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**The World Bank Listening to LAC (L2L) Pilot  
Final Report**

**October 2012**

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## 1. Background

The World Bank is interested in leveraging the SMS technology as a means of direct communication with poor households in the developing world in order to gather rapid feedback on the impact of economic crises and other events on the economy of such households. The World Bank expects these data to be useful in providing warning signs in case of future crises, enabling faster and more effective policy responses. With this goal in mind, the World Bank commissioned Gallup to conduct the “Listening to LAC” (L2L) pilot program, a research project aimed at testing the feasibility of the SMS technology as a data collection method for conducting quick turnaround, self-administered, longitudinal surveys among households in Peru and Honduras.

Since the field of data gathering by means of mobile phones and self-administered surveys is new in Latin America, especially for the type of information and target audience of this project, the L2L pilot program was designed to test the reliability and validity of the SMS method to collect household-level data, as well as other potential methodological issues and logistical challenges related to its implementation, with a strong emphasis on issues related to non-response and attrition of panelists. The test used Face to Face surveys as its benchmark, and included Interactive Voice Response (IVR) and Computer Assisted Telephone Interviews (CATI) surveys as additional comparative methods.

The following report summarizes the results of the L2L pilot program, and offers recommendations for its eventual implementation in the developing world, with a focus on Latin America.

## 2. Research Objectives

### *General Objective*

The L2L pilot program's overarching goal was to assess the feasibility of the SMS technology as a data collection method for quick turnaround, self-administered surveys in Peru and Honduras. The following paragraphs state the three specific objectives of *the study*:

*Specific Objective 1:* To determine whether the SMS method can yield valid measurements. That is, measurements that are comparable, within an acceptable margin of error, to those produced by Face to Face interviews, which are conventionally regarded as a highly valid method.

*Specific Objective 2:* To determine whether the survey measurements generated by SMS are statistically reliable. That is, stable or consistent across repeated iterations of the same SMS measurement. This objective only applied to the Honduras study, per the World Bank's specifications.

*Specific Objective 3:* To identify potential barriers that might compromise the feasibility of the SMS method, including:

- Sample representativeness
- Non-response, non-completion and panel attrition
- Implementation challenges
- Technological challenges.

### 3. Methodology

#### 3.1 Methodological Framework and Decisions Adopted to Achieve the Objectives

The following paragraphs explain the methodological framework and decisions adopted to achieve the objectives discussed above.

*Specific Objective 1: To determine whether the SMS method can yield measurements that are comparable, within an acceptable margin of error, with those produced by more traditional data collection methods (i.e., Face to Face), which are conventionally regarded as highly valid.*

The problem of comparability between two test measures has been documented in the Social Research Methods literature as a criterion validity testing problem. Criterion validity refers to the comparative analysis between a test and a criterion variable that is supposed to measure the same construct and that is held to be valid. Thus, in order to achieve specific objective 1, Gallup conducted a criterion validity test, as follows:

##### 3.1.1 Criterion Measurement

In the case of Honduras, the 2011 measurement of the Gallup World Poll (GWP) survey conducted in the country was originally proposed as the criterion variable. However, as part of the L2L pilot program Gallup conducted a nationally representative, Face to Face survey (n=1,464 households) that utilized the exact same geographic conglomerates (or Secondary Sampling Units, SSU's) as the GWP. Estimators from this survey were compared to estimators generated by the GWP as well as to their respective parameters from the most recent official census of Honduras. Since these comparative analyses demonstrated that the L2L Face to Face survey estimators matched those of the GWP and census parameters<sup>1</sup> within an acceptable margin of error, the L2L Face to Face survey was adopted as the criterion measurement for the analyses presented in this report.

In the case of Peru, the National Household Survey (ENAHU) was used as the criterion variable. The World Bank was granted access to the most recent micro data from this survey. Therefore, the World Bank conducted the L2L criterion validity analysis for Peru.

##### 3.1.2 Test Measurement

The responses to the SMS survey administered to the same households that responded to the L2L Face to Face survey were used as the test measurement. The questions asked by these SMS surveys were identical those asked by the L2L Face to Face survey.

##### 3.1.3 Comparison Between the Criterion and Test Variables

Both measures were administered to the same households. Since the SMS sample was affected by a high level of attrition – fifty-five percent of participants who originally agreed to join the panel did not respond to the first SMS survey sent to them – for the purpose of this analysis only households that responded to both surveys (45% of the sample) were included. This analytic decision was made in order to ensure that whatever differences might be encountered between the two measures could primarily be attributed to “mode effects”, as opposed to demographic differences between respondents.

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<sup>1</sup> For details on this comparative analysis please refer to the L2L Pilot report entitled “Baseline Face to Face Surveys in Honduras and Peru” produced by Gallup as part of the World Bank’s L2L Pilot Program.

The difference between the responses given to the test variable and those given to the criterion variable were tested for statistical significance by means of non-parametric ANOVA.

#### 3.1.4 Validity Determination

The test measurement is considered valid if its values are not significantly different from those of the criterion variable at a 95% confidence level.

*Specific Objective 2: To determine whether the survey responses generated by SMS are comparable with those generated by IVR and CATI in terms of their stability and consistency across repeated iterations of the same measure.*

The problem of intra-mode consistency was approached by means of a comparative reliability test-retest exercise, which consisted of the following:

- Two waves of an identical SMS survey were administered to a group of n=1466 households with a separation of at least four weeks between both waves.
- Two-wave administrations of the same survey were conducted with the same households via CATI and IVR. These administrations were conducted in a semi-concurrently fashion by using a random rotation scheme (for details of this procedure please refer to Appendix A).
- Cronbach Alpha reliability coefficients were computed for each survey method. The coefficients were compared in a round-robin fashion.

*Specific Objective 3: To identify potential barriers that might compromise the feasibility of the SMS method.*

The problems of sample representativeness and non-response/panel attrition were addressed through methodological decisions which are discussed below. The barriers and challenges related to implementation and technology were addressed through logistical solutions that will be discussed later on.

#### 3.1.5 Addressing Sample Representativeness

The use of mobile phones for surveys that intend to represent a country's general population is a frequent subject of debate among survey methodologists. Among the focal points of such debate, has been the ability of mobile phone surveys to represent all geographic and demographic segments within a given country. While mobile phone penetration has increased dramatically in the developing world, researchers are still concerned with the ability of mobile sampling frames to represent rural areas.

Therefore, in order to overcome the above-mentioned problems with mobile phone sampling frames, the L2L study relied on probability-based, nationally representative household panels, recruited ad-hoc by means of Door to Door, Face to Face interviews.

The following paragraphs describe the sample design used in building such panels in Honduras and Peru.

### 3.2 Honduras L2L Sample Design

The Honduras panel was built on a nationally representative sample of 1,500 households. At each selected household, interviewers asked to speak to the person recognized by the family as the head of the household. If the head of the households could not be located after two attempts, interviewers proceeded to interview informants aged 15 years and older who were permanent residents of the household.

The L2L sample was designed under the following premises:

- Nationally representative including both, urban and rural areas
- Adopt the sampling frame used by the Gallup World Poll because the project objectives originally called for a comparison of data collected by both surveys
- The World Bank originally requested a disproportionate design that over-represented poor households. However, after examining the proportion of the country's population below the poverty line (60%, according to INEI 2010)<sup>2</sup>, such disproportionate design was deemed unnecessary. Therefore, Gallup recommended stratification based on population size.

The sample was drawn by means of a random, stratified, multistage design. The following is a description of such design, as well as the procedures involved in selecting the sampling units:

- Census-defined municipalities were classified into five strata according to population size:
  - I. Municipalities with 500.000 to 999.000 inhabitants
  - II. Municipalities with 100.000 to 499.000 inhabitants
  - III. Municipalities with 50.000 to 99.000 inhabitants
  - IV. Municipalities with 10.000 and 49.000 inhabitants
  - V. Municipalities with less than 10.000 inhabitants
- Interviews were then proportionally allocated to these five strata according to their share among the country's population.
- The **First Stage** of the design consisted of a random selection of Primary Sampling Units (PSU's) within each of the five strata previously defined. This procedure was performed by assigning each PSU a probability of selection proportional to the size of its population. As a result, larger PSU's were not only more likely to be selected than smaller ones, but the number of interviews allocated to them was also greater.
- In each PSU, one or more SSU's were then selected. The number of SSU's to be selected was determined based on the total number of interviews allocated to the PSU, and the number of interviews to be conducted in each SSU, as mandated by the design (a maximum of 12 interviews were conducted per SSU). The selection of SSU's was the **Second Stage** of the sample design.

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<sup>2</sup> INEI PERU, Peruvian National Statistics Office, El Instituto Nacional de Estadística e Informática (INEI).

- Once SSU's were selected, interviewers were sent to the field to proceed with the **Third Stage** of the sample design, which consisted of selecting households by means of a systematic "random route" procedure. Interviewers started from the previously selected "random origin" and walked around the block in clockwise direction, selecting every third household on their right hand side. They were also trained to handle vacant, non-responsive, non-cooperative households, as well as other failed attempts, in a systematic manner.

The following table offers further details about the sample, as designed for building the L2L panel, based on the 2011 administration of the GWP in Honduras.

**Table 1: L2L Honduras Sample**

<b>1. Universe</b>	All the households that exist in the neighborhoods of Honduras, as reported by the INE 2001 Census. Institutions such as military, religious or educational living quarters are not included in the universe.
<b>2. Geographic Coverage</b>	Includes the entire national territory, with the exception of neighborhoods where access of interviewers is extremely difficult, due to lack of transportation infrastructure or for situations that threaten the physical integrity of the interviewers and supervisors (i.e. extremely high crime rate, warfare, etc.)
<b>3. Number of Cases</b>	1,500 cases
<b>4. Sampling Error</b>	±2.6 percent points for results based on the total sample
<b>5. Design effect due to sample clustering</b>	1.06%
<b>6. Sample type</b>	Random multi-stage stratified sample, based on SSU's from the most recent census conducted in Honduras (2001).

### 3.3 Honduras L2L Sample Weighting

Given the socio-economic focus of the L2L survey, and the stark socio-economic differences that exist in Honduras, ensuring proportionality of socioeconomic variables was in order. Age and educational attainment of the head of the household are typically used as proxy variables to a household's socioeconomic status due to their high correlation to income and other economic indicators. In the L2L survey of Honduras weighting was performed to correct for observed disproportions of these variables, when compared to census data.<sup>3</sup>

### 3.4 Peru L2L Sample Design

Similarly to the Honduras survey, the Peru panel was based on a nationally representative sample of 1,500 households. At each selected household, interviewers asked to speak to the person recognized by the family as the head of the Household. If the head of the households could not be located after two attempts, interviewers proceeded to interview informants aged 15 years or older who were permanent residents of the household.

<sup>3</sup> For details on the weighting scheme developed for Honduras, please refer to the "Baseline Report Honduras and Peru" prepared by Gallup as part of the L2L Pilot Program.



The sampling design was guided by the following criteria<sup>4</sup>:

- Nationally representative, inclusive of both urban and rural areas;
- Use the most recent National Household Survey's (ENAHO) sampling frame available (fourth quarter 2010),<sup>5</sup> down to the Secondary Sampling Unit (SSU) level;
- Oversample households close to the poverty line. For the purposes of this project, "close to poverty line" was defined as 40 percent of income distribution that symmetrically bands the national poverty line: 20% above and 20% below. In 2010 in 27% of Peruvian households monthly per capita income was below the moderate poverty line (ENAHO 2010)<sup>6</sup>. Consequently, the households where monthly per capita income fell between 7 and 47 percent of the national distribution, were oversampled.

The following paragraphs describe the procedure for selecting the sample in Peru:

**First Stage: PSU selection.** The ENAHO 2010 4th trimester panel sample includes 3,782 households; 1,500 of L2L sample correspond to 40 percent of it. All PSUs were divided into two strata: PSUs where the proportion of households from the 7<sup>th</sup> to the 47<sup>th</sup> percentiles of the income distribution constitute the majority – stratum I, and PSUs where this proportion was less than 50 percent – stratum II. These two strata were treated as separate samples. There were 181 and 391 PSUs in stratum I and stratum II, respectively.

Sixty percent of the L2L sample (900 households) were drawn from stratum I and 40 percent (600 households) from stratum II. As the table below shows, there were approximately 1,346 households in stratum I and 2,436 households in stratum II. Consequently, 67%<sup>7</sup> of households from stratum I and 25% of households from stratum II were selected. PSUs were drawn with probability proportional to the size from each of 8 ENAHO strata.

**Table 2: L2L strata, based on fraction of households (hh) in 7-47 income percentile band**

ENAHO strata	L2L stratum II		L2L stratum I	
	number of conglomerados	number of hh	number of conglomerados	number of hh
1	109	654	0	0
2	115	690	4	24
3	46	276	3	18
4	36	216	18	108
5	40	240	26	156
6	9	72	15	120
7	19	152	79	632
8	17	136	36	288
Total		2,436		1,346

<sup>4</sup> This sampling procedure was entirely designed by the World Bank.

<sup>5</sup> For a detailed description of the ENAHO's sampling design and procedure please refer to the "Baseline Report "L2L Peru Sample" report prepared by Gallup as part of the World Bank's L2L Pilot Program

<sup>6</sup> Encuesta Nacional de Hogares (National Household Survey), <http://www.inei.gob.pe/web/enaho/>

<sup>7</sup>  $0.6 = 900/1346$ ;  $0.25 = 600/2,436$

**Second Stage: SSU selection.** The number of SSUs (conglomerates) per PSU in urban strata varied highly: from 1 to 38. We drew 940 households<sup>8</sup>, treating all urban PSUs as a single stratum, according to probability proportional to the size of SSU. Before making the draws, we sorted all SSUs according to socio-economic index, as in the ENAHO sampling, to ensure implicit stratification along the socio-economic dimension.

**Third Stage: Household selection.** 6 households were randomly selected from each urban SSU, and 8 households from each rural SSU.

### 3.5 Peru L2L Sample Weighting

As stated previously, the sample design overrepresented conglomerates where household income was close to the poverty line (20% above or 20% below the poverty line) versus all other conglomerates. The oversample needed to be corrected by accounting for the sample selection probability by creating a base weight. The ENAHO data on the size of the conglomerates that made up the two L2L strata was used to create targets for the size of the L2L strata. Also, using the ENAHO data, Gallup created targets for the distribution of the age of the head of household, and the highest level of education of the head of household.

### 3.6 Addressing Non-Response and Attrition

Besides the issue of national coverage, panels face the hurdles of non-response and attrition of panelists over time, two problems that may disproportionately affect certain demographic groups, often causing the panel to lose its representativeness. Therefore, researchers need to implement attrition containment and panel management strategies in order to maintain the panel's size and – to the extent possible – preserve the panel's probabilistic nature.

As part of the construction of the L2L panels, we conducted a Face to Face interview aimed at gathering demographics as well as baseline information on household economics. At the end of this survey, respondents were invited to participate in the panel. They were told they would need to answer no more than four surveys per month (only one per month in the case of Peru<sup>9</sup>) for a period of six months (four and a half months in the case of Honduras).

In order to maximize their cooperation (or avoid non-response) and minimize attrition, Gallup implemented the following panel management system:

#### 3.6.1 Incentives

In order to encourage participation in the panel, respondents were offered two types of incentives:

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<sup>8</sup> 940 = 1500 – 560; 1,500 – L2L sample size, 616 –number of rural households selected.

<sup>9</sup> In Peru, the panel was divided into three groups, with each group being exposed to only one methodology (SMS, IVR or CATI) through the course of the six months period. In Honduras, on the other hand, all panelists were exposed to all three methodologies in a random order of administration through the course of a four and a half months period. Honduran panelists responded up to four surveys per month.

Psychological Incentives: Participation in the panel was presented as “an interesting and engaging activity which would give panelists the opportunity to have their voice be heard by national and global leaders, and to represent their country nationals”.<sup>10</sup>

- Economic Incentives: Respondents received economic incentives in the form of free to use cellular phone airtime. Gallup assigned panelists randomly into three groups in order to experiment with three incentive schemes<sup>11</sup>:
  - Group 0: This group was not offered economic incentives. Therefore, their recruitment and retention relied entirely on psychological incentives
  - Group 1: This group received the equivalent in airtime to 1 USD, besides the psychological incentives
  - Group 5: This group received the equivalent in airtime to 5 USD, besides the psychological incentive

On average, respondents received this incentive within 72 hours of completing each monthly survey. Panelists received a text message notification letting them know the incentive had been credited to their mobile phone accounts.

### 3.6.2 Panel Management

- Upon survey administration

As part of the survey administration process Gallup implemented a number of mechanisms to maximize the response rate and panelist retention. Based on previous experiences Gallup expected the majority of the responses to occur within 24 hours after the surveys were sent (in the case of SMS surveys) and in a coincidental manner (at the time of the first call attempt) in the case of IVR and CATI surveys. However, it was anticipated that many panelists would need to be re-contacted. Therefore, in order to stimulate a response from panelists who failed to respond within this time frame, Gallup implemented the following actions:

- The surveys were left open for responses for up to 2 weeks after the original transmission of the survey (from original call in the case of IVR and CATI)
- First reminder was sent within 72 hours of first attempt (SMS and IVR)
- Second reminder was sent within 144 hours of first attempt (SMS and IVR)
- Call backs were made within 72 and 144 hours of first attempt (CATI) or
- Up to 2 call backs were made per appointment with respondent (CATI).

If the panelist failed to respond after the two week period and re-contact attempts, Gallup closed the survey for that month and sent (call for) a new survey the following month. If the panelist failed to respond to this subsequent survey attempt within 24 hours

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<sup>10</sup> For details on the exact wording used, please refer to the questionnaire (Appendix B).

<sup>11</sup> The rationale for this experiment and the actual incentive schemes are explained in a separate document (Panelist Incentive Scheme Specifications).

(SMS)/ failed to answer the phone (IVR and CATI), Gallup implemented the following actions:

- Send an immediate “urgent” reminder indicating that they missed last month's survey but that we want to keep them as panelists and to hear from them this time around. Gallup repeated that if they responded they could earn their free airtime (in case panelists belonged to the two groups that received incentives).
- Send/call for the scheduled 72 hour reminder
- Send/call for the scheduled 144 hour reminder

Non-responsive panelists who failed to respond to four consecutive monthly surveys were placed on a “Drop Out List” for further panelist recovery actions.

- Upon survey completion

In order to ensure that the economic incentives were being noticed by panelists who responded the surveys, Gallup sent a text message notification thanking them for their participation, indicating the amount of airtime credited, and encouraging them to keep participating in the upcoming surveys. This notification was sent via text message regardless of the methodology group (SMS, IVR or CATI) the panelist was assigned to.

- Additional Panel Management Mechanisms (Peru only):

Gallup attempted to re-contact and recover all panelists from the “Drop Out List”. However, panelists who responded to any contact attempts with a hard refusal (i.e. strong statements indicating they wish to terminate their participation), were excluded from the recovery list and no further re-contact attempts were made.

Panelists who were re-contacted and refused to continue taking part in the panel exercise, but did not respond with a “hard refusal” were interviewed in order to learn about the reasons for their decision to terminate their participation.

Recovery attempts for drop out panelists from the SMS and IVR groups were performed via phone using human interviewers. Drop out panelists from the CATI group were contacted for recovery attempts by means of SMS (first time) and IVR (second time). No more than two recovery contacts were made per participant.

### 3.7 Survey Modes

Based on the World Bank's requirements and recommendations from Gallup's researchers and methodologists, Gallup deployed the following survey modes:

Face to Face: Gallup interviewers visited the selected households, requested to speak with the eligible respondent, and proceed to conduct the interview. On average the interview took about 20 minutes. All the questions were closed-ended.

The questionnaire was designed by The World Bank in consultation with Gallup. The questions inquired about household composition and demographics. For comparability purposes, the Face to Face questionnaire also included all the questions tested by means of SMS, IVR and CATI.

At least 30% of each interviewer's work was supervised by means of follow-up interview visits and re-interviews of panelists or through phone interviews. In some instances, interviewers were accompanied by supervisors who monitored their work.

Short Messaging Service (SMS): Gallup sent survey questions to the selected households in the form of text messages using SMS gateway technology.

This data collection mode supports only one question at a time because of payload size and user-interface constraints. The question is restricted to 160 characters. The SMS questionnaires were provided by the World Bank. These included questions on household infrastructure, self-perceptions of poverty, household economy, food availability, education, work and health problems. No more than eight questions were sent in any administration of SMS surveys.

In order to participate in the panel, the households had to have at least:

- one working cellular phone available<sup>12</sup>
- one member of the family who is 15 years of age or older and who knew or was willing to learn how to operate SMS functionality.<sup>13</sup>

Fieldwork was monitored by means of automated SMS delivery and reception reports generated by the mobile phone carriers. Also, unresponsive panelists were contacted in order to inquire about the reasons for their lack of participation.

Interactive Voice Response (IVR): Gallup used this technology in its outbound modality. That is, panelists were called automatically on their mobile phones. Once respondents answered, a computer played a pre-recorded welcome message and proceeded to guide respondents through a menu that lead to the actual questionnaire. Then, respondents entered their answers by pressing keys on the mobile phone's keypad.

The IVR questionnaires were provided by the World Bank and were identical to those used for SMS surveys.

Fieldwork was monitored by means of automated IVR sample disposition reception reports generated by Gallup's IVR operations team in the United States.

Outbound to Cell Phone (CATI): Interviewers called the respondent's cell phones to conduct interviews. In order to administer the questionnaire and capture the responses the interviewers relied on a Computer Assisted Telephone Interviewing (CATI) software.

The CATI questionnaires were provided by The World Bank and programmed into the CATI system by Gallup's field operations partners companies in Peru and Honduras.

At least 30% of each interviewer's work was supervised by means of live call monitoring or follow-up interviews.

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<sup>12</sup> If the selected household did not have a working cellular phone, the interviewers provided one and trained household members on its use. The World Bank provided these cellular phones.

<sup>13</sup> If nobody in the household knew how to send and receive text messages, Gallup interviewers provided training and instructions.

## 4. Implementation

The following lines discuss critical aspects of the L2L pilot implementation, such as operational partners and training procedures, as well as fieldwork and technological challenges encountered.

### 4.1 Training

Gallup conducted a total of 12 training sessions with all of its operational partners prior to launching the project. The training sessions included: a) a survey methodology workshop; b) a panel recruitment and management workshop; c) live SMS and IVR survey self-administration sessions and; d) a pilot face to face survey administration followed by a simulated recruitment for the panel in actual households.

#### Training Materials

Gallup developed the following training materials:

- Interviewers guide for each methodology
- Manuals for most used cell phones
- Letter of agreement to participate in the panel
- Manuals for panelists:
  - Peru: Nine different manuals were created, one per methodology (SMS, CATI, IVR) and one for each of the 3 incentive schemes (\$0, \$1, \$5)
  - Honduras: One general manual explaining each methodology , with three versions (one for each incentive scheme, \$0, \$1, \$5)

### 4.2 Human Resources

On average, 20 interviewers and 5 supervisors were trained in each country. The interviewers had to pass a rigorous evaluation in order to be eligible for the project. The evaluation consisted of: interviewing techniques, demonstrated understanding of each methodology, and mastery of the questionnaire and sampling procedures.

### 4.3 Data Collection Challenges in the Field

This section will explain the challenges encountered in the field before, during and after data collection, and how they were addressed.

**Table 3: Data Collection Challenges in the Field**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
1. Prospective panelists distrust cell phone carriers to waive the cost of the SMS messages	Widespread distrust could have affected the survey's take up rate and/or increase attrition	<ul style="list-style-type: none"> <li>• Reassurance language was included in the interviewer's recruitment protocol</li> </ul>
2. Generalized, growing distrust in surveys due to frequent scams and fraud	Widespread distrust could have affected the survey's take up rate and/ or increase attrition	<ul style="list-style-type: none"> <li>• Create handout with Gallup's field partner information, website, and 800 number for panelist to use in case of questions or concerns</li> <li>• Include World Bank's and Gallup's mission in handout</li> </ul>
3. Respondent's perception that monthly contact would be bothersome and/or cumbersome	Widespread perception could have affected the survey's take up rate	<ul style="list-style-type: none"> <li>• Panelist recruitment protocol emphasized that only one 5-minute survey would be required per month</li> <li>• The number of questions was indicated in the welcome message</li> <li>• Respondents received a survey schedule indicating the approximate dates on which they should expect to receive the monthly surveys</li> </ul>
<p>4. Respondents losing track of question order because the initial words were the same for some questions, and questions remained in inbox after responded.</p> <p>(No question numbers were used during test run. A few of the order confusions occurred when respondents received other personal text messages or phone calls during survey completion. A total of 26 questions were sent as part of test run. The only label identifying the test SMS messages was the short code number of origin)</p>	These problems could have compromised survey reliability	<ul style="list-style-type: none"> <li>• Question numbers were used in production mode</li> <li>• Instruction to watch question numbers was added to recruitment protocol</li> <li>• No survey exceeded 10 questions</li> <li>• Custom label (Encuesta Banco Mundial) was created to identify the survey's SMS messages</li> </ul>

**Table 3: Data Collection Challenges in the Field (continued)**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
5. Concern about SMS and IVR surveys being unusual experiences for most panelist, with the possibility of certain demographics (i.e. older, residents of rural locations) not feeling capable or comfortable with the task	Might have caused higher non-response and/or attrition in certain demographics or areas, producing a coverage bias	<ul style="list-style-type: none"> <li>• Heads of households who expressed difficulty with text messaging were encouraged to team up with a household member 15 year or older who was more comfortable with handling the technology</li> </ul>
6. Concern about respondents receiving the surveys at times when they are not available to respond  (i.e. residents of rural areas who spend most of the day on fields)	Might have caused higher non-response and/or attrition rates	<ul style="list-style-type: none"> <li>• Aggregator's historical response pattern statistics were leveraged to make decisions on survey submission times</li> </ul>
7. Interviewer concern about the possibility of encountering multi-family households  (more, specifically, since the unit of analysis for this study is the household, interviewers asked which family they should select as the unit of analysis in multi-family households)	Discretionary selection of the family for the purpose of the survey might have generated a systematic bias	<ul style="list-style-type: none"> <li>• The family of the owner/tenant of the dwelling was considered as the unit of analysis</li> </ul>
8. Concern about utilizing different incentive schemes within the same conglomerates  (Original plan was to randomly assign the 3 incentive schemes at the household level, as opposed to conglomerate level)	Panelists are likely to talk about their participation in the study with their neighbors. Therefore, there is a possibility that panelists assigned to less favorable incentive schemes would drop out of the panel after learning that some of their neighbors were receiving a higher incentive	<ul style="list-style-type: none"> <li>• Incentive schemes were randomly assigned at the conglomerate level, as opposed to household level.</li> </ul>



**Table 3: Data Collection Challenges in the Field (continued)**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
<p>9. Socio-political conflict and crime problems in some areas of the country selected in the sample</p> <p>(Anti-mining general strike and riots in Cajamarca, Tacna and Apurimac departments (Peru) in Nov-Dec 2011. Threats, intimidation and temporary arrest of interviewers by civilian and indigenous authorities in Huancavelica, Pasco and San Martin departments (Peru). Interviewer crews assaulted, cell phones and surveys stolen in Honduras)</p>	<p>Risk for the interviewers and supervisors Delays in fieldwork execution</p>	<ul style="list-style-type: none"> <li>• A decision was made to delay fieldwork until stability returned to affected areas</li> <li>• Alternatively, sample replicates could have been drawn in order to perform systematic substitutions in exceptional situations, so that survey schedule was not affected</li> </ul>
<p>10. Face to face surveys from distant locations arriving at the central processing centers later than expected</p> <p>(For efficiency purposes, completed paper questionnaires need to be sent in batches. This causes that the first surveys completed need to wait until all the surveys in its region are completed before they can be sent and processed. This time lag is aggravated whenever quality issues are detected at the central processing center or during field supervision. Therefore, this time lag limits the ability to send follow-up surveys via SMS or otherwise to these households in a timely manner)</p>	<p>This problem can negatively affect the take-up of the follow up surveys</p>	<ul style="list-style-type: none"> <li>• For a scaled-up phase of this project, an on-site electronic capture and transmission of the F2F surveys is recommended. This could be accomplished by means of a handheld device equipped with a CAPI software</li> <li>• This solution could also result in reduced data processing time, as the data would be entered cleanly (i.e. free of skip pattern errors or outliers)</li> </ul>

#### 4.4 Technological Challenges

The following section explains the challenges relating to setting up two of the mobile communications methods (SMS, and IVR) and the decisions taken to solve them for the L2L pilot, as well as recommendations for a scaled up phase of the L2L project. No technical challenges were faced with the use of the CATI methodology.

**Table 4: Technological Challenges**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
<p>1. Survey transmission stoppage</p> <p>(During simulated SMS surveys it was discovered that stoppage occurred when cellular phones reached maximum SMS storage capacity. Surveys resumed after inbox was cleaned up. In some cases, questions were received in a random order after an inbox cleanup. Some delays were also experienced even when inbox had the required capacity.)</p>	<p>If problem had been generalized it could have affected the take up rate and data reliability. I could have also frustrated panelists and increased attrition rate</p>	<ul style="list-style-type: none"> <li>• SMS Gateway provider made corrections to the interconnection platform in order to eliminate the possibility of panelist receiving out of sequence questions</li> <li>• A dedicated communication channel was used in the survey production mode in order to improve delivery times</li> <li>• Recruitment protocol included an instruction for the panelist to keep the inbox clean. This instruction was repeated as part of the survey's "help" screen message</li> <li>• As part of the welcome message, respondents were told how many questions to expect</li> <li>• A "Help" message let panelists know that the survey would only finish when a good-bye message ending with the word "FIN" was received.</li> </ul>
<p>2. Interviewers concerned about cell phones of certain brands/ models/ age not having good enough reception, particularly in areas of poor or spotty signal quality</p>	<p>Could have caused higher non-response and/or attrition in certain areas, producing a coverage bias</p>	<ul style="list-style-type: none"> <li>• During the recruitment visit, interviewers checked panelist's cell phones for reception and working condition and provided new cell phones whenever needed</li> <li>• Cell phone's brand and model was asked as part of the recruitment questionnaire in order to control for possible non-response, non-completion or attrition patterns associated with certain types or brands of phones</li> </ul>

**Table 4: Technological Challenges (continued)**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
3. Some mobile operators only allow for 140 characters per SMS messages, as opposed to the standard 160 characters	<ul style="list-style-type: none"> <li>Uniform question wordings would not have been possible had this problem not been solved.</li> <li>All questions would have had to fit into 140 character format affecting question quality/ richness</li> </ul>	Negotiations had to be conducted with mobile operators so that all panelists could benefit from the 160 character format for this study regardless of their SMS plan
4. Data integration difficulties due to differences in data sources and data handling approaches on the part of the four operation partners involved in the project	<ul style="list-style-type: none"> <li>Labor intensive data standardization and coding processes.</li> <li>Manual, ad-hoc designed data handling processes generated countless errors</li> </ul>	<ul style="list-style-type: none"> <li>Further standardized processes and templates for data capture and reporting</li> <li>These processes require complex automation which is currently inexistent due to the unique, ad-hoc nature of this project</li> </ul>
<p>5. Delayed approval by cellular phone carriers of bulk short-code messaging under standard business model (with no charge for users)</p> <p>(Although the option of long-code messaging was available, it was not implemented due to the risk of carriers possibly treating the surveys as “spam” and shutting down traffic)</p> <p>(In order to implement a short-code solution, carriers require that an aggregator - third party company interconnected with the carrier’s transmission protocol- be involved as an intermediary)</p> <p>(Excessive bureaucracy on the part of cell phone carriers complicated the project execution)</p>	<ul style="list-style-type: none"> <li>Delayed commencement of the project in both countries</li> <li>If long-code solution had been implemented, a temporary traffic shut down on the part of the carriers could have disrupted the timeliness of survey submission, which was an essential feature of the methodological design.</li> <li>A permanent or prolonged traffic shut down could have compromised the feasibility of the project altogether</li> </ul>	In order to roll out a scaled-up version of this SMS panel project, upfront negotiation with cellular phone carriers and aggregators is strongly recommended

**Table 4: Technological Challenges (continued)**

<b>Problem/ Concern (and contributing factors)</b>	<b>Implications</b>	<b>Actions Taken/ Recommended</b>
<p>6. Lack of automation of sample and incentive administration (Due to the ad-hoc and unique nature of this project, the processes for managing the sample and crediting the incentives to panelists had to be done manually, which caused errors and delays)</p>	<ul style="list-style-type: none"> <li>• A few panelists did not receive their cell phone credits in a timely fashion, while others received an incentive twice as high as intended.</li> <li>• In some cases, incentives were credited but notifications to panelists were not sent on time.</li> <li>• Had these problems been generalized, it could have negatively impacted attrition rate</li> </ul>	<ul style="list-style-type: none"> <li>• In order to avoid these problems in a scaled up version of the project, sample and incentive manipulation would need to be automated</li> </ul>
<p>7. Inability of cell phone accounts with fixed monthly payment plans to receive incentives in the form of “airtime” credits (only phones activated under a “pay-per-use” plan can be replenished with “airtime”)</p>	<p>A potentially lower take-up or attrition rate among panelists subscribed to monthly payment plans could have caused a misrepresentation of middle-upper socioeconomic groups in the panel</p>	<ul style="list-style-type: none"> <li>• Alternative incentives were given to panelists with monthly plans</li> <li>• This problem is less likely to limit the inclusion of panelists with monthly plans in the future, since these cell phone users are likely to be the first ones to migrate to smartphones, which offer multiple possibilities for alternative incentives (i.e. free apps, e-money etc.)</li> </ul>
<p>8. Inability of cellular phones to call 800 numbers in some countries (Setting up a 1-800 help line for panelists facing technical difficulties completing the surveys, or having concerns about their legitimacy was essential to this project)</p>	<p>Not being able to troubleshoot technical issues or have questions/ concerns answered might result in increased panelist attrition</p>	<ul style="list-style-type: none"> <li>• Implement a paid phone number solution and compensate panelists with “airtime”</li> <li>• Set up an attrition management process by which non-responsive panelists receive calls, notifications and reminders. However, such process should not replace the in-bound help line</li> </ul>

**Table 4: Technological Challenges (continued)**

Problem/ Concern (and contributing factors)	Implications	Actions Taken/ Recommended
<p>9. Outbound IVR calls being missed or not properly identified by panelists</p> <p>(Unlike SMS messages -which stay on panelist's phone inbox for a long time after being received- outbound IVR calls are missed if the panelists don't answer them immediately. Also, occasionally, IVR recordings may start playing before respondents actually have the phone next to the ear, which may result in respondent not understanding or identifying the call properly and hanging up)</p>	<p>These issues may contribute to explain the lower response rate observed for IVR compared to SMS and CATI.</p>	<ul style="list-style-type: none"> <li>• It is recommended that Outbound IVR be used in conjunction with SMS. A text message containing a survey invitation and the phone number to call would be sent to panelists so that they could perform an inbound call whenever they are ready to answer the survey</li> <li>• However, inbound IVR might not work if the central IVR box is located in a different country, as some most countries do not allow dialing into foreign toll free numbers. Therefore, IVR infrastructure would need to be housed in each participating country, which could be costly and impractical</li> </ul>

## 5. Results

In order to help the reader navigate through the results of the study in a fluid and logical manner, they will be presented in the order in which they were produced in the field. This will also help understand the sequence in which the project was implemented and the decisions that had to be made along the way. The reader will notice that this order is different than the order in which the specific objectives of the study were presented.

### 5.1 Attrition

For the purpose of this report, the attrition rate was defined as the proportion of panelists who failed to respond to any given survey wave, out of all panelists who agreed to participate upon recruitment. Attrition rate in this report has the same meaning as non-response rate and therefore both terms will be used interchangeably throughout the report.

After recruitment, all follow-up surveys were sent to all panelists every time, regardless of whether they had completed the previous surveys or not. Therefore, it is conceivable for the attrition rate in a certain wave to be slightly lower than the attrition rate of the previous wave. That is because panelists who failed to participate in a certain wave may have missed the call or invitation to participate, or simply did not have time to respond in that particular wave, but did respond in the following wave(s). Hence, we suggest the reader to focus on the final attrition rate (wave 6) as the net measure of attrition for this panel study.

### 5.1.1 Overall Attrition in Peru

Two-thirds of recruited households in Peru failed to answer the first round of follow-up surveys. As Table 5 shows, attrition slightly increased with each wave of the survey (between 1 and 3 percentage points per wave), reaching 75% in wave 6. Comparing the number of respondents who accepted to be part of the panel in the first face-to-face survey (n=1,444) with the number that actually participated in wave 6, a quarter of households (n=366) actually participated by fully completing the survey or answering some questions.

**Table 5 – Overall Attrition in Peru**

<b>Wave 1</b>	Wave 2	Wave 3	Wave 4	Wave 5	<b>Wave 6</b>
<b>67%</b>	68%	69%	70%	72%	<b>75%</b>

### 5.1.2 Attrition by Demographics in Peru

The post-recruitment response rate was higher among urban, relatively affluent households and more educated panelists (see Table 6). While 73% of lower income panelists (households 20% below or above the national poverty line) who completed the face-to-face interview and accepted to join the panel did not participate in the first wave of the survey, the non-response rate among more affluent households was 58%. Furthermore, the non-response rate among residents of urban areas was 57% from the initial face-to-face interview to wave 1, and 78% among residents of rural areas.

However, with each wave the gap between poor and more affluent households narrowed. When comparing those respondents who still participated in wave 6 with those who gave their approval to be contacted in the initial Face to Face interview, we see that the level of attrition among those with low household income was 76%, close to that of more affluent households with 73%.

The differences in the level of attrition between city dwellers and residents of rural areas also decreased with each wave. However, in wave 6 the level of attrition of residents of rural areas was still 10 percentage points higher than among city dwellers (80% vs. 70%, respectively).

Table 2 also shows that in Peru, respondents with lower education were less likely to participate in any of the 6 waves than were those with higher levels of education.

Female respondents were slightly more likely to participate in wave 1 than were male panelists (the level of attrition was 64% vs. 69%, respectively). However, this difference disappeared with consecutive survey rounds. Heads of household were less likely to participate in all waves of the survey than others (spouse, children, grandchildren etc.). This finding can probably be explained by the fact that head of households are usually older -- and perhaps busier and/or less familiar with new technologies -- than younger respondents. The mean age for heads of household was 45 years, and for others 33 years. The study shows that respondents older than 45 years were clearly less likely than younger respondents to participate in all waves of the study.

**Table 6 – Attrition by Demographics in Peru**

	Poorer HH's	More affluent	Urban	Rural		
Wave 1	73%	58%	57%	78%		
Wave 2	72%	61%	60%	76%		
Wave 3	73%	65%	62%	77%		
Wave 4	71%	68%	64%	76%		
Wave 5	73%	71%	68%	77%		
Wave 6	76%	73%	70%	80%		
	Gender		Relationship with head of household HH			
	Male	Female	HH	Other		
Wave 1	69%	64%	72%	61%		
Wave 2	69%	66%	70%	65%		
Wave 3	69%	69%	72%	67%		
Wave 4	72%	68%	72%	66%		
Wave 5	74%	70%	76%	68%		
Wave 6	75%	74%	78%	71%		
	Age			Education		
	15-30	30-45 year-	Older than 45	Lower	Average	Higher
Wave 1	59%	67%	72%	80%	64%	56%
Wave 2	65%	66%	71%	75%	68%	57%
Wave 3	66%	68%	74%	79%	68%	61%
Wave 4	68%	67%	74%	77%	68%	63%
Wave 5	71%	70%	75%	78%	72%	65%
Wave 6	73%	72%	78%	81%	75%	67%

**5.1.3 Attrition by Incentive Level in Peru**

Economic incentives in the form of mobile phone credit for every completely answered survey did not seem to have a big effect on the post-recruitment response rate in Peru (see Table 7).

**Table 7 - Attrition by Incentive Level in Peru**

	No incentive	1 USD	5 USD
<b>Wave 1</b>	<b>68%</b>	<b>66%</b>	<b>66%</b>
Wave 2	70%	67%	66%
Wave 3	73%	68%	68%
Wave 4	72%	70%	67%
Wave 5	76%	71%	69%
<b>Wave 6</b>	<b>80%</b>	<b>73%</b>	<b>71%</b>

However, as the panel exercise progressed, incentives had some effect on minimizing attrition. With each wave, the level of attrition increased for all 3 groups, with the biggest increase being registered among panelists who received no economic incentive at all. In wave 6, the level of attrition for this group was 80% compared to 73% among those who received 1 dollar worth of

mobile phone credit and 71% of those who received 5 dollars worth of mobile phone credit per completed survey. It should be noted that a considerably higher incentive (5 dollars) did not prove much more successful in reducing attrition than a smaller amount (1 dollar).

#### 5.1.4 Attrition by Methodology in Peru

The Peruvian L2L study clearly produced a lower non-response rate for CATI when compared to IVR and SMS, as Table 8 shows. Comparing those households who agreed to take part in the panel with those that actually took part in wave 1, the level of attrition was the highest for IVR (80%), followed by SMS (70%). For CATI the level of attrition was 49%.

Over the course of the 6 waves the level of attrition for SMS increased to 79% (initial face-to-face compared with wave 6) and to 61% for CATI, with attrition for IVR remaining stable (81%). It should be noted that the L2L project deliberately sent out more invitations to take part via SMS (n=677), compared to IVR (n=383) and CATI (n=384). Since the level of attrition for SMS is relatively high compared to the CATI group, the higher n-size of the SMS group drives up the overall attrition of the panel.

**Table 8 - Attrition by Methodology**

	IVR	SMS	CATI
<b>Wave 1</b>	<b>80%</b>	<b>70%</b>	<b>49%</b>
Wave 2	75%	75%	47%
Wave 3	78%	76%	49%
Wave 4	78%	75%	52%
Wave 5	84%	76%	53%
<b>Wave 6</b>	<b>81%</b>	<b>79%</b>	<b>61%</b>

Moreover, IVR and SMS have the disadvantage of a certain proportion of respondents only answering some of the questions in any given survey; meaning that respondents completely skipped some questions<sup>14</sup>. The proportion of respondents only answering the surveys partially was as high as 7% for some SMS rounds and 5% for certain IVR rounds (see Table 9).

IVR and SMS are both self-administered methods, while CATI relies on an interviewer whose job it is to ensure all questions are read, understood and answered by the respondents (recording even legitimate “Don’t Know” responses or “Refusals”). Therefore, the higher rate of incomplete surveys observed for IVR and SMS could have been caused by problems manipulating the technologies, lack of skill of respondents to self-administer the survey, or even lack of understanding of some questions (mostly for SMS, which relies on the respondent’s reading ability).

As table 9 shows, CATI respondents always answered all survey questions. They might have refused to answer a question or might have said that they didn’t know the answer, but the fact that CATI is technology administered by an interviewers helps a survey’s completion rate, as it

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<sup>14</sup> Giving a “don’t know answer” or refusing to answer a question is not considered as a skip. If a respondent skips a question no data were obtained at all.



ensures that the respondent devotes attention to all the questions, and that legitimate “Don’t knows” and “Refusals” are coded as such.

**Table 9 - Attrition by Methodology Details in Peru**

		IVR	SMS	CATI
<b>Wave 1</b>	Answered all questions	15%	24%	51%
	Only answered some questions	4%	7%	0%
	No response	80%	70%	49%
<b>Wave 2</b>	Answered all questions	20%	20%	53%
	Only answered some questions	5%	5%	0%
	No response	75%	75%	47%
<b>Wave 3</b>	Answered all questions	17%	22%	51%
	Only answered some questions	4%	3%	0%
	No response	78%	76%	49%
<b>Wave 4</b>	Answered all questions	19%	18%	48%
	Only answered some questions	4%	7%	0%
	No response	77%	75%	52%
<b>Wave 5</b>	Answered all questions	14%	23%	47%
	Only answered some questions	2%	1%	0%
	No response	84%	76%	53%
<b>Wave 6</b>	Answered all questions	18%	18%	39%
	Only answered some questions	2%	3%	0%
	No response	80%	79%	61%

### 5.1.5 Comparison with Attrition in Honduras

One part of Honduran panel (n=600 households) was exposed to all three survey methods studied. They were also surveyed on a more frequent basis and for a relatively shorter period of time (four and a half months vs. six months in Peru)<sup>15</sup>. The surveys were administered in three time blocks, as follows:

**Time One:** this first administration took place between weeks 1 and 6 of the panel study. As part of “Time One”, each panelist was surveyed three times. Each time with the same exact questionnaire, but using a different survey method (SMS, CATI or IVR).

**Time Two:** this administration took place between weeks 12 and 16 of the panel study. As part of the “Time Two” block, each panelist was surveyed three times. Each time with the same exact questionnaire used in Time One, and with the same three methodologies presented in the same order as in Time One.

<sup>15</sup> While the Peru study was primarily concerned with response rate and attrition, the focus of the Honduras study was the evaluation of the stability of the measurements yielded by the different survey methods under study across time. Therefore, the panel study in Honduras was designed to gather identical measurements with each survey method in two periods of time in order to allow for a test-retest reliability analysis. The results of such analysis are discussed in a separate report.

**In-Between:** During the period between Time One and Time Two (weeks 7 through 11), panelists received four SMS surveys with different questionnaires to the ones used in “Time One” and “Time Two”. However, for the purpose of this attrition analysis, only “Time One” and “Time Two” administrations are being considered.

The other part of the Honduran panel (n=900) was only interviewed by SMS after the initial face-to-face interview.<sup>16</sup> This group is not included in this analysis.

### 5.1.6 Overall Attrition in Honduras

The initial attrition rate -- that is, the proportion of respondents who agreed to participate in the panel after the initial face-to-face survey but did not answer the first of the “Time One” round of surveys -- was considerably lower in Honduras than in Peru. While in Peru two-thirds (67%) of recruited households failed to answer the first round of follow-up surveys, in Honduras 4 in 10 (41%) of the recruited households did not participate in the first round of surveys (see Table 10).

The gap between the initial and final attrition -- that is, the additional number of panelists that dropped out of the panel between the first follow-up survey and the end of the study -- was similar in both countries. While in Peru the final attrition was eight percentage points higher than the initial attrition rate (67% vs. 75%), in Honduras it was nine percentage points higher (41% vs. 50%).

**Table 10 – Overall Comparison of Attrition in Peru and Honduras**

	<b>Peru</b>	<b>Honduras</b>
From F2F to Time One/Week 1 for Honduras	67%	41%
From F2F to End of Panel Study	75%	50%

There are several plausible explanations as to why the Honduran panel performed better than the Peruvian one in terms of panelist response and retention:

- Honduras is a smaller and more geographically homogenous country than Peru. Therefore, transportation of paper surveys to the central processing center was more expeditious, allowing for a shorter time gap between panelist recruitment and administration of the first follow-up surveys. In fact, the average time elapsed between the recruitment and the first survey in Honduras was 7 days, while in Peru it was 15 days. So, it is likely that some Peruvian panelist forgot about the survey and disregarded the invitations to participate in the successive survey waves.
- Gallup’s field operations partner in Honduras (CID-Gallup) is a very well-known and trusted firm in that country – probably to a greater extent than Directo, the Peruvian fieldwork partner, is in Peru. Therefore, it is possible that panelists in Honduras felt more confident responding to the follow-up surveys than their Peruvian counterparts.
- Panelists in Honduras were surveyed more frequently and for a shorter period of time (four and a half months vs. six months in Peru) than their Peruvian counterparts. They were also

<sup>16</sup> For additional details on the survey design and survey administration schedule used in Honduras, please refer to Appendix A.

surveyed through different means (IVR, SMS and CATI). Therefore, it is possible that they became more aware and expectant of the follow-up surveys. This could partially explain the lower final attrition of Honduran panelists. To be sure, it cannot account for the higher response rate to the first follow-up surveys we saw in Honduras.

- Fieldwork in Peru took place in December, while in Honduras it happened in February and March. December is not an ideal month to conduct surveys in Peru, because people are especially busy due to Christmas celebrations and some might be traveling to visit relatives or friends.

### 5.1.7 Attrition by Methodology in Honduras

As Tables 11 and 12 reveal, all three survey modes showed lower levels of initial and final attrition in Honduras when compared to the Peruvian figures. In both countries, CATI surveys generated the lowest attrition in “Time One” and “Time Two”, followed by SMS and IVR. However, in the case of Honduras “Time Two” attrition levels increased quite significantly for CATI while remaining stable for SMS and IVR. Still, attrition for CATI was much lower than for the other two methodologies throughout the whole study in both countries, especially in Honduras.

**Table 11 – Initial Attrition/Non-Response by Methodology (Peru vs. Honduras)**

<b>Initial F2F to Wave 1/ (Week 1 for Honduras)</b>	<b>Peru</b>	<b>Honduras</b>
IVR	80%	60%
SMS	70%	55%
CATI	49%	12%
<b>Overall</b>	<b>67%</b>	<b>41%</b>

**Table 12 – Final Attrition/Non-Response by Methodology (Peru vs. Honduras)**

<b>Initial F2F to End of Panel Study</b>	<b>Peru</b>	<b>Honduras</b>
IVR	81%	62%
SMS	79%	60%
CATI	61%	28%
<b>Overall</b>	<b>75%</b>	<b>50%</b>

### 5.1.8 Attrition by Level of Urbanization in Honduras

Panelists from urban areas in Honduras were more likely to participate in Time One than those from rural areas (the respective non-response rates were 35% and 45%). However, this difference was not observed in Time Two (see Table 13). In contrast, in Peru this gap still existed at the end of the study (70% vs. 80%, respectively).

**Table 13 - Attrition by Level of Urbanization in Honduras**

	Level of Urbanization	
	Urban	Rural
<b>Initial F2F to Wave 1 (weeks 1-6)</b>	35%	45%
<b>Initial F2F to Wave 2 (weeks 12-16)</b>	49%	50%

### 5.1.9 Callbacks to respondents who did not participate in the first four waves in Peru

After wave 4 was completed in Peru, those recruits who originally agreed to join the panel but who did not take part in any of the first 4 waves were contacted by phone using CATI technology in order to inquire why they had not answered the surveys. Out of the 633 numbers called, 149 panelists answered the call; 101 out of these 149 agreed to take part in the last two rounds of the study.

Out of the 101 panelists that agreed to participate in the last two rounds of the program, 41 belonged to the IVR group and 60 to the SMS group.

Table 14 presents the most important reasons explaining why panelists had not responded to SMS or IVR surveys. Eighty-one respondents gave such reasons.<sup>17</sup> Out of these 81 panelists about one in five (or 21 panelists) reported some kind of reluctance to use a self-administered method (preferred to be called). About 80% (or 16 of these panelists) belonged to the SMS group. Again, it should be noted that the original SMS sample for Peru was much larger than the samples for IVR and CATI.

Furthermore, a quarter of panelists (or 20 out of 81) giving reasons for not participating said they would like to be contacted at different times. Finally, eighteen percent of the panelists simply changed their minds and did not want to participate anymore (some of them said they were too busy).

**Table 14 – Most Important Reasons for Not Participating in 4 Waves**

<b>Could you tell me the reasons why you could NOT answer ANY of the questions we sent you?</b>	<b>Frequency</b>	<b>Valid percent</b>
Reluctance to use self-administered methods/Prefers to be called	21	26%
Prefers to be contacted at different times	20	25%
Does not want to participate anymore	18	22%
New cell phone number	6	7%
Problems with phone signal	4	5%
Not at home/Traveling	4	5%
Other reasons	8	10%
<b>Total</b>	<b>81</b>	<b>100%</b>

<sup>17</sup> Please note that these were open-ended questions.

Although 101 panelists agreed that they would take part in the last two rounds of the survey, only a handful actually did so. Eleven panelists participated in wave 5 (3 by SMS and 8 by IVR) and 8 in wave 6 (4 by IVR and 4 by SMS).

#### 5.1.10 Reasons for not participating in any of the 6 waves in Peru

Panelists in Peru who did not participate in any of the 6 waves were asked for the reasons why they had not done so, despite their agreement to participate in the initial Face to Face interview. Respondents were allowed to give several answers to this open-ended question and 412 mentions were recorded. As Table 15 reveals, out of these 412 mentions, 15% indicated lacking phone signal and 13% reported lack of time. Another 13% of mentions were problems with receiving the surveys, while 12% of mentions referred to the loss or theft of the cell phone.

Another important reason volunteered was “not knowing how to answer the questions (11% of mentions), followed by problems in understanding the questions (9%) and the damage of the cell phone (8%). Also, some respondents thought that they were charged when answering the survey (7% of mentions).

**Table 15 – Reasons for Not Responding Among Panelists Not Participating in Any of the Six Waves**

<b>Q12: Could you tell me the reasons why you could NOT answer ANY of the questions we sent you?</b>	<b>Frequency</b>	<b>Valid Percent</b>
Did not have phone signal	62	15%
Did not have time/was busy	54	13%
Did not receive the surveys	52	13%
Does not have this cell phone anymore (loss/theft)	51	12%
Did not know how to answer	44	11%
Did not understand the questions	38	9%
Cell phone was damaged	34	8%
Was charged when answering the survey	29	7%
Other reason	17	4%
Did not want to answer	15	4%
Had problems with electricity/cell phone could not be charged	8	2%
Answered all surveys received/does not believe to have skipped some	4	1%
Questions all seemed the same	3	1%
Don't know	1	0%
<b>Total</b>	<b>412</b>	<b>100%</b>

#### 5.1.11 Willingness to Participation in Future Studies in Peru

Among those who had participated in all monthly surveys (n=169) 95% said that they would participate in a project like this in the future. Of those who responded some monthly surveys (n=260) 73% indicated their willingness to participate in the future. The corresponding proportion among panelists who had not taken part in any of the monthly surveys (n=271) was 51%.

### 5.1.12 Motivations to Participate in Future Studies

Besides the re-contact telephone surveys, Gallup conducted face to face closing surveys among 700 panelists. As part of this survey, panelists were asked what would motivate them to keep on participating in a project like this in the future. Here again, panelists were allowed to give several answers to this question, and 525 mentions were recorded.

As table 16 shows, the single most frequently mentioned motivation to participate in the future was an economic incentive either in monetary form, cell phone credit or a gift (20% of mentions). However, when adding up all the answers related in some way to the “project’s mission”, the motivation that this project will improve people’s lives in the long-term seems to be significantly more important for panelists than one-time monetary incentives. These obviously include the 14% of mentions of people who hoped that the project improved people’s or their own living standards and the 13% who would be motivated if they could report about the socio-economic reality of people’s lives.

However, it seems that many other frequently named motivations are related as well to this hope for better future lives. For instance, some panelists would be encouraged to participate if their opinion was heard (8% of mentions), others wished to be asked questions that would be more targeted towards the panelists’ lives (6%) and some said they would be motivated if the study’s result were published (5%).

**Table 16 - Top 10 Motivations to Take Part in the Future Panel Surveys (Peru)**

<b>What would motivate you the most to keep on participating in a project like this in the future? I would be motivated if I...</b>	<b>Frequency</b>	<b>Valid percent</b>
Received monetary incentive/ credit/ gift	105	20%
Project improves people’s or their own living standards	75	14%
Could report about socio-economic reality of people’s lives	69	13%
My opinion would be heard	42	8%
The questions asked more about my life	34	6%
Results were published	28	5%
Project would be this World Bank study	27	5%
Survey questions were simplified, instructions clarified	24	5%
Received higher cell phone credit	21	4%
Received frequent updates about project	13	2%
Other motivations	87	17%
Total	525	100%

Moreover, some panelists stated that they would like to take part in future surveys if they were a continuation of this World Bank study (5% of mentions). Others would be motivated if questions were simpler and instructions clearer (5%), cell phone credit gifts were higher (4%) and more frequent updates about the project were given (2%).

### 5.1.13 Discussion of Attrition Results

The mobile phone panel supporting the L2L pilot program in Peru and Honduras faced the attrition challenges that are typical of the studies of its kind, plus some challenges that can be attributed to the nature of the data collection methods used.

Among the challenges that are typical of panel studies, perhaps the most critical one is earning the trust and commitment of panelists to respond to the first survey after recruitment. As this study shows, most attrition occurs between recruitment and first re-contact. Once, panelists respond to the first survey, attrition is marginal and frequent contact and economic incentives seem to be important for minimizing it.

In terms of minimizing panelist non-response between recruitment and first re-contact, the following aspects seem to be critical, although their relative importance remains unknown (as measuring it was not part of the objectives of the study):

- The time elapsed between recruitment and first re-contact. As mentioned before, logistic difficulties related to timely transportation of paper questionnaires in Peru affected the timeliness of re-contacts, causing a higher non-response than in Honduras, where re-contacting took significantly less time.
- Awareness and credibility of the entity conducting the study. Gallup's field partner in Honduras is a much better known firm than its Peruvian counterpart is in Peru. This presumably helped build credibility for the study among Honduran panelists, thus resulting in a lower non-response rate.
- As discussed, the economic incentives did not seem to have led to a higher response rate in first re-contact surveys (although they did help containing attrition thereafter). Therefore, psychological incentives (i.e. a clear communication of the study's mission) seem to be most important to that end. This is supported by the fact that Peruvian panelists express willingness to participate in similar studies in the future mentioned some aspect of the project's mission as their primary motivation to do so.

The results of this study also suggest that attrition levels were affected by factors inherent to the data collection methods used. Among these findings are:

- Higher attrition rates among older, less educated, less affluent panelists. It is possible that these panelists are less familiar or comfortable with using high-tech devices such as mobile phones, and presumably lack the skills required to operate certain cellular phone functions. This could be reflected in the fact that, among non-responsive panelists interviewed after wave 4 in Peru, 11% said they did not know how to answer the surveys.
- Higher attrition among panelists living in rural areas. Besides the fact that rural areas tend to concentrate less educated and less affluent populations, panelists from these areas are likely to have faced more problems receiving the survey calls/ invitations due to less widespread cellular phone coverage.

- Despite being an undesired effect, the mobile panel's loss of statistical representativeness as a result of a disproportionately higher attrition among older, poorer, less educated, people living in rural areas, does not necessarily invalidate it as a viable method for nationally representative studies such as L2L. That is to say, that such disproportion can be effectively addressed by increasing the panel size and applying a post-stratification (weighting) scheme.<sup>18</sup>
- Higher attrition rate and lower survey completion rate among panelists who were exposed to self-administered methods (IVR and SMS). The absence of an interviewer seems to have affected the response to the first re-contact survey, as the groups exposed to the CATI methodology showed a lower non-response rate. This seems to be reinforced by the finding that, of those Peruvian panelists surveyed about their lack of response to the panel, 26% said they prefer to be interviewed by a person.
- The above-mentioned problems seem to be more severe in the case of IVR, which has the additional inconvenience that survey calls are lost for good when not answered immediately (as opposed to SMS surveys where messages remain in the phone's inbox allowing for a later response).
- Also, panelists responding the surveys via IVR or SMS showed a higher propensity to leave questions unanswered than did respondents answering via CATI, which suggests that interviewers are important for ensuring that respondents give consideration to all the survey questions.

## 5.2 Criterion Validity Results

### 5.2.1 Presentation of Criterion Validity Results

In order to test the criterion validity of the SMS measurements in Honduras, the results generated by SMS and Face to Face surveys were compared for eight different questions. These questions inquired about factual information on household infrastructure (i.e. the possession of TV, and sanitary infrastructure), factual information on access to the internet inside or outside the household, and perceptual information (i.e. whether the respondents considered themselves poor).

Table 17 shows that responses to all questions by SMS differ from those collected via Face to Face by at least 7.4 percent points, a margin that is statistically significant at 95% confidence level. Interestingly, the responses given via SMS significantly underestimate facts regarding household infrastructure, while over-estimating Internet access and self-perceptions on poverty.

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<sup>18</sup> For details on weighting schemes, please refer to our Baseline Face-to-Face Surveys in Honduras and Peru. Methodological Report” prepared by Gallup as part of the L2L Pilot Program.



**Table 17: Comparative results SMS vs. Face to Face in Honduras (percent responding “yes”)**

	<b>F2F (only households that answered question in SMS)</b>	<b>SMS</b>	<b>Difference (F2F-SMS)</b>
Do you currently have a TV at home?	87.9	72.6	15.3
Is the property or house equipped with plumbing for water?	98.7	86.5	12.2
Does your house have any type of sanitary/bathroom facilities?	96.5	88	8.5
Do you have access to internet from somewhere outside your home, such as work, school, internet café or room, or library?	19.5	35.1	-15.6
In the last 30 days, have you had access to internet through any available computer, or not?	17.4	28.9	-11.5
Do you consider yourself as poor?	65.3	72.7	-7.4
When you were 15 years old, do you think you and your parents were poor?	69.2	77.6	-8.4

Several hypotheses could at least partially help explain these results. First of all, most Face to Face surveys were answered by the heads of the households. However, when they were invited to participate in the panel for follow-up interviews, they were told they could answer those follow-up surveys themselves or seek help from a permanent household member 15 years of age or older.<sup>19</sup>

Apparently, the advice to seek help from other household members was heeded by many heads of households, and they seem to have sought help from younger household members. In fact, when responding to SMS surveys, panelists were more likely than with other methods to enter a year of birth and gender that didn't match those gathered during the Face to Face survey.<sup>20</sup> This suggests that many SMS surveys were answered by different informants. Furthermore, the median year of birth obtained from the Face to Face survey (1979) was two years higher than the one obtained from the SMS survey (1981), which not only corroborates that SMS surveys were often answered by different informants, but also that such informants were often younger household members.

These results also help explain the higher proportions of panelists reporting Internet access and usage in the SMS survey, compared to the initial Face to Face round. Younger informants may also be more critical of their living conditions than heads of households and, therefore, they are more likely to perceive and declare themselves and their families as poor, which could help explain the higher “yes” answers to these questions in the SMS surveys.

<sup>19</sup> This was a deliberate instruction given to panelists in order to maximize response rate.

<sup>20</sup> Year of birth and gender were asked at the beginning of the surveys for validation purposes but surveys were not discontinued when these data didn't match.

Nonetheless, while the “different informant” hypothesis appears to be a plausible explanation for some of the differences, it is not sufficient as it does not seem useful for explaining the differences observed in the questions regarding household infrastructure. To be sure, these are factual questions about aspects of the household that are not likely to change in a short period of time, and there is no reason to believe they are sensitive to the demographic characteristics of the informant.

Two of the household infrastructure questions (presence of plumbing for water and availability of sanitary/bathroom facilities) are somehow related to water supply. And it is a known fact that water supply in poor neighborhoods in Honduras maybe intermittent, which in some cases force residents to temporarily block access to their sanitary facilities. So, it is conceivable that when responding to the SMS surveys, some panelists did not focus on the “infrastructure availability” aspect of the question wordings but rather on the generally expected “outcomes” of having sanitary infrastructure, one of which is the consistent access to water.

So, if there was a temporary and widespread water supply problem in Honduras at the time the follow-up surveys were conducted, it should not only be reflected in the SMS surveys but also in the IVR and CATI surveys, which were conducted around the same timeframe. If, on the contrary, lower “yes” answers to the sanitary infrastructure questions were only present in one or two survey methods, it could be evidence of some problem with those methods. This point will be cleared up later on, as we examine the results for IVR and CATI.

The high discrepancy observed for the “possession of TV in the household” question (15.3 percentage points difference) is an interesting result as well. As table 17 shows, when responding to this question via SMS, panelists significantly under-reported “yes” answers, as compared to the F2F survey. Like with the “sanitary infrastructure” questions, the answers to this question are not likely to change in a short period of time, and they should not be affected by the informant’s demographics. A plausible explanation for this discrepancy could be the fear of many Hondurans to fall victim to robbery and other crimes<sup>21</sup>. In a poor country like Honduras, TV sets are arguably the most valuable material possession for many families, as well as their only source of home entertainment. Honduras is also a country plagued by crime. So, it is possible that many respondents did not feel comfortable providing sincere answers to this question via SMS. After all, these surveys were administered nine days after the Face to Face visit (on average). Thus, some panelists could have forgotten about the panel invitation and therefore preferred to deny their possession of TV at home (the TV question was the first one presented in the questionnaire after the validation questions). Here again, if this hypothesis held true, the lower “yes” responses should be evident for all the survey methods tested; although it is fair to say that, in the case of CATI, the interviewers could play a role at building trust and gathering more valid responses.

Finally, it is possible that some of the different results observed between SMS and Face to Face be due, at least in part, to difficulties with handling the mobile phone keypad, handling the SMS function, or both. Some panelists who are not familiar with the use of cell phone keypads may have tried to answer the surveys themselves in spite of our suggestion to seek help from a more skilled household member, thus making mistakes in their answers. Importantly, while all questions had dichotomous scales (“yes”, “no” answers), respondents were required to

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<sup>21</sup> In the Gallup World Poll of Honduras conducted in 2011, only 45% felt safe walking alone at night. In addition, 18% reported that they had money or property stolen from them or another household member in the last 12 months, and 16% said they were assaulted or mugged in same time period.

transpose “yes” responses into the numeric character “1” and “no” responses into “2”. In case they did not know the answer or did not wish to answer they had to type the word “AYUDA” (help) which led them to a screen that instructed them to press “9” in order to move on to the next question. So, it is possible that these requirements caused some of these respondents to type in wrong numbers when answering the survey.

In addition, it is important to mention that a minority of panelists (7% of the sub-sample being analyzed) did not have mobile phone prior to being recruited for the panel. Therefore, the interviewers provided them with brand new mobile phones – along with a brief training on how to use them – so they could participate. While this is a small group that cannot by itself explain the observed discrepancies in the data, they were the panelists whose SMS responses differed the most from those given in the Face to Face interviews, a finding that provides some support to the notion that difficulties with handling the mobile phones could have caused some panelists to blunder when attempting to answer the survey.

The comparative results for the IVR and CATI methods shed light on the hypotheses discussed above.

**Table 17-A: Comparative results IVR vs. Face to Face in Honduras (percent responding “yes”)**

	<b>F2F (only households that answered question in IVR)</b>	<b>IVR</b>	<b>Difference (F2F – IVR)</b>
Do you currently have a TV in your home?	86.4	75.6	10.8
Is the property or house equipped with plumbing for water?	97.1	84.4	12.7
Does your house have any type of sanitary/bathroom services?	97.1	88.1	9
Do you have access to internet from somewhere outside your home, such as work, school, internet café or room, or library?	19.7	34.3	-14.6
In the last 30 days, have you had access to internet thorough any available computer, or not?	20.5	29.3	-8.8
Do you consider yourself as poor?	68.3	75	-6.7
When you were 15 years old, do you think you and your parents were poor?	69.9	77.4	-7.5

**Table 17-B: Comparative results CATI vs. Face to Face in Honduras (percent responding “yes”)**

	<b>F2F (only those who answered question in CATI)</b>	<b>CATI</b>	<b>Difference (F2F – CATI)</b>
Do you currently have a TV in your home?	83.2	84.7	-0.9
Is the property or house equipped with plumbing for water?	97.7	97.7	0
Does your house have any type of sanitary/bathroom facilities?	96.4	96.8	-0.4
Do you have access to internet from somewhere outside your home, such as work, school, internet café or room, or library?	14.7	16.3	-1.6
In the last 30 days, have you had access to internet thorough any available computer, or not?	12.7	12.9	-0.2
Do you consider yourself as poor?	72	73.9	-1.9
When you were 15 years old, do you think you and your parents were poor?	72.4	74.5	-2.1

Before delving into these results, the reader should note that panelists responding to the IVR and CATI surveys also responded to SMS surveys and, therefore, they are part surveys of the analysis discussed above. Consequently, the differences in responses observed between SMS, CATI and IVR, or between any of these and Face to Face<sup>22</sup>, cannot be attributed to demographic differences between them.

As can be seen in table 17-A, the responses collected via IVR show a similar pattern as those collected via SMS, with items related to household infrastructure receiving lower “yes” scores when asked via IVR, while the items related to “Internet access” and “self-perceptions on poverty” received higher scores. Like in the case of SMS, the observed differences between IVR and Face to Face are statistically significant.

The answers collected via CATI (in Table 17-B), on the other hand, were almost identical to the ones collected Face to Face, with no item showing a statistically significant difference.

<sup>22</sup> While the analyses presented in the tables 17, 17-A, and 17-B are theoretically based on the same panelists, it is important to note that some panelists failed to respond to some questions in one or more methods. This explains the slight differences in the Face to Face responses across tables.

### 5.2.2 Discussion of the Criterion Validity Results

The following implications can be derived from these results:

- The response differences observed between SMS and Face to Face (Table 17) cannot be confidently attributed to the “visual nature” of the SMS method, since IVR is an aural oral method and generated similar response patterns as SMS (Tables 17 and 17-A).
- The differences between the SMS and Face to Face responses in the “sanitary infrastructure” questions cannot be confidently attributed to water supply problems in the country, since these differences were not observed in the CATI versus Face to Face comparison.
- The response differences observed between SMS and Face to Face could have been caused - at least partially - by difficulties manipulating the mobile phone keypad on the part of some panelists. This assertion is based on the fact that IVR also requires manipulation of the cell phone keypad, and it generated a similar response pattern to SMS (Tables 17 and 17-A). Also, while the CATI survey relied on mobile phones as well, it did not require panelists to respond by handling the keypad.
- However, the most substantive commonality between SMS and IVR is the fact that both methods are self-administered. It is also a key differentiating factor between these methods and CATI and Face to Face, both of which are administered by trained interviewers. Therefore, the fact that the response patterns between SMS and IVR were quite similar on one hand; and the responses to the Face to Face and CATI surveys were almost identical, on the other, supports the notion that the presence of interviewers (or their absence) is a strong candidate explanation for the observed differences. In other words, the self-administered/interviewer-administered dimension of this criterion validity analysis is perhaps the most plausible explanation for the above discussed findings.
- It is hard to determine with certainty what role interviewers played at eliciting more valid responses. That is, responses which are more comparable to the criterion measurement (or Face to Face responses). Nonetheless, the data shows that when answering the CATI survey, respondents were more likely to provide verification information (year of birth and gender) that matched the information provided during the Face to Face recruitment, which suggests panelists did not seek the help of other members of the household as much as they seem to have done with SMS. Also, it is possible that interviewers instilled confidence in respondents, thus minimizing the possible “fear” to give an honest answer to question on TV possession. Lastly, the interviewers may have helped to keep the respondents on task (thus, avoiding distractions) and repeated question wordings whenever the respondent was in doubt.
- Finally, it is important to note that the questions analyzed as part of this analysis showed a better criterion validity than questions related to perception of fluctuations on household economics. Also, the questions analyzed are the simplest type of questions that can be asked (dichotomous scales), an aspect that should be kept in mind when attempting to extrapolate the results of this criterion validity analysis.

### 5.3 Test-Retest Reliability Results

In order to test the reliability of SMS measurements, Gallup conducted two identical SMS measurements of the same questions analyzed in the criterion validity analysis discussed above. The surveys were administered to a group of 356 panelists.<sup>23</sup> Also, for comparative purposes, Gallup performed repeated administrations of these questions by means of Face to Face, IVR and CATI on the same group of panelists.<sup>24</sup> In all cases, the repeated measurements were performed within a minimum of 10 weeks from the first administration. Table 18 shows the results of the test-retest analysis performed by computing a Cronbach Alpha reliability coefficient for each survey method in Honduras.<sup>25</sup>

**Table 18: Test-Retest Reliability for SMS in Honduras**

	n	Percent “Yes” Time 1	Percent “Yes” Time 2	Pearson Correlation	Cronbach Alpha
Do you currently have a TV at home?	158	72%	73%	0.74	0.87
Is the household equipped with plumbing for water?	156	89%	87%	0.65	0.79
Does household have sanitary/bathroom facilities?	152	89%	88%	0.58	0.74
Do you have access to internet from somewhere outside your home?	153	33%	32%	0.61	0.76
In the last 30 days, have you accessed the internet, or not?	153	24%	29%	0.54	0.70
Do you consider yourself poor?	153	76%	76%	0.40	0.57
When you were 15 years old, do you think you and your parents were poor?	151	81%	82%	0.58	0.73
<b>Total Reliability</b>					<b>0.74</b>

Overall, the SMS measurements seem to have been quite consistent, as shown by the “yes” scores collected at “time 1” and “time 2” for each question. However, some variability appears to have occurred on the other points of the scale (i.e. “No”, “Don’t Know” and “Refused”), as the correlation coefficients range from .44 to .67, indicating a weaker covariance than the “yes” scores would suggest. The Cronbach Alpha scores also suggests a very good level of reliability overall (.74)<sup>26</sup>. Also, as can be expected, the items inquiring about factual information (i.e. on

23 The actual sample size varies by question due to non-response.

24 The actual number of panelists for each method varies due to differences in attrition rates across methods.

25 By design, the reliability test was only performed in Honduras.

26 The Cronbach Alpha reliability coefficient obtained in an identical test-retest analysis performed with the Face to Face method was quite close (.77). Face to Face was held as the benchmark methodology in this study.

household infrastructure) show a higher reliability than the items measuring perceptions on poverty.

Tables 18-A, 18-B and 18-C show the test-retest reliability analysis for IVR and CATI, as well as the comparative Cronbach Alpha coefficients for all three methodologies.

**Table 18-A: Test-Retest Reliability for IVR in Honduras**

	n	Percent "Yes" Time 1	Percent "Yes" Time 2	Pearson Correlatio n	Cronbach Alpha
Do you currently have a TV at home?	146	75%	74%	0.88	0.93
Is the household equipped with plumbing for water?	137	88%	87%	0.77	0.87
Does household have sanitary/bathroom facilities?	141	87%	87%	0.78	0.88
Do you have access to internet from somewhere outside your home?	139	35%	32%	0.71	0.83
In the last 30 days, have you accessed the internet, or not?	136	29%	29%	0.65	0.79
Do you consider yourself poor?	135	79%	77%	0.72	0.84
When you were 15 years old, do you think you and your parents were poor?	134	79%	83%	0.84	0.91
<b>Total Reliability</b>					<b>0.86</b>

**Table 18-B: Test-Retest Reliability for CATI in Honduras**

	n	Percent "Yes" Time 1	Percent "Yes" Time 2	Pearson Correlatio n	Cronbach Alpha
Do you currently have a TV at home?	411	87%	73%	0.50	0.65
Is the household equipped with plumbing for water?	411	99%	91%	0.38	0.55
Does household have sanitary/bathroom facilities?	411	96%	92%	0.49	0.65
Do you have access to internet from somewhere outside your home?	411	16%	28%	0.69	0.81
In the last 30 days, have you accessed the internet, or not?	411	12%	19%	0.79	0.86
Do you consider yourself poor?	409	73%	82%	0.51	0.68
When you were 15 years old, do you think you and your parents were poor?	409	74%	83%	0.46	0.63
<b>Total Reliability</b>					<b>0.69</b>

**Table 18-C: Test-Retest Reliability for IVR, SMS and CATI in Honduras (Cronbach Alpha Coefficients)**

	<b>IVR</b>	<b>SMS</b>	<b>CATI</b>	<b>All Methods Combined</b>
Do you currently have a TV at home?	0.93	0.87	0.65	0.93
Is the household equipped with plumbing for water?	0.87	0.79	0.55	0.89
Does household have sanitary/bathroom facilities?	0.88	0.74	0.65	0.91
Do you have access to internet from somewhere outside your home?	0.83	0.76	0.81	0.92
In the last 30 days, have you accessed the internet, or not?	0.79	0.70	0.86	0.89
Do you consider yourself poor?	0.84	0.57	0.68	0.91
When you were 15 years old, do you think you and your parents were poor?	0.91	0.73	0.63	0.92
<b>Total Reliability</b>	<b>0.86</b>	<b>0.74</b>	<b>0.69</b>	<b>0.91</b>

As can be seen in the tables above, IVR stands out as the method that generated the most reliable responses overall, followed by SMS and CATI which came quite close to each other. Interestingly, IVR responses proved very reliable for all the items tested, outperforming the other two methods in all but one item (past 30 day access to the Internet), where CATI fared somewhat better.

It is also interesting that both, IVR and CATI, outperformed SMS in those items that inquire about personal Internet access, which could be explained by the pattern observed in the criterion validity analysis, where SMS surveys were most often responded by younger informants. Therefore, it would appear that the reliability of these questions tends to be affected by an “informant switching” behavior when asked via SMS.

The CATI responses show an intriguing pattern. Both, perceptual and factual items behaved somewhat unreliably when compared to the Internet-related items for the same method. It should be remembered that CATI was the best performing method in terms of criterion validity, with almost identical responses to the ones collected via Face to Face. So, coming from such a high standard of comparability and stability, it is perhaps reasonable to expect that its responses would look relatively less reliable than those of IVR and SMS sometime down the road.

Another important aspect of this analysis is the fact that the self-administered/interviewer-administered dimension does not seem to explain the reliability differences encountered. The top performing method (IVR), is a self-administered method, while SMS and CATI – which fared similarly in the test – are self-administered and interviewer-administered methods, respectively. It should be remembered that the presence of interviewers (or their absence), was a crucial



factor in explaining the differences found in the criterion validity analysis. So, since it is no longer the case for the reliability analysis, alternative explanations need to be considered.

A closer look at the survey methods being evaluated, suggests that IVR was probably the one that required the shortest time and the least amount of human intervention for its administration. The IVR system would call respondents and play a pre-recorded greeting, followed by instructions and the actual survey questions. Respondents had to press buttons on their mobile phones keypad to answer the questions. The use of a recording guaranteed that the questions were read exactly the same way in each administration, thus controlling for potential errors derived from inconsistent question reading. Besides, it is possible that respondents had to pay close attention to these recordings, as it was obvious that they would not be able to obtain much help or clarification if they missed something.

SMS, on the other hand, relies on the respondent's reading comprehension ability and attention span. Since questions remain in the phone's inbox until the respondent answers them, respondents could conceivably multitask during the survey administration without missing questions.

Somewhat similarly, the CATI surveys could have been affected by human factors. Due to logistic considerations, the interviewers who conducted the first surveys were not necessarily the same ones that conducted the second administrations. Thus, although unlikely, there could have been significant variance in speed of reading, intonation, clarity, mastery of the questionnaire, etc.

Alternatively, it could be hypothesized that having a different interviewer re-contact the households to ask the exact same questions could have brought back some anxiety or fear in some respondents. If such was the case, the findings would suggest that, for panel studies such this one, having no human contact in the administration of repeat surveys is more beneficial for reliability purposes than having inconsistent human contact. This remains, nonetheless, an intriguing set of findings that would require additional research to understand in a more satisfactory manner.

Importantly, for all methodologies the "yes" responses were quite consistent (as shown by Tables 18, 18-A and 18-B above), which means most of the variability observed was due to inconsistencies between the ("No and "Don't know/ Refused" answers). This is an aspect that deserves proper attention as it demonstrates that no methodology performed poorly in terms of consistently accounting for "presence" of the phenomena inquired by the questions tested.

Now, it is also true that the questions being tested measure phenomena that are not likely to change in short periods of time. They are also dichotomous ("yes/ "no") questions, the simplest type of questions that can be asked. These are important considerations to keep in mind when attempting to extrapolate these results outside of the boundaries of this study.

As part of the L2L pilot, Gallup also performed a test-retest exercise with "time variant" questions measuring food availability in the household. Unfortunately, these questions were only asked via SMS. Therefore, it is impossible to determine to what extent the changes observed in the data reflect actual fluctuations in the phenomenon being measured, or reliability problems with SMS. Nonetheless, the proportions of "yes" answers and Cronbach Alpha coefficients speak favorably of the measurement's reliability, considering the nature of the questions asked. Table 19 shows the results of this additional exercise.

**Table 19: Test-Retest Reliability for SMS in Honduras (Time Variant Questions)**

	n	Percent “Yes” Time 1	Percent “Yes” Time 2	Pearson Correlation	Cronbach Alpha
Worried about no food at home	339	82%	78%	0.397	0.57
Run out of food at home	340	63%	60%	0.418	0.59
Stopped eating healthy food	335	70%	71%	0.524	0.69
Diet with little variety	333	75%	72%	0.471	0.64
Stopped having breakfast	334	54%	56%	0.499	0.69
Eaten less than they should	333	70%	68%	0.580	0.73
Hungry but could not eat	333	59%	59%	0.622	0.77
Eaten once a day or stopped eating	333	48%	51%	0.593	0.75
<b>Total Reliability</b>					<b>0.68</b>

## 6. Conclusions

The results of the L2L pilot program indicate that the SMS surveys performed quite satisfactorily in terms of generating **reliable**<sup>27</sup> measurements. That is, measurements that show stability across at least two administrations, as part of a test-retest study. This conclusion is supported by the fact that the Cronbach Alpha reliability coefficient obtained for SMS (.74) is very close to the one obtained for Face to Face (.77) in the same test-retest exercise. Face to Face was considered as the benchmark method in the context of this study.

However, SMS did not perform satisfactorily in terms of **validity**<sup>28</sup>, as it failed to generate measurements that are comparable, within an acceptable margin of error, to those collected via Face to Face surveys. SMS performed similarly to IVR and was outperformed by CATI, which suggests that its self-administered nature is its most critical detrimental factor for generating comparable data.

There is evidence indicating that SMS surveys were more likely to be answered by informants other than the household member who answered the initial Face to Face (criterion) surveys, a behavior that was deliberately encouraged by interviewers in order to maximize response rates. While this behavior did affect the criterion validity of SMS responses, it is not deemed sufficient to explain the magnitude of the discrepancies observed between the Face to Face and SMS surveys.

<sup>27</sup> Reliability in the context of this study referred to the stability of the test measurement over repeated time-lagged administrations.

<sup>28</sup> Validity in the context of this study referred to the comparability of the test measurement to a criterion measurement. In this case, identical data collected by means of Face to Face surveys.

The SMS mode poses challenges with regards to panelist attrition, the major challenge being higher levels of attrition among older, less educated and less affluent residents in rural areas, due to their relative lack of familiarity with using mobile phones. The self-administered nature of SMS seems to be the most plausible explanation for this outcome, as it was also observed for IVR, the other self-administered method tested.

The SMS mode outperforms IVR in terms of attrition containment but is outperformed by CATI. Therefore, if SMS was to be implemented as a primary data collection method, it would be advisable to supplement it with a team of phone operators who would assist panelists who need to troubleshoot technical issues. These operators would also provide the “human touch” that some panelists seem to need in order to participate and complete surveys.

In spite of these shortcomings, SMS emerges from the study as a feasible survey method for general population studies where data comparability with Face to Face surveys is not of essence.

Also, given the fact that most of the limitations of SMS surveys revealed by this study stem from its self-administered nature, it is conceivable that they could be minimized by placing greater emphasis on panelist training, as well as on devising mechanisms for controlling “informant switching”. For instance, a better training and incentive scheme applicable to all the family members potentially involved in the survey, including more control of the technical skills of the potential informants, could help reduce some of the measurement validity issues encountered.

Furthermore, additional attrition containment mechanisms could be put in place, based on the lessons learned from the L2L pilot. Particular attention should be given to the time elapsed between panel recruitment and the first re-contact surveys. To that effect, available technology – such as mobile device survey software capable of capturing and transmitting data via cell phone or wireless internet connection – could be used to shorten the time between recruitment and first contact.

Other mechanisms for mitigating the undesired effect of attrition of certain demographic groups, are the use of larger panels, and the continued refinement of post-stratification weighting schemes.

Also, due to the mounting evidence – supported by this study – indicating that survey respondents tend to support surveys that are meaningful to them, the mission of L2L should be very further emphasized when recruiting panelists for future phases of this program.

Finally, some of the limitations of SMS surveys unearthed by this study are likely to disappear over time, as more people in developing countries acquire skills to handle the SMS function of their mobile phones.

## Appendix A: Survey Design Honduras

Group	Time 1										Time 2						
	Feb.13	Feb.20	Feb.27	Mar.5	Mar.12	Mar.19	Mar.26	Apr.2	Apr.9	Apr.16	Apr.23	Apr.30	May.7	May.14	May.21	May.28	June.4
1	F2F1	SMS1	IVR1	CAT11			SMS2	SMS3-A	SMS3-B	SMS4		SMS1	IVR1	CAT11		SMS2	F2F1
2		F2F1	CAT11	SMS1	IVR1		SMS2	SMS3-A	SMS3-B	SMS4			CAT11	SMS1	IVR1	SMS2	F2F1
3			F2F1	IVR1	CAT11	SMS1	SMS2	SMS3-A	SMS3-B	SMS4			IVR1	SMS1	CAT11	SMS2	F2F1
Extra 1	F2F1	SMS1					SMS2	SMS3-A	SMS3-B	SMS4			SMS1			SMS2	
Extra 2		F2F1	SMS1				SMS2	SMS3-A	SMS3-B	SMS4				SMS1		SMS2	
Extra 3			F2F1	SMS1			SMS2	SMS3-A	SMS3-B	SMS4					SMS1	SMS2	

\* A household was invited to take part in a survey using each methodology at least twice during the study. The questionnaires for time 1 and time 2 were identical within and across methodologies.

\* After the first face-to-face administration, each group was exposed to the remaining 3 methodologies according to a randomization scheme (3 rotations, one methodology per week).

\* All households were interviewed face-to-face upon panel recruitment (and some at the very end of the study). Therefore, face-to-face could not be part of the random rotation scheme.

\* Any additional household that remained in the panel was only interviewed via SMS (Groups Extra 1, Extra 2 and Extra 3 above).

\*The data collection process was carefully controlled to ensure that all the groups within the sample were representative of the population.

## Appendix B: Questionnaire Honduras Initial Face-to-Face

QUESTIONNAIRE No.

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Sa. COUNTRY: HONDURAS

A.- GEOGRAPHIC IDENTIFICATION		B.- SAMPLE IDENTIFICATION		C.- CONTROL DATA	
0.- Country	HONDURAS	5.- Socio-economic status			
1.- Department		6.- PSU/Segment		10.- Total number of people in household	
2.- Municipality		7.- Residence		11.- Number of residents 15 and over	
3.- City		8.- Area: Urban....1 Rural.....2			
4.- District or Estate		9. Region: Tegucigalpa...1 San Pedro Sula...2 City of 10 or more...3 Other...4		Interviewer:	
D. DATE OF INTERVIEW		E. RESULT OF INTERVIEW		Supervisor:	
1st Visit: ___ / ___ /2012 2nd Visit: ___ / ___ /2012		1. Completes survey and agrees to be part of the panel 2. Completes survey and refuses to be part of the panel 3. Incomplete 4. Replaced 5. Other: - _____		Coder:	
				Data entry clerk:	
Name of respondent:					
Address:					

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<b>INCECON</b>	<b>1</b>	GROUP A: ZERO
	<b>2</b>	GROUP B: 20 Lps.
	<b>3</b>	GROUP C: 100 Lps.

<b>Date</b>	<b>Day/Month/Year:</b>	
<b>Start Time (Hour/Minute):</b>	Hour:	Minute:

Good morning/afternoon/evening, my name is \_\_\_\_\_ and I work for CID-Gallup, an internationally renowned opinion polling company. Would it be possible to speak to the head of the household?

**IF THE HEAD OF THE HOUSEHOLD IS NOT AVAILABLE:** Would you be able to tell me when I could return in order to speak with the head of the household?

**Note the day and time and return:** \_\_\_\_\_

**IF ON THE SECOND VISIT, IT IS NOT POSSIBLE TO SPEAK TO THE HEAD OF THE HOUSEHOLD, ASK:** Would it be possible to speak to someone 15 and over who is a permanent resident at this house?

- 1 Yes (Continue)
- 2 No (Ask when a suitable person will be available. If this is within a reasonable amount of time, wait. Otherwise record as "no one available at the household" on the route sheet and continue the route to visit another house.)

**IF SEVERAL PEOPLE 15 AND OVER ARE AVAILABLE, ASK FOR WHOEVER WILL CELEBRATE THEIR BIRTHDAY NEXT AND READ THE INTRODUCTION.**

Now with THE RESPONDENT

## Introduction:

Good morning/afternoon, my name is \_\_\_\_\_ and I work for CID-Gallup, an internationally renowned opinion polling company. The World Bank has contacted us to complete an interesting survey on social and economic issues, in particular, the situation of households in Honduras. This study is being conducted in several countries throughout Latin America, and your answers will help us to understand more about the opinions and living conditions of Hondurans.

Your participation is extremely important to the success of this study. All your responses will be treated with the utmost confidentiality. They will only be analyzed anonymously together with those of hundreds of other people.

**Would you be available to offer me a few minutes of your time? I really appreciate your assistance. Thank you.**

- 1 Yes **(Continue)**
- 2 No (Ask for another member of the household 15 or over that is available to speak to us – Repeat introduction. If the head of the household is unwilling for anyone else to participate, record the refusal on the route sheet and continue with the route)

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**S1.** Could you tell me whether you have participated in any surveys that have been carried out at your household in the last 6 months?

1 Yes **(Continue)**

2 No **(Go to H1)**

**S2.** Have you responded regularly to surveys in the last 6 months, or was it an isolated survey (only once)?

1 Regular surveys **(Thank and End Interview)**

2 Isolated Survey – Once **(Continue)**

**S3.** Can you remember the type of questions they asked you in this isolated survey? **(READ 1 – 6)**

1 Political issues

2 Social issues

3 Brands or products that you use

4 Satisfaction with services you receive (Bank, Telephone, etc.)

5 General aspects of the country and community in which you live

6 Other: \_\_\_\_\_ (Specify)

7 Does not remember

**H1.** Are you the head of the household?

1 Yes

2 No

**H2.** Including yourself, how many people currently reside in this household? Please only count those that live in **Honduras**. **(Code exact number)**

\_\_\_\_\_ Total number of persons in household

00 None

98 (Not known)

99 (No response)

**H3.** Could you tell me how many children under the age of 15 currently reside in this household? **(Code exact number)**

\_\_\_\_\_ Total number of children in household

00 None

98 (Not known)

99 (No response)

**H4.** Could you tell me how many people in total have slept and eaten here in the last 6 months?

\_\_\_\_\_ Total

00 None

98 (Not known)

99 (No response)

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	NAME AND SURNAME (H5)	RELATIONSHIP TO HEAD OF HOUSEHOLD (H6)	VAL. 1 SEX (H7)	VAL. 2 AGE (H8)	CURRENT MARITAL STATUS (H9)	Does this person know how to read and write? (H10)	What is the highest level of education this person has attained? (H11)	Is this person employed? (H12)
	Record the names and surnames of the people who regularly reside in this household, in the following order: 1. Head of the Household 2. Spouse (or partner) 3. Children from oldest to youngest 4. Step-children from oldest to youngest 5. Parents 6. Siblings 7. Sons-in-law and daughters-in-law 8. Other relatives (grandchildren, grandparents, uncles and aunts, nieces and nephews, cousins, etc.) 9. Other non-relatives (mothers/fathers-in-law, brothers/sisters-in-law, guests, friends, etc.) 10. Domestic staff 11. External contributor	Relation of each person to the head of the household (NOTE: Use codes from H5 to identify the relationship of the person to the head of the household)	1. Male 2. Female C O D E	What is this person's date of birth? (dd-mm-yy)	1. Married 2. Widowed 3. Divorced 4. Separated 5. Single 6. Cohabiting	C O D E 1 Yes 2 No	1. Literacy program 2. Pre-primary (1-3) 3. Primary (1-9) 4. Secondary (1-3) 5. Upper secondary (1-4) 6. Higher technical education (1-3) 7. Non-university higher education (1-4) 8. University (1-8) 9. Postgraduate (1-5) 99 Not known/No response 88- None	1 Yes 2 No
1								
2								
3								
4								
5								
6								



The World Bank Listening to LAC (L2L) Pilot Final Report

7									
8									
9									
10									
11									
12									

**INTERVIEWER: RECORD THE ANSWERS TO THE FOLLOWING QUESTIONS IN THE TABLE BELOW (FROM H5 TO H12).**

H13. Of those living in this household aged 15 or over, could you tell me which of them own a cell phone?

**(INTERVIEWER: RECORD THE NAMES OF THOSE AGED 15 OR OVER AGAIN AND ASK WHETHER THEY OWN A CELL PHONE)**

Name of members of the household aged 15 or over	DO THEY HAVE A CELL PHONE? 1- Yes 2- No 3- None
1	
2	
3	
4	
5	
6	
7	
8	
9	
10	

I'd like you to imagine a scale from zero to ten, where zero is the lowest and ten is the highest.  
Now, for the following questions, please imagine that ten represents the highest quality of life possible for you, and zero represents the lowest quality of life possible for you.

**READ FROM "1.A" TO "1.B"**

**[WP16]**

H14. Again, if 10 is the highest and 0 is the lowest, which number would you say corresponds to your current situation? **(SPONTANEOUS)**

												<b>(Not known)</b>	<b>(No Response)</b>
00	01	02	03	04	05	06	07	08	09	10		98	99

**[WP18]**

H15. Estimating as best you can, where on the scale do you expect to be in 5 years? **(SPONTANEOUS)**

												<b>(Not known)</b>	<b>(No Response)</b>
00	01	02	03	04	05	06	07	08	09	10		98	99

**[WP17]**

H16. Where on the scale would you say corresponds to the situation you were in 5 years ago? **(SPONTANEOUS)**

												<b>(Not known)</b>	<b>(No Response)</b>
00	01	02	03	04	05	06	07	08	09	10		98	99

H16a. And where on the scale would you place your parents when you were 15 years old?

**(SPONTANEOUS)**

												<b>(Not known)</b>	<b>(No Response)</b>
00	01	02	03	04	05	06	07	08	09	10		98	99

**[ENAH0 612]**

Now I'd like to ask you a few questions about whether or not you have certain items in your home.

**[ROTATE THE QUESTIONS AND OPTIONS][Include broken equipment as household appliances, only if it is due to be repaired in the short term, with respective comments] [If there are any**

**electrical appliances in the household that do not belong to the household, regardless of whether they are used or not, they should not be included in the response to this question].**

	H16. Does your home currently have:		Q17. Going back five years, did your home have <b>(READ EACH OF THE ARTICLES)</b> :	
	Yes/No	P16a. How many do you have?	Yes/No	P17a. How many did you have?
A. Fridge?	1. Yes 2. No		1. Yes 2. No	
B. 4 Burner stove?	1. Yes 2. No		1. Yes 2. No	
C. Television?	1. Yes 2. No		1. Yes 2. No	
D. Cable television?	1. Yes 2. No		1. Yes 2. No	
E. Radio or radio cassette recorder?	1. Yes 2. No		1. Yes 2. No	
F. Sound system?	1. Yes 2. No		1. Yes 2. No	
G. Landline (HONDUTEL)?	1. Yes 2. No		1. Yes 2. No	
H. Landline (Other provider)?	1. Yes 2. No		1. Yes 2. No	
I. Car for household use?	1. Yes 2. No		1. Yes 2. No	
J. Car for business purposes?	1. Yes 2. No		1. Yes 2. No	
K. Motorbike for household use?	1. Yes 2. No		1. Yes 2. No	
L. Motorbike for business use?	1. Yes 2. No		1. Yes 2. No	
M. Bicycle?	1. Yes 2. No		1. Yes 2. No	
N. Computer?	1. Yes 2. No		1. Yes 2. No	
O. Home Internet?	1. Yes 2. No		1. Yes 2. No	
P. Air conditioning?	1. Yes 2. No		1. Yes 2. No	

**H18. Type of house (through observation)**

1. Detached home
2. House built with natural material (Hut)
3. Makeshift home (Scrap)
4. Apartment
5. Room at lodging house or inn
6. Raised hut
7. Place built for other use but used as housing

98 (Not known)

99 (No response)

**H19. What is the main material used to build the walls? (READ 1-8)**

1. Clay brick
2. Quarry stone
3. Cement block
4. Adobe
5. Wood
6. Wattle-and-daub, straw or canes
7. Prefabricated material
8. Scrap material
10. Other:\_\_\_\_\_ (Specify)

98 (Not known)

99 (No response)

**H20. What is the main material used for the floor? (READ 1-7)**

1. Ceramic tiles
2. Cement bricks
3. Granite bricks
4. Clay bricks
5. Concrete slabs
6. Wood
7. Earth
8. Other:\_\_\_\_\_ (Specify)

98 (Not known)

99 (No response)

**H21. What is the main material used to construct the roof? (READ 1-7)**

1. Clay tiles
2. Asbestos panels
3. Zinc panels
4. Concrete
5. Wood
6. Straw, palms or similar
7. Scrap material
8. Other:\_\_\_\_\_ (Specify)

98 (Not known)

99 (No response)

**H22. Is the property or house equipped with plumbing for water?**

- 1. Yes
- 2. No
- 98 (Not known)
- 99 (No response)

**H23. How is the water used in the property obtained? (READ 1-8)**

- 1. Public system
- 2. Private system
- 3. Winch operated well
- 4. Pump operated well
- 5. River, stream, spring, water hole, etc.
- 6. Tanker truck
- 7. Pick-up with drums or barrels
- 8. Communal water supply
- 10. Other:\_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H24. What is the status of the water supply? (READ 1-2)**

- 1. Permanent
- 2. Irregular
- 98 (Not known)
- 99 (No response)

**H25. Where is the water obtained? (READ 1-4)**

- 1. Within the house
- 2. Outside the house but within the property
- 3. Less than 100 meters from the property
- 4. More than 100 meters from the property
- 5. Other:\_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H27. What is the tenancy status of this property? (READ 1-7)**

- 1. Rented
- 2. Owned with outstanding mortgage
- 3. Fully owned
- 4. Occupied property, ownership legalized
- 5. Occupied property, ownership not legalized
- 6. Transferred without payment
- 7. Received for work purposes
- 8. Other:\_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H28. What is the main source of energy used for cooking in this household? (READ 1-5)**

1. Wood
2. Gas (Kerosene)
3. Gas LPG (Bottled Gas)
4. Electricity
5. Crop waste
6. Other: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H29. Are there any sanitary facilities at this property?**

1. Yes
2. No
- 98 (Not known)
- 99 (No response)

**H30. What type of sanitary facilities are there? (READ 1-8)**

1. Toilet connected to the sewage network
2. Toilet connected to a septic tank
3. Toilet discharged into river, lake or sea
4. Latrine discharged into river, lake or sea
5. Pour-flush latrine
6. Latrine with septic tank
7. Latrine with cesspit
8. Composting latrine
9. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**Q31. Is the use of the sanitary facilities: (READ 1-3)**

1. Exclusive to the household?
2. Shared with other homes?
3. Shared with other properties?
- 98 (Not known)
- 99 (No response)

**H32. What is the main type of lighting used in this household? (READ 1-7)**

1. Public electricity network
2. Collective private electricity network
3. Own electricity generator or plant
4. Solar energy
5. Candle
6. Gas lamp
7. Firewood
8. Other type: \_\_\_\_\_ (Specify)
9. Not used
- 98 (Not known)
- 99 (No response)

**For the following questions, please think about the characteristics of your property five years ago**

**H33. Five years ago, what was the main material used to build the walls? (READ 1-8)**

- 1 Clay brick
- 2 Quarry stone
- 3 Cement block
- 4 Adobe
- 5 Wood
- 6 Wattle-and-daub, straw or canes
- 7 Prefabricated material
- 8 Scrap material
- 10 Other: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H34. Five years ago, what was the main material used for the floor? (READ 1 – 7)**

- 1. Ceramic tiles
- 2. Cement bricks
- 3. Granite bricks
- 4. Clay bricks
- 5. Concrete slabs
- 6. Wood
- 7. Earth
- 8. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H35. Five years ago, what was the main material used for the roof? (READ 1-7)**

- 1. Clay tiles
- 2. Asbestos panels
- 3. Zinc panels
- 4. Concrete
- 5. Wood
- 6. Straw, palms or similar
- 7. Scrap material
- 10 Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H36. Five years ago, was the house or the property equipped with plumbing for water?**

- 1. Yes
- 2. No
- 98 (Not known)
- 99 (No response)

**H37.Five years ago, how was the water used in the property obtained? (READ 1-8)**

1. Public system
2. Private system
3. Winch operated well
4. Pump operated well
5. River, stream, spring, water hole, etc.
6. Tanker truck
7. Pick-up with drums or barrels
8. Communal or public water supply
10. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H38.Five years ago, what was the status of the water supply? (READ 1 – 2)**

1. Permanent
2. Irregular
- 98 (Not known)
- 99 (No response)

**Q39.Five years ago, where was the water obtained? (READ 1 – 4)**

1. Within the house
2. Outside the house but within the property
3. Less than 100 meters from the property
4. More than 100 meters from the property
5. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H41.Five years ago, what was the tenancy status of this property? (READ 1 – 7)**

1. Rented
2. Owned with outstanding mortgage
3. Fully owned
4. Occupied property, ownership legalized
5. Occupied property, ownership not legalized
6. Transferred without payment
7. Received for work purposes
8. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H42.Five years ago, what was the main source of energy used for cooking in this household? (READ 1 – 5)**

1. Wood
2. Gas (Kerosene)
3. Gas LPG (Bottled Gas)
4. Electricity
5. Crop waste
6. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)



**H43.Five years ago, were there any sanitary facilities?**

- 1. Yes
- 2. No
- 98 (Not known)
- 99 (No response)

**H44.Five years ago, what type of sanitary facilities were there? (READ 1 – 8)**

- 1. Toilet connected to the sewage network
- 2. Toilet connected to a septic tank
- 3. Toilet discharged into river, lake or sea
- 4. Latrine discharged into river, lake or sea
- 5. Pour-flush latrine
- 6. Latrine with septic tank
- 7. Latrine with cesspit
- 8. Composting latrine
- 9. Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

**H45.Five years ago, was the use of the sanitary facilities:**

- 1. Exclusive to the household?
- 2. Shared with other homes?
- 3. Shared with other properties?
- 98 (Not known)
- 99 (No response)

**H46.Five years ago, what was the main type of lighting used in this household? (READ 1 – 7)**

- 1. Public electricity network
- 2. Collective private electricity network
- 3. Own electricity generator or plant
- 4. Solar energy
- 5. Candle
- 6. Gas lamp
- 7. Firewood
- 8. Other type: \_\_\_\_\_ (Specify)
- 9. Not used
- 98 (Not known)
- 99 (No response)

**ASK ALL**

**HEAD OF THE HOUSEHOLD**

**[ENAH0 300A]**

H47. Which mother tongue did the head of the household learn during childhood?

- 1 Spanish?
- 2 English?
- 3 English creole?
- 3 Garifuna?
- 4 Misquito?
- 5 Tawahka?

- 6 Pech?
- 7 Tol?
- 8 Is deaf-mute?
- 9 Other type: \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

H48. What was the highest level of education attained by the father of the head of the household?(**Spontaneous**)

- 1 Literacy program
- 2 Pre-primary (1-3)
- 3 Primary (1-9)
- 4 Secondary (1-3)
- 5 Upper secondary (1-4)
- 6 Higher technical education (1-3)
- 7 Non-university higher education (1-4)
- 8 University (1-8)
- 9 Postgraduate (1-5)
- 98 (Not known)
- 99 (No response)

H48. What was the highest level of education attained by the mother of the head of the household?

- 1 Literacy program
- 2 Pre-primary (1-3)
- 3 Primary (1-9)
- 4 Secondary (1-3)
- 5 Upper secondary (1-4)
- 6 Higher technical education (1-3)
- 7 Non-university higher education (1-4)
- 8 University (1-8)
- 9 Postgraduate (1-5)
- 98 (Not known)
- 99 (No response)

## ASK ALL

### PARTNER OF THE HEAD OF THE HOUSEHOLD

#### [ENAH0 300A-2]

H50. Which mother tongue did the head of the household's partner learn during childhood?

- 1 Spanish?
- 2 English?
- 3 English creole?
- 4 Garifuna?
- 5 Misquito?
- 6 Tawahka?
- 7 Pech?
- 8 Tol?
- 9 Is deaf-mute?
- 10 Other? \_\_\_\_\_ (Specify)
- 98 (Not known)
- 99 (No response)

H51. What was the highest level of education attained by the father of the head of the household's partner?

- 1 Literacy program
- 2 Pre-primary (1-3)
- 3 Primary (1-9)
- 4 Secondary (1-3)Upper secondary (1-4)
- 5 Higher technical education (1-3)
- 6 Non-university higher education (1-4)
- 7 University (1-8)
- 8 Postgraduate (1-5)
- 98 (Not known)
- 99 (No response)

H48. What was the highest level of education attained by the mother of the head of the household's partner?

- 1 Literacy program
- 2 Pre-primary (1-3)
- 3 Primary (1-9)
- 4 Secondary (1-3)
- 5 Upper secondary (1-4)
- 6 Higher technical education (1-3)
- 7 Non-university higher education (1-4)
- 8 University (1-8)
- 9 Postgraduate (1-5)
- 98 (Not known)
- 99 (No response)

#### ASK ALL (EMPLOYMENT SECTION)

##### [ENAH0 501]

Q53. Think back to last week, from \_\_\_ to \_\_\_ **(INTERVIEWER TO INDICATE THE LAST 7 DAYS)** During the past week, did you spend at least one hour working, even if it was unpaid work (Except household work) **(Last Week is the calendar week prior to the day of the interview, comprising Sunday to Saturday, Unless the interview is held on a Saturday after midday, in which case the week should be considered as the one that ends today, Saturday.)**

- 1 Yes **(GO TO QUESTION H57)**
- 2 No **(CONTINUE)**
- 98 (Not known)
- 99 (No response)

##### [ENAH0 502]

H54. Although you didn't work last week, do you have a job, business or a farm that you will be returning to shortly?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

Q55. Although you didn't work last week, could you tell me whether: **(READ 1-4)**

- 1 You helped with a family business?
- 2 You helped with a family farm?
- 3 You helped as an unpaid apprentice?

- 4 You sold items in the street or cleaned cars?  
 98 (Not known)  
 99 (No response)

**[ENAH0 504]**

H56. Last week, did you perform any activity for at least an hour to obtain income in cash or in kind, such as: **(READ 1 - 10; MULTIPLE CHOICE)**

- 1 Working for your own business, or a family business?  
 2 Offering a service?  
 3 Making something at home to sell?  
 4 Selling beauty products, clothing, jewelry, etc.?  
 5 Creating artisan products?  
 6 Doing a paid internship at an employment center?  
 7 Working at a private house?  
 8 Making a product?  
 9 Carrying out paid work at a farm or caring for animals  
 10 Helping a relative without payment?  
 11 Other? \_\_\_\_\_ (Specify)  
 12 NONE  
 98 (Not known)  
 99 (No response)

**(INTERVIEWER: IF THE RESPONDENT DOES NOT WORK (COD 2. H53), DOES NOT HAVE OWN BUSINESS (COD. 2 H54) AND DID NOT PERFORM ANY ACTIVITIES IN H56 (COD.12), GO TO H61. OTHERWISE, CONTINUE.**

H57. Taking into account all your occupations (Main and Secondary), how many hours did you work in total last week?

[Specify the exact amount of hours]: \_\_\_\_\_

- 98 (Not known)  
 99 (No response)

**[ENAH0 505]**

H58. What was the main occupation that you performed last week?**(USE CODE LIST FROM NATIONAL STATISTICS INSTITUTE TO CODE)(CODING WILL BE DONE IN OFFICE, JUST NOTE OCCUPATION)**

[Specify]: \_\_\_\_\_

- 98 (Not known)  
 99 (No response)

**[ENAH0 506]**

H59. What does the business, organization or company in which you carried out your main occupation last week do?**(USE CODE LIST FROM NATIONAL STATISTICS INSTITUTE TO CODE)(CODING WILL BE DONE IN OFFICE, JUST NOTE RESPONDENT'S ANSWER)**

[Specify]: \_\_\_\_\_

- 98 (Not known)  
 99 (No response)

H60. Thinking about the work you carried out last week, what would you say was your occupational category? **(READ 1 – 13)**

- 1 Public sector worker or employee
- 2 Private sector worker or employee
- 3 Domestic employee
- Self-Employed Agricultural Workers**
- 4 Member of agricultural cooperative, group or settlement
- 5 Self-employed agricultural worker who does not employ temporary labor
- 6 Self-employed agricultural worker who employs temporary labor
- 7 Farm owner or part-owner
- Self-Employed Non-Agricultural Workers**
- 8 Member of agricultural cooperative, group or settlement
- 9 Self-employed worker who does not employ temporary labor
- 10 Self-employed worker who employs temporary labor
- 11 Employer or active partner
- 12 Non-paid family worker
- 13 Non-paid worker
- 98 (Not known)
- 99 (No response)

**ASK ALL**

**[Labor1]**

H61. In the last month, have you or any member of the household lost their job?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[Labor2]**

H62. In the last month, have you or any member of the household got a new job?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**Now, let's change the topic.**

H63. Thinking back over the past month, **could** you tell me whether the household has received remittances from family members or friends that live outside the city or country?

- 1 Yes **(CONTINUE)**
- 2 No **(GO TO H68)**
- 98 (Not known) **(GO TO H68)**
- 99 (No response) **(GO TO H68)**

Q64. With regard to the remittances received, were they mainly from people living in another city or living outside Honduras?

- 1 Another city in Honduras
- 2 Outside Honduras
- 98 (Not known)

99 (No response)

H65. What is the approximate value of the remittances received by this household in a month? Please respond in Lempiras. **(INTERVIEWER, HELP THE RESPONDENT ESTIMATE THE MONTHLY AMOUNT RECEIVED, IF NECESSARY)**

[Specify]: \_\_\_\_\_

98 (Not known)

99 (No response)

H66. Could you tell me approximately what percentage the remittances represent of the total monthly income of the household? Would you say they represent: **(READ 1-4)**

1 From 0 to 10 percent

2 Over 10 to 25 percent

3 Over 25 to 50 percent

4 More than 50 percent

98 (Not known)

99 (No response)

**[NOCHILDREN1]**

H67. With regard to the last month, did the household receive more, less or the same amount of remittances in comparison to the previous month, or were no remittances received whatsoever?

1 More

2 Less

3 Same amount

4 None received

98 (Not known)

99 (No response)

**ASK ALL**

**[EDUCATION1]**

H68. With regard to the last month, has any member of your household missed school due to lack of money?

1 Yes

2 No

98 (Not known)

99 (No response)

**[EDUCATION2]**

H69. In the last month, has any member of your household missed school due to an illness?

1 Yes

2 No

98 (Not known)

99 (No response)

**[NO CHILDREN2]**

H70. In the last month, has any member of your household received less income due to an illness?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[SECURITY1]**

H71. In the last month, did any member of the household suffer a personal accident that resulted in expenditure exceeding 20 percent of the household's monthly income?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[SECURITY2]**

H72. In the last month, was any member of your household robbed?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[ECO1]**

H73. In the last month, would you say your household income was more than, less than, or equal to the previous month?

- 1 More
- 2 Less
- 3 Same amount
- 98 (Not known)
- 99 (No Response)

**[FOOD2]**

H74. Now I'd like you to think about the last 3 months. At any stage has there been a shortage of food in your household due to lack of money or other resources?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

H75. I'd now like you to think about the last 5 years. Has your family experienced any of the following events over the last five years? **(ACCEPT ONE OR MORE OPTIONS) (READ 1-6)**

- 1 The death of a family member?
- 2 Someone in the household losing their job?
- 3 A natural disaster (hurricane, earthquake, flood, etc.)?
- 4 Victim of a robbery?
- 5 A serious illness?
- 6 A serious accident?
- 7 NONE (Do not read)
- 98 (Not known)
- 99 (No response)

H76.in the last 5 years, that is from 2007 to 2012, have you moved from a different municipality? If the response is yes, where did you live previously?

- 1 Yes → place: \_\_\_\_\_
- 2 No

H77.Now thinking about the future, do you believe that you will move house in the next 6 months?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**Now, let's talk about something else...**

**[Poverty1]**

H78.Do you consider yourself poor?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

H79.Five years ago, did you consider yourself poor?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[Poverty2]**

H80.When you were 15 years old, did you consider you and your parents poor?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[Internet]**

**[WP11265]**

H81. Do you have access to the Internet anywhere outside your home, for example, work, school, Internet café, library, etc.?

- 1 Yes
- 2 No
- 98 (Not known)
- 99 (No response)

**[Access]**

**[WP11266]**

H81a. In the last 30 days, have you been able to access the Internet from any computer at your disposal? Do you have access to the Internet anywhere outside your home, for example, work, school, Internet café, library, etc.?

- 1 Yes
- 2 No
- 98 (Not known)



99 (No response)

**[WP11268]**

H82. In the last 30 days, have you personally had access to the Internet through your cell phone?

- 1 Yes
- 2 No
- 3 (Not known)
- 4 (No response)

**[WP11269]**

H83. Taking into account the Internet connections at your disposal, including any shared computer or any cell phones, approximately how often do you use the Internet? **(SPONTANEOUS)**

- 1 At least once a day
- 2 From 2 to 6 times a week
- 3 Once a week to once a month
- 4 Less than once a month
- 5 Almost never
- 6 Never (skip to H89)
- 7 (Not known)
- 8 (No response)

**(If code 6 in H83/WP11269, Go to H89;  
Otherwise, continue.)**

H84. I am now going to read a series of activities for which people use the Internet. For each activity I read, please could you tell me whether you use the Internet for this purpose frequently, sometimes or never **(READ ROTATING ORDER A-K)**

		Frequently	Sometimes	Never	(Not known)	(No Response)
A. <b>[WP11270]</b>	Finding out about international news	1	2	3	4	5
B. <b>[WP11271]</b>	Finding out about national news	1	2	3	4	5
C. <b>[WP11272]</b>	Reading or participating in blogs	1	2	3	4	5
D. <b>[WP11273]</b>	Instant messaging or chat	1	2	3	4	5
E. <b>[WP11274]</b>	Online shopping	1	2	3	4	5
F. <b>[WP11275]</b>	Entertainment (games, video or music)	1	2	3	4	5
G. <b>[WP11276]</b>	Social networking/connecting with other people	1	2	3	4	5
H. <b>[WP11277]</b>	Sending and receiving e-mail	1	2	3	4	5
I. <b>[WP11278]</b>	Studying/learning	1	2	3	4	5
J. <b>[WP11279]</b>	Working, selling or making money	1	2	3	4	5
K. <b>[WP11280]</b>	Carrying out bank transactions	1	2	3	4	5

**[WP9715]**

H85. Are you currently a member of a social network on the Internet, such as Facebook(**read:feisbuk**), Twitter, MySpace (**read:maispeis**), Orkut, Hi5, LinkedIn, etc.?(PRONUNCIATION INSTRUCTIONS)

- 1 Yes
- 2 No (skip to H89)
- 3 (Not known)
- 4 (No response)

**(If code 1 in H85/WP9715, Continue;  
Otherwise, go to H89)**

H86. Of which of the following are you a member: (**Read A-F**)

		Yes	No	(Not known)	(No Response)
A. <b>[WP9716]</b>	Facebook ( <b>read:feisbuk</b> )	1	2	3	4
B. <b>[WP9717]</b>	Twitter ( <b>read:tuiter</b> )	1	2	3	4
C. <b>[WP9718]</b>	MySpace ( <b>read:maispeis</b> )	1	2	3	4
D. <b>[WP9719]</b>	LinkedIn ( <b>read:lint-in</b> )	1	2	3	4
E. <b>[WP10162]</b>	Orkut ( <b>read:orkut</b> )	1	2	3	4
F. <b>[WP11216]</b>	Hi5 ( <b>read:jaifaif</b> )	1	2	3	4

**(INTERVIEWER READ:)** With regard to your main social network, or the one you use most frequently...

**[WP11281]**

H87. Approximately how many people do you have as direct contacts on this social network?  
**(SPONTANEOUS)**

- 
- 0000 (None) (skip to H89)  
 9998 (Not known)  
 9999 (No response)

**(If code 0000 in H87/WP11282, Go to H89;  
Otherwise, continue.)**

**[WP11282]**

H88. Thinking about the direct contacts you have on that social network, would you say they are:

- 1 Mostly people that live in this country
- 2 Mostly people that live in other countries
- 3 (Both equally)(**DO NOT READ**)
- 4 (Not known)
- 5 (No response)

READ: We're now reaching the end of the survey.

H89. Please forgive me if I have already asked you this question: do you have a cell phone?

- 1 Yes → H89a. How many? \_\_\_\_\_
- 2 No → Skip to question **H93**

H90. Is it a pre-paid or contract phone?

- 1 Pre-paid
- 2 Contract → **Ask:** H90a. What type of contract?
- 3 Controlled
- 4 Unlimited
- 98 (Not known)
- 99 (No response)

H91. Approximately how much do you spend each month on your cell phone(s)?

[Specify amount]:

- LEMPIRAS:
- 1. Up to 10 Lempiras
  - 2. From 11 to 40 Lempiras
  - 3. From 41 to 100 Lempiras
  - 4. From 101 to 150 Lempiras
  - 5. From 151 to 300 Lempiras
  - 4. From 301 to 600 Lempiras
  - 5. From 601 to 1000 Lempiras
  - 5. More than 1000 Lempiras

H92. Could you tell me which is operator or company provides the service for your cell phone?  
(SPONTANEOUS)

- 1 Tigo
- 2 Claro
- 3 Digicel
- 4 Hondutel
- 98 (Not known)
- 99 (No response)

H93. Could you tell me how many cell phones there are in this household?

[Specify amount]:

- 97 None (**Skip to question H97**)
- 98 (Not known)
- 99 (No response)

**(I: ASK H94 TO THOSE THAT HAVE A CELL PHONE)**

H94. Is there a cell phone at this household that uses a different phone operator from the one you use?  
(SPONTANEOUS)

- 1 Yes → H94a. Which?
  - 1 Tigo
  - 2 Claro
  - 3 Digicel
  - 4 Hondutel
- 2 No
- 98 (Not known)
- 99 (No response)

**(I: ASK H65B TO THOSE THAT DO NOT HAVE A CELL PHONE)**

H95. Which operator do the other members of the household use? (SPONTANEOUS, MULTIPLE CHOICE)

- 1 Tigo
- 2 Claro
- 3 Digicel
- 4 Hondutel
- 98 (Not known)
- 99 (No response)

H96. In your opinion, is the cost of a text message (READ 1 – 5):

- 1 Very low
- 2 Low
- 3 Fair
- 4 High
- 5 Very high
- 98 (Not known)
- 99 (No response)

H97. Do you know how to send and receive text messages?

- 1 Yes **(CONTINUE)**
- 2 No **(GO TO QUESTION H100)**
- 98 (Not known)
- 99 (No response)

H98. How often would you say you send text messages? Would you say you send text messages **(READ 1-6)**

- 1 Various times a day
- 2 At least once a day
- 3 From 2 to 6 times a week
- 4 Once a week to twice a month
- 5 Once a month
- 6 Less frequently/Almost never
- 7 Never
- 98 (Not known)
- 99 (No response)

H99. If I wanted to contact you by text message, when would you be most likely to read the message and immediately respond? **(READ 1 - 6)**

- 1 Early morning, between 6 a.m. and 8 a.m.
- 2 Between 8 a.m. and 11 a.m.
- 2 Around midday
- 3 Early afternoon (1 p.m. - 3 p.m.)
- 4 Late afternoon (between 3 p.m. and 6 p.m.)
- 5 Between 6 in the evening and 9 at night
- 6 Late at night (after 9 p.m.)
- 7 Any time **(DO NOT READ)**

H100. Is there anyone else in the household 15 or over that can send and receive text messages (with any phone in the household)?

- 1 Yes
- 2 No

H101. Do you have an e-mail address?

1 Yes

**[Specify]:**

H101a. Could you please tell me what it is?:

---

2 No

98 (Not known)

99 (No response)

**NOTE: IF THE RESPONDENT HAS A CELL PHONE (SEE H13), CONTINUE, FOR OTHERWISE GO TO H103**

H5.Could you possibly tell me your cell phone number?

1 Yes

**[Specify] :**

[[ [[ [[ [[ [[ [[ [[ [[ [[ [[ ]

2 No

**[Specify Reason]:** \_\_\_\_\_

---

98 (Not known)

99 (No response)

H103. Record the name and numbers of other household members, both cell phones and landlines where applicable **(NOTE: Indicate whether the number is a cell phone or landline)**

NAMES	Telephone (Cell/Landline)
1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	

## **INVITATION TO FORM PART OF THE PANEL**

Mr./Ms. \_\_\_\_\_ on behalf of the World Bank, CID-Gallup and myself, I would like to sincerely thank you for the time you have offered us and for the valuable information that you have shared with us.

I would like to remind you that this information will be treated completely confidentially.

The World Bank and CID-Gallup would now like to invite you to form part of a second phase in this important project, which we have called, “Listening to Latin America”. The purpose of this phase is to help world leaders get in touch with Latin America and understand the realities, specific situations and living conditions of people from Honduras.

By participating in this project, you will be representing people from Honduras in this large-scale effort and you will help to make Honduras heard worldwide. By participating, you will be representing hundreds of thousands of your countrymen and women.

I'd like to share with you a little more about this second phase and why it is important:

- It consists of short surveys that we will send via text message to your cell or carry out by calling your cell.
- Each survey will last approximately 5 minutes.
- This phase of the project will run for 5 months in total. During this period, we will send you various short surveys.
- No more than 3 surveys will be sent per month.
- Participation in this important project does NOT entail any additional costs. In other words, it is completely FREE.
- You will not be charged for any of the messages we send, or any of the responses you send back to us. We are covering these costs.
- You do not need any credit to respond to the survey.

### **NOTE TO:**

**(INTERVIEWER: CHECK H89 and H93, IF THE RESPONDENT HAS A CELL PHONE. IF NOT, CONTINUE. OTHERWISE, SKIP TO NOTE B)**

### **INTERVIEWER: ONLY FOR HOUSEHOLDS THAT HAVE NO CELL PHONE:**

- You mentioned that there was no cell phone in this household. The objective of this project is to listen to all households in Honduras; to this end, the World Bank would provide you with a cell phone, which we would use to send you the monthly surveys and which you would be able to use to respond to us. We will cover the cost of sending and receiving the surveys.
- Later I will explain in more detail the instructions and conditions for using the cell phone I will be giving to you.  
**(SKIP TO NOTE C: ALL)**

### **NOTE B:**

**(INTERVIEWER: CHECK QUESTION H64, IF THE HOUSEHOLD ONLY USES HONDUTEL OR DIGICEL AND NO OTHER OPERATOR, CONTINUE. OTHERWISE SKIP TO NOTE C MARKED “ALL”)**

### **INTERVIEWER: ONLY HOUSEHOLDS USING NEXTEL:**

- You mentioned that this household only uses **(INSERT EITHER HONDUTEL OR DIGICEL)**. For this project, we will be contacting households that use Tigo or Claro. The objective of this project is to listen to all households in Honduras; to this end, the World Bank would offer you a pre-paid Tigo or Claro cell phone, which we would use to send you the monthly surveys and which you would be able to use to respond to us. We will cover the cost of sending and receiving the surveys.
- Later I will explain in more detail the instructions and conditions for using the cell phone I will be giving to you.

**NOTE C: “ALL”**

- As mentioned earlier, the surveys will be carried out in different ways.
- You may receive the surveys in the following ways:
  - A representative of CID-Gallup may visit your house, as I have done today.
  - You may receive a text message to your cell phone
  - You may receive a call to your cell phone, where you will be asked questions through a pre-recorded message
  - A representative of CID-Gallup may call you on your cell phone
- **How will you receive the Surveys by Text Message?**
  - During this 5-month period, we will send text messages to your cell phone containing questions to which you should respond immediately
  - Each message will contain one question. You should respond to this message, and then we will send you the following question. You should proceed in this way until the last question.
  - No survey will contain more than 10 questions, and the majority of questions will require a “Yes” or “No” answer.
  - You will first receive an introduction message, through which you will be able to identify that the survey is from the World Bank and Gallup. You will then be sent some short instructions and the questions.
  - You will be able to receive messages and respond even when you do not have any credit.
  - The messages we will send and the responses you will send back are pre-paid, therefore there is no additional cost involved in participating in this important project.
- **How will you receive Pre-Recorded Surveys?**
  - For the pre-recorded surveys, we will contact you using Gallup's automated survey center. You will receive a call and a pre-recorded message will welcome you to the survey. The questions are recorded and all you need to do is provide your response using your cell phone's keypad.
  - Each survey will contain up to 10 questions, to which you should respond by following the instructions provided each time you receive a survey.
  - Each message will contain one question. You should respond to this question, and then the system will move on to the following question.
  - No survey will contain more than 10 questions, and the majority of questions will require a “Yes” or “No” answer.
  - Receiving and responding to the survey in this way does not entail any additional cost as your responses are pre-paid.

- **Another way you may be contacted to participate in a short survey is via a phone call by a representative of CID-Gallup.**
  - o In such instances, a member of my team will call your cell phone.
  - o This person will ask for your name, and will identify his or herself as a representative of CID-Gallup.
  - o They may call several times over the course of the next 5 months to carry out short surveys.
  - o The duration of each survey will be approximately 5 minutes.
  - o If you have any questions regarding the project, the person carrying out the survey will be able to help you.
  - o No survey will contain more than 10 questions, and the majority of questions will require a “Yes” or “No” answer.

### **FINAL INVITATION (FOR ALL)**

Mr./Ms./ \_\_\_\_\_ as you can see, this is a very serious and important project. We would really like you to form part of this landmark project and represent people from Honduras. Are you willing to participate voluntarily in this phase of the project by responding to the surveys that we will send you over the next 5 months?

- |   |     |                                                     |
|---|-----|-----------------------------------------------------|
| 1 | Yes | <b>(CONTINUE)</b>                                   |
| 2 | No  | <b>(ASK FOR REASONS AND RECORD ON ROUTE SHEET):</b> |

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**INTERVIEWER NOTE: If the respondent states they will NOT participate as they have no cell reception, ask:**

Sir/Madam, during the course of a normal week, how often do you visit places with cell phone reception?

1. **FAIRLY FREQUENTLY (INVITE THEM TO PARTICIPATE AGAIN, STATING THAT THEY CAN RESPOND TO THE SURVEY WHEN THEY VISIT THE PLACES WITH CELL RECEPTION)**
  1. Accepts
  2. Doesn't Accept **(RECORD ADDITIONAL REASONS AND GO TO FAREWELL STATEMENT)**
2. **NEVER (IF THE RESPONDENT SAYS NEVER, GO TO FAREWELL STATEMENT)**

**INTERVIEWER: RECORD PARTICIPATION SUMMARY:**

- 1 **WILLING TO PARTICIPATE**
  - a. HAS A CELL PHONE
  - b. DOES NOT HAVE A CELL PHONE (PHONE TO BE PROVIDED)
  - c. HAS NO RECEPTION AT HOME AND WITH VISITS PLACES WITH RECEPTION FAIRLY FREQUENTLY



- d. HAS A CELL PHONE, BUT WITH **HONDUTEL OR DIGICEL** ONLY, AND ACCEPTS THE CELL PHONE OFFERED TO PARTICIPATE IN THE SURVEY

**2 NOT WILLING TO PARTICIPATE**

- a. DOES NOT WISH TO PARTICIPATE
- b. HAS NO RECEPTION AT HOME AND NEVER VISITS PLACES WITH RECEPTION
- c. HAS NO RECEPTION AT HOME AND WITH VISITS PLACES WITH RECEPTION FAIRLY FREQUENTLY. BUT DOES NOT WISH TO PARTICIPATE.
- d. HAS A CELL PHONE, BUT WITH **HONDUTEL OR DIGICEL** ONLY, AND DOES NOT ACCEPT THE CELL PHONE OFFERED TO PARTICIPATE IN THE SURVEY

**THOSE WHO DO NOT WISH TO PARTICIPATE IN PANEL: FAREWELL STATEMENT**

We very much appreciate the time and information you have given us. Your opinions are very important. Thank you so much!

**NOTE: INTERVIEWER.** If the respondent does NOT wish to participate as they have no cell reception at home and they do not visit places with reception (Code 2b in the participation summary table) offer **THANK YOU GIFT**. To all others that do NOT wish to participate, thank them, read farewell statement and **RECORD** on route sheet (**DO NOT OFFER THANK YOU GIFT TO THIS GROUP**).

**INTERVIEWER: ONLY TO Group 2b IN THE SUMMARY TABLE**

We would like to offer you this (**OFFER THANK YOU GIFT**) as a token of our appreciation for the time you have given us today and the valuable information you have shared with us. Thank you!

**INTERVIEWER ONLY TO PARTICIPANTS: ALL THOSE THAT WISH TO PARTICIPATE IN THE PANEL (CODE 1 IN SUMMARY TABLE –a/b/c/d-)**

We really appreciate your collaboration!!! It is vital to the success of this project. In the event that we are unable to contact you on your cell phone, please could you provide your home phone number, or the cell phone number of another member of the household?

Record home phone number and any other cell phone number that can be used to contact participant:

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I would now like to explain the project to you in more detail and give you the following items.

**INTERVIEWER NOTE: PRESENT THE INFORMATION IN THE FOLLOWING ORDER DEPENDING ON THE CORRESPONDING HOUSEHOLD GROUP (SEE TABLE OF GROUPS ON THE COVER OF THE QUESTIONNAIRE):**

- **(INTERVIEWER: GIVE CELL PHONE AND TECHNICAL MANUAL ONLY TO HOUSEHOLDS WITH NO CELL PHONE OR WITH A UNICODE HONDUTEL OR DIGITEL SERVICE AND WHO WISH TO PARTICIPATE. EXPLAIN HOW TO USE THE CELL PHONE, IN ADDITION TO THE TEXT MESSAGING SERVICE)**
- **Authorization Sheets (ASK PARTICIPANT(S) TO SIGN AGREEMENT SHEET(S). ALL PARTICIPANTS MUST SIGN AGREEMENT SHEET #1. THOSE WHO HAVE BEEN GIVEN A CELL PHONE MUST ALSO SIGN AGREEMENT #2. EACH INTERVIEWER MUST HAVE TWO COPIES OF EACH OF THESE AUTHORIZATION SHEETS. THE RESPONDENT MUST SIGN BOTH. THE INTERVIEWER MUST GIVE ONE TO THE RESPONDENT AND RETAIN THE SECOND COPY.**
- **Brief instructions on how to respond to the surveys (HAND OVER AND CAREFULLY READ THE INSTRUCTIONS CORRESPONDING TO THE GROUP TO WHICH THE PARTICIPANT BELONGS, ACCORDING TO ICECON). READ INSTRUCTIONS WITH PARTICIPANT AND LEAVE IT IN THEIR POSSESSION.**
- **Carry out the DEMO (ONLY FOR SMS AND IVR METHODS)**
- **Estimated calendar of dates and times when surveys will be carried out**
- **Contact details of the project leader in case you have a question or comment that you would like to share with us (INTERVIEWER HAND OVER CARD WITH CONTACT DETAILS)**
- **(THE INTERVIEWER WILL DIAL THE NUMBER PROVIDED BY THE RESPONDENT USING THEIR CELL PHONE TO CONFIRM THAT THE NUMBER HAS BEEN RECORDED CORRECTLY.)**

**NOTE: HAVING READ THE DOCUMENT AND ONCE THE PARTICIPANT HAS SIGNED THE AGREEMENT SHEET(S), SKIP TO THE FINAL PART OF THIS DOCUMENT, “INCECON”. READ INSTRUCTIONS CORRESPONDING TO THE INCECON GROUP INDICATED AT THE TOP OF THE QUESTIONNAIRE.**

#### **INCECON**

##### **DEPENDING ON GROUP**

- **ONLY FOR QUESTIONNAIRES IDENTIFIED AS: GROUP A (Zero):** Skip directly to **CLOSE AND FAREWELL STATEMENT** section.
- **ONLY FOR QUESTIONNAIRES IDENTIFIED AS: GROUP B (20.00 Lps):**
  - To express our appreciation for your participation, 20.00 Lps worth of minutes will be added to your cell phone account for each survey that you complete. Remember that each survey will contain a maximum of 10 questions. After responding to all questions for the month, we will add minutes to the value of 20.00 Lps to your account.
  - The corresponding amount of minutes will be available on your cell phone on the Friday following the last question answered that month.

- For this amount to be credited, you must answer all the questions received.
  - This amount is only offered as a gesture of appreciation for your participation, and in no way constitutes payment.
  - **INTERVIEWER: GO TO CLOSE AND FAREWELL STATEMENT**
- **ONLY FOR QUESTIONNAIRES IDENTIFIED AS: GROUP C (100.00 Lps):**
- To express our appreciation for your involvement, 100.00 Lps worth of minutes will be added to your cell phone account for each survey that you complete. Remember that each survey will contain a maximum of 10 questions. After responding to all questions for the month, we will add minutes to the value of 100.00 Lps to your account.
  - The corresponding amount of minutes will be available on your cell phone on the Friday following the last question answered that month.
  - For this amount to be credited, you must answer all the questions received.
  - This amount is only offered as a gesture of appreciation for your participation, and in no way constitutes payment.
  - **INTERVIEWER: GO TO CLOSE AND FAREWELL STATEMENT**

**CLOSE AND FAREWELL STATEMENT**

**Mr./Ms. \_\_\_\_\_ (Full name).**

**We would once again like to thank you for your valuable participation in this very important project. Please remember that we will be in contact again in approximately one week. THANK YOU, YOUR PARTICIPATION IS VERY IMPORTANT**