

SOME SUGGESTIONS REGARDING THE 1951 INDIAN CENSUS QUESTIONNAIRE*

By P. MUKHERJEE

Statistical Laboratory, Calcutta

The Y-sample† (a 2% sample of enumeration slips of the 1941 Indian Census) tabulations undertaken by the Indian Statistical Institute gave the author an opportunity of examining the quality of the 1941 Census returns; and it appeared to him that a statistical analysis of the nature and extent of the defective returns may be of value in connection with the forthcoming census by way of directing attention to the necessity of providing better instructions to enumerators and closer supervision of the work, at least in respect of the items which are most liable to error.

An analysis, therefore (restricted to the Y-sample of three sub-divisions of two different districts of the province of Bombay), of the census returns was undertaken. Moreover the analysis was confined to the more important items of information, namely, age (Q. 6), dependency status (Q. 9), means of livelihood of persons on whom dependent (Q. 10), unemployment (Q. 12 & 13), means of livelihood of the enumerated person (Q. 14), literacy and education (Q. 20, 21 and 22). From the general experience derived from the handling of several million Y-slips it was found that comparatively larger number of unsatisfactory informations have been usually recorded against these particular questions. Another important question on business in which the enumerated person was employed (Q. 16), although not in general satisfactorily answered, was not taken up for detailed analysis as it was felt that no significant results can be derived as the number of persons employed by another was not likely to be large in the three selected sub-divisions.

The results of this investigation are summarised in table 1. It will be noticed that in all the three sub-divisions under investigation nearly 90% of the slips do not bear age returns correct upto months inspite of specific instructions to that effect. Even granting sufficient allowance for the possibility of enumerators failing to realise the importance of recording a 'zero-entry' in the month-portion of age returns in cases where the persons concerned have just completed a year at the time of enumeration, it may be safely asserted that in 8 out of every 10 slips age returns have at least this type of defect.

*Communicated to the 37th Session of the Indian Science Congress Association.

†As a war-time measure of retrenchment most of the census tabulation work (including the preparation of age-tables) had to be cut down in 1941. But instructions were, however, issued for preserving every fiftieth individual slip in each census area. These slips are called Y-sample slips.

TABLE 1. NATURE AND PERCENTAGE OF DEFECTIVE RETURNS

serial no.	category considered		defects		percent defective*
	description	no. of slips (3 sub-div. combined)	description	no. of slips (3 sub-div. combined)	
(1)	(2)	(3)	(4)	(5)	(6)
1.	all individuals in sample	17,037	age recorded in years only and not upto months	15347	89.5 (89.0, 89.2, 91.6)
2.	all individuals in sample	17,039	for wholly dependents: means of livelihood of person on whom dependent not recorded	4237	24.9 (30.0, 24.4, 25.0)
3.	individuals not in employ- ment according to return against Q.12	6881	whether in search of employment or not and if so, period of search not fully recorded	3048	51.8 (56.5, 52.0, 44.0)
4.	dependents (both wholly & partly) ac- cording to Q.9	12288	means of livelihood not re- corded precisely i.e. no return or full details lacking	7373	60.0 (56.8, 62.3, 57.9)
5.	individuals self-sup- porting and partly dependent according to Q.9	7920	means of livelihood not re- corded precisely i.e. no return or full details lacking	4027	50.8 (52.9, 57.5, 39.2)
6.	literate according to Q.20	3440	not literate in English or no return according to Q.22 but Q.21 indicates otherwise	360	10.4 (14.0, 7.0, 14.9)

The magnitude of another common defect, namely bias towards ages (year portion) which are multiples of 5 can be asserted from the fact that nearly 40% of the individuals returned such ages. Among these cases at least 3 out of every 4 slips must have been wrong.

The defects investigated into the items 2 and 3 of the above table were in the nature of omissions on the part of enumerators to record the requisite information. Whether such failure was due to negligence on their part or due to necessary informations not being supplied by the person interviewed cannot be determined.

In the next two items regarding means of livelihood although there were cases of omission, instances of the use of some vague or general term like "labourer" "service" etc., were rather frequent.

*The figures in brackets show the corresponding percentages for the three Sub-divisions separately.

SOME SUGGESTIONS REGARDING THE 1951 INDIAN CENSUS QUESTIONNAIRE

In the last item there were cases where Q.21 about higher examination passed shows that the person must be literate in English, but Q.22 shows that he/she is not, or nothing is recorded there.

The comparatively high percentage of defective returns against each of the above questions points to the necessity of taking greater care in eliciting the desired information. The author will endeavour in the following to outline his suggested methods for the 1951 Census to indicate among other things how in his opinion the defects mentioned above may be reduced.

The characteristics of the population for which information were collected in the 1941 Census appear to be important enough to find a place in the 1951 Census also. It is possible, however, as will be shown below, to secure all the basic information on these items by a smaller number of questions. On the other hand, the quality of the response can be improved by removing the ambiguity and vagueness in the old set of questions by the substitution of a revised one. Moreover, some minor re-arrangement providing better logical sequence in the 1951 set of questions will go towards greater clarity of thought. Also, the incorporation of an additional question on the economic activity of the population as recommended by the U.N. Population Commission will provide a more complete picture of the economic condition of the population. This question will divide the population into two parts, (1) economically active population under the heads—employers, employees, own-account workers and unpaid family workers, and (2) inactive population under the heads—students, persons doing house-work at home, inmates of penal, mental and charitable institutions and other inactive persons.

The following form of the enumeration slips is recommended; the 1941 enumeration form is also shown side by side for purposes of comparison. In 1941, the questions were not printed on the enumeration slips, at least in the provinces. This does not appear to be a desirable feature, questions should be printed on the slips as was done in the 1941 census of Baroda; this will improve the quality of the returns. Also it is believed that in the forthcoming census greater use will be made of mechanical tabulation, and therefore sufficient space should be left on the right-hand margin for code marking.

suggested form for 1951				1941 form
District	Sub-division	Charge	Space for coding	
1. Name				1. Name
2. Race, Tribe or Caste				2. Sex
3. Religion				3. Race, Tribe or Caste
4. Age				4. Religion
5. Civil Condition				5. Married, Unmarried, Widowed or Divorced
6. Number of Children born to a married woman, (a) male.... (b) female....				6. Age

- | | |
|---|--|
| 7. Number of surviving children of a married woman
(a) male..... (b) female..... | 7. Number of children born to a married woman and number surviving |
| 8. Her age at the birth of first child....
Sex of first child.... | 8. Her age at birth of first child |
| 9. Economic activity..... | 9. Are you wholly or partly dependent |
| 10. Means of livelihood and number of months of the year for which existing—Principal....., subsidiary..... | 10. If so, means of livelihood of persons on whom dependent |
| 11. Number of dependents | 11. Do you employ (a) paid assistant (b) house-hold members. If so, how many. |
| 12. Birth place | 12. Are you in employment now? |
| 13. Mother tongue....., other Indian languages commonly used..... | 13. (Only to those who reply in the negative to question 12). Are you in search of employment? (To those who answer in the affirmative). How long have you been in search of it? |
| 14. How far have you read? If the answer is in the negative, then can you both read and write or read only? | 14. Means of livelihood in order of importance. |
| 15. Are you literate in the national language? | 15. (Only to be asked in respect of person shown to be partly dependent in question 9 or any subsidiary means of livelihood returned by other persons against question 44). Does the means of livelihood exist throughout the year? If not, for what part of the year? |
| | 16. If you are employed by some one else, what is his business? |
| | 17. Were you born in this district? If not, in what district? |
| | 18. Mother tongue |
| | 19. Other Indian languages in common use. |
| | 20. Can you both read and write? Can you only read? |
| | 21. How far have you read? Give any examination passed |
| | 22. Are you literate in English? |

It will be noticed that in the proposed form there is no provision for recording the sex of the individual enumerated. This is unnecessary if, as in Baroda in 1941, forms of separate colours are used to enumerate members of opposite sex. There is a possibility of the enumerators recording the information of male members of a family 'female' slips and vice-versa. But a check on this may be made on the basis of the name of the person in question and by looking into other informations peculiar to each sex.

SOME SUGGESTIONS REGARDING THE 1951 INDIAN CENSUS QUESTIONNAIRE

Only four types of civil condition, namely unmarried, married, widows or divorced were considered in the 1941 census. Separate figures for widows and widowers remarried will add to the existing knowledge of our social conditions. Again, in respect of civil condition as distinct from marital status, sanyashins or monks of some religious order and prostitutes should form separate classes. Taking into account the particular social conventions in our country objections might be raised to include these two items under civil conditions. In that case, these conditions should be clearly noted against the question on means of livelihood.

An extension of the scope of the fertility enquiry may be made in the 1951 Census on the line of the last census of Boarda by splitting up the births into male and female categories, and also by recording the sex of the first child. In addition, the age of the mother at her first confinement, giving rise to a live or still birth (or even an abortion) should be recorded.

Next comes the very important group of questions regarding the economic condition of the population. In 1941, the set of eight questions numbered 8-16 attempted to elicit a wealth of information on this subject but as shown previously the attempt failed, at least in certain respects, to secure the desired objective. The present suggestion embodied in only three questions (Nos. 9-11) will, it is believed, bring us closer to this objective.

The ninth questions in the newly suggested set divides the population into (1) economically active, and (2) economically inactive populations. Every active individual must have one or more occupations and these are noted against the next question. Again, for such an individual, question 11 records the number of persons including himself (or herself) supported by him (or her). It will thus be possible to set against the total number of dependents on any specified means of livelihood the number actively occupied with it. Every active person is not necessarily self-supporting; the partial dependency of an economically active person who cannot support even himself (or herself) is indicated by a 'zero' entry against this last question. Economically inactive persons are of course totally dependent.

One possible source of a confusion as divulged in the scrutiny of the Y-slips in recording the dependency status of an individual together with the means of livelihood of the person who supported him (or her), if dependent, arose from the fact that in cases where the individual incomes of each earner of the family cannot be separately assessed, that is, where the income secured is by joint effort as in a family farm, the earners are really interdependent. In such cases a connection may be set up to the effect that each earner should be shown to support his wife and children, the head-earner being alone responsible for other relations in addition.

The occupational information should be in such details that an industrial classification may be possible; this will incidentally do away with the separate question on the business of the employer in case of an employed person. Also the number of months of the year for which each principal and subsidiary occupation is in existence should be noted along with these occupations.

The question of occupational returns of economically inactive population does not arise. For these persons, the space against "principal" occupation may be used to indicate whether the person is actively in search of employment in which case the word "unemployed" together with the period of unemployment may be noted. It may be felt that even among the economically active population, for example, the partial dependents and unpaid family workers who assist their family farm or business may also be in search of employment. To provide for this it is suggested that their occupation be shown as "subsidiary" only, the "principal" occupational space being utilized to show whether they are in search of employment or not.

If the return in question 9 is "employer", the number of paid assistants employed should also be noted in addition.

The returns on "other Indian languages" will be so few that a separate question on it is not justified; it has therefore been combined with that on mother-tongue.

The three 1941 questions on literacy and education can be easily compressed into two questions only. The wording of the first one will be "How far have you read? If you were not in school, can you both read and write or read only? And that of the second one will be "Are you literate in Hindi, the national language?" The script used by person in writing is however not retained in this revised scheme.

In framing the revised census questionnaire the author has tacitly assumed that the 1951 Census will be of the orthodox type—a complete-enumeration only for 'individual' slips. It should however be pointed out that he is in favour of a complete enumeration on a much smaller number of basic items together with a sample enumeration on a much intensive scale of various informations of national importance. In a sample census a large and much more critical set of questions may find a place. However, sample census or not, the introduction of 'family' slips in place of 'individual' slips is extremely desirable. The family is a natural grouping and information on a family basis is of the greatest socio-economic importance. Moreover the collection of information of every member of the family on the same schedule will improve their quality and will be economically advantageous particularly if mechanical tabulation is in view.