

ESTIMATING DOMESTIC TOURISM EXPENDITURE IN DEVELOPING ECONOMIES: LESSONS FROM INDIA ¹

Dr. Pradeep Srivastava ²
Dr. Rajesh Shukla ³

Abstract: The central motivation for this paper is quite simple: any idea, howsoever good, is ultimately only as good as its implementation. As a result, the extent to which adoption of the TSA framework can actually succeed in its central objective -- credible estimates of the tourism sector that can be internationally comparable -- will depend critically on the way the TSA is implemented across *all* countries of the world. As in any statistical enterprise, there is many a proverbial slip between the cup and the lip. Thus, it is our firm belief that having evolved a consensus on the conceptual framework, a critical next step lies in implementation, in ensuring the most reliable generation of data that reflect the concepts underlying TSA.

Our focus is on two central albeit inter-related questions. First, how should data on domestic tourism be generated? This is a difficult question even in the context of OECD economies, but more so in developing countries with different institutional infrastructure and resource constraints.

Second, we also seek to address the issue of *credibility*: in a sense the *raison de etré* of the TSA framework. More specifically, we seek to evaluate based on the Indian experience different possible models of an inter-institutional platform that can contribute to enhancing credibility of the TSA in a developing country context.

Index

Introduction
Household budget surveys in India
Survey of Domestic Tourism
Issues in context of developing countries
- Sample frame and sampling design
- Role of training
- Day tourism
- Logistical issues
- Inter-institutional platform
Lessons and concluding remarks

¹ We thank Antonio Massieu for useful comments on an earlier draft and to Anjali Malhotra for research assistance. We are responsible for any errors in the paper. The views expressed here are of the authors and do not necessarily reflect those of the NCAER.

² Chief Economist, National Council of Applied Economic Research (NCAER)

³ Senior Statistician, National Council of Applied Economic Research (NCAER)

INTRODUCTION

Rigorous and credible measurement of the economic impact of tourism has received a major fillip with the development of a new international standard, namely, the Tourism Satellite Account (TSA). New guidelines on the TSA were approved by the United Nations Statistical Commission in 2000 and an increasing number of countries around the world are seeking to develop TSAs for their respective economies.⁴ Implementation of the TSA is in different stages across countries, being relatively the most advanced in some OECD economies.⁵ With growing number of countries, at various stages of development, seeking to integrate the TSA into their national statistical systems, “scaling up” the application of the TSA framework in face of diverse operating environments is likely to present significant challenges.

The central motivation for this paper is quite simple: any idea, howsoever good, is ultimately only as good as its implementation. As a result, the extent to which adoption of the TSA framework can actually succeed in its central objective -- credible estimates of the tourism sector that can be internationally comparable -- will depend critically on the way the TSA is implemented across *all* countries of the world. As in any statistical enterprise, there is many a proverbial slip between the cup and the lip. Thus, it is our firm belief that having evolved a consensus on the conceptual framework, a critical next step lies in implementation, in ensuring the most reliable generation of data that reflect the concepts underlying TSA.

The objective of this paper, therefore, is to contribute at a methodological level to the development of TSA accounts, particularly in the context of developing countries. Our focus is on two central albeit inter-related questions. First, how should data on domestic tourism be generated? This is a difficult question even in the context of OECD economies, but more so in developing countries with different institutional infrastructure and resource constraints. In addition, in many developing countries the implementation of TSA is starting almost *ab initio*, at least at a methodological level, because they lack reliable data both on quantity, i.e., number of tourists, and also expenditures incurred by them. In addition, there are also a number of issues related to how exactly to “translate” (both at the level of the questionnaire⁶ and the respondent) the concepts underlying the TSA framework into a rigorous statistical exercise. We use recent experience in generating domestic tourism data in India’s development of a TSA to address some of these issues.

Second, we also seek to address the issue of *credibility*: in a sense the *raison de être* of the TSA framework. More specifically, we seek to evaluate based on the Indian experience different possible models of an inter-institutional platform that can contribute to enhancing credibility of the TSA in a developing country context.

⁴ United Nations, World Tourism Organization, Organisation for Economic Cooperation and Development and Commission of the European Communities (Eurostat) (2001). *Tourism Satellite Account: Recommended Methodological Framework*. United Nations, New York.

⁵ Canada, OECD and the WTO undertook pioneering efforts in the development of the methodological framework for the TSA.

⁶ For example, due to relatively higher levels of illiteracy in a developing country context, it is particularly important to differentiate between a “schedule” that needs to be canvassed in person and a “questionnaire” that can be given to a respondent.

The outline of the paper is as follows. We start in section II with a description of household budget surveys (HBS) in India, since HBS constitute one possible mechanism for estimating domestic tourism expenditure. The analysis in section II seeks to assess the extent to which a “tourism module” in the HBS could be used to elicit information on domestic tourism. Development of the TSA in India has been based on a dedicated survey of domestic tourism instead of using a module in the HBS. Consequently, section III presents a brief description of the survey, its design, structure and implementation. Specific issues emerging in the course of undertaking the domestic tourism survey in India that might be of relevance to those implementing TSAs in other countries are discussed in section IV. Finally, this discussion is used in section V to draw lessons for other countries, particularly developing economies, seeking to undertake data collection on domestic tourism.

HOUSEHOLD BUDGET SURVEYS IN INDIA

In India, as in most developing countries, policy making even today sometimes operates in a relative data vacuum, since the demand for data of different types on part of policy makers far exceeds the supply feasible from available resources. Shortly after independence, the Government of India established the National Sample Survey Organization (NSSO) in 1950 to undertake large-scale sample surveys in the country, which has to date undertaken 56 rounds of annual all-India surveys. However, given the perennial excess demand for data, the NSSO surveys have focused on a number of socio-economic issues including consumer expenditure, employment-unemployment, literacy, morbidity, disability, housing, debt and investment, land holdings, migration, enterprise surveys, etc.

Despite this diversity, it is also true that household budget surveys (HBS) occupy the pride of the place amongst all NSSO surveys since they help assess one of the most important attributes of India’s economic development, namely, the extent of poverty in the country.⁷ Household consumer expenditures were covered in many rounds including the 1st to the 18th Rounds (1950-63), 26th (1971-72), 27th (1972-73), 28th (1973-74), and 29th (1974-75). A quinquennial series of all-India surveys on consumer expenditure and employment-unemployment was started from the 27th round after which 5 quinquennial surveys were undertaken: 32nd (1977-78), 38th (1983), 43rd (1987-88), 50th (1993-94) and 55th (1999-2000). In order to get consumer expenditure data on a regular basis, an annual series of surveys was started in the 42nd Round (1986-87) along with other subjects of enquiry as their focus.⁸ *However, in contrast to the quinquennial surveys, the annual surveys are based on “thin” samples.*

⁷ The HBS focus on household consumption expenditure, which is then combined with a poverty line to determine households below poverty. Earlier surveys by NSSO, in 1950s and 1960s also attempted capturing household incomes but these results were not very successful, resulting in substantial underestimation of reported incomes, often far below reported consumption.

⁸ The overwhelming focus on quinquennial HBS and poverty in the Indian context is also underlined by the fact that much public debate in the country since 2000 has centered on whether or not poverty has declined between the Rounds 50 and 55. This period, during 1990s, was characterized by adoption of dramatic policy reforms and economic liberalization. Despite a sharp decline in poverty measures in the 55th round, data are not strictly comparable due to significant changes in reference/recall period used in the two surveys. These changes were made on the basis of experiments tried in thin samples of Rounds 51-54 regarding reference period for categories of food expenditures.

The history of HBS in India and its central role in a profoundly politically sensitive issue – poverty in the country – are perhaps not unique and may find parallels in other developing countries. From the point of view of generating data on domestic tourism, this discussion raises an important question: can HBS with a riveting focus on measuring poverty also be used to estimate tourism data through a separate module? Would the tourism module(s) be treated at par in the implementation of the survey (e.g. in terms of the stratification criteria in the sampling design, interviewer training, questionnaire design, implementation of interviews in face of respondent resistance, etc.) with other parts of the HBS focusing on poverty-related household expenditures?⁹ Further, specifically in the Indian context, would the tourism module be part of the quinquennial survey focusing on poverty assessment, or would it be a part of the other years that use a “thin” sample (and are thus not treated as “seriously” as the quinquennial surveys with thick samples)?

In the past fifty years, only one NSSO round -- the 54th Round (Jan-June 1998), based on a thin sample -- contained a tourism module along with additional modules, including on (daily) commuters and on the use of mass media by households.¹⁰ The survey estimated the rate of occurrence of journeys per household and per person for both rural and urban areas separately, as well as at states’ level. It also provided data on the mode of journey, including travel on foot, bicycle, hired animal, bus, rail, own car, air, etc. In addition, the survey also identified the purpose of the trip. Eight purposes were identified: business, leisure, pilgrimage, social function, study, sports, medical, other.

The definitions used in the survey, preceding efforts by the Government of India to implement a TSA, were quite understandably not totally consistent with those used in the TSA framework. For example, while business travel is unambiguously a part of domestic tourism, travel whose main purpose is exercise of an activity remunerated from within the place visited is excluded from the definition of tourism in the TSA. The NSSO survey did not allow this distinction since it defined business to mean “work connected with people’s gainful occupation”. To make the problem worse, the Hindi version of the questionnaire translated “business” into “vyapar”, meaning “trade” that has a distinctly different meaning. Similarly, in terms of purpose of trips, the category “others” ended up as by far the largest of all categories for travel.¹¹ Finally, the survey, while covering the quantity of trips, their mode of travel, duration, purpose etc., made no attempt at estimating domestic tourism expenditures (aside from estimating some components of transportation costs).

⁹ Of course, tourism expenditures are part of total household expenditures; but with important differences. For example, the product classification in HBS would typically only pick up tourism expenditures related to typical tourism industries, not others. The seasonal features of tourism expenditures are also ill suited to HBS, which typically adopt a smaller reference period that is then extrapolated to annual numbers. In addition, HBS record expenditures based on respondents’ place of residence, while tourism expenditures would be defined as those incurred outside of that geographical location. These are problems that apply even in developed countries seeking to generate domestic tourism expenditure data from regular HBS. For a thorough treatment of these issues, see “*Household Budget Surveys in the preparation of the TSA*”, Juan M. Pérez Mira, Enzo Paci Papers on Measuring the Economic Significance of Tourism, Volume 1, WTO-OMT, 2000.

¹⁰ This again highlights the state of excess demand for household data relative to available supply in the country. Note that this 54th NSSO Round based on thin sample was about 1/8th of the sample size used in the survey of domestic tourism currently being undertaken, and discussed in the next section.

¹¹ For more details, see “*Developing a TSA for India*”, NCAER, New Delhi, May 2001.

In sum, therefore, despite a vigorous and rigorous national statistical system that included regular HBS over the past fifty years, the Indian context illustrates some important issues in assessing the role of HBS in generating domestic tourism data. These include the relative scarcity of resources, leading to conflicting demands on available resources for data generation, the overwhelming focus on poverty related issues, and the resulting implications for efficacy of any tourism modules in the HBS to generate the requisite data.

SURVEY OF DOMESTIC TOURISM

The Ministry of Tourism and Culture (MoT) commissioned a dedicated survey of domestic tourism in India in May 2002, to be undertaken by the National Council of Applied Economic Research (NCAER), an organization almost fifty years old with long experience in conducting national and household surveys for both the Government and foreign sponsors. Given its track record and proximity to the government, as well as recognized independence, NCAER could be an integral part of a credible institutional platform for developing India's TSA (without being a part of the government *per se*). To further bolster the credibility of the tourism survey, the MoT constituted a Technical Advisory Committee that included representatives of the NSSO, the National Accounts Statistics (NAS), MoT, Government of India and NCAER. The advisory group had a strong role in, *inter alia*, the sampling design that was adopted for the survey. In addition, other issues such as scope of the survey, concepts and definitions to be used, sample methodology, content of questionnaire, etc. were also discussed within the advisory committee at the very outset of the survey.

The all-India survey of domestic tourism had two objectives: to estimate total number of domestic tourists and trips by different purposes of travel, and to estimate domestic tourism expenditure.¹² The survey methodology and sampling design adopted is quite similar to that used by the NSSO in its HBS, but also distinguished by the need to incorporate important aspects of tourism activities. For example, domestic tourism is greatly affected by factors such as seasonality and socio-cultural traits. Cross-section data generated through a single point survey (as in a HBS) would not be able to capture any impact of such parameters. Instead, a repeated survey over a period (half yearly) enabling generation of longitudinal data was decided upon. Thus, the survey period was divided into two sub-rounds, each with duration of six months, the first from January to June 2002 and the second from July to December 2002.

Second, the domestic tourism expenditure survey is a household survey but, unlike an HBS, the ultimate unit of selection is a tourist household. Consequently, a list of tourist households (sampling frame) is a prerequisite to selecting the representative sample (tourist households) from which to collect the desired information. The sampling frame should be up-to-date and free from errors of omission and duplication (which is particularly problematic). In developing countries like India, such sampling frame is neither readily available nor can it be easily prepared since developing new

¹² The survey lists all members of the selected households as well as the number of tourist trips (zero or higher) undertaken by each in the previous 2 months and 6 months. This allows differentiating between number of trips (which are additive) and number of tourists within the household. Expenditure details are collected for all trips in the previous 60 days as well as (greater details) for two latest trips.

frames is an expensive proposition. The survey design adopted a three-stage stratification in which a ready-made frame could be used at least for the first two stages, and a sampling frame developed in the last stage (discussed below). The same sample design was adopted for both rounds, with respect to coverage, stages of selection, stratification variables and sample size. In other words, primary data were collected from the same villages and urban blocks during both rounds. This was done in a view to keep costs low without any significant loss in precision.

NCAER's experience with socio-economic surveys in India has been that, more than the total sample size, it is the geographical spread over the country that is more important from the point of view of statistical efficiency of estimates. This applies perhaps even more so to tourism, whose distribution across the population is likely to show large degree of heterogeneity. Consequently, a notable feature of the survey design is that the sample of tourist households was selected from a wide cross-section of households in the country, covering both rural and urban areas, with the objective of enhancing the precision of the estimates. The rural sample for the survey were selected from a representative number of districts from across the country, while the urban sample covered a range from big metropolitan cities to small towns with populations below 5000. Box 1 provides more details on selection of the rural and urban samples.

Box 1: Sample Selection

Selection of rural sample:

Over 70 percent of India's population live in about 600,000 villages spread over 550 districts in 32 states. To provide adequate geographical coverage of sample tourist households within a state, the districts were cross-classified by rural population and income from agriculture to form homogeneous strata. The number of such strata in a state was determined on considerations of the range of the stratification variables and the resulting frequency in each stratum. From each of effective strata a pre-assigned number of districts, depending on the size of the stratum, were randomly selected. A total number of 221 districts were selected as the first stage and the distribution of number of sample districts among various states was done in the proportion of rural population of the state in 2001 (Census 2001).

Villages formed the second stage of selection procedure. District-wise lists of villages are available from census records (Census 1991) along with population. About 2 to 6 villages were selected independently from each sample district by adopting probability proportion to rural population of the village. A total of about 856 villages were covered for the study.

The households in the sample villages were listed through specially designed listing proforma by asking questions about all members of households on auxiliary information related to the study such as household composition, Individual member's age, gender, education, occupation, income, visited some place as tourist in the last 60 days. Also, during the listing, the information on purpose of trip and number of trips made by all members of tourist households during last 6 months was asked. The list of tourist households was used as sampling frame to select a tourist household to collect the detailed information for the domestic tourism survey. To ensure adequate representation from various tourist purposes, the listed tourists in the sample villages were stratified into the nine categories (purposes). A maximum of 10 tourists was systematically (circular) selected from each sample place and distributed among various categories (strata) in the proportion of total tourists listed in each of the non-empty stratum.

Box 1: Sample Selection

Selection of Urban sample:

The selection process for tourist households in the urban areas was similar to that in rural areas.

According to the 2001 census, there are about 4,850 cities/towns in the states/Union Territories (excluding Jammu & Kashmir) of India. The population of cities/towns in India varies from less than 5000 to over 10 million. There are 64 cities with population exceeding 1 million. All these cities were selected with a probability one. The remaining cities/towns were grouped into seven strata on the basis of their population size and from each stratum a sample of towns was selected independently.

A progressively increasing sampling fraction with increasing town population class was used to determine the number of towns to be selected from each stratum. The sampling fraction was used at the state level.

In all, 687 cities and towns thus selected constituted the first stage of sample for urban areas. These accounted for about 15 per cent of the total cities/towns of the country but more importantly, cover a major part of the urban population.

The NSSO Urban Frame Survey (UFS) block maps were used to select urban blocks. A sample of such blocks was selected independently from each sample city/town and constituted the second stage unit for the urban sample. The number of blocks from each city/town thus selected varied between 2 and 60, depending upon the size of city/town and the total number of such blocks.

As in the case of the selected villages, all households in the selected urban blocks were listed, stratified and then sample of tourist households were selected.

While the first two stages of stratification in the survey used pre-existing sampling frames (see box 1), the survey developed a sampling frame of tourist households at the third and last stage. This was done by undertaking a listing of all households in the selected sampling area, which were then stratified using nine purposes of travel, from each of which households were then selected at random. Developing the sampling frame at the third – household selection – stage did add some costs to the survey, but it was deemed as highly desirable for two reasons related to the intrinsic nature of tourism. First, the distribution of various tourists is far from homogeneous across any population, particularly in rural areas of India, and therefore adoption of a sample design (through listing in this case) to select a representative sample is very crucial. Second, and related, the distribution of tourists across purposes of travel is highly skewed in India (according to the NSSO survey that found an overwhelming concentration of tourists in two categories of travel – travel for social purposes and ‘others’). Given the skewed distribution, the listing at the third/household stage would ensure statistically adequate representation of low-frequency purposes of travel (such as for medicine, study, etc.) while attempting to estimate tourism *expenditures*.

The interviewers were provided training for a period of five days, both in canvassing the listing proforma and the household schedule. The training was deemed necessary in view of the types of concepts entailed in understanding and explaining domestic tourism, and it also enabled the interviewers to better communicate problems in the field to supervisors and survey managers, and to comprehend the feedback. In addition, the training also served another important role in improving the survey performance in the Indian context: the presence of senior researchers contributed strongly to increasing the motivation and dedication of the investigators. The role of training is an issue that, based on our experience with this survey, is likely to be of importance in other developing countries where surveys utilize schedules rather than questionnaires, and we return to this in the next section.

ISSUES IN CONTEXT OF DEVELOPING COUNTRIES

We attempt in this section to review some “nuts-and-bolts” aspects of the domestic tourism data generation in India that we believe would also be of interest more broadly, particularly to other developing countries seeking data generation for domestic tourism. Subsequently, we move to a related issue, namely, assessment of alternative models of inter-institutional platform adopted for developing the TSA. One proposed model used in many countries relies on cooperation between the Ministry of Tourism, government statistical agencies and the central bank or a planning commission. However, given resource constraints and an established history/mindset of ignoring the tourism sector’s potential, it is possible specific government agencies in developing countries might prefer the choice made famous by Sam Goldwyn of MGM Studios, i.e., “include me out”. We use the Indian experience to explore other possibilities in this context.

Sample frame and sampling design

At the outset, two possible options were considered for generating data on domestic tourism for developing the Indian TSA. One choice would be to use quantitative estimates of number of tourists of different types from an earlier NSSO survey (referred to earlier), and generate data on tourism expenditures only. Focusing on places with a conglomeration of tourists of different types, such as hotels and various categories of tourist attractions could be used to achieve the latter objective. The biggest advantages of this particular approach included minimizing non-sampling errors related to a long recall period on part of respondents, who would be in the midst of undertaking these expenditures. More importantly, this approach was much more economical, about half the cost of the alternative approach, namely, a household expenditure survey.

However, while this approach would generate good data on expenditures related to certain categories of domestic tourism, such as business travel, leisure, pilgrimage and even medical, it would not be able to capture well domestic tourism related to social purposes and the residual “others” category. From the available evidence (i.e., the NSSO’s 54th Round), the latter two constituted the largest two categories (reasons) of domestic tourism, accounting for more than half of all relevant travel. In addition, as already discussed earlier, the quantitative estimates of domestic visitors by different categories in the NSSO survey had significant conceptual problems in terms of consistency with the TSA framework. As a consequence, after substantial deliberations in the Advisory Group of the survey, it was decided to adopt a household survey of domestic tourism that would estimate the number of tourists of different types in the country as well as their expenditures. The decision reflected the conviction that a household survey dedicated to domestic tourism would have superior cost-benefit profile despite costing almost twice as much as the alternative considered.

An inevitable constraint to any sampling methodology considered for the survey was absence of suitable, pre-existing sampling frames. As discussed in the previous section, the available sample frames are likely to be quite old and typically inappropriate for the purpose at hand. The approach adopted in this survey was to use a multi-stage sampling design that used existing frames for two stages but

developed a sampling frame for the last stage. In so doing, the sample design effectively incorporated two surveys in one: in the household stage, a random sampling unit was listed to generate the requisite sample frame, which was then stratified suitably to randomly choose households for canvassing the household expenditure schedule. In our estimate, the additional cost of the third stage (i.e., generating a sampling frame rather than choosing households randomly) is roughly a third (30-35%) of the total cost in the Indian survey.

This is a significant cost addition, but is well worth it when contrasted with the benefits. These include the substantially enhanced efficiency of the estimates. Given weak priors about the distribution of the variables of interest (in this case tourist trips and expenditures) in the population, a random sample without a sampling frame would have high levels of variance. This context is, in our opinion, applicable not just to India but most developing economies with underdeveloped pre-existing data on domestic tourism. An additional advantage of the listing of the sample frame is that it allows a second estimate of number of tourists by different categories (in addition to that obtained from the household schedule), thus enhancing the assessment of consistency and validation of the data obtained. In addition to developing an appropriate sampling frame and enhanced precision of estimates, the short (two-page) listing schedule allowed collection of basic socio-economic profile of all listed households - almost 800,000 in this case -- whether or not they undertook domestic tourism expenditure. The resultant data will also be invaluable in microeconomic analyses of household decision making related to broad range of hypothesis about tourism-related activities and expenditures in the country (apart from helping develop the TSA). For all these reasons, we believe this approach, multi-stage stratification combining developing a household frame listing socio-economic attributes of tourist and non-tourist households with canvassing of tourist households for expenditures, would be particularly recommended in countries where data availability is poor for both number of tourists and expenditures by tourists.

Role of training

The term "tourist" to an average person in India typically has connotations of North Americans and Europeans, "hippies" and businessmen, i.e. international visitors. To a lesser extent, at least the more informed would also include domestic visitors to specific "tourist sites" within the country. Preconceived notions about tourism are thus very narrow. The notion that business travel or trips to attend marriages in extended family are also part of tourism is alien to most people.¹³ As a consequence, rigorous training of the investigators who would canvass the survey schedules was accorded one of the highest priorities in the survey. The main objective of the training was to ensure that not only were the investigators thoroughly comfortable with the schedules and the underlying concepts but, perhaps more importantly, they could convey the same to respondents who even if cooperative might be uninformed and also in many cases illiterate.

¹³ Indeed, even the Government of India's definitions of domestic tourists excluded until recently certain categories of domestic travel, including travel for social purposes, which it appears from existing data is the most important reason underlying domestic tourist trips. For more details, see *"Developing a TSA for India"*, NCAER, New Delhi, May 2001.

Both rounds of the survey incorporated an emphasis on training. Training was provided to supervisors of field investigators for a period of 7 days in the first round of the survey. As part of cost containment, the survey design incorporated a continued role in the second round of the survey for supervisors that performed well, while leaving at their discretion the choice of field investigators in each round. Consequently, while there were some changes amongst supervisors between the two rounds of the survey, there was a higher rate of turnover amongst the field investigators or interviewers. In addition, there were two other significant difference between rounds 1 and 2 of the survey: inclusion of a module on day tourism and exclusion of other modules of another survey “piggy-backing” on the domestic tourism survey (both are discussed more below). Finally, given the year-long duration of the survey, with substantive gap between the two rounds, it was also felt that motivation at all levels would respond to commitment and dedication shown by researchers and survey managers. Frequent interactions between managers and field staff, including sustained and intense periods of training, was thus also viewed as desirable for improving motivation and morale.

For all these reasons, another round of training was conducted prior to the second round of the survey. The training in the second round was differentiated from that in the first in that it consisted of two parts, namely, training of the supervisors, and another round of “on-site” training, in different parts of the country, of the actual investigators who would canvass the survey schedules under supervision. Based on our comparison of the two rounds of training, we believe the approach adopted in the second round, training the supervisors and subsequently training the investigators, is a superior model to follow than relying on transmission of concepts and methodology through intermediaries (as done in the first round). This is primarily due to the novelty for the field staff – supervisors as well as investigators -- of the concepts underlying tourism and the TSA. In addition, our training sessions in different parts of the country revealed immense underlying diversity of practical experiences and problems in the field faced by investigators, all of which needed to be dealt with in a manner consistent with the TSA framework. Delegation to supervisors, and through them to investigators, helped reduce survey costs, while the recommended model of training minimized dilution of data quality in the course of cost minimization.

Day tourism

Same-day visitors occupy a special place in the TSA framework, which recommends that countries starting implementation of TSA could consider postponing data generation of this activity to later stages. The feasibility study for implementation of TSA in India had concurred with this recommendation while noting that day tourism in the country was growing exponentially.¹⁴ The initial conceptualization of the domestic tourism survey therefore excluded day tourism from its ambit. However, by the time the second round began, the MoT for various reasons wanted to include day tourism into the on going survey and a separate,

¹⁴ *Ibid.*

small module on day tourism was accordingly added at the end of the household schedule. *The inclusion of a day tourism module in the tourism survey provides an interesting experiment that can be viewed as analogous to including a tourism module in a HBS.*

Conceptually, at least in terms of implementation, tourism and day tourism are like apples and oranges, with very different conceptualization, particularly of the “usual environment”. The sampling design and methodology continued to be defined by the need to capture tourists but a separate module on day tourism was added to the survey schedule. It was feared that “switching gears” in the course of canvassing interviews, from tourism defined on the basis of at least an overnight stay away from the usual environment to day tourism, would be problematic. These concerns were reinforced during the second-round training where supervisors and investigators took considerable time digesting the difference between domestic tourists and day visitors. However, we were encouraged by the intense and enthusiastic discussion, debate and dialogue, triggered by introduction of the nuances of defining usual environment for day tourism. Defining ‘usual environment’ for day tourism is not easy and we ourselves learnt a lot about adapting it to the Indian context from the training discussions fueled by perceived/visualized situations pointed out by trainees.

In particular, during our training, it became evident that no single criterion such as distance, frequency of trips, purpose of trips, etc. would be able to capture day trips “outside of the usual environment”. Instead, the starting point would be to try and gauge what was usual or, more broadly, part of a routine for the respondents. The interviewers were then asked to focus on trips that deviated from established patterns of respondents’ day travel. This approach was refined using innumerable examples with discussions during the training.

A more thorough understanding of the impact of including a day tourism module in the survey will take some time, during which the survey data would need to be analyzed. However, at this stage, we are reporting results of a feedback survey we implemented, soliciting from supervisors (who in turn consulted with their field investigators) their views about implementing a day tourism module in the second round of the survey and other issues. (The field-level feedback is summarized in Box 2).

The responses by field staff indicate that on the whole inclusion of day tourism with usual tourism questions was difficult to implement. Since the short module on day tourism was attached to the end of the survey, data quality on the tourism questions did not suffer though the same cannot be said for data collected on day tourism. In addition, the field experience showed substantial problems in capturing day tourism due to specific situations characterizing the respondents. For example, many households especially amongst poorer ones typically combine a number of different purposes in a day trip to cut down on transportation costs and time. Thus, in the same trip they may visit a doctor, family relatives, purchase goods, perform religious rituals, do sightseeing, etc. Similarly, for household trips, what may be usual environment for some household member(s) may not be so for the others.

Box 2: Summary feedback on implementation of tourism schedule (and day tourism module) from field investigators

1. There was a conceptual problem in visualizing the concept of same day tourism that had to be distinguished from routine travel undertaken. To cite examples, it was sometimes difficult to explain to respondents the fact that a visit to the local market and regular visits to a hospital will not be classified under same day trips. This problem of subtle distinctions was addressed by detailed explanations and clarifications by field interviewers to the respondents.
2. As a sequel to the point above, there was a need to emphasize '*away from usual environment*' in defining a same day tourist to clearly differentiate from a domestic tourist. This entailed demarcation between '*usual environment*' and '*away from usual environment*', which was confusing in some cases as the duration and distance for same day trip are usually very small.
3. The inclusion of a separate day tourism module right at the end of the questionnaire aided in its clear demarcation from domestic tourism. This ensured that the quality of data obtained in the rest of the survey was not adversely affected.
4. There was a problem with illiterate respondents in some areas.
5. It was difficult to get absolutely reliable data in the component "business" for day tourism because people travel such a lot on business that it is difficult sometimes to enumerate the same for one month's time (in this case, data for day tourism was collected for December 2002). They also combine entertainment, social or sometimes religious trips with their business ones and hence it becomes more difficult.
6. In many cases the respondents had supporting bills for study/sports, medical and business categories (by purpose of travel), thus providing more reliable results compared to travel undertaken for social trips, leisure/holiday and religious/pilgrimage purposes.
7. According to the feedback received, it was in some cases difficult to demarcate expenditure by different members of the household when these trips were undertaken in groups.
8. Also, when the respondent had to give details about expenditures incurred by other members of the family who had been on same day trips, accurate data could not be reported.

Logistical issues

As noted above, the two rounds of the domestic tourism survey also differed in that the first round had several other modules of another survey included, while the second round was purely a survey of domestic tourism (albeit with a module on day visitors). Thus different parts of the same organization (in this case: NCAER) were stakeholders in the first round while the second round had only one stakeholder within the organization (excluding stakeholders outside of the organization/institution). This is an important issue relevant to inter-institutional cooperation (discussed next) since, even within a single organization, our experience was that different intra-organization stakeholders had a diversity of "ownership" in the survey, and also different levels of commitment to the quality. These differences became evident in the contrast between the two rounds of the survey, in terms of the timeliness of activities, monitoring and supervision, focus on quality, and most importantly, overall commitment to the output.

The significance of these considerations lies primarily in the implications for *inter-institutional cooperation* in building a TSA platform in developing countries. The underlying question raised by these concerns is, even within a vertically integrated structure (e.g., an organization or the government), who will have ownership of the process and the product? By ownership we also mean attention to detail, commitment, sincerity, discipline and all other such components that ensure timely delivery of the highest quality of output. At one level, these issues may have limited relevance in developed countries where institutional infrastructure exists that incentivizes “professionalism” that, in turn, ameliorates the problem of ownership. However, in a developing country, the absence of such an institutional infrastructure manifests itself in the problem of ownership (as defined above) even *within* an organization. These problems are likely to be multiplied manifold when we consider the issue of an inter-institutional/organizational platform in developing a TSA in industrializing economies: an issue we turn to next.

Inter-institutional platform

To enhance the credibility of the TSA developed in any country, a “good practice” recommendation is to build an inter-institutional platform of government agencies that will develop the product. These would naturally include the national tourism authority, government statistical agencies, as well as possibly other institutions such as the central bank or planning agencies. This is an eminently sensible model and is already in use in many countries developing their TSAs.

But, what if this is not feasible for any reason? In many developing countries, the tourism sector historically has been viewed in a very narrow scope, and accorded relatively lower priority in the development “pecking order”. Often this is a reflection of not fully appreciating the contributions of the sector to the economy, and the situation will likely improve as countries develop their TSAs. At this stage, however, the problem may be likened to the proverbial “chicken and egg”. Further, it is also true that there are strong demands on government statistical agencies for data generation on diverse socio-economic issues, implying substantial existing load on these agencies. Combined with fiscal austerity being practiced (or at least attempted, one may say) in most developing countries, undertaking substantial additional data collection may not always be feasible for government statistical agencies.

In India, as noted, generation of data on domestic tourism was entrusted by the Ministry of Tourism and Culture to the National Council of Applied Economic Research (NCAER), a reputed organization with long experience in conducting national and household surveys for both the Government and foreign sponsors. NCAER is an independent research organization with high levels of credibility both within the country and outside. However, despite outsourcing data collection as well as the development of the TSA, the government did introduce an inter-institutional platform in the form of an advisory group or the Technical Advisory Committee that

included representatives of the NSSO, the National Accounts Statistics (NAS), MoT, Government of India and NCAER.¹⁵ There are also plans to expand this platform by inducting representatives of the central bank once data collection is over and the process initiated to construct the TSA.

In our view, this model – what may be called *advisory* inter-institutional platform in contrast to the *implementing* inter-institutional platform – could be a possible alternative in some countries. The crucial issue that needs to be addressed by the platform, of either kind, is to ensure ownership of the TSA by the government.

LESSONS AND CONCLUDING REMARKS

The Indian experience in developing a TSA is distinct for at least two reasons: first, the Government has commissioned a dedicated survey of domestic tourism and, second, the responsibility has been entrusted to a non-government organization, albeit one that is respected and has high credibility. These distinctions, virtually by definition would also constitute caveats in any attempt at generalizing to a broader context.

Given these caveats, this paper has used the experience of domestic tourism data generation in India to highlight issues that may confront other countries undertaking similar processes. Household budget surveys, although active in India, are undertaken only once every five years on large samples, and on thin samples in other years. Since data already existing was relatively old, scarce and not readily amenable for use in a TSA, it was decided to undertake a dedicated household survey of domestic tourism. The survey would measure both number of tourists of various types and their expenditures.

The sampling design adopted recognized the heterogeneity of distribution of tourists in the population and weak priors on this underlying distribution. Consequently, the survey developed a sampling frame in the last stage of its multistage stratification, with the belief that the higher costs would be more than made up by the benefits in precision of estimates and other factors. In view of seasonal nature of tourism, the survey was undertaken in two rounds during the reference period of one year.

The survey methodology put considerable emphasis on the role of training, which was found extremely useful in negating preconceived (and ill informed) notions about tourism in the general population, conveying accurately to investigators and respondents concepts and definitions underlying TSA, and enhancing enthusiasm and motivation in the investigators.

Although domestic tourism and day tourism have substantial conceptual differences, a module on day tourism was included in the second round of the survey. Operationalizing the concept of “usual environment” was not easy but was attempted by ensuring no single indicator – such as distance, frequency, etc. – was used. Instead, the emphasis was laid on identifying what was usual and in some

¹⁵ The same group is also advising implementation of an International Passenger Survey.

sense routine, and then looking for deviations from that. It is doubtful if day tourism could have been included in the survey without extensive training (of both supervisors and investigators) that incorporated debates, discussions, and clarifications with numerous examples. At the same time, the experience suggests combining day tourism with a regular household survey of domestic tourism may not always be desirable. In addition, measuring day tourism will require adapting the core concepts to the specific patterns of household behavior in each country, particularly in case of developing economies.

Finally, the paper draws attention to the inter-institutional platform underlying the generation of tourism data in India and the process of construction of the TSA, differentiating between advisory versus implementing inter-institutional platform. Countries, particularly developing ones with over stretched resources, may find the advisory platform adopted in the Indian case of interest.