

Asian Barometer Survey Wave 4
2014
TECHNICAL REPORT
(TAIWAN)

By

Asian Barometer Survey
Center for East Asia Democratic Studies
National Taiwan University

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Contact Information

Asian Barometer Survey

No.1, Sec. 4, Roosevelt Road, Taipei 10617, Taiwan

Center for East Asia Democratic Studies, College of Social Sciences

National Taiwan University

Tel: 886-2-3366-8456

Fax: 886-2-2365-7179

Email: asianbarometer@ntu.edu.tw

1. BASIC INFORMATION

1.1 LOCATION

The Asian Barometer Survey Wave IV covered the area of Taiwan, including six municipalities, 3 cities and 13 counties.



1.2 POPULATION

The population of Taiwan in 2104 was 23,433,753. The capital city is Taipei City. Additionally, there are five major municipalities, namely New Taipei City, Kaoshiung City, Taichung City, Tainan City, and Taoyuan City.

1.3 GOVERNMENT

Taiwan is a republic with the president as the head of the state. The institutional arrangement is categorized as semi-presidential system since the premier (the head of the Executive Yuan) is in charge of the executive branch. The premier is not an elected official but appointed by the president and does not need the approval of the Legislative Yuan. Besides the major three branches of the government (the Executive, Legislative,

and Judicial), two other branches were created under the Constitution, the Control Yuan and Examination Yuan. There are two major parties in Taiwan, the Nationalist Party (or Kuomintang, KMT) and the Democratic Progressive Party (DPP). The KMT controlled both the presidency and the legislature in 2014. The next presidential and legislative elections are scheduled in January 2016.

The president is elected through the first-past-the-post system by plurality rule. The mixed-member rule is applied to electing members in the legislature. Among the 113 seats, 73 seats come from single-member districts, 6 from aboriginal reserved seats, and 34 seats elected under proportional party list with 5% threshold. The KMT held 64 seats while the DPP had 40 seats. The rest were shared by other small parties.

1.4 ECONOMIC PERFORMANCE

Economic growth was evaluated by gross domestic product (GDP). In 2014, the GDP growth was 3.51%. GDP per capita was USD 22,635.¹

1.5 IMPORTANT POLITICAL AND SOCIAL EVENTS

In March 2014, large demonstrations erupted to protest against a trade agreement with China. Young students were the center of the protests and the popularity of Present Ma plummeted afterwards. The relation with China will be one of the main issues surrounding the 2016 election campaigns.

2. TIMETABLE

Activity	Duration
Preparation	
Pre-test	2013/11-12
Institutional Review Boards	2014/02-04
Finalizing the Questionnaire	2014/04-05
Training for Supervisor and Interviewers	2014/05-06
Fieldwork	
Survey in progress	2014/06-10
Re-test	2014/10-11

¹ National Statistics Office, Accessed on March 31, 2015, <http://www.stat.gov.tw/ct.asp?xItem=37407&CtNode=3564&mp=4>

3. RESPONDENTS

3.1 CRITERIA OF SELECTING RESPONDENTS

Data was gathered through face-to-face interviews of voting-age adults (20 years old and above), who had registered in the household system in department of household registration, Ministry of the Interior. The baseline information and addresses were drawn from the household information compiled by the Ministry of Interior and excluded residents in military organizations, hospitals, medical care centers, schools, vocational training centers, dormitories, detention centers, and prisons.

3.2 RESEARCH ETHNICAL REVIEW

The Taiwan team had obtained the permission to conduct human subject research to meet the international standard.

4. SAMPLING PROCESS AND METHODOLOGY

4.1 SAMPLING SIZES AND ERROR MARGINS

An indicator of data quality is the standard error of the estimate, on which the margin for sampling error is based. As survey statistics are mostly proportions, the key measure of data precision is the standard error of a proportion taken from a sample. It is computed as follows:

$$\pm Z * \sqrt{\frac{p(1-p)}{n}}$$

Where Z, at 95% confidence level is 1.96; p is the sample proportion estimate and n is the sample size. The overall sample size of 1,657 voting-age adults gives a maximum error margin of $\pm 2.46\%$ at the 95% confidence level, assuming a simple random sampling design.

4.2 SAMPLING SCHEME

Taiwan was divided into six geographical areas. Using the total number of people eligible to cast ballots in the 2012 legislative elections, we estimated the total number of successful samples required in each geographical area.

In accordance with the 30/30 rule for using micro-level data to make macro level conclusions, the number of electoral constituencies (xuanqu) and neighborhoods (li)

or villages (cun) to be sampled in each geographical area was based on the estimated total number of samples in that area. Sampling was carried out in three stages in accordance with the probability proportional to size (PPS) method. In the first stage, electoral constituencies were selected in each geographical area in accordance with the divisions in place for the 2012 Legislative Yuan elections. In the second stage, four neighborhoods or villages were selected in each of the twenty-seven electoral constituencies drawn in the first stage. In the third stage, respondents were selected in each of the neighborhoods and villages drawn in the second stage. We selected fourteen people in each neighborhood or village (ten people in Yilan, Hualien, Taitung, and the outlying islands) on the basis of the feasibility of carrying out successful interviews. In total, there were 1,637 successful interviewees. The sampling framework is shown below.

Area	Number of Voters	Percentage of Total	Number of Constituencies Selected	Number of Neighborhoods / Villages Selected	Number of Samples Taken in Each Village/Neighborhood	Total Number of Samples
Taipei City/New Taipei City/Keelung Area	5,387,953	30.57%	10	40	12	480
Taoyuan/Hsinchu/Miaoli Area	2,561,804	14.53%	5	20	12	240
Taichung/Changhua/Nantou Area	3,379,964	19.18%	7	28	12	336
Yunlin/Chiayi/Tainan Area	2,664,410	15.12%	5	20	12	240
Kaohsiung City/Pingtung Area	2,801,873	15.90%	5	20	12	240
Yilan/Hualien/Taitung & Outlying Islands*	829,628	4.71%	2	8	12	96
Total	17,625,632	100.00%	34	136	N/A	1632

* Including Penghu, Kinmen, and Mazu

4.2.1 FIRST STAGE-SELECTION OF PSU

After the number of electoral constituencies to be sampled in each geographical area was established, we undertook systematic sampling on the basis of PPS to select

the constituencies. After selection of the electoral constituencies, we undertook systematic sampling on the basis of PPS to select neighborhoods and villages within the constituencies. The selected neighborhoods and villages are shown in the Appendix.

4.2.2 SECOND STAGE-SELECTION OF RESPONDENT

After the selection of neighborhoods and villages, we applied to the Department of Household Registration, Ministry of the Interior for access to household registration data. We then used systematic sampling to select respondents on the basis of the required number of successful samples in each neighborhood or village.

4.3 NUMBER OF CALLS AND SUBSTITUTION/ALTERNATE SAMPLES

Unsuccessful interviews are an inevitable part of survey research regardless of approach used. In order to avoid the problem of the eventual sample size being too small because of unsuccessful interviews, we also selected alternate sets of samples. If the original sample set was unsuccessful, alternate samples sets were used. The process and methodology for selecting alternate samples was the same as for the original sample set. In total we selected a total of twenty-one sets of alternate samples for each neighborhood or village. Once interviews on an alternative sample set had been started, the entire set had to be completed.² The total number of samples in the first alternate set was the same as the original set. However, due to the difference in success rate between rural and urban areas, it was decided that in cities, urban districts, and urban townships (basic unit neighborhood) that from the sixth alternate set onwards, only 50% of the original total were sampled. However, in rural townships (basic unit village) the 50% rule applied from the fourth alternate set onwards.

4.4 SURVEY STATISTICS

No. of Potential Respondents	Successful Case	Refusal Rate
7563	1637	78.3%

²After interviews using the first sample set were completed in a neighborhood or village, if the minimum number of successful interviews is attained, then survey work in the neighborhood or village is ended. However, if the minimum number of successful interviews is not attained with the original samples, then the first set of alternate samples is used. If the minimum number of successful interviews is still not reached, then the second set is used, and so on. Each sample from a proceeding set has to be confirmed as unsuccessful before a new set can be used. However, once a new set is used, then each sample from that set must be completed even if the minimum total has already been met.

In total, there were 7,563 respondents being contacted and, among them, 1,637 had completed the interviews. The refusal rate is quite high, at 78.3%. Most incidents of failed interviews came from outright refusal of the respondents or family members, or the interviewers could not find the respondents for various reasons, including not living in the household, being away for a long time, or our interviewers could not access the buildings.

5. RESEARCH METHODOLOGY

5.1 PREPARATION

5.1.1 QUESTIONNAIRE

The Chinese-version questionnaire was designed based on the module questionnaire developed by the Asian Barometer Survey. In order to deliver the definitive message in the questionnaire, several meetings were held among the team members to discuss the questions and indicators that would accurately evaluate and explore the citizens' attitudes toward democracy.

5.1.2 PRE-TESTING AND FINALIZING QUESTIONNAIRE

In order to narrow down the perception gap between the questionnaire designers and the respondents, a pre-test was needed so that problems, such as unclear wording, conceptually vague sentences, recording difficulties etc., could be corrected before the fieldwork began. The team also received feedback about the questionnaire from field supervisors and interviewers after they conducted the pre-test. The pre-test has helped determine the following things:

- The length of interviews (about 40 min. to 1 hour)
- Wording of questions
- Adding new items or eliminating less significant questions
- Question sequence
- Translation
- Coding system
- Questionnaire instructions
- Conception and idea of questions

5.1.3 TRAINING

5.1.3.1 SUPERVISOR

Two one-day trainings were held to allow the field supervisors to become familiar with the questionnaire and survey procedure. They were instructed on how to

supervise their field interviewers and check the questionnaires returned by the field interviewers. The supervisors were asked to conduct a pre-test before the second training. In the second training, the problems that the supervisors found during the pre-test were discussed together with the national team members and they were also instructed on how to deal with real situations encountered in fieldwork.

5.1.3.2 INTERVIEWER

The training for field interviewers were conducted in Taipei City (north) and Tainan City (south) respectively. In the training, the interviewers were given instruction on interview skills and coding. Moreover, they learned to become familiar with questionnaire by reading the questions in both Mandarin and Taiwanese, the dialect the majority of people speak in Taiwan, in order to deliver the exact meaning that the questions want to convey. The interviewers were asked to conduct pre-test before going to field and the supervisors were asked to assist their field interviewers when needed.

5.2 FIELDWORK

5.2.1 WORKERS ON HAND

For the survey, 123 Interviewers and 23 Supervisors were deployed:

	Supervisor	Field Interviewer
Taipei City/New Taipei City/ Keelung Area	7	40
Taoyuan/Hsinchu/Miaoli Area	4	16
Taichung/Changhua/Nantou Area	4	24
Yunlin/Chiayi/Tainan Area	4	17
Kaohsiung City/Pingtung Area	3	19
Yilan/Hualien/ Taitung & Outlying Islands Area	1	7
Total	23	123

5.2.2 SUPERVISION

5.2.2.1 EVALUATION OF INTERVIEWER' S WORK

Supervisors reported to the project manager who monitored the progress and quality of the survey full-time. Supervisors would accompany the interviewers to conduct one or two interviews in the beginning to observe the interviewers and instruct them on how to improve their skills and avoid refusal from respondents. They also followed up and checked on the field interviewers as well as ensured that field logistics were received promptly and administered properly.

5.2.2.2 SPOT-CHEKING

Supervisors were responsible for investigating the failure or success of a case and spot-check in order to retain the survey quality. Supervisors either visited the respondent or called the respondent to ensure that the questionnaire was properly conducted and that the respondent was the one selected on the list. By doing so, any incomplete or inconsistent answer was verified by the supervisors.

5.2.2.3 RE-TESTING

In order to test the reliability of sampling, after interviews were completed we selected a sample from successful interviews in order to retest the reliability of responses. The number of retest interviews was required to be 20% of the total number of successful interviews. In the first stage of interviews, we achieved a total of 1,657 successful samples. We therefore needed to complete a total of 331 retest interviews. The actual number of successful retest interviews was 332. Sampling for retest interviews is shown below.

Sampling for retest interviews was carried out on the basis that the total number of retest interviews would be 20% of successful interviews. Interviewees were selected through systematic sampling. Since retest interviews may also be unsuccessful, after the original sample set was selected, a total of three alternate sets were also chosen to be used if necessary.

Area	Number of Neighborhoods of Villages Sampled	Successful Interviews	Successful Interviews *0.2	Total Number of Retest Interviews	k
Taipei City/New Taipei City/ Keelung Area I	5	60	12	12	5.0000
Taipei City/New Taipei City/ Keelung Area II	6	76	15.2	15	5.0667
Taipei City/New Taipei City/ Keelung Area III	5	60	12	12	5.0000
Taipei City/New Taipei City/ Keelung Area IV	6	74	14.8	15	4.9333
Taipei City/New Taipei City/ Keelung Area V	6	73	14.6	15	4.8667
Taipei City/New Taipei City/ Keelung Area VI	6	73	14.6	15	4.8667

Taipei City/New Taipei City/ Keelung Area VII	6	73	14.6	15	4.8667
Taoyuan/Hsinchu/Miaoli Area I	6	72	14.4	14	5.1429
Taoyuan/Hsinchu/Miaoli Area II	6	74	14.8	15	4.9333
Taoyuan/Hsinchu/Miaoli Area III	4	48	9.6	10	4.8000
Taoyuan/Hsinchu/Miaoli Area IV	4	50	10	10	5.0000
Taichung/Changhua/Nantou Area I	8	96	19.2	19	5.0526
Taichung/Changhua/Nantou Area II	8	98	19.6	20	4.9000
Taichung/Changhua/Nantou Area III	6	72	14.4	14	5.1429
Taichung/Changhua/Nantou Area IV	6	74	14.8	15	4.9333
Yunlin/Chiayi/Tainan Area I	4	49	9.8	10	4.9000
Yunlin/Chiayi/Tainan Area II	4	49	9.8	10	4.9000
Yunlin/Chiayi/Tainan Area III	6	75	15	15	5.0000
Yunlin/Chiayi/Tainan Area IV	6	72	14.4	14	5.1429
Kaohsiung City/Pingtung Area I	6	73	14.6	15	4.8667
Kaohsiung City/Pingtung Area II	8	97	19.4	19	5.1053
Kaohsiung City/Pingtung Area III	6	72	14.4	14	5.1429
Yilan/Hualien/ Taitung & Outlying Islands Area I	8	97	19.4	19	5.1053
Total	136	1657	331.4	332	

One fifth of respondents were selected for re-test. The questions in the re-test questionnaires were far fewer and the same interviewer was not allowed to interview

the same respondent he/she interviewed in the previous fieldwork.

5.3 FIELD EDITING

5.3.1 DATA PROCESSING

The supervisors went over the interviewers' work to check for consistency after the interview and the office editors conducted final consistency checks on all interviews prior to coding. The team members also gathered to discuss the coding problem in open questions and decided the new codes.

5.3.2 DATA ENTERING AND CLEANING

Data was then verified and the consistency of the encoded data was checked before data tables were generated.

6. RELIABILITY ANALYSIS

As part of a full review of the survey, questions were subjected to a reliability analysis. Reliability was measured using Cronbach's alpha, α . It is a common rule of thumb that a Cronbach α value of .6 to .7 is an acceptable value. This Technical Report uses commonly accepted rule of thumb in interpreting Cronbach's α values:

- $\alpha \geq 0.9$ *Excellent*
- $0.7 \leq \alpha < 0.9$ *Good*
- $0.6 \leq \alpha < 0.7$ *Acceptable*
- $0.5 \leq \alpha < 0.6$ *Below Standard*
- $\alpha < 0.5$ *Poor*

6.1 ECONOMIC EVALUTIONS

Each of the six items showed positive correlation with the other five items. The total Cronbach's α value for the six items was .646, which is considered acceptable. The consistency of each item was therefore ideal in terms of reliability analysis.

Cronbach's α =.646	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q1. How would you rate the overall economic condition of our country today?	.388	.602
Q2. How would you describe the change in the economic condition of our country over the last few years?	.306	.627

Q3. What do you think will be the state of our country's economic condition a few years from now?	.432	.585
Q4. As for your own family, how do you rate the economic situation of your family today?	.391	.608
Q5. How would you compare the current economic condition of your family with what it was a few years ago?	.394	.599
Q6. What do you think the economic situation of your family will be a few years from now?	.415	.592

6.2 TRUST IN POLITICAL INSTITUTIONS

Each of the thirteen items showed positive correlation with the other twelve items. The total Cronbach's α value of the thirteen items was .885. The consistency of each item was excellent in terms of reliability analysis. There was no significant difference in the coefficient Cronbach's α when we removed individual items. Therefore, it is not necessary to delete any items. Overall, the design of this group of questions was good, and each item passed the reliability test.

Cronbach's α=.885	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q7. The President	.496	.880
Q8. The courts	.622	.874
Q9. The national government [in Manila]	.667	.872
Q10. Political parties [not any specific party]	.579	.876
Q11. Parliament	.655	.872
Q12. Civil Service	.595	.875
Q13. The military	.600	.875
Q14. The police	.572	.877
Q15. Local government	.621	.874
Q16. Newspapers	.525	.879
Q17. Television	.439	.883
Q18. The Commission on Elections or COMELEC	.601	.875
Q19. Non-governmental organizations or NGOs	.503	.881

6.3 SOCIAL CAPITAL

6.3.1 FAMILY TRUST

The Cronbach's α value for the three items is .669, which is considered acceptable. Each of the three items is positively correlated with each of the other questions in this battery. Q26 (.560) has the lowest corrected item-total correlation. But overall, the design of this group of questions was good, and each item passed the reliability test.

Cronbach's α=.669	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q26. Your relatives	.491	.560
Q27. Your neighbors	.479	.575
Q28. Other people you interact with	.471	.585

6.3.2 SOCIAL NETWORK

The Cronbach's α value for the three items is only .228, which is considered below standard. Q32 has the lowest correlation, which means its concept does not fit in this set of questions. When we remove Q32, the Cronbach's α increased significantly to .552. Therefore, we should consider deleting Q32 from this battery in future surveys.

Cronbach's α=.228	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q30. If you have a difficult problem to manage, are there people outside your household you can ask for help?	.214	-.013
Q31. When people outside your household have problems, do they come to you for help?	.203	.042
Q32. If you had friends or co-workers whose opinions on politics differed from yours, would you have a hard time conversing with them?	.011	.552

6.4 ACCESS TO PUBLIC SERVICE

Each of the four items showed positive correlation with the other three items. Yet all the coefficients are pretty small. Q40. "How easy or difficult to obtain a place in a public primary school for a child," had the lowest correlation with a figure of .222.

The total Cronbach's α value of the four questions was only .430. When Q40 was removed, the Cronbach's α value increased significantly. It means that this question is not similar to others in this set of questions. The consistency of each concept was, therefore, not ideal in terms of reliability analysis. It is necessary to reconsider the items included in this set of questions.

Cronbach's α=.430	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q39. How easy or difficult to obtain an identity document service	.309	.334
Q40. How easy or difficult to obtain a place in a public primary school for a child	.222	.437
Q41. How easy or difficult to obtain medical treatment at nearby clinic	.269	.371
Q42. How easy or difficult to obtain help from the police when you need it	.276	.322

6.5 PSYCHOLOGICAL INVOLVEMENT

The total Cronbach's α value of the three items was .605. The consistency of each concept is, therefore, acceptable in terms of reliability analysis. No question should be deleted from this battery since doing so will lower the Cronbach's α significantly. Overall, the reliability of this set of questions is acceptable.

Cronbach's α=.605	Corrected Item-total correlation	Cronbach's αif Item Deleted
44. How interested would you say you are in politics?	.521	.397
45. How often do you follow news about politics and government?	.489	.590
46. When you get together with your family members or friends, how often do you discuss political matters	.466	.558

6.6 INTERNET AND SOCIAL MEDIA

The Cronbach's α value for the six items is .564, which is considered below

standard. Each of the six items is positively correlated with each of the other questions in this battery. Q47 (.202) has the lowest corrected item-total correlation. Nevertheless, deleting any of the items from this battery would not have a significant effect on the overall Cronbach's α value, i.e., none of the items would increase the reliability if they were deleted because all values are less than or similar to the overall reliability, except Q47.

Cronbach's α=.564	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q47. Do you have Internet access at home?	.202	.575
Q48. Do you have Internet access on the mobile phone?	.382	.542
Q49. How often do you use the Internet?	.432	.466
Q50. Do you currently use any of the following social media networks?	.517	.526
Q51. How often do you use the Internet including social media networks to find information about politics and government?	.465	.440
Q52. How often do you use the Internet including social media networks to express your opinion about politics and government?	.366	.494

6.7 TRADITIONALISM

The total Cronbach's α value of the 14 items was .785. The consistency of each item was good in terms of reliability analysis. Q66 and Q67 had the lowest correlations, and, thus, deleting them can increase Cronbach's α value, but only slightly. There was no significant difference in the coefficient Cronbach's α when we removed individual items. There are therefore no items that need to be deleted from this perspective.

Cronbach's α=.785	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q55. For the sake of the family, the individual should put his personal interests second.	.470	.766
Q56. In a group, we should sacrifice our individual	.479	.765

interest for the sake of the group's collective interest.		
Q57. For the sake of national interest, individual interest could be sacrificed.	.458	.767
Q58. When dealing with others, developing a long-term relationship is more important than securing one's immediate interest.	.455	.767
Q59. When dealing with others, one should not only focus on immediate interest but also plan for future.	.505	.764
Q60. Even if parents' demands are unreasonable, children still should do what they ask.	.294	.781
Q61. When a mother-in-law and a daughter-in-law come into conflict, even if the mother-in-law is in the wrong, the husband should still persuade his wife to obey his mother.	.293	.784
Q62. Being a student, one should not question the authority of their teacher.	.397	.773
Q63. In a group, we should avoid open quarrel to preserve the harmony of the group.	.537	.762
Q64. Even if there is some disagreement with others, one should avoid the conflict.	.473	.767
Q65. A person should not insist on his own opinion if his co-workers disagree with him.	.409	.772
Q66. Wealth and poverty, success and failure are all determined by fate.	.197	.786
Q67. If one could have only one child, it is more preferable to have a boy than a girl.	.161	.789
Q68. When dealing with others, one should not be preoccupied with temporary gains and losses.	.495	.765

6.8 POLITICAL PARTICIPATION

6.8.1 EXPRESSION OF IDEAS

The Cronbach's α value for the five items is .771, which is considered *good*. Each of the five items is positively correlated with each of the other questions in this module. Q71 (.436) has the lowest corrected item-total correlation and deleting it can increase the Cronbach's α value slightly. Overall, deleting any of the items from this battery would not have a significant effect on the overall Cronbach's α value, i.e., none of the items would increase the reliability.

Cronbach's α=.771	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q69. Contacted elected officials or legislative representatives at any level	.598	.709
Q70. Contacted officials at higher level	.594	.711
Q71. Contacted traditional leaders/community leaders.	.436	.775
Q72. Contacted other influential people outside the government.	.588	.714
Q73. Contacted news media	.535	.735

6.8.2 CIVIC ACTION

Each of the five items showed a high to modest level of correlation with the other four questions. The total Cronbach's α value of the five items was .641. The consistency of each item was therefore acceptable in terms of reliability analysis. Q78 had the lowest correlations and if it were deleted, the total Cronbach's α would increase slightly. Therefore, it is not necessary to delete Q78 from this set of questions in future surveys.

Cronbach's α=.641	Corrected Item total correlation	Cronbach's αif Item Deleted
Q74. Got together with others to try to resolve local problems	.448	.560
Q75. Got together with others to raise an issue or sign a petition	.559	.496
Q76. Attended a demonstration or protest march	.506	.529
Q77. Used force or violence for a political cause	.319	.632
Q78. Have you voted in every election, voted in most elections, voted in some elections or hardly ever voted?	.213	.683

6.9 REGIME PREFERENCE

6.9.1 IDEAL SYSTEM OF DEMOCRATIC GOVERNMENT

This group has a total of eight items. After measuring each main question and supplementary question, the two were grouped together and given a new code. For example, Q79 and Q79a were grouped together as “Strongly agree: Government

leaders implement what voters want. (Code 1)”, “Agree: Government leaders implement what voters want. (Code 2)”, “Agree: Government leaders do what they think is best for the people. (Code 3)”, and “Strongly agree: Government leaders do what they think is best for the people. (Code 4)”. Q82 showed the lowest correlations with the other three items with a figure of .392. The total Cronbach’s α value for the four items was high at .660, which is acceptable. The consistency of each item was therefore good in terms of reliability analysis.

Cronbach's α = .660	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q79+Q79a. Regime Preference 1: <i>Statement 1. Government leaders implement what voters want. Statement 2. Government leaders do what they think is best for the people.</i>	.427	.603
Q80+Q80a. Regime Preference 2: <i>Statement 1. Government is our employee, the people should tell government what needs to be done. Statement 2. The government is like parent, it should decide what is good for us.</i>	.471	.575
Q81+Q81a. Regime Preference 3: <i>Statement 1. The media should have the right to publish news and ideas without government control. Statement 2. The government should have the right to prevent the media from publishing things that might be politically destabilizing.</i>	.485	.561
Q82+Q82a. Regime Preference 4: <i>Statement 1. Political leaders are chosen by the people through open and competitive elections. Statement 2. Political leaders are chosen on the basis on their virtue and capability even without election.</i>	.392	.625

6.9.2 OPERATION OF CURRENT GOVERNMENT INSTITUTIONS

The correlation of each item with the other three items in this set is acceptable, with a minimum figure of .511. The total Cronbach’s α value for the four items

was .780. The consistency of each item was good in terms of reliability analysis. There was no significant difference in the coefficient Cronbach's α when we removed individual items. Therefore, it is not necessary to delete any items. Overall, the design of this set of questions is good. Each question passed the reliability test.

Cronbach's α = .780	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q83. Over the long run, our system of government is capable of solving the problems our country faces	.561	.739
Q84. Thinking in general, I am proud of our system of government	.651	.695
Q85. A system like ours, even if it runs into problems, deserves the people's support.	.633	.701
Q86. I would rather live under our system of government than any other that I can think of.	.511	.772

6.10 MEANING OF DEMOCRACY

The Cronbach's α value for the four items is .700, which is considered as acceptable. Each of the four items is positively correlated with each of the other questions in this battery. Deleting any of the items from this battery would not have a significant effect on the overall Cronbach's α value, i.e., none of the items would increase the reliability if they were deleted because all values are less than or similar to the overall reliability.

Cronbach's α = .700	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q88. 1. Government narrows the gap between the rich and the poor. 2. People choose the government leaders in free and fair election. 3. Government does not waste any public money. 4. People are free to express their political views openly.	.485	.636
Q89. 1. The legislature has oversight over the government. 2. Basic necessities, like food, clothes and shelter, are provided for all.	.494	.630

3. People are free to organize political groups. 4. Government provides people with quality public services.		
Q90. 1. Government ensures law and order. 2. Media is free to criticize the things government does. 3. Government ensures job opportunities for all. 4. Multiple parties compete fairly in the election.	.502	.625
Q91. 1. People have the freedom to take part in protests and demonstrations. 2. Politics is clean and free of corruption. 3. The court protects the ordinary people from the abuse of government power. 4. People receive state aid if they are unemployed.	.458	.652

6.11 QUALITY OF GOVERNANCE

The total Cronbach's α value of the eleven items was .814. The consistency of each item was therefore good in terms of reliability analysis. There was no significant difference in the coefficient Cronbach's α when we removed individual items. Overall, the design of this set of questions is ideal. Each question passed the reliability test.

Cronbach's α=.814	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q101. People have the power to change a government they don't like.	.536	.792
Q102. Political parties or candidates in our country have equal access to the mass media during the election period.	.547	.791
Q103. Between elections, the people have no way of holding the government responsible for its actions.	.476	.799
Q104. When government leaders break the laws, there is nothing the court can do.	.478	.800
Q105. All citizens from different ethnic communities in [Thailand] are treated equally by the government.	.503	.796
Q106. Rich and poor people are treated equally by the government.	.455	.802

Q107. People have basic necessities like food, clothes, and shelter.	.470	.800
Q108. People are free to speak what they think without fear.	.544	.791
Q109. People can join any organization they like without fear.	.597	.784

6.12 PREFERENCE FOR DEMOCRACY

Each of the five questions showed positive correlation with the other four questions. The correlation of each item with the other four items in the set was above .300. The total Cronbach's α value for the five items was .709, which is acceptable. There was no significant difference in the coefficient Cronbach's α when we removed individual items. Overall, the ability of this set to reliably measure democratic legitimacy is fairly adequate.

Cronbach's α =.709	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q125. Which of the following statements comes closest to your own opinion? (1) Democracy is always preferable to any other kind of government (2) Under some circumstances, an authoritarian government can be preferable to a democratic one (3) For people like me, it does not matter whether we have a democratic or a nondemocratic regime	.489	.653
Q126. Which of the following statements comes closer to your own view? (1) Democracy is capable of solving the problems of our society (2) Democracy cannot solve our society's problems	.488	.656
Q127. If you had to choose between democracy and economic development, which would you say is more important?	.380	.694
Q128. If you had to choose between reducing economic inequality and protecting political	.494	.650

freedom, which would you say is more important?		
Q129. Do you agree or disagree with the following statement: “Democracy may have its problems, but it is still the best form of government”.	.503	.650

6.13 LEGITMACY OF DEMOCRACY/ DETACHMENT FROM AUTHORITARIANISM

The Cronbach’s α value for the eight items is .849, which is considered good. Each of the eight items is positively correlated with each of the other questions in this module. Deleting any of the items from this battery would not have a significant effect on the overall Cronbach’s α value, i.e., none of the items would increase the reliability if they were deleted because all values are less than the overall reliability α .

Cronbach's α =.849	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q130. We should get rid of parliament and elections and have a strong leader decide things.	.668	.819
Q131. Only one political party should be allowed to stand for election and hold office.	.726	.793
Q132. The army (military) should come in to govern the country.	.639	.830
Q133. We should get rid of elections and parliaments and have experts make decisions on behalf of the people.	.729	.791

6.14 CITIZEN EMPOWERMENT AND POLITICAL SUPPORT

The Cronbach’s α value for the five items is .719, which is considered good. Each of the five items is positively correlated with each of the other questions in this module. Q134 (.365) has the lowest corrected item-total correlation. Deleting any of the items from this battery would not have significant effect on the overall Cronbach’s α value, i.e., none of the items would increase the reliability if they were deleted because all values are less than the overall reliability Cronbach’s α .

Cronbach's α =.719	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q134. I think I have the ability to participate in	.365	.718

politics.		
Q135. Sometimes politics and government seems so complicated that a person like me can't really understand what is going on.	.519	.656
Q136. People like me don't have any influence over what the government does.	.528	.651
Q137. You can generally trust the people who run our government to do what is right.	.532	.652
Q138. A citizen should always remain loyal only to his country, no matter how imperfect it is or what wrong it has done.	.461	.679

6.14 AUTHORITARIAN/DEMOCRATIC VALUES

Each of the eleven questions showed positive correlation with the other ten questions. The total Cronbach's α value for the eleven items was .868. The consistency of each item was good in terms of reliability analysis. Thus, no items need to be deleted.

Cronbach's $\alpha = .868$	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q139. Women should not be involved in politics as much as men.	.393	.867
Q140. The government should consult religious authorities when interpreting the laws.	.555	.858
Q141. People with little or no education should have as much say in politics as highly-educated people.	.476	.863
Q142. Government leaders are like the head of a family; we should all follow their decisions.	.566	.858
Q143. The government should decide whether certain ideas should be allowed to be discussed in society.	.654	.851
Q144. Harmony of the community will be disrupted if people organize lots of groups.	.593	.855
Q145. When judges decide important cases, they should accept the view of the executive branch.	.605	.855
Q146. If the government is constantly checked [i.e.	.619	.854

monitored and supervised] by the legislature, it cannot possibly accomplish great things.		
Q147. If we have political leaders who are morally upright, we can let them decide everything.	.656	.851
Q148. If people have too many different ways of thinking, society will be chaotic.	.557	.858
Q149. When the country is facing a difficult situation, it is ok for the government to disregard the law in order to deal with the situation.	.585	.856

6.15 GLOBALIZATION

The Cronbach's α value for the five items is .562, which is considered below standard. Each of the five items is positively correlated with each of the other questions in this module, though the correlations are low. Deleting any of the items from this battery would not have significant effect on the overall Cronbach's α value, i.e., none of the items would increase the reliability if they were deleted because all values are less than the overall reliability Cronbach's α .

Cronbach's α=.562	Corrected Item-total correlation	Cronbach's αif Item Deleted
Q150. How closely do you follow major events in foreign countries / the world?	.260	.552
Q151. Our country should defend our way of life instead of becoming more and more like other countries.	.432	.416
Q152. Do you agree or disagree with the following statement: "We should protect our farmers and workers by limiting the import of foreign goods."	.368	.471
W153. Do you think the government should increase or decrease the inflow of foreign immigrants into the country?	.331	.507

6.16 REDISTRIBUTION

Each of the six items showed positive correlation with the other five items. Yet the coefficients are small. The total Cronbach's α value for the five items was only .578. The consistency of each item was therefore not ideal in terms of reliability analysis. There was no significant difference in the coefficient Cronbach's α when we removed

individual items. Therefore, it is not necessary to delete any items. Yet the questions in this set should be re-considered.

Cronbach's $\alpha = .578$	Corrected Item-total correlation	Cronbach's α if Item Deleted
Q155. How fair do you think income distribution is in (country)	.303	.538
Q156. Do you agree or disagree with the following statement: "It is the responsibility of the government to reduce the differences between people with high income and those with low incomes."	.239	.563
Q157. How concerned are you about the loss of your major source of income within the next 12 months?	.305	.540
Q158. The following is a hypothetical question: If you were unfortunate enough to lose your main source of income, how serious would it be for you and your family?	.276	.550
Q159. Considering all the effort that you and your family members have made in the past, do you think the income that your family currently receives is fair or not fair?	.424	.479
Q160. As compared to my parent's generation, my generation has more or fewer opportunities to improve one's standard of living or social status?	.346	.521

7. EXAMINATION OF REPRESENTATIVENESS OF SAMPLE SET AND WEIGHTING

There are few steps to get to the final weights, where firstly we weight by gender. Then another weighting factor is calculated using age. We also get another weighting factor based on educational attainment. The final weighting factor, then, is the multiplication of the three weighting factors.

7.1 GOODNESS-OF-FIT TESTS

Gender

Gender	Sample		Population	Result
	Frequency	Percent	Percent	
Male	849	51.24	49.36	Chi square= 2.336 P>.05 Consistent with the population
Female	808	48.76	50.64	
Total	1,657	100.00	100.00	

Age group

Age Group	Sample		Population	Result
	Frequency	Percent	Percent	
20 – 29	250	15.09	17.21	Chi square= 18.464 P<.05 <u>Not consistent with the population</u>
30 – 39	305	18.41	21.19	
40 – 49	331	19.98	19.53	
50 – 59	356	21.48	19.24	
60 and above	415	25.05	22.83	
Total	1,657	100.00	100.00	

Education

Education	Sample		Population	Result
	Frequency	Percent	Percent	
Elementary and less	283	17.12	15.47	Chi square= 8.963 P>.05
Junior High	236	14.28	13.07	

School				<u>Consistent with the population</u>
Senior High School	423	25.59	28.19	
Vocational	210	12.70	12.44	
College and above	501	30.31	30.84	
Total	1653	100.00	100.00	

7.2 SAMPLE REPRESENTATIVENESS

Gender

Gender	Before weighting		After weighting	
	Frequency	Percent	Frequency	Percent
Male	849	51.24	818	49.4
Female	808	48.76	839	50.6
Total	1657	100.0	1657	100.0

Chi square=2.652, p-value>.05, consistent with the population after weighting.

Age Group

Age Group	Before weighting		After weighting	
	Frequency	Percent	Frequency	Percent
20 – 29	250	15.09	277	16.70
30 – 39	305	18.41	347	21.00
40 – 49	331	19.98	331	20.00
50 – 59	356	21.48	324	19.50
60 +	415	25.05	378	22.80
Total	1,657	100.00	1657	100.00

Chi square=.536, p-value>.05, consistent with the population after weighting.

Education

Education	Before weighting		After weighting	
	Frequency	Percent	Frequency	Percent
Elementary and less	283	17.12	257	15.60
Junior High School	236	14.28	216	13.10
Senior High School	423	25.59	466	28.20
Vocational	210	12.70	204	12.30
College and above	501	30.31	509	30.80
Total	1653	100.00	1653	100.00

Note: 1. Chi square=.0206, p-value>.05, consistent with the population after weighting.

2. Missing value in education (4 cases) was excluded.

Appendix

1. List of PSU

Area	City/County	Electoral District	Neighborhood (Li)/Village (PSU)		
Taipei City/New Taipei City/Keelung Area	New Taipei City	2	Cheng-gong		
			Ren-de		
			Chung-yi		
		Heng-de			
		4	Shing-fu		
			Chung-shin		
			Heng-an		
		6	Chun-tsui		
			Wen-tsui		
			Nan-hsiang		
		8	Chung-chen		
			Hsiang-an		
			Hsin-he		
		10	Ching-sui		
			Ping-he		
			Jing-ping		
		12	Ching-he		
			An-he		
			Yuan-lin		
		1	Taipei City	1	Er-jiou
					Huang-kang
					Da-tung
		3			Fu-hsiang
					Shuo-ren
					Jian-an
					Wen-chuan
					Chung-he
Lan-ya					
		3	Min-an		

			Pi-tou
			Kang-le
			Lung-tien
		5	Fu-fu
			Liu-ti
			Shin-he
			Wen-hsiang
		8	Ban-hsi
			Chang-chiao
			Cheng-ta
Taoyuan/ Hsinchu/ Miaoli Area	Taoyuan County	1	Feng-shu
			Da-hsiang
			Da-yu
			Nan-hsiang
		3	Chih-pa
			Hsiang-fu
			Jian-hsiang
		6	Ren-he
			Yung-feng
			Da-cheng
			Yi-de
	Hsinchu County	1	Bai-ti
			Ai-shih
			San-chung
	Miaoli County	1	Yuan-keng
			Mei-nan
			Ding-pu
			Shan-jia
Taichung/ Changhua/ Nantou Area	Taichung City	2	Wu-jih
			Ji-feng
			Tou-ti

			Chu-lin
		4	Hsieh-he
			Shang-de
			Shi-ping
			Da-yeh
		6	Kung-kuan
			Da-chung
			He-ping
			Fu-ren
		8	Min-sheng
			Shi-shih
			Chung-yang
			Chung-he
	Changhua County	2	Jia-pei
			Jia-hsiang
			Fu-shan
			Tao-yuan
		4	Pei-chen
			Chang-tsu
			Da-Rau
			Kuang-yun
	Nantou County	2	San-lun
			Chien-chiu
			Ping-he
			Nei-hsiang
Yunlin/ Chiayi/ Tainan Area	Yunlin County	1	Shu-chiao
			Shih-hu
			Hui-lai
			Hai-pei
	Chiayi County	1	Yung-he
			Liu-lin
			Hsiang-chung

			Chen-laio
	Tainan City	1	He-chien
			Chung-chou
			Chiao-nan
			Hsien-tsao
		3	Cheng-de
			Feng-huang
			Shiue-tung
			Kung-ching
		5	Er-hsiang
			Kuan-miao
			Wang-laio
			Da-miao
Kaohsiung City/ Pingtung Area	Kaohsiung City	1	San-nai
			Fu-an
			Chung-chun
			Nan-lian
		3	Tsai-kung
			Fu-shan
			Kuo-chang
			Jia-chang
		6	Ding-shi
			Ding-sheng
			Pao-an
			Ding-tai
		8	Wen-shan
			Hsiang-fu
			He-de
			Chung-cheng
	Pingtung County	2	Wan-chuan
			Chien-chin
			Tan-chi
Yilan/ Hualien/ Taitung & Outlying Islands*	Yilan County	1	Ding-liao

			Da-ji
			Tsai-yuan
			Wen-hua
	Hualien County	1	Chu-tian
			Yuang-hsiang
			Yuang-an
			Da-han