



**COMMUNITY – CULTURES BASED ENVIRONMENTAL
EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY**



WEERA RAWANG

อภิรักษ์นันทาคาร

จาก

บัณฑิตวิทยาลัย มหาวิทยาลัยมหิดล

**A THESIS SUBMITTED IN PARTIAL FULFILLMENT OF
THE REQUIREMENT FOR THE DEGREE OF DOCTOR OF
EDUCATION (ENVIRONMENTAL EDUCATION)
FACULTY OF GRADUATE STUDIES
MAHIDOL UNIVERSITY**

2001

ISBN 974-04-0844

COPYRIGHT OF MAHIDOL UNIVERSITY

TH
W998C
2001

Thesis
entitled

**COMMUNITY – CULTURES BASED ENVIRONMENTAL
EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY**



Weera Rawang

Mr. Weera Rawang
Candidate

C. Manee

Assoc. Prof. Manee Chaiteeranuwatsiri, Ph.D.
Major advisor

P. Pichayapaiboon

Lect. Pattaraboon Pichayapaiboon, Ed.D.
Co-advisor

P. Ruengdet

Assoc. Prof. Ruengdet Pankhuenkhat, Ph. D.
Co-advisor

Liangchai Limlomwonges

Prof. Liangchai Limlomwonges, Ph.D.
Dean
Faculty of Graduate Studies

R. Supapongpichate

Assoc. Prof. Rachanont Supapongpichate, Ph.D.
Chair
Doctor of Education Programme
in Environmental Education
Faculty of Social Sciences and Humanities

Thesis
entitled

**COMMUNITY – CULTURES BASED ENVIRONMENTAL
EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY**

was submitted to the Faculty of Graduate Studies, Mahidol University for the
Degree of Doctor of Education (Environmental Education)

on
November 5, 2001

Weera Rawang

Mr. Weera Rawang
Candidate

C. Manee

Assoc. Prof. Manee Chaiteeranuwatsiri, Ph.D.
Chair

Patya Saihoo

Prof. Patya Saihoo, Ph.D.
Member

P. Pichayapaiboon

Lect. Pattaraboon Pichayapaiboon, Ed.D.
Member

Kowit Krachang

Lect. Kowit Krachang, D.Tech.Sc.
Member

P. Ruengdet

Assoc. Prof. Ruengdet Pankhuenkhat, Ph. D.
Member

Liangchai Limlomwonges

Prof. Liangchai Limlomwonges, Ph.D.
Dean
Faculty of Graduate Studies
Mahidol University

Suree Kanjanawong

Assoc. Prof. Suree Kanjanawong, Ph.D.
Dean
Faculty of Social Sciences and Humanities
Mahidol University

ACKNOWLEDGEMENT

The goal achievement of community-cultures based environmental education model for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City was reached because of the advisor's active consult during the researcher's doctoral degree, Assoc.Prof. Manee Chaitheeranuwatsiri, Ph.D. who has been not only an "*Academic Advisor*" but also "*Chair of Dissertation Committee*". In addition, Dr.Pattaraboon Pichayapaiboon and Assoc.Prof.Ruengdet Pankhuenkhat, Ph.D. the members of dissertation committee giving me the great opportunity for their suggestions together with Assoc.Prof.Suphachit Manopimok, Ph.D. Assoc.Prof. Rachanont Supapongpichate, Ph.D. Prof. Patya Saihoo, Ph.D. and Dr.Kowit Krachang, the dissertation examination committee paying highly their kindness for practical recommendations to complete this research final report as well.

Another group of advisors giving deeply major information related the community and its culture during a year of the researcher's field study in the community was the local experts on community-cultures; Mr.Panya Namphet, Mr.Phoj Pulsawat, Phrakru Patarakitsophon, Phra Athikan Sukrithavaro, Mr.Phaitoon Khawmala, Asst.Prof.Sutham Chatasing, Asst.Prof.Sang Pornsi, Mrs.Jiraphan Pimpan, Dr.Pathompong Supalert, Mr.Phansawat Suksawat, Mr.Soonthon Sowapi, Mr.Somphat Mephan, Mrs.Boonchuay Si-u, Mrs.Praphat Ruengkit and Mr.Charern Khantharuji together with 379 informants being heads of households and 40 villagers participating the model efficiency evaluation as well. However, this study could not be complete without the assistant of the officers of Education Department, Faculty of Humanities and Social Sciences, Mahidol University; Ayutthaya Ratchamongkhon Technology Institute, Huntra Campus; Ayutthaya Ratchabhat Institute; Ayutthaya Municipality; The 6th Region of Ayutthaya Tourism Office; The 3rd Region of National Archeological Sites and Museum; The Office of Ayutthaya Historic City and Mongkhonbophit Foundation.

Furthermore, the researcher desired to give special thanks to Acting Prof.David Brown, from the International Languages Center, Mahidol University, who edited this final research report, Mr.Phranai Sawanarat; Deputy Governor of Ayutthaya Province, Mr.Somma Khotchanam, Mr.Chain Rodsiri, Mr.Chatphong Sukkue, Mr.Phairat Thitpat, Col.Prachoom Mathuramon, Mr.Priwan Jaisa-ngiam, Miss Rungthiwa Khongcharern, Mr.Metha Wichakkhana, Miss Prapaporn Chulilang Miss Pornsawan Rodkhlai, Mrs. Prayong Phaetem, Mrs.Ratchanee Sukkue, Mrs.Nathakul Thorapathi, Mrs.Siriporn Thong-un, Miss Ratana Khongboon, Mr. Boonsong Bowornsawat together with the researcher's doctoral classmate and those whose names were not mentioned here. Moreover, the researcher may make the valuable respectation to those being previous instructors giving all of my learning to achieve this study; especially Mr.Prakob-Mrs.Pian Rawang; my beloved parents, Mr.Samran-Mrs.Amporn Khongcharearn; my wife parents, Mrs.Rungwadee-Master Wit Rawang; my wife and son who have been paying me the empower during my whole life. Over of all any valuable benefits effected by the application of Community-Cultures Based Environmental Education Model, need to be donated for the ancestors of Ayutthaya Kingdom who created the civilized and prosperous art object environment empirically appearing in Thailand to the World.

Weera Rawang

4037279 SHED/D: MAJOR: ENVIRONMENTAL EDUCATION; Ed.D.
(ENVIRONMENTAL EDUCATION)

KEY WORDS : COMMUNITY-CULTURES/ART OBJECT ENVIRONMENT/
CONSERVATION AND DEVELOPMENT

WEERA RAWANG: COMMUNITY-CULTURES BASED
ENVIRONMENTAL EDUCATION: A CASE STUDY FOR THE WORLD
CULTURAL HERITAGE OF AYUTTHAYA HISTORIC CITY. THESIS
ADVISORS: MANEE CHAITEERANUWATSIRI, Ph.D., PATTARABOON
PICHAYAPAIBOON, Ed.D., RUENGDET PANKHUENKHAT, Ph.D.
268 pp. ISBN 974-04-0844-3

The valuable art object environment standing supportably quality of life should be based on participation and the community-cultures are what leading to the community participation. Therefor, the research purpose was to present a model of community-cultures based environmental education in the World Cultural Heritage of Ayutthaya Historic City. There were 3 special objectives; 1) studying the community-cultures 2) evaluating people's knowledge, attitude, skill and participation on the art object environment conservation and development in the community, and 3) constructing a model of community-cultures based environmental education.

The data were gathered from 379 heads of households with simple random sampling and 15 local experts with purposive random sampling by observation, structured interview and questionnaire.

The research findings were the World Cultural Heritage of Ayutthaya Historic City covered 1,810 rai in Pratuchai and Thawasukri Sub-District, Ayutthaya Municipality. Its history was over 650 years (1350 A.D.- present). The community development can be classified into 4 periods; Ayutthaya Civilization (417 years; 1350-1767 A.D.), the Ruined City (140 years; 1768-1907 A.D.), the Ancient City Conservation and Development (83 years; 1908-1991 A.D.) and the World Cultural Heritage of Ayutthaya Historic City (1991 A.D.-present). There were 7,335 households of 27,003 people. Women being heads of households (56.00%) having an average age of 44.65 years, with married (68.30%), single (21.10%) together with widowed and divorced (10.50%) lived in the World Cultural Heritage of Ayutthaya Historic City in 2000. Analysis of the 4 contexts of community-cultures showed their concept cultures were Buddhist-based with a partial environment. The organization culture; the primary group saw themselves as a rural society style while the secondary group identified with an urban society style. The usage cultures showed a modern style living with a low participation on public activity but the object cultures identified them as high technology facilitated with a low interest in handicrafts among the ancient ruins of the archeological sites. These were the reasons why a model of community-cultures based environmental education was designed as a frame of both individual and community activities. Especially, the individual activity consisted of group forming, environmental educating, leader electing and activity participating. While the community activities consisted of traditional activity, handicraft promotion, cultural tourism together with local organization and community networks.

After the model had been actually implemented for efficiency evaluation through 40 villagers, it was found to be a highly effective model. This model was able to develop the participants level of knowledge, skill and participation with highly statistically significant difference at 0.01, together with the majority (94.08%) getting high satisfaction (the satisfaction ranked for 5 levels as very high, high, moderate, low and very low) of the environmental education process. However, there was no statistical difference of attitude level when compared with pre- post evaluation of environmental education process.

4037279 SHED/D: สาขาวิชา: สิ่งแวดล้อมศึกษา: ศษ.ค. (สิ่งแวดล้อมศึกษา)

วีระ ระวัง: สิ่งแวดล้อมศึกษาบนฐานวัฒนธรรมชุมชน: กรณีศึกษาพื้นที่มรดกโลก พระนครศรีอยุธยา (COMMUNITY- CULTURES BASED ENVIRONMENTAL EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL HERITAGE OF AYUTTHAYA HISTORIC CITY) คณะกรรมการควบคุมวิทยานิพนธ์: มาณี ไชยธีรานุวัตรศิริ. Ph.D., ภัทรบูรณ์ พิษณุไพญลย์. Ed.D. เรื่องเลข ป็นเขียนจัดพิมพ์. Ph.D., 268 หน้า ISBN 974-04-0844-3

การวิจัยครั้งนี้มีวัตถุประสงค์ทั่วไปเพื่อเสนอรูปแบบสิ่งแวดล้อมศึกษาบนฐานวัฒนธรรมชุมชน รวมทั้งมีวัตถุประสงค์เฉพาะ 3 ประการ ได้แก่ เพื่อศึกษาวัฒนธรรมชุมชน เพื่อประเมินระดับความรู้ ทักษะ และการมีส่วนร่วมเกี่ยวกับการอนุรักษ์และพัฒนาสิ่งแวดล้อมศิลปกรรมในชุมชน และเพื่อสร้างรูปแบบสิ่งแวดล้อมศึกษาบนฐานวัฒนธรรมชุมชน สำหรับอนุรักษ์และพัฒนาสิ่งแวดล้อมศิลปกรรมในพื้นที่มรดกโลก นครประวัติศาสตร์พระนครศรีอยุธยา

ทั้งนี้ได้รวบรวมข้อมูลจากประชากรซึ่งเป็นหัวหน้าครัวเรือน จำนวน 379 คน ด้วยการสุ่มแบบง่ายและผู้ทรงคุณวุฒิเกี่ยวกับวัฒนธรรมชุมชนในท้องถิ่น จำนวน 15 ท่าน ด้วยการสุ่มแบบเจาะจง โดยใช้แบบสอบถามแบบสัมภาษณ์และแบบสังเกต

ผลการวิจัยพบว่า ชุมชนมรดกโลกนครประวัติศาสตร์พระนครศรีอยุธยา มีประวัติความเป็นมาเก่ากว่า 650 ปี (พ.ศ.1893-ปัจจุบัน) สามารถแบ่งออกเป็น 4 ยุค ได้แก่ ยุครุ่งเรืองทางอารยธรรม 417 ปี (พ.ศ. 1893-2310) ยุคเมืองร้าง 140 ปี (พ.ศ.2310-2450) ยุคอนุรักษ์และพัฒนาเมืองโบราณ 83 ปี (พ.ศ.2451-พ.ศ.2534) และยุคมรดกโลก (พ.ศ. 2534-ปัจจุบัน) มีประชากรอาศัยอยู่จำนวน 7,335 ครัวเรือน หรือ 27,003 คน มีหัวหน้าครัวเรือนเป็นเพศหญิง (ร้อยละ 56.50) อายุเฉลี่ย 44.65 ปี สมรสแล้ว (ร้อยละ 68.30) โสด (ร้อยละ 21.10) รวมทั้งมีอัตราหย่าร้างและหม้ายในระดับมาก (ร้อยละ 10.50) มีวัฒนธรรมด้านความคิดบนฐานพุทธศาสนาและเห็นว่ามนุษย์เป็นส่วนหนึ่งของโลกธรรมชาติ มีวัฒนธรรมด้านการรวมกลุ่มแบบผสมผสาน ระหว่างกลุ่มปฐมภูมิแบบชุมชนชนบทและกลุ่มทุติยภูมิแบบชุมชนเมือง มีวัฒนธรรมด้านแบบแผนการดำรงชีวิตบนฐานคติวิถีประชา เน้นพฤติกรรมการบริโภคนิยม และมีส่วนร่วมกิจกรรมประเพณีในระดับน้อย รวมทั้งมีวัฒนธรรมด้านวัตถุนิยมเทคโนโลยีสมัยใหม่ คือความสนใจในหัตถกรรมพื้นบ้าน ท่ามกลางซากปรักหักพังของพุทธ โบราณสถานในชุมชน ด้วยเหตุนี้รูปแบบสิ่งแวดล้อมศึกษาบนฐานวัฒนธรรมชุมชนจึงประกอบด้วยกิจกรรมทั้งระดับบุคคลและระดับชุมชน กล่าวคือกิจกรรมระดับบุคคลประกอบด้วย การก่อตั้งกลุ่ม การจัดสิ่งแวดล้อมศึกษา การเลือกผู้นำกลุ่ม และการมีส่วนร่วมกิจกรรม ขณะที่กิจกรรมระดับชุมชนประกอบด้วย กิจกรรมประเพณี กิจกรรมศิลปหัตถกรรม กิจกรรมการท่องเที่ยวเชิงวัฒนธรรม รวมทั้งกิจกรรมองค์กรท้องถิ่นและเครือข่ายชุมชน

นอกจากนี้ยังพบว่ารูปแบบสิ่งแวดล้อมศึกษาบนฐานวัฒนธรรมชุมชนมีประสิทธิภาพสูง กล่าวคือสามารถพัฒนาความรู้ การมีส่วนร่วมและทักษะในการอนุรักษ์และพัฒนาสิ่งแวดล้อมศิลปกรรมในชุมชนให้สูงขึ้นแตกต่างกันอย่างมีนัยสำคัญทางสถิติที่ระดับความเชื่อมั่น 0.01 รวมทั้งสมาชิกที่เข้าร่วมกิจกรรม ร้อยละ 94.08 ขอมอบว่าพึงพอใจกิจกรรมดังกล่าวในระดับมาก อย่างไรก็ตามพบว่าระดับทัศนคติไม่มีความแตกต่างทางสถิติเมื่อเปรียบเทียบระหว่างก่อนและหลังการจัดสิ่งแวดล้อมศึกษา

CONTENTS

	Page
ACKNOWLEDGEMENT	iii
ABSTRACT	iv
LIST OF TABLES	viii
LIST OF FIGURES	x
CHAPTER	
I INTRODUCTION	
1.1 Rationale and Justification	1
1.2 Objectives of the Research	3
1.3 Scope of the Research	3
1.4 Research Conceptual Framework	4
1.5 Definition of Operational Terms	5
1.6 Expected Results	8
II LITERATURE REVIEW	
2.1 Environment	9
2.2 Thai Society	10
2.3 Community – Cultures	11
2.4 Art Object Environment Conservation and Development	31
2.5 Environmental Education	34
2.6 Research Concepts and Theories	38
2.7 Research Related	39
III METHODOLOGY	
3.1 Populations and Samples	41
3.2 Instruments	42
3.3 Data Collection	45
3.4 Construction Process of Community – Cultures Based Environmental Education Model	46
3.5 Data Analysis and Interpretation	46
IV RESULTS	
4.1 General Information of Community	48
4.2 Personal Information	51
4.3 Community – Cultures	52
4.4 People’s Knowledge , Attitude , Skill and Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City	79
4.5 A Model of Community–Cultures Based Environmental Education	96
V DISCUSSION	
5.1 General Information of Community	111
5.2 Personal Information	112
5.3 Community-Cultures	113

CONTENTS (cont.)

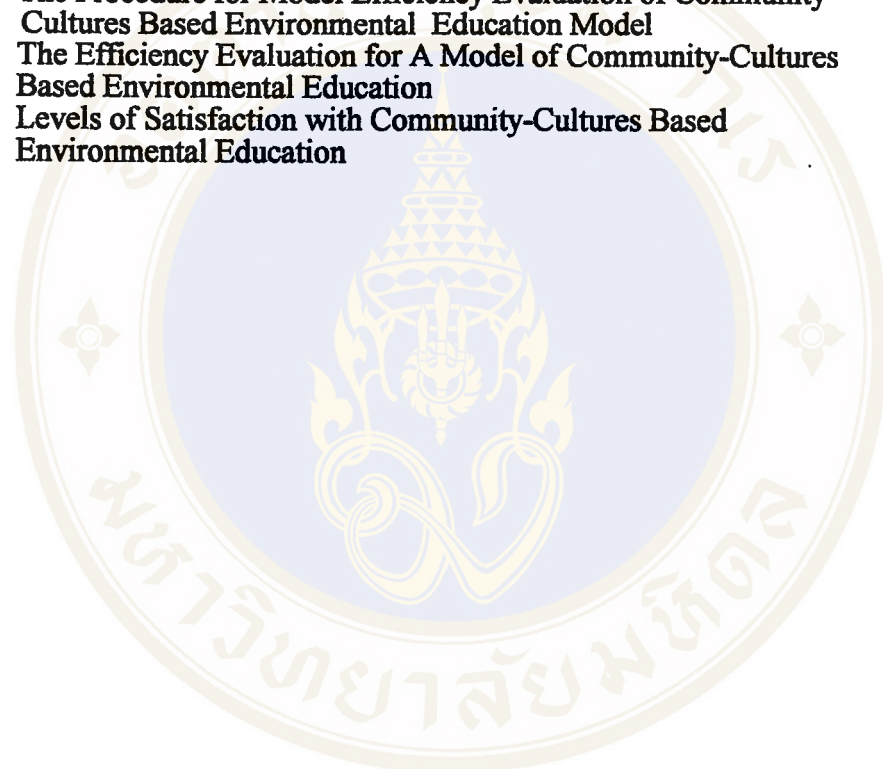
	Page
CHAPTER	
5.4 People's Knowledge , Attitude , Skill and Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City	118
5.5 A Model of Community-Cultures Environmental Education	119
VI CONCLUSIONS AND RECOMMENDATIONS	
6.1 Conclusions	121
6.2 Recommendations	125
BIBLIOGRAPHY	127
APPENDIX	
A. Research Instruments	136
B. List of Local Experts on Community – Cultures in the World Cultural Heritage of Ayutthaya Historic City	163
C. Model of Community – Cultures Based Environmental Education	166
D. Map of the World Cultural Heritage of Ayutthaya Historic City	266
BIOGRAPHY	268

LIST OF TABLES

Table	Page
1. The Variables Related Community – Cultures in the Study	7
2. Classification of Environment	10
3. Comparison of Primary Group and Secondary Group	20
4. Number and Percentage of the Samples Classified to Gender, Age and Marital Status	51
5. Number and Percentage of the Samples Classified to Thought	52
6. Number and Percentage of the Samples Classified to Values	53
7. Number and Percentage of the Samples Classified to Belief	54
8. Number and Percentage of the Samples Classified to Religion	54
9. Number and Percentage of the Samples Classified to Family	55
10. Number and Percentage of the Samples Classified to Relatives	56
11. Number and Percentage of the Samples Classified to Peer Group	57
12. Number and Percentage of the Samples Classified to Activity Group	58
13. Number and Percentage of the Samples Classified to Community	59
14. Number and Percentage of the Samples Classified to Community Network	61
15. Number and Percentage of the Samples Classified to Language	61
16. Number and Percentage of the Samples Classified to Social Norm	62
17. Number and Percentage of the Samples Classified to Education	62
18. Number and Percentage of the Samples Classified to Occupation	63
19. Number and Percentage of the Samples Classified to Income	64
20. Number and Percentage of the Samples Classified to Consumption	65
21. Number and Percentage of the Samples Classified to Saving	66
22. Number and Percentage of the Samples Classified to Herbal Medicine	66
23. Number and Percentage of the Samples Classified to Traditional Activity	67
24. Number and Percentage of the Samples Classified to Ritual	69
25. Number and Percentage of the Samples Classified to Folklore	69
26. Number and Percentage of the Samples Classified to Costume	71
27. Number and Percentage of the Samples Classified to Residence	71
28. Number and Percentage of the Samples Classified to Instrument	72
29. Number and Percentage of the Samples Classified to Handicraft	74
30. Number and Percentage of the Samples Classified to Infrastructure	75
31. Number and Percentage of the Samples Classified to Painting	75
32. Number and Percentage of the Samples Classified to folk Dance	76
33. Number and Percentage of the Samples Classified to Folk Music	77
34. Number and Percentage of the Samples Classified to Sculpture	78
35. Number and Percentage of the Samples Classified to Archeological Site	79
36. Number and Percentage of the Samples Classified to Knowledge	80
37. Number and Percentage of the Samples Classified to Attitude	86
38. Number and Percentage of the Samples Classified to Skill	88
39. Number and Percentage of the Samples Classified to Participation	91
40. Number and Percentage of the Samples Classified to Problem	93
41. Number and Percentage of the Samples Classified to Solution	94
42. Number and Percentage of the Samples Classified to Recommendation	95
43. The Internal Factors of Community Analysis in the World Cultural Heritage of Ayutthaya Historic City	96

LIST OF TABLES (cont.)

Table	Page
44. The External Factors of Community Analysis in the World Cultural Heritage of Ayutthaya Historic City	97
45. The Internal Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City	97
46. The external Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City	101
47. The Procedure for Model Efficiency Evaluation of Community-Cultures Based Environmental Education Model	105
48. The Efficiency Evaluation for A Model of Community-Cultures Based Environmental Education	108
49. Levels of Satisfaction with Community-Cultures Based Environmental Education	108



LIST OF FIGURES

Figure	Page
1. Classification of Culture Levels	13
2. Classification of Community – Cultures	15
3. A Relation of Thought System and Decision Making	16
4. A Component of Human Resource Development Process	17
5. The Influences of Belief to Way of Life	18
6. The Factors Effecting to Human Behavior	22
7. The Cultures Supporting Community Sustainable Environment	30
8. A Process of Environmental Conservation Process	32
9. The Component of Systematic Approach	37
10. A Process of Environmental Education	37
11. A Model of Community Development in the World Cultural Heritage of Ayutthaya Historic City	49
12. A Model of Community – Cultures Based Environmental Education for Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City	104

CHAPTER I INTRODUCTION

1.1 Rational and Justification

The environment, natural and man-made, is closely related each other. Due to the man-made environment is created to facilitate human living and the facilitators mentioned are all taken from nature. It may be said *“the more number of object construction in the world being the more natural environment destruction on the other hand”*. Therefore, the art object environment conservation and development can also save the natural environment for all living as well. This is the reason why the researcher facing to the art object environment conservation and development in Ayutthaya Province which contains 408 archeological sites with 7 zones management; firstly the area of Ayutthaya Historic City, secondly the external area of Ayutthaya Historic City in the Island, thirdly the East part of external Island area (covering the old Ayothaya City), fourthly the West part of external Island area, fifthly the North part of external Island area (covering Khlong Sabua), sixthly the South part of external Island area (covering Wiang Lek and Pathakucham City) and finally the rest part in Ayutthaya Province. (Fine Art Department, 1994: 123) Thus, some archeological sites were constructed during the reign of Ayothaya that placed before Ayutthaya Kingdom as Wat Thammikarat etc. and some were constructed during Ayutthaya Period (1350–767 A.D.). Seeing that these art object environments have been valuable evidences among the area of anthropology, sociology and science.

Then, in December 13, 1991 the first zone in Ayutthaya Island was certified to be the World Cultural Heritage as the Historic City with the major reasons; (Fine Art Department, 1996: 30-43) firstly the city location being excellent for the settlement based water, secondly Ayutthaya City being a masterpiece for later Rattanakosin or Bangkok City construction, thirdly Ayutthaya Historic City having its own identity being different to any others in Asia or somewhere in the world among its physical, historical and civilized characteristics and finally the architectures in Ayutthaya Historic City being unique, not similar to other constructions in the Asian Region; especially the chedies, stupas and castles forming its specialty. Although some were constructed before Ayutthaya Civilization Period but they have been still continuously presenting their authentic Thai architectures, which no one being able to insteadly construct anymore. This made agreement for all related to conserve and develop them sustainable standing forever. As Phisit Charoenwong (1993: 25) said that Ayutthaya Historic City should be conserved and developed, not only for education, people's appreciation, cultural tourism resources and local attractions but also being a living economic resources as a case in United Arab Republic (Egypt) where its government has got more foreign currency from the art object environment than the fee of Suez Canal together with petroleum exporting etc.

However, the effective alternatives for environmental conservation and development should be based on 3 principles; sustainability, restoration and preservation

(Kasem Chankaew, 1998: 83-85) with single or integrated approaches. Those are economical using, storing, maintaining and repairing, restoring, developing, preventing, preserving and zoning. It can be noted that any approaches are always mainly based on human behaviors or ways of life, which are also called "*human culture*". Therefore, the world population increase is considered to be the increase of quantity of consumers and their behaviors. This is also to make more depletion of natural resources and pollution increase. So, the people have to seek the innovative approaches preventing and solving environmental problems. Although there are several alternatives for this; law approach, social approach, economic approach or scientific and technological approach etc. For long term or sustainable standing for all, an environmental education should be considered to improve the human oriented culture which caring a short term of man living only to be a new concept of "*environment oriented culture*" for all living both physical and biological environment caring in the world.

Although the Buddhist being based on natural truth but natural resources depletion in Thailand has not been reduced yet. This is the reason why the environmental education management should be participated by all, not only government sectors or tourists but also private sectors. Especially, the villagers who pay closely their lives to the environment should do a "*group process*" producing "*group power*" to be a tool for the environment management supporting quality of life in a quality environment in the community.

Furthermore, Gandhi; the most famous statesman of India has said that "*the world resources now being enough for all, but not adequate for only a greedy one*". Thus, "*greediness*" which is a part of concept culture may be considered to be the first step to make an environmental problem. Due to object and usage cultures are always based on concept culture. (Somkuan Kawena, 1997: 91) So, it may be said that the present environment problems are all mainly effected by the culture caring only man facilitation as some anthropologists saying "*culture is nature adaptation to benefit man*". Therefore, the community environment conservation and development can be achieved the goals, if the people ways of life are changed from the human cultures to be the environmental cultures more caring; not personal but also public behaviors. This is the reason why the people's participation is needed for changing the public behaviors. Thus, the community-cultures; concept, organization, usage and object, are always related each other as Elton Mayo (referred to Prasin Sophonboon, 1990: 67) said that human concept can be developed to be organization. (Claude Levi Strauss referred to Boonderm Panrob, 1986: 46) So, the effective environmental education should firstly develop the human concept before doing then activity development. (Phra Thamapitaka; P.A. Payutto, 1996: 238)

All mentioned being the research's major reasons why an environmental education should be managed through community-cultures with studying firstly the community-cultures, then evaluating the people's knowledge, attitude, skill and participation on the community art object environment conservation and development before constructing a model of community-cultures based environmental education for "*sustainably valuable art object environment*" supporting "*quality of life*" in the World Cultural Heritage of Ayutthaya Historic City at all.

1.2 Objectives of the Research

The purpose of this study was to present a model of community–cultures based environmental education emphasizing people’s participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City, with 3 special objectives as the following:

1.2.1 Studying community–cultures in the World Cultural Heritage of Ayutthaya Historic City

1.2.2 Evaluating people’s knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City

1.2.3 Constructing a model of community–cultures based environmental education

1.3 Scope of the Research

1.3.1 Collecting general information of the community covering 1,810 rai in Pratumthai and Thawasukri Subdistrict where the United Nations of Educational Scientific and Cultural Organization (UNESCO) certified to be the world Cultural Heritage of Ayutthaya Historic City in December 13, 1991

1.3.2 Studying community–cultures covering 4 contexts including concept, organization, usage and object culture

1.3.3 Evaluating people’s knowledge, attitude, skill and participation on art object conservation and development in the World Cultural Heritage of Ayutthaya Historic City

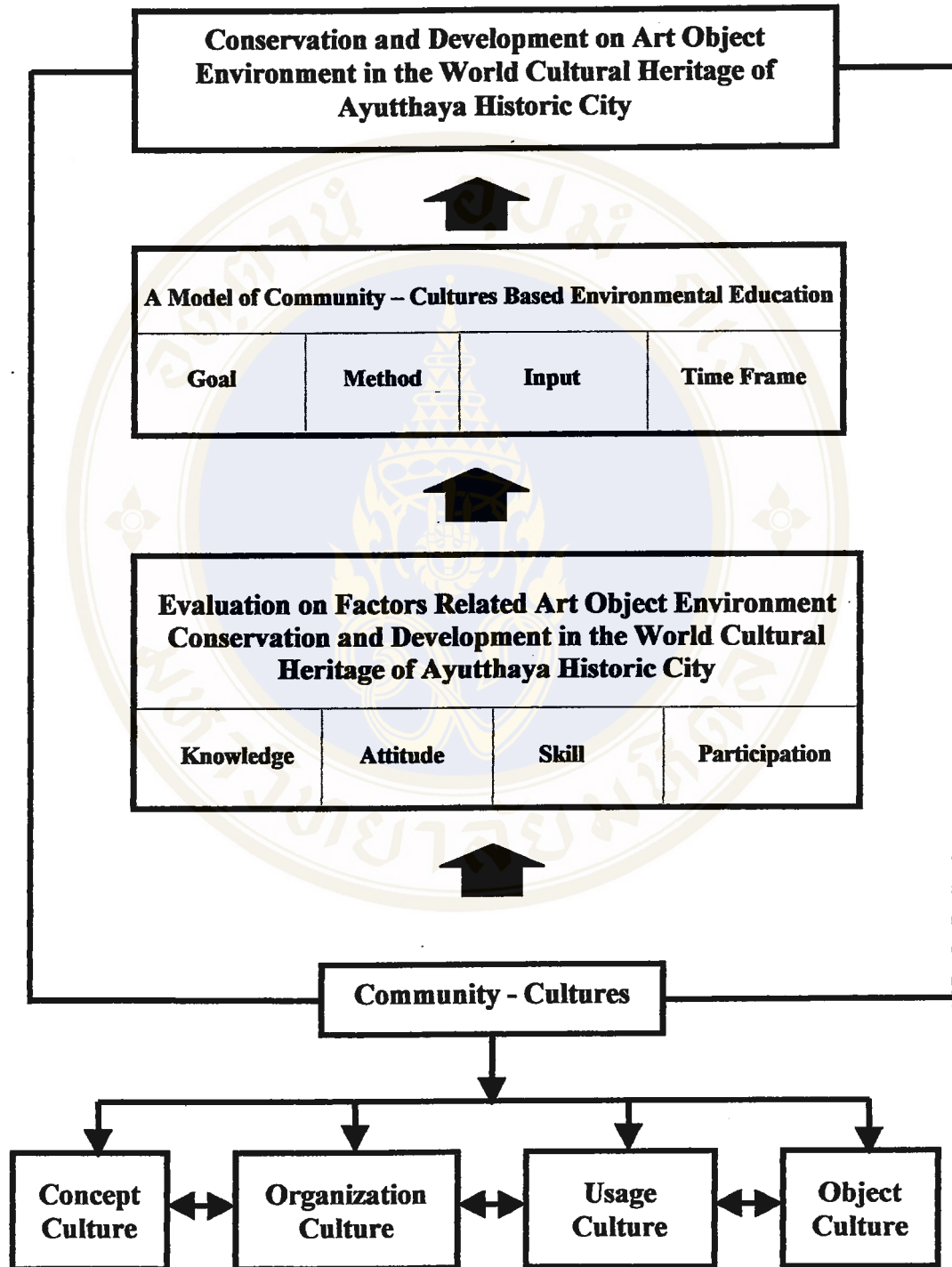
1.3.4 Constructing a model of community – cultures based environmental education emphasizing people’s participation on art object environment conservation and development in the world Cultural Heritage of Ayutthaya Historic City

1.3.5 Doing the model efficiency evaluation of community–cultures based environment education through 40 villagers with actually implemented process

1.3.6 The proper names appearing in this research final report is considered to the Principle of International Phonetic Alphabet (I.P.A.) (Ruengdet Pankhuenkhat, 1998: 23-42).

The research conceptual framework was based on community-cultures consisted of concept, organization, usage and object cultures. Each context is not only related each other but also being a major factor affecting people’s participation on art object environment conservation and development. As Claude Levi Strauss’s Structuralism Theory mentioned that human behaviors presented in ways of life have been reflected to mind structure and concept. (Boonderm Panrob, 1986: 46) While Elton Mayo (referred to Prasin Sophonboon, 1990: 67) said that group system has effected to human behaviors, social norms and concepts. Therefor, community-cultures based environmental education made the researcher had studied firstly the community-cultures before evaluating people’s knowledge, attitude, skill, and participation on the community art object environment conservation and development, then constructing a model of community-cultures based environmental education. Thus, the model is consisted of goal, method, input and time frame. This is considered to get effectively people’s participation for sustainable art object environment existence in the World Cultural Heritage of Ayutthaya Historic City.

1.4 Research Conceptual Framework



1.5 Definition of Operational Terms

1.5.1 **Environment** is defined as natural and cultural environment in the World Cultural Heritage of Ayutthaya Historic City.

1.5.2 **Art Object Environment** is defined as the archeological sites and their surroundings in the World Cultural Heritage of Ayutthaya Historic City.

1.5.3 **Community–Cultures** are defined as natural environment application to benefit people in the community; thus, they were classified into 4 contexts; concept, organization, usage and object culture.

1) Concept Culture

Thought is defined as the informant's behaviors indicating acceptance to the relationship between man and environment.

Knowledge is defined as levels of the informant's knowledge related community, the community art object environment and its conservation and development.

Attitude is defined as levels of the informant's opinion covering knowledge, affection and behavior on the community art object environment conservation and development.

Values are defined as trends of the informant's way of life supporting art object environment conservation and development in the community.

Belief is defined as persons or things, which has been believed to effect to the informant's way of life in the community.

Religion is defined as its sort, frequency of religious activity participation and ability to adapt the religious teaching to benefit the informant's way of life.

2) Organization Culture

Family is defined as its sorts, quantity of family member and the relationship in the informant's family.

Relatives are defined as independence characteristics of the informants and their relatives living both in and out the community.

Peer Group is defined as numbers, frequencies of visiting and independence characteristics of the informant and his close friends living both in and out the community.

Activity Group is defined as objectives, numbers of group member and methods of group forming in the community.

Community is defined as duration of living (year), reasons of settlement and member relationship in the community.

Community Network is defined as frequency per year of community connection related the community environmental conservation and development.

3) Usage Culture

Language is defined as a speaking-language among the community members.

Social Norm is defined as principles and methods of the informant's way of life in the community.

Education is defined as the highest level of the informant's education.

Occupation is defined as the informants' activities earning for their living.

Income is defined as total amount per year of the informants getting from both major and minor occupations.

Consumption is defined as total amount per year of the informants paying for their production, product distribution and consumption in daily life.

Saving is defined as total amount per year of the informant's saving.

Herbal Medicine is defined as methods and medicine sources of the informants using for their prevention and treatment in daily life.

Traditional Activity is defined as sorts, and frequencies of the informants annually participating the traditional activities arranged in the community.

Participation is defined as frequencies of the informants participating on art object environment conservation and development in the community.

Skill is defined as levels of the informant's ability to art object environment conservation and development in the community.

Ritual is defined as the informants' fundamental belief leading to ritual performance among all levels of individual, family and community.

Folklore is defined as sorts of legend, tale, folk song, proverb and local game which have been verbal transmission from one to one's generation in the community.

3) Object Culture

Costume is defined as forms and methods providing costumes for the informants in daily life.

Residence is defined as location, right and utilization of the informants residence settled in the community.

Instrument is defined as sorts of the informants' instruments used for their facility in daily life.

Handicraft is defined as abilities, sorts, and sources of raw material and objectives of the informants' handicraft production in the community.

Infrastructure is defined as the public service related road, electricity, tapped water and any other facilitators from both central and local government organizations.

Painting is defined as abilities, sorts and objectives of the informants making any paintings in daily life.

Folk Dance is defined as abilities, sorts and opportunities of the informants performing the folk dance for any purposes in the community.

Folk Music is defined as the informants' relationship to folk music among their ways of life in the community.

Sculpture is defined as sorts, forms, abilities and objectives of the informants producing sculpture in the community.

Archeological Site is defined as sorts and frequencies per month of the informant visiting to the art objects source in the World Cultural Heritage of Ayutthaya Historic City.

1.5.4 Environmental Cultures are defined as human behaviors supportably paying to environmental conservation and development in the community.

1.5.5 A Model of Community–Cultures Based Environmental Education is defined as the environmental education emphasizing people’s participation based systematic approach consisting of goal, method, input and time frame, with its construction of the community and community-cultures analysis through a participatory group of people and local experts in the community.

1.5.6 Conservation is defined as forms and methods caring for the art object environment, which has been unique and unable to get development any more.

1.5.7 Development is defined as forms and methods caring for the art object environment, which can be improved to be more beneficial in any purposes of living.

1.5.8 Ayutthaya Historic City is defined as the art object environment in Ayutthaya Province which was certified to be the World Cultural Heritage covering 1,810 rai in December 13, 1991 by the United Nations of Educational Scientific and Cultural Organization (UNESCO).

The researcher, then, summarized that the variables of community-cultures classified into 4 contexts as concept, organization, usage and object culture were studied as in the table 1.

Table 1. The Variables Related Community–Cultures in the Study

Concept Culture	Organization Culture	Usage Culture	Object ... Culture
1. thought	1. family	1. language	1. costume
2. knowledge	2. relatives	2. social norm	2. residence
3. attitude	3. peer group	3. education	3. instrument
4. values	4. activity group	4. occupation	4. handicraft
5. belief	5. community	5. income	5. infrastructure
6. religion	6. community network	6. consumption	6. painting
		7. saving	7. folk dance
		8. herbal medicine	8. folk music
		9. traditional activity	9. sculpture
		10. participation	10. archeological site
		11. skill	
		12. ritual	
		13. folklore	

1.6 Expected Results

1.6.1 To support people participating on art object environment conservation and development in the community

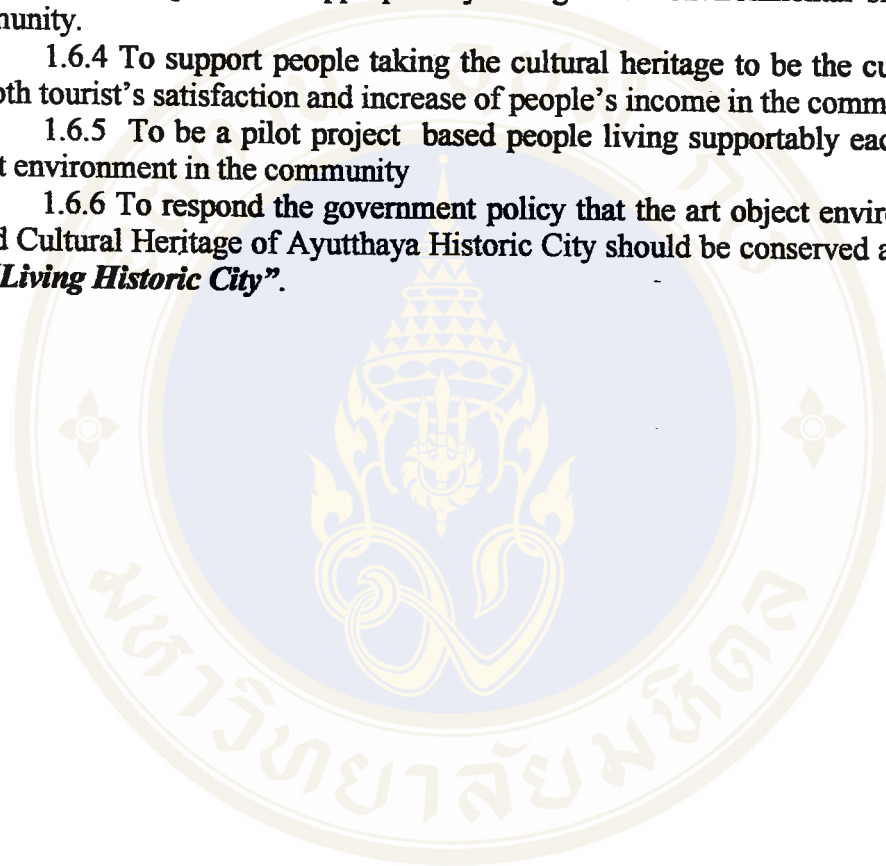
1.6.2 The art object environment in the World Cultural Heritage of Ayutthaya Historic City may be sustainable conserved and developed in the right ways accordance with quality of life in the community.

1.6.3 People make appropriately living to an environmental situation in the community.

1.6.4 To support people taking the cultural heritage to be the cultural tourism for both tourist's satisfaction and increase of people's income in the community

1.6.5 To be a pilot project based people living supportably each other to art object environment in the community

1.6.6 To respond the government policy that the art object environment in the World Cultural Heritage of Ayutthaya Historic City should be conserved and developed as a ***“Living Historic City”***.



CHAPTER II LITERATURE REVIEW

The purpose of this study was to present a model of community-cultures based environmental education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. There were 3 special objectives; firstly studying the community-cultures, secondly evaluating people's knowledge, attitude, skill and participation on art object environment conservation and development in the community, and finally constructing a model of community-cultures based environmental education. Therefore, the researcher has made the literature review and research related as the aspects below;

- 2.1 Environment
- 2.2 Thai Society
- 2.3 Community -Cultures
- 2.4 Art Object Environment Conservation and Development
- 2.5 Environmental Education
- 2.6 Research Concepts and Theories
- 2.7 Research Related

2.1 Environment

Environment is oneself and its surroundings. (UNESCO referred to Winai Weerawatananont, 1987: 1). It can be classified to natural and man-made environment as follows;

2.1.1 Natural Environment

Natural Environment is what generated by nature. It can be classified to physical and biological environment. However, the physical environment is non-biological what being natural origination as soil, water, air, mineral and energy while the biological environment is somewhat being biotic from nature as plants, animals and human being as well.

2 1.2. Man - Made Environment

Man-made Environment is what created by man, either internal or external environment. Thus, the internal environment as thought, felling and skill etc. while the external one as food, cloths, residence and medicine etc. This is why it is said that man-made environment being similar to cultural environment which is defined as any approaches adapted to take natural resources benefiting man. However, cultural environment may be classified into 4 contexts including concept, organization, usage and object culture as in the table 2.

Table 2. Classification of Environment

Environment					
Natural Environment			Man - Made Environment		
Physical Environment	1. soil	concept culture	organization culture	Non-Abstractive Environment	
	2. water				
	3. air			usage culture	object culture
	4. mineral and energy				
Biological Environment	1. plant				
	2. animal				

2.2 Thai Society

"Society" is a relation system of person to person, person to group and group to group. (Patya Saihoo, 1997: 98-100) While *"Thai"* is a group of people living in the southern part of china and immigrating to live presently in Indo-China Cave, having its own culture or ways of life. (Suphatra Supharp, 1998: 1-20) So, *"Thai Society"* may be defined as a relation system among Thai people. However, the smallest society system is a family and the largest one is a global society intervened with some other systems. This is why Thai Society Analysis must be viewed the whole earth. (Phra Thamapitaka; P.A. Payutto, 1994: 120) However, the word *"Thai"* has been known as a nation located in the Southern part of Yangsekiang River in china. Thus, in the 13th century, Thai people distributed to live in some areas could establish the nation named *"Nanchao"* which was the same meaning of *"King of the South"*. (Satiankoset, 1973: 135) Then King Kublaikhan from Mongklo and being the first China Emperor of Nguan Dynasty could occupy Nanchao as his colony in 1253 A.D. This is the reason why Thai people immigrated to the new area in Indo-China Cave.

However, there were some people who had much properties making them staying in the old area while some moving out to the South could be classified into 2 groups. The first immigrated by Salawin River or Kongka River, which has been in the northern part of Mynmar, it was called *"Thai Yai"* or *"Chan"*. The second moved to *"India"*, then establishing their owned kingdom in 1229 A.D., this was called *"Thai Ahom"*. However, there were some making their settlements in the plain of Chao Phraya River and Khong River, they were called *"Thai Noi"*. Furthermore, some moving to the area of Lava and Khom Dam and then establishing the community called *"Chaiang Saen or Lanna"*. While some moving to Kwaen Samtet or Siam Tet and then establishing their owned Kingdom called *"Sukhothai"* in 1238 A.D. (Rachaneekorn Settho, 1980: 18) After ending of Sukhothai, Ayutthaya was then established to be the capital of Thailand for 417 years during 1350–1767 A.D. before moving to Thonburi (15 years; 1768–1781 A.D.) and Rattanakosin since 1782 A.D. to present.

Seeing that during the long period of Thai immigration, fighting, and national construction, made the people getting some cultures from others as China, Khmer,

Mynmar, India, Japan and some European countries. This is the reason why Thai people have taken some different cultures integrated to its owned characteristics and personality and then becoming to be present Thai Cultures. Furthermore, The Thais have called their lands as *“Thailand”* for long time while the Europeans called us as *“Siam”*. And then in June 24, 1939 A.D. Field Marshal Plaek Phiboonsongkram, the Prime Minister, had made the notification named *“Thailand”* and *“Thai”* for the nation and its nationality. However, the nation name as Thailand had been changed to be *“Siam”* in 1945 A.D. and changed back again to be *“Thailand”* in 1949 A.D.

This is the reason why Thai society has its own identity as Suphatra Suphap (1998: 21-26) said that an identity is the clarified dominant characteristics of a society and being different from others. However, the identity can be evaluated on values because it determines behavioral forms and taste. Thus, values are indicators for an identity because it specifies human behavior, taste, habit and attitude that are suitable and able to be ways of life in a society. Due to Thai society is based on rural community, which has been hospitable and supportable mind. This makes most Thai values being friendly to others. However, it may say that Thai Society in perspective view has 3 characteristics (Sanit Sanakkan, 1991: 79-83) as being highly adaptive, highly flexible and Thai-ism. This is the same view to Suphatra Suphab (1998: 6-20) concluded that there are various values in Thai Society as loving to the king, religious believing, freedom, economical behavior, preferring discipline, responsibility, honesty, industrious behavior, relatives affection, rationality, idealism, Thai-ism, public mind, kindness, seniority, gratitude, donation, politeness, punctuality, to take more acting than speaking, royalty and admiration on educated person etc. While some negative values being obstacle for living in a society and they should be corrected as money affection, authority-ism, relatives affection in the wrong ways, low level to risk and impatient, unenthusiastic, materialism, popular to oversea goods, over enjoyable behavior, comfortable preference, luxurious ceremony, institutional belief, thoughtful consideration to other feeling, unpunctual, curious behavior, preference to advertisement preference to something given free, forgeable behavior, continually eating and envies etc.

Saovapa Paitayawat (1995: 213-215) said that the globalization has made Thai Society adapting to various characteristics as the culture based consumption, loving in amusement, focusing to liberty, the western living, equity, learning the international languages, money considered to be the end purpose of life, and reduced gratitude. Moreover, Thai Society in the future will have to encounter a problem of high cost of living that makes a social change and the living with more care of object and technology so Thai Society in the future may be qualified as religious belief with superstition, highly selfish, less social unity, and more environmental reconstruction.

2.3 Community -Cultures

2.3.1 Definition of Community -Cultures:

Community-Cultures are compound words of *“culture”* and *“community”*. Suchep Punyanuphap (1997: 1-4) has explained that *“culture”* is presently as a Thai word derived from Bali and Sanskrit Languages, its meaning faces to what being causes to be progressive and firstly used in formal speech in Thailand in

1940 A.D. While, the word “*culture*” in English was derived from a French word and the French word was from Latin word again. However this word was used in different meaning as follows;

1. Defining in 1483 A.D. as “*worship*”
2. Being generally available without the year appeared as the meaning of “*the tilling of Land*” and “*husbandry*”
3. Defining in 1510 A.D. as “*improvement or refinement by education and training*”
4. Defining in 1626 A.D. as “*cultivation ; especially the artificial development of microscopic organisms*”
5. Defining in 1885 A.D. as the meaning of “*product which is produced by culturing germs*”
6. Defining in 1805 A.D. as the meaning of “*the training and refinement of mind, taste, and manner; the condition of being such trained and refined ; the intellectual side of civilization*”
7. Defining in 1876 A.D. as the meaning of “*the devoting of attention to the development of, or to progress in*” but this meaning being presently not available anymore.

Considering the area of anthropology, the culture is defined as a whole way of life. (Kiyotaka Auyagi, 1977: 112) This is the same concept of Kluckhohn (1954: 28) who has explained that Culture is a historically created system of explicit and implicit designs for living, which tend to be shared by all or specially designated members of a group at a specific point of time. Furthermore, Schwartz and Ewald (1968: 41-42) has collected the meaning of culture from 150 academic technicians as anthropologists, sociologists, psychologists and historians etc, and doing the classification to 4 categories as descriptive, historical, normative and psychological definition as the following;

1) Descriptive Definitions

The descriptive definitions facing to the determined opinions and criteria, as E.B. Tylor (1987: 42-43) explained that culture is the complex whole...acquired by man being a member of society. While John Bicsanz and Mavis Bicsanz (1969: 29-30) has made Tylor’s definition getting clearer that culture is the distinctive way of life of a society.

2) Historical Definitions

The historical definitions facing to the social heritage or tradition transmitted from generations to generations as Bronislow Malinowski (1922) said that culture is inherited artifacts including inventional goods, production process, thought, habit and all values which are the social heritage. While Ralph Linton (1936) said that culture is the total social heredity of mankind. Furthermore, Clyde Kluckhohn (referred in Broom and Scznick, 1970: 50) has explained that culture is a social heritage including knowledge, belief, tradition and skill of people in each society.

3) Normative Definitions

The normative definitions facing the social rules or socially patterned behaviors as Earl R, Babbie (1980: 97) has said that culture is the whole

collection of agreements that the numbers of a particular society share, so the culture must be consisted of concept, feeling and performance of members in a society, even it may look different in the stranger view.

4) Psychological Definitions

The psychological definitions facing a relation of behaviors and learning as John and Mavis Bicsanz (1969: 30) has explained that culture in the common sense being defined as the learned portion of human behavior. This is the same meaning of E. Adamson Hoebel and Thomus Weaver (1979: 279) has defined the culture being as the integrated system of learned behavior patterns, which are shared by the member of a society.

However, cultures may be classified to 3 levels (Ministry of Education, 1995: 84); community, national and international cultures, which are presented in the figure 1.



Figure 1. Classification of Culture Levels
Source : Ministry of Education, 1995: 84

Furthermore, Srisak Wallipodom and Suchit Wongtet (1989: 12) have concluded that cultures can be faced within 2 groups including conservative view and developed view. The conservatives; thus, always face the culture as somewhat being good and valuable for people in a society through abstractive and non-abstractive conservation. While the developed view faces the culture as somewhat created by man to benefit to ways of life so the culture should be adapted or improved to be the same ways of life in each age or generation.

The community is a group of people living in the same area, doing interaction, being beneficial to each other and getting the same culture. (Jeerapan Kanchanajitra, 1979 :4) While Satin Lueng-aram (1975: 62) and Tawee Timkham (1985: 2) have defined the community as a group of people living in the territorial geographic area, having interaction and living in the same ways of life. So community - cultures are considered as whole system of people ways of life in the same area, paying their lives in the same way, getting interaction and closely getting advantage each other as well.

2.3.2 Component of Culture

Culture is consisted of ideal, values, norm, law, folklore and symbol etc. (Winai Weerawatananont, 1987: 163) While Suphatra Suphap (1984: 40-41) has said that culture is what integrated to the dimensions of concept, organization, usage and object context as follows;

1. Concept Culture is considered to be human internal part and being abstractive qualifications including knowledge, belief, thought and attitude etc.

2. Organization Culture is also human internal part facing to a formal structured group, with its regulation and objective as family, association, committee, red-cross council, temple and United Nation etc. However, an organization is always managed for some specific objectives.

3. Usage Culture is considered to be human external part facing to behaviors including mores, customs or tradition for people living in a community as birth ceremony, marriage, funeral ritual, house construction and a new house ceremony etc. However, social norms are always effected by religion and being changeable all time.

4. Object Culture is also human external part facing to object or what created by people, both tangible and non-tangible things as instrument, school, factory, printing, machine, theatre, sport stadium, temple, calculating and measurement etc.

2.3.3 Characteristics of Community- Cultures

Harold M. Hodges (1971: 36) has said that community- cultures should be consisted of 5 characteristics as changeable, patterned, learned, shared and transmitted. While Mshvenieradze (1977: 94) has explained that cultural interaction can be ranked to 3 levels; among communities within a country, among the people of different countries and common effects of all people to create human culture to all mankind.

2.3.4 Classification of Community- Cultures

Suphatra Suphap (1984: 40) has classified community- cultures to material and non-material culture. The material culture including invention and technology as refrigerator, cooking pot, glasses, knife, table, car, temple and meeting room etc, while the non-material culture including ideal, values, concept, religion, belief, attitude, knowledge and skill etc. This is the same view of Sopitsawong Thamapanta (1989: 14) also classified community- cultures to abstractive culture facing to ideal or mind and non-abstractive facing to behavior and object. Furthermore Horton and Hunt (1972: 178) has said that group or organization which is a part of abstractive culture and being important for people creating for special activity. However, a relation system of community member being able to develop to

be a group or an organization may be consisted of status, role and function sub-system accept by its member. Thus, Supitsawong Thamapanta (1989: 15-16) has also confirmed for responding the special activity of society. Moreover, the abstractive culture is called various names including non-material culture, mental or ideal culture, covert culture and implicit culture etc. While the non-abstractive culture being also called as material culture, behavioral culture, overt culture and explicit culture etc.

It is included that community - cultures can be classified to abstractive and non-abstractive culture. Thus, the abstractive culture is consisted of concept and organization cultures while the non-abstractive culture is consisted of usage and object culture as the figure 2.

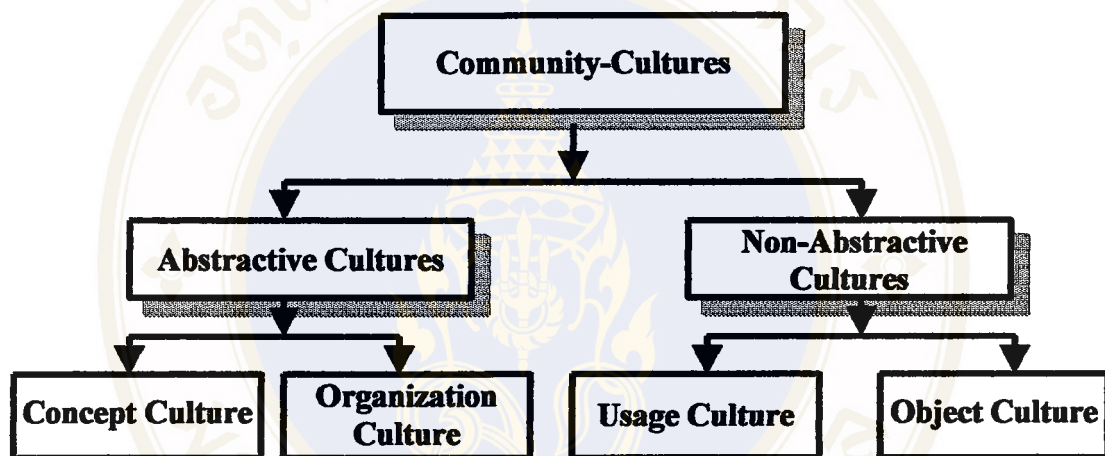


Figure 2. Classification of Community-Cultures

Source : Adapted from Narong Sengpracha, 1989: 37-38 and Suphatra Suphap, 1984: 40-41

1) Concept Culture

Concept Culture is defined as an abstraction being human internal part including thought, feeling, understanding, ideal and opinion. (Suphatra Suphap, 1984: 40) So, the concept culture of this study covering: thought, attitude, belief, values and religion as the following;

Thought is defined as a symbolic activity through speaking or writing (Sucha Chan-em, 1993: 184-186). It can be classified to undirected and directed thought. Thus, the undirected thought including uncontrolled association, day dreaming, night dreaming and autistic thinking while the directed thought being as critical thinking, and creative thinking etc. However, Chaianant Smuthvanich (1997: 19-24) has classified thought to 4 categories as analytical thinking, structural thinking, conceptual thinking and social thinking. Furthermore, Somkuan Kawena (1997: 15) found that concept culture is the first step walking to object culture, while the Office of National Culture Committee (1982: 25) said that thought system is always affected a decision making as the figure 3.

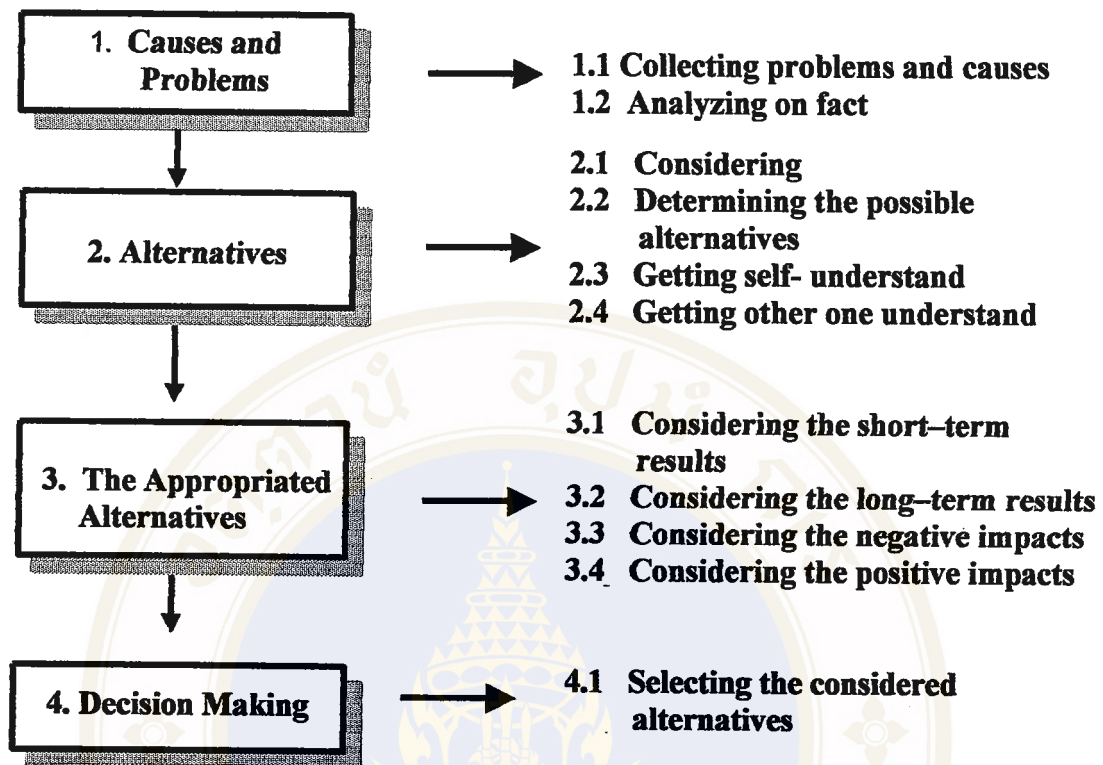


Figure 3. A Relation of Thought System and Decision Making
 Source : National Culture Committee, 1982: 25

Knowledge is a part of objectives for human resources development which completely covers cognition, affection and psychomotor. (Academic Department, 1996: 3-4) The Cognition; thus, should cover 6 steps as knowledge, comprehension, application, analysis, synthesis and evaluation. The affection covers 5 steps as perceiving, responding, valuing, organizing and characterizing. While the psychomotor covers 3 steps as imitation, manipulation and articulation as the figure 4.

Benjamin Bloom (referred to Davis, 1971: 80) has classified the knowledge being from simple to complex stages as memorized knowledge, comprehension, application, analysis, synthesis and evaluation. Furthermore, Armont Arpapirom (1982: 3) has also classified the world knowledge to 3 areas as , Natural Sciences Humanities and Social Sciences. Thus, the Humanities face the human success achievement, which indicates to value of them, while the Natural Sciences facing natural phenomena and the Social Sciences directly facing the social phenomena.

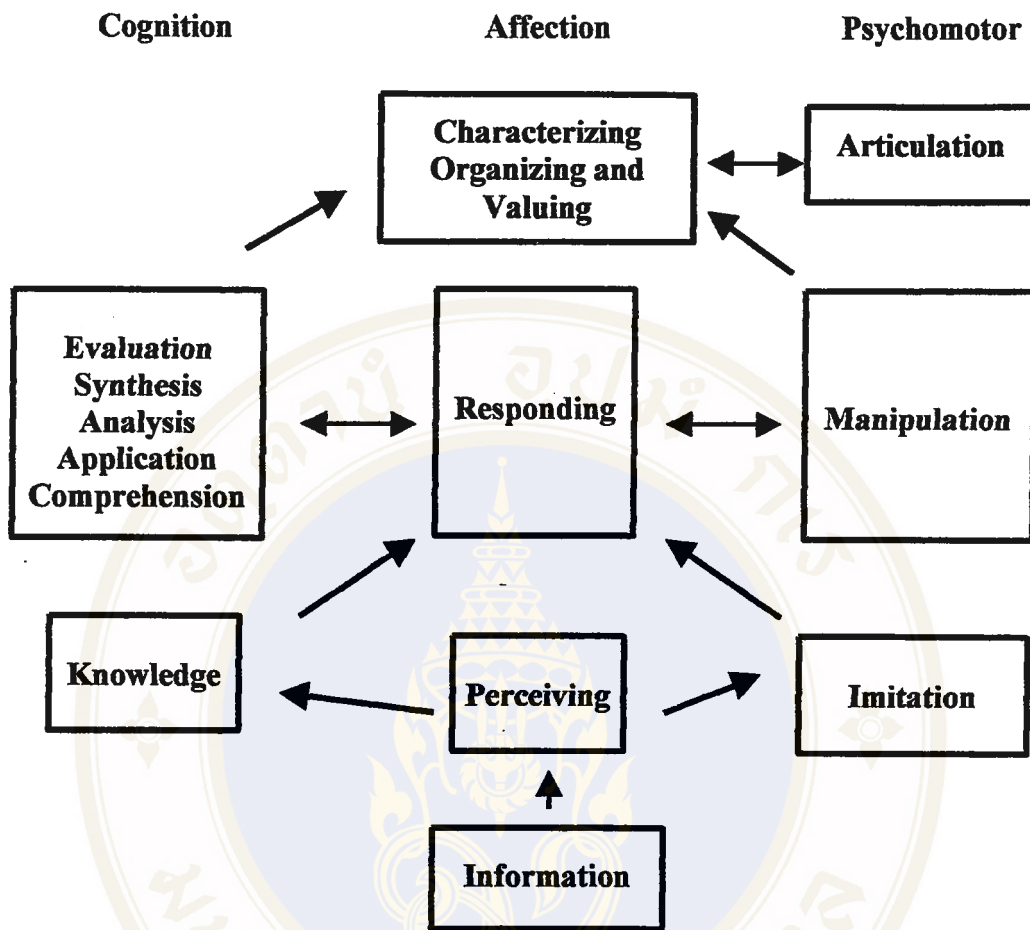


Figure 4. A Component of Human Resource Development Process
 Source : Academic Department , 1996: 4

Attitude is the opinions stimulated by emotion and it makes people understanding one and the surroundings. (Prapapen Suwan, 1983: 14) This is the same view of Hahn and Simmel (1976: 83) said that attitude is motivation making a person feeling like or dislike what surrounding. However, Ferguson (1952: 81) has explained that attitude is consisted of 3 contexts as cognitive, affective and behavioral components.

Furthermore, attitude can be easily changed if they made firstly a person changing his behavior. (Davies, 1981: 226 and Goldstein and Sorcher, 1974: 15-24) While Benjamin Bloom (referred to Davis, 1971: 80) has ranked attitude from simple to complex stage as perceiving, responding, valuing, organizing and characterizing. However, the causes leading to attitude, Foster (1952: 119) said that it is upon personal experiences and group values. Moreover, attitude can do its function (Kanchana Kamsuwan and Nita Saovancee, 1978: 231) as firstly motivating for personal adaptation, secondly transmitting one preference to others, thirdly explaining clearly some situations and finally doing sometimes for self protection. Due to attitude can be improved by learning. (Sucha Chan-em, 1993: 244-245) This is the reason why attitude can be sometimes created by factors related culture, family, peer group and

personality etc. Furthermore, psychologists have recommended 3 methods to change attitude; they are persuasion, group change and propaganda. While the effective changing of attitude is depended on selective perception, avoidance and group support as well.

Values is a person trend to behave some ways based self-considered to be appropriated to him or his society. (Panus Hannakin, 1990: 20) This is why values is considered to be cultural major component determining member behaviors in a society. (Tatsanee Chantorn, 1992: 78) However, Thai values always being like freedom, Thai-ism, individualism, reclusion, life happiness, seniority, prosperity and empathy etc. While Watana Wongkiatirat (1996: 336) said that Thai villager values is always affected as prosperity, authority, royalty, merit making, amusement, individualism, sacredness and group affection etc.

Belief is what the people believing that it effects to their ways of life. (Pinyo Jittham, 1979: 6) Thus, it may be classified to be unreasonable and reasonable belief. However, the belief in a community may be associated as natural phenomena, herbal medicine, fortune, dreaming, superstition, characteristics of human and animal, religion, occupation, traditional trick and its solution, hell and paradise, future world, good and bad number together with good and bad day etc. However, belief is always considered to effect to people ways of life as figure 5.

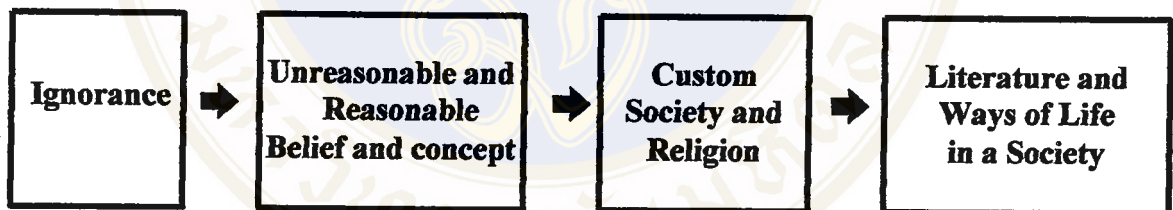


Figure 5. The Influences of Belief to Way of life.

Source : Pinyo Jittham, 1979: 5

Religion is the teaching based on abstractive power with moral principle ultimate goal of life and being able to achieve goal by step to step through performance of religious teaching and ritual. (Chinda Chankaew, 1989: 1) The religion must be consisted of ultimate truth, ritual and ritualizer. However, the human's primitive religion was superstitious belief and the religion presently believed by most people in the world are Brahmanism, Buddhism, Islamism and Christism. (Wichai Tiannoi and Pracha In-kaew, 1993: 182) Moreover, Chianda Chankaew (1989: 2-4) saying that the reasons why people has believed in religion are to indicate human intention desiring the eternal life and to know the ideal world of mankind. Thus, religions are considered to effect to human behavior, (Amara Pongsapich, 1992: 27) not only politics, economy, society, art and craft but also determining production and consumption forms of people ways of life in a community as well.

2) Organization Culture

Man living is not only responding to biological needs but also producing a group power affecting achievement of community activities. This is the reason why organization culture study should cover family, relatives, peer group, activity group, community and community network as the following;

Family is a smallest unit in a society, It may be classified to nuclear and extended family. The nuclear family is consisted of parents and their children living together while there are some relatives as grandfather, grandmother, uncle or aunt etc, living together with parents and their children in the extended family. (Narong Sengpracha, 1989: 71) However, cultural conservation should be started at a family, (Saovapa Paitayawat, 1995: 228) because family is a significant institute for mind development of its member, being the power creating a member getting good awareness for peacefully living in a society, and highly effecting to children development on personality, emotion, attitude and behavior. (Suphatra Suphap, 1992: 42) The family; furthermore, has 6 major functions (Suphatra Suphab, 1998: 57-59) as reproducing new members, sharing sexual gratification, doing children maintenance, doing the socialization, placing the social status, and giving family member affection etc.

Relatives are social relation chains through father or mother blood only or both. (Ngampit Satsa-nguan, 1991: 146-147) It can be classified to unilineal and bilateral descent. The unilineal descent is defined as a relation of partrilineal or matrilineal descent only while the bilateral decent facing to a relation of both. However, the regulation of relative's relation is fundamental forms of social group. Furthermore, there are many functions of relatives relation as being a social norm for social group, treating a group member to understand ways of life, applying and transmitting their property heritages, doing the ritual and belief system, eliminating the member's conflict, controlling a politic regulation and managing a war etc.

Peer Group is a group of people being the same age or around. It may be parted a formal or informal forms including classmate, football club, alumni association or others etc. However, group always effects mostly to adolescence because this age trends to join with one having the same taste, thought, clothing and appearance etc. This is for getting agreed with each member in a group; however, friends may treat one walking in or not in the social regulation. (Suphatra Suphap, 1992: 42)

Activity group is a group of two persons or more with formal interaction, having the same objective, assisting, sharing the advantage and influencing each other as well. (Thong-in Wongsothorn, 1984: 107-107) A group should be consisted of organization, systematization and stabilization. (Suphatra Suphap, 1984: 70) However, a group may be considered to forced and volunteer group. (Patya Saihoo, 1997: 89) Thus, the forced group is always considered to member's maturity or ability while the volunteer facing to member's satisfaction. However, the society presently tends to get more volunteer group because of a personal liberty. Furthermore, a group may be classified to primary and secondary group. (Patya

Saihoo, 1997: 95-96) The primary group is always closely non-formal relation among its members as family, relatives and peer group while the secondary group being on the other hand with empirical objectives and formal relation as activity group, community and community network. However, Sanya Sanyawiwat (1996: 32-36) has presented the theory of Social Development: the East Concepts, with his case study of Japanese Society Development Form; thus, both internal and external factors were considered. Especially the internal one covered 10 factors and group mindless based working was the first major factor effecting strongly and quickly to Japanese Society development. This is the same view of Richard T. Schaefer and Robert P. Lamm (1992: 158) has specified the characteristics of primary and secondary group as in table 3.

Table 3. Comparison of Primary and Secondary Group

Source: Richard T. Schaefer and Robert P. Lamm, 1992: 158

Primary Group	Secondary Group
1. Generally small	1. Usually large
2. Relatively long period of interaction	2. Short duration , temporary
3. Face to face association	3. Little social intimacy or mutual understanding
4. Some emotional depth in relationships	4. Relationships generally superficial
5. Cooperative and friendly	5. More formal and impersonal

However, the Socio-psychologists reveal that a group is able to make various benefits as firstly group productivity being always higher than personal one, group solving more effectively than person, membership status making personal concern and responsibility, group member feeling more friendly and aspirated than individual, a group being the sources for personal skill improvement, a group giving the opportunity to learn attitude and behavior each other, a group giving the various perspective views, a group creating new methods for member feeling presentation and a group being the sources for each member information or behavior feedback etc.

Community is a group of people living in the same area, participating on political and economic activities and creating a social unit. However, considering its location and people's belonging makes the community may be classified to Gamilnshavete and Gaseillshavete (Broom and Selznick, 1973: 135-137) Thus, Gamilnshavete being a community which its member is friendly living, strongly respective to mores, tradition and values, especially a family being always the major unit in a community. This is similar to rural agriculture community. While Gaseillshavete, its member doing their relations as a secondary group, being formality and specialist, this looks like a modern society; especially in a big city. (The royal academy; 1981: 159-160) However, the concept of Gamilnshavete can be not directly specified to rural or urban communities all aspects. Thus, some rural communities do its agricultural production for trade; this is not Gamilnshavete at all.

Presently, the sociologists intentionally study a group of people living together in the same area that called territorial groups. (Davis, 1967: 310) This is also called a community. However, the relations in primary and secondary group are always considered to be major factor for classifying the communities to be rural or urban community as George A. Lundberg et al. (1969: 78) agreed that the rural community is considered to be large primary group. This is the same view of Kingsley Davis (1967: 312) explaining that the rural community is different to others, its various organizations connecting with their ways of life in the community. Furthermore, Mckee (1974: 117-119) has classified communities into rural and urban community with some indicators as the following;

1. Size; a number of members in a rural community are always smaller than urban community and its population distribution is less than urban because most parts of rural area are used for agriculture.

2. Relation; member's relation for a rural community is considered to be a primary or face to face group with extended families and a family oriented. This is the reason why families effecting to any activities including social, economic activities together with member's status in a community.

3. Labour; a rural community specifying member's status and role based on gender and age; thus, without caring personal ability. While an urban community cares about specialists for each status.

4. Culture; a rural community consisted of the similarity of way of life, tradition and belief, so this makes a homogeneous group while an urban community being as a heterogeneous group.

5. Social Belief; a rural community believing in religion both its teaching and ritual together with living in nature and doing agricultural occupation while an urban community effected by scientific knowledge. This makes them believing in Pragmatism caring more reason than judgement or religious ethic.

Community Network is a sort of instrument for community development as Witayakorn Chiangkoon (1993: 116) said that network is a set of activity, person or groups from various organizations continuously performed to exchange some information each other.

3) Usage Culture

Usage Culture always indicates through a community tradition. (Suphatra Suphap, 1984: 41) The tradition is considered to social behaviors repeatedly performed until being stable. This may lead to be a social pattern, which is agreed by most members in a community and transmitted continuously through various generations. (Tatsanee Chantorn, 1992: 78) However, the pattern of life in a community is always related to moral and religion. This is the reason why usage culture is classified to 3 levels; mores, tradition and customs. Mores are what related moral, goodness, right or wrong etc. One who avoids doing may be considered to be wrong as gratitude to parents and cousin etc. While tradition is a social regulation forming as both direct and indirect rituals including marriage ceremony, merit making and teacher respecting ceremony etc. And customs are what popularly performed in daily life, not right or wrong as mores and not strongly regulated like tradition, and no care for sometimes performed or not as manner and dressing in some occasions etc.

Thus, Sucha Chan-Em (1993: 248-250) found that the factors effecting to human behaviors were belief, values, personality, behavior stimulators, attitude and situation as the figure 6.

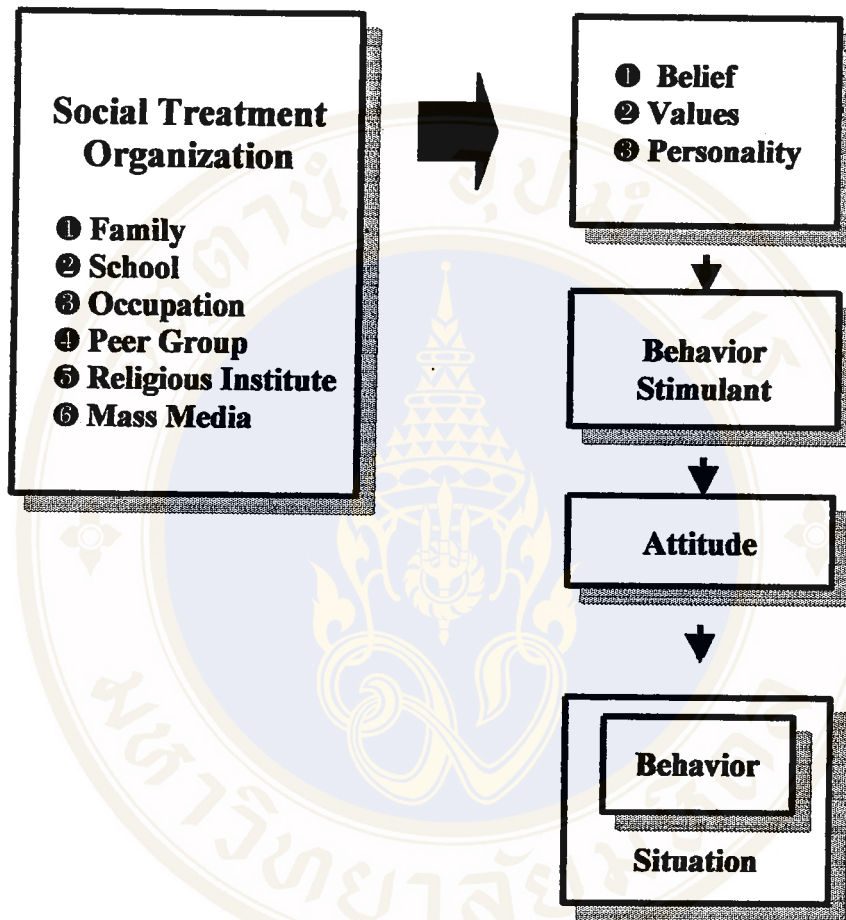


Figure 6. The Factors Effecting to Human Behavior
Source : Sucha Chan-em, 1993: 251

However, the study of usage culture cover language, social norm, education, occupation, income, consumption, saving, herbal medicine, traditional activity, participation, skill, ritual, and folklore.

Language is the media used for communication between person to person understanding each other. (Boonkerd Ratanasaeng, 1998: 4) It may be classified to various forms as verbal, symbolic and acting language etc. However, Jamnong Thongprasert (1975: 11-13) has classified languages into 2 categories; spoken and written language. The spoken language is available for general public while the written one is used for people being able to read and write etc.

Social Norm is a regulation or behavioral pattern that the society expects its member performing, so a social norm may be like the compass of both concept and behavior for its member in a society. (Watchara Klainathorn, 1987: 30)

However, the social norm can be classified to 3 levels; folkway, mores and law. The folkway is a guideline that the social members accept and traditionally behave in their lives, while the mores being as a moral taboo and the law being as the instrument controlling personal behaviors being not disturb other human right or liberty. Especially in the complex society, has been found that law is a major instrument for creating the social security.

Education is process of cultural creation and transmission. (Educational Ministry, 1995: 43) Thus, it is generally classified to 3 systems; formal, non-formal and informal education. Furthermore, David Boud (1982: 34) has presented his idea that the education should be taken out the class and the education should be integrated to be a part of life, not whole life being in a class. This is the same view of Kingsley Davis (1967: 3-4) saying that the social study must be learned its culture because culture is a major factor to clarify more comprehension in human behaviors. Moreover, Phra Thamapitaka (P.A.Payutto, 1994: 121) has presented that education should be the significant instrument for social development, improving social development process and being social leader, not responding or standing behind only the society.

Occupation is the activity producing income and being a fundamental economic structure in a society. (Damrong Thandee, 1992: 2) While the National Statistical office has defined an occupation for population census as a sort of work that workers get income forming as wage, salary or other forms being cash, thing or some abstractive income. Furthermore, the International Labour Organization (I.L.O) has defined an occupation that is the work performed in any cases and any status appearances of people. However, occupations must be consisted of 3 contexts as technical, economic and social activity. Thus, the technical activity is considered as the activity being available to skill or thought for systematic production under effective management. While the economic activity is what performed and getting both direct and indirect income for living. And the social activity is the work that society agrees to its honesty and being not social norm destruction. Furthermore, the sociologists agree that an occupation is closely related to culture because of its various benefits as firstly an occupation can make various occupational group; this affecting efficiency and diversity in a society, secondly an occupation making people free, able to think and work according to their aptitudes, thirdly each occupation collecting various peoples from various places to be the same characteristics, fourthly an occupation affecting personality and way of life among the past, present and future time, fifthly an occupation connecting people to form a society and finally an occupation improving workers to be a specialist in the future.

Income is a major factor indicating activities success or failure as Jakrapan Phlingam's study (1993) on Factors Determining the Readiness for Bangkok Governor Election in the Opinions of Some Political Representatives Elected in September 13, 1992 was found that there were 10 factors affecting the readiness for Bangkok Governor Election and the first 3 factors being the provincial area, the income per head and the number of population living in the province. This is the same study of Coming and Wise D. (1978: 54) and H. Haddick (1966: 105-110) were found that the decentralization success was depended on some factors as the financial ability,

a number of skilled persons related management and a number of administrative instruments in a local government etc. Furthermore, Kesin Kutsalanuparp (1999: 141) has studies a Model of Local Government Administration being Desirable for People in Songkhla Province: A Case Study for Self-Government through Governor Election; thus, it was found that people's income which was viewed in a form of tax paid for the local government being the second factors coming after the people's political will. This can be considered that income is always the major factor for not only individual but also organization. However, income is always leading to an expense as Sumornthip Boonsombat (1990: 276) found that, in a modern economy, a relation of consumption and income walking along to Angel's law. That is; firstly if a family income increases, an expense for food will decrease, secondly if a family income increase at the same rate except the using of fuel, electricity and refrigerator being reduced and finally if a family income increases, expense and saving will increase except the expense for personal health always being stable.

Consumption is a part of the economic behaviors consisted of production, product distribution and consumption. (Sumonthip Boonsombat, 1990: 245-246) The production; products or services responding to human needs may do on a part of agriculture, industry and service. The product distribution is considered to be the methods to take the products to the consumers or it is sometimes called "*trading*". While the consumption is both directly and indirectly eating, using products or services; the direct consumption being individually consumed while the indirect consumption being socially consumed this is the reason why all must be both producer and consumer in the same time. Moreover, in a primitive society, there was no pattern of standard market and saving-consumption. The supreme consumption power in the primitive agriculture society was one being a country rulers including the kings, monks and nobles through the social traditional forms as tax, customs and land rent from farmers who are the actual producer in a society. However, a quantity of community consumption is depended on its productivity and product distribution. While a modern agricultural and industrial society doing mass production will have been a complex pattern for consumption. The consumers have to know a market, to have a high standard of consumption and to save for new investment etc. However, market system firstly giving the customers can make their self-decisions for the production resources distribution based on their needs, and secondly customers being sure that they can pay the lowest price for the products with the production still going on.

Saving is storage of partial present income for future expense. (Wanrak Mingmaneeakin, 1993: 229) The saving can be performed in various forms as cash and bank deposit etc. However, a quantity of saving income depends on some factors as firstly income size; the more income, the more saving, secondly expectation for future income; the more future income, the less saving and finally interest rate; the more high present interest rate making the more saving etc.

Herbal Medicine is the medicine from plants, animals and minerals with no mixing or composing. (Rungrat Luengnateethap, 1992: 20-27) It can be classified to internal and external application with 3 forms available as a form of herb, abstract, and modern medicine. Furthermore, herbal medicine may give various benefits; being natural resources which have already been in a community, safety,

saving and low price, no problem of raw material lack and being economic plants distributed both in and out country market etc. So, herbal medicine should be efficiently promoted and developed for both medical service and country economy benefits as well.

Traditional Activity is a model of ways of life forming as activity for each age period in a year circle. (Prapasri Sihaampai, 1989: 164-200). It may be classified to 3 categories; for life, community and religious traditional activities. Thus, the life traditional activity as giving birth, marriage and funeral etc. The community or festival traditional activity as Songkran festival and Loykrathong festival etc. While the religious traditional activity as Makabucha Day, Visakhabucha Day, and Buddhist lent day etc.

Participation is a community development process related people involving through thinking, decision making, acting, and evaluating. (William Erwin, 1976: 138) This is similar to United Nation (1975: 4) saying that participation as a community process, people should do 2 levels as making decision to specify the social goals and allocating resources for its achievement, and secondly performing highly satisfied to any activities. The, people's satisfaction for participation is depended on freedom, ability and satisfaction to participation. (Niran Chongwuthivate, 1994: 183-186) While participation forms, Cohen & Uphoff (1980: 219-222) presented 4 forms as decision-making, implementation, getting benefit and evaluation. However, Lee J. Cary (1976:144) considered that people could do the participation as member, attendance at meeting, financial contribution, membership on committee and position of leadership. Furthermore, Thawat Benjathikul's study (1984: 25-26) was found that factors of people participation for community development can be grouped into 5 categories; social, economic, political, social psychological and personal factors. While Siriwan Tapanya (1996: 40) found that factors affecting people's participation on archeological sites conservation in Chiangmai Province could be classified to 4 categories as personal background, social and economic, message receiving and archeological site affective factors etc.

Skill is a working process that places from the first step until the work finished with satisfied quality. (Academic Department, 1997: 8-9) Thus, Kowit Prawalpluk (1991) has explained that a process skill is the concept facing firstly to human ability, then pushing the context out. This may make some parts left as skill and method; to perform, to evaluate and to present, if these methods are made in a new sequence for a new development process consisted of various steps including to state problems, to analyze systematically a set of alternatives, to select the appropriated method, to perform and to improve until satisfying to the product. However, the Management Development Center (1998: 152) has qualified the skill covering imitation, manipulation, precision, articulation and naturalization.

Ritual is human behaviors that should be performed to their religious believes. If it is considered to the perspective view, it can be said that ritual is human behaviors based on religion and belief. (Pranee Wongthet, 1993: 242-252) However, the ritual is consisted of sacrifice, blowout and entertainment. Furthermore, the ritual in Thailand can be classified to 3 categories as ritual on occupation, ritual on life and

ritual on community. However, the ritual is considered to be a major factor affecting festivals and folk games being the same way of ritual in a community.

Folklore is an educational process for life and being as ways of life heritage with traditionally transmitting through both verbal and non-verbal methods for people performances as a ritual and social belief. (Prapasri Sihaampai, 1989: 228-229) It can be classified to verbal, object, combined and demonstrated folklore as the following;

1. Verbal Folklore is the folklore traditionally transmitted through verbal or mouth to mouth, for example; legend, tale, novel, folk song, proverb, local language, puzzle and belief etc.

2. Object Folklore is the folklore traditionally transmitted through some objects as costume, decorated object, household supplied, instrument, object for merit making, musical instrument, carving, weapon, sculpture and handicraft etc.

3. Combined Folklore is the folklore integrated to verbal and non-verbal folklore as local dance, local drama, local sport, local game and any other traditions etc.

4. Demonstrated Folklore is the folklore with various styles presentation However, Pranee Wongtet (1993: 225-226) said that folk games have been not only for relaxation but also for fundamental ritual belief in a community as well.

4) Object Culture

An object culture is the human behaviors on invented construction to benefit their ways of life. (Paradee Mahakhan, 1980: 179) It is classified to fine art and applied art object. The fine art object is what directly created for people satisfaction with 5 branches as fine art, sculpture, architecture, drama and music, together with literature. While the applies art object is the object created for both people satisfaction and beneficial instrument in daily life with 3 branches as decorative, commercial and industrial art object. However, the study of object culture covered costume, residence, instrument, handicraft, infrastructure, painting, folk dance, folk music, sculpture and archeological site as the details below;

Costume is an advantage of clothing and body decoration for people in a community. Thus, Rachaneekorn Settho (1980: 149-160) has concluded that costume indicates cultural and social changes. Although Thai people costume presently is effected by the western cultures but they has been still identified their own costume personalities in each age. As during Nanchao Period, Thai costume was effected by China and Sukhothai Period by Khmer etc. Presently, the west culture is still doing strongly the influence to Thai costume, so most Thai people; especially, teenager now having their western style clothing while the national costume being used for some occasions only.

Residence is one of the four-factor for human biological needs. Thus, Sawart Senanarong (1978: 118-119) has said that the study of residence should cover 3 parts as structure, function and material. However, residence or shelter construction indicates not only the material in a community such as wood, stone, plant

and iron etc., but it still telling also a condition of weather in that community as well. For example, the residence in cold weather area may be designed as a short-shape with the least number of windows etc.

Instrument is an indicator separating human being a part from animal. (Sawart Senarong, 1978: 51) Even some animals can do self-instrument production but just for immediately right now. While the man can provide them for long-term in future use. However, the instrument function may be responding to biological needs, basic occupations, indicators for efficiency and advanced needs as well.

Handicraft is the villager's products being valuable to art that indicates to local wisdom and traditional creative folklore skill in a community. Most handicrafts related to instrument for living and Buddhism for minding, this makes the handicraft being beneficial, simple and not much decorated (Wiroj Srisuro, 1993: 1-11) However, the handicraft can be classified as weaving, pottering, carving, constructing and painting etc.

Infrastructure is a community fundamental facility. (Wanrak Mingmaneeakin, 1993: 158-159) it is classified to 3 categories; economic, social and political infrastructure. The economic infrastructure is considered to be income, wage and salary etc. The social infrastructure is covering communication system, transportation, energy, housing, religion, education, public health and social values etc. While the political infrastructure is considered to be constitution, political party law, parliament, local government, mass media law, and distribution of political activity to people. However, it has been known that the more complete of infrastructure makes the more successful to economic, social and political activities in the country.

Painting is the art of drawing. (Prapasri Sihaampai, 1989: 208-212) It may be classified to 3 categories; art of lines, art of uni-color and art of multicolor. Furthermore, the highlight of traditional Thai fine arts can be viewed within 2 characteristics as firstly the mural art was always previously designed for whole frame without caring perspective view. This may be called two-dimension painting, in the reign of King Rama IV of Rattanakosin Dynasty, the western art influences made the traditional Thai style painting changed to be more perspective and colors, and secondly Thai style design with gentle rhythm like natural line moving still being presently unique for Thai Painting.

Folk Dance is the dramatically dancing as a dancing form, dancing style, context and musical instrument as well. (Prapasri Sihaampai, 1989: 222 - 227) Thus, Rabum (local dance) which was the original tradition Thai dance is then developed to be various dramatically styles and folk music; however, the traditional Thai folk dances is unique and self-identity in accordance with costume, Thai people tastes, gentle dancing style filling full of emotion and meaning as a national art. The dancing styles are composed of local music, rhythm and context together with being able to adapt its style to various contexts and music. However, there have been various styles of traditional Thai folk dance including Rabam (local dance), Dancing, Drama, Masked Plays, Li-ka (demonstrated dancing) and Romwong (basic popular for

villagers) etc. Furthermore, the traditional Thai folk dance was taken to be a basic form of Khmer dance as well.

Folk Music is the music created for local entertainment through indigenous wisdom in a community. (Prapasi Sihaampai, 1989: 216) It can be classified into 4 groups; Khrueng Dit (snapping), Khrueng Si (brushing), Khrueng Ti (hitting) and Khrueng Pao (blowing). Thus, Khrueng Dit is the musical instruments making the voices by snapping such as Ja-Ke etc. Khrueng Si can produce its voices by brushing such as fiddle etc. Khrueng Ti can make its voices by hitting such as drum and symbol etc. and Khrueng Pao can produce its voices by blowing such as flute etc. Furthermore, folk music gives the villagers in various benefits; being a partial life, mental treatment and entertainment.

Sculpture is the art object related carving, pottering and molding. (Prapasri Siha-ampai, 1979: 217) Thus, Supataradit Disakul (1975: 9-20) has classified a sculpture to 2 periods; Prehistory and Post Thai Settlement. The Prehistory of Thai Settlement covering 3 stages as Tavaravadee (393 B.C- 657 A.D.), Srivichai (657-1157 A.D.) and Lopburi (957-1257 A.D.) while the Post Thai Settlement covering 5 stages as Chiangsaen (1057-1548 A.D.), Sukhothai (1257-1438 A.D.), U-thong, Ayutthaya (1350-1767 A.D.) and Ratanakosin (1782-present). However, the ancient sculpture discovered in Thailand is considered to be a historical evidence of cultural distribution from other countries.

Archeological Site is the properties with its age, construction and historical evidence being beneficial to art, history and/or archeology. (Wichai Tiannoi, 1990: 233) It can be classified to 3 categories (Paradee Mahakhan, 1989: 180) as the religious archeological site, the monarch archeological site and the nation archeological site. Thus, the religious one is including Chedi, Stupa, Ubosot and Vihan etc. The monarch is as palace and royal house etc. and the nation is as a city wall, fortress and moat etc. The archeological site; however, has been compared like a mirror reflecting its national civilization. Especially in Thailand, there are about 4,450 archeological sites, 1469 sites getting registered and 395 sites getting already restored.

At the end, It is concluded that community-cultures can be classified to abstractive and non-abstractive culture. The abstractive culture covering concept and organization culture while the non-abstractive culture covering usage and object culture.

2.3.5 Functions of Community -Cultures

Phra Thepvatee (P.A. Payutto, 1989: 18-20) has said that the social development should be faced to cultural factors for the reasons as the following;

- 1) Culture is a heritage experience in a community.
- 2) Culture can be a moderator doing the balance of mental and physical development.
- 3) Culture can effectively transmit the social development process to the new generation.
- 4) Culture can make people getting participation in social development.

5) Culture can equally do a social development, not separating to rural or urban area.

6) Culture can integrate all elements for a community development, as homes, temples and schools being supported each other for the social development.

7) Culture being most parts of resource covering man, material and some abstraction that can be available for new approaches of community development.

The National Cultures Committee (1982: 6-8) has determined that cultures may do its function as firstly culture may create the national stability, secondly culture may improve people's spirit, economy, society and its nation and finally culture may create the social peace for people living in both national and international levels. The culture; furthermore, is still effecting to human behaviors as culture may determine distinctive ways of life for each community, culture may specify human behaviors, and culture may be the most significant factors for social regulation. Due to there are such trusty, belief, values and social norms, which has specified both advantage and punishment.

2.3.6 Environment Oriented Culture

Culture is considered as ways of life. (Kiyotaka Ayuyagi, 1977: 112) While environment is what covering oneself and the surroundings both natural and man-made environment (UNESCO referred to Winai Weerawatananont, 1987: 1) and community being area, interaction, sharing benefit and culture each other. (Jeerapan Kanchanachitra, 1979: 4). So the culture for environment is considered what being ways of life supporting to environment existence in a community. The behaviors; however, supporting the community environment conservation should be based on environmental ethic as Phra Thamapitaka (P.A. Payutto, 1994: 7-8) has said that the Buddha Teaching is ranked to 3 levels including truth, ethic and culture. The truth is a natural fact while ethic considered as a relation between nature and human life or society and the culture being a form of performance in daily life. This is why ethic being rather stable while the truth being much more stable than the ethic together with culture. In this view, education is closely related to culture, due to education being as a tool maintaining and transmitting culture to future generation. However, Pravate Vasi (1995: 1) has said that Thai Society being an agricultural Buddhist. Most people in the country are farmers and about 95% being Buddhism. This made a society developed through the Agricultural Buddhist based community Development Model, but why Thai Society still getting seriously critical problems. Even there are 25,000 temples with 200,000 monks and 100,000 novices together with Buddhism fully living in the country. This can be viewed within 2 channels, firstly Buddha Teaching is not related to goodness or badness and secondly the community development process has not adapted the Buddhist teaching being correctly available to country development.

Phra Thamapitaka (P.A. Payutto, 1994: 11-15) has said that truth and ethic being stable existence all time while culture being also changeable all time as well, so how to evaluate what culture being good or not should be qualified to 6 characteristics as the following;

1. The culture should be based on truth which is natural fact, any cultures standing on this area may be considered to be sustainable existing cultures.

2. The culture should be in accordance with ethic which is goodness evaluated by checking its damage to oneself and others or not, the culture being this way is always valuable to way of life and supporting a community stability as well.

3. The culture should be a form and method supporting a social success. Thus, the social success is a social security effecting to quality of life. The form and method being accordance with the social norm will have made the society having its regulation, not confused and getting some problems beyond performance etc.

4. The culture should be available to timing. This means that culture is way of life adapting to the progress of sciences and technologies. Therefore, a good culture should also respond to way of life on each time.

5. The culture form should be suitable to a community. This means each community has its own thought or belief system effecting to different ways of life, so a good culture should be united to concept or performance method in a community.

6. The culture form should be attracted. This means any cultures being without attraction point, it will be easy to throw out from people in a community.

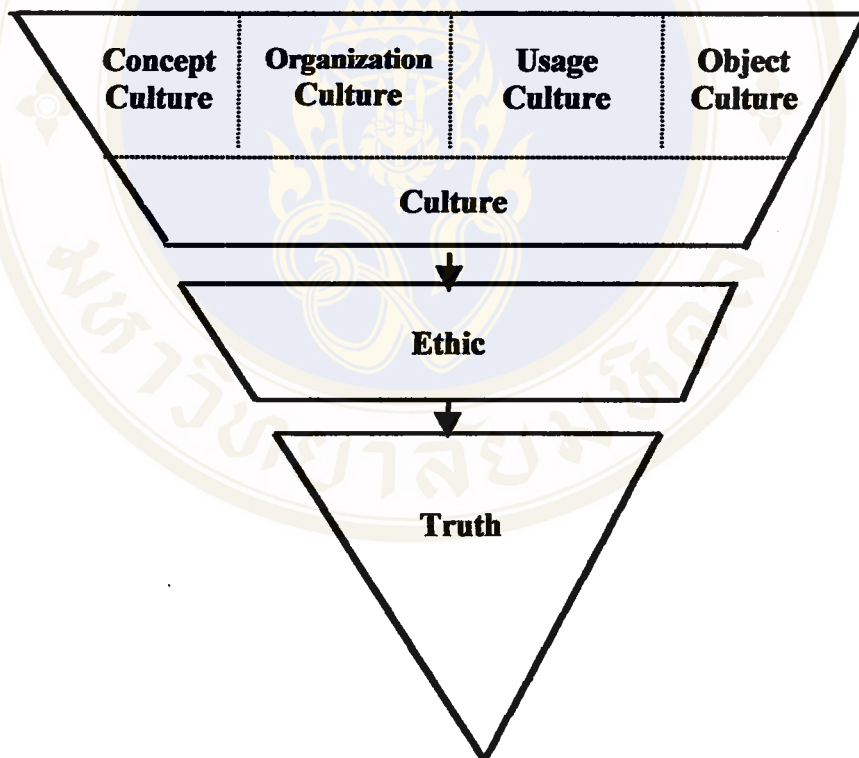


Figure 7. The Cultures Supporting Community Sustainable Environment

Source : Adapted from Pra Thamapitaka (P.A. Payutto), 1994: 11-15
and Suphatra Suphap, 1984: 40-41

Furthermore, Phra Thamapitaka (P.A. Payutto) has said that, in the actual performance, culture is always considered from the last item of cultural qualification to accept by the member in a community. However, any cultures have no their qualification from item 1-6. This means they are the cultures doing accidentally

damage to a society, so an education should explain the people understanding what values doing the same way of community ethic in a community. Furthermore, the cultural qualification should be evaluated from the last qualification to the first one.

2.4 The Art Object Environment Conservation and Development

2.4.1 Art Object and Art Object Environment

Art Object and Art Object Environment are different but related each other as the Ministry of Sciences, Technology and Environment (1998: 9-10) has presented that art object is what created by man and considering to be valuable to art, history, archeology and technology etc. For example royal palace, temple, monument, city wall, building, Public Park, canal, bridge and ancient settlement etc. While an art object environment is defined as the geographic area and its condition surrounding both directly and indirectly related each other. (Office of National Environment Committee, 1995: 32). However, the UNESCO 17th general conference, November 16, 1972 in Paris has agreed the Convention Concerning the Protection of the World Cultural and Natural Heritage which determined the meaning of cultural and natural heritage as the following;

1. Cultural Heritage

1.1 A monument is defined as archeological sites, fine art and architectural products with the archeological component or structure and being highly valuable in history, art or science.

1.2 A group of buildings is defined as the archeological building group or its settlement being valuable in history, art or science.

1.3 A site is defined as human products or integrated products created by man and nature with its area being highly valuable in history and anthropology.

2. Natural Heritage

2.1 Natural places consisted of physical and biological characteristics with highly scientific value.

2.2 Geological places and any Territories where have been habitats for endangered animals and plants with being scientific dominance or significance for conservation.

2.3 Natural Territories with highly scientific value or natural beauty.

In addition, Nit Hiyacheranant (1984: 3) has said that monuments and sites are buildings, places or areas made by man or nature, with high value for art object, architecture, and history. Thus, they are conceded considering to be honorable interests for both its nation and the Worldwide. However, monuments and sites can be classified to 3 categories; firstly, monuments and sites of historical interest as monastery and stone castle etc. They should be conservatively registered to be national archeological sites through the archeological site and ancient art object act. Secondly, monuments and sites of scientific interest as biological fossil, Grand Canyon and shell cemetery that should be conserved as sanctuaries through the property law. And

finally, monuments and sites of natural beauty as mountain forest and island which should be conserved through the forest protection act etc.

However, art object, monuments and sites going up to be more significance nowadays because they have been as our ancestor's heritage to present generation and going on; Thus, Nit Hiyachernant (1990: 1) giving more explanation that history is highly significant knowledge to mankind as Professor Phraya Anumanratchathon saying that one who has no past, this considered to be childhood all time, and one who desires to know the future, he should be back to study the past. And also Sir. Winton Charchil said that the far you see back to the past, the far you get to the future. Seeing that, these speeches presenting any ages of art objects are also considered to be the most valuable heritage for new generation. This is the reason why they should be conserved and developed. However, price always calculated to money is not the purpose for their conservation but mental value without other things being instead may be considered as well.

2.4.2 Problems and Causes of Art object Environment

The art object environment presently gets various problems; as misfunction of land use, changing of values and pattern of life, lack of public mind, under development of infrastructure, and pollution. These problems are considered to be caused by nature and human behaviors. The natural causes are climate, earthquake, flooding and wild fire etc. While the human behavior causes may be as direct acting to art object or indirect acting as doing damage somewhere surrounding an art object etc.

2.4.3 The Art Object Environment Conservation and Development

Conservation is a reasonable application for sustainable use. (Kasem Chankaew, 1998: 83-85). It should perform on the principles of sustainability, restoration and preservation. However, all principles may be classified to 8 approaches; using, storing, maintaining and repairing, restoring, developing, preventing, preserving and zoning as the figure 8.

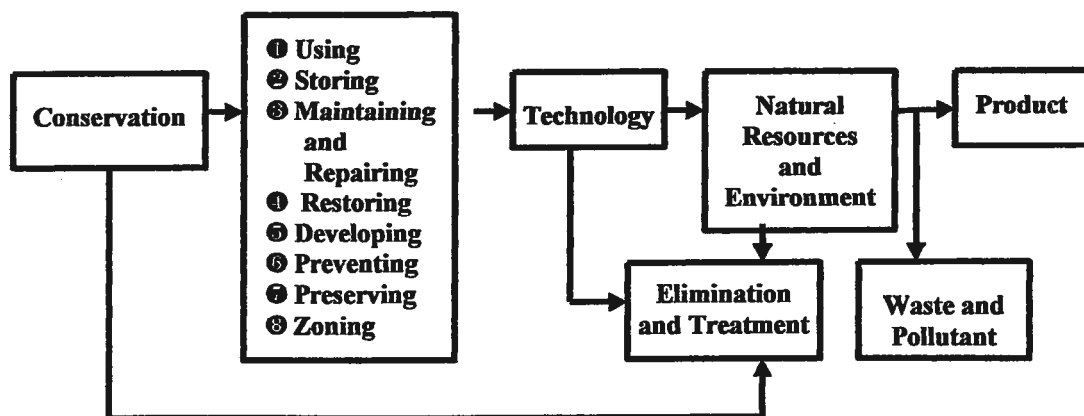


Figure 8. A Process of Environmental Conservation
Source : Kasem Chankaew , 1998: 87



Furthermore, Kasem Chankaew et al. (1998: 86-87) has said that the concept of environmental conservation should be performed as follow;

1. Having knowledge for natural resources application
2. Maintaining the major and rare resources
3. Maintaining the production or birth rate being at least equal to its expansion of death rate for condensable natural resources.
4. Population is the major factor for environmental change, so its birth rate and change of population number should be considered to people needs for natural resources.
5. Improving effectively productions and applications together with searching the new approaches for resources use.
6. Educating people to understand the natural balance Thus, in the process of environment management, sustainable yield should be considered to be its goal based fundamental conservation principle. However, Technology should also be available for waste treatment as well.

The National Environment Committee Office (1990: 47) has made the meaning of preservation as maintaining some resources for being available in the specified duration. While conservation has been defined as maintaining the significance and the dominant evidence indicating the art object revaluation and adapting them to benefit human present life together with succeeding the people identity in a community. (Satit Shusaeng, 1983: 68) Seeing that the conservation is not caring the maintenance only but it should be integrated to human life until being an ordinary activity in societies.

Lewis Munford (1963: 41-42) said, *“if we need to build the spirit in a community, we have to study first their lives in that community”*. This is similar to Sandy (1979: 4-7) saying that the world civilized heritages have been belonged for all which should protect them from any damages as destruction, pollution and demolition from modern development plan. Furthermore, Supataradit Disakul (1980:15) saying that new construction instead of the old one may be another way for art object environment conservation; thus, it is depended on a architect ability. However, the concepts for art object environment conservation supporting a city development; Nit Hiyacheranant (1984: 16-17) has said that firstly; transportation system should be avoided the conserved art object environment, secondly art object environment conservation should be performed with a city development and try to integrate them to present life or environment in a community, thirdly high risen buildings should be exhibited in the conserved area and finally city bill-boards should be avoided to stay nearly the sources of art object environment as well.

2.4.4 Approaches for Art Object Environment Conservation and Development

The Office of Environmental Policy and Planning (1992:41) has recommended various approaches for art object environment conservation and development; firstly, stimulating government organizations and people correctly and appropriately caring care and conserving an art object environment, secondly improving the environmental laws being actively available, thirdly preventing any social activities effecting to environmental damage, fourthly improving the villagers

getting awareness, knowledge, attitude and skill for art object conservation and development, and finally developing the methods of art object environment conservation for getting higher benefit to both art object existence and quality of life in a community.

2.4.5 Advantages of Art Object Environment conservation and Development

1. Cultural Resource Conservation

- significance
- 1) To make the art object sources getting more value and
 - 2) To be pleasure with national civilization
 - 3) To make people getting unity for maintenance any art object environment valuably standing for national heritage forever
 - 4) To make the national arts and crafts getting more famous and well known to the world

2. Environmental Conservation

- 1) To make good condition in a community
- 2) To improve people getting quality of life
- 3) To be an interesting place for relaxation

3. Education and Research

- 1) To improve human resources getting higher quality and standard criteria in both academy and attitude
- 2) To be learning –resources for any learners

2.5 Environmental Education

Environmental Education is an educational process related abstractive and non-abstractive environment that changes the natural condition effecting too human. It is made for creating attitude, behavior and values to improve quality of life and environment. (Winai Weerawatananont, 1997: 3) This is the same view of Fien (n.p: 12) saying that environmental education is multidisciplinary for understanding the whole environment with the ultimate goal for developing attitude in environmental concern. So the environmental education gives not only knowledge but also feeling, attitude, skill and social activities as well. Moreover, Kasem Chankaew and Praphan Koysomboon (1982: 7) have explained that environmental education is an educational process developing skill, attitude and experience to new concept to be able to think, to act and to solve the problems based on relation among human, culture and environment for environmental quality. Together with Lucko, Disinger and Roth (1982:8) saying that environmental education is a process improving people; firstly, getting knowledge related both biological and cultural environment, secondly being aware to environmental problems and their solutions and finally stimulating people to be responsible to environmental development for quality of life.

As mentioned, It is concluded that environmental education is the educational process related environment for all walks getting awareness, knowledge, attitude, skill, ability to evaluation and participation on environmental solution among communities, nations and the world levels.

2.5.1 Fundamental Philosophy and Principle of Environmental Education

The environmental education based on these fundamental philosophies including firstly there is only one earth so all parts of environment connected each other to be one, secondly human being as a partial environment in the world, thirdly human ways of life have to be in accordance with the world environment existence, fourthly an appropriated economic and social development should be performed in a community and finally environmental awareness and behavior are necessary for their living. However, Raviwan Chinatrakoon (1997: 73-74) has recommended that people should pay their ways of life following 10 items of the environmental education principle; learning for life, life-long education, human learning present and future oriented, environmental ethic, systematic approach, interdisciplinary approach, active participation, awareness, attitude and values achievement, and problem solving oriented. Furthermore, The Education Ministry (1977: 1-10) has specified 2 principles of environmental education as firstly an education process should make learners getting correctly knowledge, attitude, values and decision making on what related environment together with able to take the educated experiences for their appropriated ways of life, secondly an education process should make learners realizing to their functions and responsibilities for environmental problems and improvements.

2.5.2 The Purposes of Environmental Education

The Belgrade Charter has determined the purposes of environmental education that are to develop the world population getting awareness concerning to an environment and its problems, knowledge, attitude, motivation together with participation on both individual and social level to solve the previous environmental problems and also to prevent the new ones. (UNESCO referred to Winai Weerawatananont and Banchuen Sipanphong, 1980: 27) Furthermore, the Tbilisi International Conference for Environmental Education, Russia in 1977 (UNESCO, 1980: 26) specified the goal of environmental education that it should cover 3 items; firstly to promote the world population getting awareness in situations and relations of economy, society together with politics to rural and urban ecology, secondly to improve the world population getting knowledge, attitude and skill to prevent and improve environment and finally to create the appropriated behavior patterns related environment both individual and social levels.

2.5.3 The Objectives of Environment Education

The International Operation Convention for Environmental Education at Belgrade in 1975 A.D. presented the objectives of environmental education covering 6 items (Winai Weerawatananont et al., 1997: 24) including awareness, knowledge, attitude, skill, evaluation ability and participation as the details below;

1) To stimulate people or society getting awareness to environmental problems

- 2) To stimulate people or society getting some experiences, knowledge and understanding on environment and environmental problems
- 3) To stimulate people or society absorbing the social values, concerning and committing to environment and continuously participating to improve a quality of environment
- 4) To stimulate people and society getting skill on environmental problems
- 5) To stimulate people and society being able to evaluate the environmental operation and training courses related the context of ecology, politics, economy, society, art and education
- 6) To stimulate people and society improving their responsibilities for solving environmental problems and doing an appropriated activities for sustainable society and environment

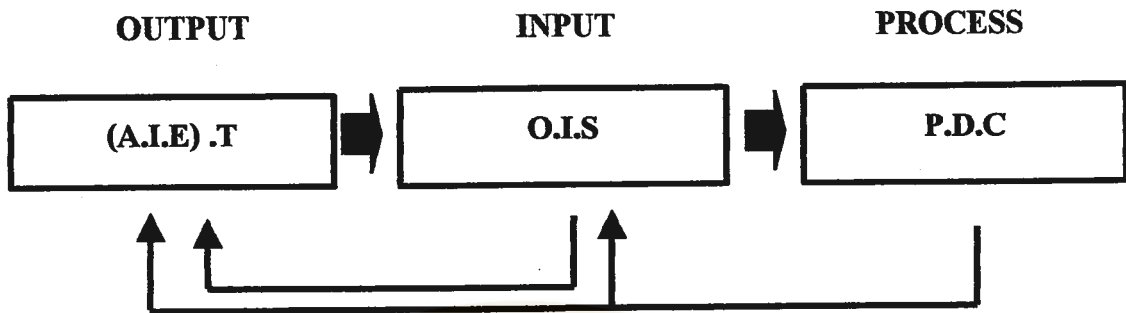
2.5.4 A Model of Environmental Education

A model of Environmental Education is derived from a word "*model*" and "*environmental education*". Thus, Daft (1992: 20) has said that a model is the simple representative explaining some dimensions of organization. Furthermore, Smith et al. (1980: 461) has classified a model to physical and symbolic model as the following;

- 1) Physical Model can be classified to iconic and analog model. The iconic is similar to what a real thing as a model of airplane etc. While the analog is similar to a real phenomena as chemical experiment in laboratory room before actual performance etc.
- 2) Symbolic Model can be also classified to verbal and mathematical model. Using description while the mathematical one being produced by using number or graph can make the verbal model.

It is concluded that a model is defined as a form being guideline for analysis, research or decision making in any cases. While an environmental education is an educational process related environment for improving people awareness, knowledge, attitude, skill, participation and ability to evaluation on any social activities effecting to environment and quality of life in a community. So a model of environmental education should be defined as a form being guideline for environmental education process to any target groups. However, a model of environmental education now in Thailand may be covered any lines of formal, non-formal and informal education. (Kasem Chankaew et al. 1998: 103-104)

Furthermore, Ralph M. Stogdill (referred to Kesin Kutsalanuparp, 1999: 31) has presented a systematic model consisted of input, process and output as the figure 9.



- | | | | |
|----------------|---|---|-----------------------------|
| INPUT | A | = | Action |
| | I | = | Interaction |
| | E | = | Expectation |
| | T | = | Task objective and material |
| PROCESS | O | = | Operation |
| | I | = | Interpersonal |
| | S | = | Structure |
| OUTPUT | P | = | Product |
| | D | = | Drive |
| | C | = | Cohesiveness |

Figure 9. The Component of Systematic Approach
 Source : Kesin Kutsalanuparp, 1999: 31

Raviwan Chinatrakoon (1997: 110) has said that Environmental Education, by the end, will have produced the target groups getting new behaviors in accordance with its purpose, so a systematic approach is rather appropriated for the process mentioned as the figure 10.

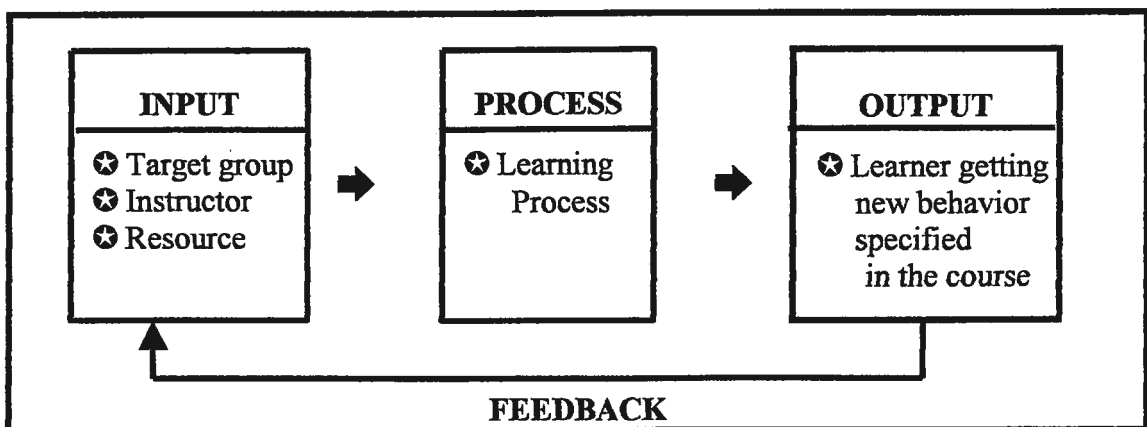


Figure 10. A Process of Environmental Education
 Source : Raviwan Chinatrakul, 1997: 110

Stevenson (1981: 22) has said that one of the environmental education methods is a problem solving. It is proved to make the learners understanding and solving the problems. This is the same view of Stepp (1981: 29) who has said that an environmental education should be emphasized 2 processes including problem solving and values clarification.

2.6 Research Concepts and Theories

In this study, the researcher has integrated various concepts and theories including Structuralism Theory, Group Theory, Maslow's Heirarchy of Human Needs Theory, Participation Theory, Innovation Diffusion Theory, Systematic Theory and Sustainable Development Concept as the details below;

2.6.1 Structuralism Theory

Claude Levi Strauss has presented those human behaviors indicating cultural forms reflecting to their mind structures and concepts. (Boonderm Panrob, 1986: 46)

2.6.2 Group Theory

Elton Mayo saying that team style working effects to personal working behavior, personal norms and concept. (Prasin Sophonboon, 1990: 67)

2.6.3 Maslow's Heirarchy of Human Needs Theory

Abraham Maslow saying that human needs can be based on priority responses from biological to advanced need. (Theera Praprutkit, 1993: 58-62) Thus, the needs are biological, safety, love and belonging, esteem and self-actualization needs.

2.6.4 Participation Theory

Participation is a process of people sharing their thinking, consulting, planing, performing and evaluating to the community activities. (Prasobsuk Dee-in, 1988: 19; Taweethong Hongwiwat, 1984: 2; Akin Rapeepat, 1984: 320; Pearse and Stiefed, 1970: 4-8) Furthermore, Kanika Chomdee (1981: 13) has presented that there are various forms of people's participation including attendance at meeting, financial contribution, membership on committee, position on leadership, interviewer, solicitor, customer, entrepreneur, employee and material contribution etc. However, Akin Rapeepat (1994: 109-111) has presented that any other theories related participation as Mass Persuasion Theory, National Morale Storming Theory, Nationalism Theory, Leader Forming Theory and Management System Theory should be also integrated into the Participation Theory. However, Niran Chongwuthiwat (1984: 183) confirmed that faith, empathy and enforcement are major factors affecting people participation as well.

2.6.5 Innovation Diffusion Theory

Changing in a society is what being necessary and dynamic as Niset (referred to Somsak Srisantisuk, 1986: 16-17) saying that social change makes human getting better life. Rogers (referred to Smith Sra-ubol 1991: 125-126) has said that people may be easy to accept an innovation if it is more beneficial than the former one, being the same ways of previous cultures, simple, easy to use and touchable thing. However, the people accepted some innovations based on their qualifications classified to 5 categories; innovator, early adopter, early majority, late majority and laggards. Furthermore, Everette Rogers has given more explanation that people have adopted innovations with step-by-step process; awareness, interest, evaluation, trial and adoption.

2.6.6 Systematic Theory

The educational system can be compared with general production system consisted of input, process and product. (Chalong Boonyanant, n.p.: 154) The educational input is considered to be students, teachers, buildings and any other materials. The process is the ways of teaching and learning. While the students who finished the educational course being the product.

2.6.7 Concept of Sustainable Development

Sustainable Development is the development performed under the ecological limitation. (Preecha Piampongsarn, 1997: 92) Thus, Phra Thamapitaka (P.A. Payutto, 1996: 237-258) has explained that the sustainable development process may be classified to human development stage and activity development stage. The first stage covers human behavior, mentality and wisdom while the second stage is considered human as both the end sources and the resources. The end sources look human as a complete product while the resource-facing human as input. This means an educated person can design the activities for person educated or development. However, the sustainable development should make a relation among human, society, nature and technology.

2.7 Research Related

Ekachai Krue-in-ta (1997: abstract) studying the community-cultures for forest conservation of Karen; thus, it was found that the community-cultures could be effectively available for forest conservation. While Siriwan Papanya (1996: abstract) studying the factors affecting archeological site conservation: a case study for participation of people living around the archeological sites in Mueng District, Chiang Mai Province. It was found that most people had low participation to archeological site conservation. Thus, the different marital, economic and social status made the different participation levels. While the difference of gender, age, religion, occupation, hometown, information, training and duration of living also made the different participation levels. Furthermore, the environmental conservation and development in a community can be successful through group process as Tulawat Panitcharoen (2536:98) studying Karen's social treatment for natural resources management: a case study of Karen Sakor, Maehan Village, Mae Hongson Province. It was found that

Karen's Social Treatment through its original community-cultures could make the effective management for natural resources. Even though its owned cultures were intervened by modern educational system, Christian distribution and new concept of production just for sale etc. This research pointed to community group power in the forms of concept, ritual and natural resources management. Thus, this research did the similar view of a Coordinating Committee of Private Organization and Rural Development in the Up-North Area Cooperating with Institute of Social Research, Chiangmai University. (Chayan Watanapoot, 1991: 27) It was found that group forming of villagers can conserve 146 community- forests in the Northern Provinces and the survey in 1996 A.D. revealed that over 400 community- forests in the same area still being the original sources of water for all in the country.

However, it is concluded that a process of community-cultures based environmental education model should be made various aspects of reviewed literatures including environment, Thai Society, community-cultures, art object environment conservation and development, environmental education, research concepts and theories together with research related. Especially, the community-cultures, which were major information for constructing a model of community-cultures, based environmental education emphasizing people's participation on art object environment conservation and development in a community. They were classified to be 4 contexts; concept, organization, usage and object culture covering 35 variables. The concept culture covered 6 variables; thought, knowledge, attitude, values, belief and religion. The organization culture was consisted 6 variables; family, relatives, peer group, activity group, community and community network. The usage culture was consisted 13 variables; language, social norm, education, occupation, income., consumption, saving, folk medicine, traditional activity, participation, skill, ritual and folklore. The object culture was consisted 10 variables; costume, residence, instrument, handicraft, infrastructure, painting, folk dance, folk music, sculpture and archeological site.

For analyzing the community-cultures mentioned; the researcher integrated various concepts and theories including Structuralism Theory, Group Theory, Maslow's Hierarchy of Human Needs Theory, Participation Theory. Innovation Diffusion Theory, Systematic Theory and Sustainable Development Concept as well.

CHAPTER III METHODOLOGY

The purpose of this study was to present a model of community-cultures based environmental education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City to the committee of Ayutthaya local art object environment and development. Thus, the study contained 3 special objectives; firstly, studying the community-cultures, secondly evaluating the people's knowledge, attitude, skill and participation on art object environment conservation and development in the community and finally constructing a model of community-cultures based environmental education. The process performed both qualitative and quantitative research designs with the methodology as the following;

- 3.1 Populations and Samples
- 3.2 Instruments
- 3.3 Data Collection
- 3.4 Model Construction Process of Community-Cultures Based Environmental Education
- 3.5 Data Analysis and Interpretation

3.1 Populations and Samples

3.1.1 Populations

The population of this study was the people living in the community of the World Cultural Heritage of Ayutthaya Historic City covering 1,810 rai in Thawasukri and Pratuchai Sub-district, Ayutthaya Municipality of Ayutthaya Province. Thus, Ayutthaya Municipality (1999; copied document) has reported that there were 7,335 households and 27,003 people for the grand total. (2,592 households and 8,221 people in Thawasukri Sub-District together with 4,743 households and 18,782 people in Pratuchai Sub-district.

3.1.2 Samples

The researcher studying the community-cultures, evaluating the people's knowledge, attitude, skill and participation on art object environment conservation and development together with constructing a model of community-cultures based environmental education. Then, doing the model efficiency evaluation through 40 villagers' implementation before presenting the complete model to the Committee of Ayutthaya local Art Object Environment Conservation and

Development. This made the researcher specifying the samples according to the objectives as the following;

1) Studying the community-cultures; the researcher doing data collection from 2 groups of sample including the heads of households and the local experts in the community. There were 379 persons being the heads of households randomized by simple random sampling and gathering the data with a questionnaire. While there were 15 local experts randomized by purposive sampling and gathering the data with structural interview form. However, the local experts' qualification was specified before selecting as firstly being a specialist on community-cultures and secondly living or working related art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.

2) Evaluating the people's knowledge, attitude, skill and participation on art object environment conservation and development in the community through 379 people being heads of households with the questionnaires designed by the researcher.

3) Constructing a model of community-cultures based environmental education. For this, SWOT Technique Analysis was available to analyze strength, weakness, opportunity and threat of the community and community-cultures. Then, the analyzed results was a guideline for constructing a model of community-cultures based environmental education through a group method of local experts for inspecting and improving the model to be appropriated for people's participation on art object environment conservation and development in the community.

Furthermore, the sample size being 379 households was calculated from Taro Yamane's Formula (Boontham Kitpredaborisuth, 1988: 25) as the following;

$$n = \frac{N}{1 + Ne^2}$$

n = Sample size
N = Population size
e = Sample's error (0.05)

3.2 Instruments

3.2.1 Instruments

The instruments of this study were observation, structural interview and questionnaire. Thus, the data related observation, structural interview and questionnaire collected community-cultures. While the evaluation of people's knowledge, attitude, skill and participation on art object environment conservation and development was made only by the questionnaire.

3.2.2 Instrument Formation

1) Observation Form

The observation form was made with 3 stages; specifying the objectives, designing the structure and specifying the activities. After the observation

form had been available, the researcher analyzed the activities in various aspects; its meaning, relationship to other activities, people's participation, and the community environment etc.

2) Questionnaire

The questionnaire was available for collecting the data related community-cultures, people's knowledge, attitude, skill and participation together with problems and recommendations on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. The researcher has designed the questions covering 35 variables mentioned before; however, there were various questions style as check list, rating scale and open-ended questions with 4 parts as the following;

Part 1. The questions related personal, social and economic characteristics through check list and open-ended question

Part 2. The questions related knowledge on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City with 15 questions of multiple choice

Part 3. The questions related attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City with 45 questions of rating scale

Part 4. The questions related problems and recommendations of art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City with 3 questions of open-ended question

3) Interview Form

The researcher did the in-depth interview with a structural interview covering all aspects as personal characteristics, history of people's settlement, the World Cultural Heritage of Ayutthaya Historic City, community-cultures, people's participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City together with problems and recommendations related ways of life supporting art object environment conservation and development in the community.

3.2.3 Effective Instruments

For producing the effective instruments, the researcher has made evaluation some aspects including validity, reliability, discrimination and objectivity as the following;

1) Validity: The questionnaire and the structural interview form had been inspected the validity by 3 local experts before presenting to a dissertation advisory board doing again the inspection, then it was available for data collection.

2) Reliability: The questionnaire had been tried out to 30 people living in external parts of the World Cultural Heritage in Ayutthaya Island before analyzing reliability level calculated with KR 20 (Kuder Richardson 20) for the questions given 1 score for the right answer and 0 score for the wrong one, while Cronbach's Alpha for the questions scored with rating scale as the formula below ;

Kuder Richardson's Reliability Formula (KR 20)

$$r_{tt} = \left\{ \frac{n}{n-1} \right\} \left\{ 1 - \frac{\sum pq}{\sum S_t^2} \right\}$$

r_{tt} = The reliability of questionnaire

n = A number of questions in the questionnaire

S_t^2 = Variance of the questionnaire grand total score

p = A portion of the right answers for each item

q = A portion of the wrong answers for each item

Cronbach's Alpha – Coefficient Reliability Formula (α - Coefficient)

$$\alpha = \frac{n}{n-1} \left\{ 1 - \frac{\sum S_i^2}{S_t^2} \right\}$$

α = The reliability of questionnaire

n = A number of questions

S_t^2 = Variance of the questionnaire grand total score

$\sum S_i^2$ = Sum of Variance in each item

Thus, the effective questions getting reliable score not over 1.00 should be available for data collection; however, the score being nearby 1.00 is considered to be high level of reliability for that question.

The reliability evaluation for a structural interview form, the researcher doing the trying out to 3 local experts in the community, then improving until the interview being ensure that all informant got directly understanding before being available in the field.

3) Discrimination**The Discrimination Formula for Rating Scale Questions**

$$t = \frac{\frac{\bar{X}_H - \bar{X}_L}{\sqrt{S_H^2}}}{\frac{N_H}{N_H} + \frac{S_L^2}{N_e}}$$

t = The discrimination power for each question

\bar{X}_H = An average score for the higher score group

\bar{X}_L = An average score for each question of the lower score group

S_H^2 = Variance for each question of the higher score group

S_L^2 = Variance for each question of the lower score group

N_H N_e = A number of persons for the higher and lower score group

Thus, $t > 1.75$ was considered to be the effective questions.

4) Objectivity: The instrument objectivity was evaluated by trying out the questionnaire to 30 people living in the external part of the World Cultural Heritage Area in Ayutthaya Island. Then, inspecting and improving until being ensure that the questionnaire had been completely objectivity before being available for data collection in the field.

3.3 Data Collection

The data collection process covered 4 stages; documentary searching, research area surveying, coordinating and data collecting as the details below;

3.3.1 Documentary Searching: The researcher did the documentary searching to collect the data related environment, Thai society, community-cultures, art object environment conservation and development, environmental education, research concepts and theories together with the related research. This was made for getting clearly understanding the research problem and specifying the research methodology as well.

3.3.2 Research Area Surveying: The researcher did the research area surveying to study presently actual conditions including the community geography, art object environment, people's ways of life, resident settlement and some problems in the community.

3.3.3 Coordinating: The researcher coordinated some organizations; Governor Office of Ayutthaya Province, Office of Ayutthaya Historic City, Ayutthaya Municipality, Ayutthaya Cultural Center together with the 3rd Region of National Archeological Site and Museum etc. This was made for getting permission and doing then data collection in the community.

3.3.4 Data Collecting: The researcher collected the major data related community-cultures through observation, questionnaire and in-depth interview, then evaluating the people's knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. After getting all parts of the community data, SWOT Analysis Technique had been available to analyze the strength, weakness, opportunity and threat of the community before creating a model of community-cultures based environmental education through 15 local experts on community-cultures. Together with did the model efficiency evaluation implemented through 40 villagers living in the community. Thus, the complete model must be presented to the Committee of Ayutthaya local Art Object Environment Conservation and Development which is responsible for people's training to get environmental awareness, attitude, knowledge, skill, participation and ability to evaluation some social activities which may damage natural balance in the community as well.

3.4 Model Construction Process of Community-Cultures Based Environmental Education

The construction process of community-cultures based environmental education model was consisted of 3 steps; model construction, model inspection and model efficiency evaluation as the details below;

3.4.1 Model Construction: The researcher started the first step on studying community-cultures; then, evaluating the people's knowledge, attitude, skill and participation on art object environment conservation and development by documentary, observation, questionnaire and in-depth interview from the villagers and local experts on community-cultures in the World Cultural Heritage of Ayutthaya Historic City. After the collected data had been analyzed through SWOT Technique Analysis (Strength-Weakness-Opportunity-Threat: SWOT), its product was taken to construct the community-cultures based environmental education model consisted of goal, method, input and time frame as specified in the research conceptual framework.

3.4.2 Model Inspection: The model was inspected firstly by the dissertation advisory committee; then, by the local experts. The local experts had made firstly individual inspection before permitting the researcher corrected some items; then, doing a group process of all local experts to confirm again the appropriated model.

3.4.3 Model Efficiency Evaluation: The model was managed for efficiency evaluation through actual implementation. There were 40 villagers implemented through a participatory training for 3 days; 2 days for training and a week later doing its evaluation for 1 day.

3.5 Data Analysis and Interpretation

3.5.1 Data Analysis

Due to this study being as a social research and some stages; studying the community-cultures etc. had to do the data collection by in-depth interview and participatory observation. This may be considered to be the method for anthropological research. Furthermore, the model efficiency evaluation was made through authentic approaches. So the statistics for data analysis in this study were consisted of both descriptive and quantitative statistics through SPSS / PC⁺ (Statistical Package for the Social Sciences: SPSS / PC⁺) as the details below;

1) **Frequency and Percentage:** This was made for presenting frequency and number of personal, social and economic information together with problems and recommendations for art object environment conservation and development in the community.

2) **Arithmetic Mean (X) and Standard Deviation (S.D.):** This was made for central tendency and variation measurement of personal, social and economic information together with problems and recommendations for art object environment conservation and development in the community.

3) **Community Analysis:** This was made for studying the community strength, weakness, opportunity and threat through SWOT Technique Analysis

(Strength-Weakness-Opportunity-Threat: SWOT). Thus, the analyzed results were taken to construct a model of community-cultures based environmental education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.

4) **T-Test:** This was made for comparing the score level of pre-post evaluation of community-cultures based environmental education process.

3.5.2 Data Interpretation

The research for constructing a model of community-cultures based environmental education, the researcher studied the community-cultures through SWOT Analysis Technique (Strength-Weakness-Opportunity-Threat: SWOT); then, the analyzed information were taken for constructing a model of community-cultures based environmental education and then doing the model efficiency evaluation indicated with t-test statistics. However, the data were interpreted to the standard criteria as the following:

1) **SWOT Technique Analysis:** This was faced to both internal and external factors for seeking the community strength, weakness, opportunity and threat. (Department of Academy, 1999: 41). Then, specifying the present positioning for community development in the future.

2) **Weight Mean Score (WMS):** This was made for measuring the people's knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. Thus, its formula presented by Namchai Thanuphon (1986: 44) as the following;

$$WMS = \frac{3f_3 + 2f_2 + f_1}{TNR}$$

WMS = Weight Mean Score

f_1 = A number of the informants answering "*Low*"

f_2 = A number of the informants answering "*Moderate*"

f_3 = A number of the informants answering "*High*"

TNR = A number of total informants

The Average Interval Criteria

2.35 – 3.00 is defined as the informant's knowledge, attitude, skill and participation at high level.

1.68 – 2.34 is defined as the informant's knowledge, attitude, skill and participation at moderate level.

1.00 – 1.67 is defined as the informant's knowledge, attitude, skill and participation at low level.

3) **T-test:** This was made to compare pre-post evaluation of the community-cultures based environmental education model. The researcher has presented the table consisted of variables, arithmetic mean (X), standard deviation (S.D.), t-test with the statistically significant difference at 0.05 level.

CHAPTER IV RESULTS

The purpose of this study was to present a model of community-cultures based environment education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. There were 3 special objectives; firstly studying the community-cultures, secondly evaluating people's knowledge, attitude, skill and participation on art object environment conservation and development in the community and finally constructing a model of community-cultures based environmental education. The informants were 379 persons being heads of households and 15 local experts on community-cultures by using questionnaire, in-depth interview and observation. Then, the researcher presented the research findings in various aspects as the following;

- 4.1 General Information of Community
- 4.2 Personal Information
- 4.3 Community-Cultures
- 4.4 People's Knowledge, Attitude, Skill and Participation on Art object Environment Conservation and Development in the Community
- 4.5 A Model of Community-Cultures Based Environmental Education

4.1 General Information of Community

Ayutthaya Historic City was certified to be the World Cultural Heritage in December 13, 1991 by the United Nations of Educational Scientific and Cultural Organization (UNESCO). It covers 1,810 rai of Pratuchai and Thawasukri Sub-District where are some parts of Ayutthaya Island in Ayutthaya Municipality. There were 7,335 households of 27,003 people (1999 A.D.) living in the ancient city containing 95 archeological sites which aged over 650 years (1350 A.D.-present) However, it can be classified to be 4 periods; Ayutthaya Civilization (417 years; 1350–1767 A.D.), The Ruined City (140 years; 1767–1907 A.D.), The Ancient City Conservation and Development (83 years; 1908–1991 A.D.), and The World Cultural Heritage of Ayutthaya Historic City (1991 A.D.–present) as the figure 11.

The Archeological Sites in the World Cultural Heritage of Ayutthaya Historic City

Ayutthaya Historic City where was certified to be the World Cultural Heritage covering 1,810 rai in 1991, contained 95 archeological sites (1987 A.D.). However, the researcher's field study (2000 A.D.) found that there were only 61 archeological sites still appearing their empirical evidences while the rest had no any physical evidences as its name list bellows;

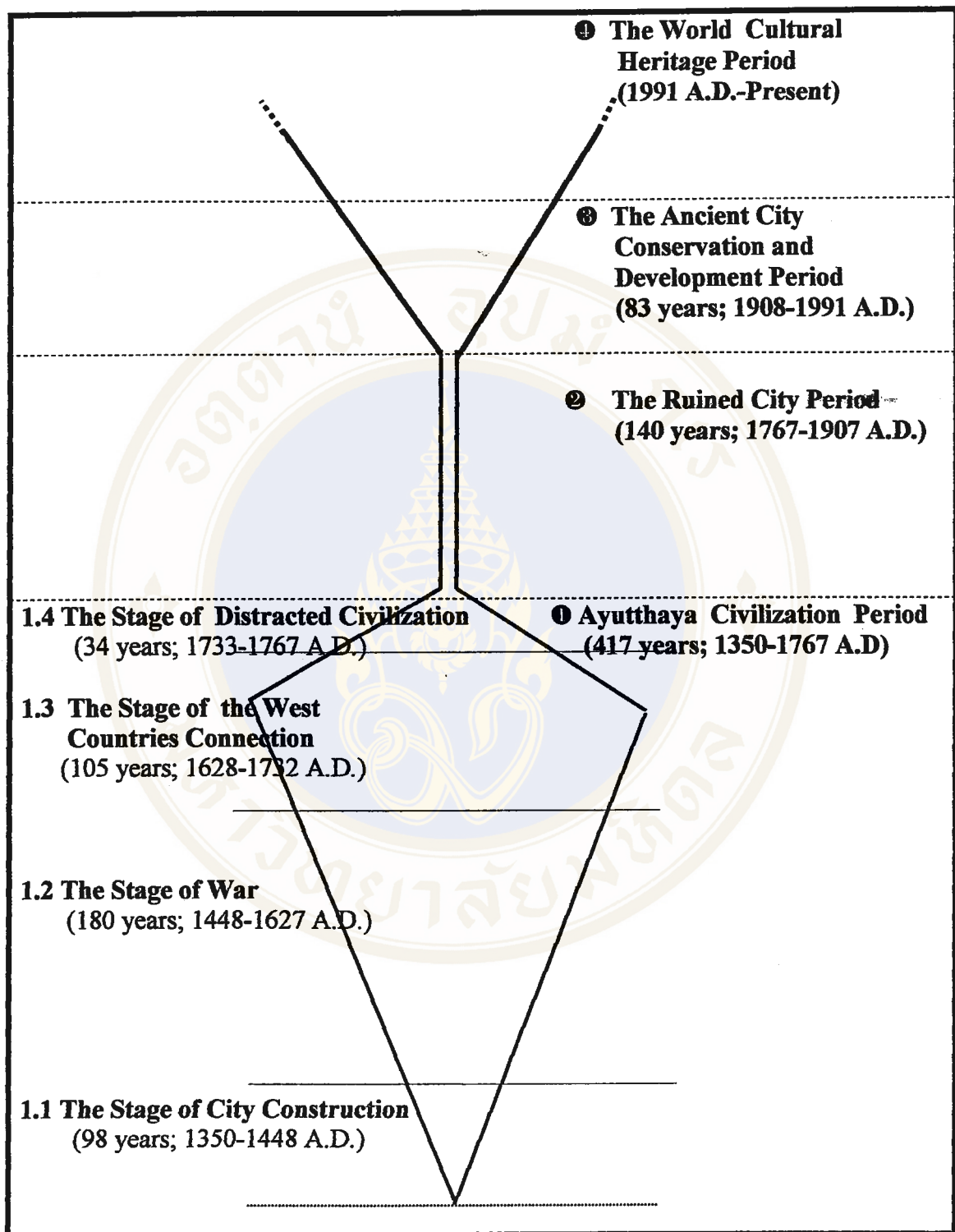


Figure 11. A Model of Community Development in the World Cultural Heritage of Ayutthaya Historic City

Source : The Research Findings

1) The Empirically Evident Archeological Sites

- | | |
|-------------------------------------|-----------------------------|
| 1. King U-thong Monument | 2. Wat Phrasisanphet |
| 3. The Ancient Palace | 4. Wihan Phramongkhonbophit |
| 5. Wihan Klaep | 6. Khunphan House |
| 7. Wat Ket | 8. Sisanphet Road |
| 9. Wat Phraram | 10. Phraram Swamp |
| 11. Yen Royal House (Tukdin) | 12. Talatchaoprom Road |
| 13. The Ruin City Wall | 14. Wat Chumsaeng |
| 15. Wat Langkakhao | 16. Takalahom Road |
| 17. Wat Suwanachedi | 18. Wat Ratchaburana |
| 19. Chikun Road | 20. Chedi Chao-Ai Chao-Yi |
| 21. Patan Bridge | 22. Wat Mahathat |
| 23. Wat Nok | 24. Wat Langkadam |
| 25. Wat Sankaphat | 26. Wat Chan (1) |
| 27. Wat Phong | 28. Chikun Bridge |
| 29. Wat Tratrung | 30. Talaengkaeng |
| 31. Sanphrakan | 32. Klong Nakhornban |
| 33. Khlong Tho | 34. Lamheri Bridge |
| 35. Langwanglang Road | 36. Khlongtho Road |
| 37. Wat Som | 38. Khlong Klab |
| 39. Wat Sankatae | 40. Wat Sankatha |
| 41. Wat Chediyai | 42. Wat Chaophram |
| 43. Wat Ubosot | 44. Wat Chaoprap |
| 45. Khlang Dibuk | 46. Talatlek Road |
| 47. Khlong Khanan Tanon
Talatlek | 48. Wat Luang Chikrut |
| 49. Wat Wangchai | 50. Wat Mahasaman |
| 51. Wat Phrangam | 52. Wat Pasaton |
| 53. Wat Lokayasutharam | 54. Wat Vorachetharam |
| 55. Wat Rakhang | 56. Wat Vorapho |
| 57. Wat Maichaivichit | 58. Wat Thammikarat |
| 59. Wat Yanasen | 60. Klong Pratukhawpluek |
| 61. Wat Phlapplachai | |

2) The Non-empirically Evident Archeological Sites

- | | |
|-----------------------|-----------------|
| 1. Nabangtra Road | 2. Wat Chan (2) |
| 3. Wat Sattabap | 4. Wat Songkhon |
| 5. Wat Daovadung | 6. Wat Paphai |
| 7. Wat Chan (3) | 8. Wat Chanaman |
| 9. Wat Pamo | 10. Wat Thong |
| 11. Watthongpamo Road | 12. Wat Hib |
| 13. Wat Kokhamin | 14. Wat Perai |
| 15. Wat Papat | 16. Wat Kaew |
| 17. Wat Thonghoikhong | 18. Wat Sakae |

- | | |
|---------------------|---------------------|
| 19. Wat Kokmadanyai | 20. Wat Nok (2) |
| 21. Wat Phopuek | 22. Wat Chan (4) |
| 23. Wat Raeng | 24. Wat Tuknangram |
| 25. Wat Choh | 26. Wat Rang (1) |
| 27. Wat Rang(2) | 28. Wat Kokdamao |
| 29. Wat Pa | 30. Wat Kokmadanlek |
| 32. Wat Sansai | 32. Wat Khon |
| 33. Wat Khae | 34. Wat Paphai |

4.2 Personal Information

The personal information covered gender, age and marital status as in table 4.

Table 4. Number and Percentage of Samples Classified to Gender, Age and Marital Status

Personal Data	Number (person)	Percentage
Gender		
Female	214	56.50
Male	165	43.50
Age		
20-30 years	74	17.60
31 – 40 years	91	24.00
41 – 50 years	90	25.30
51 – 60 years	58	15.40
61 – 70 years	35	9.30
71 – 80 years	21	7.20
81 – 90 years	4	1.20
$\bar{X} = 44.65$ S.D. = 14.93 Range = 70		
Marital status		
Single	80	21.20
Married	259	68.30
Widowed	32	8.40
Divorced	8	2.10

As the research findings in table 4 were over a half of the informants being female (56.50%) and the rest being male (43.50%) with 44.65 years old in average. The oldest were 90 years old and the youngest were 20 years old. Moreover, the majority got married (68.30%), single (21.10%), widowed (8.40%) and divorced (2.20%) respectively.

4.3 Community –Cultures

4.3.1 Concept Culture

Thought

Thought is considered to be intellectual activities affecting behaviors or ways of life. The thought in this study was faced to behaviors indicating their relationship of man and environment as the research findings in table 5.

Table 5. Number and Percentage of Samples Classified to Thought

Thought	Number (person)	Percentage
Relationship of man and environment		
Man is a partial environment.	255	67.30
Man can produce some technologies to control nature.	56	14.80
All in the world are impermanent.	55	14.50
God is the world determiner.	13	3.40
Decision making		
Self –decision making.	193	50.90
Consulting some experts before making decision	153	40.40
Depending the majority	15	4.00
Following the community regulation	11	2.90
Let no care	7	1.80
Assistants for self-solution		
Oneself	198	52.20
Family members	170	44.90
Community leader	1	0.30
Local organization	4	1.10
Government	6	1.60

As the research findings in table 5 presented the most had agreed that man was a partial world environment (67.30%), self- decision making (50.90%), or consulting some experts before making decision (40.40%), together with self-solution (52.20%), or solution based family members (44.90%) respectively.

Values

Values is considered to be a major factor indicating trend of behaviors supporting art object environment conservation and development in a community as the research findings in table 6.

Table 6. Number and Percentage of Samples Classified to Values

Values	Number (person)	Percentage
Are the archeological sites significant to ways of life in the community?		
Yes	337	88.90
No	42	11.10
Which part do the archeological sites mostly effect to people in the community?		
Education	52	13.70
Occupation	40	10.50
Culture	167	44.10
Relaxation	120	31.70
Management for archeological sites		
No management	34	9.00
Taking part mostly beneficial for daily life	18	4.70
Planing now to conserve and develop them	293	77.30
Depending on the government policy	34	9.00
Person or organization responding art objects environment conservation and development		
Government Organization	209	55.10
Local Organization	30	8.00
Villager	136	35.90
Tourist	2	0.50
A parts related	2	0.50

As the research findings in table 6 presented the archeological sites effecting to ways of life in the community (88.90%); especially the representative for culture (44.10%) and relaxation (31.70%), so the conservation and development plans should be performed right now (77.30%), by the governmental organizations (55.10%), or people in the community (35.90) respectively.

Belief

Belief is considered to be a fundamental factor affecting ways of life. The belief may be persons, objects or somewhat believed and effected to oneself, family and community as the research findings in table 7.

Table 7. Number and Percentage of Samples Classified to Belief

Belief	Number (person)	Percentage
Do you believe in superstition?		
Yes	198	52.30
No	179	47.20
Not sure	2	0.50
Factors affecting people's success of failure		
God	17	4.50
Destiny	14	3.70
Previous world action	50	13.20
Human behavior	298	78.60
Factors affecting community progress		
Community geography	27	7.10
Government policy	53	14.00
Local government policy	75	19.80
Behavior of people in a community	224	59.10

As the research finding in table 7 presented that over a half believed in superstition (52.30%), self behaviors being a major factor affecting one success or failure (78.60%), and the community progress was also depended on the community member's behaviors (59.10%) as well.

Religion

Religion is considered to affect the behaviors, not only politics, economy and society but also holistic culture together with being the determiner of people production and consumption in a community as well. Thus, this study faced the religion as sorts, frequency of religious activity participation and ability to apply the religious teaching for their daily life as the research findings in table 8.

Table 8. Number and Percentage of Samples Classified to Religion

Religion	Number (person)	Percentage
Religion		
Buddhism	359	94.70
Islamic	14	3.70
Christian	6	1.60
Frequency per month for religious activity participation		
No participation	64	19.70
1 – 5	285	72.30
6 – 10	11	2.90

Table 8. Number and Percentage of Samples Classified to Religion (cont.)

Religion	Number (person)	Percentage
11 – 15	2	0.60
16 – 20	1	0.30
21 – 25	0	0.00
26 – 30	16	4.20
$\bar{X} = 3$ $S.D. = 2.67$ $Range = 29$		
Application of religious teaching for daily life		
Most	51	13.50
Majority	126	33.20
Medium	182	48.00
Minority	15	4.00
Least	5	1.30

As the research findings in table 8 presented indicated that almost of all informants were Buddhism (94.70%), with 3 times in average for religious activity participation (72.30%) together with moderate level for ability to religious application in daily life (48.00%).

4.3.2 Organization Culture

Family

Family is considered to be the smallest unit and having major roles for its member’s mind development together with driving positive awareness for their living in a society; especially, the young members. Thus, this study faced the family as sorts, number of its member and family member relationship as the research findings in table 9.

Table 9. Number and Percentage of Samples Classified to Family

Family	Number (person)	Percentage
Type of family		
Nuclear family	185	48.80
Extended family	194	51.20
Number of members living in a household		
1 – 5 persons	248	65.40
6 – 10 persons	114	29.90
11 –15 persons	13	3.60
16 – 20 persons	4	1.10
$\bar{X} = 5$ $S.D. = 2.83$ $Range = 19$		

Table 9. Number and Percentage of Samples Classified to Family (cont.)

Family	Number (person)	Percentage
Number of children for a nuclear Family		
No children	67	17.70
1 – 5 persons	295	77.80
6 – 10 persons	16	4.20
11 – 15 persons	1	0.30
X = 2 S.D. = 0.67 Range = 11		
Family member relationship		
Good relationship	234	61.70
Having some problems but being able to solve	128	33.80
Many problems	17	4.50
So many problems	0	0.00

As the research findings in table 9 presented that about a half of the informants were from extended families (51.20%) with 5 members (65.40%), while the rest was from a nuclear one (48.50%) with 2 children (77.80%).

Relatives

Relatives are considered to be fundamental factors affecting social groups in a community. Thus, this study faced the relatives as how to do the relatives' chain, settlement, frequency characteristics of their independence in daily life as the research findings in table 10.

Table 10. Number and Percentage of Samples Classified to Relatives

Relatives	Number (person)	Percentage
Relatives chain		
Patrilineal decent	23	6.10
Matrilineal decent	28	7.40
Bilateral decent	328	86.50
Relatives residence		
In the community	185	48.80
Out the community	194	51.20
Frequency per month for relatives independence		
No independence	40	10.50
1 - 5 times	291	76.80
6 – 10 times	26	6.40
11 – 15 times	1	0.30
16 – 20 times	5	1.30
21 – 25 times	0	0.00
26 – 30 times	18	4.70
X = 4 S.D. = 2.95 Range = 29		

Table 10. Number and Percentage of Samples Classified to Relatives (cont.)

Relatives	Number (person)	Percentage
Forms of relatives independence		
General consulting	294	77.60
Laboring	25	6.50
Financing	42	11.10
Occupying	15	4.00
Others	3	0.80

As the research findings in table 10 presented that the majority did the chain of their relatives with bilateral descent (86.50%), living out of the community (51.20%), with doing the independence for 4 times a month in average (76.80%), in general consulting (77.60%) as well.

Peer Group

Peer Group is considered to be mostly effecting to adolescent attitude. Thus, the study faced the peer group as sorts, number, settlement, frequency of their meeting and independence characteristics as the research findings in table 11.

Table 11. Number and Percentage of Samples Classified to Peer Group

Peer Group	Number (Person)	Percentage
First meet point of time to close friends		
Since being childhood	57	15.00
Classmates	114	30.10
Occupational friends	155	40.90
Public activity friends	14	3.70
Others	39	10.30
Number of close friends		
No close friends	28	7.30
1 - 5 persons	286	75.50
6 - 10 persons	57	15.00
11 - 15 persons	2	0.60
16 - 20 persons	6	1.60
$X = 4$ $S.D. = 2.01$ $Range = 19$		
Residence of close friends		
In the community	188	49.60
Out the community	176	46.40
Both in and out the community	15	4.00

Table 11. Number and Percentage of Samples Classified to Peer Group (cont.)

Peer Group	Number (Person)	Percentage
Frequency per month for close friends meeting		
No meeting	41	10.70
1 – 5 times	283	74.70
6 – 10 times	23	6.00
11 – 15 times	3	0.90
16 – 20 times	7	1.80
21 – 25 times	1	0.30
26 – 30 times	—	21
X = 5 S.D. = 3.69 Range = 29		
Forms of independence among close friends		
Enjoyable making	51	13.50
General consulting	255	67.30
Financing	22	5.80
Laboring	11	2.90
Others	40	10.50

As the research findings in table 11 presented that the most had occupational close friends (40.90%), classmates (30.10%), with 4 persons in average (75.50%), living in the community (49.60%) and out the community (46.40%), with 5 times a month in average for their meeting (74.70) in general consulting (67.30%) as well.

Activity Group

Activity Group is considered to be the major factor affecting social activity success or failure. Thus, this study faced the activity group as the volunteer group, objectives, number of its members and group forming as the research finding in table 12.

Table 12. Number and Percentage of Samples Classified to Activity Group

Activity Group	Number (person)	Percentage
Group objectives		
Saving	19	5.00
Environment	63	16.60
Politics	8	2.20
Public health	66	17.40
Don't know	223	58.80
Number of group members		
Don't know	95	25.10
1 - 5 persons	73	19.30

Table 12. Number and Percentage of Samples Classified to Activity Group (cont.)

Activity Group	Number (person)	Percentage
6 – 10 persons	156	41.10
11 –15 persons	30	7.90
16 –20 persons	19	5.00
Over 20 persons	6	1.60
X = 9 S.D. = 3.95 Range = 29		
Method of group forming		
Formed by government organizations	45	11.90
Formed by community leaders	38	10.00
Formed by community members	83	21.90
Don't know	213	56.20
Objective achievement		
Mostly achieving	19	5.00
Partial achieving	168	44.30
Not achieving	13	3.50
Don't know	179	47.20

As the research findings in table 12 presented most informants did not know the group objectives (58.80%), group forming (56.20%), how much the activity group getting success (47.20%), while some specified moderate level (44.30%) with 9 members in average for each group.

Community

A community is a group of people living in the same area, sharing the economic and political activities together with a social unit through their values and relationship each other. Thus, the study faced the community as their settlement duration and reasons, problems and community member relationship as the research findings in table 13.

Table 13. Number and Percentage of Samples Classified to Community

Community	Number (person)	Percentage
Original settlement		
In the community	221	58.30
Out the community	158	41.70
Settlement duration		
10 years and lower	79	19.90
11 – 20 years	66	17.40
21 – 30 years	62	16.40
31 – 40 years	62	16.60
41 – 50 years	50	12.70

Table 13. Number and Percentage of Samples Classified to Community (cont.)

Community	Number (person)	Percentage
51 – 60 years	19	5.50
61 – 70 years	15	4.00
71 – 80 years	10	2.70
81 – 90 years	3	0.80
90 – 100 years	13	3.40
Over 100 years	2	0.60
X = 33.46 S.D. = 23.62 Range = 104		
Reasons of the settlement		
Getting married	92	24.30
Finding a job	229	60.40
Following the relatives	58	15.30
Relationship among its members		
Very good	16	4.30
Good	92	24.30
Moderate	184	48.50
Not good	41	10.80
Not very good	46	12.10
Major problem		
Occupation	56	14.80
Robbery	37	9.74
Narcotics	156	41.16
Residence	130	34.30

As the research findings in table 13 presented that most informants has originally settled in this community (58.30%), 33.46 years in average for their settlement duration together with the longest living was 105 years while the shortest was 1 year only for finding a job (60.40%), with moderate level of the community member's relationship (48.50%) then, good level (24.30) among the narcotics problem (41.16%) in the community.

Community Network

A community network is considered to be communities connecting to exchange some information each other. So the community network considered may be the major instrument for community development. Thus, the study faced the community network as its frequency and area of the community connection related environmental conservation and development in the community.

Table 14. Number and Percentage of Samples Classified to Community Network

Community Network	Number (person)	Percentage
Connection to other communities on environmental conservation and development		
Connecting	166	43.80
No connecting	213	56.20
Location of community network		
Ayutthaya Province	141	37.20
Some provinces in Thailand	25	6.60
Some communities in abroad	0	0.00
No connecting to any communities	213	56.20
Frequency per of Communities connection		
Not connecting to any communities	213	56.20
1 -5 times	159	42.00
6 – 10 times	5	1.30
11 – 15 times	2	0.50
$\bar{X} = 3$	S.D. = 0.59	Range = 11

As the research findings in table 14 were their communities had no any network related environmental conservation and development (56.20%), while the rest confirming on the other hand (43.80%) with 3 times a year (41.90%) but most networks (37.20%) still being in Ayutthaya Province, and no informants specified that their community networks were from abroad respectively.

4.3.3 Usage Culture

Language

Language being what communicated in a society; thus, the same available language indicating the same united culture. However, this study faced the spoken language in the community as the research findings in table 15.

Table 15. Number and Percentage of Samples Classified to Language

Language	Number (person)	Percentage
Communicative language in daily life		
Central Thai Language	367	96.80
Local Thai Language	12	3.20
International communication as the second language		
English	21	5.54
Chinese	9	2.37
Japanese	1	0.26
French	3	0.82
No ability	345	91.01

As the research findings in table 15 presented that the language spoken in daily life was the Central Thai Language (96.80%) and the majority (91.01%) had no ability to international communication while some being able to speak English (5.54%), Chinese (2.37%), French (0.82%) and Japanese (0.26%) respectively.

Social Norm

Social Norm is considered to be social regulations expected for its member behaving in their daily life. This is the reason why social norm compared with the social compass of concepts and behaviors for the social members. Thus, this study faced the social norm as the principle for ways of life in the community as the research findings in table 16.

Table 16. Number and Percentage of Samples Classified to Social Norm

Social Norm	Number (person)	Percentage
Principle for ways of life		
Folk way	300	79.20
Normative way	49	12.90
Law	26	6.80
Integration	4	1.10
Methods for solving the conflict		
Folkway approach	304	80.20
Normative approach	46	12.10
Law approach	29	7.70

As the research findings in the table 16, the most specified that they spent their lives based on relatives affection or folk way style (79.20%) and doing the forgiving-based management for solving some conflicts in the community (80.20%) as well.

Education

Education is a process of creating and transmitting the community-cultures. So the objectives of community development may be easily achieved if its members are developed to be learning people. This is why the study faced the people's educational levels in the community as the research findings in table 17.

Table 17. Number and Percentage of Samples Classified to Education

Education	Number (person)	Percentage
Fundamental and higher education		
Fundamental education	282	74.40
Higher education	97	25.60

**Table 17.** Number and Percentage of Samples Classified to Education (cont.)

Education	Number (person)	Percentage
Primary , secondary and higher education		
Primary level	129	34.10
Secondary level	153	40.30
Higher level	97	25.60
Education classified to classes		
Lower pratom 4	25	6.70
Pratom 7	88	23.20
Pratom 6 or 7	16	4.20
Junior secondary	49	12.90
Senior secondary	38	10.00
Diploma	66	17.40
Bachelor degree	96	25.30
Master degree	1	0.30

As the research findings in table 17 presented that when the education was classified to fundamental and higher education; the majority finished fundamental education (74.40%). If the classification based primary, secondary and higher education; its findings were secondary level (40.30%) and the most getting bachelor degree (25.30%), if its classifying to classes as well.

Occupation

Occupation is the activities affecting people income, economic structure and participation to community development. Thus, this study faced the occupation as its types and characteristics as the research findings in table 18.

Table 18. Number and Percentage of Samples Classified to Occupation

Occupation	Number (person)	Percentage
Employment condition		
Employed	343	91.50
Unemployed	36	9.50
Occupation classified to entrepreneur and employee		
Employer	123	32.00
Employee	220	58.50
Unemployed	36	9.50
Occupation classified to government and private organization		
Government organization	96	25.33
State enterprise	16	4.22
Private organization	231	60.95
Unemployed	36	9.50

Table 18. Number and Percentage of Samples Classified to Occupation (cont.)

Occupation	Number (person)	Percentage
Types of occupation		
Employee	108	27.50
Merchant	106	27.00
Government officer	96	24.30
State enterprise officer	16	4.20
Personal business	17	4.50
Unemployed	36	9.50
Do you have any minor occupations?		
Yes	59	15.60
No	320	84.40
Is your occupation related to any ways of tourism?		
Yes	60	15.80
No	319	84.20

As the research findings in table 18 presented that almost of all informants were employed (91.50) as employee (58.30%), in private organizations (60.95%), with no minor occupations (84.40%), together with both minor and major occupation being not related to any ways of tourism (84.20%) as well.

Income

In come is indicated to people's ability for biological need responses. This study faced the total amount per year from both major and minor occupations as the research findings in table 19.

Table 19. Number and Percentage of Samples Classified to Income

Income	Number (person)	Percentage
Income per year from major occupation		
No income	16	4.20
1 – 60,000 baht	114	30.50
60,001 – 120,000 baht	138	36.50
120,001 – 180,000 baht	50	12.70
80,001 – 240,000 baht	34	8.50
240,001 – 300,000 baht	10	2.90
300,001 – 360,000 baht	4	1.10
Over 360,000 baht	13	3.60
$\bar{X} = 115,082.88$ S.D. = 56,133.84 Range = 954,000		
Income per year from minor occupation		
No income	320	84.40
1 – 30,000 baht	15	4.10
30,001 – 60,000 baht	29	7.40

Table 19. Number and Percentage of Samples Classified to Income (cont.)

Income	Number (person)	Percentage
60,001 – 90,000 baht	2	0.60
90,001 – 120,000 baht	6	1.60
Over 120,000 baht	7	1.90
$\bar{X} = 43,387.20$ $S.D. = 21,652.20$ Range = 348,000		

As the research findings in table 19 presented that the income from major occupation was 115,082.88 baht a year in average. Thus, the highest income was 960,000 baht while the lowest was 60,000 baht a year. Furthermore, some informants (4.20%) had no income from major occupation together with some getting 43,387.50 baht a year from their minor occupations.

Consumption

Consumption is an element of economic behaviors consisted of production, product distribution and consumption. Thus, this study faced the total amount per year of their expenses as the research findings in table 20.

Table 20. Number and Percentage of Samples Classified to Consumption

Consumption	Number (person)	Percentage
Total amount expense per year		
No expense	3	0.80
1 – 30,000 baht	34	8.00
30,001 – 60,000 baht	55	14.60
60,001 – 90,000 baht	149	39.30
90,001 – 120,000 baht	88	23.30
120,001 – 150,000 baht	10	2.60
150,001 – 180,000 baht	9	2.40
180,001 – 210,000 baht	2	0.50
201,001 – 240,000 baht	25	6.60
Over 240,000 baht	7	1.90
$\bar{X} = 80,327.76$ $S.D. = 38,867.28$ Range = 474,000		

As the research findings in table 20 presented that the expense of most informants was 80,327.76 baht a year in average. The highest expense was 480,000 baht while the lowest was 6,000 baht a year.

Saving

Saving is the storage a part of present income for future expense, so this behavior may be considered to be supporting art object environment conservation and development in a community as the research findings in table 21.

Table 21. Number and Percentage of Samples Classified to Saving

Saving	Number (person)	Percentage
Do you do any saving behaviors in your life?		
Yes	190	50.13
No	189	49.87
Total amount of saving per year		
No saving	189	49.87
1 – 30,000 baht	141	37.13
30,000 – 60,000 baht	38	10.00
60,001 – 90,000 baht	2	0.50
90,001 – 120,000 baht	7	1.90
Over 120,000 baht	2	0.60
$\bar{X} = 20,580.50$	$S.D. = 14,246.40$	$Range = 214,800$

As the research findings in table 21 presented that about a half of the informants did their saving (50.13%) while the rest (49.87%) having no these behaviors. Thus, the most being able to save 20,580.50 baht a year in average and the highest was 216,000 baht while the lowest was 12,000 baht a year.

Herbal Medicine

Herbal Medicine is considered to be what saving and making low price for health treatment together with being able to distribute these economic plants among domestic, national and international markets. Therefore, these behaviors may indicate to valuable and beneficial application for natural resources in a community. This study faced the methods and sources of herbal medicine application as the research findings in table 22.

Table 22. Number and Percentage of Samples Classified to Herbal Medicine

Herbal Medicine	Number (person)	Percentage
Medicine used in daily life		
Modern medicine	291	76.80
Herbal medicine	13	3.40
Integration	75	19.80

Table 22. Number and Percentage of Samples Classified to Herbal Medicine (cont.)

Herbal Medicine	Number (person)	Percentage
Source of medicine		
Producing in a family	10	2.70
Buying somewhere in the community	284	74.90
Buying somewhere out the community	79	20.80
Others	6	1.60

As the research findings in table 22 presented that the majority was available to modern medicine for their life (76.80%) and being able to buy it from a drugstore or somewhere in the community (74.90%) as well.

Traditional Activity

Traditional Activity is a pattern of way of life, which it always presents as the community activities. Thus, this study faced the traditional activity as its type and frequency of people's participation in annually religious and environmental activities in the community as the research findings in table 23.

Table 23. Number and Percentage of Samples Classified to Traditional Activity

Traditional Activity	Number (person)	Percentage
Traditional activity annually provided in the community		
Makabucha Day		
Yes	296	78.10
No	5	1.32
Not sure	78	20.58
Visakabucha Day		
Yes	298	78.63
No	14	3.69
Not sure	67	17.68
Beginning of the Buddhist Lent Day		
Yes	288	75.99
No	17	4.49
Not sure	74	19.52
Ending of the Buddhist Lent Day		
Yes	68	17.95
No	144	37.99
Not sure	167	44.06

Table 23. Number and Percentage of Samples Classified to Traditional Activity (cont.)

Traditional Activity	Number (person)	Percentage
Environmental activity annually provided in the community		
Thai Heritage Conservation Day		
Yes	17	4.48
No	236	62.27
Not sure	126	33.25
World Heritage Day		
Yes	324	85.49
No	15	3.96
Not sure	40	10.55
World Environment Day		
Yes	16	4.23
No	279	73.61
Not sure	84	22.16
Narcotics Resistance Day		
Yes	25	6.60
No	124	63.85
Not sure	112	29.55
Frequency of traditional activity participation		
Often	12	3.16
Always	20	5.28
Sometimes	230	60.69
Rarely	83	21.90
Never	34	8.97
Traditional activities recommended to be annually provided in the community		
Religious activities	221	58.31
Personal activities	11	2.91
Festival activities	97	25.59
Environmental activities	50	13.19

As the research findings in table 23, most informants specified that the community provided the activities on Makabucha Day (78.10%), Visakabucha Day (78.63%) Beginning of the Buddhist Lent Day (75.95%) and the World Heritage Day (85.49%) with sometimes participating (60.69%) together with the religious activities recommended to be annually performed in the community (58.31%) as well.

Ritual

Ritual is people's behaviors presenting their beliefs. This is the reason why the researcher faced the ritual in this study, as their fundamental beliefs affecting individual, family and community rituals as the research findings in table 24.

Table 24. Number and Percentage of Samples Classified to Ritual

Ritual	Number (person)	Percentage
Belief- based ritual		
Religion	360	95.00
Superstition	8	2.10
Nature	11	2.90

As the research findings in table 24 presented that the activity performance was based on their religious believes (95.00%) while some based in nature (2.60%) and superstition (2.10%) respectively.

Folklore

Folklore is an educational process of life through both verbal and non-verbal transmission for being guideline of ritual and social belief performance. Thus, this study faced the verbal folklore as folk games, tales, folk songs, proverbs and legends as the research findings in table 25.

Table 25. Number and Percentage of Samples Classified to Folklore

Folklore	Number (person)	Percentage
Types of folklore in the community		
Folk games	288	75.99
Tales	186	49.08
Folk songs	136	35.88
Proverbs	42	11.08
Legends	27	7.12
Folk games		
No idea	91	24.01
Lamtad	88	23.22
Mon Son Pha	66	17.42
Li-ka	50	13.19
Boat racing	27	7.12
Others as Khemakankluay, Jam-Jee, Dernkala Ngoo Kin Hang, Khon, Klongyao, Ramwong,Ti-chab, Krapi Krabong, Sornha and Mark Keb etc.	57	15.04
Tales		
No idea	193	50.92
Khun Chang Khun Phan	73	19.26
Plabuthong	38	10.03
Thaosaenphom	23	6.07
Sangthong	14	3.69

Table 25. Number and Percentage of Samples Classified to Folklore

Folklore	Number (person)	Percentage
Others as Phra Apaimanee, Dekliangkae, Ramayana, Chaona Kab Ngoohao, Kob Luek Nai and Kaew Na Ma etc.	38	10.03
Folk Songs		
No idea	243	64.12
Plang Hae Rue	70	18.47
Plang Klom Dek	143	11.34
Plang Kiaw Khao	13	3.43
Others as Plang Yao and Plang Choice etc.	10	2.64
Proverbs		
No idea	337	88.92
Rakwuahipook Raklookhitee	17	4.48
Namkhunhiribtak	13	3.43
Yakchonhitanghuay Yakruayhitangluaey	7	1.85
Others	5	1.32
Legends		
No idea	352	92.88
Phan Tai Norasing	14	3.69
Si Suriyothai	7	1.85
Others	6	1.58
Folklore application for art object environment conservation and development in the community		
May be successful	314	82.80
May be not successful	65	17.20

As the research findings in table 25 presented that folk games as a partial folklore were the most preference (75.99%), tales (49.08%) folk songs (35.88%) proverbs (11.08%) and legends (7.12%) respectively. When the sorts of folk games were studied, the most replied no idea (24.01%), then, Lamtad (23.22%), Mon Son Pha (17.42%), Lika (13.19%) and boat racing (7.12%) respectively. While the study on sorts of tale, about a half replied no idea (50.92%) then, Khun Chang Khun Phan (19.26%), Plabuthong (10.03%), Thaosaenphom (6.07%), and Sangthong (3.69%) respectively. When questioned them about sorts of folk song, the most replied no idea (64.12%); then, Plang He Rue (18.47%), Plang Klom Dek (11.34%), Plang Kiaw Khao (3.45%), and others (2.64%) respectively. While the sorts of proverb were replied no idea (88.92%) together with the local legend which was replied no idea (92.88%). However, the question related the achievement for adapting folklore to be tools for art object environment conservation and development in the community, the majority replied that it was possible (82.80%) and the rest (17.20%) saying that might be impossible respectively.

4.3.4 Object Culture

Costume

Costume is a part of biological needs. It presents to people's cultures and social change. However, this study faced the forms, methods and sources of costume provided by people in the community as the research findings in table 26.

Table 26. Number and Percentage of Samples Classified to Costume

Costume	Number (person)	Percentage
Forms of costume		
General form	370	97.60
Local form	9	2.40
Methods of costume providence		
Self production	5	1.32
Buying from neighbor in the community	17	4.49
Buying from stores in the community	68	17.94
Buying from stores out the community	289	76.25

As the research findings in table 26 presented that almost of all informants had general costumes (97.60%) and buying them from stores out the community (76.25%) as well.

Residence

Residence is a part of human biological needs. It presents the raw materials, weather and stability in a community. Thus, this study faced the residence right and benefit in the community as the research findings in table 27.

Table 27. Number and Percentage of Samples Classified to Residence

Residence	Number (person)	Percentage
Resident zone		
Nucleus zone (archeological site)	185	48.80
Buffer zone	44	11.60
Not sure	150	39.60
Resident right		
Owned house	281	74.14
Relatives house	23	6.04
Rented house	75	19.82

Table 27. Number and Percentage of Samples Classified to Residence (cont.)

Residence	Number (person)	Percentage
Payment for house renting per month		
No rental	304	80.21
1 - 1,000 baht	12	3.16
1,001 – 2,000 baht	28	7.39
2,001 – 3,000 baht	13	3.43
3,001 - 4,000 baht	10	2.64
4,001 – 5,000 baht	4	1.06
5,001 – 6,000 baht	3	0.79
Over 6,000 baht	5	1.32
X = 2,285.71 S.D. = 1,097.96 Range = 11,900		
House Application		
Living only	316	83.40
Trading only	24	6.30
Both living and trading in the same building	39	10.30

As the research findings in table 27 presented their residences were located in the archeological area (48.50%), while some being not sure (39.60%) and the rest (11.60%) locating in the buffer zone respectively. Thus, the most having their owned houses (74.14%), some getting rental (19.86%) with 2,285.71 baht a month for the rent in average. Moreover, the highest paying for monthly rental was 20,000 baht and the lowest was 100 baht. Furthermore, the majority applying a house only for living (83.40%), some applying for both living and trading (10.30%) and the rest applying only for trading (6.30%) respectively.

Instrument

Instrument is a tool used for adapting natural environment to be benefit people ways of life. Thus, this study faced the sorts of instrument facilitating for their present life in the community as the research findings in table 28.

Table 28. Number and Percentage of Samples Classified to Instrument

Instrument	Number (person)	Percentage
Source of energy		
Firewood and / or charcoal	15	4.00
Liquid gas only	41	10.80
Electricity only	16	4.20
Liquid gas and electricity	307	81.00
Does your family have any electric pots?		
Yes	374	98.70
No	5	1.30

Table 28. Number and Percentage of Samples Classified to Instrument (cont.)

Instrument	Number (person)	Percentage
Does your family have any electric fans?		
Yes	376	99.20
No	3	0.80
Does your family have any televisions?		
Yes	354	93.40
No	25	6.60
Does your family have any washing machines?		
Yes	233	61.50
No	146	38.50
Does your family have any personal computers?		
Yes	70	18.50
No	309	81.50
Does your family have any air – conditioners?		
Yes	289	76.30
No	90	23.70
Does your family have any bicycles?		
Yes	192	50.70
No	187	49.30
Does your family have any motorcycles?		
Yes	275	72.60
No	104	27.40
Does your family have any motorcars?		
Yes	197	52.00
No	182	48.00
Does your family have any boats?		
Yes	52	13.70
No	327	86.30

As the research findings in table 28 presented that the majority had some facilities as using liquid gas and electricity for their major sources of energy in families (81.00%), together with several modern technology supplies as electric fans (99.20%), electric pot (98.70%), televisions (93.40%), air-conditioners (76.30%), motorcycles (72.60%), washing machines (61.50%), motor cars (52.00%), bicycles (50.70%) and having now no boat available (86.30%) and no personal computer (81.50%) as well.

Handicraft

Handicraft is considered as the villager's products with high valuable art presenting their creative skills transmitted to generations. Thus, this study faced ability levels, sorts, and sources of raw material and objectives for handicraft production in the community as the research findings in table 29.

Table 29. Number and Percentage of Samples Classified to Handicraft

Handicraft	Number (person)	Percentage
Handicraft produced in a family		
Carb fish weaving	292	77.04
Pottery	18	4.75
Stone carving	14	3.69
Traditional Thai mask	4	1.06
Thai boat model	2	0.53
No production	49	12.93
The most famous handicraft in the community		
Carb fish weaving	311	82.06
Pottery	10	2.64
Stone carving	34	8.97
Traditional Thai mask	16	4.22
Thai boat model	8	2.11
Sources for raw material		
In the community	37	9.76
Out the community	342	90.24
Objectives of handicraft production		
Being available in a family	207	54.62
Selling to neighbor in the community	4	1.05
Selling to any customers out the community	21	5.54
Selling as souvenirs to the tourists	147	38.79

As the research findings in table 29 presented that the handicraft produced in their families was Pla Ta Pian Jak San or weaving-carb fish (77.04%), which was the most famous handicraft in the community (82.06%) with its raw material from somewhere out the community (90.24%) for house utilizes (54.62%) and selling for tourist souvenirs (38.79%) as well.

Infrastructure

Infrastructure is considered to be the community fundamental needs. It is generally believed that the more complete infrastructure makes the more successful achievement of social, economic and political activities in the community. However, this study faced the villagers getting various services of road, electricity, tapped water and telephone from the government organizations as the research findings in table 30.

Table 30. Number and Percentage of Samples Classified to Infrastructure

Infrastructure	Number (person)	Percentage
Types of road in the community		
Compressed soil road	53	14.00
Asphalt road	281	74.10
Cemented road	45	11.90
Sources of water resource being available in families		
Rained water	5	1.30
Grounded water	3	0.80
Canal or river water	7	1.90
Tapped water	364	96.00
Is electricity available in your family?		
Yes	375	98.90
No	4	1.10
Is a telephone available in your family?		
Yes	230	60.70
No	149	39.30
When did you start to have your house telephone?		
Before the year 1983 A.D.	20	5.40
1983 – 1987 A.D.	28	6.60
1988 – 1992 A.D.	50	13.20
1993 – 1997 A.D.	90	23.70
1998 A.D.- present	42	11.00
Are you comfortable to public telephone in the community?		
Yes	244	64.40
No	135	35.60

As the research findings in table 30 presented that the community infrastructure was asphalt road (72.80%), tapped water (96.00%), and house telephone (60.70%) together with being comfortable public telephone (64.40%) as well.

Painting

Painting is an art object presenting the people’s minds. This study faced their abilities, objectives and types of painting produced in the community as the research findings in table 31.

Table 31. Number and Percentage of Samples Classified to Painting

Painting	Number (person)	Percentage
Are you able to painting?		
Yes	152	40.10
No	227	59.90

Table 31. Number and Percentage of Samples Classified to Painting (cont.)

Painting	Number (person)	Percentage
Objectives of the painting		
No ability	227	59.90
Hobby	141	37.20
Selling	10	2.60
Ordering from customers	1	0.30
Types of skilled painting		
No ability	227	59.90
Portrait	21	5.60
Nature	125	33.00
Religious activity	1	0.30
Literary animals	1	0.30

As the research findings in table 31 presented no painting ability (59.90%), but some being able to do painting (40.10%), for hobby (37.20%) and doing popularly to nature design (33.00%) as well.

Folk Dance

Folk Dance is an activity presenting entertainment through various contexts of dancing, singing and music performance. Thus, this study faced the ability, type and occasion of folk dance performing in the community as the research finding in table 32.

Table 32. Number and Percentage of Samples Classified to Folk Dance

Folk Dance	Number (person)	Percentage
Are you able to any kinds of folk dance?		
Yes	183	48.28
No	196	51.72
Types of folk dance		
No ability	196	51.72
Ramwong	142	37.50
Traditional Thai dance	29	7.68
Thai musical folk drama	8	2.00
Mask dance drama	4	1.10
Occasions for folk dance performance		
Personal activity	32	8.40
Family activity	12	3.20
Community activity	39	10.30
Religious activity	296	78.10

As the research findings in table 32 presented no ability on folk dance (51.72%), but some being skilled (48.28%), on Ramwong (37.50%) and performing the folk dance in the occasion of religious activity (78.10%) as well.

Folk Music

Folk Music is an indigenous (local wisdom) for local entertainment. This study faced the relationship of villager and folk music in the community as the research findings in table 33.

Table 33. Number and Percentage of Samples Classified to Folk Music

Folk Music	Number (person)	Percentage
Ability to folk music		
Ja-ke	4	1.10
Fiddle	9	2.40
Xylophone	21	5.40
Flute	52	13.80
No activity	293	77.30
Ways of life related folk music		
Producing folk music instrument	7	1.80
Performing folk music	3	0.80
Having owned band of folk music	4	1.10
Managing a folk music band to perform some places	28	5.30
Not related to any ways	345	91.00
Numbers of folk music band		
Don't know	304	80.21
1 - 2 bands	53	13.89
3 - 4 bands	17	4.50
5 - 6 bands	2	0.50
Over 6 bands	3	0.90
X = 2 S.D. = 1 Range = 19		
Occasions to perform folk music		
Personal activity	42	11.10
Family activity	7	1.80
Religious activity	296	78.10
Community activity	34	9.00

As the research findings in table 33 presented no ability to folk music (77.30%), no any relationships between their lives and folk music (91.00%), no idea about the numbers of folk music band in the community (80.21%). However, the major occasion for folk music performance was the religious activities (78.10%) as well.

Sculpture

Sculpture is an object art presenting the villager's mind and prosperous fulfillment of the community. Thus, this study faced to abilities, forms, concepts and objectives of sculpture production in the community as the research findings in table 34.

Table 34. Number and Percentage of Samples Classified to Sculpture

Sculpture	Number (person)	Percentage
Ability to sculpture production		
Carving	38	10.10
Pottering	49	12.90
Pushing	2	0.50
No ability	290	76.50
Types of sculpture		
Carving	117	30.90
Pottering	52	13.70
Pushing	1	0.30
No idea	209	55.10
Forms of sculpture		
Imitating an ancient object	142	37.50
Making a new design	7	1.80
Depending on a customer design	38	10.00
No idea	192	50.70
Belief – based sculpture production		
Religion	151	39.80
Generation decoration	27	7.10
Natural style	15	4.00
Imagined style	21	5.50
No idea	165	43.50
Objectives of sculpture production		
Decorating an owned house	24	6.30
Decorating an religious building	24	6.30
Selling	158	41.80
No idea	173	45.60
Customers of sculpture product		
People in the community	15	4.00
Thai tourists	37	9.70
International tourists	87	23.00
Selling in some provinces	16	4.20
No idea	224	59.10

As the research finding in table 34 presented no ability on sculpture (76.50%), no idea about its type (55.10%), form (50.70%), concept (43.50%), objective (45.60%), and customer (59.10%). However, there was a small number

doing self-pottery (12.90%), carving is the most popular sculpture in the community (30.90%), imitating an ancient object (37.50%), belief-based-religion (39.80%), for selling (41.70%) to the international tourists (23.00%) as well.

Archeological Site

Archeological Site is a sort of architectures presenting the community and national civilization. Thus, this study faced to type and frequency of people's visiting per month to the archeological site in the community as the research findings in table 35.

Table 35. Number and Percentage of Samples Classified to Archeological Site

Archeological Site	Number (person)	Percentage
Types of archeological site		
Archeological site related the religion	302	79.70
Archeological site related the monarch	63	16.60
Archeological site related the city	14	3.70
Frequency		
No visiting	79	19.30
1 - 5 times	250	67.40
6 – 10 times	19	5.00
11 – 15 times	5	1.30
16 – 20 times	9	2.40
21 – 25 times	1	0.26
26 – 30 times	16	5.23
$\bar{X} = 5$ $S.D. = 4.59$ $Range = 29$		

As the research findings in table 35 presented that most archeological sites were related to the religion (79.70%), related to the monarchies (16.60%) and related to the city (3.70%), with 5 times a month in average for visiting the archeological sites in the community.

4.4 People's Knowledge, Attitude, Skill and Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Knowledge

Knowledge is a partial objective for human development. The more knowledge they have, the more success achievement they get. However, this study faced the knowledge related the community and art object environment conservation and development as the research findings in table 36.

Table 36. Number and Percentage of Samples Classified to Knowledge

Knowledge	Right		Wrong		Average	Standard Deviation
	Number	Percentage	Number	Percentage		
1. United Nations of Educational Scientific and Cultural Organization (UNESCO) has certified the World Culture Heritage to Ayutthaya Art Object Source as a Historic City of Ayutthaya.	140	36.90	239	63.10	0.37	0.48
2. Ayutthaya Historic City has been certified to be the World Cultural Heritage in 1991 A.D.	54	14.20	325	85.80	0.14	0.35
3. The World Cultural Heritage of Ayutthaya Historic City covers only 1,810 rai in a partial island of Ayutthaya.	83	21.90	296	78.10	0.22	0.41
4. Ayutthaya Historic City is consisted of nucleus (archeological area) and buffer zone.	68	17.90	311	82.10	0.18	0.38
5. People are not permitted to have any residences in the nucleus zone of Ayutthaya Historic City.	251	66.20	128	33.80	0.66	0.47

Table 36. Number and Percentage of Samples Classified to Knowledge (cont.)

Knowledge	Right		Wrong		Average	Standard Deviation
	Number	Percentage	Number	Percentage		
6. There are 9 governmental organizations responding to art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. Fine Art Department , Ayutthaya Municipality, Ayutthaya Province, Tourism Authority of Thailand, office of the Royal Treasures, Bureau of City Plan, Ministry of Science, Technology and Environment, Department of Industry Promotion and Department of Finance.	118	31.10	261	68.90	0.31	0.46
7. Environment covers both natural and man-made resources.	110	29.00	269	71.00	0.29	0.45
8. People should pay participation on art object environment in	206	54.40	173	45.60	0.54	0.50

Table 36. Number and Percentage of Samples Classified to Knowledge (cont.)

Knowledge	Right		Wrong		Average	Standard Deviation
	Number	Percentage	Number	Percentage		
the World Cultural Heritage of Ayutthaya Historic City covering input, process and output						
9. The advantage of art object environment conservation and development gives the people 3 items firstly to conserve and develop community cultural resources , secondly to conserve and develop natural environment and finally to be learning or researching sources in the community.	256	67.50	12	32.50	0.68	0.47
10. “ <i>Living Historic City</i> ” meaning that people can live in the historic area specified by the responsible organizations.	116	30.60	263	69.40	0.31	0.46

Table 36. Number and Percentage of Samples Classified to Knowledge (cont.)

Knowledge	Right		Wrong		Average	Standard Deviation
	Number	Percentage	Number	Percentage		
11. The principle of art object environment conservation and development is consisted of 3 concepts as sustainability, restoration and preservation.	226	59.60	153	40.40	0.60	0.49
12. The community residence form according to art object style is an alternative for art object environment conservation and development in the community.	151	39.80	228	60.20	0.40	0.49
13. Ability to specify an archeological area in the community	108	28.50	271	71.50	0.29	0.45
14. The factors indicating that people participation is necessary for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City; firstly art object being	181	47.80	198	52.20	0.48	0.50

Table 36. Number and Percentage of Samples Classified to Knowledge (cont.)

Knowledge	Right		Wrong		Average	Standard Deviation
	Number	Percentage	Number	Percentage		
a representative of community civilization in the past , secondly art object environment specifying the people ways of life in a community, thirdly art object environment being cultural resources for people getting more income and finally people in a community getting directly both negative and positive impacts.						
15. The factors affecting an achievement of art object environment conservation and development are consisted of man , management , material and money (4Ms).	296	77.30	86	22.70	0.77	0.42
Total Average	158	41.69	240	58.31	6.23	2.40

As the research findings in table 36 presented that most informants had the lowest knowledge related the community and art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. There were 15 questions asking for their knowledge but there were only 5 questions correctly

answered by most informants. Those questions were; (1) The factors affecting an achievement of art object environment conservation and development are consisted of man, management, material and money (77.30%). (2) The advantage of art object environment conservation and development gives the people 3 items; firstly, to conserve and develop community cultural resources; Secondly to conserve and develop natural environment and finally to be learning-sources in the community (67.50%). (3) People are not permitted to have any residences in the nucleus zone of Ayutthaya Historic City (66.20%). (4) The Principle of art object environment conservation and development is consisted of 3 concepts as sustainability, restoration and preservation (59.60%). and (5) People should pay participation on art object environment in the World Cultural Heritage of Ayutthaya Historic City covering input, process and output (54.40%).

The questions incorrectly answered were; (1) Ayutthaya Historic City has been certified to be the World Cultural Heritage in 1991A.D. (85.80%).(2) Ayutthaya Historic City is consisted of nucleus (archeological site) and buffer zone (82.10%). (3) The World Cultural Heritage of Ayutthaya Historic City covers only 1,810 rai in the City Island of Ayutthaya (78.10%). (4) Ability to specify an archeological site area (71.50%). (5) Environment covers both natural and man-made resources (71.00%). (6) "*Living Historic City*" meaning that people can live in the historic area specified by the responsible organization (69.40%). (7) There are 9 governmental organizations responding to conservation and development of art object environment in the World Cultural Heritage of Ayutthaya Historic City including Fine Art Department, Ayutthaya Municipality, Ayutthaya Province, Tourism Authority of Thailand, Office of the Royal Treasures, Bureau of City Plan, Ministry of Science, Technology and Environment, Department of Industry Promotion and Finance Department (68.90%). (8) United Nations of Educational Scientific and Cultural Organization (UNESCO) has registered the certification of the World Culture Heritage to Ayutthaya Art object Source as a Historic City of Ayutthaya (63.10%). (9) The community residence form according to art object style is an alternative for art object environment conservation and development in the community (60.20%). And (10) Factors indicating that people participation is necessary for conservation and development of art object environment in the World Cultural Heritage of Ayutthaya Historic City; firstly art object being a representative of community civilization in the past, secondly art object environment being part to specify the people ways of life in community, thirdly art object environment being cultural resources for people getting more income, and finally people in a community getting directly both negative and positive impact (52.20%) respectively.

Criteria for Knowledge levels

Average Interval	Knowledge Levels
15.00 -12.00	Very high
11.99 -10.50	High
10.49 -9.00	Moderate
8.99 -7.50	Low
7.49 -0.00	Very low

Attitude

Attitude is considered to be mental drive affecting knowledge and various behaviors. This study faced the attitude as people's opinions covering knowledge, feeling and behavior on art object environment conservation and development in the community as the research findings in table 37.

Table 37. Number and Percentage of Samples Classified to Attitude

Attitude	Attitude Levels			Average Score
	High	Moderate	Low	
1. Art object environment in the World Cultural Heritage of Ayutthaya Historic City effects to people ways of life among community, national and international levels.	63.60	32.50	4.00	2.60
2. Affection to art object in the community	76.00	20.30	3.70	2.72
3. Intention to art object sustainable existing for new generation	85.20	12.90	1.90	2.83
4. The art object in Ayutthaya Historic City should be conserved and developed by all parts related.	79.90	17.20	2.90	2.77
5. The art object in Ayutthaya Historic City is belonging to all , not the government organizations only.	76.00	20.00	4.00	2.72
6. People in the community should be continuously participating on art object environment conservation and development.	75.20	19.80	5.00	2.70
7. Ayutthaya Historic City should be managed to be a cultural tourism attraction.	81.80	16.60	1.60	2.80
8. Tourists should also do the participation on art object environment conservation and development in Ayutthaya Historic City.	76.50	20.30	3.20	2.73
9. The art object environment conservation and development in the community should be performed accordance with occupation and living quality promotion.	62.80	28.50	8.70	2.54

Table 37. Number and Percentage of Samples Classified to Attitude (cont.)

Attitude	Attitude Levels			Average Score
	High	Moderate	Low	
10. People and art object environment can stand supportably each other in the community.	55.40	38.50	6.10	2.49
11. The conservation and development for art object environment in Ayutthaya Historic City should be started firstly at the government policy.	60.90	29.30	9.80	2.51
12. The local organizations should be the leader motivating the villager coming to participate on art object environment conservation and development.	72.30	21.90	5.80	2.66
13. The community leaders should pay more significance for conservation and development on art object in Ayutthaya Historic City.	72.00	22.40	5.60	2.66
14. The educational organizations should produce a local curriculum based on the information related art object environment conservation and development in the community.	74.40	21.10	5.50	2.69
15. The organizations related art object environment conservation and development in Ayutthaya Historic City should provide the training to fulfil people on knowledge, attitude, skill and participation.	68.10	22.70	9.20	2.59
Total	72.01	22.87	5.12	2.67

As the research findings in table 37 presented that most informants (72.01%) had high average score level of attitude. There were 15 questions to measure the people's attitude on art object environment conservation and development in the World Culture Heritage of Ayutthaya and all questions were specified to be high levels. They were; (1) Intention to be objecting sustainable existing for new generation (85.20%). (2) Ayutthaya Historic City should be managed to be a cultural tourism attraction (81.80%). (3) The art object in Ayutthaya Historic City should be conserved and developed by all parts related (79.90%). (4) Tourists should also

participate the conversation and development of the art object environment in Ayutthaya Historic City (76.50%). (5) Affection to art object in the community (76.00%). (6) The art object in Ayutthaya Historic City is occupied by all , not the governmental organizations only (76.00%). (7) People in the community should be continuously participating on art object environment conservation and development (75.20%). (8) The educational organizations should take the information related art object environment conservation and development to make a local curriculum for the youth in the community (74.40%). (9) The local organizations should be the leader motivating the villagers participating on art object environment conservation and development (72.30%). (10) The community leaders should give more significance for conservation and development on art object in Ayutthaya Historic City (72.00%). (11) The organizations related art object environment conservation and development in Ayutthaya Historic City should provide the training to fulfil people;s knowledge , attitude, skill and participation (68.10%). (12) The art object environment in the World Cultural Heritage of Ayutthaya Historic City effects to people ways of life among community, national and international levels (63.30%). (13) The conservation and development of art object environment in the community should be performed accordance with occupation and quality of life promotion (62.80%). (14) The conservation and development of art object environment in Ayutthaya Historic City should be started firstly at the government policy (60.90%). and (15) People and art object environment can stand supportably each other (55.40%) respectively.

Criteria for Attitude Levels

Average Interval	Attitude Levels
2.35 – 3.00	High
1.68 – 2.34	Moderate
1.00 – 1.67	Low

Skill

Skill is a personal ability to any works with high quality during its process. This study faced the skill as the people's ability related art object environment conservation and development in the community as the research findings in table 38.

Table 38. Number and Percentage of Samples Classified to Skill

Skill	Skill Levels			Average Score
	High	Moderate	Low	
1. You can restore an art object environment recovering to be the original form.	6.60	21.40	72.00	1.35
2. You can give tourists some recommendations related how to perform while visiting the art object source in the community.	18.50	56.70	24.80	1.94

Table 38. Number and Percentage of Samples Classified to Skill (cont.)

Skill	Skill Levels			Average Score
	High	Moderate	Low	
3. You can explain someone the significance and history of archeological sites in the community.	12.10	48.30	39.60	1.73
4. You can give tourists the direction to visit some archeological sites in the community.	49.60	34.80	15.60	2.34
5. You can speak English to some foreign tourists.	7.70	31.10	61.20	1.46
6. You can prevent the community art object environment from natural disaster.	7.10	29.00	63.90	1.43
7. You can manage the condition surrounding an art object environment to be clean and beautiful.	8.00	27.40	64.60	1.43
8. You can be economically living in the community.	40.40	50.10	9.50	2.31
9. You can be a leader for conserving and developing an art object environment in the community.	11.60	43.50	44.90	1.67
10. You can make your resident style located in accordance with the community art object environment style.	13.50	34.80	51.70	1.62
11. You can make plan for art object environment conservation and development in the community.	8.40	38.80	52.80	1.56
12. You can manage the project for art object environment conservation and development in the community.	8.50	31.10	60.40	1.48
13. You can evaluate the project for art object environment conservation and development in the community.	10.30	35.60	54.10	1.56

Table 38. Number and Percentage of Samples Classified to Skill (cont.)

Skill	Skill Levels			Average Score
	High	Moderate	Low	
14. You can establish a group people for art object environment conservation and development in the community.	8.70	28.50	62.80	1.46
15. You can make network for art object environment conservation and development in the community.	10.60	31.90	57.50	1.53
Total	14.77	36.20	49.03	1.53

As the research findings in table 38 presented that most skills were considered to be low level (49.03%). However, there were 15 questions measuring the skills; only 1 question being high, 3 questions being moderate and 11 questions being low level. Thus, the high score question was; you can give tourists the direction to archeological sites in the community (49.60%). The moderate score questions were; (1) You can give tourists some recommendations related how to perform while visiting the art object source (56.70%). (2) You can be economically living in the community (50.10%). And (3) you can explain someone the significance and history of archeological sites located in the community (48.30%) respectively.

Furthermore, the low scores questions were; (1) you can restore some art objects to be the original form (72.00%). (2) You can manage the condition surrounding art object environment to be clean and beautiful (64.60%). (3) You can prevent art object environment from natural disaster (63.90%). (4) You can establish a group of people for art object environment conservation and development in the community (62.80%). (5) You can speak English to the foreign tourists (61.20%). (6) You can manage the project for art object environment conservation and development in the community (60.40%). (7) You can make network for art object environment conservation and development (57.50%). (8) You can evaluate the project for art object environment conservation and development in the community (54.10%). (9) You can make a plan for art object environment conservation and development in the community (52.80%). (10) You can make your resident style in accordance with the community art object environment style (51.70%). And (11) you can be a leader for conserving and developing the art object environment in the community (44.90%) respectively.

Criteria for Skill Levels

Average Interval	Skill Level
2.35 – 3.00	High
1.68 – 2.34	Moderate
1.00 – 1.67	Low

Participation

Participation to all related parts for any activities is considered to be the first step of sustainability process. This study faced the people's participation on art object environment conservation and development in the community as the research findings in table 39.

Table 39. Number and Percentage of Samples Classified to Participation

Participation	Participation Levels			Average Score
	High	Moderate	Low	
1. You have donated some money or thing to a group working for art object environment conservation and development in the community.	7.40	52.50	40.10	1.68
2. You have been a consultant for the group mentioned.	9.00	36.60	54.40	1.55
3. You have made participation on the conference related art object environment conservation and development in the community.	12.40	32.70	54.90	1.58
4. You have performed some activities related art object environment conservation and development in the community.	11.90	34.00	54.10	1.58
5. You have made some distributions, public relations, campaigns or persuasions to other one joining the activity for art object environment conservation and Development in the community.	13.20	34.60	52.20	1.56
6. You have restored some art objects in the community.	5.80	15.60	78.60	1.27
7. You have prevented the destruction of art object environment in the community.	17.20	39.00	43.80	1.31
8. You have prevented and improved art object environment from natural disaster.	5.80	31.40	62.80	1.43
9. You have got more income from doing occupation in the community.	7.90	18.70	73.40	1.35

Table 39. Number and Percentage of Samples Classified to Participation (cont.)

Participation	Participation Levels			Average Score
	High	Moderate	Low	
10. You have got pleasure to the ancient cultural heritage in the community.	80.70	12.10	7.20	2.42
11. You have supported to be good condition in the community.	31.10	44.10	24.80	2.06
12. You have spent your time for relaxation in the area of art object environment.	45.60	37.20	17.20	2.28
13. You have used the art object environment being as the learning-resource in the community	31.10	35.10	33.80	1.97
14. You have got more convenience from the infrastructure due to the project of art object environment conservation and development in the community.	16.10	37.70	46.20	1.39
15. You have evaluated some projects related art object environment conservation and development in the community.	11.00	25.90	63.10	1.48
Total	20.42	32.65	46.93	1.66

As the research findings in table 39 presented that most informants participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City were considered to be in low level (46.93%). However, there were 15 questions measuring the participation; only 2 questions being high, 3 questions being moderate and the rest being low score level. Thus, the high score level questions were; (1) you have been pleasure to the ancient cultural heritage in the community (80.70%). And (2) you have spent your time for relaxation in the area of art object environment (45.60%). While the moderate score level questions were; (1) you have donated some money or things to a group working for art object environment and development in the community (52.50%). (2) You have supported to be good condition in the community (44.12%). And (3) you have used the art object environment being as the learning-resource in the community (35.10%) respectively.

However, the low score level questions were; (1) you have restored some art objects in the community (78.60%). (2) You have got more income from doing occupation in the source of art object environment (73.40%). (3) You have



evaluated some projects related art object environment conservation and development in the community (63.10%). (4) You have prevented and improved art object environment from natural disaster (62.80%). (5) You have made participation on the conference related art object environment conservation and development (54.90%). (6) You have been a consultant for the group mentioned (54.40%). (7) You have performed activity related art object environment conservation and development (54.10%). (8) You have made some distributions , public relations , campaigns or persuasions to other one joining the activity for art object environment conservation and development in the community (52.20%). (9) You have got more convenience from the infrastructure due to the project of art object environment conservation and development in the community (46.20%). and (10) You have been prevented the destruction of art object environment in the community (43.80%) respectively.

Criteria for Participation Levels

Average Intervals	Participation Levels
2.35 – 3.00	High
1.68 – 2.34	Moderate
1.00 – 1.67	Low

Furthermore, the problems related ways of life in the World Cultural Heritage of Ayutthaya Historic City in table 40 presented that the major problems were coordination between government officers and people in the community (29.55), housing (27.97%), and robbery (24.24%) respectively.

Table 40. Number and Percentage of Samples Classified to Problem

Problem	Number (person)	Percentage
Coordinating between government officers and people in the community	112	29.55
Residence	106	27.97
Robbery	93	24.54
Solid waste	19	5.02
People’s participation on art object environment conservation and development in the community	18	4.75
Destruction of archeological sites	7	1.85
Narcotics	7	1.85
Infrastructure	6	1.58
Tourist’s behaviors	5	1.32
Flooding in the art object area	4	1.06
Others as traffic jam and animal raising in the archeological area etc.	2	0.53
Total	379	100.00

However, the solution for the first 3 major problems was including the coordination between government officers and people in the community, residence, and robbery. The research findings in table 41 presented that the coordination between government officers and increasing the officer's efficiency (12.93%) should solve people in the community. Allocating an adequate new area (16.62%) should solve the residence. While the robbery should be solved by increasing some officers (10.30%) as well.

Table 41. Number and Percentage of Sample Classified to Solution

Solution	Number (person)	Percentage
The solutions for coordination between government officers and people in the community		
Increasing officer's efficiency	49	12.93
Increasing public relation	21	5.54
Specifying the empirical plan or project	15	3.96
Increasing budget	14	3.69
Increasing a number of officer	6	1.58
Increasing people's participation	2	0.53
The solutions for residence		
Allocating appropriately a new area	63	16.62
Not surrendering the former settlement back	23	6.07
Making the new rent cheaper		
Reducing the rent for new residence	1	0.26
The solutions for robbery		
Increasing officers	39	10.30
Providing night safety guards	30	7.92
Punishing absolutely one being illegal	14	3.69
Increasing people servility	3	0.79
Other solutions	68	17.94
No recommendations	31	8.18
Total	379	100.00

In addition, the first three recommendations which people required the government organizations assisting them in table 42 presented that (1) The government officers should increase their working-efficiencies on caring and coordinating to people in the community (24.27%). (2) The government organizations should do more infrastructure improvement and development in the community (11.08%). And (3) the government organizations should provide the villagers a training-course for art object environment conservation and development in the community (9.76%) respectively.

Table 42. Number and Percentage of Samples Classified to Recommendation

Recommendation	Number (person)	Percentage
The government officers should increase their working-efficiencies on caring and coordinating to people in the community.	92	24.27
The government organizations should do more infrastructure improvement and developing in the community.	42	11.08
The government organizations should provide the villagers a training course for art object environment conservation and development in the community.	37	9.76
Fine Art Department should restore the archeological sites according to originality.	25	6.60
The government officers should efficiently spend the budget.	19	5.01
The people should pay more participation on art object environment conservation and development in the community.	17	4.49
The government organizations should also solve a problem of unemployment in the community.	14	3.69
Solid Waste Containers should be increased in the community.	10	2.64
The government should allocate appropriately new residences.	8	2.11
A narcotics problem should be urgently corrected.	5	1.32
A traffic problem should be monitored for some areas in the community.	5	1.32
The community leaders should be more active for all activities.	4	1.06
Other recommendations as law absolutely applying, giving good services to the tourists, providing some major traditional activities and paying no charge for Thai tourist visiting an archeological sites etc.	11	2.90
No recommendations	90	23.75
Total	379	100.00

4.5 Community - Cultures Based Environmental Education Model

The model construction of community-cultures based environmental education had been made after the community and its community-cultures analysis through SWOT Technique Analysis (Strength-Weakness-Opportunity-Threat: SWOT) to know the community present positioning as the details below;

Table 43. The Internal Factors of Community Analysis in the World Cultural Heritage of Ayutthaya Historic City

Internal Factors	
Strength	Weakness
1. The community was previously located to the royal grand palaces and major archeological sites during Ayutthaya Civilization Period.	1. Most residence located in the archeological zone has been major obstacle for city plan management.
2. The community is presently located in Ayutthaya Island surrounded with some rivers as the River-Based-Settlement.	2. The community area is only 3 metres above sea level and this always makes flooding problem.
3. The community location is in Ayutthaya Municipality being as the city heart of trading and transportation.	3. There are no any other natural resources except rivers and rural atmosphere; due to the water-based-community location.
4. The community has been certified to be the World Cultural Heritage of Ayutthaya Historic City since 1991 A.D. and being now only as the Living Historic City in Thailand and Southeast Asia.	4. Widowed and divorced status of the heads of households (10.50%) may effect to the families' weakness.
5. Most heads of households were more female than male with 44.65 years old in average. This is considered to be the working-age with high responsibility. Especially, their marriage status affecting the family stability as well.	5. Narcotic problems may reduce the people's potential and drive to the community development.

Table 44. The External Factors of Community Analysis in the World Cultural Heritage of Ayutthaya Historic City

External Factors	
Opportunity	Threat
<ol style="list-style-type: none"> 1. Decentralization may make efficiently self-management of communities. 2. There have been some developed countries and international organizations as Japan and Asia Development World Bank (ADB)etc. supporting some subsidy and loan for art object environment conservation and development in the community. 3. Feminism which has been world widely promoted, may make clarified and out standing roles of women in a community. 4. Living Historic City is the government policy for art object environment conservation and development in Ayutthaya Province. 5. Eco-tourism is supported to the community by Tourism Authority of Thailand. 	<ol style="list-style-type: none"> 1. The community is one of the most famous attractions being not so far from Bangkok. This makes most tourists taking no overnight in Ayutthaya Province, but Bangkok. 2. The effective coordination among the organizations being responsible the World Cultural Heritage of Ayutthaya Historic City is still low level. 3. The Information Management System (IMS) of the community is still improved to support tourism, education and research.

Table 45. The Internal Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City

Internal Factors	
Strength	Weakness
<p style="text-align: center;">Concept Culture</p> <ol style="list-style-type: none"> 1. The most agreed that man is a partial environment being accordance with a principle of environmental education. 	<p style="text-align: center;">Concept Culture</p> <ol style="list-style-type: none"> 1. Due to their innovative personalities facing self-decision making, sometimes make the great obstacle for public activity participation in the community.

Table 45. The Internal Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Internal Factors	
Strength	Weakness
<p>2. The most had high level of attitude related art object environment conservation and development in the community.</p> <p>3. The most were considered to be innovators being able to do self-decision making.</p> <p>4. Almost of all was Buddhism facing moderate ways of life. This may be leading to the natural balance as well.</p> <p>5. Most activities in the community were considered to be based on Buddha Teaching Concept, not only ritual, folk dance but also folk music etc.</p> <p>6. The most presented their values related art object environment in the community should be conserved and developed right now.</p> <p>Organization Culture</p> <p>1. The most lived in extended families indicating closed relation among their relatives as the rural Thai society.</p> <p>2. Good relationship among their family members</p> <p>3. The settlement was 33.46 years in average while some specified that their families have lived over 105 years in this community.</p>	<p>2. The most had low level of knowledge related art object environment conservation and development in the community.</p> <p>3. The most agreed that the governmental organizations should be responsible to conserve and develop art object environment in the community.</p> <p>4. Over a half believed in superstition.</p> <p>5. Low participation related religious activities.</p> <p>Organization Culture</p> <p>1. Lack of public activity interest made people getting low participation and also low achievement of goal.</p> <p>2. There were no any community network related environment conservation and development.</p> <p>3. The community had no any activity groups related art object environment conservation and development in the community.</p>

Table 45. The Internal Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Internal Factors	
Strength	Weakness
<p>4. There are now 29 communities united as the community network in the area of Ayutthaya Municipality.</p> <p style="text-align: center;">Usage Culture</p> <p>1. The central Thai language have been communicated in daily life, this makes the community members feeling like the united group.</p> <p>2. Their living principles were folkway affecting the generous community.</p> <p>3. About a quarter had higher education. This indicates their attitude for future education in the community.</p> <p>4. The most had more income than expense per year. This makes them getting enough biological needs and the higher needs as public participation, may be possible as well.</p> <p>5. The most presented their saving-behaviors. This indicates their values related the future stability in life.</p> <p>6. There have been the religious activities as Makhabucha Day, Visakhabucha Day and The Beginning of Buddhist Lent Day, annually taking place in the community.</p>	<p style="text-align: center;">Usage Culture</p> <p>1. The most had no ability to international communication. This may be some obstacle for tourism promotion and international community network in the community.</p> <p>2. Their fundamental education (74.40%) may effect to their learning.</p> <p>3. Their occupations as an employee may be not easy to allocate their time and resources for the public participation.</p> <p>4. Their major and minor occupations have not been related any ways to tourism. This seems to stand opposite the tourism promotion policy in the community.</p> <p>5. Herbal medicine was not available in the community.</p> <p>6. There was low participation for public activities in the community.</p>

Table 45. The Internal Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Internal Factors	
Strength	Weakness
<p>7. The World Heritage Day has been held annually in the community. This indicates that the community has transformed the cultural resources to be the tourism resources. Thus, it may affect the people's awareness to art object environment conservation and development in the community.</p> <p>8. The most recommended that folklore might be adapted to art object environment conservation and development in the community.</p> <p style="text-align: center;">Object Culture</p> <p>1. Their rights of owned housed makes strong intention for community development.</p> <p>2. Most facilitators in their lives were modern technologies as motorcars, motorcycles, air-conditioners and some electric household utilizes.</p> <p>3. There were rather complete infrastructures in the community. Thus, the more complete infrastructure makes the more successful achievement of community development.</p>	<p>7. There were low skill related art object environment conservation and development in the community.</p> <p>8. The most had low interest related folklore. This makes low relationship among community member as well.</p> <p style="text-align: center;">Object Culture</p> <p>1. Most houses located in the archeological area may make not only the visual pollution but also the art object deconstruction as well.</p> <p>2. The most had low skills on handicraft and its product not responding to economic value; especially, tourism supporting.</p> <p>3. Low interest in painting, folk dance, folk music and sculpture may lead to negative behaviors supporting art object environment conservation and development in the community.</p>

Table 46. The External Factors of Community –Cultures Analysis in the World Cultural Heritage of Ayutthaya Historic City

External Factors	
Opportunity	Threat
<p style="text-align: center;">Concept Culture</p> <ol style="list-style-type: none"> 1. The world has been getting environmental awareness; thus, environmental problems also being as their quality of life as well. 2. Community-Cultures is considered to be the World history at all. 3. All religion’s teaching treat us to avoid doing self and other suffer. 4. The natural world is only not for man but for all. <p style="text-align: center;">Organization Culture</p> <ol style="list-style-type: none"> 1. A family is the smallest and the most effective unit to community development. 2. A family is the major strategy for both individual and community development. 3. An effective group is able to produce group power, which is the most potential for community development. <p style="text-align: center;">Usage Culture</p> <ol style="list-style-type: none"> 1. Self-sufficient living may affect people getting appropriated happiness in life. 	<p style="text-align: center;">Concept Culture</p> <ol style="list-style-type: none"> 1. The concept of Consumption-Based Cultures has covered the world. his may make people caring more individual than public benefit. 2. The concept of money being as the ultimate goal of life may be the great obstacle for their donation to public. 3. The competition system facing win and lose, both individual and organization levels. 4. The concept of industrial production may decrease rapidly natural resources and also increase widely pollution as well. <p style="text-align: center;">Organization Culture</p> <ol style="list-style-type: none"> 1. Presently, the urban community development tends to directly effect to primary group’s weakness; especially a family. 2. This community located in Ayutthaya Municipality where is considered to be urban area, its development may increase more disorganization on the other hand. 3. The interest group without logical concepts may also lead to group or community selfishness. <p style="text-align: center;">Usage Culture</p> <ol style="list-style-type: none"> 1. The evaluation of physical or external values; richness and authority etc. may increase the people’s suffer in long-term and also may decrease the sustainable environment as well.

Table 46. The External Factors of Community Analysis in the World Cultural Heritage of Ayutthaya Historic City (cont.)

External Factors	
Opportunity	Threat
Object Culture	Object Culture
<ol style="list-style-type: none"> 1. The community-souvenirs can be more distributed through cultural tourism promotion. 2. The concept of man being to share living with art object may make them supporting each other. 3. The indigenous promotion is considered to be the first step for innovative production in the community. 4. The people's interest in community-history may affect them getting more caring their communities. 	<ol style="list-style-type: none"> 1. The globalization facing technology and information may look down folk arts and crafts in the community. 2. Forming the industry zone in Ayutthaya Province may produce more pollution in the future.

The analyzed results through SWOT Technique Analysis based on information of community and community –cultures in the World Cultural Heritage of Ayutthaya Historic City made the researcher designing a model of community–cultures based environmental education. The model was consisted of goal, method, input and time frame. Seeing that the integration of individual and community activities through formal, non-formal and informal education system was major factor making the goal achievement for object environment for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. However an individual activity should be sequentially made for 4 steps; group forming, environmental educating, leader electing and activity participating. However, the group forming was performed for collecting the people who were interested in art object environment conservation and development then, giving them the environmental education; and then, they all elected one who was able to be the group leader and the last step, the group power from their activity participation was paid for conserving and developing the art object environment in the World Cultural Heritage of Ayutthaya Historic City. While the community activity also consisted of 4 parts as traditional activity, handicraft production, cultural tourism together with local organization and community network. Seeing that the development of individual activity accordance with community activity may lead to sustainability of valuable art object environment supporting quality of life with all participation through the community-cultures based environmental education as the figure 12.

4.5.1 Goal

The goal of a community – cultures based environmental education model was to make people participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. Thus, there were 3 specific objectives; firstly to make the trainees getting knowledge related environment, community, community–cultures, and art object environment conservation and development in the community, secondly to study the people's functions and roles to art object environment conservation and development in the community and finally to improve the people's skill on art object environment conservation and development in the community as well.

4.5.2 Method

The process for community–cultures based environmental education model was consisted of both individual and community activities. Thus, the individual activity can be classified to 4 steps; group forming, environmental educating, leader electing and activity participating. While the community activity was also classified to 4 parts; traditional activity, handicraft promotion, cultural tourism together with local organization and community network. Especially, the individual activity which was a stage of human resources development should be performed through a participatory training, which faces to learners oriented management with operational action both in and out classes. Seeing that the individuals finishing the community–cultures based environmental education may be fulfilled with awareness, knowledge, attitude, skill and ability to evaluation the social activities and being able to live in the community supporting the participatory process among traditional activity, handicraft promotion, cultural tourism together with local organization and community network. This may effectively get goal achievement for art object environment conservation and development in the community at all.

4.5.3 Input

The input as the resources for community–cultures based environmental education model was consisted of man, management, material and money. Thus, man was defined as trainers and trainees. However, the trainers should be the experts on community–cultures and trainees may be people or student in the community. Then management was defined as the contexts related environment, community, community – cultures together with people's function, role, skill, and participation. However, the management should be based systematic approach. And then, the materials consisted of a model of community–cultures based environment education, places, and instrument for training and art object source in the community. Furthermore the budget or money should be provided through the government budget or any donations from the private sectors.

4.5.4 Time Frame

Due to the model construction process of community–cultures based environmental education was sequentially performed as studying the community–cultures, creating a model of community–culture based environmental education, evaluating the model efficiency and implementing the model. Especially the final step should be implemented for 2 days on the weekend from 09.00 a.m. – 05.00 p.m. and

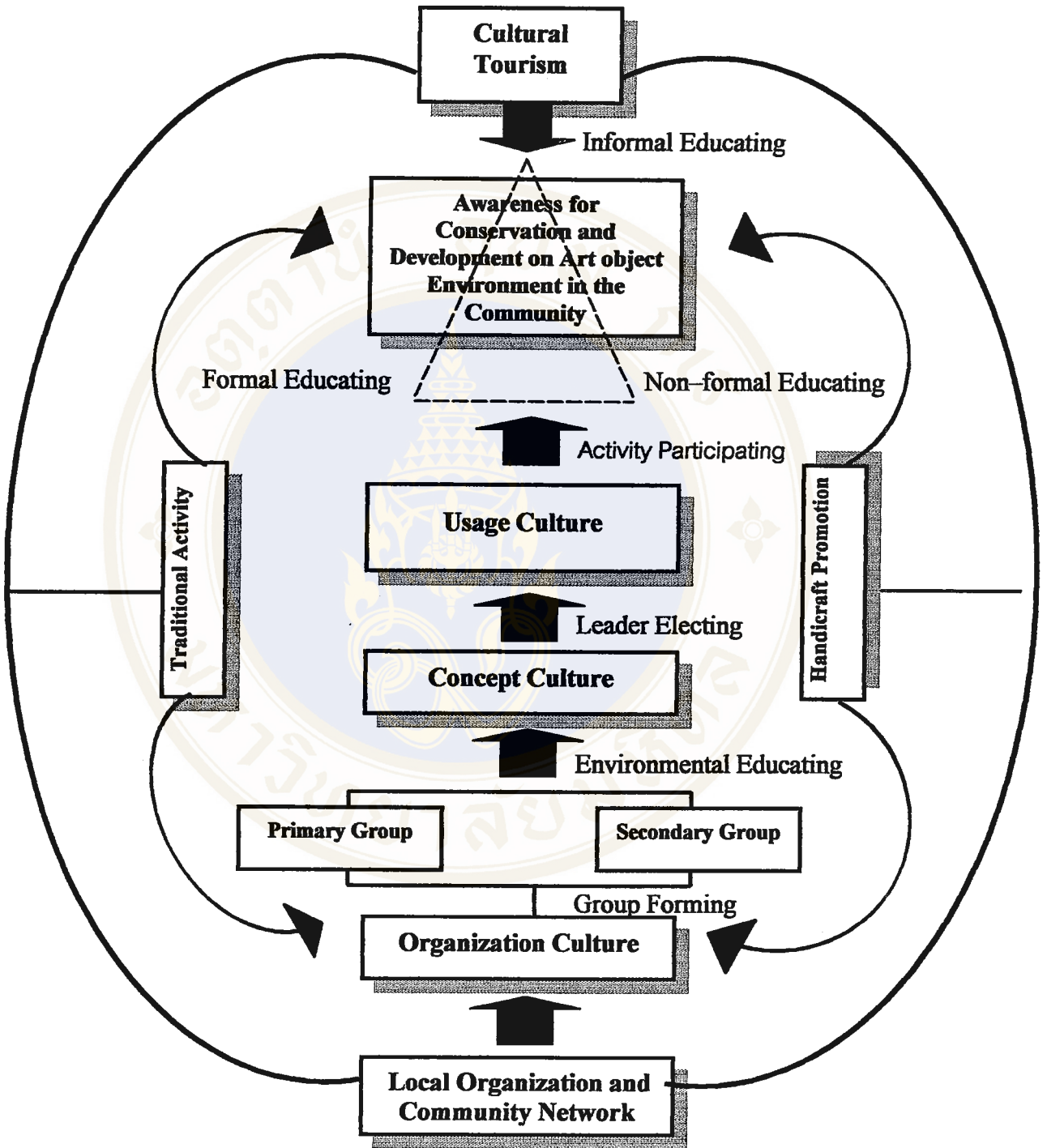


Figure 12. A Model of Community – Cultures Based Environmental Education for Art object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Source : The Research Findings

doing the evaluation a week later for 1 day. This may be able to do the environmental education every 4 months or 3 times a year.

Therefore, the mentioned elements have been performed to confirm the model efficiency of community-cultures based environmental education as the procedure in table 47.

Table 47. The Procedure for Model Efficiency Evaluation of Community-Cultures Based Environmental Education

Day	Time	Activity	Respondent
1	Morning		
	08.00 – 08.15	Registering	
	08.15 – 08.45	Pre-Evaluation	
	08.45 – 09.30	The Chairman makes the grand open for the model of Community-Cultures Based Environmental Education and do the presentation on <i>“Needs of People’s Participation for Art Object Environment Conservation and Development in the Community”</i>	Assoc. Prof. Manee Chaiteranuwatsiri, Ph.D. Mahidol University
	09.30 – 10.45	Presenting <i>“Research Findings”</i> and <i>“Environment”</i>	Mr.Weera Rawang, Researcher
	10.45 – 11.00	Snack Time	
	11.00 – 11.45	<i>“Group, Community and Community Network”</i>	Asst. Prof. Sutham Chataasing, Vice Director on Art and Craft, Ayutthaya Ratchabhat Institute
	11.45 – 12.00	General Discussion	
	12.00 – 13.00	Lunch Time	
	Afternoon		
13.00 – 13.15	Classifying the trainees to be 6 groups, each group containing 6 persons and electing the group leader		
13.15 – 14.00	<i>“Monarchies in Ayutthaya Civilization Period; 417 years, 1350-1767 A.D.”</i>	Capt.Boonyarit Chaisuwan, Ayutthaya Historic City Office	
14.00 – 17.00	Taking field study on <i>“Archeological Sites in the World Cultural Heritage of Ayutthaya Historic City”</i>	Mr.Metha Wichakkhana, Ayutthaya Historic City Office	

Table 47. The Procedure for Model Efficiency Evaluation of Community-Cultures Based Environmental Education (cont.)

Day	Time	Activity	Respondent
2	Morning		
	08.00 – 08.15	Concluding the first day training	Mr. Weera Rawang, Researcher
	08.15 – 09.30	<i>“The Approaches for Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City”</i> Doing the panel discussion for the community policy section through the representatives of Fine Art Department, Ayutthaya Municipality, Tourism Authority of Thailand, Ayutthaya Culture Center and Monkhonbophit Foundation.	Mr.Phairat Thitpat, Director of Bureaucracy System Reformation Office, Education Ministry
	09.30 – 10.00	General Discussing	
	10.00 – 10.15	Snack Time	
	10.15 – 11.30	<i>“Handicraft in the World Cultural Heritage of Ayutthaya Historic City”</i> Doing the panel discussion for the community performance section through the local experts on handicrafts in the World Cultural Heritage of Ayutthaya Historic City	Dr.Pathompong Suphalert, Vice Director of Jirasartwittaya School
	11.30 – 12.00	General Discussion	
	12.00 – 13.00	Lunch Time	
	Afternoon		
	13.00 – 13.45	<i>“People’s Participation for Art Object Environment Conservation and Development in the Community”</i>	Mr.Weera Rawang, Researcher
	13.45 – 14.00	General Discussion	
	14.00 – 15.00	<i>“Role of People’s participation for Art Object Environment Conservation and Development in the Community”</i>	Mr. Soonthon Potchong, Ayutthaya Ratchabhat Institute
	15.00 – 15.15	Snack Time	
	15.15 – 16.00	Each group doing the presentation of the discussed results	Trainees
16.00 – 16.30	Integrating the discussed results of all groups	Mr. Soonthon Potchong, Ayutthaya Ratchabhat Institute	
16.30 – 17.00	Concluding the second day training	Mr.Weera Rawang, Researcher	

Table 47. The Procedure for Model Efficiency Evaluation of Community-Cultures Based Environmental Education (cont.)

Day	Time	Activity	Respondent
3	Morning		
	08.00 – 08.15	Concluding all 2 days training	Mr.Weera Rawang, Researcher
	08.15 – 09.45	Doing the assignment presentation of group 1,2 and 3 Group 1. The World Cultural Heritage of Ayutthaya Historic City (Past/Present/Future) Group 2. The Archeological Sites No. 1-15 Group 3. The Archeological Sites No.16 – 30	Trainees
	09.45 – 10.00	General Discussion	
	10.00 – 10.15	Snack Time	
	10.15 – 11.45	Doing the assignment presentation of group 4,5 and 6 Group 4. The Archeological Sites No.31 – 45 Group 5. The Archeological Sites No.46 – 61 Group 6. The people's Participation on Art Object Environment Conservation and Development in the Community	Trainees
	11.45 – 12.00	General Discussion	
	12.00 – 13.00	Lunch Time	
	Afternoon		
	13.00 – 14.30	"Boating Around Ayutthaya Island"	Mr.Weera Rawang, Researcher
	14.30 – 15.00	Electing a Group Directing Board	
	15.00 – 15.30	Post-Evaluation	
	15.30 – 15.45	Snack Time	
	15.45 – 16.15	"Conclusion of Environmental Education"	Mr.Weera Rawang, Researcher
	16.15 – 17.00	Doing the speech to finish the community-cultures based environmental education and making the Certification Ceremony	Assoc. Prof. Manee Chaiteeranuwatsiri, Ph.D. Mahidol University

However, the model efficiency evaluation of community-cultures based environmental education through 40 villagers related their knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City was presented in the table 48.

Table 48. The Model Efficiency Evaluation of Community-Cultures Based Environmental Education

Variables	Mean (\bar{X})		S.D.		t-test	Sig.
	Pre-Evaluation of Environmental Education	Post-Evaluation of Environmental Education	Pre-Evaluation of Environmental Education	Post-Evaluation of Environmental Education		
Knowledge	6.98	10.98	1.98	1.48	-10.328	0.000
Attitude	42.10	43.10	3.38	2.47	-1.83	0.075
Skill	30.68	33.20	5.31	4.29	-2.735	0.009
Participation	30.18	36.00	6.26	4.53	-5.352	0.000

$P > 0.01$

The research findings in table 48 indicated that the model of community-cultures based environmental education was highly effective. Thus, it was able to improve the people's knowledge, skill and participation with highly statistically significant different at 0.01. While the attitude was no statistical difference when compared with pre and post evaluation of environmental education process.

Furthermore, the researcher has made the satisfaction evaluation for community-cultures based environmental education model with 21 questions of 4 parts as the questions related environmental education management (8 questions), the questions related instructors (3 questions), the questions related trainees (5 questions), and the questions related places, food, drinks and transportation (5 questions) as in table 49.

Table 49. The Satisfaction with Model of Community-Cultures Based Environmental Education

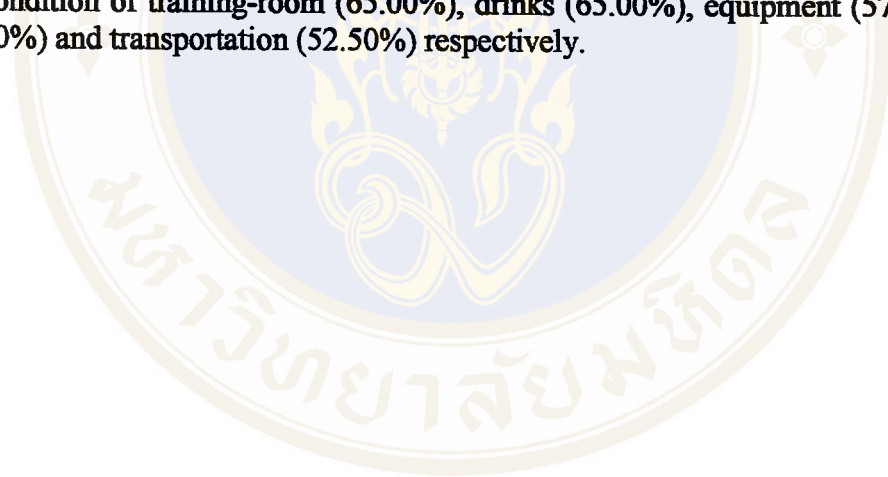
Activity	Satisfaction Levels				
	Very High	High	Moderate	Low	Very Low
1. Process Management					
1.1 A participatory environment education process which was consisted of in and out class training, single and group discussion, self-learning and instructed learning, pre and post- evaluation together with participatory observation. etc.	77.50	17.50	5.00	0.00	0.00
1.2 3 - day-training	55.00	30.00	15.00	0.00	0.00

Table 49. The Satisfaction with Model of Community-Cultures Based Environmental Education (cont.)

Activity	Satisfaction Levels				
	Very High	High	Moderate	Low	Very Low
1.3 Sequence of activities	67.50	20.00	10.00	2.50	0.00
1.4 Contexts consisted of 4 aspects including environment, the World Cultural Heritage of Ayutthaya Historic City, Art object environment conservation and development together with people's participation on art object environment conservation and development in the community.	55.00	32.50	10.00	2.50	0.00
1.5 Number of officers	55.00	25.00	17.50	2.50	0.00
1.6 Taking care for trainees	75.00	22.50	2.50	0.00	0.00
1.7 Document supplied for training	80.00	20.00	0.00	0.00	0.00
2. Instructor					
2.1 Knowledge	85.00	12.50	2.50	0.00	0.00
2.2 Ability to training	75.00	20.00	2.50	2.50	0.00
2.3 Intention to training	77.50	17.50	5.00	0.00	0.00
3. Trainee					
3.1 Participation	57.50	40.00	2.50	0.00	0.00
3.2 Benefit from the training	70.00	30.00	0.00	0.00	0.00
3.3 The course can be available for art object environment conservation and development in the community.	62.50	32.50	5.00	0.00	0.00
3.4 Application in daily life after finishing the course.	60.00	30.00	7.50	2.50	0.00
3.5 Possibility to provide the course like this to other target group in the future	47.50	40.00	10.00	2.50	0.00
4. Places, Food, Drinks and Transportation					
4.1 Training-room condition	65.00	32.50	2.50	0.00	0.00
4.2 Training - equipment	57.50	32.50	10.00	0.00	0.00
4.3 Food	55.50	45.00	0.00	0.00	0.00
4.4 Drinks	65.00	35.00	0.00	0.00	0.00
4.5 Transportation Service	52.50	42.50	5.00	0.00	0.00
Total Average Score	65.38	28.57	5.36	0.71	0.00

The research findings in table 49 presented that all questions for environmental education management were considered to be very high satisfaction as document supplied for training (80.00%), a participatory environmental education process which consisted in and out class training, single and group discussion, self-learning and instructed learning, pre and post evaluation together with participatory observation etc. (77.50%), its knowledge consisted of 4 aspects as environment, the World Cultural Heritage of Ayutthaya Historic City, Art object environment conservation and development in the community (77.50%), taking care for the trainee (75.00%) weekend training (67.50%), 3-day-training (55.00%) and number of officers (55.00%) respectively. While all questions for the instructor section were also evaluated to be very high satisfaction as the instructor's knowledge (85.00%), intention to training (77.50%) and training-skill (75.00%) respectively.

In addition, all questions for trainee being also evaluated to be very high satisfaction as benefit from the environmental education process (70.00%), the course can be available for art object environment conservation and development in the community (62.50%), application in daily life after finishing the course (60.00%) and participation (57.50%) respectively. Furthermore, the questions related training-room, food, drinks and transportation which were all evaluated to be very high satisfaction as the condition of training-room (65.00%), drinks (65.00%), equipment (57.50%), food (55.50%) and transportation (52.50%) respectively.



CHAPTER V DISCUSSION

The general objective of this study was to present a model of community-cultures based environmental education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. There were 3 special objectives; firstly studying the community-cultures, secondly evaluating people's knowledge, attitude, skill and participation on art object environment conservation and development in the community and finally constructing a model of community-cultures based environmental education. Thus, the informants were 379 heads of households and 15 local experts on community-cultures by using questionnaire, structured interview and observation. After the data had been analyzed through SPSS/PC⁺ (Statistical Program for Social Science: SPSS), the researcher then analyzing the community and community-cultures through SWOT Technique Analysis (Strength/ Weakness/Opportunity/Threat: SWOT). In addition, the research findings were presented within 5 aspects; general information of community, personal information, community-cultures, people's knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City and a model of community-cultures based environmental education. However, there were some major aspects should be made the discussion as the following;

5.1 General Information of the Community

Ayutthaya Historic City was registered for the certification of the World Cultural Heritage in December 13, 1991 by UNESCO. (United Nations of Educational Scientific and Cultural Organization : UNESCO) The art object source has been in Ayutthaya Island with 3 metres above sea level and surrounded with 3 rivers including Phasak River to the East, Lopburi River to the West and Chaophraya River to the South together with "*Khlong Mueng*" connecting Pasak River and Lopburi River to the North Part of the Island. This is the reason why Ayutthaya Island has not had any natural resources except rivers, rural atmosphere, the ruins of art object environment and ways of life in the present community. However, the area of the World Cultural Heritage of Ayutthaya Historic City covered 1,810 rai that was a partial Island in Pratuchai and Thawasukri Sub-District, Ayutthaya Municipality with 7,335 households of 27,003 people. (Ayutthaya Municipality, 1999: copied document) living in the same area of 95 archeological sites.

Furthermore, the community history has been right now over 650 years (1350 A.D.-present) and it may be classified into 4 periods; Ayutthaya Civilization (417 years; 1350–1767 A.D.), The Ruined City (140 years; 1768-1907 A.D.), The Ancient City Conservation and Development (83 years; 1908-1991 A.D.), and The World Cultural Heritage of Ayutthaya Historic City (1991 A.D.-present). Thus, the

community where was once the capital of Thailand called “*Ayutthaya*” being established as the Thai Capital in April 3,1350 A.D. by King U-thong who was the first king of Chiangrai Dynasty. (Jul Meesomsak, 1990: 2) Even though there are no any empirical evidences about his background (Santi Leksukhum, 1998: 1) but some historians had made the hypothesis that King U-thong might come from somewhere as U-thong City (presently located in Suphanburi Province) or Prib-Pree City (presently located in Phetburi Province) (Thanom Arnamwat et.al., 1979: 139 and Phoj Pulsawat, October 14, 2000: interview) or Cha Kang Round City (presently located in Kampaeng Phet Province) or some cities in the Northern part of Thailand.

However, Prayoon U-luchata had made the field study of archeological sites in Ayutthaya Province (1966-1967 A.D.) and commented that King U-thong might be from Chiangrai City where was in the North of Thailand. Due to most historical documents directly recording that King U-thong was the Primary King of Chiangrai Dynasty which contained only 3 kings as King U-thong (1350-1369 A.D.), King Ramesuan (1388-1395 A.D.) and King Ramracha (1395-1409 A.D.). Moreover, the present location of Wat Buddhaisawan was previously located for “*Wiang Lek*” (not Wiang Lekh) where King U-thong built this for his temporary residence (1347–1350 A.D.) during his new bigger city construction on the other side of Chaophraya River. Thus, the word “*Wiang*” has been “*the Northern local word*” being the same meaning of “*city*”, so “*Wiang Lek*” was defined as “*a small city*” where was built before “*Wiang Yai (big) or a bigger city*”. The bigger city in that time was Ayutthaya. Therefor, the Local Northern Thai Language used for the city name might indicate the original background of its founder.

Furthermore, the area where Ayutthaya located had been the location for “*Ayothaya*” and “*Phathakucham*” before. Thus, Ayothaya might have been located around the present area of Ayutthaya Train Station or Ayutthaya Road where there are still many major temples right now including Wat Ayothaya, Wat Samanagot, Wat Kudidao, Wat Chang, Wat Saliang, Wat Sampleum, Wat Chaokaew-Chaochai (Wat Yaichaiyamongkhon) and Wat Panancherng etc. This was the same view of Phra Atikan Sukrithawaro who has been the abbot of Wat Ayothaya (December 9, 2000: interview) confirmed that the city heart of Ayothaya located at the same area of Wat Ayothaya or Wat Kao. However, Phatakucham City was presumed to be located at the same area of Wiang Lek or Wat Buddhaisawan at present.

5.2 Personal Information

The personal information of people in the World Cultural Heritage of Ayutthaya Historic City were indicated that most heads of households were female (56.50%) being 13% more than male (43.50%) with 44.65 years old in average, married (68.30%), single (21.20%), widowed and divorced (10.50%). Thus, Suphawan Phlainoi (1984: 3-4) saying that gender and age are the major factors of population structure in a community. Rate birth for male and female is always 105:100 but death rate for male is higher than female. Therefor, a community will be consisted of the same number of male and female at the end. In case of a number of female is more than male, this indicates high level of net number for male immigration out a community and/or high level of immigration rate for female moving in and/or the high

death rate for male. However Daranee Thawilpiphatkul (1996: abstract) studied the city-poverty in Thailand and it was found that women over 30% of the population in a city compressed community were family heads. This was similar to Katta City in Bangladesh; thus, these women always being divorced, widowed or single.

Furthermore, Siriwan Papanya (1996: abstract) found that the different people to gender, age, religion, occupation, hometown and living-duration made the different participation on archeological sites conservation. This was accordance with Khwansanguan Sermsi (1996: 76) presented that the village committee with different age made the different awareness in natural and art object environment. While Nathanitcha Phuto (1995: 119) found that the policemen getting married and single did not make the different intention to prevent and solve environmental problems. This was the same view of Siriwan Papanya (1996: abstract) presented that the different people to family status did not made the different participation on archeological sites conservation. Moreover, Arrong Suthisat's study (1984: 264) indicated that the people being single or married had their different goals of life. The single always get undirected goal of life and unstable emotion while the married getting more ensured goal of life, donated and protected mindedness, being sure in self-potential to control what surroundings. In addition, Siriwan Sererat (1990: 72) has given more explanation that the single are always interested in personal activity and relaxation while the married being interested in family stability, so they always buy motor-cars, refrigerators and home decorated furniture etc. Together with the divorced and the widowed are interested in self-health. Seeing that the conservation and development for art object environment in the World Cultural Heritage of Ayutthaya Historic City may trend to achieve goals because of their personal information running to be positive factors; not only their gender, age but also marital status as mentioned.

5.3 Community- Cultures

5.3.1 Concept Culture

The concept culture was consisted of thought, values, belief and religion. Thus, the most agreed that man is a partial environment (67.30%) because of the Buddhist based (94.70%). About a half of the samples (50.90%) did self-decision making and some (40.40%) consulting some experts before making decision. This, Rogers (referred to Smith Sa-ubol, 1991: 125–126) explained that one doing self-decision making is considered to be an innovator being always bravery, positive vision, good financial status and high education. This is similar to the research findings in table 19; most samples got more income than expense together with in table 17; about 25.00% of the sample got higher education. While the people making their decision after consulting the experts; these are considered to be the early adopters being always a leader, respective person and positive attitude to change.

However, the majority (94.70%) was Buddhism with moderate level to apply the religious teaching for their ways of life (48.00%) and spent 3 times a month in average for religious activity participation. For this, Vichai Tiennoi and Pracha Inkaew (1993:182) said that the major religions presently are Hinduism or Bramaism, Buddhism, Islamism and Christianity. Especially, the Buddhist is a religion based

natural truth and treating one to the wisdom (Wichian Chavabutboontarik et.al., 1999: 91). However, Phrathepvatee (P.A. Payutto, 1988: 110-112) giving more explanation that the Buddhist firstly distributed through the form of "*Hinayan*" to the area called "*Suwanapum*" in the 3rd century. Then, in the 7th century the Buddhism Form of "*Mahayan*" moving in and being influenced among the people for hundred years. Untill 17th century, being again popular. Thus, the Buddhist is considered to be a major factor specifying ways of life covering ritual, ethic and natural truth. (Phra Mongkotthepmolee, Supoj Chotipalo referred to Fine Art Department, 1997: 29) Furthermore, Siriwan Papanya (1996, abstract) found that people believed in different religions making different participation on archeological site conservation. Thus, the concept culture can be concluded that most people were Buddhism, innovators and early adapters, friendly to nature for a partial environment with positive values for art object environment in the community.

5.3.2 Organization Culture

The organization culture was consisted of primary and secondary group. The primary covered family, relatives and peer group while the secondary covered activity group, community and community network. However, the research findings related family were over a half of the samples lived in extended families (51.20%). The extended family is a indicator for rural society style (Mckee, 1974: 119). While the World Cultural Heritage of Ayutthaya Historic City located in Ayutthaya Municipality Area, which is considered to be an urban society. However, Daranee Tawilpipatkul studied the city-poverty (1996: 90) and it was found that most samples lived in extended families, over 30% of families in Bangkok-Compressed-Community and 24% of families in other City-Compressed-Communities were women being heads. These were similar to Katta City in Bangladesh and the major interest being what these women were always divorced, widowed or single. This is in accordance with the research findings (table 4) presented that most heads of households in the World Cultural Heritage of Ayutthaya Historic City were women (56.00%) with 44.65% years old in average, married (68.30%), single (21.20%) together with divorced and widowed (10.50%) respectively.

However, Suphatra Suphab (1998: 57-59) said that a family has influenced to child development, not only personality, emotion, attitude but also behavior. Therefore, Thai culture conservation should be started the first step in family (Saovapa Paitayawat, 1995: 228).

The relatives were found that the majority made their relatives chains as bilateral descent (86.50%), living out (51.20%) and in the community (48.80%). Doing the independence among their relatives 4 times a month in average with general consulting (77.60%). Thus, relatives are always considered to be a fundamental factor affecting social groups (Ngarmpit Satsa-nguan, 1991: 146-147). Together with in 1938 A.D., the government needed to improve the ancient city to be a trading and governing center; besides the public properties were nationalization, the people living some where and around Ayutthaya Island were invited to live in the city (Department of Fine Art. 1994: 10). Then, the community contained the ancient art object environment was certified to be the World Cultural Heritage of Ayutthaya Historic City. This made a new territorial community; in and out the community of the World

Cultural Heritage as well. However, the relatives is a fundamental factor for organization culture which may effect to art object environment conservation and development in the community as Ekachai Krue-inta's study (1997: abstract) was found that occupation, belief and relatives were the internal community factors for forest conservation of Karen tribal in Mae-Moh District, Lampang Province.

In addition, peer group was found that they had 4 close friends in average. The most were occupational friends (40.90%) and class-mate friends (30.10%) together with living in (49.60%) and out (46.40%) the community at the same amount. This was the same findings in table 27 presenting that most samples has lived in their own houses with no rights in the property together with moving in this community for finding a job (table 13) and their average ages were 44.65 years (table 4) which are considered to be a working-age, so their most friends always being in occupational group.

However, the secondary group was presented that the most did not know the activity group objectives (58.80%), its formation (56.20%) and its goal achievement (47.20%). There was a small number only seeing that the objective of the community activity group was related to public health (17.40%) and environment (16.60%), formed by people in the community (21.90%) together with some parts of goal only achievement (44.30%). Seeing that most samples were low interested in community activity group. This may be effected by their fundamental education level (table 17), working as an employee which made no time for public activities (table 18), very low knowledge (table 36) and low skill (table 38) related to art object environment conservation and development in the community. There was low public relation from the responsible organizations (table 42) together with having no management based people participation (table 39). As Patya Saihoo (1997: 89) has said that group or organization culture is the major factor effecting to activity success or failure in the community. This is the same view to Sanya Sanyawiwat (1996: 32-36) made the study related to the East Concept for Social Development: A Case Study for Rapid Development of Japanese Society. Thus, the research findings presented that among 10 variables; group mindedness based working style was the first factor to make the strongest and rapidest society in Japan.

The research findings related communities were most samples have originally lived in this community (58.30%) with 33.46 years in average. Some specified 1 year only and some lived here for about 105 years. This may be analyzed that the people have been still moving in the community and 105 years ago or before 1895 A.D. which in the reign of King Chulalongkorn (King V of Ratannakosin Capital), there might be already some people living in this community. Furthermore, most samples confirmed that there were no community networks to any other oversea or long distance communities except in Ayutthaya Province (37.20%) with 3 times a year. However, it may be concluded that there was integrated organization culture for people in the World Cultural Heritage of Ayutthaya Historic City. The rural style society based the primary group while the urban style based the secondary group.

5.3.3 Usage Culture

The usage culture was consisted of language, social norm, education, occupation, income, consumption, saving, herbal medicine, traditional activity and folklore. Thus, the research findings related language were that the central Thai language being mostly available in daily life (96.80%) and no ability to international communication (91.01%). The reason for this may be the location of Ayutthaya Province, which is in the central region and only 78 kilometers from Bangkok. This makes people speaking the central Thai Language for daily life. Even this area has been promoted to be one of the great tourist attractions around Bangkok but the villagers had the fundamental education (table 17) and their occupations were not related to tourism (table 18). This may be the major cause for their low abilities to international communication.

The social norm was presented that folkway was their major style living in the community (79.20%). Thus, Suphatra Suphab (1998: 21-26) explained that Thai Society has been based on the rural community being generous and independent. This makes friendly relationship of Thai values style.

In addition, education, occupation, income, consumption and saving. The most got fundamental education (74.40%), employment (91.50%), being employee (58.50%), in private organizations (60.95%), no minor occupation (84.20%). The main point of their major and minor occupations was not related any ways to tourism (84.20%). They got 115,082.88 baht a year or 9590.24 baht a month in average for major income together with some getting more 43,387.20 baht a year or 3615.58 baht a month in average from their minor occupation (15.60%). The most made 80,327.76 baht a year or 6,693.98 baht a month in average for their expense together with 20,580.50 baht a year or 1715.04 baht a month in average for their saving.

Nathanitcha Phuto (1995: 119) presented that the different levels of education made the different intention for the environmental problems. The same as Sanya Sanyawiwat (1980: 206) said, occupations could be classified to be high, moderate and low skill levels. Thus, the high skilled occupation always positively responds to human being and spends so much time for educational process such as teacher, accountant, manager, architect, physician and pharmacist etc. The moderate skilled occupation may be considered to clerk, officer and general workers etc. And the low skilled occupation is always acted to serve their biological needs as room cleaner, labors and janitor etc. However, the World industry revolution was to enlarge widely the scale of moderate skilled occupation as Jersile (1968: 75) presented that the different occupations made the different personalities, together with Sanya Sanyawiwat (1980: 121) indicated that income and skill were major factors for personal classification in sociology.

The research findings related herbal medicine, traditional activity, ritual and folklore were; modern medicine was mostly available (76.80%), being able to provide from somewhere in the community (74.90%). While the traditional activity was annually performed as the World Heritage Day (85.49%) Makabucha Day (78.10%), Visakabucha Day (78.03%), Beginning of Buddhist Lent Day (75.99%) and with low participation of all related; especially, the villagers in the community. This indicated that traditional activities should be improved their forms getting more

people's participation as Kasem Chankaew et al. (1998: 103-104) have said that religious group of people may be easily attaining the objectives of environmental education because of their former faith. Furthermore, over a half recommended that the religious activities should be annually performed in the community. This is the best opportunity to transfer their religious faith to be object environment conservation and development in the community.

However, the ritual was religious belief-based (95.00%). This is another reason supporting art object environment conservation and development through the religious activities. In addition to folklore, the majority believed that folklore could be adapted to be the alternatives for the community art object environment conservation and development (82.80%). Thus, the best folklore in their views was folk games (75.99%), tale (49.08%) and folk song (35.88%); respectively. At the end, it may be concluded that most people in the World Cultural Heritage of Ayutthaya Historic City had their own usage cultures as folkway based-principle living and working for employee with strong economy in family level, modern life style together with low interest in folklore.

5.3.4 Object Culture

The object culture is consisted of costume, residence, instrument, handicraft, infrastructure, painting, folk dance, folk music, sculpture and archeological site. Thus, the research findings related costume and instrument were general style costume (97.60%) with modern technology instruments for household utilized. These are common behaviors in the present world as the Department of Fine Art (1997: 22) explained that Thai or other South-East Asian Countries related to foods, costumes and traditional activities have been adapted to be more western style distributing through trading, advertising and information technology.

The residence was presented that most houses were located in the archeological area (48.80%), having their own houses (74.14%) or some renting (19.82%) with 2,285.71 baht monthly paying in average for the rent. Thus, the reasons for these being as Ayutthaya Municipality (1999: copied document) presented that there were 7,335 households of 27,003 people living in the World Cultural Heritage of Ayutthaya Historic City. Therefore the government has made its policy for Ayutthaya art object environment conservation and development as the Living Historic City.

Furthermore, the handicraft was Platapian Jaksan (carb-fish weaving) being and the most famous handicraft in the community (82.06%), self-produced (77.04%), providing the materials somewhere out of the community (90.24%), mostly available for their families (54.62%) and sometimes for tourist souvenirs (38.79%). Thus Platapian Jaksan (carb-fish weaving) and pottery are considered to be the local handicraft indicating to water and rice-based-cultures. (Department of Fine Art, 1997: 18)

However, the infrastructure was presented that the community got rather complete infrastructure as the asphalt roads (74.10%), tapped water (96.00%), house telephone (60.70%) installed during 1993-1997 A.D. which was after the World Cultural Heritage certified by UNESCO, and comfortable public telephone (64.40%). Thus, the infrastructure is considered to be a major indicator for quality of life in the

community as Wanarak Mingmaneeakin (1993: 158-159) saying that the more complete infrastructure makes the more successful activity development.

Moreover, the study on painting, folk dance, folk music and sculpture, were found that most people had no ability to painting (59.90%), folk dance (51.72%), folk music (77.30%) and sculpture (76.50%). The reasons for these may be as Wichian Chabuth-boontharik et al. (1999: 121) saying that the Buddhist has influenced to Thai art objects including sculpture, painting, architecture, and literature but most people in urban community always get low interest in any arts and crafts. This is the same view of Pravate Vasi (1995: 1) presented his opinion that the Buddha teaching has been adapted in low level for community development. This made the great problems for the country where has been considered to be one of the great land of the World Buddhism.

Furthermore, the research findings related archeological site was presented that most community art object environment were related to Buddhist (79.70%) and monarchies (16.60%) with 5 times a month for their visiting the community art object source while some specified no visiting (19.30%). This is in accordance with the Department of Fine Art (1994: 16) reported that the World Cultural Heritage of Ayutthaya Historic City covers 1,810 rai with 95 archeological sites mostly related to Buddhist. At the end, it is concluded that the object culture in the World Cultural Heritage of Ayutthaya Historic City was considered to be modern technology housing supplies with low interest in handicraft among the Buddhist ancient ruins in the community.

5.4 People's Knowledge, attitude, Skill and Participation on Art Object Environment Conservation and Development in the Community

The people's knowledge, attitude, skill and participation on art object environment in the World Cultural Heritage of Ayutthaya Historic City presented that, there were high level of attitude (72.01%), low level of skill (49.03%), and participation (46.93%) together with very low level of knowledge (58.31%) respectively. It is notified that there were no logical results of the people's knowledge, attitude, skill and participation on the community art object environment conservation and development. Thus, 2 factors; the research instrument and the actual phenomena may cause it. The questions measuring their knowledge covered 2 parts; the knowledge related its local community and the knowledge related the Worlds Cultural Heritage of Ayutthaya Historic City. Thus, they could make a good score for the first part but not good for the last one.

However, the actual phenomena reason for high attitude may be most people know that the community was previously located as the great capital of Ayutthaya Civilization and absolutely damaged by the Burmese Power in 1767 A.D. Especially, most archeological sites being as the Buddhist Ruins among the Buddhism (94.70%) living in the community are like to make more effectively increase concerning to these art object environment. Even though most people having high attitude to the community art object environment conservation and development, but the researcher's field study (2000 A.D.) was found that there were 34 archeological sites (from all 95 sites certified in 1991 by UNESCO) were damaged and presently left no empirical

evidences. As Sutham Chatasing (January 10, 2001: interview) explained that the reasons for destruction of the art object environment in Ayutthaya Province were; firstly, modern infrastructure development of the government organization, secondly invading for personal benefit of the villagers in the community, and finally no effective caring from the responsible organizations.

The reasons for low level of skill and participation may be depended on their lowest knowledge (table 36). It made them getting no frames of role and function for art object environment conservation and development. The more understanding they have got that the archeological sites are all own national treasures, makes the more believing its function being only the government organizations. Especially the Fine Art Department has been believed only to be the respondent for art object environment conservation and development in the community. (Sang Pornsi, January 12, 2001: interview) Thus, this concept has made negative effect to people's skill and participation. The sustainable solution should initially clarify the people understanding that even the archeological sites are the national treasures but the villagers are the national citizen who live closely to the community art object environment must know their histories best, present problems together with trend of future development of the community. These are the reasons why the villager's participation is the major factor for goal achievement of art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.

Their fundamental education (table 17) and occupations as employee (table 18) may cause the lowest level of knowledge. They may make the people having not so much time for other public activities except their major occupations, together with the problems related the responsible organization's coordination and public relation. (table 40) also considered to be the negative reinforcement to reduce the people's knowledge related art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City as well.

5.5 A Model of Community-Cultures Based Environmental Education

The environmental education philosophy views that there is just and only one world, all parts connecting to be a partial world of environment, human being as a partial world should appropriately live to the environment, doing adequately economic and social development and self-understanding based natural truth. (Winai Weerawatananont, 1997: 25-26) Therefore, all related should pay their participation for the goal achievement of environmental conservation and development. Thus, community-cultures are considered to be the major factor making the grass-rooted people participation on public activities. This is the reason why community-cultures must be based on a model of environmental education. As Phra Thepvatee (P.A. Payutto, 1989: 18-20) saying that there are several functions of culture and the best one is to unity people feeling to be the same group. This makes positive attitude before participating the public activities. Thus, this model was designed to covert goal, method, input and time frame. Due to the researcher viewing firstly a systematic approach is mainly considered to be a sustainable community development and secondly time frame being as a part of strategic management process which faces to its

objectives among the limitation of resources. However, it must run to be the efficient process at all.

The model of community-cultures based environmental education should be consisted of individual and community levels. Due to environmental education is defined as an individual development process to make people getting awareness, knowledge, attitude, skill and ability to evaluate the social projects related the community environment balance through a participatory process. Notifying that the *“participation”* is a process leading to *“group or community power”* to reach goal. Therefor, the community management system facing the opportunity for people’s participation is considered to be the major factor for sustainable community development. However, the individual activity needs 4 stages; group forming, environmental educating, leader electing and activity participating. Due to the conservation and development for art object environment in the community being as a public activity; for this, *“group power”* which is transforming the policy to be then an effective implementation. This is the reason why group forming was specified to be the first stage, then doing an environmental education, leader election and activity participation for community development as well.

The community activity also needs 4 parts; traditional activity, handicraft promotion, cultural tourism, together with local organization and community network. Thus, the traditional activities were compared with the first door for people’s opportunity to participation, supporting group unity and presenting the community identification. The handicraft promotion was made for mental development, presenting the community indigenous and increasing villagers’ income. Then the cultural tourism was employed for the community stability, distributing the community-cultures and making more income as well. And then the local organization and community network presenting the community management system, civil society and exchanging the community information etc.

Seeing that the individual activities being able to be in accordance with the community activities may be the major factor to sustainable community in the future. Furthermore, the researcher recommended that this model should be performed through not only formal and non-formal but also informal education approaches. These alternatives support the philosophy of environmental education doing for people all walks in all societies. However, the participation achievement for art object environment conservation and development may lead to get *“valuable art objects”* supporting *“quality of life”* in the community at all.

CHAPTER VI CONCLUSIONS AND RECOMMENDATIONS

The community sustainable art object environment is one of the approaches reducing natural resources demolition and pollution. The possibility is necessary to get participation from both governmental and private sectors. Especially, the villagers living closely to the community environment should have awareness, knowledge, attitude, skill, participation and ability to evaluate some social activities, which may effect to environment in the community. However, the effective approaches for art object environment conservation and development in the community should be also supported to people's ways of life. This is the reason why the researcher had firstly studied the community-cultures before constructing a model of community-cultures based environmental education.

The purpose of this study was to present a model of community-cultures based environmental education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. There were 3 specific objectives; firstly studying the community-cultures, secondly evaluating people's knowledge, attitude, skill and participation on art object environment in the community and finally constructing a model of community-cultures based environmental education. The literature review covered environment, Thai Society, community-cultures, art object environment conservation and development, environmental education, research concepts and theories, together with the researches related.

Furthermore, there are 35 variables of the community-cultures studied within 4 contexts; concept, organization, usage and object culture. The concept culture is consisted 6 variables including thought, knowledge, attitude, values, belief and religion. The organization culture is consisted 6 variables including family, relatives, peer group, activity group, community and community network. The usage culture is consisted 13 variables including language, social norm, education, occupation, income, consumption, saving, herbal medicine, traditional activity, participation, skill, ritual and folklore. And the object culture was consisted 10 variables including costume, residence, instrument, handicraft, infrastructure, painting, folk dance, folk music, sculpture and archeological site. Then, the researcher did the data collection from 379 heads of households and 15 local experts with questionnaire, structured interview and observation form as the conclusions below;

6.1 Conclusions

6.1.1 General Information of the Community

The archeological sites in Ayutthaya Province have been certified to be the World Cultural Heritage of Ayutthaya Historic City since December 13, 1991 by UNESCO. It covers 1,810 rai in Pratuchoi and Thawasukri Sub-district, Ayutthaya Municipality with 7,335 households of 27,003 people living in the same area of 95

archeological sites. Thus, this area was previously the royal palace settlement in Ayutthaya Civilization Period during 417 years (1350–1769 A.D.). However, the community history running back over 650 years (1350 A.D.– present) and it may be classified to 4 periods; Ayutthaya Civilization Period (417 years; 1350–1767 A.D.), the Ruined City Period (140 years; 1767–1907 A.D.), the Ancient City Conservation and Development Period (83 years; 1907–1991 A.D.) and the World Cultural Heritage of Ayutthaya Historic City Period (1991 A.D.– present). This is the reason why the policy of Thai government has been specified to develop the community of the World Cultural Heritage being as a Living Historic City for tourism and trade center in the South-East Asia.

6.1.2 Personal Information

There are 7,335 households of 27,003 people living in the World Cultural Heritage of Ayutthaya Historic City. Thus, most households here are extended families with female being heads of them (56.00%) or 13% more than male persons. Their average ages are 44.65 years, together with 68.30% married, 21.10% single, 8.40% widowed and 2.20% divorced respectively.

6.1.3 Community- Cultures

Concept Culture

The concept culture is a part of abstractive cultures. It covers thought, values, belief and religion. Thus, the people's thoughts are human being a partial of the world environment (67.30%), doing self-decision making (40.40%) together with self-solving to any problems (52.20%) or getting sometimes assistant from their family members (44.90%). Their values are the community art object environment effecting to their ways of life (88.90%); especially their cultures (44.20%). Therefore, they should be planed to conserve and develop them right now (77.30%) and being responsible to government organizations (55.10%) as well.

Furthermore, the superstition is believed (52.20%). They agree that the people's successes or failures are depended on their own behaviors (78.60%). This is the same as the community successes or failures are also upon its member behaviors (59.10 %). However, almost of all is Buddhism (94.70%) with 3 times a month in average to participate the religious activities and being able to adapt their religious teaching for their ways of life in a moderate level (48.00%). This may be concluded that their concept cultures; thought, values, belief and religion supporting the art object environment conservation and development in the community.

Organization Culture

The organization culture is also considered to be a part of abstractive cultures. It is consisted of primary and secondary group. The primary group covers family, relatives and peer group while the secondary group covers activity group, community and community network. However, the most are extended families (51.20%), with 5 members in average (65.40%) and 2 children for the nuclear family (77.80%). Their relative chains are bilateral descent (86.50%), most of their relatives living both out (51.20%) and in (48.80%) the community, doing their independence in general consult (77.60%) with 4 times a month. Furthermore, they have 5 close friends in average (75.50%), from their occupations (40.90%) and classmates (30.10%), living

both in (49.60%) and out (46.40%) the community. They always made a general consulting (67.30%) with 5 times a month.

In addition, the factors related activity groups are that the most don't know its objectives (58.50%), its forming (56.20%) and its goal achievement level (47.20%). While the community is 33.46 years of living-duration in average (58.30%). Some confirm that their houses have been settled here for not lower 105 years. This presents that there have been already some people living in this community since 1895 A.D. that was the same period of the reign of King Rama IV of Ratanakosin Dynasty. However, some informants immigrated from somewhere out the community (41.70%) and moving in the community for occupation (60.40%) and marriage (24.30%). Even now there is still some moving in the community as the research result presented that some have lived here for 1 year only. Moreover, the most confirm that the community members support each other in moderate level (48.50%). The community major problem now is narcotics (50.20%). While the community network is no connection to any other communities or organizations in distance area or oversea (56.20%) except some communities in Ayutthaya Province with 3 times a year in average. This may be concluded that the primary group supporting the community art object environment conservation and development while the secondary group standing on the other hand.

Usage Culture

The usage culture is a part of non-abstractive cultures. It covers language, social norm, education, occupation, income, consumption, saving, herbal medicine, traditional activity, ritual and folklore. Thus, the available language in daily life is the central Thai language (91.01%). A small number only can be available in international languages (8.99%) including English (5.54%), Chinese (2.37%), French (0.82%) and Japanese (0.26%). While the social norm is folk way approach (79.20%), The most finish basic education level (74.40%) and a quarter of them get higher education (25.60%), getting employment (91.50%), being employee (58.05%) and the rest holding their own business. Most of them have worked for private sector (60.95) and some have worked for the government (25.30%). The majority gets only major occupation (84.40%), some getting both major and minor occupation (15.60%). Thus, both of major and minor occupations are not related any ways to the tourism industry (84.20%). Furthermore, their average incomes are more than their average expenses; the income is 115,082.88 baht a year or 9,590.24 baht a month, while the expense is 80,327.76 baht a year or 6,693.98 baht a month in average. However, there are some getting more income from their minor occupations about 43,387.20 baht a year or 3,615.58 baht a month (12.70%) and saving for about 20,580.50 baht a year or 1,715.04 baht a month.

However, the herbal medicine is not available (76.80%) and the modern one can be provided from somewhere in the community. There have been several traditional activities; Makhabucha Day (78.10%), Visakabucha Day (78.03%), Beginning of the Buddhist lent Day (75.99%) and the World Cultural Heritage Day (85.49%) annually performed without strongly participating from the grass-root people in the community. This is the reason why some confirm that they sometimes do the activity participation (60.69%) and the religious activities are recommended to annually perform with more participation of people in the community (58.31%). Furthermore, the ritual performance is the religious belief based (95.00%). While the folklore is interested in folk game (75.99%), tale (49.08%) and folk song (35.88%) but

no any performances and clarified specification as well. However, the majorities (82.80%) confirm that folklore can be effectively applied to be available for art object environment conservation and development in the community. This may be concluded that some parts of usage culture; language, social norm, education, income consumption saving and ritual, supporting the conservation and development for art object environment in the community while the rest; especially, occupation, herbal medicine, traditional activity and folklore, standing on the other hand.

Object Culture

The object culture is also considered to be a part of non-abstractive culture. It covers costume, residence, instrument, handicraft, infrastructure, painting, folk dance, folk music, sculpture and archeological site. Thus, the costume is focused on general style (97.60%) and it can be provided somewhere out the community (76.25%). The most have settled their houses in the archeological area (48.80%), their own houses (74.14%), renting (19.86%). The average renting is 2,285.71 baht a month and just for living only (83.40%). Furthermore, the instruments are based on modern technology facilities. Moreover, there are several sorts of handicraft as pottery, stone carving, crab fish weaving, mask, and Thai boat model. However, the most popular handicraft is crab fish weaving (82.06%). It is self produced (77.04%) and its major materials are from somewhere out the community (90.24%). The production is made for household utilized (54.62%) and tourist souvenirs (38.79%) respectively. While the infrastructure is considered to be a good condition; asphalt road (74.10%), tapped water (96.00%), electricity service (98.90%) house telephone (60.70%) which was mostly installed after Ayutthaya art object environment certified to be the World Cultural Heritage of Ayutthaya Historic City during 1993- 1997 A.D.

Furthermore, the research findings of painting, folk dance, folk music and sculpture are the majorities has no ability to art production, not only painting (59.90%), folk dance (51.71%), folk song (77.30%) but also sculpture (76.50%). However, these folk arts are always performed in the occasions of religious activities. While most archeological sites are Buddhist-based (79.70%) with 5 times a month for visiting and some (19.30%) confirmed that they have never visited any community archeological sites. This may be concluded that their object cultures are modern technology based ways of life, low skills of art and craft with no regulated housing among the Buddhist-based archeological sites in the community.

6.1.4 People's Knowledge, Attitude, Skill and Participation on Art Object Environment Conservation and Development in the Community

The people who are heads of households get high level of attitude related art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City, However their skills and participation are ranked in low level together with the lowest level of knowledge as well.

6.1.5 A Model of Community - Cultures Based Environmental Education

The community-cultures based environmental education model is consisted of goal, method, input and time frame. Thus, the goal is to create people's participation on art object environment conservation and development in the World

Cultural Heritage of Ayutthaya Historic City. There are 3 special objectives; firstly improving people's knowledge related environment, community, community-cultures together with the principle and method of art object environment conservation and development, secondly studying people's role and function to art object environment conservation and development and finally developing people's skills on art object environment conservation and development in the community. The method covers both individual and community activities. Thus, the individual activity contains 4 steps; group forming, environmental educating, leader electing and activity participating. While the community activity also contains 4 parts; handicraft promotion, traditional activity, cultural tourism together with local organization and community network. These are made to create learning people living in a learning community through all 3 approaches of educational system; formal, non-formal and informal education.

However, the community-cultures based environmental education process should be performed through a participatory training which faces to Learner Oriented Management (LOM) with operational action both in and out-class learning. Thus, the input is consisted of man, management, material and money. Furthermore, the time frame should be designed as 3-day-training; from 09.00 a.m. to 05.00 p.m.; 2 days for the environmental education and 1 day for the evaluation. The evaluation must be made a week after doing the environmental education. However, the researcher views that the community-cultures based environmental education should be performed 3 times a year. Each time should be dated around the Buddhist Major Days as Makhabhucha Day (always dated in February), Visakabucha (always dated in May) and Beginning of Buddhist lent Day (always dated in July) as well.

6.2 Recommendations

6.2.1 Practical Recommendations

There are several activities from the research findings should be performed in the World Cultural Heritage of Ayutthaya Historic City. Thus, the researcher has classified them to be policy, management and performance activities as the following:

Policy Activities

1) Cultural Commerce such as cultural tourism, local art and craft demonstration, traditional folk dance etc. should be managed through the central government policy, Ayutthaya Province plan or project for the community development.

2) This model of community-cultures based environmental education should be performed to the officers of any organizations related the community art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.

3) A folklore including folk game, tale, folk song and legend should be restored to be available for not only art object environment conservation and development but also cultural tourism resources in the community.

4) Community networks should be preformed both in Thailand and abroad.

Management Activities

- 1) The public relation on the World Cultural Heritage of Ayutthaya Historic City should be made more efficiently to general publics both in and out the community.
- 2) A handicraft group should be established to develop, promote and distribute the local products to both domestic and international markets.
- 3) The religious activities, such as Makhabucha Day, Visakabucha Day, Beginning of Buddhist Lent Day and Ending of Buddhist Lent Day should be performed through a participatory process to all walks and also supported the art object environment conservation and development in the community.

Performance Activities

- 1) The villagers should make a group related art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.
- 2) Cultural Interpretation should be made at each source of archeological sites by any organizations related.
- 3) Ayutthaya Tourism Office and the Fine Art Department should perform information Management System (IMS) on the World Cultural Heritage of Ayutthaya Historic City for people or tourists getting clearly understand.
- 4) The role and function related art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City should be studied to specify major action for each group by some organizations; the Fine Art Department, Ayutthaya Local Art Object Conservation Unit, Ayutthaya Municipality, Ayutthaya Cultural Center and other organizations in the community.

6.2.2 Recommendations for Further Research

- 1) There should be studied about knowledge, attitude, skill and participation on art object environment conservation and development among the educational organizations in the World Cultural Heritage of Ayutthaya Historic City.
- 2) There should be studied a model of local curriculum supporting art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.
- 3) There should be studied a model of religious or environmental or any other public activities facing to people's participation in the community.
- 4) There should be studied the women's role play related art object environment conservation and development in the community.
- 5) There should be studied the factors affecting people's participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City.
- 6) There should be studied a model of waterway tourism; not only the route surrounding Ayutthaya Island but also any others from Ayutthaya Ports to some villages located on the river banks. These may be caring both environmental and cultural impact as well.

BIBLIOGRAPHY

- Arther, T. Jersite. (1968). Child Psychology. 6th Edition. Englewood Cliffs. New Jersey: Prentice-Hall
- Babbie, Eard R. (1980). Sociology: An Introduction. 2nd Edition. Belmont: A Division of Wadsworth.
- Biesanz, John. and Biesanz, Mavis. (1969). Introduction to Sociology. Englewood Cliffs: Prentice - Hall.
- Broom, Leonard. and Selznick, Philip. (1970). Principles of Sociology. New York: Harper & Row Publishers.
- Broom, Leonard and Selznick Philip. (1973). Sociology: A Text with Adapted Readings. New York: Harper & Row Publishers.
- C. Kluckhohn. (1954) "Cultural Anthropology", in S. Izumi (Editor), American Study Seminar. P.28. Tokyo.
- Cary, Lee J. (Editor). (1976). "The Role of The Citizen in The C.D. Process." Community Development As a Process. University of Missouri Press Columbia.
- Commings Milton C., Jr. and Wize. (1971). Democracy under Pressure: An Introduction to The American Political System. New York: The Free Press.
- Daft, R. L. (1992). Organization Theory and Design. Singapore: Info Access.
- Davis, Boud. (1982). Developing Student Antonomy in Learning. New York: Nichols Publishing.
- Davies, Ivor. (1981). Instructional Techniques. New York: McGraw - Hill Book.
- (1971). The Management of Learning. New York: McGraw- Hill Book .
- Erwin, William. (1976). Participation Management Concept Theory and Implementation. Atlanta. Georgia State University.
- Ferguson, L.W. (1952). Personality Measurement. New York: McGraw-hill Book.
- Fien, J. (n.d.). Teaching for a Sustainable World. Australian Association Environment Education.
- Goldstein, A. and Sorcher, M. (1974). Changing Supervisor Behavior, New York: Pergamon.
- Hahn, Martin E. and Simmel, Edward C. (1976) . Communication Behavior and Evolution. New York: Academic Press.
- Harold M. Hodges, Jr. (1971) . An Introduction to Sociology . United States of America : Harper and Row Publishers.
- Henry, Maddick. (1966). Democracy Decentralization and Development. Illinois: Richard D. Irain.
- Hoebel, E, Adamson. and Weaver, Thomas. (1979). Anthropology and The Human Experience. 5th Edition. New York: Mc Graw - Hill Book .
- Horton, P.B. and Hunt, C.L. (1972). Sociology. 3rd Edition . New York: McGraw-Hill Book.
- Huntington, Ellsworth and Shaw, Earl B. (1979). Principle of Human Geography . New York: John Wiley and Sons.
- Kingsley, Davis. (1967). Human Society. United States of America : Macmillan.
- Kiyotaka Aoyagi. (1977) "Tradition and Modernity". Cultural Rights as Human Rights. Paris: Imprimeric Beugnit .

- Kroeber, A.L., and Kluckhohn, C. (1952). Culture: A Critical Review of Concepts and Definitions. Harvard University: Paper of the Peabody Museum of American Archaeology and Ethnology.
- Lenski, Gerhard and Lenski, Jean. (1987) . Human Society: An Introduction to Macrosociology. New York : McGraw - Hill Book.
- Lucko, B. Disinger, J and Roth, R . E. (1982). "Evaluation on Environmental Education Programs at the Elementary and Secondary School Level" The Journal of Environmental Education . Volume 13 , No . 4: 8.
- Lundberg, George A. et al. (1969). Sociology. New York: A Harpen International Edition.
- International Labor Office. (1949). International Standard Classification of Occupations. Geneva.
- Management Development Center. (1989). Asean Training of Trainers Manual. Singapore: Heng Mui Keng Terrace.
- Mckee, James B. (1974). Introduction to Sociology. New York: Holt, Rinchart and Winston.
- Mumford, Lewis. (1963). The Highway and The City. New York: The New American Library of World Literature.
- Pearse, A. and Stiefel, M. (1979). "Inquiry in Participation Research Approach" in UNRISD Participation Program. Geneva.
- Ralph M, Stogdill. (1973). Basic Concepts for a Theory of Organization; in Organizational Systems. Frank Belcer.
- Sandy, Ducan. (1979). Tourism and Heritage Conservation. PATA Conference Bangkok.
- Schwartz, Barton M. and Ewald, Robert H. (1968). Culture and Society: An Introduction to Cultural Anthropology . New York: The Ronald Press.
- Smith, R. H. et al. (1980). Management Marking Organization Perform . New York: Macmillan.
- UNESCO. (1980). Environmental Education in The Light of the Tbilisi Conference. Paris: UNESCO.
- United Nations. (1975). Popular Participation in Decision Making for Development. New York: United Nation Publication.
- V. Mshvenieradze. (1977). "Cultural Interaction as Factor Influencing Cultural Rights as Human Rights." Cultural Rights as Human Rights. Paris: Imprimerie Beugnit.
- Akin Rapephat. (1994). "Why We Talk about People Participation" People Participation for Work Development. Bangkok: Saksopa Publication.
- Amara Pongpichet. (1992). "Man and Culture" Society and Culture. Bangkok: Chulalongkorn University Press.
- Arnont Arpapirom. (1982). Social Science. Bangkok: Audience Store Press.
- Arong Suthasat. (1984). Social Operation Research. Bangkok: Chaophraya Publication.
- Ayutthaya Campus Union. (2000). Trianing Document for Occupational Support and Development Teaching in Schools. Ayutthaya Campus Union. August 25, 2000 at Bangpahan School, Bangpahan District, Ayutthaya Province.
- Ayutthaya Municipality. (1998). Report of Population and Household Statistics. Copied Document.

- Boonkerd Ratanasaeng. (1998). Language and Culture. Bangkok: O.S. Printing House Press.
- Boontien Tongprasan. (1988). Concept of Community-Cultures in Development. Bangkok: Thailand Catholic Council for Development.
- Boontham Kitpredaborisuth. (1988). Technique of Instrument Construction for Data Collection in Researchs. Bangkok: Anant Press.
- Borvornvate Rungrujee (Editor). 1996. Ayutthaya Historic City, Bangkok: Samaphan Publishing.
- Borvornvet Rungrujee. (1994). "Ayutthaya Historic City Conservation and Development Project": The World Heritage Park. Ayutthaya: Tienwatana Press.
- Chalong Boonyanant. (n.p). Educational Planing. Department of Education. Faculty of Social Sciences and Humanities. Mahidol University.
- Chayan Watanapoot, (Editor). (1991). Forest Resource in The Upper North. Fundamental Document, Committee of Non-Government Organization Coordinating in the Upper North in Cooperation with Social Research Institute of Chiangmai University.
- Charoon Supharp. (1992). "Social treatment" Society and Culture. Department of Political Science, Chulalongkorn University. Bangkok: O.S. Printing House.
- Damrong Thadee (1992). Occupational Sociology. Bangkok: Ramkamhaeng University.
- Daranee Tavilpiphatkul. (1996).Urbanization and Social Change in Developing Countries.Bangkok: Chulalongkorn University.
- Department of Fine Art. (2000). Thai Heritage – World Heritage. Bangkok: Graphic Format.
- (1997). Conclusion of Academic Seminar on Similarity of Ways of life in South East Asia Cultures, June 26-28, 1995. Royal River Hotel. Bangkok: Siam Book and Publication.
-(1994). Master Plan of Ayutthaya Historic City Improvement Project. Bangkok: NSP Printing Group.
-(1982). Art Object of Ratanakosin Period. Bangkok: Pikanate Press.
- Department of Academy. (1997).The Examination Emphasizing Skill Process. Bangkok: Kurusapa.
-(1996). Instrument Formation for Affective Domain Measurement. Bangkok: Kuruspa.
- Environmental Policy and Plan, Office, Ministry of Sciences, Technology and Environment. (1998). Development of Art Object Environment Conservation. 5thEdition. Bangkok: Kumkrong Moradokthai.
- Environment Plan and Policy, Office. (1994). Development of Art Object Environment Conservation. 4thEdition. Bangkok: n.p.
- Jakrapan Phewngam. (1993). Factors Determining Readiness for Governor Election As Bangkok Metropolitan. Bangkok: Krung Siam Publication.
- Jamrong Tongprasert. (1975). Language and Culture. Bangkok: Wattapanit Press.
- Jinda Chankaew. (1989). Present Religions. 2ndEdition. Bangkok: Mahachulalongkorn Rachavitayalai Press.
- Jirapan Kanchanachitra. (1979). Community Development. Bangkok: Ramkamhaeng University.
- Jul Mesomsak. (1990). Visiting Ayutthaya. Ayutthaya: Tienwattana Press.

- Kanchana Kaewthep. (1990). Social Development Principle: Community–Cultures Based Development. Bangkok: Thammasat University Press.
- Kanchana Damsuwan and Nitaya Saomanee. (1978). Fundamental Psychology. Bangkok: Ruenkaew Publication.
- Kannika Chomdee. (1981). People Participation on Economic Development: A Case Study of Sarapee Project, Tachang Sub-District, Varinchamrab District, Ubolratchathani Province. M.S. Thesis in Social Sciences, Faculty of Graduate Studies, Thammasat University.
- Kasem Chankaew and Prapan Koisomboon. (1982). Principle of Environmental Education. Bangkok: Kasetsart University Press.
- Kasem Chankaew, Manechan Mekthon, Chamnong Akiwatanasith, Prapote Projonpachanuk and Samakke Boonyawat.(1998). “Environmental Conservation” Environment, Technology and life. Bangkok: Kasetsart University Press.
- Kesin Kussalanuphap. (1981). Model of Local Administration Organization: A Case study of Songkhla Governor Election Based People Desire: Songkhlanakarin University.
- Khun Sanguasermsi. (1986). Village Committee’s Knowledge and Awareness on Nature and Art object Environment :A Case study of Triyok District, Kanchanaburi Province . Social Master Sciences Thesis (Environmental Education) Faculty of Graduate Studies, Mahidol University.
- Manee Chaiteeranuwatsiri.(1996). A Research of Behavioral Science. Nakhonpathom: Education Department, Faculty of Social Sciences and Humanities. Mahidol University.
- Matha Wijakkana. (2000). “Prasrinakarin Garden of Ayutthaya” A Hundred Years Royal Ceremony for Somdej Phrasinakarindra Boromratchachonni. Ayutthaya: Thianwatana Press.
- National Environment Committee, Office. (1985). Nature and Art Object Environment Conservation Specifying the Development of Art Object Environment Conservation. Bangkok: Arun Publication.
- Narong Sengpracha. (1989). Man and Society. 2nd Edition. Bangkok: O.S. Printing House.
- Nathanicha Phuto. (1995). Awareness and Intention of Metropolitan Police to Performance on Environmental Problems A Thesis of Educational Master Sciences in Environmental Education, Graduate Studies Faculty, Mahidol University.
- Nat Tonthavirul. (1977). “Problem and Development” Special Copy of Environment Journal. (December, 1975): 27.
- National Environment Committee, Office. (1995). Development of Art Object Environment Conservation. Bangkok: n.p.
- National Culture Committee, Office. (1982). Text Book of Thai Culture Training for Secondary Student. Bangkok: Thammasat University Press.
- Nawarat Pongphaiboon. (1989). “Diversity but Similarity of Cultures in Thailand” To Culture Understanding. Bangkok: Amarin Printing Group.
- Ngamphit Satsa-nguan. (1992). A Research on Anthropology. Bangkok: Chaopraya Publication.
- (1991). Principle of Anthropology. Bangkok: Chaopaya Publication.
- Nikhom Sumongkoh. (1999). Social Education. Bangkok: Chaopraya Publication.

- Niran Jongwuthivat. (1984). Strategies, Concepts and Methods for People Participation Support in Community Development. Bangkok: Saksopakanpim.
- Nit Hiyacheranant. (1996). "Law Related Sites and Monument Conservation" Environment Law. 8thEdition. Section of law Science, Sukhothaimathirath University.
- (1984). Conservation for Archeological Sites and Art Object Environment. Bangkok: n.p.
- Panat Hunnakin. (1980). Values and Ethics Teaching. Bangkok: Pikanate
- Paradee Mahakhan. (1980). Thai Fundamental Civilization. Bangkok: Audient Store.
- Patarakitsopon, Phra. (n.p.). History of Wat Buddhaisawan. Copied Document.
- Patya Saihoo.(1997). Social Machanication. 9thEdition. Bangkok: Chulalongkorn University.
- (1991). "Cultures Development Based on Indigenous and Community Potential" An Academic Seminar Document on Indigenous. National Cultures Committee Office.
- Pinyo Jittham. (1979). Folklore Belief Sery 5. Songkhla: Mongkol Publication.
- Phisit Charornwong. (1993). The World Heritage: The Heritage of Nation. Distributed by National Identification Creation Office.The Office of Prime Minister.
- Prapapen Suwan. (1983). Attitude: Measurement of Heath Behaviors and Changes.Bangkok: Thaiwatanapanit.
- Pranee Wongtet. (1993). "Local Games and Rituals in Thai Society". Local Cultures: Concept and Belief. Bangkok: Chulalongkorn University Press.
- Prapasi Sihaampai. (1997). Fundamental Education in Religion and Ethics. Bangkok: Pikanate Press.
- (1989). Culture Related Language and Literature. Learning Process Development Project, Ayutthaya Ratchabhat Institute in Operation with Text Book and Academic Document Project, Faculty of Educational Science, Chulalongkorn University.
- Prasit Thong-un et al. (1999). Human Behaviors and Development. Bangkok: Comfort.
- Prasobsuk Dee-in. (1988). Head of Sub-District Participation on Forest Resources Conservation. A Thesis of Educational Master Science in Environmental Education, Faculty of Graduate Studies, Mahidol University.
- Pravet Vasi. (1995). Buddha Teaching and Society. Bangkok: Ruenkaew Publication.
- Prayoon Uluchata. (1997). Five Months among the Ancient Ruins in Ayutthaya. 3rdEdition. Bangkok: Boransatan Press.
- Precha Piamphongsan. (1997). Environment and Development. 2ndEdition. Bangkok: Chulalongkorn University.
- Pramaul Kikkinson. (1978). Education in Anthropology: Folklore. Bangkok: Phrae Pitaya Press.
- Pruang Na. Nakorn. (1972). A History of Thai literature. 7thEdition. Bangkok: Thai Watanapanit.
- Rachanekon Settho. (1980). Thai Culture and Society. Bangkok: Pikanate Press.
- Rachavoramane, Phra (P.A. Payutto). (1984). Buddhist Dictionary. Bangkok: Amarinkanpim.
- (1994). Thai Culture Distribution Based Actual Education. 2ndEdition. Bangkok: Sahamik.

- Raviwan Chinatrakoon. (1992). Educational Research Methodology. Bangkok: Parppim Press.
- (1997). Environmental Process Study. Bangkok: Parppim Press.
- Rueng Charoenchai. (1994). Cultural Dimentions in Development. A Simanar Document Related Cultures. National Culture Committee.
- Ruengdet Pankhuenkhat. (1998). Thai Linguistics. Bangkok: Mahachulalongkorn Ratchavitayalai.
- Rungrat Lhuangnatethep. (1992). Spicy Plant and Herbal Garden. Bangkok: Religion Department.
- Samith Sa-u-bol. (1991). Fundamental Anthropology. Bangkok: Audience Store.
- Santi Leksukum. (1998). The Spired-Cattle Surrounded Chedi of Wat Ratchaburana. Ayutthaya.
- Sa-nguan Rodboon. (1986). Thai Art Objects. Bangkok: Kansatsana Press.
- Sanit Samakkan. (1991). Cultural Evolution of Thai Society. Bangkok: Audient Store Press.
- Santat Sermsi. (1998). Social Population Sciences. 2nd Edition. Bangkok: Samjarernpanit.
- Santhera Saichue. (1997). Construction of Environmental Curriculum on Pollution Problems for Nurses in Hospitals of Medical Service Office. Bangkok: Thesis of Educational Master Science in Environmental Education, Faculty of Social Sciences and Humanities, Mahidol University.
- Sanya Sanyaviwat. (1996). Theories and Strategies for Social Development. n.p.
- (1980). Principle of Sociology. Bangkok: Thai Watanapanit Press.
- Saovapa Phaitayawat. (1995). Fundamental Thai Culture: Conservation and Development Approach. Department of Text Book and Academic Document Development. Supervision Unit, Ratchabhat Institute Council Office.
- Seree Phongphit. (1986). Back to Basic. Bangkok: Tienwan Press.
- Satian Luangarm. (1975). Relation of Economy and Community Development. Bangkok: Phrae Pittaya Press.
- Satienkoset. (1973). Thai Culture and Tradition. Bangkok: Klangvitaya Press.
- Satil Chusaeng. (1983). Conservation of Archeological Arts and Environment in Europe. Academic Journal of Archeology Faculty.
- Sawart Senanarong. (1978). Cultural Geography. Bangkok: Aksorncharerntat Press.
- Siriwan Tapanya. (1996). Factors Affecting Archeological Sites Conservation: A Case Study on Participation of People Living near the Archeological Sites in Maung District, Chiangmai Province. A Thesis of Educational Master Science in Environmental Management Technology. Mahidol University.
- Siriwan Serirat. (1990). A Modern Marketing Management. Bangkok: Phatanasuksa Press.
- Somsak Sisantisuk. (1986). Thai Society: Researching and Developing Approaches. Bangkok: Phrae Pitaya Press.
- Somboon Suksamran. (1987). Development According to Buddhist: A Case Study of Priest Developer : Pimsuay Press.
- Songkot Prapitpa. (1989). Man and Environment . Bangkok: D.D. Book Store.
- Sisak Wallipodom and Sujit Wongtet. (1989). "Cultural Evolution on History and Archeology" To Cultural Understanding. Bangkok: Amarin Printing.
- Sucha Chan-em. (1993). General Psychology. 8th Edition. Bangkok: Thaiwatanapanit Press.



- Suchep Punyanuwat. (2000). Cultural Science. 4thEdition. Bangkok: Mahamongkut Rachavitayalai.
- Sumontip Boonsombat. (1980). "Education and Community Economy" A Set of Text Book for Education for Life and Community, Educational Science of Sukothai Thamathirat University. Bangkok: Ladprow Kurusapa Press.
- Suphatra Supharp. (1998). Society and Thai Culture: Values, Family, Religion and Tradition. 9thEdition. Bangkok: Thaiwatanapanit Press.
- (1992). "Social Treatment" Society and Culture. Bangkok: Chulalongkorn University.
- (1984). Sociology. 7thEdition. Bangkok: Thaiwatanapanit Press.
- Suphatradit Disakul. (1980). Ancient Art Object: Seminar Report of Cultural Heritage and Art Object Environment Conservation. Bangkok: The Office of National Environment Committee.
- (1975). Arts in Thailand. Bangkok: Krung Siam Publication.
- Suphitsawong Tamapanta. (1989). Fundamental Thai Culture. Bangkok: D.D. Bookstore.
- Surachet Wetchapitak. (1990). Life Base: Rural Culture and Development-Work. Bangkok: Mooban.
- Suthep Soontornprasat. (1987). Writing in Anthropology. Bangkok: Thaiwatanapanit Press.
- Sutham Chatasing. (1994). "Ayutthaya: Culture and Tradition Affecting Development" Ayutthaya World Heritage. Ayutthaya: Tienwatana Press.
- Tanom Arnamviwat et al. (1979). Thai History from the Beginning to the Ending of Ayutthaya Period. Bangkok: Saengrung Kanpim Press.
- Tawethong Hongviwat, (Editor). (1984). Pepole Participation in Development. Bangkok: Saksopa.
- Tawee Timkham . (1985). Community Development. Bangkok: O.S. Printing House.
- Tatsanee Chantorn. (1992). "Communication, Culture and Religion Development". A Set of Teaching-Documents of Communication for Development. 6th Edition. Section of Mass Media Sukhothai Thamathirat University.
- Thamapitaka, Phra (P.A. Payuto). (1996). Sustainable Development. Bangkok: Sahathamnik.
- (1994). The Sustainability of Buddhist: Turn up Damage to Development. Bangkok: Sahathamnik.
- (1994). Thai Culture Distribution Based Actual Education. 2ndEdition. Bangkok: Sahathamnik.
- Thawat Benjathikul. (1994). Factors Affecting Participation of Hilltribal People in the Hilltribed Village Getting the First Prize in 1994 for Village Contest of Hilltribe Development and Social Welfare Center in Chiangmai Province. A Thesis of Social Master Science in Social Welfare Sciences, Thammasat University.
- Thepvatee, Phra. (P.A. Payuto). (1989). "Culture and Development" Towards New Dimension of Culture and Development. Bangkok: Amarin Printing Group.
- Thepvatee, phra. (1988). Buddhist in Asia. 4thEdition. Bangkok: Mahachulalongkorn Rachavitayalai.
- The Royal Academy. (1981). A Dictionary of Sociology. Bangkok: Rungslip Publication.
- Thida Saraya. (1999). The Ancient Palaces in Ayutthaya. Bangkok: Sida Press.

- Thong-in Wongsothorn , Predinant Uparamai and Pramaul Boonyahotara. (1990). “Group Process and Group Working” Experience in Thai Cultural Studies, Section of Art Science, Sukhothai Thamathirat University. Nontaburi: Sukhothai Thamathirat University Press.
- Tulawat Panit-charern. (1993). Social Treatment for Natural Resource Management of Karen Hilltribes. A Thesis of Educational Master Science in Non-Formal Education, Faculty of Graduate Studies, Chiangmai University.
- Wachara Klainatorn. (1987). Sociology. Bangkok: Watanapanit Press.
- Wanrak Mingmanenakin.(1993). An Economic Dictionary. 2ndEdition. Bangkok: Thammasat University Press.
- Watana Wongkiatirat. (1996). “Rural Community” A Set of Teaching Document for Society and Thai Culture. Sukhothai Thamathirat University. 3rdEdition. Nontaburi: Sukhothai Thamathirat Univerity Press.
- Wichai Tiannoi. (1990). Natural Resources Conservation , 2ndEdition . Bangkok: Uksornwatana.
- Wichai Tiannoi and Pracha Inkaew. (1993). Man and Environment. Bangkok: Audience Store Press.
- Wichian Chabutboontarik, Sopa Tisongmaung and Mernrat Naovabut.(1999). Truth of Lives. Bangkok: Herdwave Education.
- Winai Weerawatananont. (1987). Environment. Bangkok: Audience Store Press.
- Winai Weerawatananont et al. (1997). Environmental Education in Asia. Department of Education, Faculty of Social Sciences and Humanities, Mahidol University.
- Winai Weerawatananont and Banchuen Siphongpan. (1996). Environmental Education for Sustainable Development. Bangkok: Songsiam Press.
- Wiroj Sisuchai. (1993). “Local Art Objects”: Local Cultures: Art Objects. Bangkok: Chulalongkorn Univerity Press.
- Wisuth Pinyovanichaka. (1994). Is Ayutthaya Historic City Valuable for the World Cultural Heritage?. An Academic Journal of Krung Kao Ratchabhat Vol.1, (1). 35-40.
- Witayakorn Chiangkoon. (1993). Vocabularies on Management. Bangkok: Pimdee Press.
- Wiyada Thongmit. (1999). Ayutthaya Capital. Bangkok: Sida Press.
- Yot Sansombat .(1994). Man and Culture. Bangkok: Thammasat University Press.
- Yuth Sakdechyont. (Translator). (1983). Man and Society: Fundamental Knowledge According to Macro Sociology. 4thEditor. Bangkok: Thammasat University Press.





QUESTIONNAIRE

ENTITLED COMMUNITY–CULTURES BASED ENVIRONMENTAL EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL HERITAGE OF AYUTTHAYA HISTORIC CITY

The questionnaire is available to ask people living in the World Cultural Heritage of Ayutthaya Historic City where covers 1,810 rai of Pratuchai and Thawasukri Sub–district in Ayutthaya Municipality, Ayutthaya Province. Thus, the purposes are to study the community – cultures, levels of knowledge; attitude; skill and participation, together the problems and recommendations on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. However, it is classified into 4 parts as the following;

- Part 1.** Questions related personal, social and economic characteristics
- Part 2.** Questions related knowledge on art object environment conservation and development in The World Cultural Heritage of Ayutthaya Historic City
- Part 3.** Questions related attitude, skill and participation on art object environment conservation and development in The World Cultural Heritage of Ayutthaya Historic City
- Part 4.** Questions related problems and recommendations on art object environment conservation and development in The World Cultural Heritage of Ayutthaya Historic City

No.
 Interviewer.....
 Dated on.....

Part 1. Questions Related Personal, Social and Economic characteristics

Direction: Marking ✓ in () or filling completely some information in the spaces

1. Gender

1.1 What is your gender ?

- () 1. Female
- () 2. Male

2. Age

2.1 I am nowyears old. (Counting up to a year if over 6 months)

3. Education

3.1 What is your highest education ?

- () 1. Lower Pratom 4.
- () 2. Pratom 4.
- () 3. Pratom 6 or 7
- () 4. Mathayom 3 or M.S. 3
- () 5. Mathayom 6 or M.S. 5
- () 6. Diploma
- () 7. Bachelor degree
- () 8. Others (specify).....

4. Marital Status

4.1 What is your marital status?

- () 1. Single
- () 2. Married
- () 3. Widowed
- () 4. Divorced
- () 5. Others (specify).....

5. Occupation

5.1 What is your occupation ?

- () 1. Employee
- () 2. Commerce
- () 3. Government officer
- () 4. State enterprise officer
- () 5. Personal business
- () 6. Others (specify).....

5.2 Do you have any minor occupations ?

- () 1. Yes
- () 2. No

5.3 Are both of your major and minor occupations related any ways to tourism ?

- () 1. Yes
- () 2. No

6. Income

- 6.1 Your major occupation income is about.....baht per month.
 6.2 Your minor occupation income is about.....baht per month.

7. Saving

- 7.1 Do you get any saving in your daily life ?
 1. Yes (continuing the question no. 7.2 if your answer is yes)
 2. No
 7.2 Total Cash Amount per month of your saving is about.....baht.

8. Religion

- 8.1 what is your religion?
 1. Buddhism
 2. Islamic
 3. Christian
 4. Others (Specify).....
 8.2 The frequency of your religious activity participation is about.....time(s)
 per month.
 8.3 How much can you apply your religious teaching to benefit the daily life ?
 1. Very high
 2. High
 3. Moderate
 4. Low
 5. Very low

9. Family

- 9.1 Whom do you live together in the family ?
 1. Parent and children
 2. Parent, children and some relatives
 3. Others (specify).....
 9.2 There are.....person(s) living together in the same house.
 9.3 How many children do you have ?children.
 9.4 What is your family member relationship ?
 1. Very good
 2. Good
 3. Moderate
 4. Low
 5. Very low relation
 9.5 What is the major problem in your family ?
 1. Personal debt
 2. Daily day expense
 3. Family member relationship
 4. Family member health
 5. Others (specify).....

10. Residence

10.1 What is your residence right ?

- 1. Own house
- 2. Relatives house
- 3. Rented house
- 4. Others (specify).....

10.2 How much do you pay monthly for your rented house ?.....baht a month.

10.3 What zone or area is your residence located now ?

- 1. Archeological area
- 2. Buffer area
- 3. Not sure

10.4 What is the residence available to your life?

- 1. Living only
- 2. Trading
- 3. Living and trading
- 4 Others (specify).....

11. Consumption

11.1 What is your total monthly expense ?baht a month.

12. Costume

12.1 What form do you always take your costume ?

- 1. General form
- 2. Local form
- 3. Others (specify).....

12.2 What sources of the costume do you or your family members provide?

- 1. Producing in a family
- 2. Buying from neighbors in the community
- 3. Buying from a shop in the community
- 4. Buying from shop out the community
- 5. Buying from shop in and out the community
- 6. Others (specify).....

13. Herbal Medicine

13.1 What sorts of medicine do you take for you and your family member treatment?

- 1. Modern medicine
- 2. Herbal medicine
- 3. Both modern and herbal medicines
- 4. Others (specify).....

13.2 Where do you provide the medicines ?

- 1. Producing in a family
- 2. Buying somewhere in the community
- 3. Buying somewhere out the community
- 4. Others (specify).....

14. Language

14.1 What language are you available in your daily life ?

- () 1. The Central Thai Language
 () 2. The Local Language
 () 3. Others (specify).....

14.2 What foreign languages can you speak ?

- () 1. English
 () 2. Chinese
 () 3. Japanese
 () 4. French
 () 5. No ability to any foreign languages

15. Instrument

15.1 What energy are you available for your daily cooking ?

- () 1. Firewood and / or charcoal
 () 2. Liquid gas
 () 3. Electricity
 () 4. Both Liquid gas and electricity
 () 5. Others (specify).....

15.2 Do you have any facilities mentioned in your family ?

- | | | |
|------------------|------------|-----------|
| Electric pots | () 1. Yes | () 2. No |
| Electric fans | () 1. Yes | () 2. No |
| Televisions | () 1. Yes | () 2. No |
| Washing machines | () 1. Yes | () 2. No |
| Computers | () 1. Yes | () 2. No |
| Air-conditioners | () 1. Yes | () 2. No |
| Bicycles | () 1. Yes | () 2. No |
| Motorcycles | () 1. Yes | () 2. No |
| Cars | () 1. Yes | () 2. No |
| Boats | () 1. Yes | () 2. No |

16. Relatives

16.1 Which chain do you make the descent ?

- () 1. Patrilineal descent
 () 2. Matrilineal descent
 () 3. Bilateral descent

16.2 Where are most of your relatives living?

- () 1. In the community
 () 2. Out the community

16.3 How often do you and your relatives make the independence?.....time(s)
 a month.

16.4 What parts do you and your relatives always make the independence?

- () 1. General consulting
 () 2. Labor
 () 3. Financing
 () 4. Occupation
 () 5. Others (specify).....

17. Peer Group

- 17.1 How many close friends do you have ?close friend(s).
- 17.2 Where do most of your closed friends live ?
 - () 1. In the community
 - () 2. Out the community
- 17.3 How often do you visit the close friends ?.....time(s) a month.
- 17.4 When did you start to be the close friends ?
 - () 1. Childhood
 - () 2. Classmate
 - () 3. Occupational close friends
 - () 4. Public activity close friends
 - () 5. Others (specify).....
- 17.5 What activity do you always join with your close friends?
 - () 1. Enjoyment
 - () 2. Consulting
 - () 3. Financing
 - () 4. Laboring
 - () 5. Others (specify).....

18. Activity Group

- 18.1 What activity do most groups perform in your community?
 - () 1. Saving
 - () 2. Environmental conserving
 - () 3. Politic acting
 - () 4. Public health
 - () 5. Others (specify).....
- 18.2 There are about.....member(s) for each group.
- 18.3 Do you know how the groups were formed ?
 - () 1. By the government organizations
 - () 2. By the community leaders
 - () 3. By the community members
 - () 4. Others (specify).....
- 18.4 What is the objective achievement of the activities in the community?
 - () 1. High level
 - () 2. Moderate level
 - () 3. Low level

19. Community

- 19.1 Where was your family originally located ?
 - () 1. Living here originally
 - () 2. Immigrated from somewhere
- 19.2 How long has your family lived in the community ? For.....year(s).
- 19.3 In case, your immigration from somewhere , what is the reason ?
 - () 1. Marriage
 - () 2. Occupation
 - () 3. Living with the relatives
 - () 4. Others (specify).....

19.4 What is the relationship among the community members?

- () 1. Very good
 () 2. Good
 () 3. Moderate
 () 4. Low
 () 5. Very low

20. Infrastructure

20.1 What types are most roads in your community ?

- () 1. Compressed soil road
 () 2. Asphalt road
 () 3. Cemented road
 () 4. Others (specify).....

20.2 What is the water source available in your family ?

- () 1. Rained water
 () 2. Grounded water
 () 3. River water
 () 4. Tapped water
 () 5. Others (specify).....

20.3 Is an electricity available in your family ?

- () 1. Yes
 () 2. No

20.4 Do you have any telephones in your family ?

- () 1. Yes
 () 2. No

20.5 In case, you have a house telephone. It was installed in (the year of).....

20.6 Are you comfortable to the public telephone in the community ?

- () 1. Yes
 () 2. No

21. Social Norm

21.1 What is your principle way of life?

- () 1. Folk way approach
 () 2. Normative approach
 () 3. Law approach

21.2 In case of getting an argument to your neighbors , how did you manage the conflict ?

- () 1. Forgiving each other
 () 2. Compromising by the seniority
 () 3. Law approach
 () 4. Others (specify).....

22. Traditional Activity

22.1 Are these religious activities annually provided in the community ?

- | | | | |
|--------------------------------|---------|--------|--------------|
| Makhabucha Day | () Yes | () No | () Not sure |
| Visakhabucha Day | () Yes | () No | () Not sure |
| Beginning of Buddhist Lent Day | () Yes | () No | () Not sure |
| End of Buddhist Lent Day | () Yes | () No | () Not sure |

22.2 Are these environmental activities annually provided in the community?

- Thai Heritage Conservation Day () Yes () No () Not sure
- World Heritage Day () Yes () No () Not sure
- World Environment Day () Yes () No () Not sure
- Anti – Narcotics Day () Yes () No () Not sure

22.3 How often do you make the participation on these activities ?

- () 1. Often
- () 2. Always
- () 3. Sometimes
- () 4. Rarely
- () 5. Seldom

22.4 What activity should the community be annually provided?

- () 1. Religious activities
- () 2. Personal activities
- () 3. Festival activities
- () 4. Environmental activities
- () 5. Others (specify).....

23 Ritual

23.1 What is your belief based rituals provided in the community ?

- () 1. Religious believes
- () 2. Superstition believes
- () 3. Natural believes
- () 4. Others (specify).....

24. Belief

24.1 Do you believe in superstition ?

- () 1. Yes
- () 2. No
- () 3. Not sure

24.2 What is the factor affecting people success or failure?

- () 1. God
- () 2. Destiny
- () 3. Previous world action
- () 4. Human behavior
- () 5. Others (specify).....

24.3 What is the factor affecting community progress?

- () 1. Community geography
- () 2. Government policy
- () 3. Local government policy
- () 4. People behaviors in the community
- () 5. Others (specify).....

25. Thought

25.1 What is your idea about the relation of man and environment ?

- () 1. Man being a part of environment
- () 2. Man being to invent some technologies to control nature
- () 3. All kinds in the world being impermanent

- () 4. God being the determiner for all in the world
 () 5. Others (specify).....
- 25.2 How do you always get decision making in your daily life ?
 () 1. Self- decision-making
 () 2. Consulting the experts before making decision
 () 3. Following the majority in the community
 () 4. Following a community regulation
 () 5. Let no care
- 25.3 In case of getting occupational problems , who is your assistant solving the problems ?
 () 1. Oneself
 () 2. Family members
 () 3. Community leaders
 () 4. Local organizations
 () 5. The central government

26. Values

- 26.1 Are the archeological sites beneficial to your daily life ?
 () 1. Yes
 () 2. No
- 26.2 What is the major benefit from the archeological sites in the community ?
 () 1. Education
 () 2. Occupation
 () 3. Community culture
 () 4. Relaxation
- 26.3 What is your idea about the archeological site management ?
 () 1. No management
 () 2. Applying to be mostly beneficial for daily life.
 () 3. Planing now to conserve and develop
 () 4. Depending the public policy
- 26.4 Who do you think to be the respondents for art object environment conservation and development in the community ?
 () 1. Government organizations
 () 2. Local government organizations
 () 3. People in the community
 () 4. Tourists
 () 5. Others (specify).....

27. Folklore

- 27.1 Please specify the most famous tittle of folklore in your community as the following;
 () 1. Legend entitled.....
 () 2. Tale entitled
 () 3. Folk song entitled.....
 () 4. Local Proverb entitled
 () 5. Folk Game entitled
 () 6. No idea

28. Handicraft

- 28.1 What kinds of handicraft can you produce yourself ?
- 1. Carb fish weaving
 - 2. Pottery
 - 3. Stone carving
 - 4. Traditional Thai mask
 - 5. Thai boat model
 - 6. Others (specify).....
- 28.2 What is the most famous handicraft in your community ?
- 1. Carb fish weaving
 - 2. Pottery
 - 3. Stone carving
 - 4. Traditional Thai mask
 - 5. Thai boat model
 - 6. Others (specify).....
- 28.3. Where can you provide the materials for handicraft ?
- 1. In the community
 - 2. Out the community
- 28.4. What is your objective for the handicraft production?
- 1. Being available in families
 - 2. Selling in the community
 - 3. Selling somewhere out the community
 - 4. Selling as a tourist souvenir

29. Folk Music

- 29.1 What types of folk music can you play yourself ?
- 1. Ja-ke
 - 2. Fiddle
 - 3. Xylophone
 - 4. Flute
 - 5. No ability
- 29.2 Which part is your life related to folk music ?
- 1. Producing folk music instruments
 - 2. Performing folk music
 - 3. Having owned band of folk music
 - 4. Managing a band of folk music to perform some places
 - 5. Not related to any ways.
- 29.3 There are aboutband(s) of folk music in the community.
- 29.4 What is the best occasion to perform folk music in your community ?
- 1. Personal activities
 - 2. Family activities
 - 3. Religious activities
 - 4. Community activities
 - 5. Others (specify).....

30. Folk Dance

30.1 What kinds of folk dance are you able to perform ?

- 1. Ram Wong
- 2. Traditional Thai dance
- 3. Thai musical folk dance
- 4. Mask dance drama
- 5. Others (specify).....

30.2 What opportunity do you always perform any folk dances in the community?

- 1. Personal activities
- 2. Family activities
- 3. Community activities
- 4. Religious activities
- 5. Others (specify).....

31 Painting

31.1 Are you able to painting ?

- 1. Yes
- 2. No

31.2 What is the objective of your painting ?

- 1. Hobby
- 2. Selling
- 3. Following a customer desire

31.3 What kind of painting can you do best ?

- 1. Portrait
- 2. Nature
- 3. Religious activity
- 4. Literary animals

32. Sculpture

32.1 What is your ability to any sculptures ?

- 1. Carving
- 2. Pottering
- 3. Pushing
- 4. No ability

32.2 What types have most sculptures been produced in the community ?

- 1. Carving
- 2. Pottering
- 3. Pushing
- 4. Don't know

32.3 What designs have most sculptures been produced in the community?

- 1. Imitating an ancient object
- 2. Creating a new design
- 3. Following a customer design
- 4. Don't know

32.4 What concept-based most sculptures has your community produced ?

- 1. Religion
- 2. General decoration
- 3. Nature

- () 4. Imagine
 () 5. Don't know
- 32.5 What is the objective of sculpture production in your community ?
 () 1. Decorating an owned house
 () 2. Decorating religious places
 () 3. Selling both in and out the community
 () 4. Don't know
- 32.6 In case of production for selling , who is the customer ?
 () 1. People in the community
 () 2. Thai tourists
 () 3. Foreign tourists
 () 4. Selling in some provinces
 () 5. Don't know

33. Archeological site

- 33.1 What type are most archeological sites in the community ?
 () 1. Archeological sites related the religion.
 () 2. Archeological sites related the monarch.
 () 3. Archeological sites related the city
- 33.2 How often do you visit the archeological sites in your community?
 About.....time(s) a month.

34. Community Network

- 34.1 Has your community connected with other communities on environmental conservation and development ?
 () 1. Yes
 () 2. No
- 34.2 In case of connecting with other communities , where are those located ?
 () 1. In Ayutthaya Province
 () 2. Some provinces in Thailand
 () 3. Some communities abroad
- 34.3 How often does your community annually connect with other communities on environmental conservation and development ? About....time(s) a year.

Part 2. Questions Related People's Knowledge on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Direction: Marking ✓ in () or filling completely some information in the spaces

1. What form of Ayutthaya Art Object Environment has the UNESCO certified to be the World Cultural Heritage?
 () 1. Historic Park
 () 2. Historic City
 () 3. National Culture Center
 () 4. Ancient City
 () 5. Don't know

2. The UNESCO has certified Ayutthaya Art Object Environment to be the World Cultural Heritage since (the year of)
3. What area is Ayutthaya Historic City certified by the UNESCO?
 - () 1. All parts of Ayutthaya Province
 - () 2. All parts of Ayutthaya Municipality
 - () 3. All parts of Ayutthaya Island
 - () 4. Some parts of Ayutthaya Island
 - () 5 Don't know
4. What zone is Ayutthaya Historic City being classified ?
 - () 1. Archeological zone and housing zone
 - () 2. Archeological zone and buffer zone
 - () 3. Archeological zone and public zone
 - () 4. Others (specify).....
5. Are people able to live in the archeological zone?
 - () 1. Yes
 - () 2. No
 - () 3. Not sure
6. What organizations are the respondents for art object environment conservation and development in Ayutthaya Historic City?
 - () 1. Department of Fine Art
 - () 2. Ayutthaya Municipality and Ayutthaya Province
 - () 3. Tourism Authority of Thailand, Office of the Royal Treasure, Office of City Planing and Ministry of Sciences, Technology and Environment
 - () 4. Department of Religion, Department of Industry Promotion and Department of Finance
 - () 5. All choices
7. What are the components of environment?
 - () 1. Soil, water, air and energy
 - () 2. Plants and animals
 - () 3. Man and his culture
 - () 4. Both natural and man-made resources
 - () 5 All choices
8. What aspects should the people participate to the art object environment conservation and development in Ayutthaya Historic City?
 - () 1. Participation on getting more income
 - () 2. Participation on performing to the plan or the project
 - () 3. Participation on donating some money or materials
 - () 4. All choices
9. What are the advantages of art object environment conservation and development?
 - () 1. Conserving and developing culture
 - () 2. Conserving and developing natural resources
 - () 3. Being beneficial to education and research

- () 4. All choices
10. As the government saying that the World Cultural Heritage of Ayutthaya Historic City should be conserved and developed through a form of **“Living Historic City”**, what does **“Living Historic City”** mean?
- () 1. Restoring the archeological sites to be the originality as in Ayutthaya period
() 2. People living freely somewhere in the historic city
() 3. Providing an appropriated area for their living
() 4. All choices
11. What is the principle concepts-based for art object environment conservation and development?
- () 1. Sustainability
() 2. Restoration
() 3. Preservation
() 4. All choices
12. What is the approach to conserve and develop art object environment in the community?
- () 1. Housing in the archeological zone to take closely care the art object
() 2. Only government organization being the respondent for art object environment conservation and development
() 3. Deconstructing the old style art object and creating the new modern one
() 4. Housing the same style to the art objects in the community
() 5. Living the same style as the ancient ways of life.
13. Do you know that where the archeological zone covers?
- () 1. Yes
() 2. No
14. What is the indicator to people’s participation on art object environment conservation and development in Ayutthaya Historic City?
- () 1. Art object environment being the representative of the past civilization
() 2. Art object environment determining the present ways of life
() 3. Art object environment being cultural resource to make more income
() 4. People getting directly impacts from art object environment
() 5. All choices
15. What are the factors affecting its goal achievement on art object environment conservation and development in the community?
- () 1. Number of people participating to a project
() 2. Knowledge and management process on art object environment conservation and development
() 3. Materials
() 4. Budget
() 5. All items mentioned

Part 3. Questions Related People's Attitude, Skill and Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Direction: Marking ✓ in each space

3.1 People's Attitude on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Activity	Attitude Levels		
	High	Moderate	Low
1. Art object environment in the World Cultural Heritage of Ayutthaya Historic City effects to people ways of life among community, national and international levels.			
2. Affection to art object environment in the community			
3. Intention to art object sustainable existence for new generations			
4. Art object environment in Ayutthaya Historic City should be conserved and developed by all related.			
5. Art object environment in Ayutthaya Historic City is occupied by all, not the government organizations only.			
6. People in the community should continue their participation on art object environment conservation and development.			
7. Ayutthaya Historic City should be promoted to be the cultural tourism attraction.			
8. Tourists should also pay their participation on art object environment conservation and development in Ayutthaya Historic City.			
9. The conservation and development for art object environment in the community should be supportably performed to occupation and quality of life.			
10. People and art object environment can be supportably living each other.			
11. The conservation and development for art object environment in Ayutthaya Historic City should be started at the government policy.			
12. Local organizations should be the leader motivating villagers participating on art object environment conservation and development in the community.			
13. The community leaders should pay more interest in conservation and development on art object environment in Ayutthaya Historic City.			

3.1 People’s Attitude on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Activity	Attitude Levels		
	High	Moderate	Low
14. Educational organizations should related art object environment conservation and development.			
15. The organizations related art object environment in Ayutthaya Historic City should provide the training to fulfil people on knowledge , attitude, skill and participation on its conservation and development.			

3.2 People’s Skill on Art Object Environment Conservation and development in the World Cultural Heritage of Ayutthaya Historic City

Activity	Skill Levels		
	High	Moderate	Low
1. You can restore an art object environment to be the original form.			
2. You can give tourists the instruction related how to perform while they are visiting the art object source.			
3. You can explain the significance and history of archeological sites in the community.			
4. You can give tourists the direction to archeological sites in the community.			
5. You can speak English to foreign tourists.			
6. You can prevent an art object environment from some natural disasters.			
7. You can manage the condition surrounding an art object environment to be clean and beautiful.			
8. You can live economically.			
9. You can be a leader for art object environment conserving and developing in the community.			
10. You can make your resident style according to the community art object environment style.			
11. You can make plans for art object environment conservation and development in the community.			
12. You can manage the project for art object environment conservation and development in the community.			

3.2 People's Skill on Art Object Environment Conservation and development in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Activity	Skill Levels		
	High	Moderate	Low
13. You can evaluate the project for art object environment conservation and development in the community.			
14. You can make a group for art object environment conservation and development in the community.			
15. You can make a network for art object environment conservation and development in the community.			

3.3 People's Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Activity	Participation Levels		
	High	Moderate	Low
1. You have donated some money or things to a group working for art object environment and development in the community.			
2. You have been a consultant for the group mentioned.			
3. You have made participation on the conference related art object environment conservation and development in the community.			
4. You have performed the activities related art object environment conservation and development in the community.			
5. You have made some distributions, public relations, campaigns or persuasions to others joining the activity for art object environment conservation and development in the community.			
6. You have restored some art object environment in the community.			
7. You have been servile to prevent the destruction of art object environment in the community.			
8. You have prevented and improved some art object environment from natural disaster.			
9. You have got more income from your occupation in the community.			
10. You have been pleasure of the ancient cultural heritage in the community.			

3.3 People’s Participation on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Activity	Participation Levels		
	High	Moderate	Low
11. You have supported a good environment in the community.			
12. You have spent your time for relaxation in the area of art object environment.			
13. You have used the art object environment in the community as the source for studying.			
14. You have got better infrastructure due to the project of art object environment conservation and development in the community			
15. You have evaluated the projects related art object environment conservation and development in the community.			

Part 4. Questions Related Problems and Recommendations on Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Direction: Filling the answer in the space of each question

1. Identifying 3 problems on art object environment conservation and development in the world Cultural Heritage of Ayutthaya Historic City (Please provide as priority from the most significant to the least)
 - 1.1 A problem of
 - 1.2 A problem of
 - 1.3 A problem of
2. Giving the recommended solutions for each problem mentioned
 - 2.1 A problem of
A recommended solution.....
 - 2.2 A problem of
A recommended solution
 - 2.3 A problem of
A recommended solution
3. Identifying 3 recommendations that the government officers can perform to support progressively the people participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City
 - 3.1.....
 - 3.2.....
 - 3.3.....

STRUCTURED INTERVIEW FORM

ENTITLED
COMMUNITY–CULTURES BASED ENVIRONMENTAL
EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY

The purpose of this structured interview form is to collect the information from the local experts on community-cultures in the World Cultural Heritage of Ayutthaya Historic City. Thus, it is classified to be 6 parts as the following;

- Part 1.** Personal information
- Part 2.** Resident settlement
- Part 3.** The World Cultural Heritage of Ayutthaya Historic City
- Part 4.** Community- Cultures
- Part 5.** People’s function, role and participation on art object environment conservation and development in the community
- Part 6.** Problems and recommendations related people ways of life supporting art object environment conservation and development in the community

No.
Interviewer.....
Dated on.....

Part 1. Personal Information

- 1.1 Full - name.....
- 1.2 Aged..... years old
- 1.3 Religion.....
- 1.4 Marital status.....
- 1.5 Occupation.....
- 1.6 Income per year.....
- 1.7 Present address.....
- 1.8 Social status.....
- 1.9 Experiences.....
- 1.10 Others (specify)

Part 2. Resident Settlement

- 2.1 How long have you lived in the community?
- 2.2 Where was the originality of your family?
- 2.3 How did the people occupy the residential area in the community?
- 2.4 What is the relationship among the community members?
- 2.5 What is the trend of your community development in the future?

Part 3. The World Cultural Heritage of Ayutthaya Historic City

- 3.1 Do you agree that UNESCO certified Ayutthaya Art Object Environment to be the World Cultural Heritage? Why?
- 3.2 In case of the Community Cultural Heritage certified to be the World Cultural Heritage, what advantages have the people been getting or losing?

Part 4. Community- Cultures

4.1 Concept Culture

- 4.1.1 Have you any idea about the relationship between man and environment?
- 4.1.2 What knowledge do the people have to get for their participation on art object environment conservation and development in the community?
- 4.1.3 Do you think the community art object environment should be conserved and developed or not? Why?
- 4.1.4 Have you any idea about the people behaviors supporting the art object environment conservation and development in the community?
- 4.1.5 Which do you think to make influences to your life among nature, science, superstition (black magic), and religion?
- 4.1.6 What religion do you believe in?
- 4.1.7 What is the principle of your religious teaching?
- 4.1.8 How much have you applied your religious teaching for the daily life?

4.2 Organization Culture

- 4.2.1 Have you lived in nuclear or extended family?
- 4.2.2 How many children do you have?
- 4.2.3 Where do most of your relatives live? In or out the community?
- 4.2.4 What is the independence between you and your relatives?
- 4.2.5 What is the independence between you and your close friends?
- 4.2.6 What activities do most groups perform in the community?
- 4.2.7 How much have you made participation on the group activities?
- 4.2.8 Do the people in the community make a community network?
How often?

4.3 Usage Culture

- 4.3.1 Which is the best social norm among folkway, mores and law?
- 4.3.2 How often do you usually get self-learning in your life?
- 4.3.3 Are your expenses and income monthly balanced?
- 4.3.4 Do you make any saving? How much is it for a month?
- 4.3.5 How do you give help to others?
- 4.3.6 Have you any idea about herbal medicine in the community?
- 4.3.7 How often do you make participation on the traditional activities in the community?
- 4.3.8 What is the best traditional activity supporting art object environment conservation and development in the community?
Why?
- 4.3.9 How have you been a part with art object environment conservation and development in the community?
- 4.3.10 What is the cultural tourism effecting to people in the community?

4.4 Object Culture

- 4.4.1 What is the relationship between mind and object development?
- 4.4.2 What is the relationship between object culture and natural resource?
- 4.4.3 Is your residence located in the archeological zone?
- 4.4.4 What do you think to be effected to man by technology?
- 4.4.5 What do handicrafts effect to the community?
- 4.4.6 What is the relationship between infrastructure and art object environment conservation and development in the community?
- 4.4.7 What is the relationship between arts and people ways of life in the community?

Part 5. People's Function, Role and Participation on Art Object Environment Conservation and Development in the Community

- 5.1 What should people do for art object environment conservation and development?
- 5.2 Do you think that people's knowledge, attitude and skill effecting to participation on art object environment conservation and development in the community?
- 5.3 How much have people made the participation on art object environment conservation and development in the community? Why?
- 5.4 How do you make people participating on art object environment conservation and development in the community?

Part 6. Problems and Recommendations Related Ways of Life Supporting Art Object Environment Conservation and Development in the Community

- 6.1 What is the major problem in the community?
- 6.2 What is the solution for the problem mentioned?
- 6.3 What activities do you recommend to support efficiently people's participation on art object environment conservation and development in the community?

MODEL EFFICIENCY EVALUATION FORM

ENTITLED

**COMMUNITY–CULTURES BASED ENVIRONMENTAL
EDUCATION: A CASE STUDY FOR THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY**

The purpose of this form is to evaluate the Model Efficiency of Environmental Education: A Case Study for the World Cultural Heritage of Ayutthaya Historic City. Thus, the evaluation is made both pre and post-environmental education process with 5 parts as the following:

- Part 1.** Questions related knowledge on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City
- Part 2.** Questions related attitude on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City
- Part 3.** Questions related skill on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City
- Part 4.** Questions related participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City
- Part 5.** Questions related satisfaction on a Model of Community-Cultures Based Environmental Education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City

- Remark:**
- 1. Part 1-4 is for Pre-Evaluation while Part 1-5 is for Post-Evaluation
 - 2. The question in part 1-4 is similar to the questionnaire mentioned before, so this form presents only part 5.

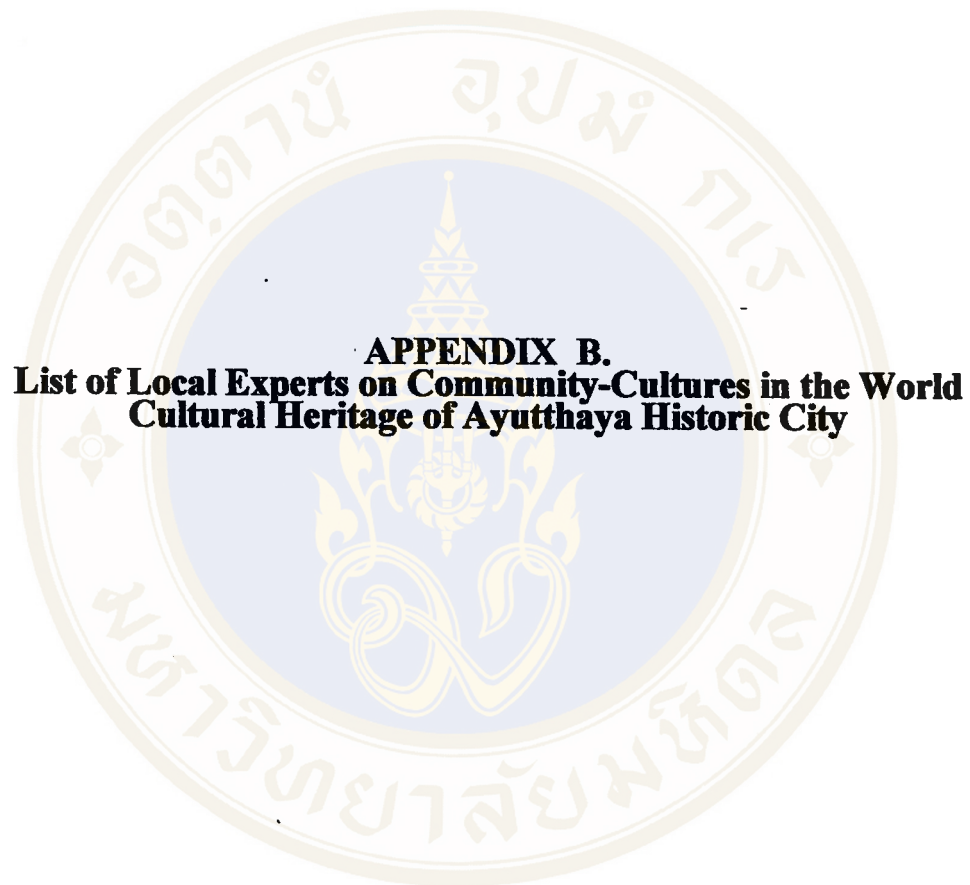
Part 5. Questions Related to Satisfaction on a Model of Community-Cultures Based Environmental Education for Art Object Environment in the World Cultural Heritage of Ayutthaya Historic City

Direction: The trainee doing ✓ in the spaces

Activity	Satisfaction Levels				
	Very Good	Good	Moderate	Low	Very low
1. Process Management					
1.1 A participatory environment education process which was consisted of in and out class training, single and group discussion, self-learning and instructed learning, pre and post evaluation together with participatory observation. etc.					
1.2 3-day-training					
1.3 Weekend training					
1.4 Sequence of activities					
1.5 The contents consisted of environment, the World Cultural Heritage of Ayutthaya Historic City, art object environment conservation and people's participation on art object environment conservation and development in the community.					
1.6 Numbers of officer					
1.7 Trainees getting care					
1.8 Supplementary document for training					
2. Instructors					
2.1 Knowledge					
2.2 Ability to training					
2.3 Intention to training					
3. Trainees					
3.1 Participation					
3.2 Training advantages					

Part 5. Questions Related to Satisfaction on a Model of Community-Cultures Based Environmental Education for Art Object Environment in the World Cultural Heritage of Ayutthaya Historic City (cont.)

Activity	Satisfaction Levels				
	Very Good	Good	Moderate	Low	Very low
3.3 The training project can be applied to art object environment conservation and development in the community.					
3.4 The training project can be applied to quality to quality of life development.					
3.5 There will be possible to do the training like this for other target groups in the future.					
4. Place, Food, Drinks and Transportation					
4.1 Training room					
4.2 Instruments for training					
4.3 Food					
4.4 Drinks					
4.5 Transportation					



**List of Local Experts on Community-Cultures in the World
Cultural Heritage of Ayutthaya Historic City**

No.	Full-Name	Qualification	Address
1.	Mr. Panya Namphet	74 years old, being now chairman of Phramongkonbophit Foundation	3/17 Moo 1 Dachawuth Road Praturchai Sub-district Ayutthaya Province Tel. (035) 241819
2.	Mr. Phoj Phunsawat	74 years old, being now chairman of Ayutthaya Youth Buddhism Foundation	T. 21/23 U-thong Road Thawasukri Sub-district Ayutthaya Province Tel. (035) 241670
3.	Phrakru Phatarakitsophon	72 years old, being now the abbot of Wat Buddhaisawan	Wat Buddhaisawan Samphaolom Sub-district Ayutthaya Province Tel. (035) 242555
4.	Phra Atikan Sukrithawaro	61 years old, being now the abbot of Wat Ayothaya	Wat Ayothaya Huntra Sub-district Ayutthaya Province Tel. (035) 242543
5.	Mrs. Jirapan Pimpan	65 years old, being now chairman of Ayutthaya Cultural Council	45 Moo 1 Chekun Road Phratuchai Sub-district Ayutthaya Province Tel. (035)241559
6.	Mr. Phaitoon Khawmala	64 years old, being now chairman of Ayutthaya Thai Boat Museum	12 Moo 1 Bang-ian Road Phratuchai Sub-district Ayutthaya Province Tel. (035) 241195
7.	Asst. Prof. Sutham Chatasing	Vice Director of Ayutthaya Ratchabhat Institute	Ayutthaya Ratchabhat Institute Tel.(01) 8535823
8.	Asst. Prof. Sang Pornsi	Lecturer of Ayutthaya Ratchabhat Institute	Ayutthaya Ratchabhat Institute Tel.(01) 9815472

List of Local Experts on Community-Cultures in the World Cultural Heritage of Ayutthaya Historic City (cont.)

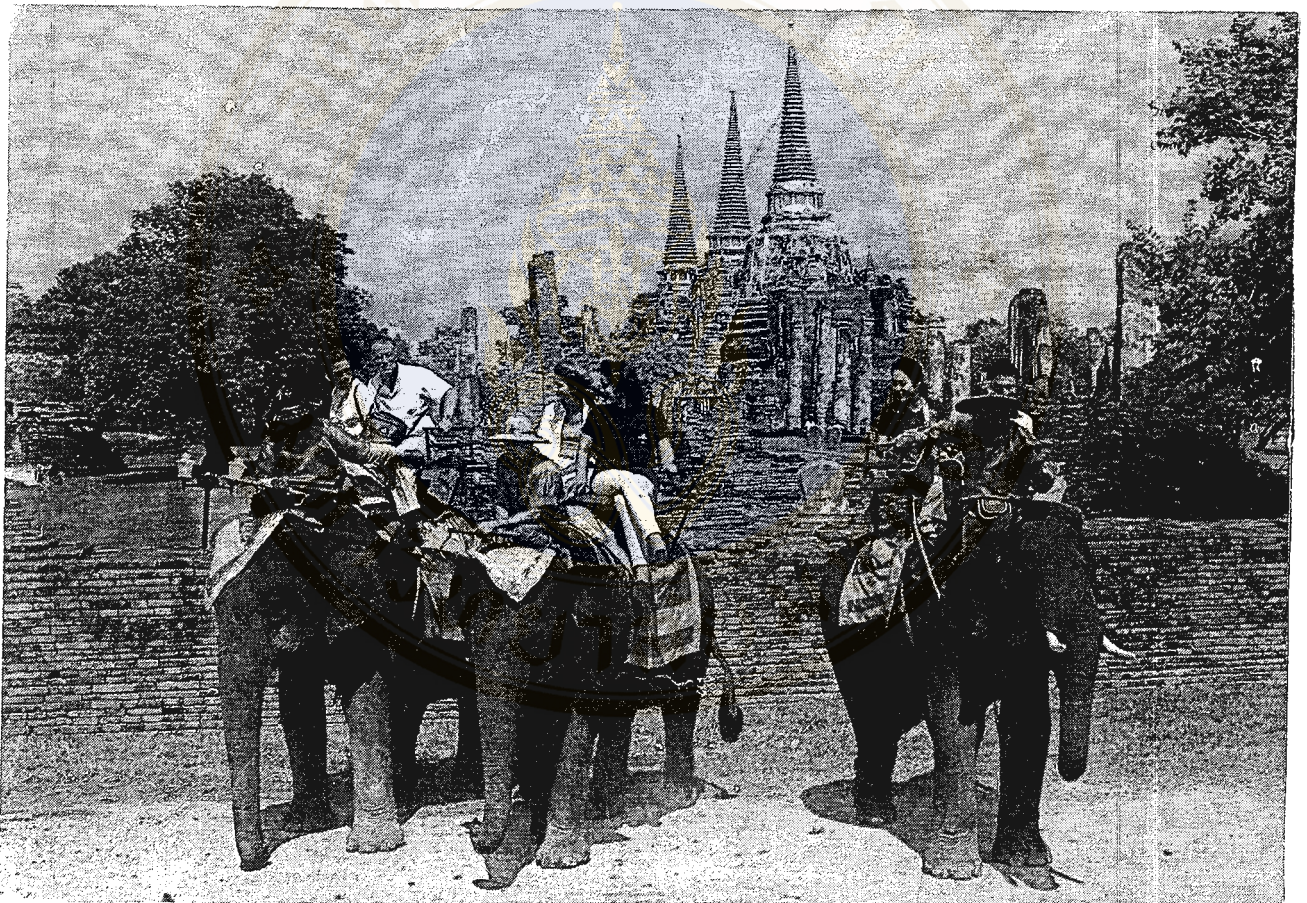
No.	Full-Name	Qualification	Address
9.	Dr. Pathomphong Suphalert	Vice Director of Jirasartwitaya school	Jirasartwitaya school Ayutthaya Province Tel.(035) 241559
10.	Mr.Phansawat Suksawat	45 years old, doing his own occupation as a traditional mask producer	T.5/1 Moo 1. U-thong Road Thawasukri Sub-district Ayutthaya Province Tel. (035) 241574
11.	Mr. Soonthon Sowapi	65 years old, doing his own occupation as a stone carving producer	27 Moo 4. Behind Wat Siphon Khlom Sabua Sub- district Ayutthaya Province Tel. (035) 328788
15.	Mr. Charern Khantharuji	44 years old, being now the head of Akansongkraoh Community	Kh. 19/12 Dachawuth Road Horatanachai Sub- district Ayutthaya Province Tel. (035)210764

The image features a large, faint watermark of the Mahidol University logo in the background. The logo is circular, with a blue center containing a golden emblem of a seated figure. The Thai text "มหาวิทยาลัยมหิดล" (Mahidol University) is written around the bottom inner edge, and "อุบผ กว" (Uph Kwa) is written around the top inner edge.

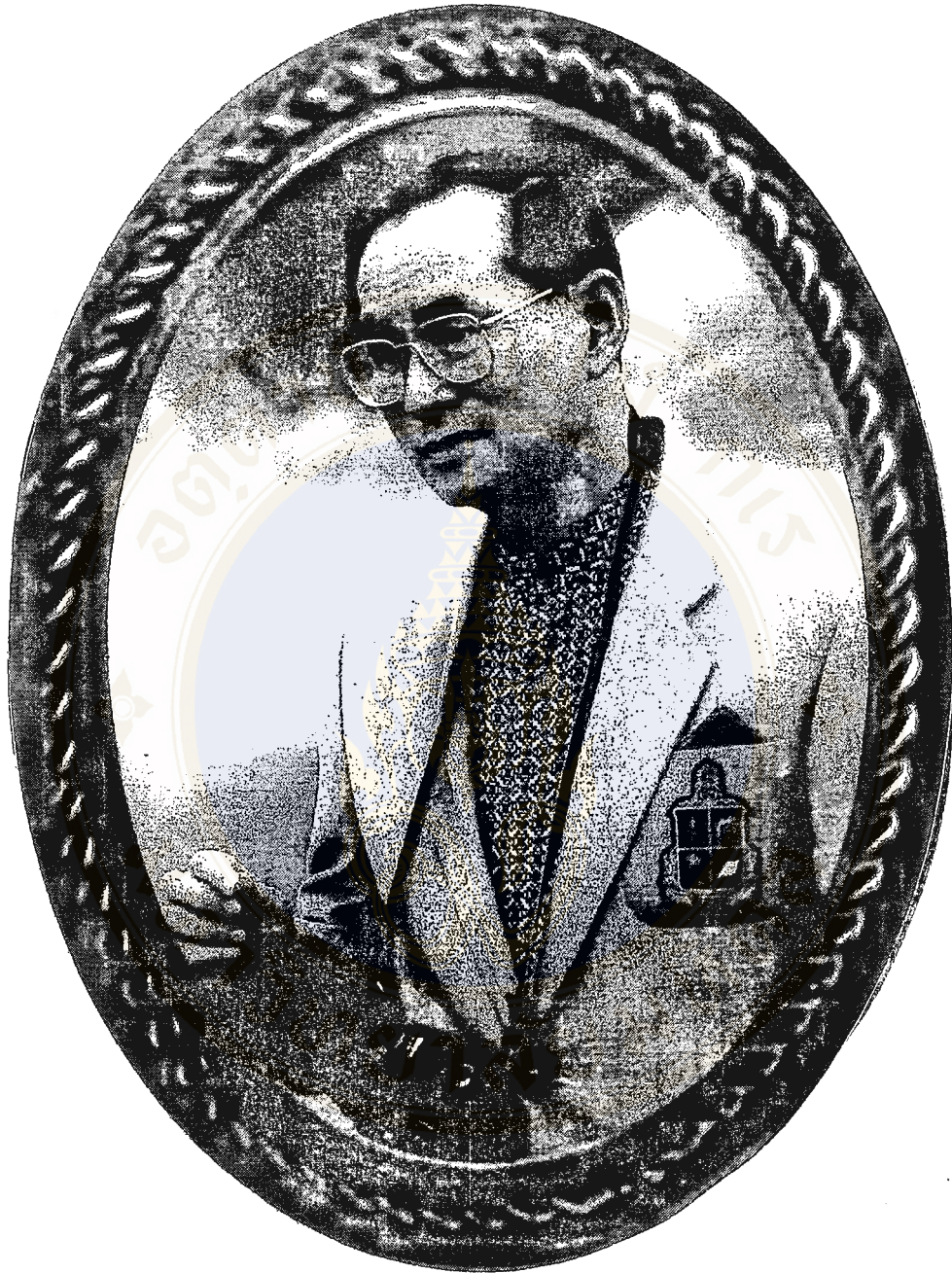
APPENDIX C.
Model of Community-Cultures Based Environmental Education

COMMUNITY – CULTURES BASED
ENVIRONMENTAL EDUCATION:

**A CASE STUDY FOR THE WORLD CULTURAL HERITAGE OF
AYUTTHAYA HISTORIC CITY**



**The Document Submitted in Partial Fulfillment of
the Requirement for the Degree of Doctor of Education
(Environmental Education)
Faculty of Graduate Studies, Mahidol University**



***An archeological site being honorable for the nation,
even an old brick only being still valuable to be conserved,
if we have had no Sukhothai, Ayutthaya and Bangkok,
Thailand is being not meaningful.***

(The King's Speech while visiting Ayutthaya in 1963 A.D.)

PREFACE

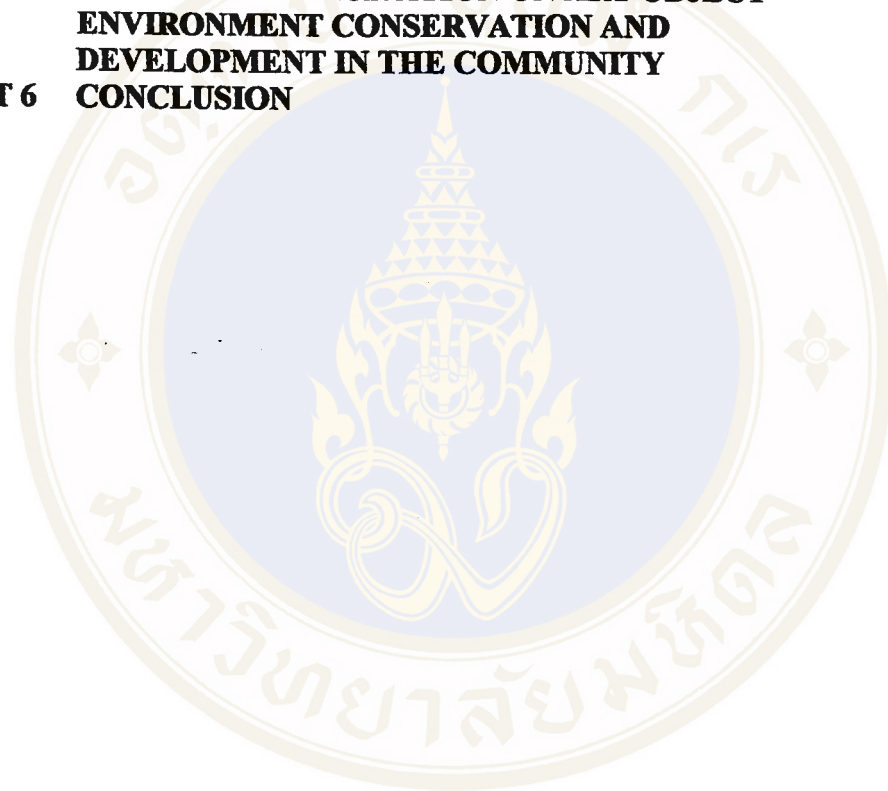
A Model of Community-cultures Based Environmental Education for art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City was made for not only being a doctoral dissertation in Environmental Education, Mahidol University, but also presenting it to *“A Committee of Ayutthaya Local Art Object Environment Conservation and Development”* which is responsible to develop the people getting knowledge, attitude, skill and participation on art object environment conservation and development in the World Cultural Heritage of Ayutthaya Historic City. Thus, the community art object environment should be what *“valuable”* and *“beneficial”* existence in accordance with *“quality of life”* in the community as the philosophy of community development mentions that *“Sustainable Development is the development concerning quality people in quality environment”*. Therefore, the community-cultures must be based environment education to make people paying more participation on art object environment conservation and development in the community.

Although the researcher paid highly intention to study, to survey and to get consult both in and out the community experts, but the model was considered to be not complete. Giving back any errors or suggestions to make it more complete is the researcher's expectation; thus, for being sustainable and valuable existence of the art object environment in the World Cultural Heritage of Ayutthaya Historic City at all.

Weera Rawang
December, 2000

CONTENTS

- UNIT 1 INTRODUCTION**
- UNIT 2 ENVIRONMENT**
- UNIT 3 THE COMMUNITY OF THE WORLD CULTURAL
HERITAGE OF AYUTTHAYA HISTORIC CITY**
- UNIT 4 A CONCEPT FOR ART OBJECT ENVIRONMENT
CONSERVATION AND DEVELOPMENT**
- UNIT 5 PEOPLE'S PARTICIPATION ON ART OBJECT
ENVIRONMENT CONSERVATION AND
DEVELOPMENT IN THE COMMUNITY**
- UNIT 6 CONCLUSION**



LIST OF TABLES

- Table 1. A Classification of Environment**
Table 2. The Factors Related Community – Cultures
Table 3. A List of the Monarchs During Ayutthaya Civilization Period

LIST OF FIGURES

- Figure 1. A Model of Community – Cultures Based Environmental Education for Art Object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City**
Figure 2. A Classification of Culture Levels
Figure 3. Cultures Supporting Community Sustainable Environment
Figure 4. A Model of Community Development in the World Cultural Heritage of Ayutthaya Historic City
Figure 5. Problems and Causes of Art Object Environment Destruction
Figure 6. Principles, Approaches and Methods for Art Object Environment Conservation and Development
Figure 7. A Concept for Art Object Environment Conservation and Development
Figure 8. A Model of Art Object Environment Conservation and Development
Figure 9. A Participation Process for Art Object Environment Conservation and Development



*The first group conserving the City of Ayutthaya in 1967 A.D.
Front: Phraya Anumanratchathon
and Phravorawongther Krommuen Pitayalapputiyakorn*

UNIT 1

INTRODUCTION

The community sustainable environment can exist through the concept of conservation and development. The conservation is defined as maintaining the original resources to be not reduced while the development is defined as improving them to be more beneficial. Due to culture is nature adaptation to benefit man, so human ways of life; concept, organization, usage and object may effect to natural environment. The community art environment conservation and development is considered to be one of the approaches enlarging the duration of application, reducing natural environment destruction and its impacts to both physical and biological environment. This is the reason why people's participation, not only the government or local organizations but also the private organizations, tourists and all related were major factors for art object environment conservation and development in the community. Especially, the villagers should have awareness, knowledge, attitude, skill, participation and ability to evaluate the social activities or natural disasters, which may make negative impacts to art object environment and quality of life in the community.

Due to art object environment conservation and development is considered to be a community activity, so "*Group Forming*" is necessary to produce "*Group Power*" driving to art object environment conservation and development in the community. As Phra Thamapitaka (P.A. Payutto, 1996: 237-238) said that group will be getting higher success if its member begins the first step at "*human development*" to produce "*developed human*" for "*activity development*" in a community.

This is the reason why a model of community-cultures based environment education made through 3 stages; firstly, educating the community-cultures, secondly evaluating the levels of knowledge, attitude, skill and participation on art object environment conservation and development in the community, and finally constructing a model of community-cultures based environment education.

Thus, the data analysis through SWOT Technique Analysis (Strength-Weakness-Opportunity-Threat: SWOT) based on the information of community and community-cultures made the researcher constructing a model of community-cultures based environment education. It was consisted of goal, method, input and time frame.

As the model in Figure 1 indicates that the goal achievement of the community art object environment conservation and development can be attained to both individual and community activities through formal, non-formal and informal education system facing people's participation. The individual activity; however, should be firstly doing a group formation for collecting people who are interesting in art object environment conservation and development, secondly doing the environmental

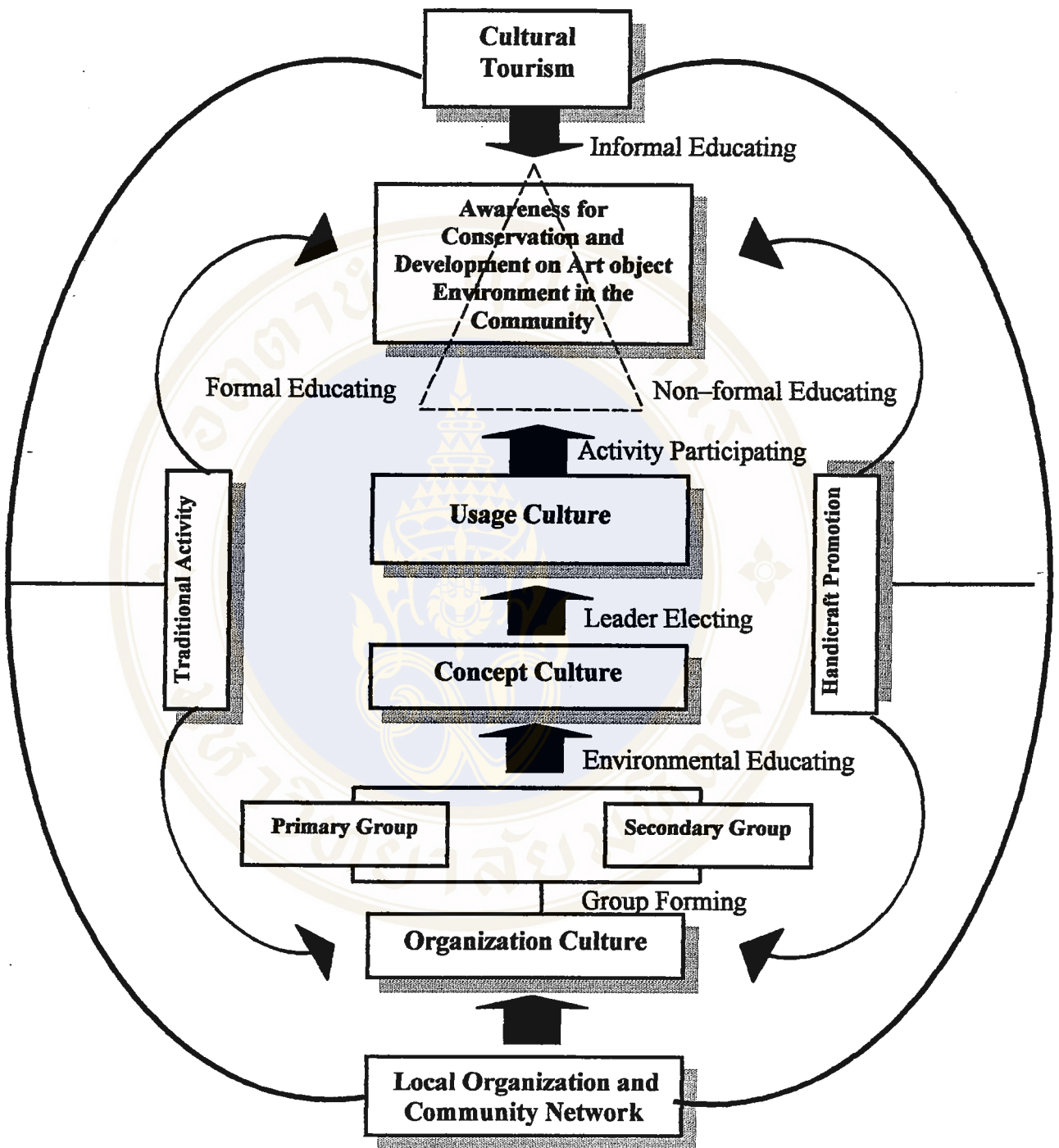


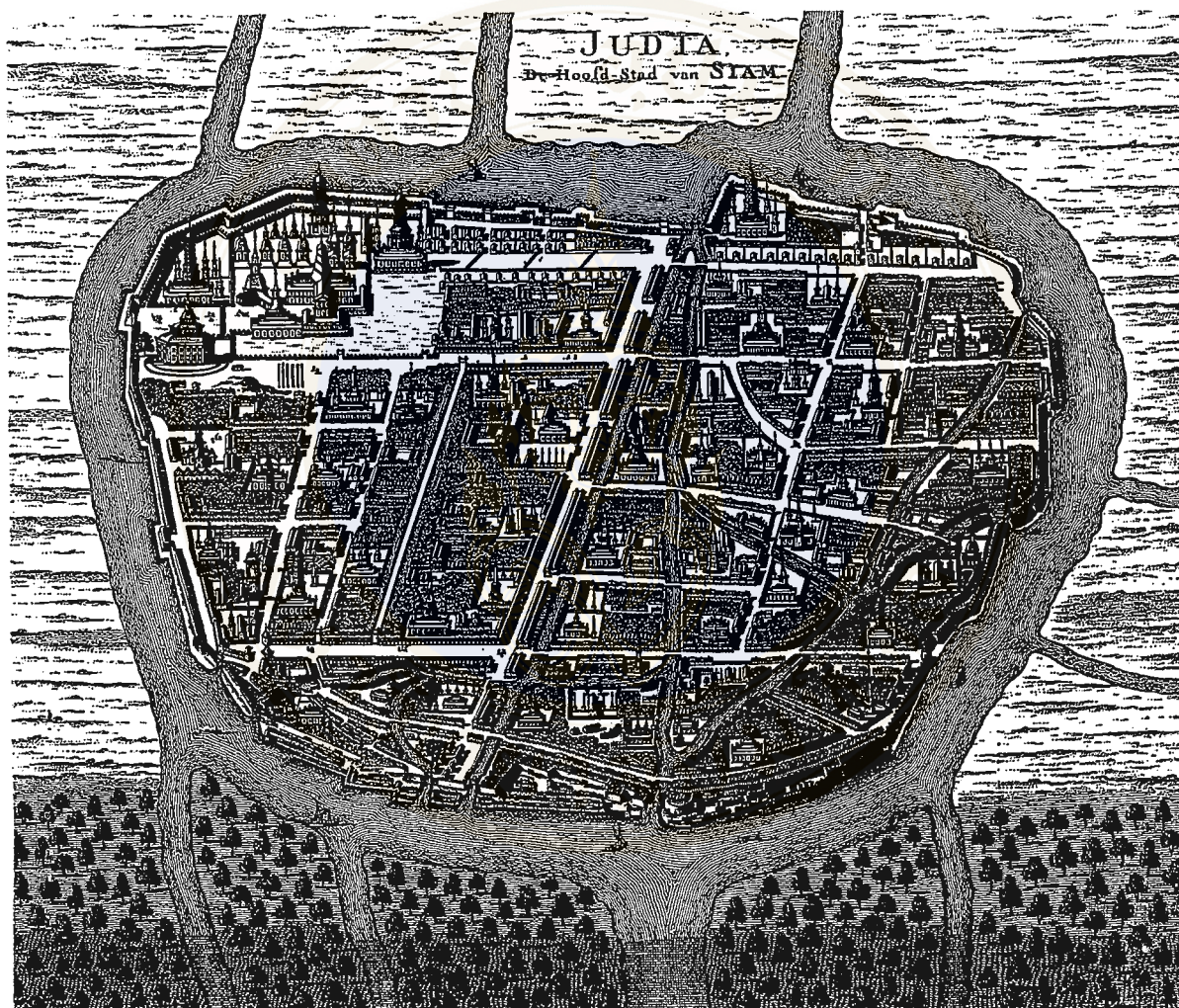
Figure 1. A Model of Community – Cultures Based Environmental Education for Art object Environment Conservation and Development in the World Cultural Heritage of Ayutthaya Historic City

Source: The Research Findings

education for improving people's awareness, knowledge, attitude, skill, participation and ability to evaluate the social activities effecting to quality life and the community environment, thirdly doing a leader election for being a group manager, and finally doing an activity participation on the community art object environment conservation and development. While the community activity should also cover 4 parts; traditional activity, handicraft promotion, cultural tourism together with local organization and community network.

Seeing that the effective performance of individual activity in accordance with community activity can make the sustainable art object environment supporting quality of life through a process of community-cultures based environmental education.

However, It is concluded that the existence of quality environment depends on cultures or ways of life in a community. Thus, the community-cultures which are consisted of concept, organization, usage and object should run to the condition of sustainable environment. As the culture faces human being as a part of natural world (concept culture). All the world parts are united each other (organization culture). The activities for man living should also support nature living (usage culture). And a new object construction should not deconstruct natural resources in the same way (object culture). The cultures being similar to this can be considered to be *"the way of life supporting the sustainable world of life"* as well.



*A Map of Ayutthaya Island
By Francois Valentyn in 1726 A.D.*

UNIT 2

ENVIRONMENT

2.1 Introduction

The world existing for all, even natural environment or man-made environment. Human being as a partial environment should not perform any activities that may damage the nature balance. It is believed that *“nature destruction today is considered to be self–destruction in the future”* and *“cultures is focusing on nature adaptation to benefit man”* However, the people should have got awareness for not taking over self-adaptation of nature balance. There are many ways to make them getting awareness but the best sustainable one is *“Environmental Education”*.

2.2 Environment

The meaning of environment covers both oneself and what surroundings. It can be classified to natural and man-made environment as in table 1.

Table 1. A Classification of Environment

Environment					
Natural Environment			Man - Made Environment		
Physical Environment	1. soil	Abstractive Environment		Non-Abstractive Environment	
	2. water				
	3. air	concept culture	organization culture	usage culture	object culture
	4. mineral and energy				
Biological Environment	1. plant				
	2. animal				

The natural environment is defined as what originated by nature while the man-made or cultural environment is defined as what created by man. However, the natural environment is consisted of physical and biological environment. Thus, the physical environment being as soil, water, air and energy while the biological environment being as plants and animals including human as well. Moreover, the man-made or cultural environment including concept, organization, usage and object culture as well.

Table 2. The Factors Related Community-Cultures

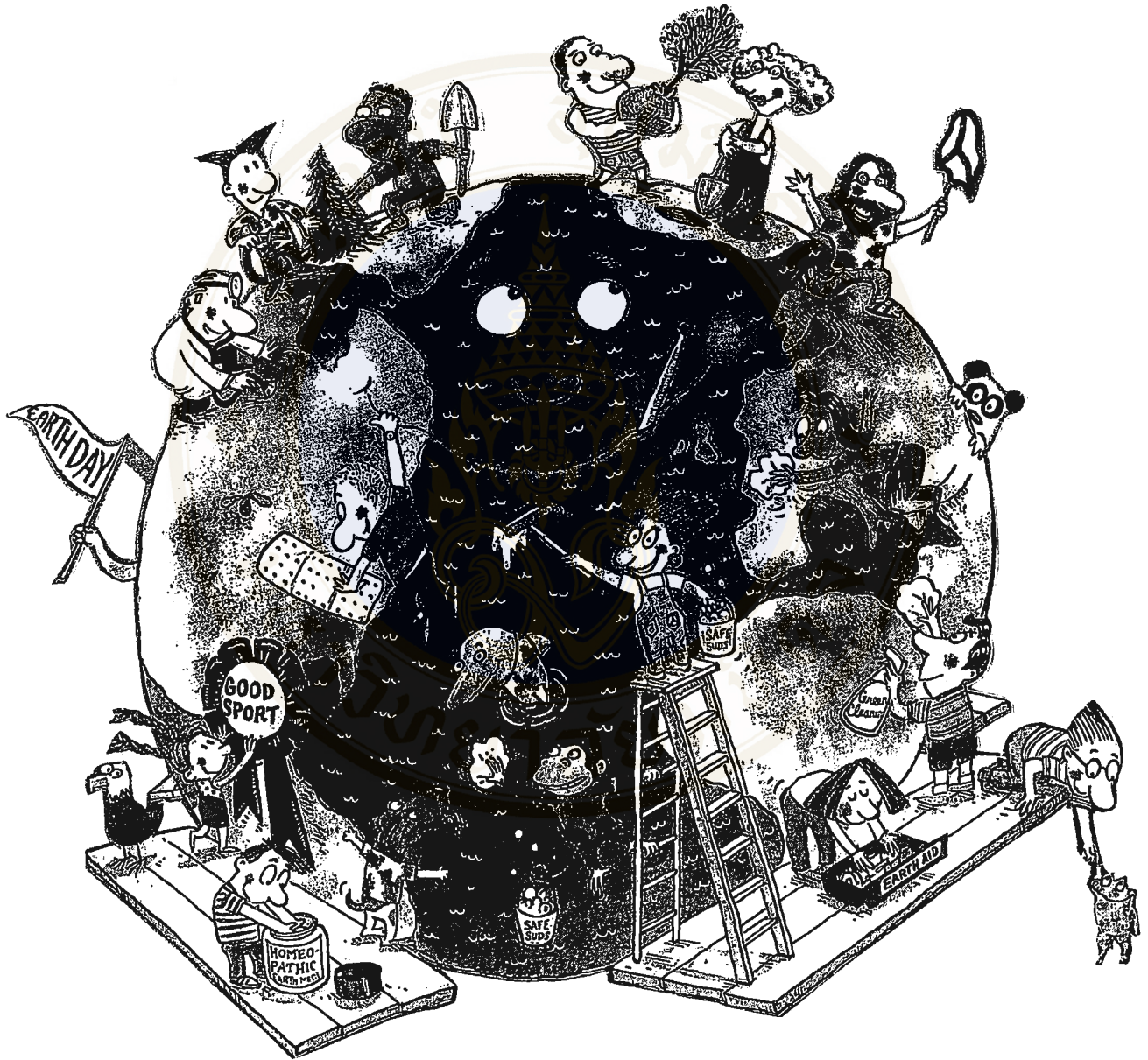
Concept Culture	Organization Culture	Usage Culture	Object Culture
1. thought 2. knowledge 3. attitude 4. values 5. belief 6. religion	1. family 2. relatives 3. peer group 4. activity group 5. community 6. community network	1. language 2. social norm 3. education 4. occupation 5. income 6. consumption 7. saving 8. herbal medicine 9. traditional activity 10. participation 11. skill 12. ritual 13. folklore	1. costume 2. residence 3. instrument 4. handicraft 5. infrastructure 6. painting 7. folk dance 8. folk music 9. sculpture 10. archeological site

The scientist has explained that the world was originated for over 4,600 million years by the sun scar. Counting back from now to the past for 3,000 million years was the origination of uni-cell biotic, 2,400 million years back was for complex tissue biotic. Especially, dinosaurs which occupied the world at the last 225 million years and became extinct at 65 million years ago. Then, what being like man appeared to the world at the last 5 million years and developed to be like the present human being around 100,000 years ago. The man lived in the natural cave around 10,000 years and made their living through plantation unit walking to the age of industrial revolution in 1750 A.D. or 250 years ago, then going to the computer age at the last 25 years. Seeing that *“human being what very small when compare with nature”*. Therefor, the ways of life without caring to nature may be the short cut way to damage *“human generation”* in the future as well.

2.3 Culture Levels

Each part of the world has differently identified in natural environment, even geography, climate, plants and animals. Therefor, the people living in the different parts of the world have the different methods for natural resources adapting to benefit their ways of life. This is the reason why a community has its own distinctive cultures called *“Community Cultures”*. When the community- cultures connecting its network may make the bigger area of cultures called *“National Cultures”* before being *“international cultures”* in the global level. So, the cultures may be classified into 3 levels as community, national and international cultures as in figure 2.

HEALTHY PEOPLE IN HEALTHY ENVIRONMENT



Independent Living of Human and Environment

Copyright by Mahidol University



Figure 2. A Classification of Culture Levels
Source: Ministry of Education, 1995: 84

2.4 Relationship of Cultural and Natural Environment

Man is a part of biological environment. However, man is rather different to other biotic. That is; man can improve rapidly and complexly self-development. This makes man separating from other sorts of life and to create his own methods adapting nature to benefit their existences. The process mentioned is called *“culture or ways of life”* which Phra Thamapitaka (P.A. Payutto, 1994: 11-15) has said, *“any levels of culture must not force the natural regulation”*. Thus, the eternal fact is what related to natural regulation called *“truth”*. If we need natural world living supportably together with the people world, the people should have *“ethic”* being the connection between *“culture and truth”* so *“way of life or culture in an ethic frame is the major approach affecting quality people in quality environment”* as the figure 3.

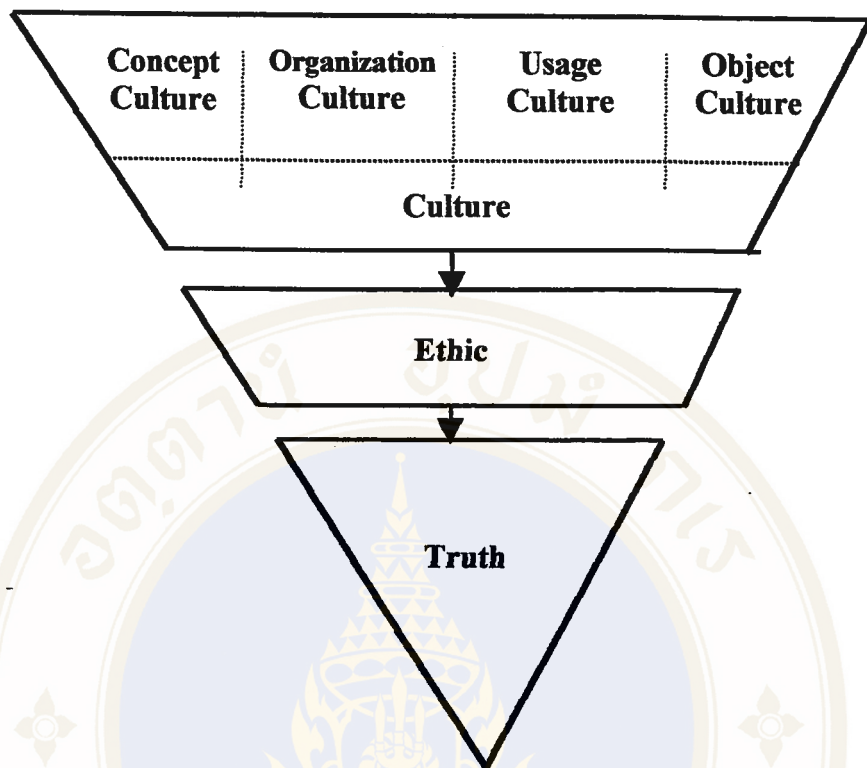
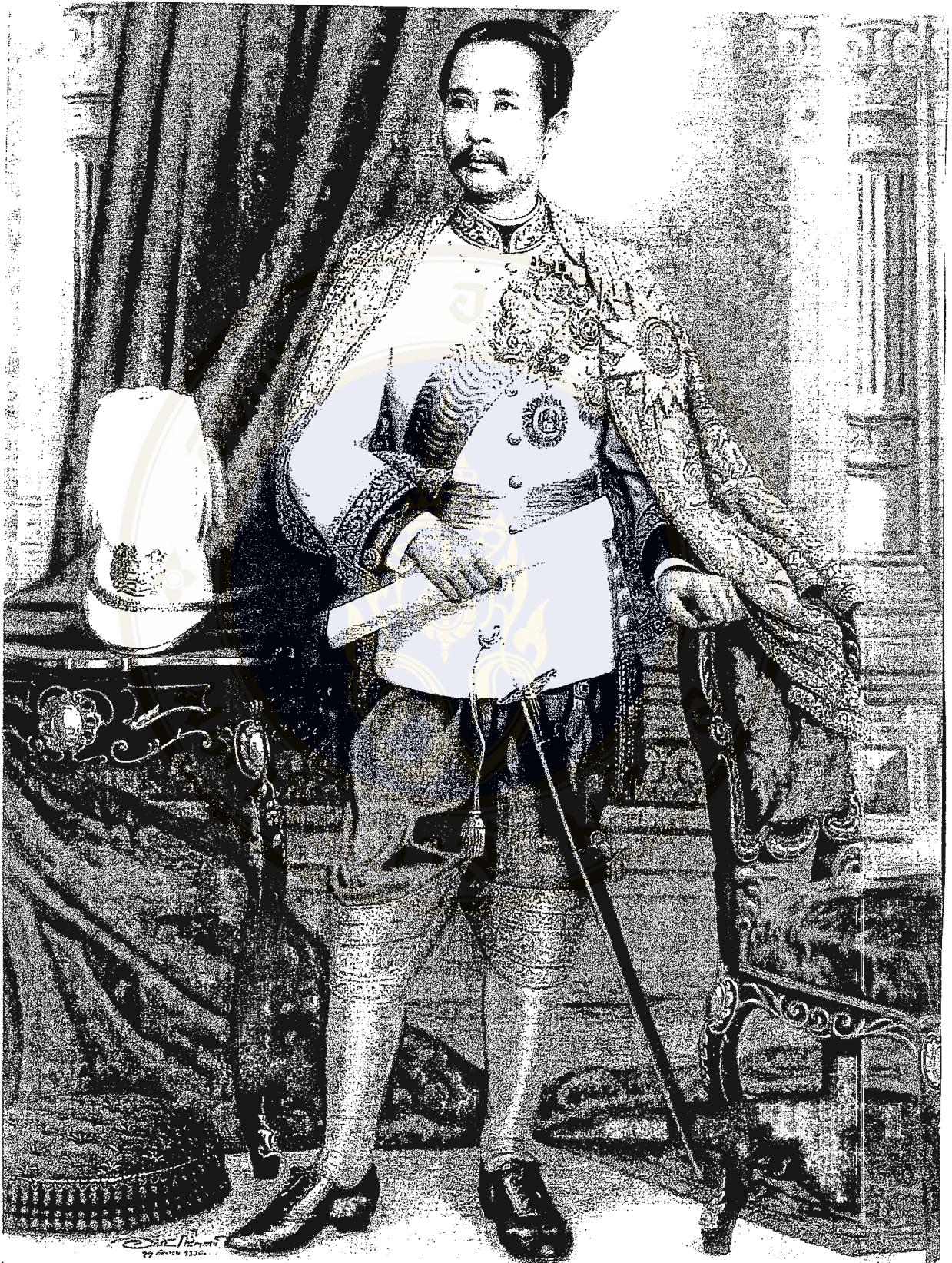


Figure 3. Cultures Supporting Community Sustainable Environment
Source: Adapted from Pra Thamapitaka (P.A Payutto), 1994: 11-15
 and Suphatra Supharp, 1984: 40-41

2.5 Conclusion

Environment covers both oneself and what surroundings. It is classified to natural and man-made or cultural environment. Seeing that natural environment came to be a partial World at the same time of the World origination over 4,600 billion years ago. While the cultural environment came after the World human being just the last 100,000 years. The cultural environment; due to, is considered to be nature adaptation to benefit man. Therefore, it can exist among the different ranks of people as community, national and international level. Any levels; however, must be composed of concept, organization, usage and object culture. Furthermore, the Buddhism believes that the natural fact called a *“truth”*, the methods that take natural resources to benefit man are called a *“culture”* and the connection of the truth and the culture is an *“ethic”*. So the people should find their appropriated ways of life leading to maintain the nature balance and support a quality of life in the community as well.



The Art Object Environment Conservation and Development in Ayutthaya Area empirically started in the reign of King Chulalongkorn in 1908 A.D.

UNIT 3

THE COMMUNITY OF THE WORLD CULTURAL HERITAGE OF AYUTTHAYA HISTORIC CITY

3.1 Introduction

To know well among the community history, present condition and trend to future development of the World Cultural Heritage of Ayutthaya Historic City is “*fundamental knowledge*” leading then to people’s participation on art object environment conservation and development in the community.

3.2 History of the Community

Ayutthaya Historic City was certified to be the World Cultural Heritage in December 13, 1991 by the United Nations of Educational Scientific and Cultural Organization (UNESCO). It covers 1,810 rai of Pratuchai and Thawasukri Sub-District where are a partial island of Ayutthaya with 7,335 households of 27,003 people (1999 A.D.) living in the ancient city containing 95 archeological sites aged over 650 years (1350 A.D.-present). However, it can be classified to be 4 periods; Ayutthaya Civilization (417 years; 1350–1767 A.D.), The Ruined City (140 years; 1767–1907 A.D.) The Ancient City Conservation and Development (83 years; 1908– 1991 A.D.), and The World Cultural Heritage of Ayutthaya Historic City (1991 A.D.– present) as the figure 4.

3.2.1 Ayutthaya Civilization Period (417 Years ; 1350-1767 A.D.)

King U-thong, the primary monarch of Chiangrai Dynasty, established Ayutthaya City being Thai Capital in the area around “*Bung Chekhan*” (Nhong Sa Noh or presently named Bung Phraram). Then, he did the accession of the throne for 19 years (1350-1369 A.D.). In addition to Ayutthaya Civilization Period during 417 years, there were 33 monarchies from 5 dynasties; Chiangrai, Supanapum Dynasty, Sukhothai, Prasatthong and Banpluang. It was twice colonized by Burmese Power as firstly in 1569 A.D. in the reign of King Mahintrathirat (1568 – 1569 A.D.) and secondly in 1767 A.D., in the reign of King Ekathat (1758–1767 A.D.). However, the Period of Ayutthaya Civilization could be classified into 4 stages; the city construction (98 years; 1350-1448 A.D.), the war doing (180 years; 1448-1627 A.D.), the west countries connection (105 years; 1628-1732 A.D.) and the distracted civilization (34 years; 1733-1767 A.D.). Thus, each stage was reigned with some major events as the following;

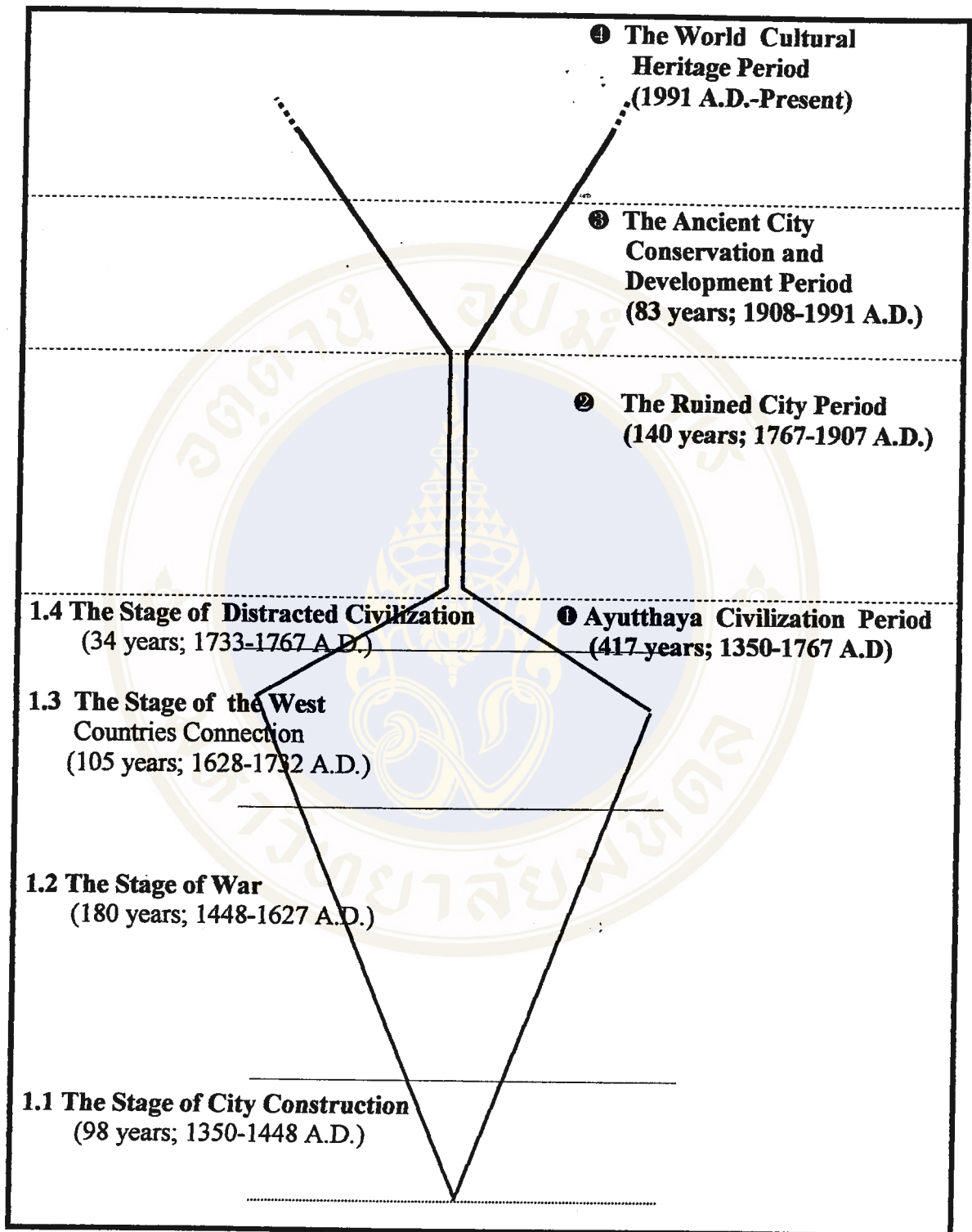


Figure 4. A Model of Community Development in the World Cultural Heritage of Ayutthaya Historic City

Source: The Research Findings

Stage 1. The City Construction

There were 98 years for the stage of Ayutthaya City Construction (1350 – 1448 A.D.). Even the culture at this time indicated to the local characteristics, but it was still highly effected from Sukhothai Style. However, this stage reigned by 8 monarchies as the following;



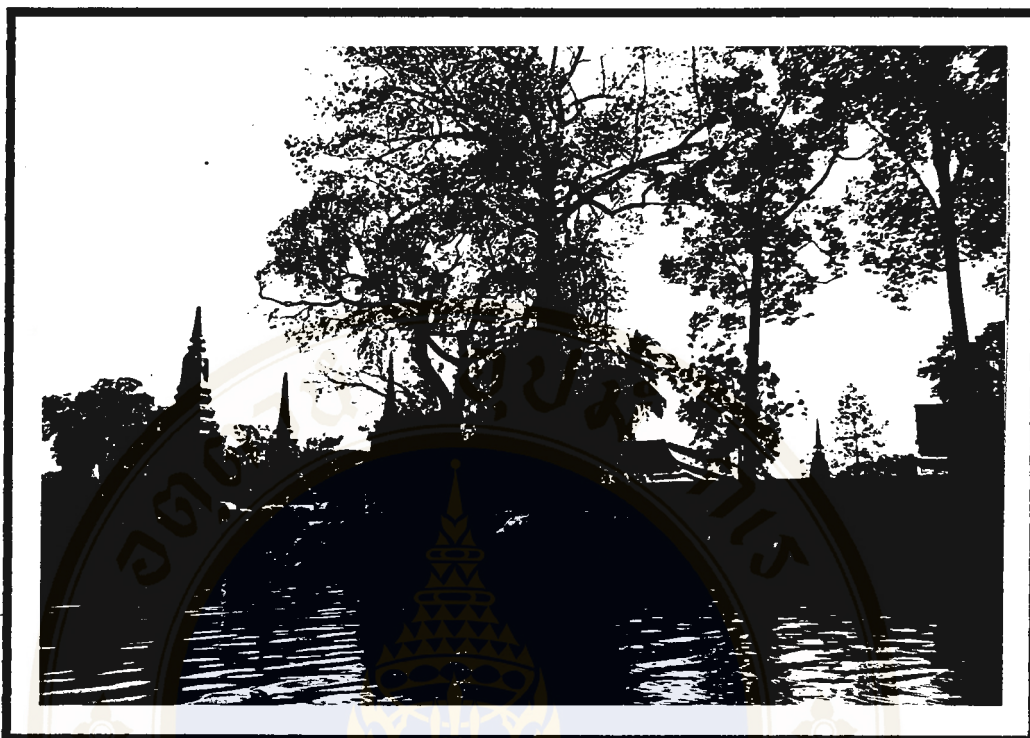
Wat Ayothaya Being Formerly the Center of Ayothaya City

1. King Rama I (King U-thong)

King U-thong reigned the throne for 19 years, (1350-1369 A.D.). He did various activities such as establishing Ayutthaya City to be the capital, designing the “*Jatusadom*” that was consisted of 4 parts of state management including Wiang (city management), Wang (the King activity management), Klang (financial management), and Na (agricultural management) for his government, enacting the law to be available, making a justice system, enlarging his power to Sukhothai and Khmer, and doing a trade to china etc.

2. King Ramesuan

King Ramesuan was a son of King U-thong. Thus, Khun Luang Pha-ngua (who was his mother brother) had competed the throne after his reigning not over a year (1369-1370 A.D.). Therefor, there were no any major activities for his first reign.



Wat Buddhaisawan Being Formerly Pathakucham City

3. King Rachathirat I (Khun Luang Pha-ngua)

Khun Luang Pha-ngua who was an older brother of King U-thong's wife reigned the throne for 17 years (1370-1388 A.D.) He passed away while moving the army to Chakanground City (Kampaengphet) in 1388 A.D. Thus, his major activities were; enlarging his influential area to Sukhothai and Lanna etc.

4. King Thonglan (Chao Thongchan)

Chao Thongchan was a son of Khun Luang Pha-Ngua, reigned the throne at 15 years old. After reigning for 7 days only, King Ramesuan who was the former king before his father from Lopburi, moved the army to execute King Thonglan and became to be the King as the second reigning.

5. King Ramesuan (the second reigning)

King Ramesuan did the second reign for 7 years (1388-1395 A.D.). He had several major activities such as constructing Wat Phraram where was the place for his father (King U-Thong) crematory, expanding his power to Lanna, moving the army to Chiangmai and enlarging his power to khmer; this, he could occupy Nakhornthom and its capital etc.

6. King Ramrachathirat (Phra Ramracha)

King Ramrachathirat was a son of King Ramesuan, and reigned the throne for 14 years (1395-1409 A.D.). His throne; then, competed in 1409 A.D. by Chao Nakhon-in who was a nephew of King Racha I (Khun Luang Pha-ngua).

However, his major activity was expanding his power to Lanna but being not successful etc.

7. King Intaracha (Chao Nakhon-in)

King Intaracha was a nephew of King Racha I (Khun Luang Phangua), reigned the throne for 15 years (1409-1424 A.D.) with some major activities as making his power over Sukhothai Kingdom in 1419 A.D. and making a relationship to China; this made the Thai-China trade being prosperous etc.

8. King Rachathirat II (Chao Samphraya)

Chao Samphraya was the third son of King Intaracha (Chao Nakhorn-in) and reigned the throne for 24 years (1424-1448 A.D.). Thus, he got the throne because of his both elder brothers' death from the elephant-fighting contest to compete the throne after his father passing away in 1424 A.D. His major activities were; expanding his power to Khmer and occupied Nakhon and its capital in 1431 A.D., annexing Sukhothai Kingdom to be a part of Ayutthaya in 1438 A.D., expanding his power to Lanna, moving the army to Chiangmai but being not successful and taking care the Buddhism including temple construction or restoration as Wat Ratchaburana etc.

Stage 2. The War Doing

The duration of war doing among Ayutthaya and other kingdoms including Burma, Khmer and Lanna etc. covered 180 years (1448-1628 A.D.). This was the reign of 15 monarchies as follow;

1. King Trilokanat

King Trilokanat was a son of King Racha II (Chao Samphraya) , reigned the throne for 40 years with some major activities as reforming the state management being 2 parts including civil and military part. Thus, the head was called "*Samuha Nayok*" for the civil and "*Samuha Kalahom*" for the military. Enacting the law of "*Sakdina*" (feudalism), taking care the Buddhism and literature, and doing wars to Lanna Kingdom etc.

2. King Rachathirat III (Phra Intharacha II)

King Racha III was a son of King Trilokanat, reigned the throne for 3 years (1488-1491 A.D.) with the major activities as moving the army to Thawai but being not successful and acting the king of Ayutthaya for 25 years while his father; King Trilokanat staying in Phitsanulok City etc.

3. King Rama II (Phra Chetthathirat)

King Rama II was a son of King Trilokanat and reigned the throne for 38 years (1491-1529 A.D.) with the major activities as taking great care for Buddhism including his permission to construct a Buddha Image called "*Phrasisanphet*" being 16 meters high etc., doing the many wars to Lanna, making a relationship to Portugal which was the first West Country contacting Ayutthaya Kingdom and doing the census for population and domestic etc.

4. King Rachathirat IV (Phra Athitawong)

King Rachathirat IV was a son of King Rama II (Phra Chetthathirat) and reigned the throne for 4 years (1529-1533 A.D.) with the major activity as promoting Phra Chairacha who was his younger brother from another mother to reign Phitsanulok City for preventing Lanna Power Expansion etc.

5. Phra Ratchadathirat

Phra Ratchadathirat was a son of King Rachathirat IV (Phra Athitawong). While getting the throne, he was 5 years old only. This made Phra Chirachathirat who was his father younger brother, had moved the army from Phitsanulok City to compete his throne and executed him after 5 months of his reign in 1533-1534 A.D.

6. King Chairachathirat

King Chairachathirat was a son of King Rama II (Phra Chetthathirat) and reigned the throne for 12 years (1534-1546 A.D.) with the major activities as employing the Protugal Soldiers to be the King Safe-Guard Staff and instructing Thai Soldiers using a fire-gun, doing the first war to Burma who moved the army to occupy some parts of Ayutthaya named "*Chiang Kran*", and getting Lanna Kingdom to be Ayutthaya Colony etc.

7. King Yotfa (Phra Kaewfa)

King Yotfa was a son of King Chairachathirat and Tao Sisudachan. When he got the throne, he was 11 years old only and after 2 years of his reign (1546-1548 A.D.), Khun Vorawongsathirat who was a noble and a new husband of his mother did the throne competition and executed the young King, then made himself became the King.

8. Khun Worawongsathirat

Khun Worawongsathirat had reigned the throne for 42 days only before being arrested and getting executed by a group of nobles.

9. King Mahachakaphat (Phra Thianracha)

King Mahachakraphat was a son of King Rama II (Phra Chetthathirat) and also a younger brother of King Chairachathirat. He got the throne after a group of noble had already executed Khun Worawongsathirat. His throne covered 20 years (1548-1568 A.D.) with some major activities as doing the war to Burma which directed the army by King Hongsavadee (Burengnong) and his wife; Phra Sisuriyothai, passing away in the battle field in 1548 A.D., placing some elephants and money to Burmese Power for avoiding war, and promoting Khun Pirenton to be Phra Mahathamaracha to reign Phitsanulok City etc.

10. King Mahintrathirat

King Mahintrathirat was a son of King Mahachakraphat. He had reigned the throne for about 1 year only (1568-1569 A.D.) before Ayutthaya Kingdom getting lost its independence to Burmese Power in 1569 A.D.

11. King Mahathamaracha

King Mahathamaracha was King Mahachakraphat's son-in-law from Phraruang Dynasty (the dynasty originated in Sukhothai) and reigned the throne for 21 years (1569-1590 A.D.); thus, his reigning to be considered as Burmese Colony for 15 years (1569-1584 A.D.).

12. King Naresuan ,the Great (Phra Ong-dam)

King Naresuan, the Great, was a son of King Mahathamaracha and reigned the throne for 15 years (1590-1605 A.D.) with some major activities as liberating Ayutthaya Kingdom from Burma, getting victoria the elephant contest to Phra Maha-uparacha who was the Commander-in-Chief of Burmese Army in 1592 A.D., expanding the influential area of Ayutthaya Kingdom covering Lanna, Lanchang, Khmer and some parts of Burma, permitting his royal invoy to make the relationship to China and doing trade to Spain which dominated the Philipines in that time. etc.

13. King Ekathosarot (Phra Ong-khao)

King Ekathosarot was a son of King Mahathamaracha and also a younger brother of King Naresuan, the Great. He reigned the throne for 5 years (1605-1610 A.D.) with some major activities as constructing Wat Worachettharam where contained the relic of his older brother, King Naresuan, the Great, restoring the country after Tha - Burma war doing, supporting the trade to China; Japan; Portugal and Holland together with permitting the first royal invoy to Amsterdam where was a capital of Holland in Europe. etc.

14. King Sisaovaphak (Chaofa Saovaphak)

King Sisaovaphak was a son of King Ekathosarot. His throne had been reigned for 14 months only (1610-1611 A.D.) before being competed and executed by Phra Sisilp or Phra Pimoltham who was his older brother from another mother and being this time a monk living at Wat Rakhang.

15. King Songtham (Phra Intharacha)

King Songtham was a son of King Ekathosarot's concubine and reigned the throne for 17 years (1611-1628 A.D.) with some major activities as taking care the Buddhism, writing "*Kap Mahachat*", constructing the "*Tripitaka*", doing the trade to some foreign countries; this made Ayutthaya being a national port for oversea and supporting "*Yamada Nahamasa*" a Japanese volunteer soldier being an official; then getting the royal title to be "*Ok-Ya Senapimuk*" etc.

Stage 3. The West Countries Connection

This stage covered 105 years (1628-1732 A.D.) with 8 monarchies as the following;

1. King Chetthathirat (Phra Arthitawong)

King Chetthathirat was a son of King Songtham. He had stayed in his throne for 28 days before being competed and executed by Ok-ya Kalahom Suriyawong who was the Command-in-Chief of Ayutthaya Military Part in 1629 A.D.

2. *King Prasatthong (Ok-ya Kalahom Suriyawong)*

After King Prasatthong had executed King Chetthathirat, he did the accession of the throne being the primary monarch of Prasatthong Dynasty with some major activities during 27 years (1629-1656 A.D.) of his reign as enacting the slavery law and the charter law, constructing Wat Chaiwatanaram and Prasat Nakhonluang, supporting the oversea trades, and uncovering Marid City to be a new port at the side of Bangal Gulf etc.

3. *King Chaofachai*

King Chaofachai was a son of King Prasatthong. He was executed after his reign for 3-4 days by King Narai, the Great, who was his older brother and Phra Srisuthamaracha who was his father's younger brother in 1656 A.D.

4. *King Sisuthamaracha*

King Sisuthamaracha was a younger brother of King Prasatthong. Having reigned the throne for 2 months only, he got the civil war due to the conflict to King Narai. This made the King getting lost his throne in 1656 A.D.

5. *King Narai, the Great*

King Narai was a son of King Prasatthong and reigned the throne for 32 years (1656-1686 A.D.) with some major activities as making Ayutthaya Kingdom being progress in various parts; not only trading but also foreign countries relationship, inviting the foreigners serving the King Affairs as "*Constandtin Poncol*" who was a Greek Citizen; then, promoted him to be "*Ok-ya Vichayen*" and enacting several laws for the Kingdom. This reign; however, was the golden age of literature and there were some famous writers as "*Phra Maharatchakru*", and "*Sriprat*" together with the famous literatures as the Samutkotkamchan etc.

6. *King Phetaracha*

King Phetaracha was the noble leader eliminating successfully some influences of Greek; like Ok-ya Vichayen and some French Nobles working in Ayutthaya. Then, he had executed "*Phra Pee*" who was the adopted son of King Narai, the Great, before doing the accession of the throne for 15 years (1688-1703 A.D.).

7. *King Sanphet VIII (Phrachao Sue)*

King Sanphet VIII or Phrachao Sue was previously named Khunluang Sorasak. He was the adopted son of King Phetaracha and also the Deputy King during his father throne.

8. *King Sanphet IX (Phrachao Thaisa)*

Phrachao Thaisa was previously named Chaofa Phet, a son of Phrachao Sue and reigned the throne for 24 years (1708-1732 A.D.) with some major activities as excavating Mahachai Canal connecting to Maeklong River and Thagine River, getting Khmer to be Ayutthaya Colony and doing a progressive trade to china etc.

Stage 4. The Civilized Destruction

This stage covered 34 years (1733-1767 A.D.) before the second lost of Ayutthaya Liberation. However, there were 3 monarchies reigning for this duration as the following;

1. *King Rachathirat III (Boromakot)*

King Boromakot was a son of King Thay-sa and reigned the throne for 26 years (1732-1758 A.D.) with some major activities as appearing the civil war for the throne competition between Prince Porn and Prince Aphai, being depression of the country's economy, permitting the mission in literature, the most famous writer; Chaofa Thamathibet (Prince Kung); the most famous literatures; Kap Ha Rue and Phramalaikhamluang etc.

2. *King U-thumporn (Khunluang Hawat)*

King U-thumporn was previously named Kromakhun Phrapinit, a son of King Boromakot and reigned the throne for 2 months only in 1758 A.D., then gave his older brother the throne and went to be a monkhood.

3. *King Suriyat Amarin (Phrachao Ekathat)*

King Suriyat Amarin was the older brother of King U-thumporn and a son of King Boromakot. He had been the throne for 9 years before Burmese Army taking over the kingdom. This was the great event ending of Ayutthaya Civilization for 417 years with 33 monarchies continuously reigning the throne from 5 dynasties as the table 3.

Table 3. A List of Monarchies in Ayutthaya Civilization Period

No.	Monarchies	Relation	Reigning-Duration		Dynasty
			Amount (year)	Year (A.D)	
1.	King U-thong	1 st king	19	1350-1369	Chiangrai
2.	King Ramesuan	Son	Lower 1 year	1369	Chiangrai
3.	Khunluang Pha-ngua (King Rachathirat I)	Wife Brother of King U-thong	17	1370-1388	Suphanapum
4.	King Thonglan	Son	7 days	1388	Suphanapum
5.	King Ramesuan	King U-thong's Son	7	1388-1395	Chiangrai
6.	King Ram Rachathirat (Phra Ram Racha)	Son	14	1395-1409	Chiangrai
7.	King Inracha (Chao Nakhon-in)	Khunluan Pha-ngua's Nephew	15	1409-1424	Suphanapum
8.	King Rachathirat II (Chao Samphraya)	Son	24	1424-1448	Suphanapum

Table 3. A List of Monarchies in Ayutthaya Civilization Period (cont.)

No.	Monarchies	Relation	Reigning-Duration		Dynasty
			Amount (year)	Year (A.D)	
9.	King Boromtrilokanat	Son	40	1448-1488	Suphanapum
10.	King Rachathirat III	Son	3	1488-1491	Suphanapum
11.	King Ramathibodi II (Phra Chethathirat)	A Son of King Trilokanat	38	1491-1529	Suphanapum
12.	King Rachathirat IV (Phra Athitayawong)	Son	4	1529-1533	Suphanapum
13.	Phraratchadathirat	Son	5 months	1533-1534	Suphanapum
14.	King Chairachathirat	A Son of King Chetthathirat	12	1534-1546	Suphanapum
15.	King Yotfa (Phrakaewfa)	Son	2	1546-1548	Suphanapum
16.	Khun Worawongsathirat*	Noble	42 days	1548	-
17.	King Mahachakaphat (Phra Tianracha)	A Son of King Chetthathirat and also a younger brother of King Chiarachathirat	20	1548-1568	Suphanapum
18.	King Mahintrathirat	Son	1	1568-1569	Suphanapum
19.	King Mahathamaracha	Son-in-law of King Mahachakaphat	21	1569-1590	Phraruang
20.	King Naresuan, the Great	Son	15	1590-1605	Phraruang
21.	King Ekathosarot	Younger Brother	5	1605-1610	Phraruang
22.	King Sisaovaphak (Chaofa Saovaphak)	Son	14 months	1610-1611	Phraruang
23.	King Songtham (Phra Intaracha)	A Son of King Ekathosarot	17	1611-1628	Phrarung
24.	King Chettathirat	Son	28 days	1629	Phraruang



Table 3. A List of Monarchies in Ayutthaya Civilization Period (cont.)

No.	Monarchies	Relation	Reigning-Duration		Dynasty
			Amount (year)	year (A.D)	
25.	King Prasatthong (Ok-ya Kalahom Suriyawong)	Noble	27	1629-1656	Prasatthong
26.	King Chaofachai	Son	3 – 4 days	1656	Prasatthong
27.	Phra Sisuthamaracha	A Younger Brother of King Prasatthong	2 months	1656	Prasatthong
28.	King Narai, the Great	A Son of King Prasatthong	32	1656-1688	Prasatthong
29.	King Phetracha	Noble	15	1688-1703	Banpluluang
30.	King Sanphet VIII	Adopted Son	5	1703-1708	Banpluluang
31.	King Sanphet IX	Son	24	1708-1732	Banpluluang
32.	King Rachathirat III	Son	26	1732-1758	Banpluluang
33.	King U-thumporn (Khunluang Hawat)	Son	2 months	1758	Banpluluang
34.	King Suriyat Amarin (Phrachao Ekathat)	Older Brother	9	1758-1767	Banpluluang

* Most historians have not agreed Khun Worawongsathirat being a monarch.

3.2.2 The Ruined City Period (140 years; 1767-1907 A.D.)

The second lost of Ayutthaya Liberty to Burmese Power in 1767 A.D. was the great damage to make Ayutthaya Capital being the Ruined City. The missions who were living in the reign of King Ekathat (being the last King in Ayutthaya Dynasty) notified that *“After the Burmese Army had come in and fired the heart area of Ayutthaya Capital in April 15, 1767 and the fire had burnt for 15 days before the enemy moved the troops out the city this was the first point of the ancient city of Ayutthaya”*. Then, King Taksin, the Great, declared and moved the capital from Ayutthaya to Thonburi. Later, the King allowed to excavate the properties hidden before the capital disorganization, this made the people moving to live around Ayutthaya City at the same time of archeological sites distracting. In 1782 A.D., King Rama I (Jakri Dynasty), made the royal permission to disorganize some old bricks of city walls and temples for new city construction in Bangkok and this was made again in the reign of King Rama III.

3.2.3 The Ancient City Development and Conservation Period (83 years; 1908-1991 A.D.)

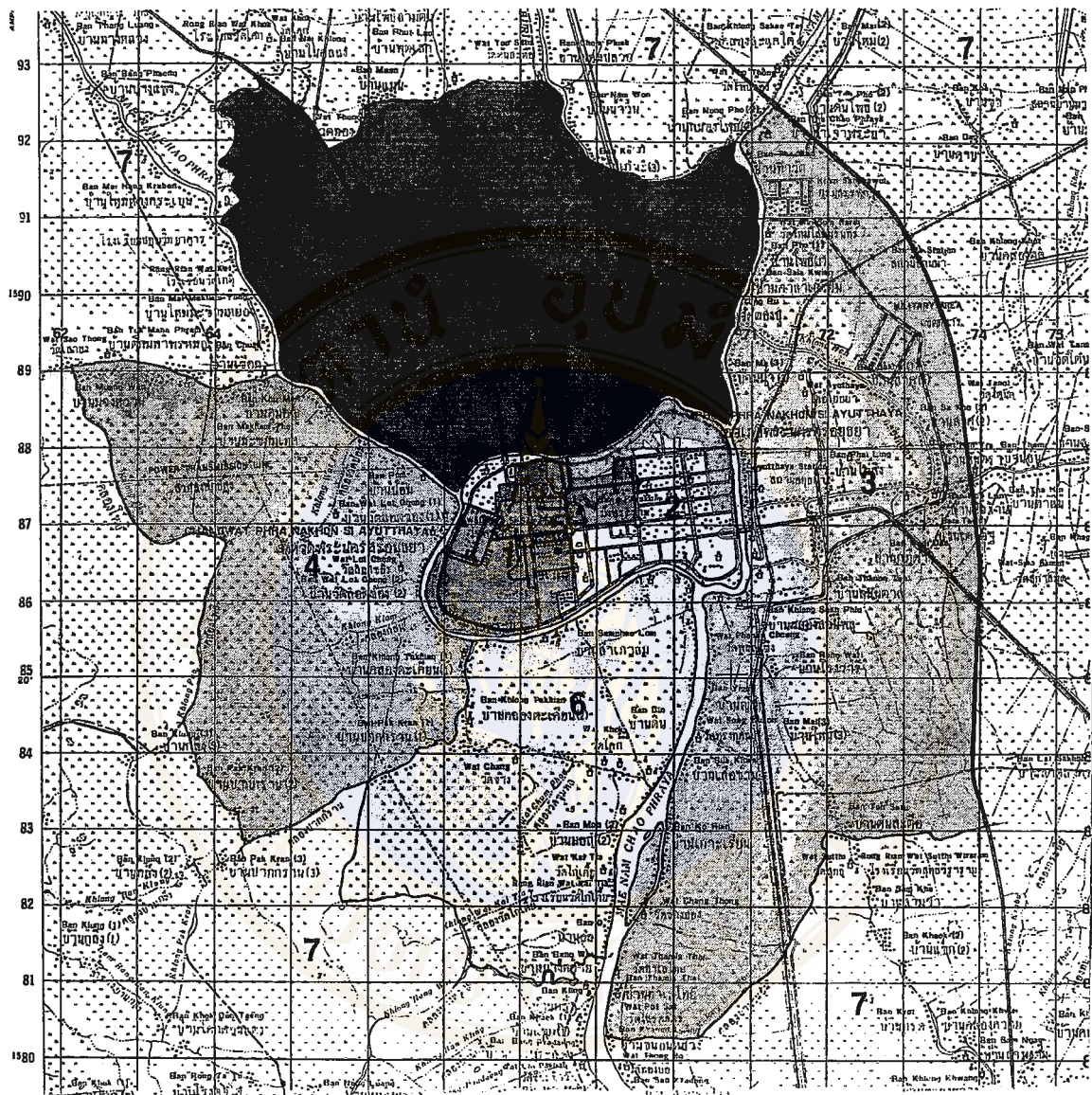
Ayutthaya art object environment conservation and development was empirically performed in 1908 A.D. which was the reign of King Chulalongkorn of Ratanakosin. Thus, the King permitted Phraya Boranratchathanin; the governor of Monthon Krung Kao, improved the landscaping in the ancient royal palace and preserved the land in Ayutthaya Island being the national treasures. After the Absolute Monarch System had been changed to be the Democracy System in 1932 A.D., Luang Praditmanutham (Predee Panomyong) notified the Property Right Act in Ayutthaya Island. Thus, his objective was to take the public properties being responsible to the Finance Ministry. In 1935, the Fine Art Department has registered 69 archeological sites in Ayutthaya Island to be the National archeological sites and 3 years later or in 1938 A.D. the Property Right in Ayutthaya Island was occupied by the Finance Ministry and prepared to be the center of governing and trading. In 1956, Plaeng Phiboonsongkhram; the Prime Minister allowed the Fine Art Development doing the excavation and restoration of some archeological sites in Ayutthaya Island as Wat Mahathat, Wat Ratchaburana and Wat Phrasisanphet etc. However, a year later, this activity was stopped because of the revolution.

In 1967, the time for 200 years anniversary of the old Ayutthaya Capital Disorganization, Ayutthaya City Plan office and Ayutthaya Municipality did Ayutthaya Island Development according to the Project of Archeological Site Excavation and Restoration in Ayutthaya and Surrounded Area. Then, the Fine Art Department has registered the area covering 1,810 rai in Ayutthaya Island to be "*an Archeological Zone*" (1976 A.D.). Later, it was improved to be the "*Historical Park*" in 1982 A.D., doing the Master Plan for Ayutthaya (and surrounded area) Historic City Project in 1987 A.D. Furthermore, Thailand has been a member of the World Prevention Convention in June 16, 1987 A.D. as well. This was the process of Ayutthaya art object environment conservation and development for 83 years (1908-1991 A.D.) before getting the certification to be the World Cultural Heritage of Ayutthaya Historic City in December 13, 1991.

3.2.4 The World Cultural Heritage of Ayutthaya Historic City Period (1991 A.D.-Present)

The period of the World Cultural Heritage of Ayutthaya Historic City has been started since 1991 A.D.-present. Thus, the Fine Art Department found that there were 403 archeological sites in Ayutthaya Province, 189 sites standing in Ayutthaya Island and the rest for 204 sites standing out the island. Moreover, the area was divided into 7 zones for providing a master plan of Ayutthaya Historic City Conservation and Development Project.

However, The United Nation of Educational, Scientific and Cultural Organization (UNESCO) has registered the certification for art object environment to be the World Cultural Heritage of Ayutthaya Historic City in December 13, 1991. Its area has covered 1,810 rai only in Pratuchoi and Thawasukri Sub-districts being a partial Island of Ayutthaya. This area; thus, was certified because of "*the art objects being major evidences indicating the most progressive civilization of the South-East Asia Region; especially, this area being the location of the Grand Palace for all monarchies of Ayutthaya Kingdom during 417 years; 1350-1767 A.D.*".



- | | |
|--|---|
| <ul style="list-style-type: none"> 1 Ayutthaya Historic City 2 External Area of Ayutthaya Historic City in the Island 3 The East Part of External Island Area (covering the old Ayothaya City) 4 The West Part of External Island Area | <ul style="list-style-type: none"> 5 The North Part of External Island Area (covering Khlong Sabua) 6 The South Part of External Island Area (covering Wiang Lek and Phatakucham City) 7 The Rest Part in Ayutthaya Province |
|--|---|

A Map of Archeological Area Classified to Master Plan of Ayutthaya Historic City Conservation and Development Project

The area presently is consisted of the royal property for 1,681 rai and 2 ngan (92.87%) and the people right property for 128 rai and 3.98 ngan (7.13%) with 7,335 households of 27,003 people living in the same area of the ancient city that contains 95 archeological sites.

3.3 The Archeological Sites in the World Cultural Heritage of Ayutthaya Historic City

Ayutthaya Historic City where was certified to be the World Cultural Heritage covering 1,810 rai in 1991 A.D. by UNESCO, was contained 95 archeological sites (1987 A.D.). However, the researcher's field study in 2000 A.D. was found that there were only 61 empirically evident archeological sites still standing in view while the rest for 34 being no physical evidences as its name list belows;

3.3.1 The Empirically Evident Archeological Sites

- | | |
|--------------------------------------|-----------------------------|
| 1. King U-thong Monument | 2. Wat Phrasisanphet |
| 3. The Ancient Palace | 4. Wihan Phramongkhonbophit |
| 5. Wihan Klaep | 6. Khunphan House |
| 7. Wat Ket | 8. Sisanphet Road |
| 9. Wat Phraram | 10. Phraram Swamp |
| 11. Yen Royal House (Tukdin) | 12. Talatchaoprom Road |
| 13. The Ruin City Wall | 14. Wat Chumsaeng |
| 15. Wat Langkakhao | 16. Takalahom Road |
| 17. Wat Suwanachedi | 18. Wat Ratchaburana |
| 19. Chikun Road | 20. Chedi Chao-ai Chao-yi |
| 21. Patan Bridge | 22. Wat Mahathat |
| 23. Wat Nok | 24. Wat Langkadam |
| 25. Wat Sankaphat | 26. Wat Chan (1) |
| 27. Wat Phong | 28. Chikun Bridge |
| 29. Wat Tratrung | 30. Talaengkaeng |
| 31. Sanphrakan | 32. Klong Nakhornban |
| 33. Khlong Tho | 34. Lamheri Bridge |
| 35. Langwanglang Road | 36. Khlongtho Road |
| 37. Wat Som | 38. Khlong Klab |
| 39. Wat Sankatae | 40. Wat Sankatha |
| 41. Wat Chediyai | 42. Wat Chaophram |
| 43. Wat Ubosot | 44. Wat Chaoprap |
| 45. Khlang Dibuk | 46. Talatlek Road |
| 47. Khlong Khanan Tanon
Talattlek | 48. Wat Luang Chikrut |
| 49. Wat Wangchai | 50. Wat Mahasaman |
| 51. Wat Phrangam | 52. Wat Pasaton |
| 53. Wat Lokayasutharam | 54. Wat Vorachetharam |
| 55. Wat Rakhang | 56. Wat Vorapho |
| 57. Wat Maichaivichit | 58. Wat Thammikarat |
| 59. Wat Yanasen | 60. Klong Pratumhawpluek |
| 61. Wat Phlapphlachai | |

3.3.2 The Non-empirically Evident Archeological Sites

- | | |
|-----------------------|---------------------|
| 1. Nabangtra Road | 2. Wat Chan (2) |
| 3. Wat Sattabap | 4. Wat Songkhon |
| 5. Wat Daovadung | 6. Wat Paphai |
| 7. Wat Chan (3) | 8. Wat Chanaman |
| 9. Wat Pamo | 10. Wat Thong |
| 11. Watthongpamo Road | 12. Wat Hib |
| 13. Wat Kokhamin | 14. Wat Perai |
| 15. Wat Papat | 16. Wat Kaew |
| 17. Wat Thonghoikhong | 18. Wat Sakae |
| 19. Wat Kokmadanyai | 20. Wat Nok (2) |
| 21. Wat Phopuek | 22. Wat Chan (4) |
| 23. Wat Raeng | 24. Wat Tuknangram |
| 25. Wat Choh | 26. Wat Rang (1) |
| 27. Wat Rang(2) | 28. Wat Kokdamao |
| 29. Wat Pa | 30. Wat Kokmadanlek |
| 32. Wat Sansai | 32. Wat Khon |
| 33. Wat Khae | 34. Wat Paphai |

**THE EMPIRICALLY EVIDENT
ARCHEOLOGICAL SITES
IN THE WORLD CULTURAL HERITAGE
OF AYUTTHAYA HISTORIC CITY**

1. KING U-THONG MONUMENT



The monument of King U- thong standing opposite Wat Phrasisanphet was built to be the royal memory of the first king of Ayutthaya Capital by Mr.Chamnong Thephasadin Na Ayutthaya who was Ayutthaya Governor in 1970 A.D. Then, King Bhumipol has made the grand cerebation of the monument in April 3, 1970. Thus, this day was considered to be the day-established Ayutthaya Capital 620 years ago.

2.WAT PHRASISANPHET



Wat Phrasisanphet being previously "*Jomthong Royal House*" where King U-thong lived in, built in 1350 A.D. Then, King Trilokanat had moved it to the new one at the north part near Lopburi River before dedicating the old royal house being a temple named "*Wat Buddhawat*" with no monks living in but for doing the royal religious activities only. This is the same as Wat Mahathat in Sukhothai Period and Wat Phrasiratanasasadaram in Ratanakosin Period. In 1492 A.D., King Rama II (King Chethathirat) built the chedies in the temple area, the East one Containing his father relic (King Trilokanat), the middle one for his brother (King Rachathirat III) and the West one built later by his son (King Rachathirat IV) for him (King Rama II). Furthermore, in 1499 A.D. King Rama II built a Wihan and a year later (1500 A.D.) doing the construction of a Standing Golden Buddha Image with 16 metres high, 2 metres long for its face and 1.50 metres wide, 5.50 metres wide for its chest and giving it named "*Phrasisanphetyadayan*". This Buddha was later destroyed and burnt for taking the gold out during the second lost of Ayutthaya Independence to Burmese Power.

3. THE ANCIENT PALACE

The Ancient Palace or The Royal Grand Palace being now the ruined bases only. Thus, the royal palace of King U-Thong was firstly at *“Wiang Lek”* in 1347 A.D. and 3 years later (1350 A.D.), he moved his palace to a new one named *“Jomthong Royal House”* where located near *“Nhong Sa No”* or presently *“Wat Phrasisanphet”*. In 1448 A.D., King Trilokanat dedicated the area of the Com Thong Royal House to be the palace temple called *“Wat Buddhawat”* and the temple name changed to be *“Wat Phrasisanphet”* in the reign of King Chethathirat, The new royal palace was also made near Lopburi River where was in the northern area of the previous one. However, the royal grand palace consisted of 7 royal houses named: Wiharnsomdej, Sanphetprasat, Suriyatamarin, Chakrawatphichayon, Phlabphlatrimuk, Banyongratanat and Song-Phuen as the details below;

3.1 THE ROYAL HOUSE OF WIHANSOMDEJ



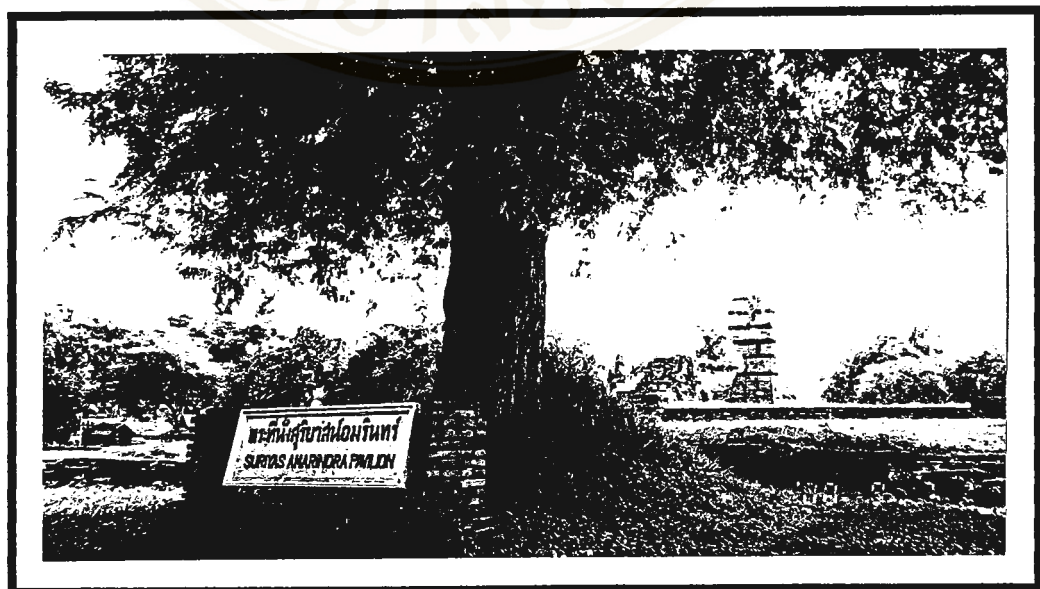
“The Royal House of Wihan Somdej being a stupa-spired style castle and built in the reign of King Prasatthong, 1630-1655 A.D.”

3.2 THE ROYAL HOUSE OF SANPHETPRASAT



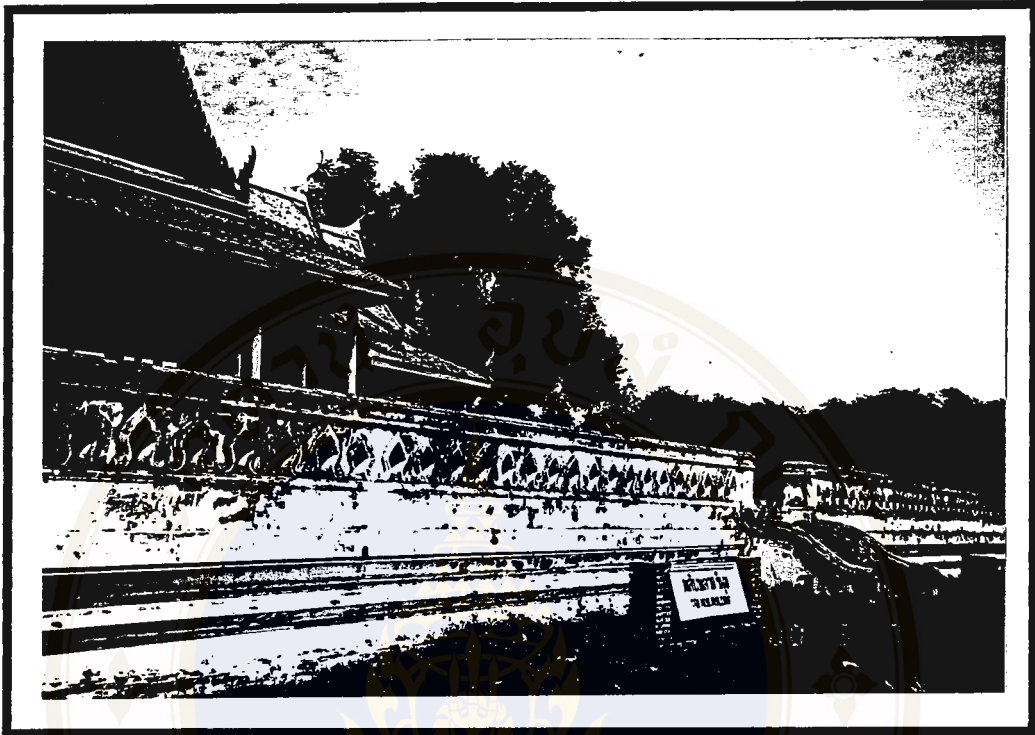
“The Royal House of Sanphetprasat being nine-spired style castle and built in the reign of King Trilokanat, 1448 – 1488 A.D.”

3.3 THE ROYAL HOUSE OF SURİYATAMARIN



“The Royal House of Suriyatamarin being four-angled style castle and built in the reign of King Narai, the Great, 1656-1688 A.D.”

3.4 THE ROYAL HOUSE OF PHLABPHLATRIMUK



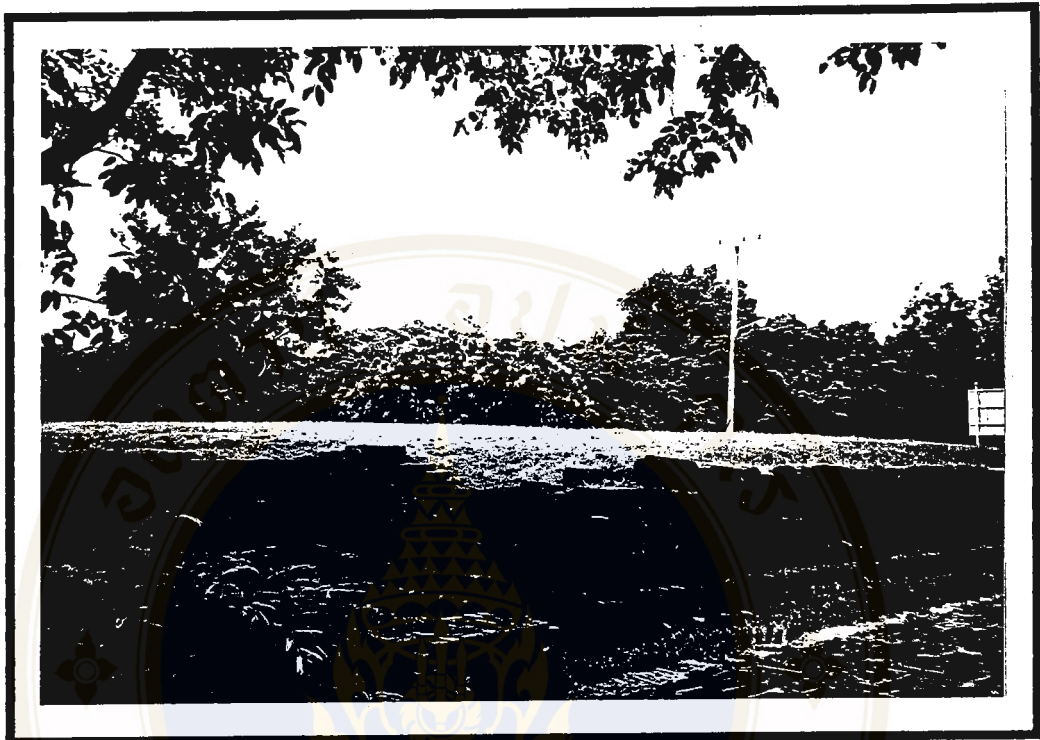
“The Royal House of phlabphlatrimuk, King Chulalongkorn of Ratanakosin Capital doing the new construction on its ancient base in 1908 A.D.”

3.5 THE ROYAL HOUSE OF BANYONGRATANAT (THAY-SA)



“The Royal House of Banyongratanat (Thay-sa) being a spired style castle and built in the reign of King Phetracha, 1688 – 1702 A.D.”

3.6 THE ROYAL HOUSE OF CHAKRAWATPHAICHAYON



*“The Royal House of Chakrawatphaichayon being a spired style castle ,
built in the reign of King Prasatthong,1630 – 1655 A.D.”*

3.7 THE ROYAL HOUSE OF SONG-PHUEN



*“The Royal House of Song-phuen had no any documentary evidences of
history, but it was used for a noble meeting in the reign of King Phetracha.”*

4. WIHAN PHRAMONGKONBOPHIT



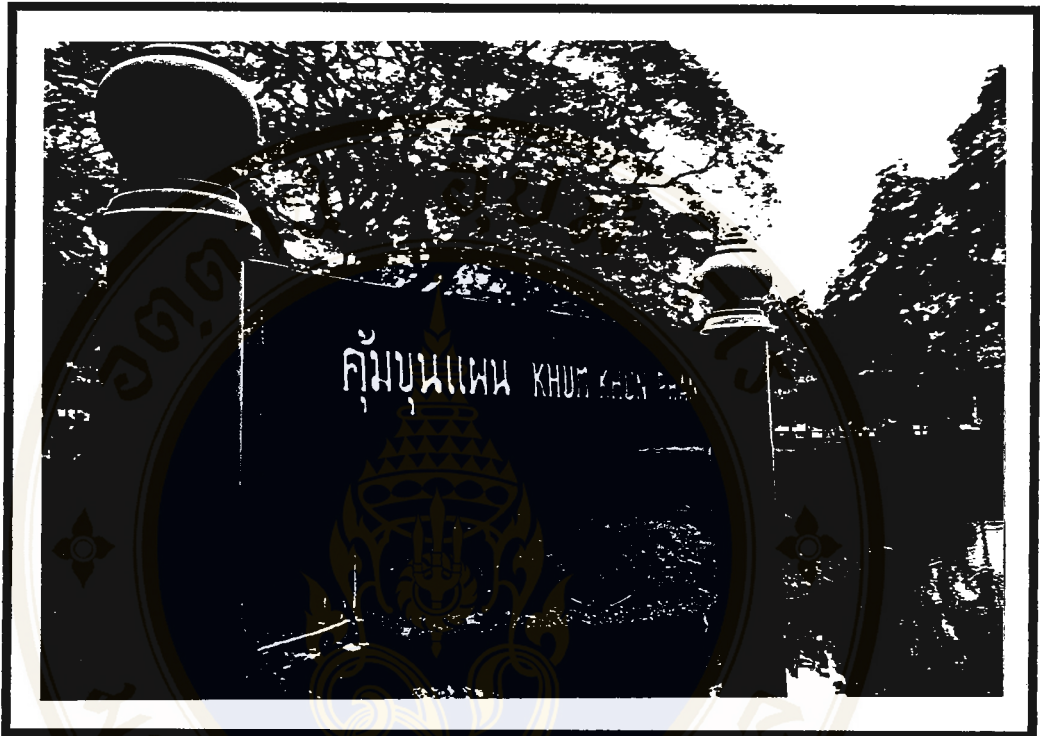
Wihan Phramongkonbophit located to the south of Wat Phrasisanphet, the Principal Sitting Buddha was presumed to be built for doing the royal crematory of King Naresuan, the Great by King Ekathosarot (1605 A.D.). However, in the reign of King Songtham (1611-1628 A.D.), it was considered that the large Buddha staying in the royal crematory area might not be appropriated condition, so it was moved to the present location since then. In the reign of King Sue, (1703-1708 A.D.), the thunderbolt broke the Buddha house and also the Buddha top past. Then, the second lost independence of Ayutthaya to Burmese Power in 1767 A.D., the Wihan was burnt. This made a deconstructed Buddha, broken the Buddha hair top and right hand. The Buddha; however got again the restoration in the reign of King Chulalongkorn by Phraya Boranrachathanint, Ayutthaya Governor in that time, and doing it again in 1992 A.D.

5. WIHAN KLAEP



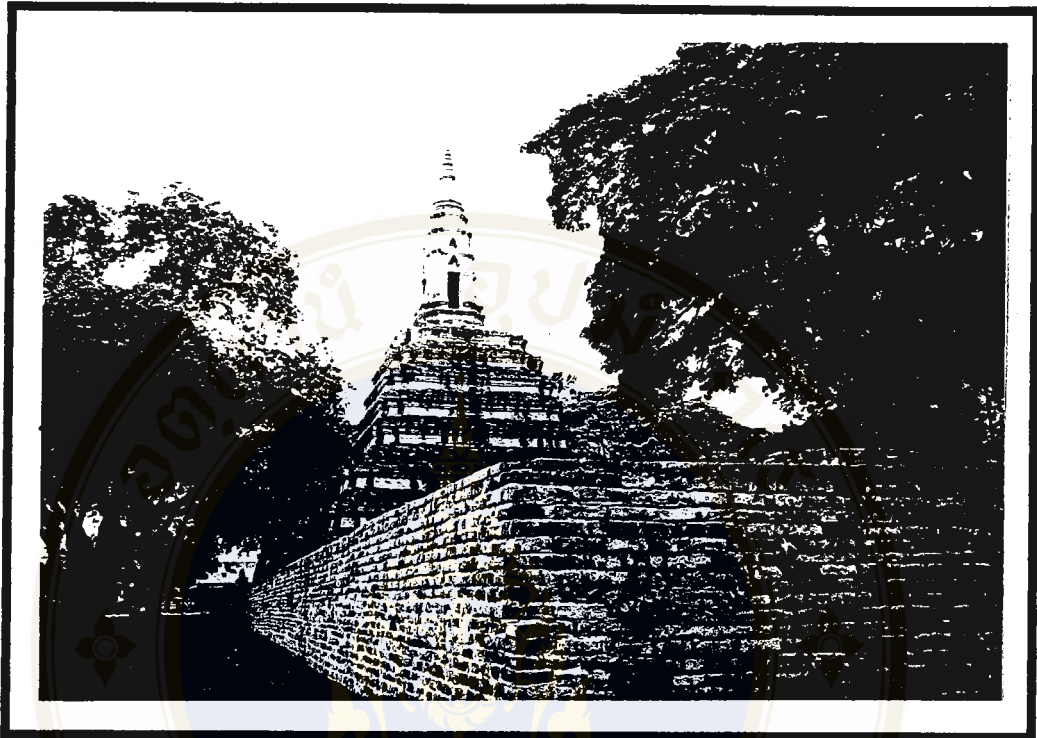
Wihan Klaep was a small building in front of Wihan Phramongkonbophit. This area was previously *“the Royal Crematory”* in Ayutthaya Period. The Wihan is presently a partial ruined building bases and walls only. However, it is presumed that the Wihan might be a part of *“Wat Chechiang”* where was built in 1538 A.D. by King Chairachathirat and then, King Songtham (1612 A.D.) determined the special place for *“the royal crematory”* in the city heart.

6. KHUNPHAEN HOUSE



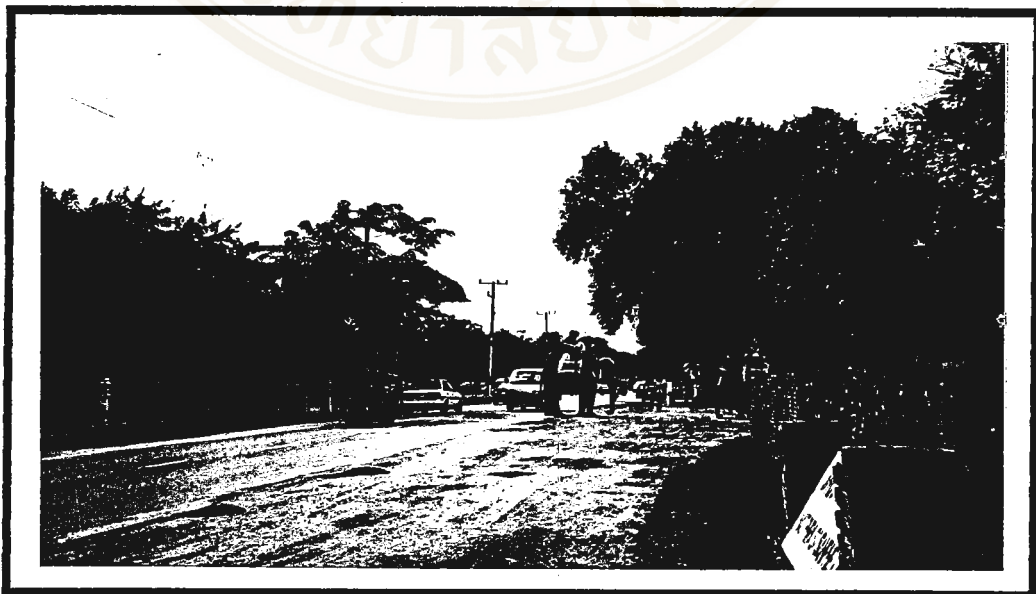
Khunphaen House is presently located between Wihan Phramongkonbophit and Wat Ket. It was previously the governor house built in 1894 A.D. at the area of Koh Loy (a small Island) opposite the former governor office (where was previously located at the same area of Chankasem Palace). In 1940 A.D., Dr. Predee Panomyong ; then, moved this house to a new area where used to be located Nakhonban Prison. Concurrently, some Thai Style Houses were built more and named "*Khunphaen House*". From time to time, the house got some restorations as firstly in 1991 A.D., Tourism Authority of Thailand (TAT.) paying 8 millions baht for changing the wooden parts of the house to be concrete one. However, the house is presently a group of Thai Style Houses consisting of "*Ho Klang*" a very large bedroom, "*Ho Khang*" being as a living - room, "*Ho Nang*" for doing some family activities, "*Ho Nok*" for a bird raising or ornamental planting and "*Ruen Kanya*" for relaxing etc.

7. WAT KET



“A drum tower located in front of the temple, while the prison getting behind”

8. SISANPHET ROAD



*“Sisanphet Road being the North-South line
from the City Heart to the Royal Palace”*

9. WAT PHRARAM



Wat Phraram is located nearby Phraram Swamp, East of the Royal Palace. Thus, the chronicle (Luang Prasert Edition) notified that the temple was built in *“the royal crematory area of King U-thong in 1369 A.D.”* by King Ramesuan who was his son. King Ramesuan; however, reigned firstly the throne one year only, he might not finish his construction so King Rachathrirat I (Khunluang Pha-ngua) was presumed to continue the construction or King Naresuan might construct the temple in his second reign (1388 – 1395 A.D.). Due to the temple location being nearby the royal palace, the reconstruction was done so many times as in the reign of King Boromakot (1741 A.D.). Presently, there are many interesting architectures for visiting as the principal stupa, a number of surrounding chedies and a large swamp called *“Nhong Sanoh”* or *“Bung Phraram”* at the front of the temple.

10. PHRARAM SWAMP



The chronicle part 63 entitled Krung Kao (the old capital) notified that the front area of the royal palace was a large swamp called "**Bung Chekhan**" to the North and "**Bung Nawat Phraram**" to the south. Then, the word "**Nawat**" (the front of a temple) to be worn away and leave only "**Bung Phraram**" (Phraram Swamp). The swamp; however, was previously a small size and it got more bigger because of the first construction of Ayutthaya City requiring much soil to make the area base for the royal palace, Wat Mahathat, Wat Ratchaburana and Wat Phraram. The pathways; then, being for workers carrying soil were improved to be the brick roads and made some bridges over the channels connecting each part of the swamp for boating. Furthermore, there were 2 ways for boating from the swamp to the river; the south way faced on Wat Sapannak to Chaophraya River and the north one faced on Khlong Pratukhaopluek to Lopburi River. Moreover, There were many temples standing in the island among the swamp.

11. YEN ROYAL HOUSE (TUKDIN)



“It is presumed that Yen Royal House might be the place for the king watching ‘Sakava’ that was a kind of poem containing 4 lines, generally composed without preparation to sing in the boat.”

12. TALAT CHAOPHROM ROAD



“Talat Chaophrom Road being the East-West line from Pathan Bridge to the Royal Palace”

13. THE RUIN OF CITY WALL



The chronicle part 63 entitled Krung Kao (The old capital) presented that *“the city wall firstly in Ayutthaya Capital being not made of brick but just the hill line”*. Then, in the reign of King Mahathamaracha (1569–1590 A.D.) or after the first lost independence of Ayutthaya Kingdom (1569 A.D.), he changed the hill line to be brick city wall with 5 metres thick, 6 metres high, and 12.50 kilometres long. In addition to, there were 16 turrets, 99 gates (water gates and city gates), 10 canals in the city (5 vertical canals and 5 longitudinal canals), with soil and brick roads along the canals, 30 bridges (made of wood and brick), 1 literate bridge and 1 drawbridge as well.

14. WAT CHUMSAENG



“Wat Chumsaeng located on Talat Chaophrom Road and considered to be an architecture in the Beginning Ayutthaya Period ”

15. WAT LANGKHAKHAW



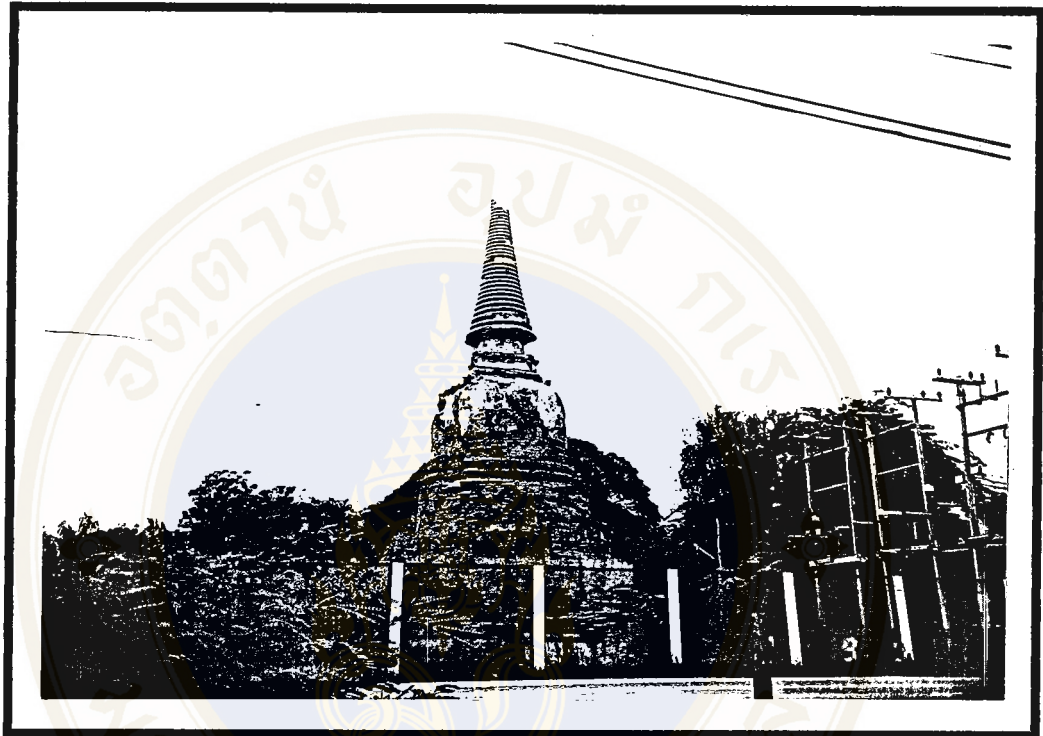
“Wat Langkhakhaw located behind Wat Mahathat and considered to be an architecture in the Beginning Ayutthaya Period ”

16. THAKALAHOM ROAD



Thakalahom Road (the road to the military port) is the north-south vertical line, between Talat Chaophrom Road to the south and Lopburi River to the north. The historical documentary presented that the area was formerly available for elephant raising. Therefore this road was the major way for the fighting elephants going to wars and taking a bath in Lopburi River as well.

17. WAT SUWANACHEDI



Wat Suwanachedi is presently a ruined temple in Wasukri Campus of Rachamonkol Technology Institute on Thakalahom Road. The temple; however, had no any documentary evidences of history, but the study of an architectural form in the temple was found that it might be built in the Middle Period of Ayutthaya, then getting a restoration in the Late Ayutthaya Period as well.

18. WAT RATCHABURANA



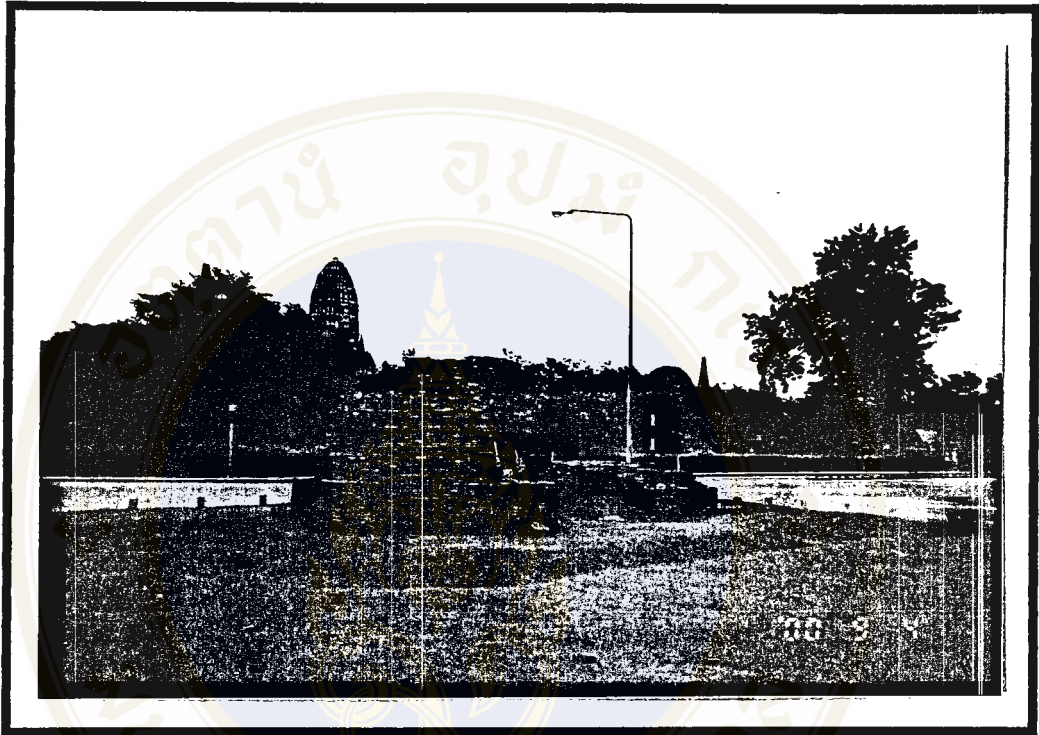
Wat Ratchaburana, King Samphraya built for his both older brothers memorials in 1424 A.D., Chao-ai Phraya and Chao-yi Phraya who were died in the war-field of the elephant fighting contest for competing the throne. The temple is presently located to the north of Wat Mahathat around Pathan Bridge where was the place of their doing the elephant-fighting contest. However, the stupa being the principal architecture of the temple, was effected to Khmer Design. Moreover, during the second lost independence to Burmese Power in 1767 A.D., the stupa was destroyed and took some valuable parts out away. Before 1957 A.D., the stupa was excavated for some valuable objects by the thieves. This is the reason for the Fine Art Department later excavated and collected all valuable objects in the stupa and maintaining them as the national treasures at "*Chao Samphraya Museum*". Furthermore, Wat Ratchaburana and Wat Mahathat had the Ubosot to the West of the temple. This was very different to other temples in Ayutthaya Period. This is the reason why these temples are presumed to be built during the Civilization Age of Ayothaya Period.

19. CHIKUN ROAD



Chikun Road is the North-South line along Khlong Pratuksaopluak. This road was always the major route for the army troop whenever there was a civil war including the throne competition war between Chao-ai Phraya and Chao-yi Phraya in 1424 A.D. The historical document notified that Chao-ai Phraya had settled his troop at Wat Phapphlachai while Chao-yi Phraya had waited his troop at Chikun Bridge before fighting at the area around Pathan Bidge as mentioned.

20. CHEDI OF CHAO-AY CHAO-YI



Chedi of Chao-ay Chao-yi is presently located at the basement of Pathan Bridge standing the middle way of Wat Mahathat and Wat Ratchaburana. The Chedi was built in 1424 A.D. by King Rachathirat II (Chao Samphraya) being the youngest brother of Chao-ay Phraya and Chao-yi Phraya who were doing the elephant fighting contest and both passing away. This event made Chao Samphraya getting the throne instead and then, he made the Chedi for his brothers' memory.

21. PATHAN BRIDGE



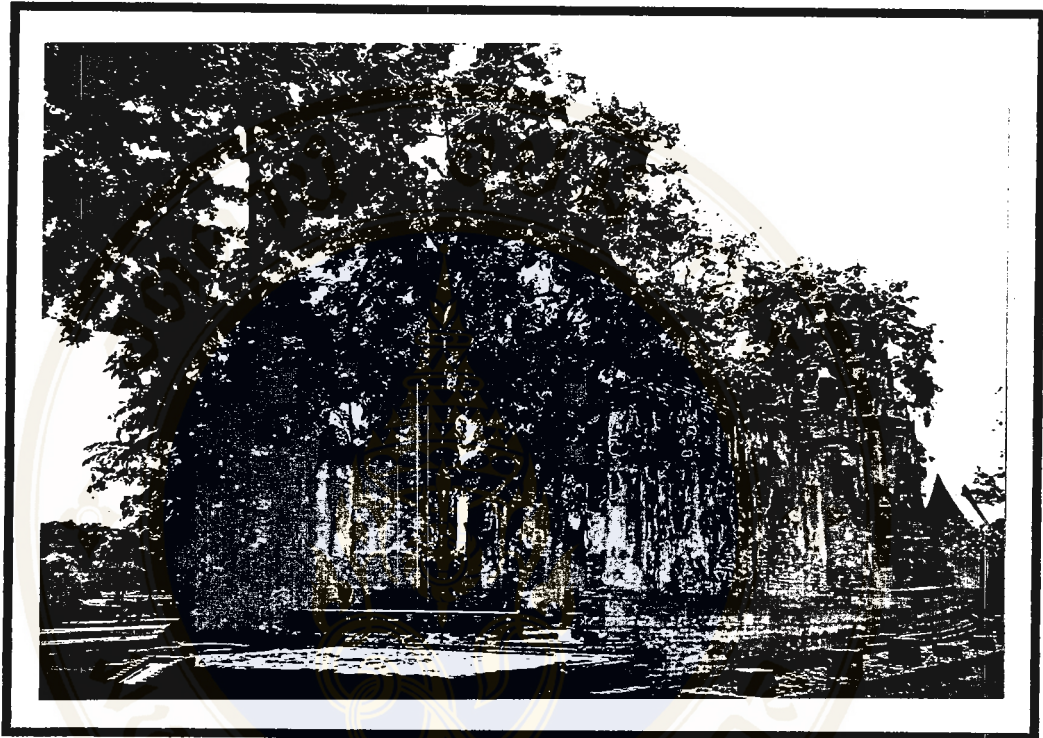
Pathan Bridge was made of brick with curved shape being across over Khlong Praticine or Khlong Pratuhaopleuk on Tatlat Chaophrom Road (presently called Naresuan Road). There were 3 channels with lotus shapes under the bridge for boating, the middle channel being bigger and higher than the right and left one. This was considered to be effected to the European Designs. It might not built before the reign of King Narai, the Great. However, the bridge is presently left its basement only while the two ruined chedies standing nearby are Chedies of Chao-ay Chao-yi that have been King Samphraya's brothers memorial monument.

22. WAT MAHATHAT



Wat Mahathat is presently located in the front area of the Royal Palace. It was built in 1384 A.D. by King Ramesuan. The historical document; thus, notified that after finishing the North War and also going back to the city. About 10 p.m., the king did his meditation at the royal palace. Then, Buddha Relic appeared to his eyes to the East, he called the chief of place office and took the royal vehicle there to mark the place. The King; then, constructed a large laterite stupa being khmer design with 38 metres high. In the reign of King Song Tham (1611 – 1628 A.D.), the stupa was broken down to the Garuda level. Then King Prasatthong (1629-1656 A.D.) did the restoration and enlarged the stupa to be 50 metres high. However, the stupa broke again in Ratanakosin Period so The Fine Art Department made the survey and excavation; this found many valuable objects as well.

23. WAT NOK



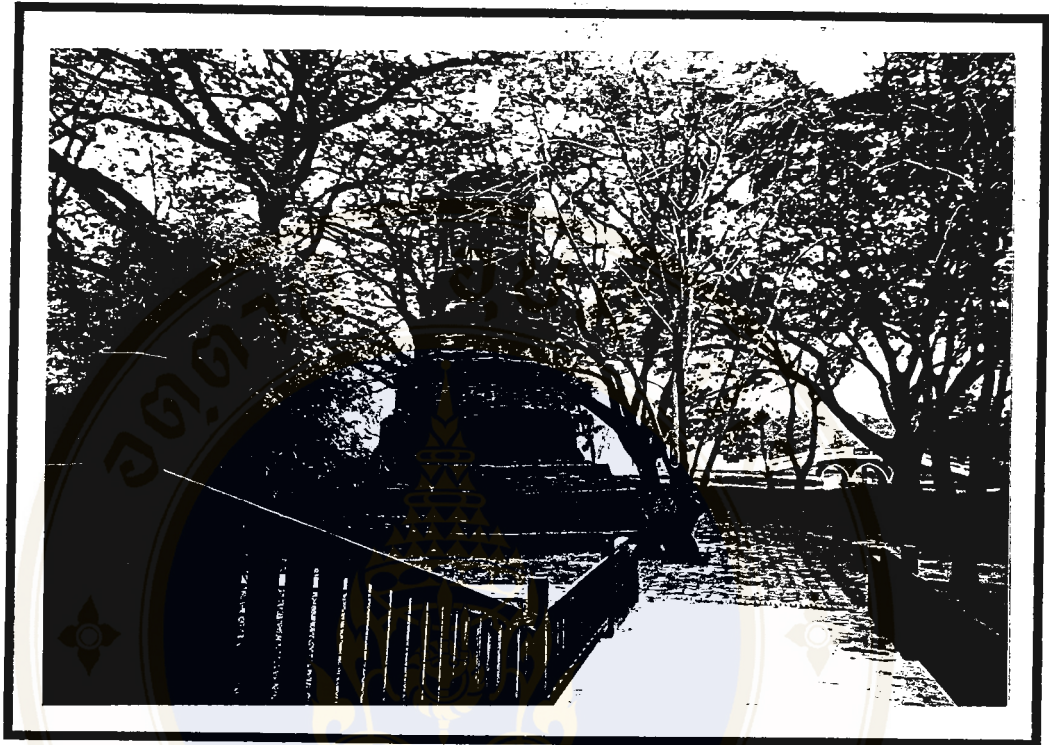
Wat Nok being a small temple located next to Wat Mahathat to the south, it is presumed that the temple was built in Beginning Ayutthaya Period. Thus, its architecture and some documentary evidences in the chronicle notified that, in the reign of King Maha Thamaracha (1569-1592 A.D.), there were some Mon People with a Mon Monk named Phramathekanchong coming to stay behind Wat Nok where was one of the most important morning markets in Ayutthaya City in the past. However, the temple was consisted of the principal stupa with Wihan in the front, having a door at the basement to the East, being the same stupa decorated design as Wat Som and Wat Langkha Khaw. Thus, these stupas were all designed of the Beginning Ayutthaya Period. Moreover, the stupa might be getting once the restoration in the Late Period of Ayutthaya.

24. WAT LANGKHADAM



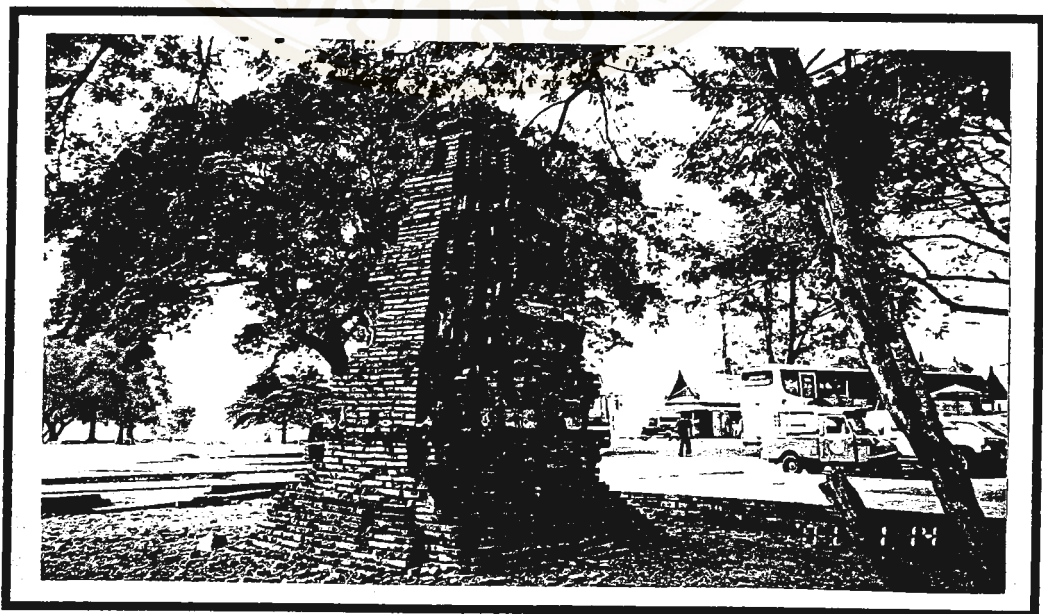
Wat Langkhadam (the temple with its black roof) is presently a ruined temple in Bung Phraram Public Park and no historical documentary evidence. The temple name; thus, "*Langkhadam*" (a black roof) might be later specified in accordance with "*Wat Langkhakhaw*" (the temple with a white roof) which was located around to the North. The architecture in the temple; however, consisting of the Principal Chedi, Ubosot and some Surrounding Chedies which have already restored. Especially, the principal chedi was a round bell shape on the basement being the same style as the corner chedies of Wat Ratchaburana. The Ubosot was a small building with the wall-hole-door style while the surrounding-chedies being the corner-chedi style that was popularly built in the late Ayutthaya Period.

25. WAT SANGKHAPAT



“Wat Sangkhapat considered to be an architecture in the Beginning Ayutthaya Period”

26. WAT CHAN



“Wat Chan located on Chekun Road, the right part of Wat Mahathat.”

27. WAT PHONG



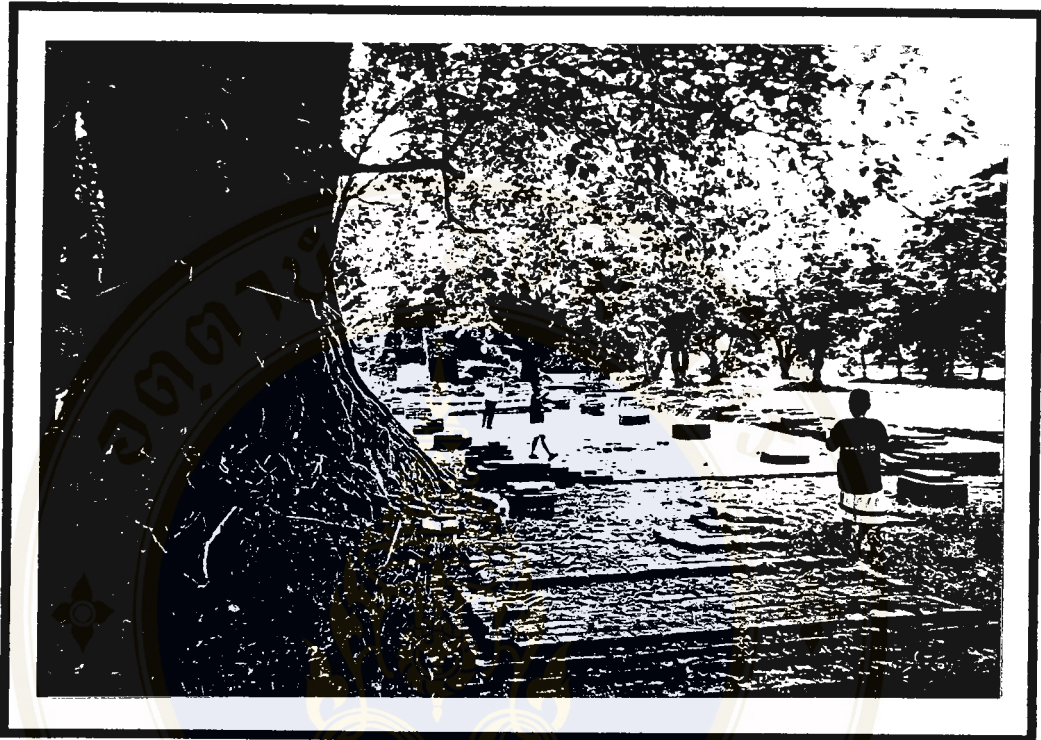
Wat Phong is presently the ruined temple in Bung Phraram Public Park and no historical documentary evidence. The chronicle part 63 entitled on Krung Kao (the old capital) edited by Phraya Boranratchathanint (1908 A.D.) notified that in the front area of Wat Phong, there was Thai-Mon grocery shops and bronze-ware markets in Ayutthaya City. The temple was consisted of the principal chedi with bell-spired shape, Wihan and Surrounding-Chedies in the wall rounded with moat and water area of Phraram Swamp. This looked the temple standing in an island. However, the study of its architecture indicating that the temple might be built in the Beginning Period of Ayutthaya and getting some restorations in the Late Ayutthaya Period as well.

28. CHIKUN BRIDGE



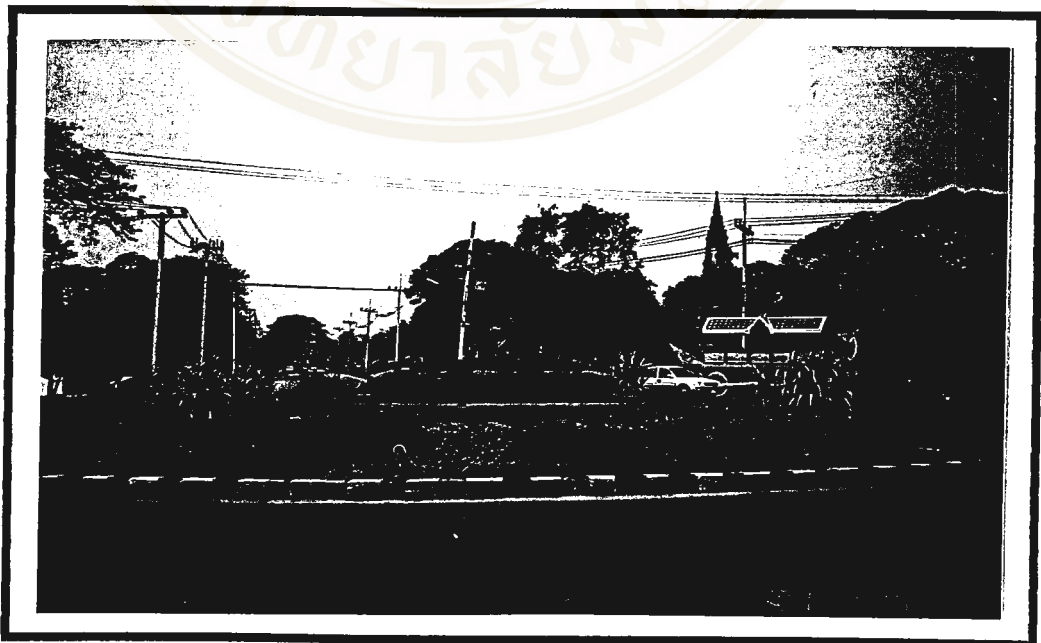
Chikun Bridge was made of brick and overstepped "*Khlong Pratucine*" on Paton Road. It was the same shape, size and design of Pathan Bridge that was effected to the European Architecture. The bridge ruin is presently its basement of the west part only. However, the surrounded area called "*Yan Chikun*" where was the Brahman Settlement. The Brahman; thus, in Ayutthaya Period was a very important group of people doing the rituals supporting the king authority. Therefor, they were always allowed to live closely to the royal palace. Furthermore, the king in Ayutthaya Period also supported Brahmanism as the chronicle notified that "*King Prasatthong asking to move the Brahmanic Temple of Shiva and Visanu Area*" In addition to the Chikun Area was also the war route as the civil war between King Narai and King Srisuthamracha who was his younger uncle, King Narai stoped by to worship the divine at the chikun before attracting and getting victory to the war.

29. WAT TRAITRUNG



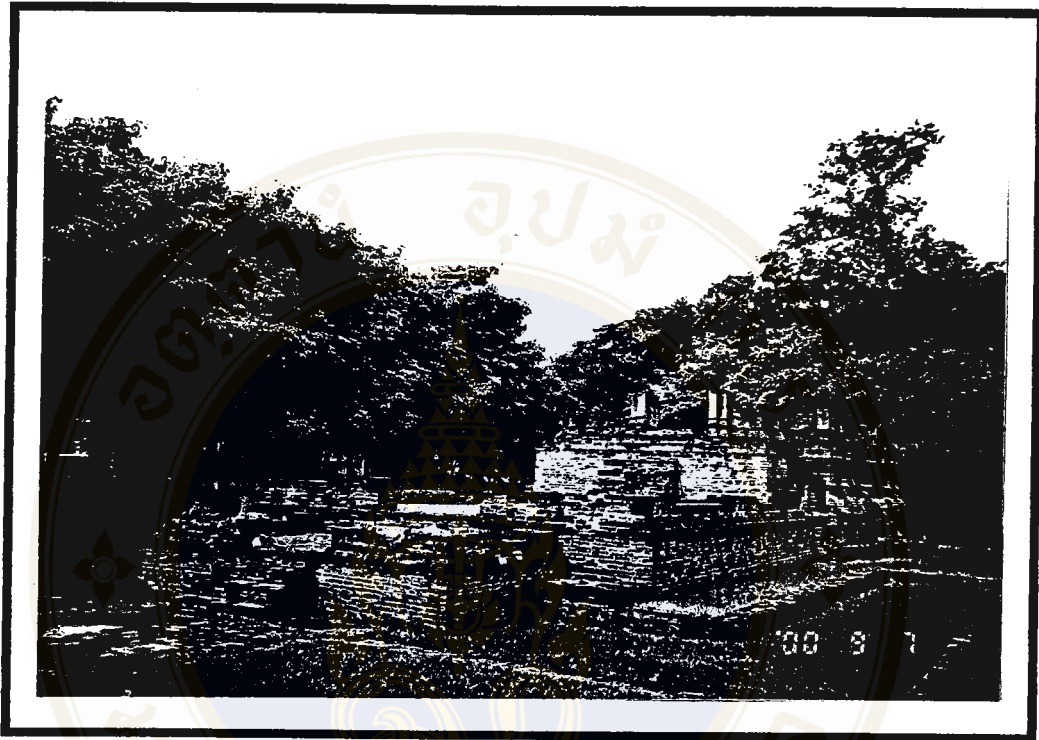
“Wat Trairung being no documentary evidence of history”

30. TALAENKAENG



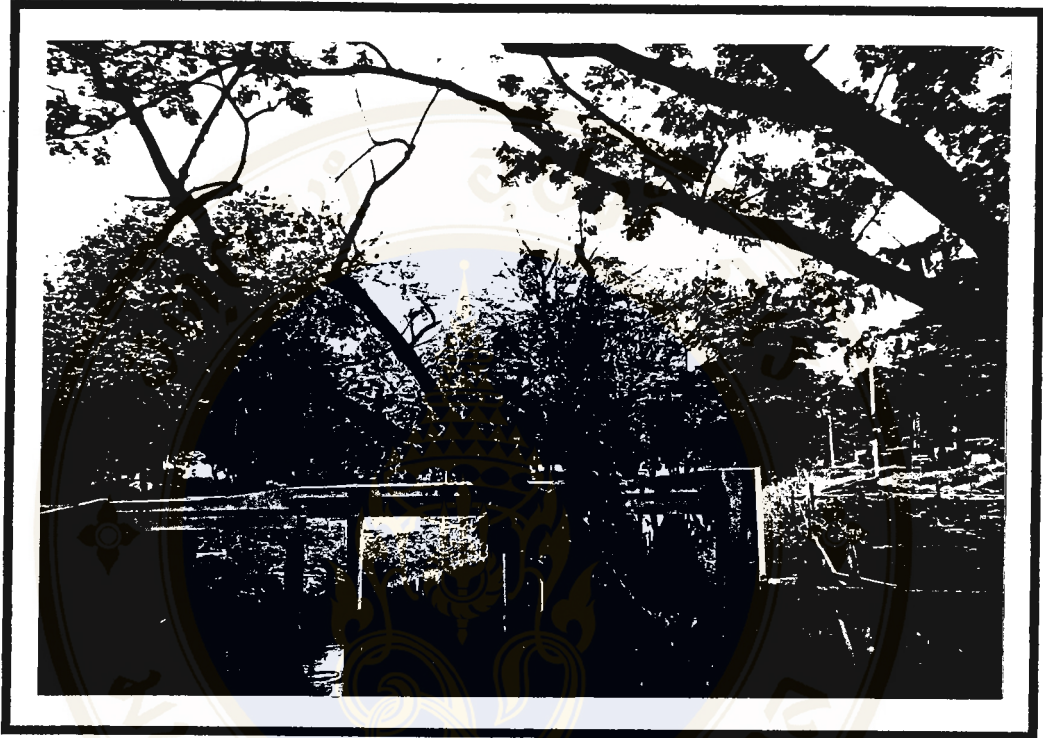
*“Talaengkaeng being the area for prisoner execution in the city heart
and the center of silverware in Ayutthaya Period”*

31. SANPHRAKAN



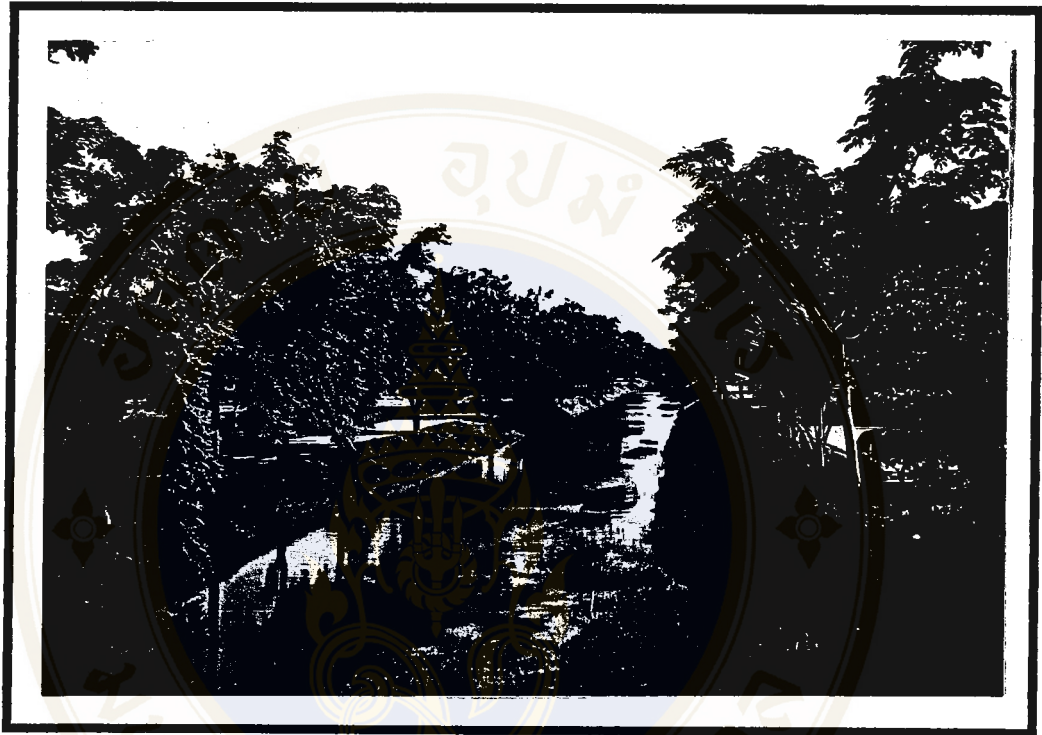
Sanphrakan was located around Talaengkaeng Intersection where was the city heart in Ayutthaya Period. This archeological site, from the study of Archeological Faculty of Silapakorn University, was built in the Beginning Ayutthaya Period, being a stupa shaped house with 4 side grotto decoration and lived inside the Brahmanic Immages as Shiva, Visanu and Kanete etc. Then constructed the Wihan at the front area of the stupa. This evidence was presumed that Sanphrakan firstly had been a Brahmanic Temple before adapting later to be a Buddhist Temple. The Buddhist temple might be available in 1636 A.D. as the chronicle notified that ***“King Prasatthong was allowed to move the Brahmanic Temple from Sanphrakan to be the new one around Chikun Area”***. However, Sanphrakan became again the ruined archeological site in the Late Ayutthaya Period since then.

32. KHLONG NAKHONBAN



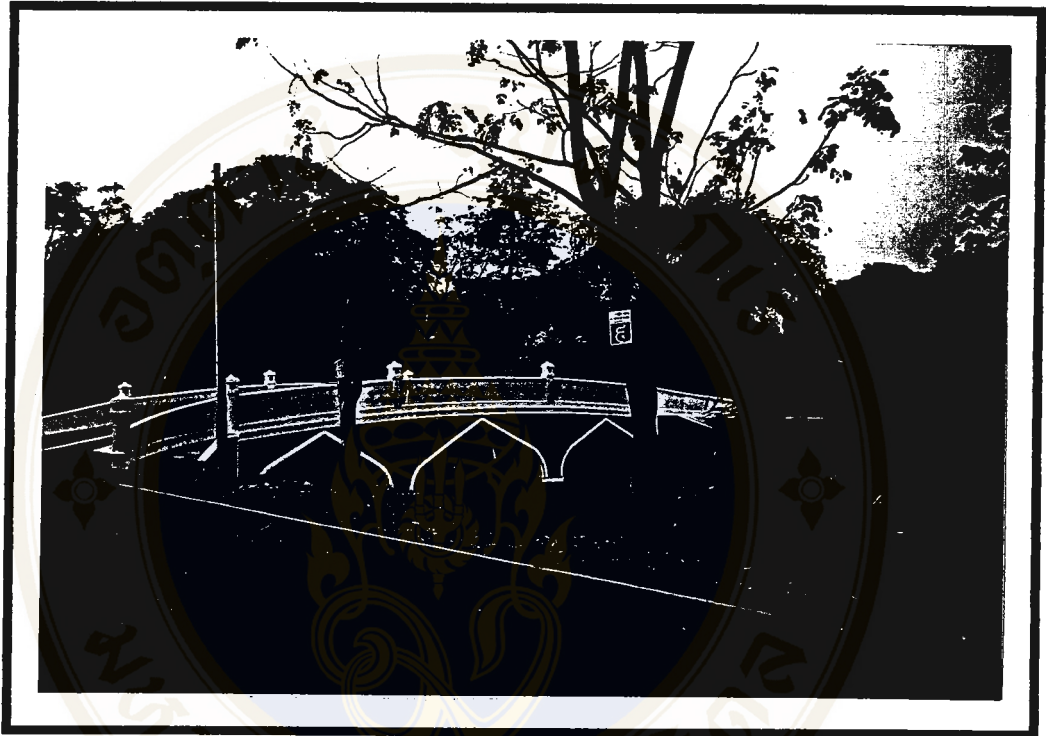
Khlong Nakhonban was a canal branch of Khlong Tho. Thus, the canal was the East-West line to take water for people consumption both in Nakhonban Prison and its surroundings. Presently, the Fine Art Department is excavating the canal and constructing some bridges over to be convenient for tourists visiting both parts of the trade center at the old cityhall area and Wihan Mongkhonbophit in the other side.

33. KHLONG THO



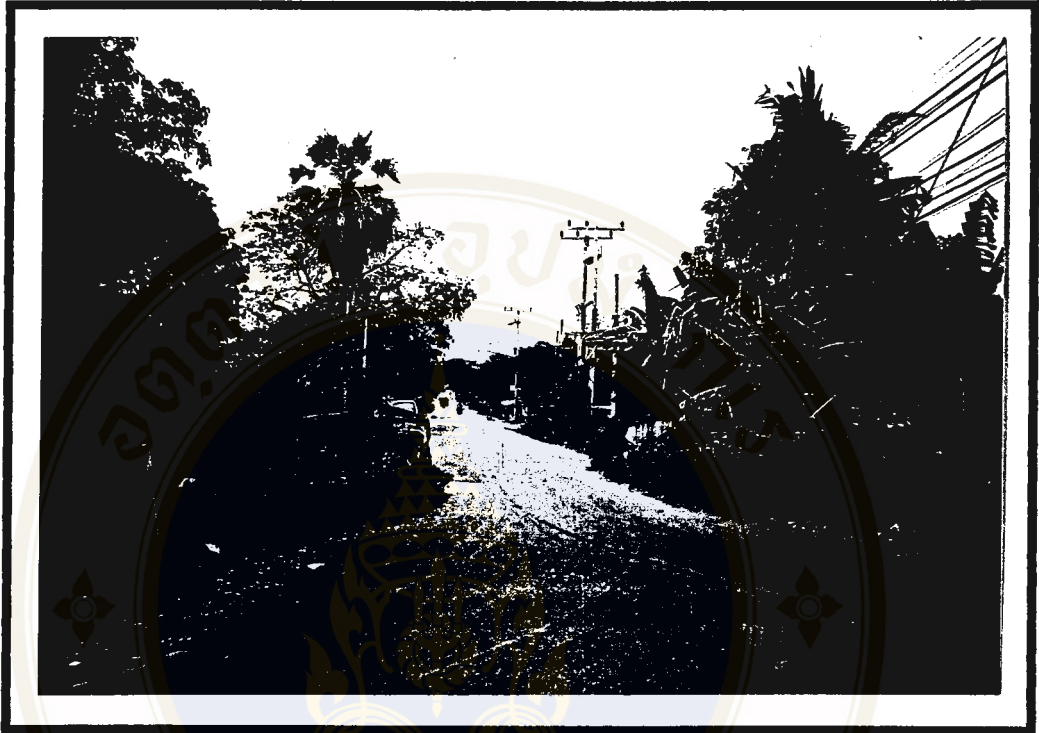
Khlong Tho was one of the three largest canals including Khlong Tho, Khlong Ratanachai and Khlong Pratumkaopleuk. It was located in the North-South line of Ayutthaya Isand. Thus, the North part of the canal was called "*Khlong Tho*" starting at Lopburi River running south and pass the back area of the royal palace and Wihan Phramongkonbophit, through Lamhoey Bridge and ending to Chaophraya River at the point opposite Wat Buddhisawan. The South part was called "*Khlong Cha Kraiyai*" where was the center of silverware. Khlong Tho in Ayutthaya Period; furthermore, was available for water transportation, it was also used for the waterway to the royal palace and Phraram Swamp as well.

34. LAMHOEY BRIDE



Lamhoey Bridge was originally called "*Habphoey Bridge*" (habphoey meant a prison). Thus, it was called this because the bridge stayed over Khlong Tho at the connection of Loas Road and Nakhonban Road being the way directly to the front part of a prison and ending at "*Talaengkaeng*" where was the city heart. The bridge; however, was for boats passing and the middle channel being bigger than the left and the right one.

35. LANGWANGLANG ROAD



*“Langwanglang Road being previously named ‘Loas Road’
connecting the Royal Back Palace and the Royal Grand Palace”*

36. LIAP KHLONG THO ROAD



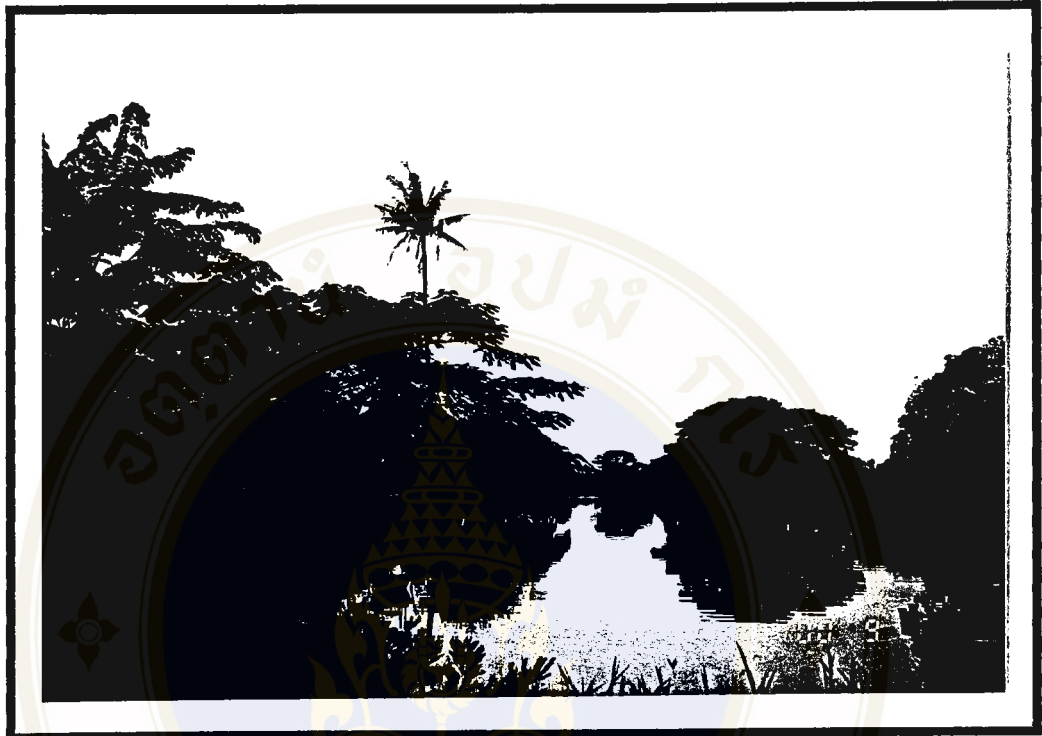
*“The road along both sides of Khlong Tho which being one of the
three largest canals in Ayutthaya Island in the past”*

37. WAT SOM



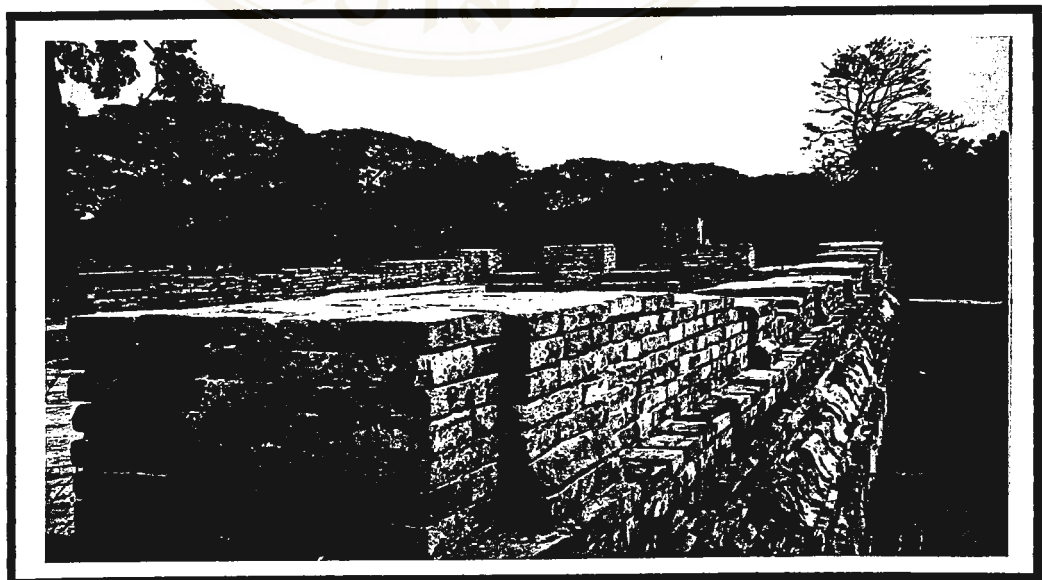
Wat Som was a small temple in the southern part of Khlong Tho called "*Klong Chakraiyai*". It had no historical documentary evidences. The principal stupa made of brick, and decorated with stucco; thus, the structure and decoration of the stupa evaluating from Khmer style of architecture in the late 18th century. This indicated that the principal stupa of Wat Som might be constructed before Ayutthaya Period because it is older than other stupas constructed in the Beginning Period of Ayutthaya as a small sized stupa in Wat Mahathat (1374 A.D.) and Wat Ratchaburana (1424 A.D.) etc.

38. KHLONG KLAEP



“Khlong Klaep being East-West canal connecting Khlong Tho and Chaophraya River”

39. WAT SANGKHATHAE



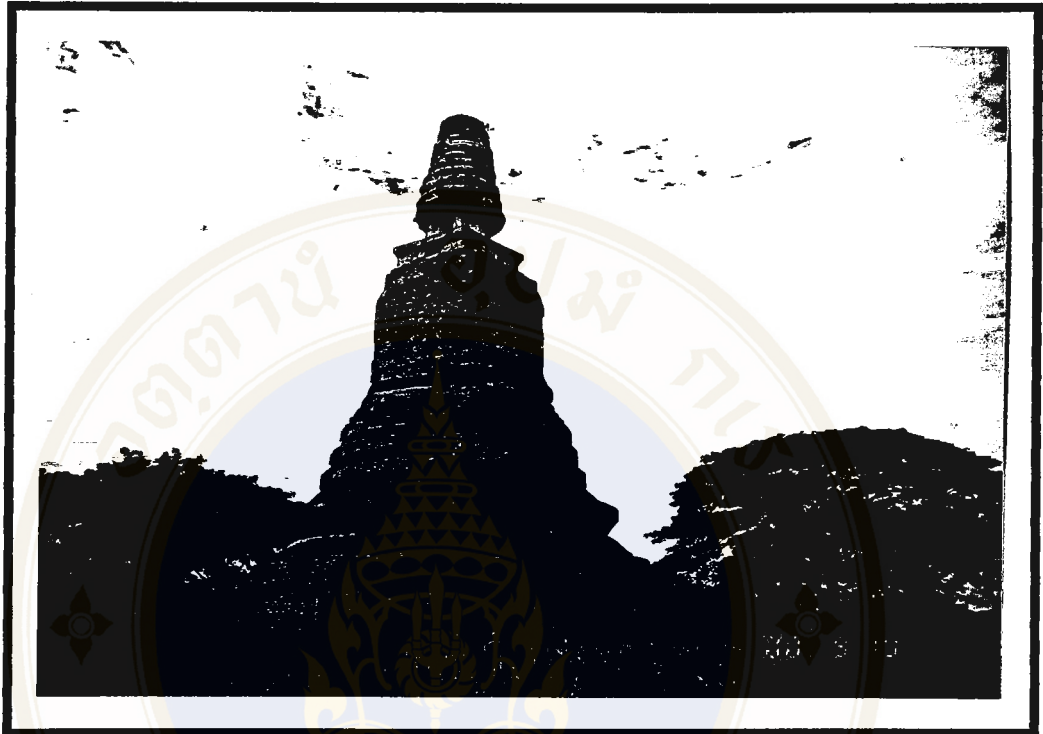
“Wat Sangkhathae being an architecture in the Middle Ayutthaya Period”

40. WAT SANGKHATHA



Wat Sangkhatha had no documentary evidence of its history. The temple archeological sites were the Castle-Spired Shape Chedi decorated with Lanna Style Stucco. At the front of the Chedi was a large Wihan, Round-Bell Shape Chedi and Ubosot standing the same line in East-West. In the North part of the temple, there were some ruins; a base of building like Wihan and Bell Tower decorated with stucco. Thus, this form indicated the archeological sites in the Middle Period of Ayutthaya and getting later restoration in the Late Period.

41. WAT CHEDIYAI



“Wat Chediyaï being no documentary evidence of history”

42. WAT CHAOPHRAM



*“Wat Chaophram being an archeological site
in the Beginning Ayutthaya Period”*

43. WAT UBOSOT



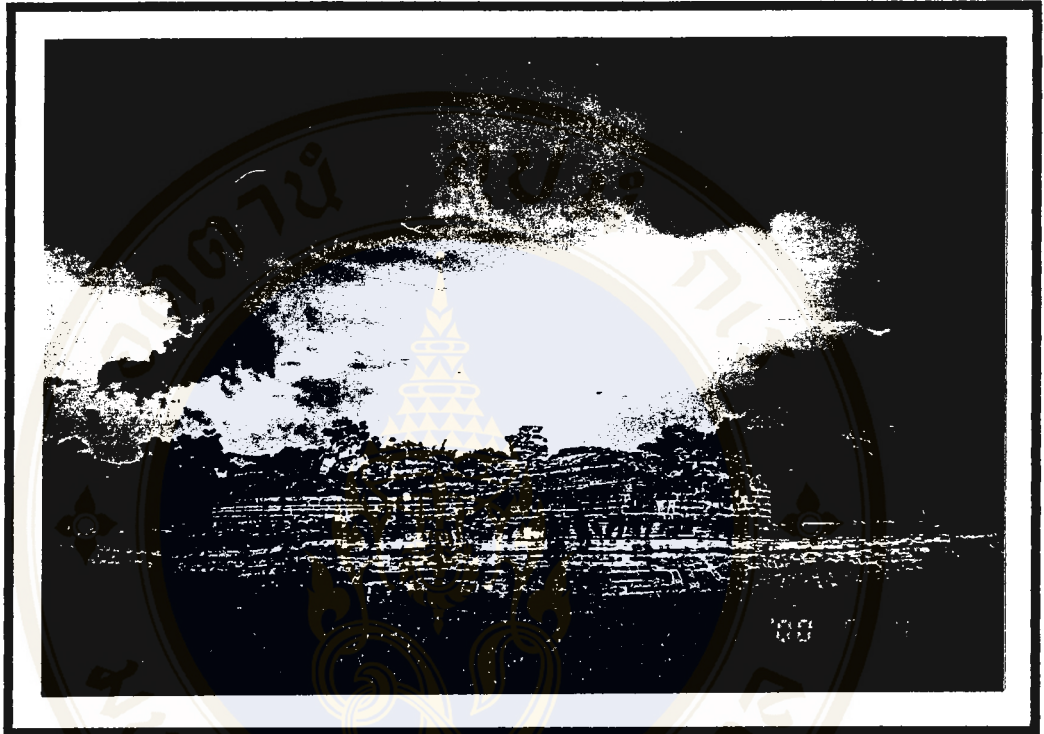
Wat Ubosot has been no documentary evidence of history. The temple architecture is presumed that it might be built in Middle to Late Ayutthaya Period because of the principal chedi being corner-chedi style as Sisuriyothai Chedi that was popularly built in the Middle Ayutthaya Period. In the front area of the principal chedi, there is a base of building excavated that it was previously available to be firstly the Ubosot, then adapted to be the Wihan in the Late Period of Ayutthaya.

44. WAT CHAOPRAP



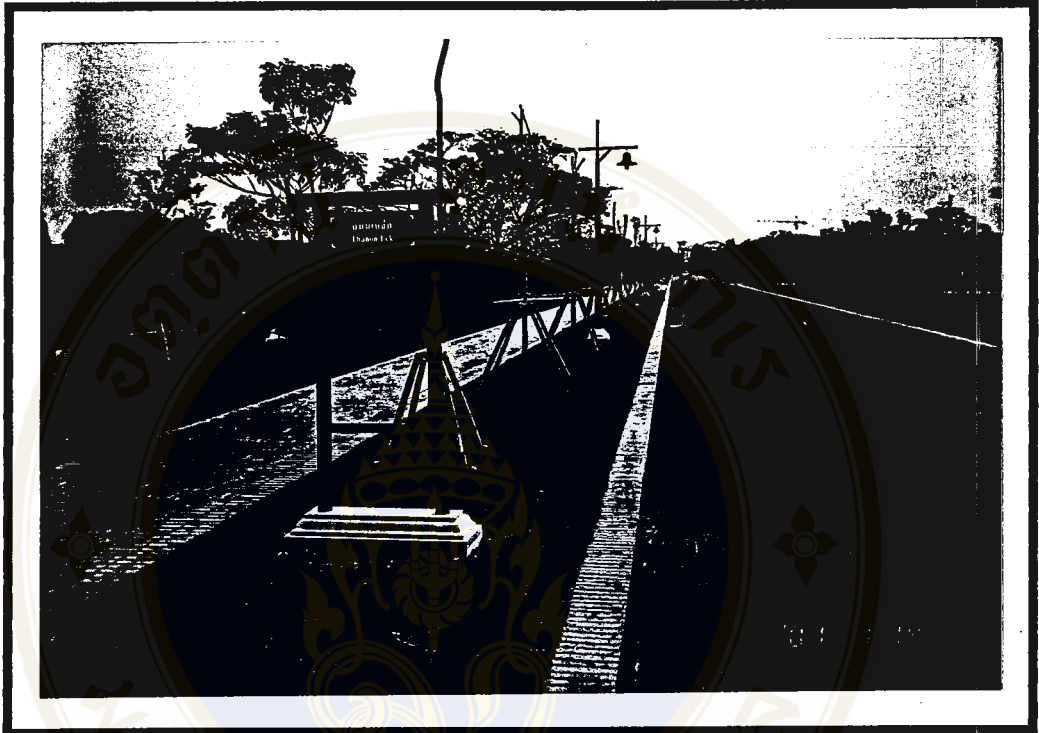
Wat Chaoprap had no documentary evidence of history. However, it is presumed that the temple might be one of some major temples in the city because of the 19th part of notation for the traditional performance explaining the conventional function of the palace police providing in the royal palace. The book mentioned to the temple that *“Visiting monastery both in and out the city, in the city temple as Wat Chaoprap, the royal varanda with roof should be provided”*. Thus, the temple archeological sites; the principal round shaped chedi on the basement was popularly designed in the Beginning Ayutthaya Period. However, the Ubosot, Surrounding- Chedies and its rectangular spired shape over are appeared to be restored in the Late Period of Ayutthaya.

45. KHLANG DIBUK



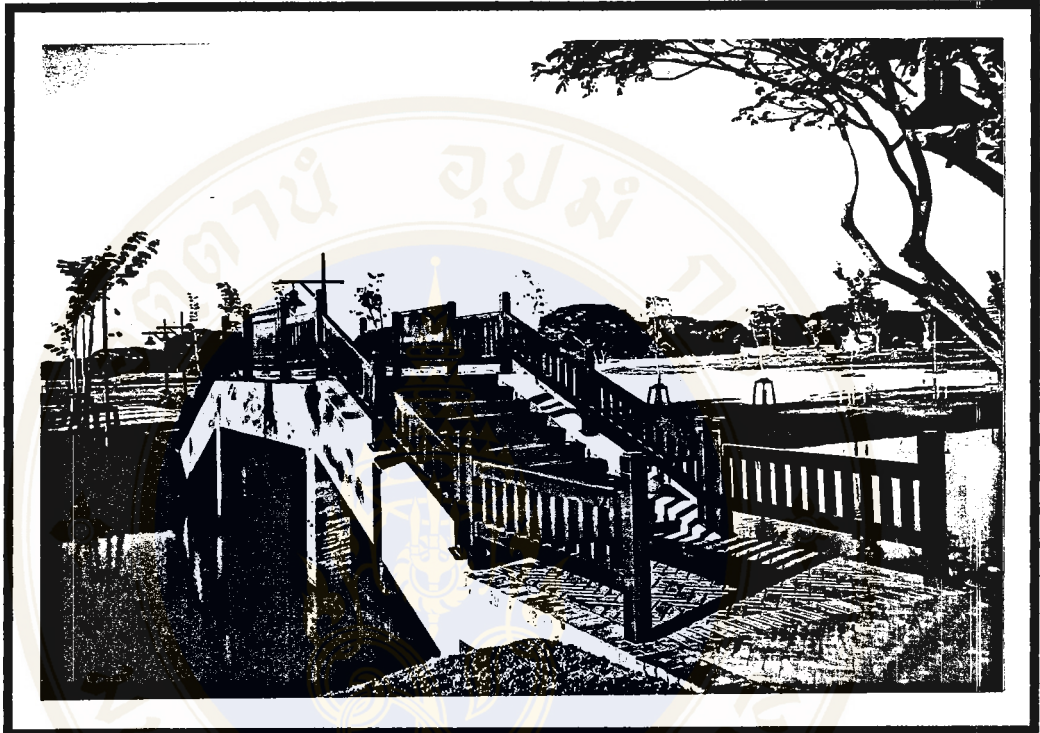
Khlang Dibuk (a storage of tin) was located to Northeast of Wat Chaoprap where was in the Southern Part of Khlong Tho. The tin storage presently leaves the rectangular base only. Its walls were made of brick alternating laterite and the building was divided into 3 rooms that were presumed to be *“the place for tin collecting”*. The tin in Ayutthaya Period; thus, was necessary material producing tin-copper metal (tin mixing to copper is tin-copper metal for making a set of tea and tin roof). This is referred to the chronicle mentioning that *“The Royal House of Sanphetprasat getting the tin roof”*.

46. TALATLEK ROAD



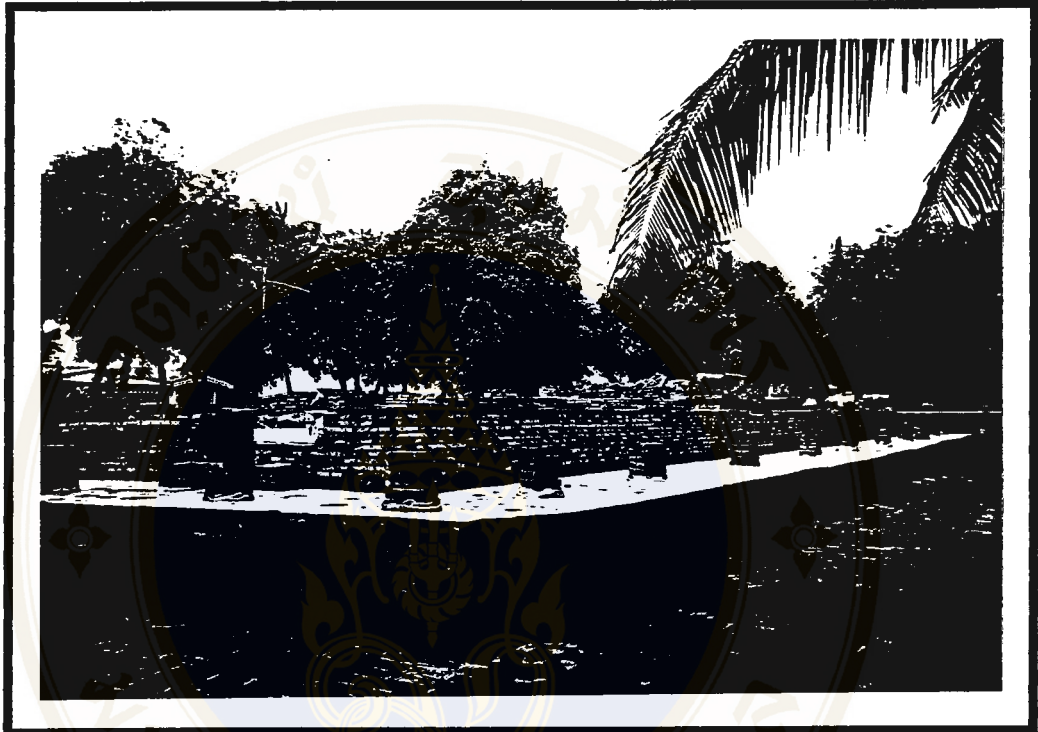
Talatlek Road was *“the area of black smith”* in Ayutthaya Period. Accordingly, the historical document said that in Ayutthaya, there was the most important city road being *“Craftman Center”*. The Fine Art Department; then in 1969 A.D., did the study and excavated survey. This revealed that the road was firstly pressed with soil, then paved with brick on the road surface, about 30 metres wide and 1,000 metres long with moats flanking both right and left of the road.

47. KHLONG TALATLEK



Khlong Talatlek was an excavated canal on the left and right of Talatlek Road to take soil making the road and market area. The ancient document noted that *“Talatlek Road being a market selling various goods; especially, some basic instruments made of iron”*. The road; thus, was about 30 metres wide and 1,000 metres long. Presently, the Fine Art Department has developed here to be a new area for relaxing and touring in Suan Somdej Praratchachonanee as well.

48. WAT LUANGCHIKRUT



Wat Luangchikrut is presently located to the East of Wat Wangchai, not appeared its historical documentary evidences. The temple is consisted of the Principal Chedi, Ubosot and some Surrounding – Chedies having been already restored. The study by excavation was found that the principal chedi was firstly consisted of three round-shaped chedies standing in the North-South line as the principal chedi of Wat Phrasisanphet. This was presumed that *“the temple might be constructed in the founder’s area or his family temple for the relatives doing their religious activities in the Middle Ayutthaya Period”*. In addition to the ruin building out of the temple wall to the west was consisted of a number of ruined brick poles, this being presumed to be a monk house or a royal house being the same style as Wat Maheyong and Wat Kudidao in the same area of Ayothaya Ancient City.

49. WAT WANGCHAI



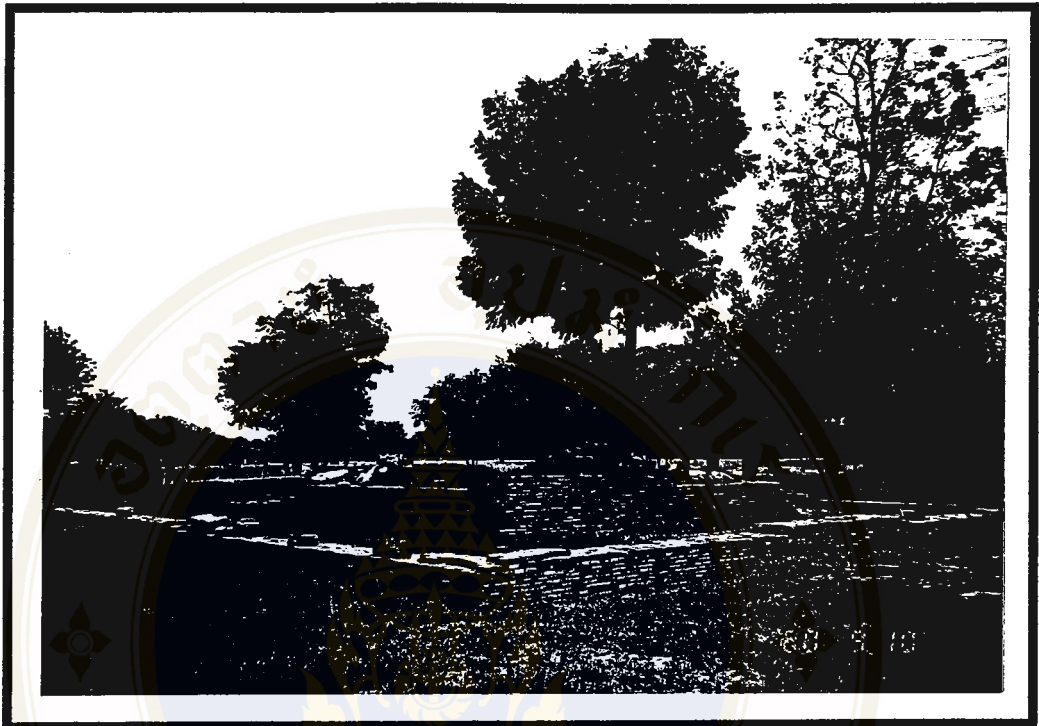
Wat Wangchai is now a ruined temple located on U-thong Road in the southern part of Ayutthaya Island. The chronicle of Ayutthaya presented that the temple was built in 1530 A.D. by King Chakraphat. The temple was in the area where was his former residence before getting the throne. However, the temple architecture including the Principal Chedi, Ubisot and Wihan have been already made a restoration. Furthermore, it was found that all directions of the Temple Sema Base were made of slate being the same as the Temple Sema in the Beginning Period of Ayutthaya. In addition to the chronicle part 63 entitled Krung Kao (the old capital) notified that *“Wangchai area being the major land for bronzeware in Ayutthaya City”*.

50. WAT MAHASAMAN



Wat Mahasaman is presently the ruined temple behind Srijalai Royal House. It had no documentary evidence of history. However, the word “*Mahasaman*” appeared in the northern ancient document referring to the original community believing in “*musk deer*”. (Thai calls “*saman*”) It was believed to be a good animal doing sacrifice his life to the king. The emigrated northern people then distributed this concept to Ayutthaya City. However, this temple is presumed to be the settlement of the Northern People mentioned in Ayutthaya Island. Moreover, in the temple, there are some architectures; the Principal Chedi that was popularly built in the Middle Ayutthaya Period, Ubosot and the Chedi Basement getting a stable restoration. Furthermore, the front area of the temple might be previously one of the four major boat ports in Ayutthaya Island.

51. WAT PHRA-NGAM



*“Yan Dinsor (Stationery Area) being nearby Wat Phra-ngam,
producing and selling black and white pencil”*

52. WAT PA-SATHON



“Wat Pa-sathon being no documentary evidence of history”

53. WAT LOKAYASUTHARAM



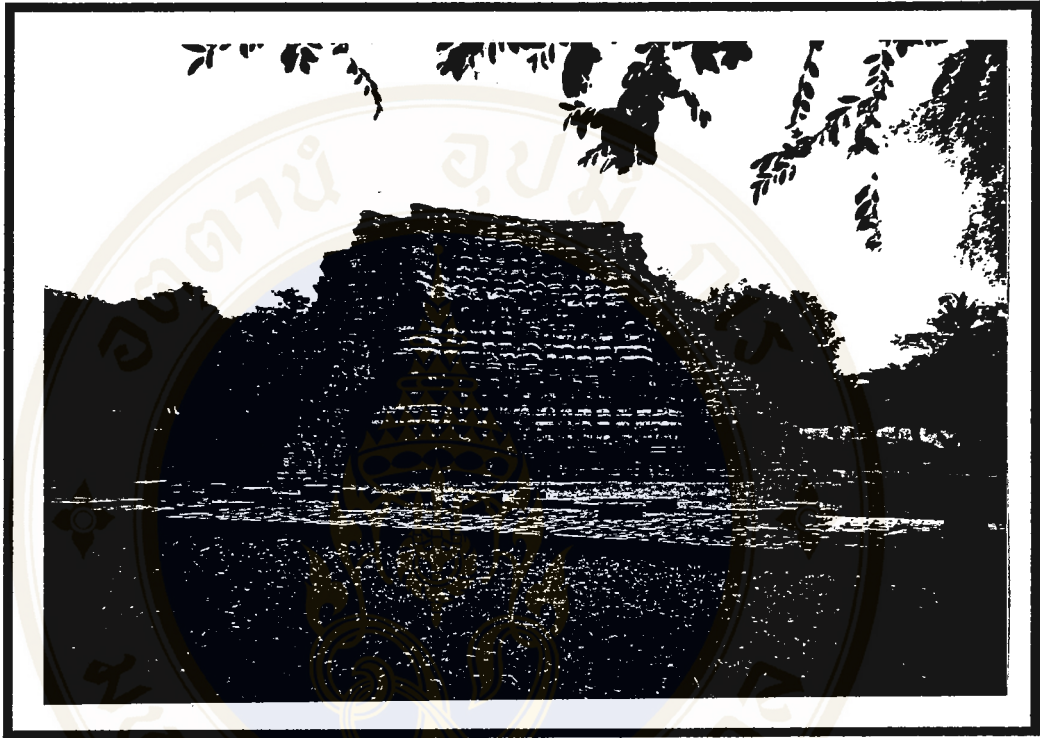
Wat Lokayasutharam is presently located to the south of Wat Chettharam. It had no documentary evidence of history. However, the study to the temple archeological sites revealed that the structures and stucco designs of the principal stupa are similar to the archeological sites constructed in the Beginning Period of Ayutthaya. This is the same as Wat Mahathat, Wat Ratchaburana and Wat Som etc. Furthermore, the temple was found its later restoration at the stupa-roof. Behind the principal stupa, there is the Ubosot appeared at least 3 times of its restoration. Together with, there are 3 Wihans standing in front of the principal stupa. The back part of the Principal Wihan connecting to the balcony as the plan of the royal monastery in the Beginning Ayutthaya Period. While the temple West area, there is a Wihan located the Reclining Buddha. It might get the last restoration, covered whole body with leaved goal and also decorated the previous form of Buddha head to be dressing-style in 1956 A.D.

54. WAT WORACHETHARAM



Wat Worachetharam is presently located nearby Wat Rakhang, built in 1605 A.D. by King Ekathosarot (Phra Ong Khao) who was the royal younger brother of King Naresuan, the Great(Phra Ongdam) to contain his beloved King Relics. This is why the temple named "*Wat Worachetharam*" which meant "*the temple being memorial for the older brother*".

55. WAT RAKHANG



Wat Rakhang or Wat Rakhang Khositdaram is presently located the other side of Khlong Tho behind the royal palace. It was built for the patriarch being responsible to all monks in the city in 1377 A.D., the Beginning Period of Ayutthaya. King Songtham; furthermore, who was a son born by concubine of King Ekathosarot had ordained here named "*Phrapimoltham*" before getting the throne in 1611 A.D. Then, King Boromakot (1732-1758 A.D) permitted some Thai Buddhist Monks traveling to study in Colon, After getting back, the monks took "*Po Tree*" from Buddhakhaya to present to the King and then, planted them at Wat Rakhang. Therefor, the temple name has called "*Wat Worapho*" since then.

56. WAT WORAPHO



Wat Worapho was previously named "*Wat Rakhang*", located now on U-thong Road, Thawasukri Sub-district, Mueng District Ayutthaya Province. Due to the second lost of Ayutthaya Independence to Burmese Power, the temples where located nearby the royal palace were destroyed to be ruined temples. Then, in the reign of King Rama V (Chulalongkorn of Ratakosin), the temple got a restoration and some monks living in since then. Furthermore, there have been 6 abbots managing the temple since its restoration and the present abbot is "*Phra Atikankulab Suchito (Phra Kru Pitak Worapho)*" being 86 years old (43 years of monkshood) as well.

57. WAT MAICHAIWICHIT



Wat Maichaiwichit is presently located in the north part of Ayutthaya Island, constructed in the late reign of King Rama III. It is presumed that the temple standing in the area being a previous governor's house of Monthon Krung Kao; Phraya Chaiwichit (Phuak). It is said that the governor had moved his residence somewhere out before donating the old house being a temple or his relatives might build the temple for his memorial after his death. However, the documentary study and excavation indicated that the temple area has stayed over the brick road from "*Paktho Portress*" being paralleled the royal palace wall to "*Thawasukri Royal Port*" at Lopburi River.

58. WAT THAMIKARAT



Wat Thamikarat is presently located in the front area of the royal ancient palace. The ancient document revealed that Phraya Thamikarat who was Phrachao Sainamphung's son-in-law reigned the throne and constructed "*Wat Mukharat*". Then, the temple name changed to be "*Wat Thamikharat*". There are no any documentary evidences confirming its history but some indicators presuming the temple might be constructed the same period of "*Wat Panancherng*" which was the Ayothaya Period Archeological Site. However, there is presently a very large wihan located on the hill and the Buddha's Head maintained at Chao Samphraya National Museum in Ayutthaya Province. Furthermore, the Principal Chedi has been considered to be Ceylon-Bell-Shape surrounded with stucco standing lions and 13 small surrounding-chedies as well.

59. WAT YANASEN



Wat Yanasen was said that in Ayutthaya Period, there was a storehouse located nearby the temple for elephant lasso and a waterway called “*Khlong Namchiaw*” lying under the north side of the temple walls to Phraram Swamp. This waterway did its function as a way to drain water from Lopburi River to the Swamp. However, there is presently no temple wall any more, some archeological site restored on the former basement and the Principal Chedi being angle-corners style, which is the same style of Sisuriyothai Chedi. In 1944 AD, the Department of Fine Art excavated the principal chedi this was found some ancient objects and Buddha Images

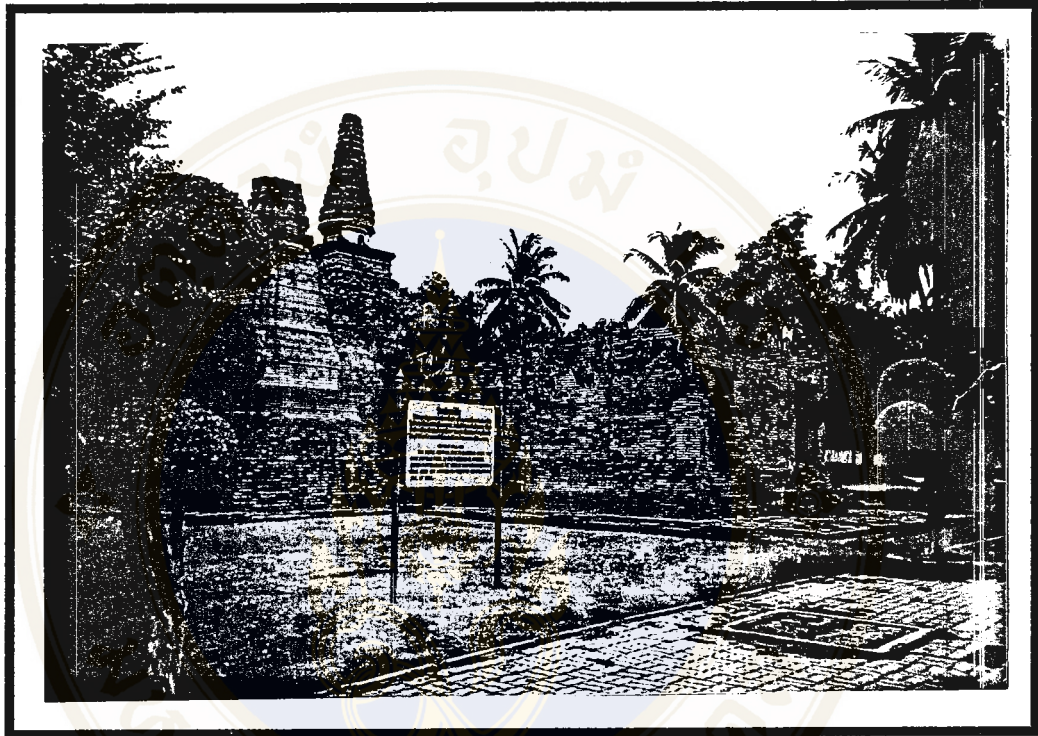
made in the Period of Lopburi and Ayutthaya. While the Ubosot is considered to be the Beginning Ratanakosin Style which was a new building on the previous base. Thus, it is in accordance with history mentioned to the temple getting once restoration in the Period of Ratanakosin.

60. KHLONG PRATUKHAOPLUEK



Khlong Pratukhaopluek in the past was one of the three largest canals; Khlong Tho, Khlong Ratanachai and Khlong Pratukhaopluek in the city. This canal is north-south parallel to Khlong Tho. The north- part of the canal was called "*Khlong Pratukhaopluek*" ending at Lopburi River. While the south part was called "*Khlong Pratucine*" ending at Chaophraya River. However, this canal was not available to water transportation only but also to water draining from Phraram swamp to some rivers as well.

61. WAT PHLAPPHLACHAI



Wat Phapplachai is presently located in Pratuchoi Sub-district. It had no documentary evidences of history. However, it always appeared the name of this temple in the Chronicle of Ayutthaya facing the civil war to compete for the throne between Chao-ay Phraya and Chao-yi Phraya and they both passing away in the war-field. Thus Wat Phlapphlachai was settled to be Chao-ay Phraya Military Base. So it is presumed that this temple might be constructed in the Beginning Ayutthaya Period.

3.5 Conclusion

The art object environment in Ayutthaya Province was certified to be the World Cultural Heritage in December 13,1991 by UNESCO. It covers 1,810 rai with 7,335 households of 27,000 people living in Pratuchai and Thawasukri Sub-district being a partial Island of Ayutthaya. The community; however, has been settled their living for not less than 105 years or since 1895 A.D. Moreover, the original establishment of Ayutthaya Community had to be back deeply studied over 650 years (1350 A.D.-present) being classified to 4 periods; Ayutthaya Civilization (417 years; 1350-1767 A.D.), The Ruined City (140 years; 1767 – 1907 A.D.), The Ancient City Conservation and Development (83 years; 1908 - 1991 A.D.) and The World Cultural Heritage of Ayutthaya Historic City (1991 A.D.-present). The researcher's field study presented that there were 95 archeological sites certified for master plan of the art object environment conservation and development in Ayutthaya Historic City in 1987 A.D. However, there have been left presently 61 archeological sites only. The rest (34 sites) was no empirically evident appearance. Those places are now occupied by people residences and infrastructure construction as some roads and government building as well.





King Taksin, the Great, spending only 7 months for independence declaration from Burma, then he reigned the throne for Thonburi Capital in December 28, 1767 A.D. and died in 1782 A.D. at the age 47 years old.

UNIT 4

A CONCEPT FOR ART OBJECT ENVIRONMENT CONSERVATION AND DEVELOPMENT

4.1 Introduction

The art object environment conservation and development make various benefits to a community, not only natural and cultural environment conservation but also being sources for studying or researching in a community. Therefore, all related should be complete in knowledge and understanding to problems and their causes together with the principles, approaches and methods of art object environment conservation and development. This is to ensure that the art object environment conservation and development can be performed in the right ways, being stable and sustainable supporting the values of art objects environment in a community.

4.2 Problems and Causes of Art Object Environment Destruction

The art object environment gets presently various problems; dysfunction of land use, changing of values and pattern of life, lack of public mind, under developed infrastructure, and pollution. These problems are considered to be caused by nature and human behaviors. The natural causes are; climate, earthquake, flooding and wild fire etc. while the human behavior causes may be direct acting to art object or indirect acting as doing damage somewhere surrounding an art object etc.

4.3 Art Object Environment Conservation and Development

The conservation and development on art object environment should be performed to the principles, approaches and methods as the following;

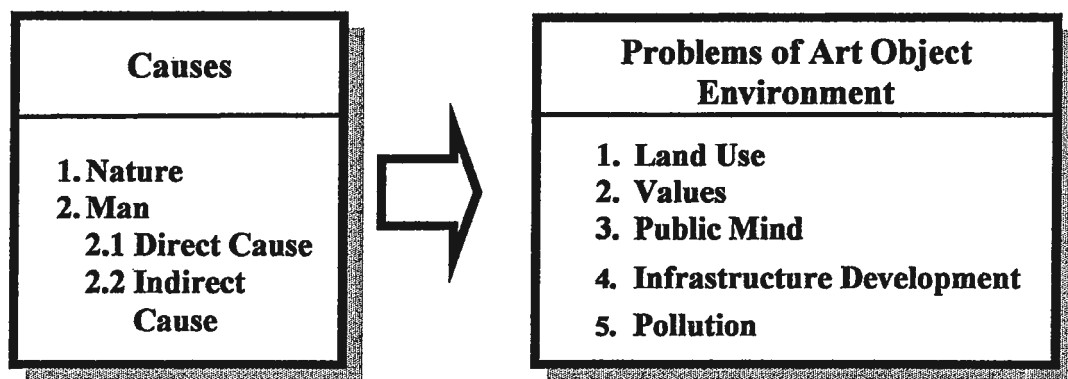


Figure 5. Problems and Causes of Art Object Environment Destruction
Source: Nit Hiyachernant, 1984: 3

4.3.1 Principles for Art Object Environment Conservation and Development

- 1) Sustainability
- 2) Restoration
- 3) Preservation

4.3.2 Approaches for Art Object Environment Conservation and Development

- 1) Stimulating both government organizations and people getting the right ways for art object environment conservation and development
- 2) Approving the law to be efficiently performed
- 3) Preventing some social and economic development activities doing any damages to an art object environment
- 4) Educating people on protection and maintenance a quality environment
- 5) Training people getting affection and positive values to art object environment
- 6) Developing methods for cultural heritage conservation and development to make the highest benefit according to the art object environment conservation plan

4.3.3 Methods for Art Object Environment Conservation and Development

- 1) Using is considered as consuming, seeing, listening, touching, facilitating and saving to be sustainable environment.
- 2) Storing is considered as managing the resource that tend to be lack in the future and for present benefit with the controlled quantity.
- 3) Maintaining is considered as taking care the resources to be sustainable existing and repairing when they get damages.
- 4) Restoring is considered as the performances to some distracted resources being in the beneficial condition.
- 5) Developing is considered as the performances to the resources being more quality and efficiency.
- 6) Preventing is considered as the performances to some resources not to be damaged and doing a scope of limitation for some being already damaged.
- 7) Preserving is considered as the storage without using in any ways or it may specify the preserved duration.
- 8) Zoning is considered as the performances for dividing areas or sorts of resource according to its qualification to appropriately and efficiently benefit man, as a forest zoning to be a national park, wild life conservation area and conservative area etc.

4.4 A Model of Art Object Environment Conservation and Development

A model of art object environment conservation and development is considered as the appropriated way to control condition covering in and around the archeological sites. Thus, the controlled area can be classified to such atmosphere, nucleus area,

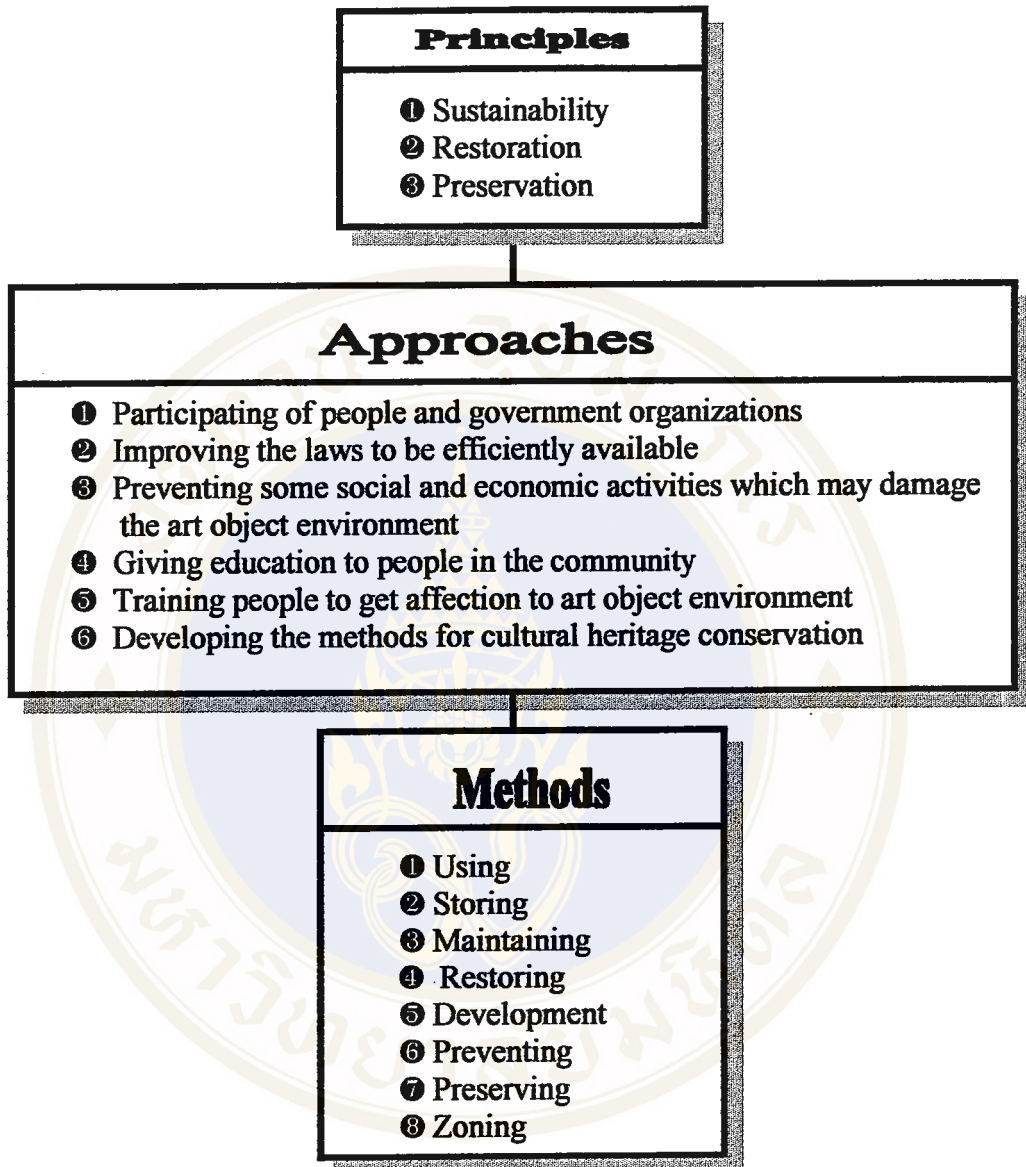


Figure 6. Principles, Approaches and Methods for Art Object Environment Conservation and Development

Source : Kasem Chankaew, 1998: 83-85

preservation area, conservation area, together with service and management area as the details below;

Atmosphere is the consistency of art object and its whole environment.

Nucleus Area is the major art object that must be conserved.

Preservation Area is the most academically valuable and sensitive area which are easily changed, effected and damaged; thus, any activities that may cause the originality changed in this area should be prohibited.

Conservation Area is the area surrounding an art object; thus, any damages in this area may also effect to art object so it is permitted only some activities being not much changeable to the area.

Service and Management Area is the area surrounding art object environment and not strongly related to an art object, so it can be permitted for some activities under controlled of the responsible organization.

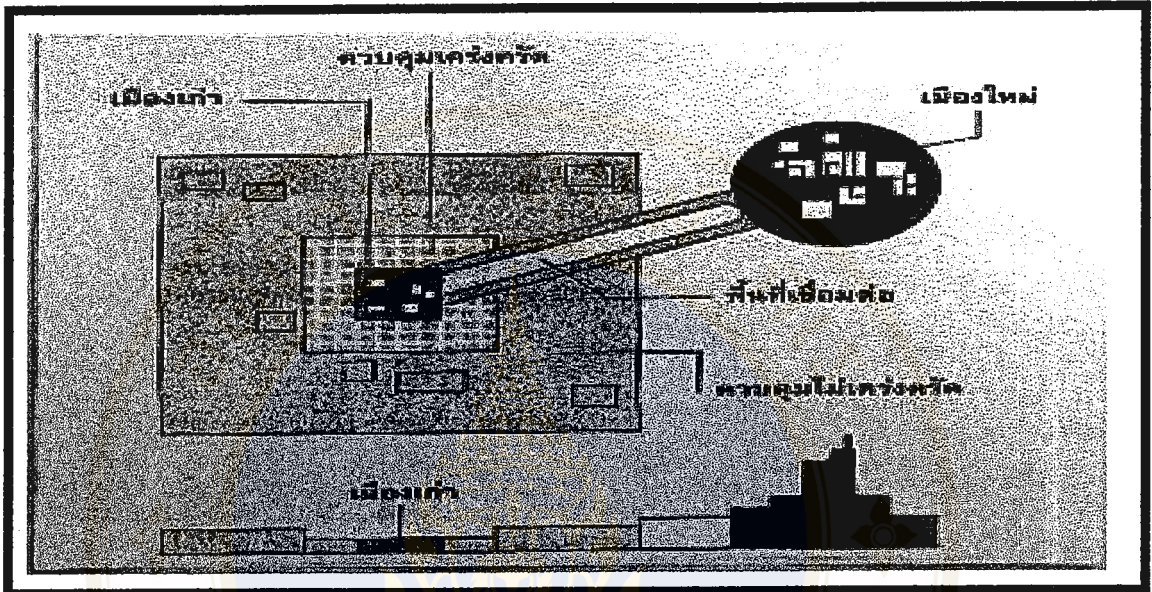


Figure 7. A Concept for Art Object Environment Conservation and Development
 Source : Office of Environmental Plan and Policy, 1998:19

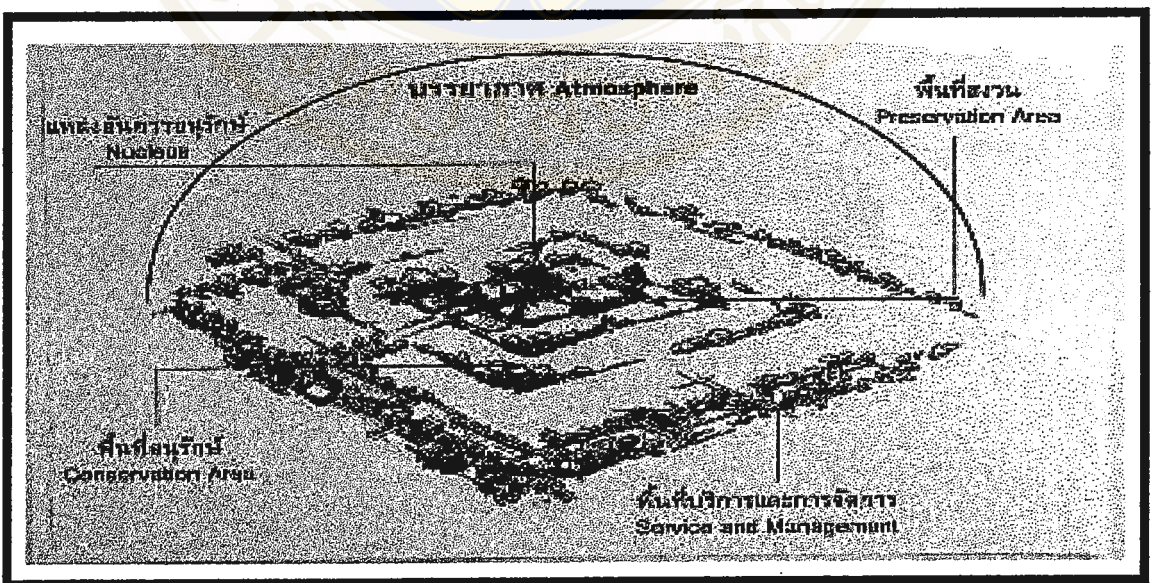
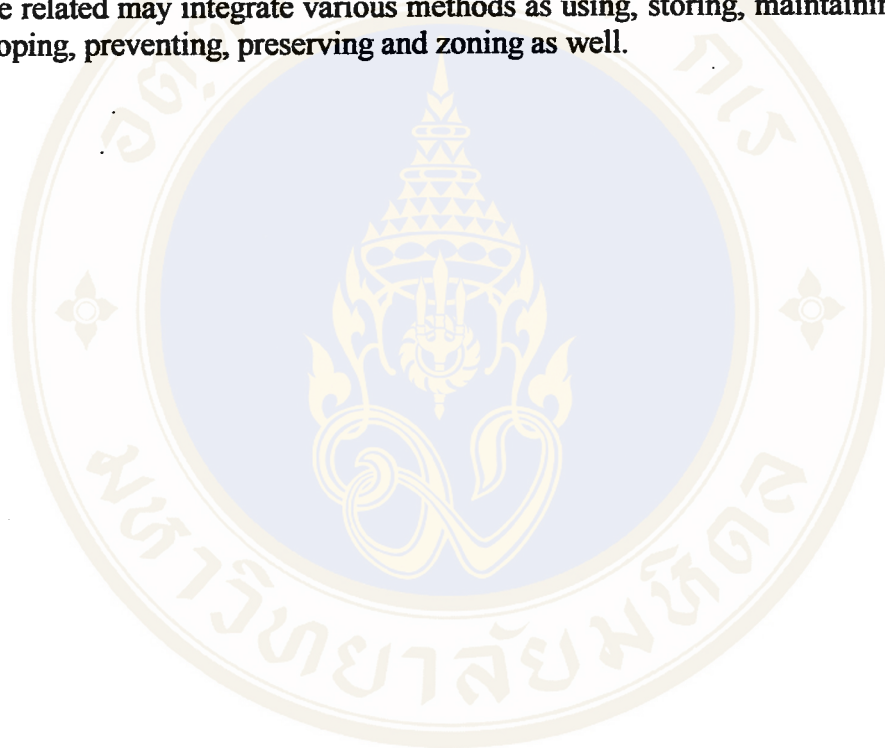
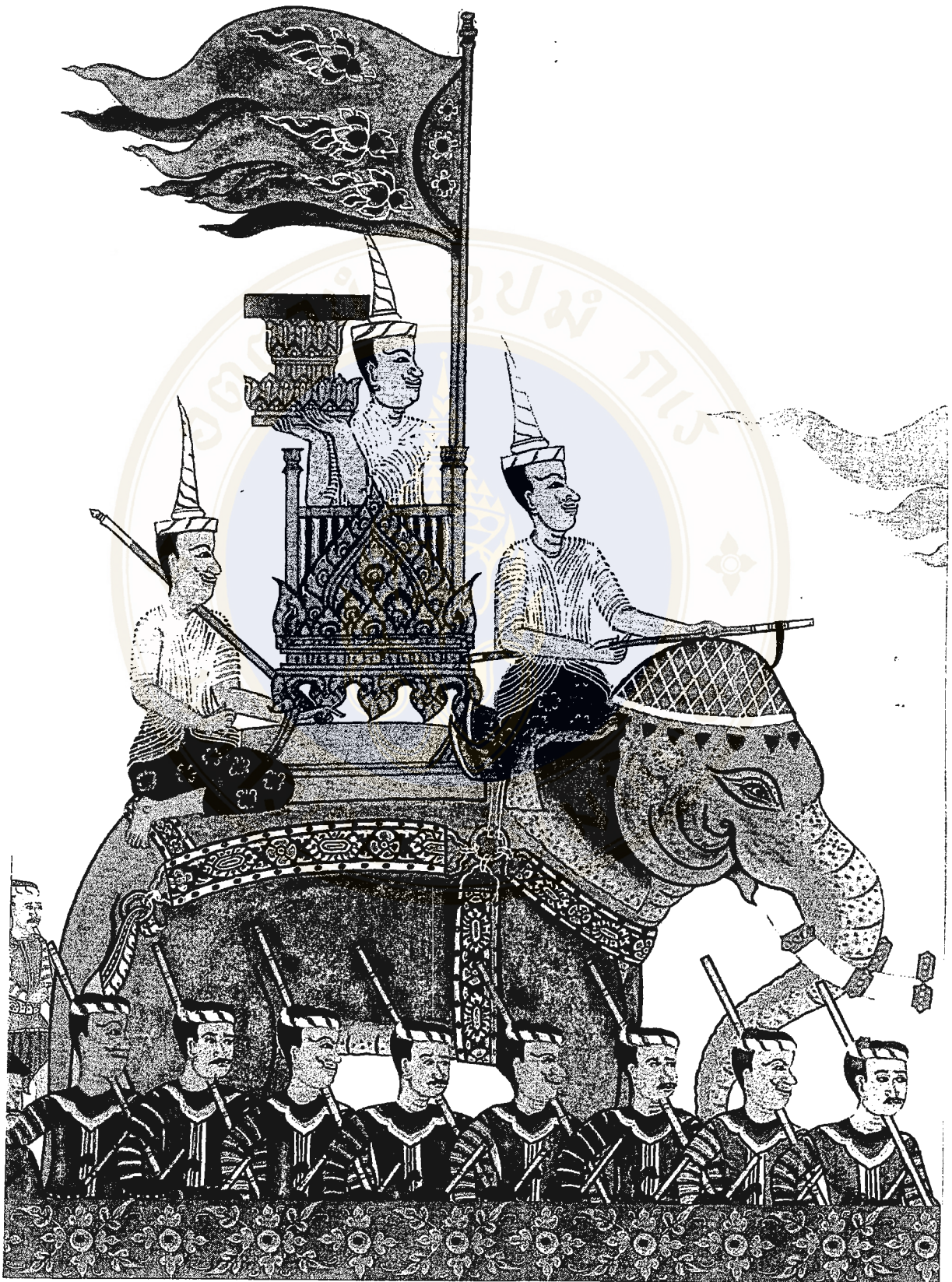


Figure 8. A Model of Art Object Environment Conservation and Development
 Source : Office of Environmental Plan and Policy, 1998:18

4.5 Conclusion

The causes of art object destruction are considered to natural disasters and human behaviors. Thus, they make various problems as dysfunction land use, changes of values and life pattern, lack of public mind, infrastructure development and pollution. This is the reason why conservation and development for art object environment should be made to the principles of sustainability, restoration and preservation through the approaches as people participation, law improvement, appropriated ways of social and economic development, education for people, training for people getting awareness and affection to an art object environment and methods development for art object environment conservation and development. Thus the people related may integrate various methods as using, storing, maintaining, restoring, developing, preventing, preserving and zoning as well.





*The royal standard guiding for the annual festival of priest robes by land
in the reign of King Narai, the great; 1656 – 1688 A.D.*

UNIT 5

PEOPLE'S PARTICIPATION ON ART OBJECT ENVIRONMENT CONSERVATION AND DEVELOPMENT IN THE COMMUNITY

5.1 Introduction

The community art object environment conservation and development can be made through 6 approaches; participation of people and government organization, law improvement to be efficiently available, appropriated methods for social and economic development, giving education to people in a community, training the people getting awareness and affection to the art object environment and developing the methods for art object environment. Thus, any selected approaches need people participation. Therefor, they should do the participation based on a systematic approach consisted of input, process and output together with outcome.

5.2 Participation Process for Art Object Environment Conservation and Development

The people related the community art object environment conservation and development can be classified to 3 groups; firstly the community-people (people living in a community), secondly community-organizations (the government and private organizations including the Department of Fine Art, Ayutthaya Municipality, Tourism Authority of Thailand, Associations and others) and finally the community-customers (tourists, students and workers in a community). However, the effective participation on art object environment conservation and development should pay the opportunity for all groups and all parts of the systematic approach; input, process, output/outcome and evaluation as the figure 9.

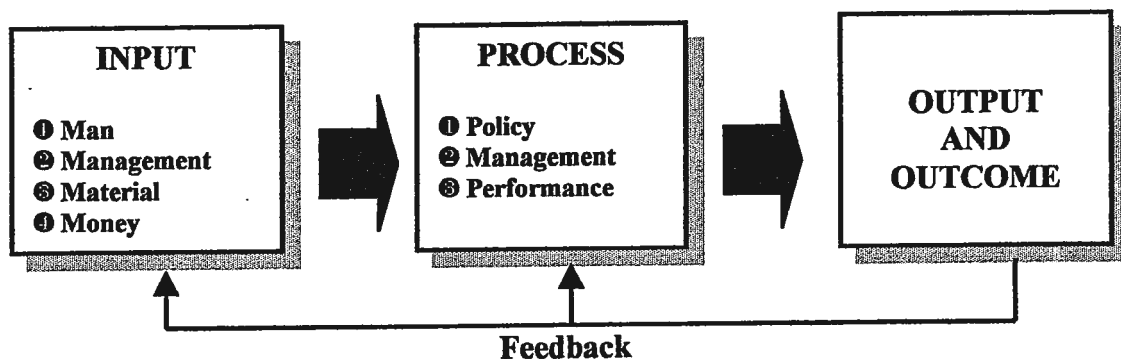
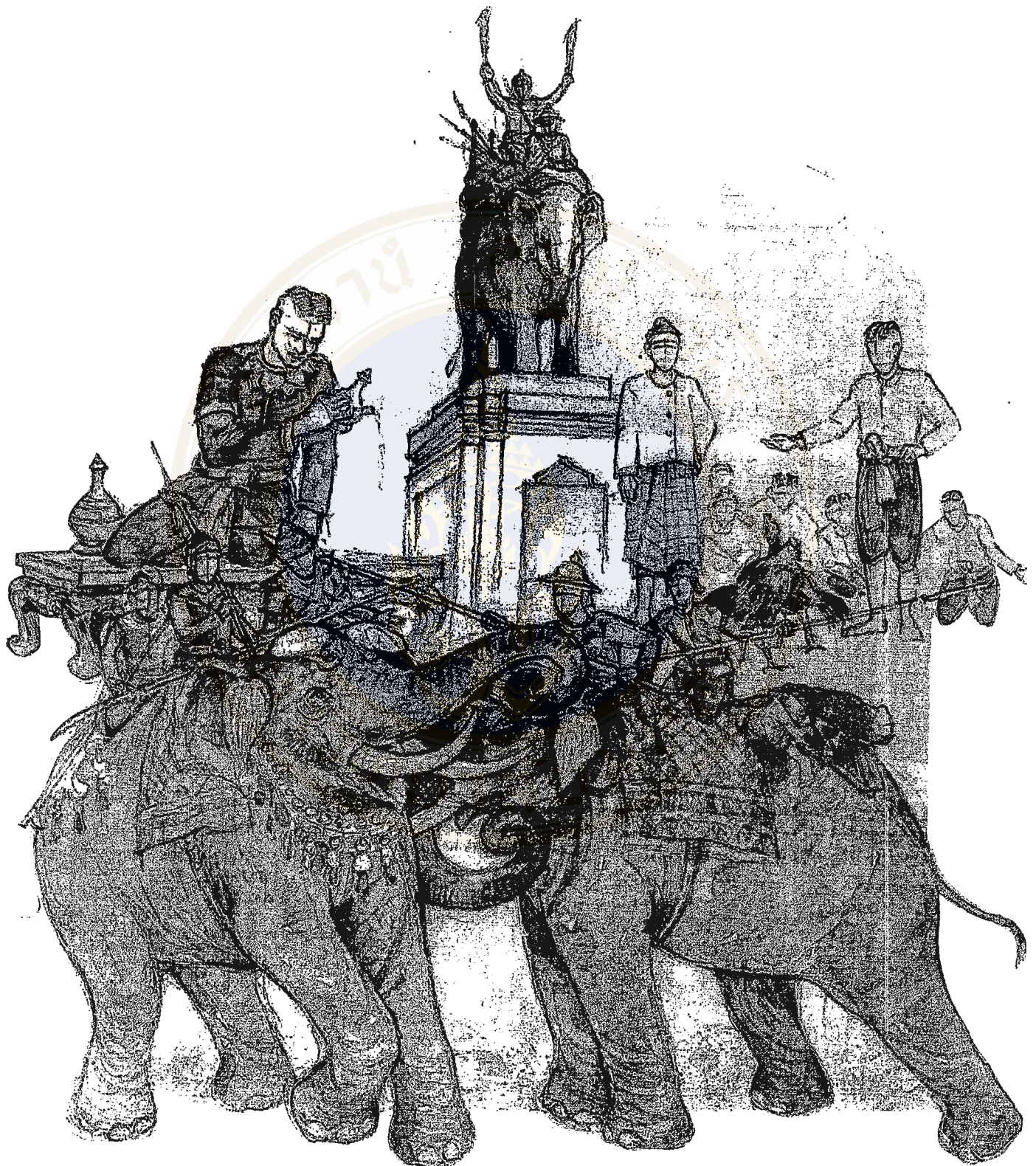


Figure 9. A Participation Process for Art Object Environment Conservation and Development
 Source : Adapted from Raviwan Chinatrakul, 1997: 110



The elephant contest between King Naresuan, the great, from Thailand and Phramaha-uparacha from Burma after his uncolonized declaration from Burma in 1592 A.D.

UNIT 6

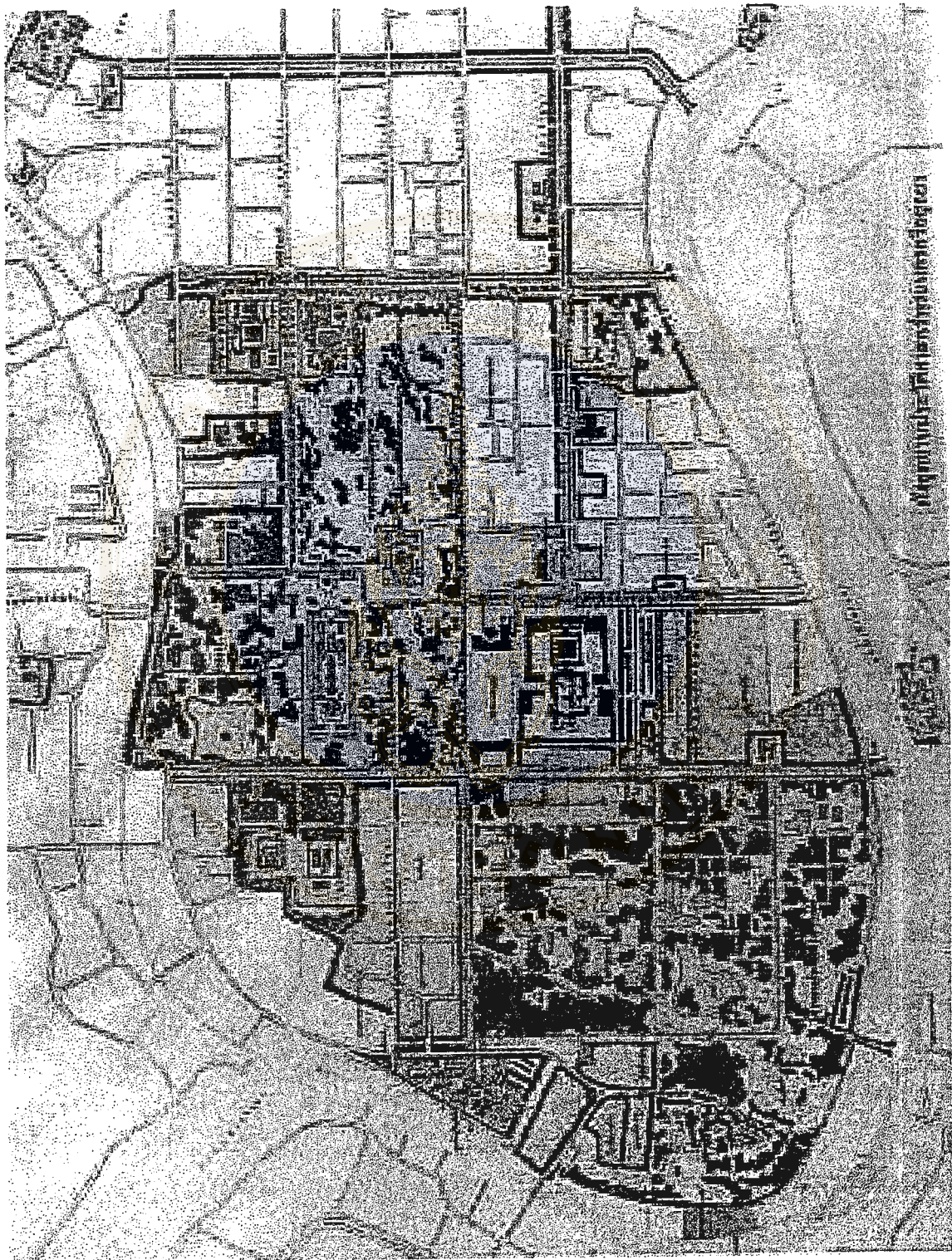
CONCLUSION

An environment is what covering both oneself and the surroundings. It can be classified to natural and cultural environment. The natural environment contains physical and biological environment while the man-made or cultural environment contains concept, organization, usage and object. Moreover, the cultural environment is considered to be the major factor affecting nature balance. Therefore, the conservation and development of art object environment in the World Cultural Heritage of Ayutthaya Historic City indicates not only the community civilization in the past, all present impacts but also related the guidance for their future life in the community.

However, the research findings related the community and the community-cultures made the researcher establishing the community-cultures based environmental education model consisted of individual and community activities through all educational channels; formal, non-formal and informal education. The individual activity is consisted 4 steps; group forming, environmental educating, leader electing and activity participating. While the community activity is also consisted 4 parts; traditional activity, handicraft promotion, cultural tourism together with local organization and community network.

Furthermore, the community-cultures based environmental education model should be performed through a participatory training which faces the people's participation to develop effectively people getting high level of cognition, affection and skill. Thus, its contents should be consisted of environment, the community, the art object environment and its conservation and development together with the participation process for art object environment conservation and development as well. For attaining the goal specified that the *"valuable existence of art object environment"* supporting *"quality of life"* at all in the community.





*Map of the World Cultural Heritage
of Ayutthaya Historic City*

Copyright by Mahidol University

BIOGRAPHY

NAME Mr. Weera Rawang

DATE OF BIRTH July 15, 1962

PLACE OF BIRTH Nakhonsithammarat Province, Thailand

INSTITUTION ATTENDED Maejo Institute of Agricultural Technology, 1984– 1986
Bachelor Degree of Agricultural Technology
(Agronomy)
Maejo Institute of Agricultural Technology, 1992-1996
Master Degree of Agricultural Technology
(Rural Development)
Mahidol University, 1997-2001
Ed.D. in Environmental Education

POSITION & OFFICE Chiang Mai Academy of Languages and Tourism
(C-MALT) Chiang Mai, Thailand
Position: Director