

Graduate School for International Development and Cooperation (IDEC) Hiroshima University

QUESTIONNAIRE SURVEY OF AIRPORT ACCESS MODE CHOICE IN VIENTIANE CAPITAL, LAO PDR

This survey is conducting by a master's student in the Transportation Engineering Laboratory of Graduate School for International Development and Cooperation - Hiroshima University. The data collected from the study will use as input data for a master thesis - all the information in this survey used for research purposes only.

Your kind cooperation is a critical contribution to the success of our research.

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ID No:	/Group II
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INSTRUCTION FOR ANSWERING QUESTIONNAIRE FORMS

Please answer all the questions one by one sequentially. Fill in the information in the space provided or put a tick (\checkmark) in the appropriate answer.

The contents of the questionnaire are the following:

I. PART I – REVEALED PREFERENCE PART (RP)

- Section 1 Socio-Economic and Personal Information.
- **Section 2 Current Travel Mode Choice Information.**
- Section 3 Air passengers' Attitude Towards Their Choice on Airport Access Modes.

II. PART II – STATED PREFERENCE PART (SP)

Section 4 – Stated preference for MODE CHOICE

or official use only Tame of person in charge of this survey sheet			
Interviewer:			
Supervisor:			
Location of the interview:			
Date of interview:			
Survey ID no:		Group II	



SECTION 1: SOCIO-ECONOMIC AND PERSONAL INFORMATION

Please answer the following questions by filling in the information in the space provided or tick (\boxtimes) in the appropriate answer.

1.	Your gender:				
	☐ Male	☐ Female	2		
2.	Your age:				
	☐ Less or 20	□ 21 - 30)	□ 31 - 40	
	□ 41 - 50	□ 51 - 60)	☐ Above 60	
3.	Your marital status:				
	☐ Single	☐ Marrie	d		
4.	Your nationality:				
	☐ Lao - Vientiane citizen	□ Lao - Non-Vi	entiane citizen	☐ Foreigner: _	
5.	Your occupation:				
	☐ Government official	□ Profes	sor/Teacher	☐ Private fire	m employee
	☐ Businessperson	☐ Salesp	erson	☐ Self-emplo	oyed person
	☐ Student/Pupil	☐ House	keeper	☐ Retired/U	nemployed
	☐ Other (specify):				
6.	Your education levels:				
	\square Under or high school	☐ Colleg	□ College		
	☐ Master/doctor	☐ Other	(specify):		
7.	Do you have a car or mo	torbike?			
	□ Yes	□ No		☐ Share i	t with other people
8.	Do you have a driver's li	cense for a car or	motorbike?		
	☐ Do not have	☐ Car dri	ver's license		
	☐ Motorbike riders licens	e □ Both c	ar and motorbik	te driver's license	
9.	The number of vehicles i	ncluding individu	al and househo	old (individual/ho	usehold):
	☐ Motorbike:/	□ Car:	/	□ None	
10.	What is your current ma	in travel mode?			
	☐ Private car	☐ Public	bus	☐ Tuk-tuk/Jı	ımbo
	☐ Motorbike	□ Taxi		☐ Other(spec	eific):
11.	Do you have the intention	n of buying your o	own cars in the	future? Moreove	r, when?
	☐ Yes, less than five year	s	oout 5-10 years		
	\square Yes, above10 years	□ None			
12.	If your income increases	in the future, will	you buy your	own cars?	
	□ Yes □] No	□ Do n	ot know	
13.	If you answered "YES" ithe future?	in question no. 12.	So, how many	percent do you a	ssure to buy the cars in
	☐ less than 30% ☐	30 - 60%	□ 61 -8	80%	□ 81 - 100%

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14	l. How many people reside in	your household?	
	☐ One-person	r - r	☐ Three persons
	☐ Four persons	☐ Five persons or ab	ove
15	5. Your household income leve	ls:	
	☐ Under 1,299,999 Kip		,300,000 – 1,999,999 Kip
	□ 2,000,000 – 3,999,999 Kip		4,000,000 – 6,999,999 Kip
	□ 7,000,000 – 9,999,999 Kip		0,000,000 – 14,999,999 Kip
	□ 15,000,000 – 19,999,999 K	ip □ 0	Over 20,0000,000 Kip
Ple	CTION 2: CURRENT TR. ase answer the following quest ropriate answer.		E INFORMATION rmation in the space provided or tick $(oxingtimes)$ in the
1.	Your final trip destination: _		
2.	Your airline:		
	☐ Lao Airlines	☐ Lao Skyway	☐ Thai Airways
	☐ Lao Airlines☐ Vietnam Airlines	□ Lao Skyway□ China Eastern Airlines	☐ Thai Airways ☐ Other:
3.		• •	·
3.	☐ Vietnam Airlines	• •	·
3.	☐ Vietnam Airlines Your airline class:	☐ China Eastern Airlines ☐ Business class	☐ Other:
	☐ Vietnam Airlines Your airline class: ☐ Economy class	☐ China Eastern Airlines ☐ Business class	☐ Other:
	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying	☐ China Eastern Airlines ☐ Business class ng travelers:	☐ Other:
	 □ Vietnam Airlines Your airline class: □ Economy class Number of your accompanying □ Do not have 	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person	☐ Other:
4.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person	☐ Other:
4.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes:	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above	☐ Other:
4.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanyi ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons	☐ Other:
4. 5.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons	☐ Other:
4. 5.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose:	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above	☐ Other:
4. 5.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanyi ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose: ☐ Business	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above ☐ Holiday/tourism ☐ Education/training	☐ Other: ☐ First class ☐ 2 persons ☐ Visiting relatives/friends
4.5.6.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanyi ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose: ☐ Business ☐ Back Home	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above ☐ Holiday/tourism ☐ Education/training	☐ Other: ☐ First class ☐ 2 persons ☐ Visiting relatives/friends
4.5.6.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose: ☐ Business ☐ Back Home Number of your carry-on lug	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above ☐ Holiday/tourism ☐ Education/training gage:	☐ Other: ☐ First class ☐ 2 persons ☐ Visiting relatives/friends ☐ Other(specify):
4.5.6.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose: ☐ Business ☐ Back Home Number of your carry-on lugging Do not have	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above ☐ Holiday/tourism ☐ Education/training gage: ☐ One-piece ☐ 4 pieces or above	☐ Other: ☐ First class ☐ 2 persons ☐ Visiting relatives/friends ☐ Other(specify):
4.5.6.	☐ Vietnam Airlines Your airline class: ☐ Economy class Number of your accompanying ☐ Do not have ☐ 3 persons Number of your party sizes: ☐ Alone ☐ 3 persons Your trip purpose: ☐ Business ☐ Back Home Number of your carry-on lug ☐ Do not have ☐ 3 pieces	☐ China Eastern Airlines ☐ Business class ng travelers: ☐ One-person ☐ 4 persons or above ☐ 2 persons ☐ 4 persons or above ☐ Holiday/tourism ☐ Education/training gage: ☐ One-piece ☐ 4 pieces or above	☐ Other: ☐ First class ☐ 2 persons ☐ Visiting relatives/friends ☐ Other(specify):



11.	Your origin to the Wattay In	ternational Airport:	
	□ Home	☐ Work/Office	
	☐ Hotel	☐ Others (specify):	
12.	How far was it from your ori	gin to Wattay International A	Airport?Km
13.	How long have you come to t	he airport earlier than schedu	aled flight departure time?
	☐ Under 60 minutes	\Box 60 – 90 minutes	□ 90 – 120 minutes
	☐ 120 – 180 minutes	☐ Above 180 minutes	
14.	How long have you waited fo	r check-in your flight (waiting	g time for flight check-in)?
	☐ Under 10 minutes	\square 10 – 20 minutes	\square 20 – 30 minutes
	☐ 30 - 40 minutes	☐ Above 40 minutes	
15.	How long have you waited fo	r boarding at the airport tern	ninal?
	☐ Under 10 minutes	\square 10 – 20 minutes	\square 20 – 30 minutes
	☐ 30 - 40 minutes	☐ Above 40 minutes	
16.	How many minutes do you w	ant to stay at the airport tern	ninal before your flight departure time?
	☐ Under 30 minutes	\square 30 – 40 minutes	☐ 40 – 60 minutes
	\Box 60 – 90 minutes	☐ Above 90 minutes	
17.	Which transport mode have	you used to get to Wattay Into	ernational Airport?
	☐ Motorbike-parked	☐ Motorbike-dropped off	☐ Car-parked
	☐ Car- dropped off	□ Taxi	☐ Rental car/van
	☐ Organization's car	☐ Hotel bus	☐ Tourist bus
	☐ Tuk-tuk/Jumbo	☐ Airport bus	☐ Others (specify):
18.	Do you use the same mode of	access to travel to Wattay In	ternational Airport?
	☐ Yes	□No	
19.	Total travel cost of your trip fee/bus fee) from your origin		l fee, parking fee/vehicle rental fee/taxi
	☐ Under 20,000 Kip	$\square 20,000 - 50$	•
	□ 50,001 – 100,000 Kip	$\Box 100,001 - 2$	•
20	\Box 200,001 – 400,000 Kip	☐ Above 400	,000 Kip our access time from your origin to a bus
20.	stop or bus station:	transport, please mention yo	ur access time from your origin to a bus
	☐ Under 10 minutes	\square 10 – 20 minutes	\square 20 – 30 minutes
	☐ Above 30 minutes	□ N/A	
21.	In-vehicle travel time of your	main travel mode to get to the	ne airport?
	☐ Under 20 minutes	\square 20 – 40 minutes	\square 40 – 60 minutes
	\square 60 – 90 minutes	\square 90 – 120 minutes	☐ Above 120 minutes
22.	Delay time (if any):	min	
23.	In case you drove and parked	l a car at the airport, was it r	eimbursed for a parking fee?
	☐ Not reimbursed	\square Yes, reimbursed partially	☐ Yes, reimbursed fully



SECTION 3: AIR PASSENGERS' ATTITUDE TOWARDS THEIR CHOICE ON AIRPORT ACCESS MODES.

Please answer the following questions by filling in the information in the space provided or tick (\boxtimes) in the appropriate answer.

1.	Have you ever used a public bus to travel to and from the airport?				
	☐ Yes	□ No			
2.		f public transportation sys which is more convenien			
	□ Yes	□ No	☐ Do not know		
3.	How far is it from you	r house/hotel to the neares	st bus stop or stat	tion curre	ntly?
	□ Under 200 m □ 600 – 1000 m	□ 200 – 400 m □ Above 1000 m	☐ 400 – 600 n		
4.	How far do you satisfy	with walking to get to a b	ous stop or the bu	s station v	with check-in luggage?
	☐ Under 100m ☐ 300 – 600m	□ 100 − 200m $□$ 600 − 900m	□ 200 – 300n □ Above 900		
5.	How far do you satisfy	with walking to get to a b	ous stop or the bu	s station v	with carry-on baggage?
	☐ Under 100m ☐ 300 – 600m	□ 100 – 200m □ 600 – 900m	□ 200 – 300m □ Above 900m		
6.	Which public transpor	t services would you like t	to use to access th	ne airport	?
	☐ Free airport shuttle bus service.	☐ Remote check-in service at the public transport terminal.	☐ One-stop ser- the airport li bus		☐ Others:
7.		ely) been previously late for ease mention how many ti			
	□ Never	□ Yes,	_time (s)		
8.	If you answer "Yes" in	question 7, please mentio	on the causes of b	eing late f	or your flight check-in.
	☐ Traffic Congestion☐ Unreliability	□ Unpunctual□ Vehicle bre	J	☐ Traffic☐ Others:	accident



9. Please rate the essential levels of the following factors influencing the choices on airport access modes to the Wattay International Airport by circling (O) the following factors.

For Example:

No transferring	1	2	(3)	4	5
·	•	·	$\overline{}$	•	<u> </u>

Important factor	Not Important	Slightly Important	Fairly Important	Important	Very Important
Time - saving	1	2	3	4	5
No transferring	1	2	3	4	5
User-friendly	1	2	3	4	5
Reasonable price	1	2	3	4	5
Punctuality	1	2	3	4	5
Safety during the trip	1	2	3	4	5
Comfortableness	1	2	3	4	5
Rapidness	1	2	3	4	5
Convenience for storing and retrieving luggage	1	2	3	4	5
Ease of accessibility	1	2	3	4	5
Other (specify):	1	2	3	4	5



SECTION 4: STATED PREFERENCE FOR MODE CHOICE

You will be asked to answer eight hypothetical questions in this part. Please respond only based on the given information in each SCENARIO of the study.

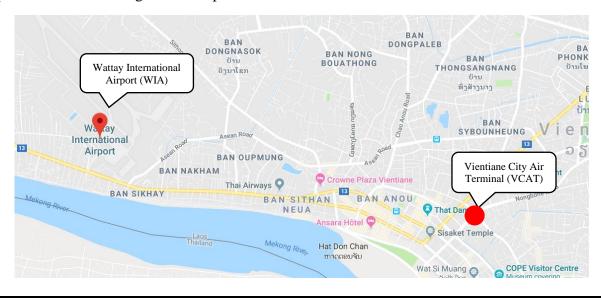
Before answer questions, please carefully read the following description on Wattay International Airport.

Concepts of Vientiane City Air Terminal Services.

According to the master plan of Wattay International Airport in 2013 (JICA, 2013), the annual air passenger will rapidly increase and reach more than 6 million in 2040. Moreover, registered vehicles in Vientiane city have increased gradually with more than 10 percent annually. Consequently, not only the airport terminal but also the airport ground access system will be congestion due to the rapid growth of air passengers in the future.

In the future, **Vientiane City Air Terminal service (VCAT)** will be established and expected to share a burden of traffic congestion and the overcrowding of air passengers in the airport terminal. It is a type of public transportation mode which serves the air passenger to travel to and from the airport by using the airport limousine bus with a specific pathway. Its station situates near the central bus station of Vientiane city that air passengers are easy to access, egress and transfer. Moreover, the air passengers can proceed and complete their flight check-in and immigration process at VCAT before getting to the airport terminal.

There are several alternatives (including motorbike, car, taxi, airport bus, and VCAT-Limousine bus) to get to and from the Wattay International Airport in the future. So, air passengers have more options to access and egress the airport.



<u>QUESTION:</u> Based on the given information, what is your most preferred mode of transport in each SCENARIO?

<u>INSTRUCTION</u>: Please use the cross symbol (X) for your most preferred mode choice in SCENARIOS, and *please answer all SCENARIOS in this part that you belong to*.



I. <u>Definition:</u>

Total of Travel cost: the amount cost of the trip, including fuel cost, toll road fee, and public transport fare but excluding parking fee.

Total of Travel time: the time needed for travel to the airport, including in-vehicle time and access time.

In-vehicle time: the time in a public vehicle or a private car/motorbike or taxi that access the airport.

Access time: the time needed for a trip from the origin of an air passenger to a bus stop or station (airport bus station or VCAT station)

Waiting time: the average time interval for which a passenger needs to wait for a bus or a limousine bus at a bus stop or the station to get to the airport.

Number of Transfer: the number of changing that an air passenger moved from one vehicle to another one.

Travel Time Reliability: the difference between real-time and predicted time for arriving during travel to the airport caused by traffic congestion or other reasons arising.

Safety Margin: preparation time intervals of the passenger at the airport terminal until flight departure time.

II. Instruction:

Please use the **cross symbol** (X) for your most preferred mode choice in SCENARIOS, and <u>please</u> <u>answer all SCENARIOS in this part that you belong to.</u>

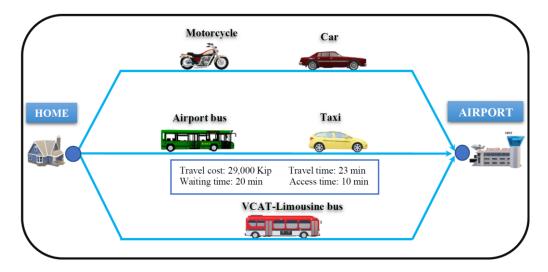
For example:

Mode Choice Comparison	1. Motorbike	2. Car	3. Taxi	4. Airport Bus	5. VCAT- Limousine Bus
Total of Travel Cost (Kip)	21,500	52,000	66,000	19,000	29,000
- Travel Cost (Kip)	16,500	42,000	66,000	19,000	29,000
- Parking fee (Kip/day)	5,000	10,000	No	No	No
Total of Travel Time (min)	110	115	115	150	83
- In-vehicle Time (min)	20	25	25	30	18
- Access Time (min)	No	No	No	10	10
- Waiting Time (min)	No	No	No	20	15
- Safety Margin (min)	90	90	90	90	40
Weather Condition	Sunny	Sunny	Sunny	Sunny	Sunny
Flight check-in and Immigration at the station	No	No	No	No	Yes
Which mode would you like to use? (X)					



QUESTION 1 (SCENARIO 2):

Under the following condition, please use the cross symbol (X) for your most preferred mode choice from home to the airport (only one option).



It assumed that you are traveling to Wattay International Airport under the following conditions:

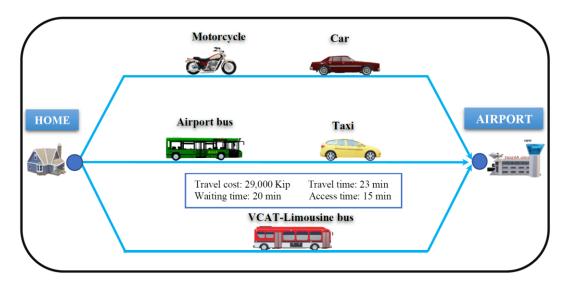
Trip purpose	Business trip
Number of check-in luggage	No check-in luggage
Accompanying travelers	Alone

Mode Choice Comparison	1. Motorbike	2. Car	3. Taxi	4. Airport Bus	5. VCAT- Limousine Bus
Total of Travel Cost (Kip)	21,500	52,000	66,000	19,000	29,000
- Travel Cost (Kip)	16,500	42,000	66,000	19,000	29,000
- Parking fee (Kip/day)	5,000	10,000	No	No	No
Total of Travel Time (min)	140	145	145	180	103
- In-vehicle Time (min)	20	25	25	30	23
- Access Time (min)	No	No	No	10	10
- Waiting Time (min)	No	No	No	20	20
- Safety Margin (min)	120	120	120	120	50
Number of Transfers	No	No	No	One-time	One-time
Travel Time Reliability	On-time arrival	On-time arrival	On-time arrival	On-time arrival	On-time arrival
Weather Condition	Rainy	Rainy	Rainy	Rainy	Rainy
Flight check-in and Immigration at the station	No	No	No	No	Yes
Which mode would you like to use? (X)					



QUESTION 2 (SCENARIO 4):

Under the following condition, please use the cross symbol (X) for your most preferred mode choice from home to the airport (only one option).



It assumed that you are traveling to Wattay International Airport under the following conditions:

Trip purpose	Non-business trip
Number of check-in luggage	No check-in luggage
Accompanying travelers	With family or friends

Mode Choice Comparison	1. Motorbike	2. Car	3. Taxi	4. Airport Bus	5. VCAT- Limousine Bus
Total of Travel Cost (Kip)	21,500	52,000	66,000	19,000	29,000
- Travel Cost (Kip)	16,500	42,000	66,000	19,000	29,000
- Parking fee (Kip/day)	5,000	10,000	No	No	No
Total of Travel Time (min)	140	145	145	185	98
- In-vehicle Time (min)	20	25	25	30	23
- Access Time (min)	No	No	No	15	15
- Waiting Time (min)	No	No	No	20	20
- Safety Margin (min)	120	120	120	120	40
Number of Transfers	No	No	No	One-time	One-time
Travel Time Reliability	On-time arrival	On-time arrival	On-time arrival	10 min delay	On-time arrival
Weather Condition	Rainy	Rainy	Rainy	Rainy	Rainy
Flight check-in and Immigration at the station	No	No	No	No	Yes
Which mode would you like to use? (X)					

