evaluation together with the Plan of Operation.

After the data gathering, the achievement of the Project is interpreted by the following five criteria through discussions among the joint evaluation team.

a. Relevance	Relevance of the Project is reviewed by the validity of the project in connection with the development policy of the Government of Lao PDR.
b. Effectiveness	Effectiveness is assessed by the achievement of the Project purpose clarifying the relationship with outputs.
c. Efficiency	Efficiency is analyzed with the emphasis on the relationships between outputs and inputs in terms of timing, quality and quantity.
d. Impact	Impacts of the Project are assessed in both positive and negative influences caused by the Project.
e. Sustainability	Sustainability of the Project is assessed whether the achievement of the Project will be sustained and expanded after the Project's completion.

3. Evaluation Grid

To implement the evaluation, "Evaluation Grid" should be prepared. Evaluation grid is a table of evaluation work plan. All components in the evaluation grid are interrelated to each other, and help us design the most appropriate work plan for the evaluation.

The Evaluation Grid for the Evaluation is shown on the following pages.

1. Project Performance (check the implementation and achievement of the project's activities following PDM)

Narrative Summary	Objectively Verifiable Indicators	Means of Verification	Important Assumptions
<p>Overall Goal</p> <p>Teacher Training in the field of science and mathematics will be upgraded.</p>	<ul style="list-style-type: none"> Number of trainings held in each TTC/TTS 		
<p>Project Purpose</p> <p>Quality of TTC and TTS teachers in science and mathematics will be improved.</p>	<ul style="list-style-type: none"> Until 2008 (at the end of the SMATT Project), average evaluation score of the class observation will be increased more than or equal to 10 % of the first score in all subjects. Until 2008, the score of indispensable knowledge test will be more than or equal to 50/100 in all subjects. Analyze the change of the relation between questionnaire for teaching method and indispensable knowledge test. To make it, draw a graph using data of questionnaire for teaching method as x axis, and indispensable knowledge test as y axis, and check which direction each teacher moves on the graph.. Class observation will be implemented once a month in general classes of all TTC/TTS. 	<ul style="list-style-type: none"> JICA experts and counterparts will jointly prepare evaluation sheets, questionnaire for teaching methodology, tests for indispensable knowledge. Conduct pre-project (baseline) survey and post-project survey. Analyze data of questionnaire and test. Reports from directors of TTC/TTS 	<p>Participants of TIJ, WS, and ICT do not quit their job. Enough budget for trainings is approved by MOF.</p>

Narrative Summary	Objectively Verifiable Indicators	Means of Verification	Important Assumptions
<p>Outputs</p> <p>1. Participants of TIJ got the knowledge of subjects, teaching method in TTC/TTS and guide/evaluate in WS/ICT.</p>	<ul style="list-style-type: none"> ▪ Results of two evaluations, for lecture by PMU and experts, and for evaluation to participants by lecturers, are more than 3.5/5.0 every year. ▪ As a result of the evaluation for activity reports submitted by TIJ participants, good examples worth to be informed or praised will be increased year by year. 	<ul style="list-style-type: none"> ▪ After WS, JICA experts and counterparts jointly evaluate the performance of lecturers. And after ICT, counterparts evaluate the performance of lecturers. ▪ TIJ participates submit activity reports not later than the end of May every year. Reports are translated into English and evaluated by both Lao side and Japanese side between WS. 	<p>Participants of TIJ, WS, and ICT do not quit their job.</p>
<p>2. Participants of WS/ICT got the knowledge of subjects and teaching method in TTC/TTS.</p>	<ul style="list-style-type: none"> ▪ Results of two evaluations, for participants of WS by PMU and experts and for participants of ICT by PMU are more than 3.0/5.0 every year. ▪ As a result of the evaluation of the requests and reports submitted by WS/ICT participants, good examples worth to be informed or praised will be increased year by year. 	<ul style="list-style-type: none"> ▪ After WS, JICA experts and counterparts jointly evaluate participants. And after ICT, counterparts evaluate participants. ▪ Participants of WS/ICT submit budget requests and reports for their activities. 	
<p>3. The collection of teaching guides for TTC/TTS is developed and utilized.</p>	<ul style="list-style-type: none"> ▪ When teachers teach the topics which is introduced in the teaching guides, at least 80% of TTC/TTS teachers use the teaching guides. ▪ At the final year of the Project, a collection of teaching guide is published. 	<ul style="list-style-type: none"> ▪ Reports from directors of TTC/TTS ▪ Questionnaire to teachers ▪ Publication of the collection of teaching guides (final year) 	

Activities	Inputs Japanese Government)	Inputs(Lao Government)
<p>1. To train candidates of science and mathematics leaders</p> <p>1-1 【TIJ】 TIJ Implementation organizations give lectures on Japanese school system, education system and teacher training system.</p> <p>1-2 【TIJ】 TIJ Implementation organizations make participants to compare educational situation of Lao PDR and Japan.</p> <p>1-3 【TIJ】 TIJ Implementation organizations give lectures and practices on subjects and method.</p> <p>1-4 【TIJ】 TIJ Implementation organizations give lectures on evaluation.</p> <p>1-5 【WS/ICT】 Lecturers (participants of TIJ) give lectures on the knowledge which obtained in TIJ.</p> <p>1-6 【WS】 Japanese short-term experts offer lecturers necessary advices on their lectures and evaluation.</p> <p>1-7 【WS】 TIJ Participants present their dissemination activities on Review meeting.</p> <p>1-8 【ordinary】 Implement class observation in general classes.</p>	<p>【personnel】 4 Short-term experts (Math・Physics・Chemistry・Biology) × 1 month × 4 years 1 Long-term expert (Project coordination/Training planning) × 12 months × 4 years</p> <p>【training】 TIJ 10 people × 2 months/year × 3 years WS 20 people × 4 subjects × 1 times/year × 4 years ICT 20 people × 4 subjects × 1 times/year × 4 years</p> <p>On the job training for counterparts Study tour to similar JICA project Attend relevant conferences</p> <p>【local costs】 Equipment for Project Office Necessary materials for WS, ICT Transportation expenses for WS, ICT</p>	<p>【personnel】 Counterpart personnel</p> <p>【local costs】 Organize WS (meeting places, accommodation allowance of participants etc.) Organize ICT (meeting places, accommodation allowance of participants etc.) Provide Project Office</p>

<p>2. To train people in the target except above-mentioned 1</p> <p>2-1 【WS, ICT】 Lecturers (participants of TIJ) give lectures on Japanese school system, education system and teacher training system.</p> <p>2-2 【WS, ICT】 Lecturers (participants of TIJ) make participants to compare educational situation of Lao PDR and Japan.</p> <p>2-3 【WS, ICT】 Lecturers (participants of TIJ) give lectures and practices on subjects.</p> <p>2-4 【ordinary】 Implement class observation in general classes.</p>			
<p>3. To prepare teaching guides</p> <p>3-1 【TIJ】 TIJ Implementation organizations make participants to prepare tentative teaching guides on some topics which are difficult for TTC/TTS students and students of primary and lower secondary schools to understand.</p> <p>3-2 【WS】 Lecturers and short-term experts make participants to confirm teaching guides.</p> <p>3-3 【ICT】 Lecturers give lectures by using teaching guides prepared after WS.</p>			<p>Pre-conditions</p> <p>The targeted members will understand this project and have commitments for improving quality of teacher training.</p>

2. Implementation Process (check how the project has been implemented)

Evaluation Questions		Data Needed (Indicators)	Data Sources
Area of the Questions	Detailed Questions		
1. Is there any problem in the method of technology transfer?	1-1 Has the desired technology transferred to counterpart properly?		<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to PMU and Long-Term Expert
	1-2 Does the project bring about changes in attitude of target group on science and math lessons and teacher training?		<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to PMU and Long-Term Expert • Interview to TTC/TTS Director • Interview to TIJ participants
	1-3 Are the themes and topics discussed in the training programs appropriate?		<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to TTC/TTS Director • Interview to TIJ participants
2. Is there any problem in the project management and implementation?	2-1 Is JCC functioning properly?	• Timing and content of JCC	• Report of JCC and Minutes of Meeting
	2-2 Is there sufficient communication within the project?	• Frequency, content of formal or non-formal meeting among the members of PMU	<ul style="list-style-type: none"> • Interview to PMU and Long-Term Expert • Reference reports for the meeting
	2-3 Is the monitoring activity being implemented appropriately?	• Frequency, content, and quality of monitoring	<ul style="list-style-type: none"> • Monitoring reports • Interview to PMU and Long-Term Expert
	2-4 Is the management system of Lao side functioning appropriately?		<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to PMU and Long-Term Expert
	2-5 Is there a strong ownership of Lao people who are related to the project?		<ul style="list-style-type: none"> • Interview to TTC/TTS Director • Interview to TIJ participants
3. Is there any problem in the cooperation between Japanese experts and counterparts?			<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to PMU and Long-Term Expert
4. Does any problem occur in the process of implementing the project?			<ul style="list-style-type: none"> • Interview to TTC/TTS Director • Interview to TIJ participants

3. Five Evaluation Criteria (value judgment from comprehensive view points)

Criteria	Evaluation Questions		Data Needed (Indicators)	Data Sources
	Area of the Questions	Detailed Questions		
Relevance	1. Is the project purpose consistent with the needs of the TTC/TTS teachers?	1-1 Do the teachers in TTC/TTS have the needs to improve their teaching capability?	<ul style="list-style-type: none"> Needs of MOE Needs of TTC/TTS teachers 	<ul style="list-style-type: none"> Report on the preparatory study on the project Interview to TTC/TTS Director, teachers, students, PMU Interview to Short-Term Experts Interview to Long-Term Experts Interview to JOCV members
	2. Is the project consistent with the development policy of the Lao PDR?	2-1 Is the project consistent with the Lao PDR's National Growth and Poverty Eradication Strategy and five-year socio-economic development plan?	<ul style="list-style-type: none"> Recognition of the importance of Science and Mathematics education and teacher training 	<ul style="list-style-type: none"> Fifth five-year socio-economic development plan (2001-2005) Draft of sixth five-year socio-economic development plan (2006-2010) National Growth and Poverty Eradication Strategy (2004) MDGs Progress Report (2004) Interview to MOE
	3. Is the project consistent with Japan's foreign aid policy?	3-1 Is the project consistent with Japan's Country Assistance Strategy for Lao PDR?	<ul style="list-style-type: none"> Policy of Japanese Assistance for Lao PDR 	<ul style="list-style-type: none"> Country Assistance Strategy for Lao PDR 2nd draft
Effectiveness	1. Are outputs produced as planned? (compare with planned value)	1-1 Have the participants of TIJ acquired the knowledge of subjects, teaching method in TTC/TTS and guide/evaluate in WS/ICT?	<ul style="list-style-type: none"> Any indication which shows the improvement of teaching skills of TIJ participants 	<ul style="list-style-type: none"> Interview to Short-Term Experts Report of TIJ Interview to PMU (evaluators) Interview to TIJ participants Interview to TTC/TTS Director, Head of department, and teachers
		1-2 Have the Participants of WS/ICT acquired the knowledge of subjects and teaching method?	<ul style="list-style-type: none"> Any indication which shows the improvement of teaching skills of WS or ICT participants 	<ul style="list-style-type: none"> Interview to Short-Term Experts Report of TIJ Interview to PMU (evaluators) Interview to TIJ participants Interview to TTC/TTS Director, Head of department, and teachers

		1-3 Are the developed teaching guides contributing to the improvement of teaching capability of the teachers in TTC/TTS?	<ul style="list-style-type: none"> • Do the teachers in TTC/TTS utilize the developed teaching guides in the lessons? • Do the developed teaching guides help teachers enough? 	<ul style="list-style-type: none"> • Interview to Short-Term Experts • Report of TIJ • Interview to PMU • Interview to TIJ participants • Interview to TTC/TTS Director, Head of department, and teachers
	2. Is the project purpose likely achieved?	2-1 Do the teachers in TTC/TTS turn the acquired knowledge and skills to practical use?	<ul style="list-style-type: none"> • Report of activities on Review Meeting • Report of the class observations 	<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to Long-Term Expert • Report of TIJ, WS, and ICT • Interview to PMU • Interview to TIJ participants • Interview to TTC/TTS Director, Head of department, and teachers
Efficiency	1. Is the achievement level of the outputs adequate? (compare with the target value)	1-1 Are the inputs and activities sufficient to achieve the three outputs?	<ul style="list-style-type: none"> • Appropriateness of dispatch of experts • Appropriateness of cost sharing • Appropriateness of provision of equipment 	<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to Long-Term Expert • Interview to PMU members • Interview to TIJ participants
	2. Is input of quantity and quality implemented adequately on the right time? (compare with the achievement of outputs)	2-1 Is the dispatch of Japanese experts appropriate in terms of number, specialization, communication skill, timing, and duration? (timing and duration is the consideration of the timing of WS)	<ul style="list-style-type: none"> • Is the dispatch of experts appropriate to effective implementation of the project? • Are there any negative effects caused by the period of dispatch of experts? 	<ul style="list-style-type: none"> • Interview to Short-Term Experts • Interview to Long-Term Expert • Interview to PMU members • Interview to TIJ participants
		2-2 Are the suitable counterparts assigned? (number, ability, timing, age, position/status)		<ul style="list-style-type: none"> • Interview to Short-Term Expert • Interview to Long-Term Expert
		2-3 Are the sufficient budget measures taken by Lao government?		<ul style="list-style-type: none"> • Interview to Long-Term Expert • Interview to PMU

	3. Are there any factors which inhibit the achievement of the outputs?	3-1 Are there any unnecessary or unutilized inputs to the project?		<ul style="list-style-type: none"> •Interview to Long-Term Expert •Interview to PMU
Impact	1. Is there prospect of the achievement of the overall goal?	1-1 As the project progresses, the teaching in TTC/TTS are improved?	<ul style="list-style-type: none"> • Are there any change which is caused by the project? • Do TTC/TTS Directors appreciate the improvement of the teachers teaching capability? • What are the sign of them? 	<ul style="list-style-type: none"> • Interview to TTC/TTS Director, Head of Department, teachers • Interview to TTC/TTS students (questionnaire)
	2. Are there effects or influence to the school level?	2-1 Are there any examples which TTC/TTS teachers introduce the study on the project into primary/lower-secondary schools?		<ul style="list-style-type: none"> • Report of TIJ Participants • Interview to TTC/TTS Director, Head of Department, teachers, PMU • Interview to MOE
	3. Are there any negative impacts? What measures are there to eliminate them?			<ul style="list-style-type: none"> • Interview to TTC/TTS Director, Head of Department, teachers, PMU • interview to MOE
Sustainability	1. Is the benefit of the project kept after JICA assistance is over?	1-1 What is the ideal illustration of teachers/teacher training in TTC/TTS?		<ul style="list-style-type: none"> • Interview to TTC/TTS Director, PMU • Interview to TIJ participants
	2. Is the training programs implemented continuously at TTC/TTS?	2-1 Is the budget secured after JICA project is over?		<ul style="list-style-type: none"> • Interview to TTC/TTS Director, PMU • Interview to MOE
	3. Are the way of teacher training and the teaching method introduced by the project being accepted?	2-2 Are the teaching guides appropriately maintained and utilized? 3-1 Are the developed teaching skills by the project accepted and utilized in TTC/TTS?	<ul style="list-style-type: none"> • Developed teaching guides at the moment of mid-term evaluation 	<ul style="list-style-type: none"> • Interview to TTC/TTS Director, PMU • Interview to MOE

5. インタビュー結果概要（教育省）

インタビュー結果概要

（教育省スタッフ）

a) Achievement of SMATT

- SMATT improves teachers' capability. The signs of them are;
 - Teachers enjoy teaching.
 - Teachers look confident.
 - Teachers are not afraid of observers.
 - Teachers are motivated to teach better.
 - Teachers become positive to learn new strategy.
 - Teachers become creative.
 - Teachers become responsible.
 - Teachers try improvisation.
 - Teachers change their teaching method.
 - Teachers ask trainers where the materials come from.
 - Teachers start proving formulas in Mathematics since DTT requests teachers to do it.
- The following is also found as the sign of improvement on the side of student-teachers;
 - Student-teachers do the homework following the teacher's instruction.

b) Improvement of teachers' teaching strategy

- Teachers apply what they have learned through SMATT
 - Teachers change their teaching from "talking and writing" into "communicative approach."
 - Teachers change their teaching into "learning by doing."
 - Teachers know how to learn by themselves.
 - Teachers change their teaching from "theory only, no practice" into "practical and experimental."
 - Teachers forced the student-teachers to "memorize theory" but they encourage them to "practice."

c) Usage of SMATT Teaching Guides (TGs)

- TGs are very "useful."
- TGs should be disseminated to primary/lower-secondary teachers through TTC/TTS.
- Teachers can continue developing TG by themselves.
- TGs have to follow the actual needs of the teachers.
- The needs of TTC/TTS teachers and primary/lower-secondary teachers are different.
- According to the needs of teachers, TGs should be developed every year.
- DTT tries to find the fund for TG production.
- They need the care that several teaching guides/lesson plans given by donors might make teachers in trouble.

- In order to make PA know well about SMATT or any other project, they should attend the training program.
- In order to realize the lesson which is introduced in TGs, teachers sometimes need budget to prepare the materials.
- “Student centered” teaching method is worth introducing to Lao education.

d) Continuation of training programs

- If DTT has enough money, those should be continued.
- Even though SMATT is over, the training programs should be continued by each TTC/TTS.
- Consideration of strengthening of the linkage between SMATT and TTEST/EQIP-II.
- TIJ participants can conduct training programs such as WS or ICT by themselves; they try to do some.

e) Direction of SMATT

- SMATT should give more attention to the improvement of teachers’ teaching capability; the production of TGs is not enough, we have to teach teachers how to maximize TGs.
- SMATT requests the students to evaluate only teachers who teach class for all the year around, but it is better to make it every teacher.
- The class observation should be implemented with feed-backing.
- TTC/TTS should conduct workshop together with primary/lower-secondary teachers nearby.

f) Problem in Lao education

- DTT staff is so busy because of so many projects.
- The weak points of the Science and Math teachers are their level of subject knowledge and teaching method.

6. インタビュー結果概要（教員教育・運営開発センター）

インタビュー結果概要

（教員教育・運営開発センター）

a) Achievement of SMATT

- SMATT improves teachers' capability. The signs of them are;
 - Teachers get new method which is not introduced in textbook.
 - Teachers are not afraid of observers.
 - Teachers who follow SMATT change their teaching.
 - Teachers change their teaching method to practical way.
 - New teaching strategy is fit for Lao teaching theoretically but the environment should be improved to make it practical.
 - Teachers who practice new teaching way become confident.

b) How teachers change their teaching

- Teachers apply what they have learned through SMATT
 - Teachers change their teaching into “student centered.”
 - Teachers change their teaching into “learning by doing.”
 - Teachers know “learning by doing” but it is not so deep.

c) Use of SMATT Teaching Guides

- TGs are very “useful”
- Some teachers want to add some topics from the curriculum of TTC/TTS.
- Making TGs is effective to improve teaching capability.
- Lao teachers just follow traditional teaching guides and they do not create their own lesson plans.
- If teachers follow TGs, they improve their teaching capability.
- Teaching strategy is applicable but the materials introduced in TGs are still difficult to find in rural area.
- Through activity, teachers/student-teachers can memorize the theory longer term.
- TIJ participants should give lecture how to improvise materials step-by-step.

d) Effectiveness of Class Observation

- Class observation is effective because it tells how teachers teach and observers can give suggestions for the improvement.
- Class observation should be implemented with discussion or feed-backing.
- Giving feed-back and advice after class observation help teachers improve their teaching.
- Continuation of class observation helps teachers improve their capability.
- PAs should participate in SMATT to equip themselves with the new teaching method.

e) Continuation of the training programs

- SMATT is very helpful for the teachers; this kind of training should be continued.
- To apply new teaching method, there should be some modifications to fit Lao situation.
- Since inputs from donors are not always fit Lao situation, MOE should clarify the actual needs of Lao teachers.
- Training of the teachers in TTC/TTS is effective but they have to realize why they are learning how to teach with primary/lower-secondary curriculum.
- When the trainers conduct the training programs, they have to make reports or record materials of the training and those should be compiled as a training manual for the future use.
- The training programs should cover not only TTC/TTS but also primary/lower-secondary schools.
- Lao teachers need continuous support of SMATT or other JICA project.
- To apply the new method to Lao class, the materials/facilities should be prepared.
- To make teachers improve their teaching, the teachers' living conditions should be improved.
- "Student centered" teaching method is accepted, but implementation is difficult due to financial constraint.
- Teachers almost understand "student centered" lesson but they cannot implement thoroughly; they teach the students with new method and traditional method mixed.

f) Relationship with Short-Term Experts

- The relation was very good.
- Evaluators were taught evaluation method by short-term experts; they have the same viewpoints of evaluation.

g) Direction of SMATT

- The policy of SMATT meets the needs of science and mathematics education in Laos

7. インタビュー結果概要 (TTC 教官)

インタビュー結果概要

(TTC 理数科教官)

Teachers in Luang Prabang TTC

a) Achievement of SMATT

- SMATT improves teachers' capability. The signs of them are;
 - Teachers become responsible.
 - Teachers try to apply game to their class.
 - Teachers want the TIJ participant to come and observe their lesson for improvement.
 - Teachers understand how to make/use teaching plan and teaching materials.
- The followings are also found as the signs of improvement on the side of student-teachers;
 - Student-teachers enjoy the lesson.
 - Student-teachers pay attention much.
 - Student-teachers want to continue the experiment even the class should be finished.
 - Student-teachers remember longer than that of before.

b) How teachers change their teaching

- Teachers apply what they have learned through SMATT
 - Teachers change their teaching into "student centered."
 - To apply the new method to Lao class, the materials/facilities should be prepared.
 - "Concept mapping" is a way to make teachers comprehend.
 - Be careful to apply new teaching method into Lao class because the teachers in primary/lower secondary schools have their lesson plans.
 - Teachers start making improvised materials.
 - Teachers improve their lesson planning.

c) Usage of SMATT Teaching Guides

- TGs are very "useful."
- Luang Prabang TTC has distributed TGs to near primary/lower-secondary schools.
- When teachers apply the new method, the children remember better than by traditional way.
- To continue the production of TGs, the same process done in WS can be applied.
- Teachers have to know that new method cannot be applied to all lessons; it is depends on the content.
- TGs should be designed for the teachers in TTC/TTS.
- New curriculum for TTC/TTS, which is now being piloted, gives more focus on how to teach in primary/lower-secondary.
- Primary/lower-secondary teachers have their own lesson plans provided by PA; it is difficult for the teachers in primary/lower-secondary to accept new method.

d) Effectiveness of Class Observation

- Class observation tells how teachers teach and observers can give suggestions for improvement.
- Luang Prabang TTC practices class observation twice per semester; teachers can maximize what they have learned through SMATT.
- Some teachers utilize the observation sheet made by TTEST.

e) Continuation of the training programs

- SMATT is very helpful for teachers; this kind of training should be continued.
- Training program should introduce how to make improvised materials.
- The teaching method introduced by SMATT is applicable to Lao education.
- Lao teachers have to know how students get knowledge.
- TTC/TTS teachers have to conduct even a small workshop to disseminate the method of SMATT.
- Before teachers disseminate the new teaching method, TTC/TTS has to try it out to fit Lao classroom situation.
- New teaching method should be disseminated to all teachers in the country.
- Luang Prabang TTC shoulders Kip 30,000 (per head, per night) as the expense for accommodation of teachers who attend the training program.
- There is no confusion among the teachers because two teaching methods introduced by SMATT and TTEST are similar to each other.
- Teachers tried to conduct training programs, but they could not implement because of financial constraint.
- Luang Prabang TTC can continue training programs as in-house training.

f) Relationship with Short-Term Experts

- There was no problem on the relationship with short-term experts
- Short-term experts worked closely with TIJ participants.

Teachers in Bankeun TTC

a) Achievement of SMATT

- TIJ participant tries to use locally available materials.
- ICT is much comfortable than WS because all the sessions are conducted in Lao.
- WS is much resourceful than ICT because the participants can ask Japanese short-term experts any questions especially technical ones.

b) Usage of SMATT Teaching Guides

- Teachers in primary schools have to modify TG to fit their actual situation.
- Since the content of TG is primary level, it is suited for teacher-students' use.
- TG is very useful for student-teachers when they conduct practical teaching because it shows the flow of whole lesson.

c) **dissemination of SMATT achievement**

- TIJ participant introduced new teaching strategy to colleagues.
- TIJ participant conducted a demonstration lesson in primary school and made teachers in the school observe.
- TIJ participant arranged a meeting to introduce new teaching strategy for the group of teachers in TTC.
- When TTC/TTS distributes TG to primary/lower-secondary school, it is better to conduct workshop to tell the teachers in primary/lower-secondary how to utilize them.

d) **Continuation of the training programs**

- It is better to invite primary/lower-secondary teachers to WS and ICT.

e) **about TTEST**

- Since TTEST tries to apply “student centered” approach, it is similar to SMATT.
- There is no confusion even two different projects target the teachers in TTC.
- SMATT gives more emphasis on making students think, compared with TTEST.
- TIJ participant apply any strategy of both projects into their lessons.