

GOVERNMENT OF KERALA

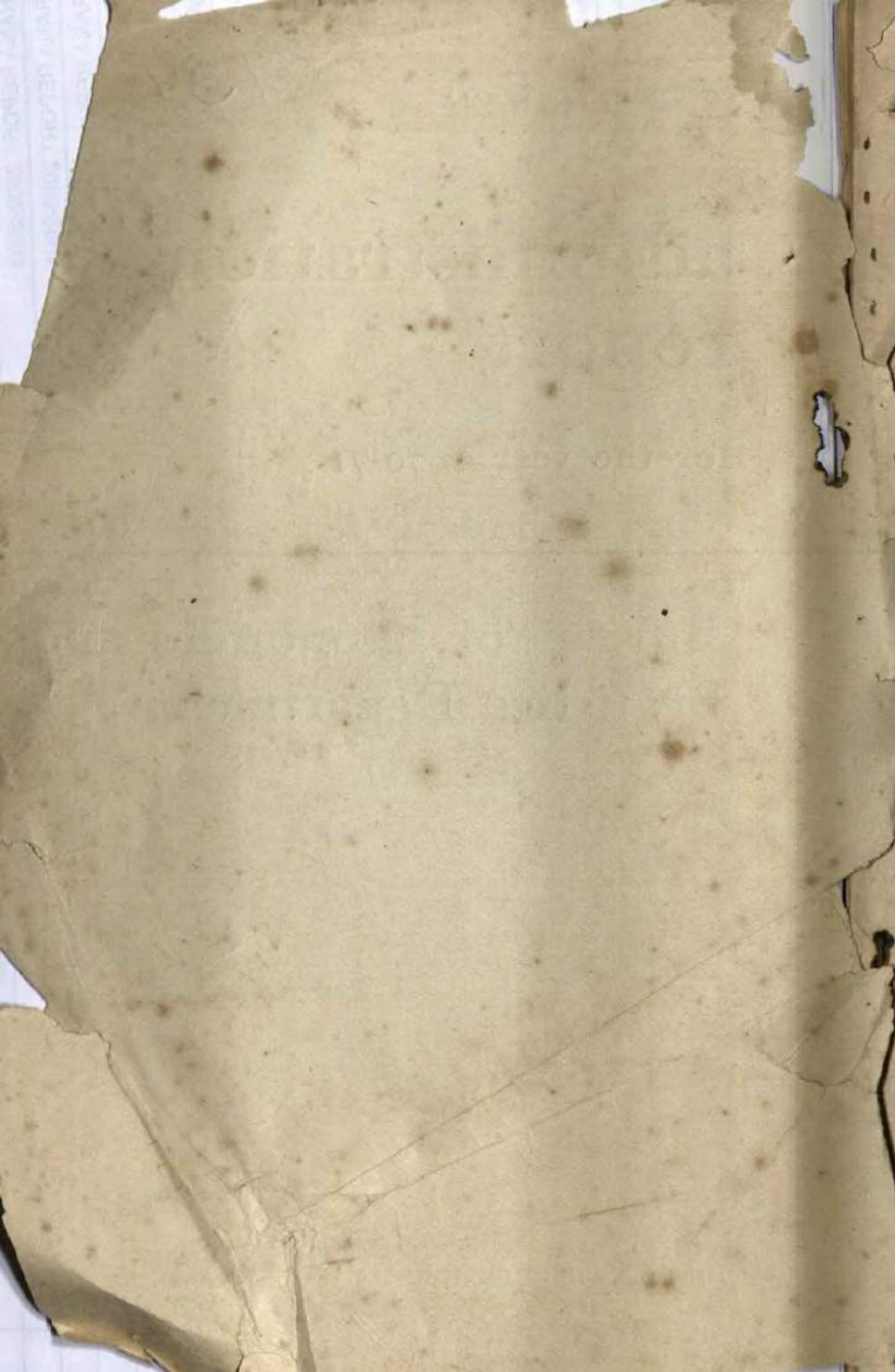
3934

administration report

for the year 1970-71

Bureau of Economics and
Statistics Department

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1973



3934

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for the year 1970-71

**BUREAU OF ECONOMICS AND
STATISTICS DEPARTMENT**

Administration report

for the year 1970-71

BUREAU OF ECONOMICS AND
STATISTICS DEPARTMENT

©

The Government of Kerala

1973

1-2/00



PLANNING AND ECONOMIC AFFAIRS (C)
DEPARTMENT

G.O. Rt. No. 189/72/Plg., dated 17th June 1972

Abstract.—Bureau of Economics and Statistics — Administration Report for 1970-71—Reviewed—Orders issued.

Read.—Letter No. PA1-11790/71/ESD, dated 26th May 1972 from the Director, Bureau of Economics and Statistics.

ORDER

1. Recorded.
2. Dr. P. K. Gopalakrishnan continued to be the Director of the Bureau of Economics and Statistics and Member-Secretary, State Planning Board during the year.
3. The Bureau continued to attend to the Land Utilisation Surveys to get estimates of area under different land uses and various crops in the State. It continued the crop cutting surveys on paddy and tapioca as in the previous year and published reports on crop cutting survey on paddy and consolidated results on crop estimation survey on paddy and tapioca for 1968-69. The pre-harvest estimates on winter paddy 1971, sugarcane, pepper and groundnut 1970-71 were prepared and forwarded to the Government of India. The Bureau also performed the collection, compilation and statistical analysis of the data of the field experiments conducted at the various Agricultural Research Stations in the State and the result of analysis of the data were furnished to the concerned Research Stations, to the Director of Agriculture and I.C.A.R., New Delhi.
4. During the year 1970-71, the Agriculture Division of the State Planning Board attended to the preparation of the chapters relating to Agriculture and Plantations included in the Economic Review, 1970. This division was also actively associated with the Burdhan Commission appointed by Government to enquire into the problems of foreign-owned plantations in Kerala. The Agriculture Division also attended to the preparation of reports on the employment potential of the Fishing Harbour Project in Kerala. The Economics Statistics Division continued to collect, compile and publish the price statistics of important commodities and to compute consumer price index numbers for 13 selected centres. The monthly indices of wages of rural skilled workers and agricultural workers were also regularly computed and

forwarded to the Government of India. The Market Intelligence Unit provided a regular and prompt supply of news on market rates, market arrivals, etc. of different agricultural commodities produced by primary producers. 36 important market centres were covered by the Scheme. The State Income Unit prepared the provisional estimates of State income both at current and constant prices for the period from 1960-61 to 1967-68 based on the revised standard methodology suggested by the Central Statistical Organisation, Government of India and published them in the Economic Review 1970. The State income of Kerala at current prices increased from Rs. 462 crores in 1960-61 to Rs. 1,002 crores in 1967-68 while at constant prices (1960-61) it increased from Rs. 462 crores in 1960-61 to Rs. 590 crores in 1967-68.

5. The Trade and Commerce Section continued to attend to the work relating to the collection and analysis of the nature, quantity and value of goods moved from and into the State by air, sea and rail. During the period under review, the Planning Statistics Unit attended to the preparation of the tables relating to the indicators of development in backward areas.

6. The Labour Statistics Unit engaged in the collection, processing, analysis and reporting of the data relating to various labour enactments. It also made arrangements to train the staff handling labour statistics. The Industrial Statistics Unit attended to the work relating to the collection of information on the economic structure and working of industrial establishments in the State in the factory and non-factory sectors. The scheme for the collection of statistics of small scale industries in the unorganised sector in the urban areas sponsored by the Government of India was also taken up by this unit. The Mechanical Tabulation Unit functioned as a medium for doing tabulation of data of N.S.S. and other sample surveys mechanically.

7. The Vital Statistics Unit of the Bureau continued to compile, analyse and publish reports on vital statistics. During the year under review, the Demographic Research Unit completed 5 major studies, viz., studies on (i) Demographic particulars of sterilised persons in Kerala 1967-68, (ii) a demographic profile of the sterilised persons in Kerala 1957-67, (iii) social and cultural aspects of fertility of women in Kerala, (iv) evaluation of family planning activities in Perumkadavila Block, Trivandrum District and (v) a study of the I.U.C.D. acceptors in Kerala during 1966-67 and 1967-68.

8. As usual, the Administrative Intelligence Unit of the Bureau of Economics and Statistics attended to the work of collection, compilation and analysis of community development statistics in a rationalised and standardised basis. This unit attended to the preparation of reports on community development programme, local development works, rural manpower programme and Applied Nutrition Programme.

9. The Bureau of Economics and Statistics continued to participate in the nation-wide sample surveys for collection of necessary socio-economic and agricultural data, conducted by N.S.S. Organisation of the Government of India. It also undertook other programmes, such as survey for collection of wage rates in sectors of construction, trade and commerce, collection of data on road mileage and expenditure, collection of statistics on cinema and entertainment taxes, etc. The co-ordinating unit of the Housing Cell attended to consolidation and processing of data received from the units of the Cell in other departments. A report of tax incidence on housing in Trivandrum city was also published by this unit during the period under review. The Evaluation Division released two evaluation reports "problems of minor irrigation works in Kerala—a pilot evaluation study" and "Andoorkonam Ela Development Programme" during the year. This Division also undertook three studies, viz., Second Evaluation of I.A.D.P., utilisation of co-operative credit and cost of cultivation of paddy and studies connected with the programmes for promoting small industries.

10. The Industrial Research Unit, Manpower Unit and Social Services Division also continued during the year. The publication section of the Bureau prepared important publications, such as Statistical Handbook of Kerala 1968, Statistical Handbook 1970, District Statistical Handbooks, preparation of Statistical Year Book of Municipalities and Towns.

11. During the year, the Bureau of Economics and Statistics incurred an expenditure of Rs. 40.70 lakhs.

12. The working of the department during the year was generally satisfactory. Its utility to the development departments of the Government has increased in the fields of purposive statistics and evaluation.

(By order of the Governor)
P. SUKUMARAN,
Under Secretary.

The first of these is the fact that the
 Government has not yet decided upon a
 definite policy in regard to the
 proposed extension of the
 railway to the coast. It is
 generally believed that the
 Government will not extend the
 railway to the coast at this
 time, but it is possible that
 the Government may change its
 mind at a later date. The
 Government has also decided
 to extend the railway to the
 coast at a later date. It is
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 the Government may change its
 mind at a later date.

(By order of the Governor)
 P. GUNUNANAN
 Chief Justice

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ADMINISTRATION REPORT OF THE BUREAU OF ECONOMICS AND STATISTICS FOR THE YEAR 1970-71

CHAPTER I

ADMINISTRATION

I. Introductory

The Bureau of Economics and Statistics was constituted in 1963, amalgamating the Bureau of Economic Studies and the Department of Statistics. It is the Central Agency for the systematic collection, compilation, analysis and objective interpretation of all statistics relating to the State and it is also functioning as an advisory body on economic issues referred to it. Its main object is to find solutions for all economic problems which face the State, by analysing and interpreting the statistical data with the aim of building up of a Welfare State. There are two Wings of the Department, viz., the Directorate and the Field Survey Division. The Director is the head of the Department. The Additional Director is in charge of the Field Survey Division.

II. Personnel

1. *Director.*—Dr. P. K. Gopalakrishnan continued as the Director during the year under report. He also continued as the Member-Secretary of the State Planning Board during the year under report.

2. *Additional Director.*—Sri N. Gopalakrishnan Nair continued as the Additional Director during the year under report. He was appointed as Additional Secretary, State Planning Board in G.O. Ms. No. 1/71/Plg., dated 8th January 1971.

3. *Administrative Officer.*—Sri M. P. Madhavan Nair, Deputy Secretary to Government continued as the Administrative Officer during the year under report.

4. *Deputy Directors.*—Sri N. Gopalakrishnan Nair, continued as Deputy Director (Econometrics) during the year under report.

Sri P. P. Philipose and Sri S. Bhagavatheswara Iyer continued as Deputy Directors during the year under report.

The services of Dr. R. Sivasankara Kurup, Deputy Director, were placed at the disposal of the Government of India from 1st April 1970 onwards, for appointment as Officer on Special Duty, Department of Family Planning, Ministry of Health, Government of India [vide G.O. (Rt.) 100/70/Plg., dated 30th March 1970] in which capacity he is still continuing.

Sri N. Karunakara Menon, Deputy Director, continued to be on other duty as Deputy Director in the office of the Senior Town Planner, Ernakulam, which post has been declared as addition to the cadre of Deputy Director in this Bureau.

Sri G. Kuttappan Pillai was deputed from 15th June 1970 onwards as Deputy Director in the Pilot Research Project, Development Department, Secretariat, Trivandrum [vide G.O. (MS) No. 134/70/DD., dated 11th June 1970 from the Development (H) Department] in which capacity he continued till the end of the period of report.

The following Assistant Directors were promoted as Deputy Directors during the year under report:

1. T. Kuruvila Mathen from 3rd July 1970 [G.O. (Rt.) 161/70/Plg., dated 2nd July 1970].
2. K. Balakumaran Nair from 14th July 1970 [G.O. No. 173/70/Plg., dated 14th July 1970].
3. P. C. Kurien from 11th August 1970 [G.O. (Rt.) No. 189/70/Plg., dated 6th August 1970].
4. K. A. George from 17th November 1970 [G.O. (Rt.) No. 256/70/Plg., dated 17th November 1970].

They were continuing as such without break.

5. *Assistant Directors.*—Sri B. Thrivikraman Pillai, Sri V. Sankaranarayanan Potti, Sri K. Rama Varma, Sri T. R. Thankappan Asari, Sri R. Gopalakrishnan Nair, Sri K. N. Gopala Panicker, Sri K. Narayanan Nair, Sri N. George John, Sri K. Easwarankutty Varier, Sri K. Balakrishnan Nair, Sri P. S. Gopinathan Nair, Sri P. T. Joseph, Sri C. Thomas Varghese and Sri N. Gopalakrishnan continued as Assistant Directors during the year under report.

Sri N. Krishna Pillai, District Statistical Officer and Sri John Thomas Chirayath, Research Officer were promoted as Assistant Directors from 18th June 1970 and 11th June 1970 respectively [vide G.O. (Rt.) 143/70/Plg., dated 10th June 1970] and they are continuing as such without break.

Sarvasree G. Ramachandran Nair, Dr. T. Edwin, G. Viswanatha Pillai and S. Krishna Iyer were promoted provisionally as Assistant Directors with effect from 17th July 1970 [G.O. (Rt.) 174/70/Plg., dated 16th July 1970]. All of them except Sri S. Krishna Iyer continued as Assistant Director without break.

Sri S. Krishna Iyer was reverted with effect from 5th March 1971 A.N. for want of vacancy and again promoted with effect from 11th March 1971 F.N. and he continued as Assistant Director during the rest of the period under report.

Sri P. T. Joseph, who was on deputation to Government of India as Project Evaluation Officer, Kozhikode was reverted to this Department with effect from 9th November 1970. He was posted as Assistant Director in this Bureau in which capacity he continued during the remaining period under report.

Sri C. Thomas Varghese, Assistant Director continued as Economist-cum-Publicity Assistant in the Office of the Chief Town Planner and Consulting Architect to Government—a post declared as addition to the cadre of Assistant Director in this Department.

Sri K. Rama Varma continued as Assistant Director in the Office of the Joint Director of Agriculture (Package Programme), Palghat during the period under report.

Sri N. Krishna Pillai was posted as Assistant Director in the Office of the Joint Director of Agriculture (Package Programme), Alleppey with effect from 2nd December 1970 where he continued during the remaining period under report.

Sri B. Thrivikraman Pillai, Assistant Director, continued to be on deputation as Deputy Superintendent of Census Operations, Kerala under Government of India during the period under report.

Sri P. S. Gopinathan Nair, Assistant Director, was deputed for Regional Training Course in Fertility and Family Planning Evaluation conducted by ECAFE at Bombay from 2nd November 1970 to 12th December 1970 [vide G.O. (Rt.) No. 246/70/Plg., dated 27th October 1970].

Sri T. R. Thankappan Asari was appointed as Secretary to the Commission of Enquiry into Foreign Owned Plantations. The services of Sri K. Balakrishnan Nair, Assistant Director, were placed at the disposal of the Technical Adviser to the Commission of Enquiry into the Problems of Foreign Owned Plantations in Kerala from 17th April 1970 to 30th November 1970 [vide G.O. (Rt.) 109/70/Plg., dated 6th April 1970.]

Sarvasree G. Viswanatha Pillai, S. Krishna Iyer, Assistant Directors and Sri A. Balakrishnan, Research Officer also assisted the Commission.

Sri G. Ramachandran Nair, Assistant Director on deputation to the Food Corporation of India, Trivandrum was reverted to this department with effect from 31st October 1970.

6. *Chief Supervisors*.—Sri K. Mailerum Perumal Pillai continued as Chief Supervisor (Sample Registration), Trivandrum during the year under report.

Sri G. Velayudhan Thampi and Sri S. Cecil continued as Regional Price Supervisors at Trivandrum and Kozhikode respectively during the year under report.

7. *Senior Superintendents.*—Sarvasree T. V. Chandran, V. K. Achuthan Nambiar and P. Narayanan continued as Senior Superintendents during the year under report.

Sri K. M. Bala Varier, on deputation to Other Backward Classes Reservation Commission, was reverted to this department with effect from 1st January 1971. Sri K. Appukuttan Nair, Junior Superintendent acted as Senior Superintendent during the following period against short leave vacancies from 7th January 1971 to 2nd May 1971.

8. *Publication Assistant.*—Sri A. N. Bhaskara Pillai continued as Publication Assistant during the year under report.

9. *Research Officers.*—Sarvasree P. L. Sreedevi Amma, K. Bhaskara Menon, K. K. Karunakaran, V. K. Paran Unni, T. Janardhana Menon, A. Balakrishnan, N. V. George, V. N. Sukumara Pillai, Smt. S. Retna Bai Ammal, P. Vasudevan Namboodiri, R. Ramalingom Iyer, P. Vidyasarangaratha Das, K. George, A. Abdul Wahab, C. R. Parameswaran, M. K. Bhaskaran Pillai, P. K. Ramakrishnan Nair, G. Surendranathan Nair, P. B. Lekshmanan, K. Easwaran Nampoothiri, J. Benjamin, N. M. Syed Mohammed, P. Gopalan, K. Appukuttan, O. Ayyappan, P. K. Saradamony, R. Parameswaran Nair, A. Abdul Gafoor, C. Kumaraswamy, K. Gnanamuthu, N. Vikraman Nair, C. Daniel, A. V. Mathai, A. P. Pathrose, K. P. Sathyadas, C. Soma Varman, E. P. Raman Nampoothiri, C. G. Vasudavan Nair, R. Janardhanan, S. Sunetha, A. M. Haridasan Nair, P. J. Basil, V. A. Abraham, N. Rajendran, P. R. Krishna Pillai, continued as Research Officers during the year under report.

The following persons provisionally promoted as Research Officers were holding the posts during the period noted against them :

<i>Name</i>	<i>From</i>	<i>To</i>
1. U. Balaji	3-8-1970	till the end of the year
2. M. Shamsuddin	24-7-1970	do.
3. K. N. Sabadevan	1-9-1970	do.
4. R. Vasukutty	24-10-1970	do.
5. P. J. Joshua	14-10-1970	5-3-1971
6. Mathew Thomas	4-11-1970	5-2-1971

Sri V. N. Sukumara Pillai, Research Officer, continued as teacher in Ethiopia on foreign service condition during the year under report.

Sri M. K. Bhaskaran Pillai, Research Officer, was deputed for training at the Programme Evaluation Organisation, Planning Commission, Government of India, New Delhi for a period of nine weeks from 12th October 1970 as per G.O. (Rt.) No. 217/70/Plg., dated 26th September 1970.

Sri A. V. Mathai, Research Officer, was deputed to the IV Training Course on Sociological and Economic Problems in the field of housing at New Delhi from 19th October 1970 to 28th November 1970 vide G.O. Rt. 226/70/Plg., dated 30th September 1970.

The following persons were working in other departments against the post declared as additions to the category of Research Officer in this department during the period noted below:—

<i>Sl. No.</i>	<i>Name</i>	<i>Designation of the post held</i>	<i>Period</i>
(1)	(2)	(3)	(4)
1.	P. Gopalan	Research Officer, Office of the Director of Public Instruction, Trivandrum	Throughout the period under report
2.	J. Benjamin	do.	do.
3.	K. K. Karunakaran	Economic Investigator, Rural Industries Project, Alleppey	do.
4.	A. Abdul Wahab	do.	1-4-1970 to 28-4-1970
5.	P. Vasudevan Namboothiri	do.	29-4-1970 continuing
6.	P. K. Ramakrishnan Nair	Economic Investigator, Rural Industries Project, Kozhikode	Throughout the period under report
7.	N. M. Syed Mohammed	do.	do.
8.	K. Bhaskara Menon	Office of the Senior Town Planner, Ernakulam	do.
9.	C. Daniel	Office of the Chief Town Planner and Consulting Architect to Government, Trivandrum	29-4-1970 continuing
10.	C. Kumaraswamy	Office of the Inspector-General of Police, Trivandrum	Throughout the year
11.	E. P. Raman Namboothiri	Office of the Director of Fisheries, Trivandrum	1-4-1969 to 28-2-1971
12.	C. Soma Varman	Veterinary College and Research Institute, Mannuthy, Trichur	Throughout the year

<i>Sl. No.</i>	<i>Name</i>	<i>Designation of the post held</i>	<i>Period</i>
(1)	(2)	(3)	(4)
13.	P. J. Basil	Office of the Chief Engineer (Irrigation), Trivandrum	Throughout the year
14.	K. N. Sahadevan	Office of the Chief Conservator of Forests, Trivandrum	From 1-9-1970 onwards continuing

Sri E. P. Raman Nampoothiri, Research Officer on deputation to the Office of the Director of Fisheries, was reverted to this department with effect from 1st March 1971 consequent on the abolition of the post.

10. *District Administration.*—The following persons were holding the posts of District Statistical Officers during the period noted against each :

<i>Sl. No.</i>	<i>District</i>	<i>Name of Officer</i>	<i>Period of charge during the year under report</i>	
			<i>From</i>	<i>To</i>
(1)	(2)	(3)	(4)	(5)
1.	Trivandrum	K. Ramanarayanan Nair	Throughout the year	
2.	Quilon	K. P. Mohammed Sally	1-4-1970	17-4-1970
3.	Alleppey	P. M. Thankappan	18-4-1970 continuing	
		G. Sreedharan Nair	1-4-1970	31-10-1970
			1-12-1970 throughout the year	
4.	Kottayam	K. P. Mohammed Sally (Senior Research Assistant)	1-11-1970	30-11-1970 (Additional charge)
		K. Ananthanarayana Iyer	1-4-1970	14-6-1970
			1-8-1970 continuing	
5.	Ernakulam	K. N. Radhakrishnan Nair (Senior Research Assistant)	15-6-1970	31-7-1970 (Additional charge)
		N. Krishna Pillai	1-4-1970	16-6-1970
		V. C. Kurien (Senior Research Assistant)	17-6-1970	23-6-1970 (Additional charge)

Sl. No.	District	Name of Officer	Period of charge during the year under report	
			From	To
(1)	(2)	(3)	(4)	(5)
	Ernakulam— (cont.)	G. Somasekharan Nair	24-6-1970	31-8-1970
		A. Shahul Hameed	1-9-1970 till the end of the year	
6.	Trichur	N. O. Kumaran	1-4-1970	29-4-1970
		K. S. Ayyappan	30-4-1970 continuing	
7.	Palghat	D. Gopinathan	1-4-1970	28-5-1970
			29-6-1970	4-9-1970
		T. P. Rajagopal (Senior Research Assistant)	19-5-1970	28-6-1970 (Additional charge)
		P. Sankunny Nair	5-9-1970 till the end of the year	
8.	Kozhikode	A. Shahul Hameed	1-4-1970	18-6-1970
		V. C. George	19-6-1970	8-12-1970
		T. P. Rajagopal	9-12-1970 till the end of the year	
9.	Malappuram	N. O. Kumaran	8-5-1970	31-10-1970
			1-12-1970	throughout the year
		V. C. George, District Statistical Officer, Kozhikode	1-11-1970	30-11-1970 (Additional charge)
10.	Cannanore	H. Padmanabha Iyer	Throughout the year	
The following persons were holding the post of Senior Research Assistant in various districts during the period noted against each:—				
1.	Trivandrum	K. Rajagopal	Throughout the year	
2.	Quilon	M. Mohammed Yusuff	1-4-1970	30-11-1970
		K. P. Mohammed Sally, District Statistical Officer	1-1-1971	continuing
			1-12-1970	31-12-1970 (Additional charge)
3.	Alleppey	P. M. Thankappan	1-4-1970	17-4-1970
		G. Sreedharan Nair, District Statistical Officer	18-4-1970	24-4-1970
			1-12-1970	31-12-1970 (Additional charge)
		K. P. Mohammed Sally	25-4-1970	30-11-1970
			1-1-1971 continuing	

Sl. No.	District	Name of Officer	Period of charge during the year under report	
			From (4)	To (5)
4.	Kottayam	K. N. Radhakrishnan Nair	1-4-1970	20-10-1970
			20-11-1970	4-1-1971
		K. Ananthanarayana Iyer, District Statistical Officer	21-10-1970	19-11-1970 (Additional charge)
		G. Somasekharan Nair	5-1-1971 continuing	
5.	Ernakulam	T. P. Rajagopal	1-4-1970	16-4-1970
		V. C. Kurien	17-4-1970 continuing	
6.	Trichur	K. K. Sukumaran	1-4-1971	24-1-1971
			24-2-1971 continuing	
		K. S. Ayyappan, District Statistical Officer	25-1-1971	23-2-1971 (Additional charge)
7.	Palghat	K. S. Ayyappan	1-4-1970	24-4-1970
		T. P. Rajagopal	25-4-1970	2-8-1970
		D. Gopinathan, District Statistical Officer	3-8-1970	4-9-1970 (Additional charge)
		P. Sankunnu Nair, District Statistical Officer	5-9-1970	7-9-1970
			5-12-1971	13-1-1971 (Additional charge)
		G. Somasekharan Nair	8-9-1970	4-12-1971
8.	Kozhikode	K. N. Radhakrishnan Nair	14-1-1971 continuing	
		V. C. George	1-4-1970	10-5-1970
			31-5-1970	18-6-1970
			9-12-1970 continuing	
		A. Shahul Hameed, District Statistical Officer	11-5-1970	30-5-1970 (Additional charge)
		D. K. Vidyanandan	19-6-1970	8-12-1970
9.	Cannanore	G. Somasekharan Nair	1-4-1970	23-6-1970

Sl. No.	District	Name of Officer	Period of charge during the year under report	
			From	To
(1)	(2)	(3)	(4)	(5)
	Cannanore— (cont.)	H. Padmanabha Iyer, District Statistical Officer	24-6-1970 (Additional charge)	22-9-1970
		S. R. Selvaraj	23-9-1970 till the end of the year	

Sri K. Ramanarayanan Nair, District Statistical Officer, was deputed for training for the Sixth Central Training Course conducted in the Labour Bureau, Simla from 7th to 19th September 1970, vide G.O. (Rt) 202/70/Plg., dated 25th August 1970.

The following persons were working in other departments against the posts declared as addition to the cadre of District Statistical Officer in this department:

Sl. No.	Name of Officer	Name of post	From	To
(1)	(2)	(3)	(4)	(5)
1.	P. Sankunny Nair	Statistical Officer, Directorate of Agriculture, Trivandrum	1-4-1970	31-5-1970
2.	S. R. Selvaraj	do.	1-6-1970	14-9-1970
3.	D. Gopinathan	do.	14-9-1970 continuing	
4.	P. Gopinathan Pillai	Statistical Officer, Board of Revenue (Taxes)	Throughout the year	
5.	M. Mohammed Serverkhan	Statistical Officer, Board of Revenue (Civil Supplies)	do.	

Deputy Health Officers.—The following persons were holding the posts of Deputy Health Officers during the period in places noted against each:

1.	K. K. Bhaskaran	Corporation of Cochin	Throughout the year
2.	P. Vasudevan	Corporation of Kozhikode	do.
3.	P. K. Pankajakshan	Alleppey Municipality	do.

4. P. A. Kunjamutty Quilon Municipality Throughout the year
5. R. Ravindranathan Nair Corporation of Trivandrum do.

Sanctioned strength of the department as on 31st March 1971 was as follows:—

Category (1)	Name of post (2)	Permanent (3)	Temporary (4)	Scale of pay (5)
Gazetted	Director	1	..	1000-1300
	Additional Director	1	..	800-1100
	Administrative Officer	..	1	800-1100
	Deputy Director (Econometrics)	..	1	600-900
	Deputy Directors	..	7	600-900
	Assistant Directors	2	12	375-800
	Chief Supervisor	..	1	375-800
	Regional Supervisors	..	2	375-800
	Research Officers	6	28	325-725
	District Statistical Officers	9	1	325-725
	Senior Research Assistants	..	9	325-725
	Scrutiny Officers	..	4	325-725
	Senior Superintendents	2	1	310-600
	Publication Assistant	..	1	310-600
	Deputy Health Officer	..	5	310-600

III. Expenditure

The details of expenditure incurred under the various plan and non-plan schemes implemented in the bureau for the year 1970-71 are furnished below :

Name of Schemes (1)	Head of Account (2)	Expenditure incurred Rs. (3)
1. Bureau of Economics and Statistics	39 b (ii)	27,75,882
2. National Sample Survey	39 b (iii)	2,55,458
3. Demographic and Monoc- zite Survey	39 b (iv)	43,283

<i>Name of Schemes</i>	<i>Head of Account</i>	<i>Expenditure incurred Rs.</i>
(1)	(2)	(3)
4. Strengthening of Statistical Units in municipalities for improvement of Vital Statistics	39 b (v)	1,71,816
5. Family Planning and Demographic Research Centre	30 b (vi)-2	84,773
6. Inservice Training Programme	39 b (vi)-6	9,601
7. Wage Structure Survey	39 b (vi)-7	24,613
8. Mechanical Tabulation Unit	39 b (vi)-12	18,039
9. Scheme for a new State Series of Consumer Price Indices	39 b (vi)-16	9,350
10. Strengthening of State Income Unit	39 b (vi)-17	8,490
11. Housing Statistics Cell	39 b (vi)-18	46,406
12. Strengthening of State Industrial Unit	39 b (vi)-19	50,211
13. Strengthening of Prices Unit	39 b (vi)-22	43,502
14. Applied Nutrition Programme	39 b (vi)-23	58,575
15. Co-ordination of Official Statistics	39 b (vi)-34	15,308
16. Study of Cost of Cultivation of Ginger in Kerala	39 b (vi)-35	49,461
17. Collection of Statistics relating to Small Scale Industries	39 b (vi)-36	25,573
18. State Planning Board	19 c (a) (viii)	2,51,351
19. Evaluation Unit	19 c (a) (ix-d)	1,29,145
Total		40,70,837

CHAPTER II

AGRICULTURAL STATISTICS

I. Land Utilisation Survey

During the period under report, this Department continued to attend to the Land Utilisation Surveys to frame estimates of area under different land uses and various crops in the State.

During the year 1970-71 two rounds of the survey were conducted. The reference period of the first round was from 1st July 1970 to 31st January 1971 and that of second round from 1st February 1971 to 30th June 1971.

The first round of the survey was conducted in all the 56 Taluks of the State. A stratified two stage random sampling design was adopted, the Taluk being the stratum, census village first stage unit and clusters of plots, second stage units. From each Taluk (except Kasargode and Hosdurg) 15 census villages were selected by simple random sampling method and from each village 10 clusters of 5 plots each were selected. In Kasargode and Hosdurg 12 census villages were selected by simple random method and from each village 5 clusters of 10 plots each were selected. If a selected village consists of 50 plots or round about that, all plots of the village were enumerated. About 42,000 plots were enumerated during the first round of the survey. Data on land utilisation, number of various perennial crops, area under different seasonal crops and area irrigated under different sources of irrigation were enumerated from these plots.

The object and sampling design of the second round of the survey were the same as that of the first round. During the year under report the field work relating to the enumeration of plots was in progress.

The analysis of data collected through L.U.S. first round 1970-71 was in progress.

II. Crop Cutting Survey

This department continued the Crop Cutting Surveys on Paddy and Tapioca. The details of the work attended to under each of these surveys are furnished below :

1. *Crop Cutting Survey on Paddy*.—During the year under review the Crop Cutting Surveys on paddy were conducted by the Investigators of the Bureau.

The experiments were conducted during all the three paddy seasons, viz., Autumn (Virippu) Crop, Winter (Mundakan) Crop and Summer (Punja) Crop in the year.

During each season 18 experiments were planned in each Taluk, where the crop was grown. The results of the experiments conducted during Autumn Crop 1970, and Winter 1971 have been finalised.

During the period under report the following reports have been prepared and published :

(i) Report on the Crop Cutting Survey on Autumn Crop of Paddy 1968.

(ii) Consolidated Results of Crop Estimation Survey on Paddy and Tapioca 1968-69.

(iii) Report on the Crop Cutting Survey on Autumn Crop of Paddy 1969—(under print).

(iv) Report on the Crop Cutting Survey on Winter and Summer Paddy 1969.

2. *Crop Cutting Survey on Tapioca.*—Crop Cutting Survey on tapioca was also conducted by this Department during the period under review.

The object of the survey was to estimate the yield per hectare and the total output of tapioca in the State. 750 experiments were planned for the agricultural year 1970-71. The survey was conducted in five census villages in a taluk where the crop was grown. The survey was in progress during the year. The results of the Crop Cutting Survey conducted during the year and the total production of raw tapioca in the State was estimated at 46.66 lakhs tonnes. The yield rate was estimated at 15.78 tonnes/hectare.

Pre-harvest estimation.—During the year under reference this Department collected pre-harvest data on area and yield of paddy (Autumn, Winter and Summer Crops), sugarcane, pepper and groundnut for preparing the pre-harvest estimates. It was carried out along with the Land Utilisation Survey conducted by this Department. The pre-harvest data for paddy were obtained from all the plots selected for crop cutting experiments. During the period under review pre-harvest estimates of area and production of Autumn paddy 1970 were prepared. The pre-harvest estimates on winter paddy 1971, sugarcane, pepper and groundnut 1970-71 were prepared and sent to the Government of India.

III. Agricultural Statistics

Agricultural Statistics Unit dealt with the following items of work during 1970-71:—

(i) Collection and compilation of :

- (a) Agricultural Statistics relating to the State,
- (b) Rainfall data relating to the State.

(ii) Preparation of forecast reports on area and production of important crops in the State.

(iii) Preparation of Statistics of gross produce/hectare, etc., in accordance with Kerala Land Reforms Act, 1964.

(iv) Preparation of the Season and Crop Report.

(v) Co-ordinating work on Benchmark and Assessment Survey under I.A.D.P. with the Institute of Agricultural Research Statistics.

(vi) Other miscellaneous items of work.

(i) (a) The tables of Agricultural Statistics for the Agricultural year 1969-70 have been prepared and published. Classification and utilisation of land and its percentage to the total area of the State during the year 1969-70 are given below :—

Sl. No.	Classification of area	Area in hectares	Percentage
(1)	(2)	(3)	(4)
1.	Total area of the State according to Village papers	3858523	100.00
2.	Forests	1055733	27.36
3.	Land put to non-agricultural uses	267665	6.94
4.	Barren and uncultivable waste land	73805	1.91
5.	Permanent pastures and grazing land	27800	0.72
6.	Land under miscellaneous tree crops not included in net area sown	140235	3.64
7.	Cultivable waste	81275	2.11
8.	Current fallow	23242	0.59
9.	Other fallows	22866	0.60
10.	Net area sown	2165902	56.13
11.	Area sown more than once	750186	19.44
12.	Total cropped area	2916088	76.57

The area and production of important crops in the State during 1969-70 were as follows :

Sl. No.	Name of crop	Area in hectares	Production
(1)	(2)	(3)	(4)
1.	Rice	874059	1226413 (tonnes)
2.	Pulses	42345	16955 "
3.	Sugarcane (Gur)	7785	50131 "
4.	Black pepper	118045	24402 "
5.	Ginger (Dry)	11423	11997 "
6.	Processed cardamom	47026	1074 "
7.	Turmeric (Cured)	4339	3580 "
8.	Arecanut	83680	12661 (M. nuts)

<i>Sl. No.</i>	<i>Name of crop</i>	<i>Area in hectares</i>	<i>Production</i>
(1)	(2)	(3)	(4)
9.	Banana and plantain	53495	404938 (tonnes)
10.	Cashewnut	98960	111033 "
11.	Tapioca	295585	4665764 "
12.	Groundnut	13118	19349 "
13.	Sesamum	11824	3840 "
14.	Coconut	707844	3956 (M. nuts)
15.	Tea	38295	40200 (tonnes)
16.	Coffee	28873	12470 "
17.	Rubber	175190	76897 "

(b) Daily rainfall data were recorded in 89 centres in the State. The monthly and annual rainfall returns received from these centres were compiled. The daily rainfall statement for the year 1969 has been sent to the Government Press for printing.

(ii) The preparation of forecast reports on area and production of important seasonal crops in the State was continued during the year also and these reports were forwarded to the Government of India and to the State Government as per the time schedule fixed. Nineteen important seasonal and perennial crops are covered by forecast reports.

(iii) During the year under reference the Department published the Statistics of gross produce per hectare of nine crops, specified in Rule 41 of the Kerala Land Reforms (Tenancy) Rules of 1970, for the year 1969-70.

(iv) The season and crop report for the year 1968-69 was prepared and forwarded to the Government Press for printing.

IV. National Index of Field Experiments

The National Index of Field Experiments are continued.

This scheme is functioning with the staff shown below :

<i>Designation</i>	<i>No. of posts</i>	<i>Scale of pay Rs.</i>
Research Officer	1	325-725
L.D. Compilers	3	90-190
L.D. Typist	1	90-190

The National Index of Field Experiment Scheme aims at putting together in one place the results of all field experiments conducted in different parts of the country, whether they are conducted by the State Departments of Agriculture, Central Research Institutes, Commodity Committees or other organisations. It is intended to catalogue all these materials on a uniform basis and standard manner, so that they are available to all the Agricultural Research Workers in the country.

The field experiments are indispensable for acquiring new knowledge as well as measuring the impact on crop production of the various improvements which may be introduced in agricultural practice.

The data of the field experiments conducted at the various Agricultural Research Stations in the State, are collected, compiled and statistically analysed in this Bureau. The results of analysis of the above data are promptly communicated to the concerned Research Stations, State Directorate of Agriculture and to the Institute of Agricultural Research Statistics (I.C.A.R.), New Delhi.

The details of agricultural experiments analysed in this Bureau during the period under report (year 1970-71) are given below :

<i>Sl. No.</i>	<i>Design of the experiments</i>	<i>No. of experiments analysed during the year 1970-71</i>
1.	Randomised Block ..	120
2.	Split plot ..	45
3.	Factorial experiments ..	12
4.	Balanced incomplete block ..	2
5.	Miscellaneous designs ..	3
	Total ..	<hr/> 182 <hr/>

V. Agriculture Research Division

The Agriculture Research Division of the Planning Board prepared the draft on the third year's programme (1971-72) of the Fourth Five Year Plan on the Agriculture Sector, including Co-operation and Community Development and Irrigation and Flood Control.

Another important item of work attended to by the Division was the preparation of the Chapters relating to Agriculture and Plantations included in the Economics Review 1970. The agricultural economy of the State registered overall progress during the year under review. The big push in the value of fish catches from Rs. 13.20 crores in 1968-69 to Rs. 25.55 in 1969-70 was one of the spectacular achievements of the year. In the Agricultural Sector the total cropped area gone up by 2.2 per cent. The production of major crops like coconut, tapioca, arecanut, banana and rubber registered remarkable increases. The food situation in the State was quite satisfactory during the year though the total rice production in the State declined a little.

The officers and staff of the Division were actively associated with the Bardhan Commission appointed by the Government of Kerala

in March 1970 to enquire into the problems of foreign-owned plantations in Kerala. The Assistant Director in charge of the Division was also the Secretary of the Commission. The Commission submitted their report on 30th November 1970.

The Planning Board was called upon to prepare an economic case for claiming Kerala's share of Cauvery waters. This work was entrusted to the Agriculture Division. A comprehensive report containing the relative economic backwardness of Kerala compared to Mysore and Tamilnadu was prepared and sent to the Consulting Engineer to Government, together with the available statistical data of the Cauvery affected regions in the State.

The Division had prepared a 'Note' on the Economic situation in Kerala 1970, for providing background material for Governor's speech. The note highlights the general trends in the fields of Agriculture, Industry, Social services, Employment situation and Prices and cost of living.

The Division had also prepared a report on the employment potential of the fishing harbour projects in Kerala. The employment generated during the construction phase and the regular and casual employment created after functioning of the project in the various harbour projects of the State are worked out in this report.

The Officers and staff of this Division have assisted the expert Committee on Unemployment in preparing its report.

The Chapter on Forests for inclusion in the review on the economic development of Kerala had been completed.

The Division had been entrusted with the preparation of a note on the Nationalization of Private Forests in the State. The note was prepared and submitted to Government.

The Division was asked to prepare notes for discussion with the officials of the Planning Commission for Employment projects in Kerala. The notes have been prepared and submitted to Government.

The Fact Book on Agriculture 1969 was being revised by incorporating all the available data on Agriculture for the latest years, including Animal Husbandry, Fisheries and Forestry. The work was in progress.

NEW WORKS

1. Comprehensive Economic Review of Kerala—Agricultural Production—Work started.
2. Survey on consumption of Tapioca.
3. Inventory of Improved Agricultural machinery and implements 1970—Reports received from 101 blocks.
4. Study on the Purchase Tax on Prawns.

CHAPTER III
ECONOMICS STATISTICS

Prices Division

1. PRICES (GENERAL)

The section continued to attend to the following items of work:

Weekly retail prices of 40 articles have been collected from 20 selected centres. These data are mainly used for computing the State Series of Consumer Price Index Numbers. At present index numbers are computed for the following 13 selected centres in the State:

Centres in the State.—

- | | |
|-------------------|-----------------|
| 1. Trivandrum | 8. Ernakulam |
| 2. Quilon | 9. Trichur |
| 3. Punalur | 10. Chalakudy |
| 4. Alleppey | 11. Munnar |
| 5. Changanacherry | 12. Sherthallai |
| 6. Kottayam | 13. Kozhikode |
| 7. Alwaye | |

The weighting diagram for the first 12 centres have been obtained from the Family Budget Enquiries conducted during 1955. The base for Kozhikode is the average prices for the year ended June 1936=100 and for other centres the base period selected in August 1939=100. The monthly index numbers were being computed and published regularly in the Gazette. Statements showing the index numbers for various centres in the State were forwarded to various organisations both public and private, individual and industrial concerns direct from this Bureau.

This Bureau continued to collect weekly retail prices of 82 specified commodities at District Headquarters and to prepare reviews indicating their price trends, availability and apprehended scarcity. This weekly review with a statement of prices at Trivandrum, Ernakulam and Kozhikode was regularly forwarded to (1) the Secretary (Department of Internal Trade) Government of India (2) the Additional Secretary (Board of Revenue) Trivandrum and (3) to the Retail Price Intelligence Branch, Directorate of Economics and Statistics, Government of India. The despatch of these reviews has been discontinued since January 1971 as per the request of the Economic and Statistical Adviser.

The collection of retail prices from the three centres, Alwaye, Alleppey, and Mundakayam for the Labour Bureau series of consumer price index numbers, has been continued. The Labour Bureau,

Simla has since started a fresh family budget survey at 3 centres, Quilon, Alleppey and Mundakayam in the State during the year under report. The collection of prices in these centres (new series) has also been entrusted to this Bureau.

2. STRENGTHENING OF PRICES UNIT

During the year under report the collection, scrutiny and compilation of weekly retail prices of essential commodities were continued. Statements showing the fortnightly average prices of all those commodities, with a critical review of the price trend during that period were prepared and sent to the Secretary to Government, Food Department, Government of Kerala and to the Planning Commission, Government of India, regularly.

The monthly indices of wages of rural skilled workers and agricultural labourers were regularly computed and forwarded to the Government of India. The data on agricultural wages were being sent to the Economic and Statistical Adviser, Government of India and published in the Kerala Government Gazette.

The Scheme for the collection of market rates of dietary articles and other hospital necessaries for the settlement of contracts at the medical and other institutions has been implemented in full during the year. Under the Scheme ten Price Inspectors were posted, one for each District, under the immediate supervision of the District Statistical Officer. The collection of prices was done on a quarterly basis on the first Friday of every quarter. The Price Inspectors are made responsible for further verification of the price data based on scrutiny notes from the Head Office and in doubtful cases arising out of discussions between the District Statistical Officers and Officers from Head Office. During the year 1970-71 the market rates of 161 items of dietary and other allied articles were collected for every quarter, scrutinised the data and final statements of prices for 57 centres were prepared and furnished to all the District Medical Officers, District Indigenous Medical Officers, Director of Health Services, Director of Indigenous Medicines, Medical Colleges, T.B. Hospitals, E.S.I. Hospitals, Secondary Health Centres etc. and Poultry Centres and Cattle Farms under the Department of Animal Husbandry, Director of Museums and Zoos, Army Commander for Tamil Nadu and Kerala etc. Data on prices of dietary articles required by other departments and institutions were also furnished as and when requested for.

3. INDEX SERIES (RELATING TO AGRICULTURAL ECONOMY)

This scheme is intended for the regular computation of the following indices:

- (i) Index numbers of wholesale prices of agricultural commodities.

- (ii) Index numbers of parity between prices received and paid by farmers.

Index Numbers of wholesale prices of Agricultural Commodities.—Seventeen important agricultural commodities are included in the computation of the wholesale price index. The monthly indices are computed on the basis of the wholesale prices collected from the various reporting centres distributed throughout the State. The base year selected is the agricultural year 1952-53 and the wholesale price index numbers have been computed up to February 1971.

Index numbers of parity between prices received and paid by farmers.—This index measures the variation in the economic prosperity of the farmers in relation to changes in farm prices, farm cultivation cost and domestic expenditure as compared to the situation during 1952-53. The parity index numbers between prices received and paid by farmers have been computed up to February 1971.

In addition to the computation of the above indices, this section attended to the following items of works:

1. Fortnightly farm prices of coconuts with husk were tabulated and sent to the Secretary, I.C.C.C., Ernakulam.
2. Yearly weighted average of farm prices of 9 commodities were sent to Ecostat, Delhi.
3. Fortnightly farm prices of coconut with husk were sent to the Deputy Director (Agriculture), Nileshwar.
4. Weekly prices of coir and husk were sent to the Secretary, Coir Board, Ernakulam.
5. Monthly average prices of coir were sent to Government Press, Trivandrum for publication in the Government Gazette.
6. Weekly prices of export staples at Mattancherry and Alleppey were sent to Government Press for publication in the Gazette.
7. Data on Farm Prices were supplied to outside agencies on request.

4. SCHEME FOR IMPROVEMENT OF MARKET INTELLIGENCE

The Market Intelligence Scheme continued to be in operation during the period under report.

Objects and functions.—The main object of the scheme is to provide for the benefit of the primary producers, a regular and prompt supply of news on market rates, market arrivals, etc., of different agricultural commodities, produced by them. The three important functions involved in the implementation of the scheme are:—

- (1) Collection and reporting of accurate and reliable data;
- (2) Rapid processing, analysis and presentation of the data in a systematic manner; and

- (3) Dissemination of Market Intelligence information promptly and systematically.

Coverage.—The scheme is in operation in 36 important market centres of the State and the number of markets is proposed to be increased to 56 during the Fourth Plan period, on a phased programme.

Price Reporting Staff.—The prices are collected and reported by a full-time Price Inspector or a Price Reporter appointed in each centre, except in the case of Kothamangalam where the work is entrusted with the Price Reporter of the neighbouring centre, viz., Muvattupuzha. There are twelve Price Inspectors and 23 Price Reporters in the field.

Headquarters Unit.—The Headquarters Unit of the scheme is handled by a Price Inspector (Research Assistant) assisted by a compiling clerk and a Typist under the immediate supervision of a Research officer and under the control of the Assistant Director of the Prices Unit

Supervision of field work.—The field work of the reporting staff is supervised by the District Statistical officers, at the district level, and by two Regional Price Supervisors posted at Trivandrum and Calicut. They conduct on the spot inspections and furnish inspection reports to the Head Office and the Government of India, in separate forms prescribed for the purpose.

The Regional Price Supervisors are assisted by an Upper Division Compiler each, in their office work.

Periodicals.—(i) *Daily price bulletin.*—The wholesale (MODAL) prices collected by the reporting agencies are conveyed to the headquarters by express telegrams or telephone trunk calls. These informations are processed and presented in the form of daily price bulletin. This bulletin is sent to the local station (Trivandrum) of All India Radio for broadcast during the radio rural or Karshikaransom programme in the evening. This programme is relayed by all other regional stations of the All India Radio in the State. The extracts of the daily price bulletins are regularly supplied to newspapers also. The copies of the bulletins are also to be supplied to about 100 other agencies including certain Central and State Government Departments.

(ii) *Weekly Market Review.*—A Weekly Market Review in Malayalam on prices, price trends, etc., of important agricultural commodities in respect of selected centres is prepared and broadcast in the evening on every Sunday.

(iii) *Daily report on open market price of rice.*—A daily statement on the open market price of rice prevailing in the different district headquarters of the State except Malappuram, is also prepared and furnished to the Government of India, State Government and Civil Supplies authorities of the Board of Revenue. In addition to this, the Reserve Bank of India is also being supplied with the weekly market prices of rice available in the open markets of Palghat, Chittoor and Alathur centres. Apart from all these, the requirements in respect of wholesale prices of agricultural commodities of many other offices of both Central and State Governments, are regularly met by this Bureau.

5. STATE INCOME UNIT

The State Income Unit continued to function during the year under report. The post of Assistant Director, State Income Unit was upgraded to Deputy Director, during the year. Sri P. C. Kurien took charge as Deputy Director of the unit in August 1970. The staff of the unit consisted of one Deputy Director, three Research Officers, three Research Assistants and 3 Compilers.

Provisional estimates of State Income both of current and constant prices from 1960-61 to 1967-68 based on the revised standard methodology suggested by Central Statistical Organisation, Government of India have been prepared and published in the "Economic Review 1970".

The State Income of Kerala at current prices increased from Rs. 462 crores in 1960-61 to Rs. 1,002 crores in 1967-68 while at constant (1960-61) prices it increased from Rs. 462 crores in 1960-61 to Rs. 590 crores in 1967-68. The per capita income rose from Rs. 276.3 in 1960-61 to Rs. 505 in 1967-68 at current prices and from Rs. 276.3 in 1960-61 to Rs. 297.1 in 1967-68 at constant (1960-61) prices. Between 1960-61 and 1967-68, the net domestic product of Kerala recorded an increase of 116.9 per cent at current prices and 27.6 per cent at 1960-61 prices.

The contribution of the Agriculture Sector to State Income at constant prices (1960-61 prices) decreased from 55 per cent in 1960-61 to 52.7 per cent in 1967-68. Industries and Mining Sector accounted for 17 per cent in 1960-61 and 16.4 per cent in 1967-68 whereas the contribution of the Services Sector increased from 28 per cent in 1960-61 to 30.9 per cent in 1967-68.

The provisional estimates of State Domestic Product and per capita income prepared for the period 1960-61 to 1967-68 both at current and constant prices are furnished in the statements attached.

Estimates of State Domestic Product (Kerala) by Industry of Origin
(at current prices) (Provisional)

Year	Agriculture (Rs. lakhs)	Mining and Industries (Rs. lakhs)	Services (Rs. lakhs)	Net Domestic product (Rs. lakhs)	Per capita income (Rs.)
1	2	3	4	5	6
1960-61	25,429	7,859	12,910	46,198	276.3
1961-62	26,196	8,128	14,535	48,859	284.7
1962-63	27,959	8,703	16,107	52,769	299.6
1963-64	30,197	9,228	18,326	57,751	319.8
1964-65	35,885	9,935	20,690	66,510	359.4
1965-66	42,642	10,821	23,138	76,601	404.2
1966-67	50,542	12,204	25,930	88,676	457.2
1967-68	60,059	11,986	28,165	1,00,210	505.0

Estimate of State Domestic Product (Kerala) by Industry of Origin
at Constant Prices (1960-61 prices) (Provisional)

Year	Agriculture (Rs. lakhs)	Mining and Industries (Rs. lakhs)	Services (Rs. lakhs)	Net Domestic product (Rs. lakhs)	Per capita Income (Rs.)
1	2	3	4	5	6
1960-61	25,429	7,859	12,910	46,198	276.3
1961-62	24,941	8,312	13,507	46,760	272.4
1962-63	25,961	8,481	14,077	48,519	275.5
1963-64	27,354	8,687	15,025	51,066	282.8
1964-65	28,194	8,897	15,708	52,799	285.3
1965-66	28,016	9,415	16,468	53,899	284.4
1966-67	29,722	9,396	17,019	56,137	289.4
1967-68	31,098	9,689	18,166	58,953	297.1

6. PLANNING STATISTICS

The following items of works were attended to by this Unit.

Annual Plan proposals of the Department for the year 1971-72 were prepared and sent to Government. The technical details of the schemes which were included in the Annual Plan 1970-71 were drawn up and sent to the Central Statistical Organisation, Government of India. Monthly, quarterly, half-yearly and annual progress reports of the Plan schemes of this Bureau were prepared and sent to State Government and Government of India. Tables relating to Indicators

of Development in backward areas were prepared and sent to Government. District-wise breakups of Plan schemes of this Bureau were prepared and sent to State Government and the Central Statistical Organisation, Government of India.

7. TRADE AND COMMERCE SECTION

This section continued to attend to the work relating to the collection and analysis of the nature, quantity and value of goods moved from and into the State by sea and rail. The data relating to seaborne trade are furnished by the Director General of Commercial Intelligence and Statistics, Calcutta. Data on railborne trade are collected from the various Railway Stations by the staff of this Department.

Seaborne Trade.—The scheme envisages the collection of data on quantity and value of foreign trade regarding the goods moved through the ports of Kerala. Statements of exports and imports port-wise, commodity-wise and currency-wise are also prepared. Export and Import Statements for the year 1969-70 have been completed.

Railborne Trade.—The consolidation of commodity-wise data for the year 1968 has been completed. The preparation of statements for the year 1969 is in progress.

CHAPTER IV

OFFICIAL STATISTICS

1. Labour Statistics Unit

During the year 1970-71 also, the Labour Statistics Division of the Bureau engaged in the collection and processing of the data relating to the various labour enactments.

1. *Annual returns under the Factories Act, 1948 for the year 1969.*—As per the Kerala Factories Rules 1957, all the factories registered under the Factories Act, 1948 have to send one copy of the annual returns under the Act, relating to the factory directly to this Bureau. The periodicity of the data is calendar year.

Number of factories and employment therein.—At the beginning of the year 1969 (i.e. 1-1-1969) there were 3001 factories on the register. During the year, 290 factories were newly registered/licensed and 130 factories were removed from the register. Thus, there were 3,161 factories at the end of the year i.e. as on 31st December 1969. Of these, 126 factories were reported to be "not working" during the year. Thus, the number of working factories was 3,035. Details of factories classified into sections 2m (i), 2m (ii) and 85 are given in the following table.

Category of Factories	Number of factories				
	As on 1st January 1969	Newly licensed/registered during 1969	Removed during 1969	On the Register as on 31st December 1969	Working Factories
1	2	3	4	5	6
Grand Total ..	3001	290	130	3161	3035
Factories as defined under section 2m (1) ..	1825	68	60	1833	1765
Do. section 2m (ii) ..	391	11	31	371	355
<i>Factories notified under section 85</i>					
(a) With the aid of power 85 (P) ..	591	190	25	756	722
(b) Without the aid of power 85 (N.P.) ..	194	21	14	201	193

Out of these 3161 factories, number of factories in the Public Sector was 92.

The average daily number of workers employed in the 1948 working factories which submitted their annual returns during the year 1969 was 1,37,203. The estimated employment in the 1051 factories not submitting annual returns was 67,061. The total employment in all the 3053 working factories thus adds up to 2,04,264.

In the factories which submitted their annual returns, the employment of women accounted for about 45 per cent.

There were altogether 939 factories in the State falling under the various industries carrying on operations declared as dangerous under section 87 of the Act.

Number of factories and employment in some selected industries in the State are given in Table No. 1.

2. *List of factories for the year 1969.*—A list of registered factories in Kerala for the year 1969 has also been compiled in this Office.

The various statements and the list of factories prepared in this Bureau were sent to the Director, Labour Bureau, Simla.

3. *Half-yearly returns under the Factories Act for the half year ending 30th June 1970.*—The half-yearly returns (form 22) under the Factories Act, 1948 for the half year ending 30th June, 1970 have been received and the work relating to the processing of the data has been attended to during the period.

4. *Annual Returns under the Payment of Wages Act, 1936 for the year 1969.*—Annual returns under the Payment of Wages Act, 1936 for the year 1969 received along with the annual returns under the Factories Act, were processed in this Bureau. The data collected relate to the calendar year 1969. The coverage is confined to factory employees whose monthly earnings fall below Rs. 400 per mensem

The average annual earnings and daily earnings of factory employees in some selected industries of the State are given in Table II.

5. *Quarterly returns under the Industrial Statistics (Labour) Rules, 1951.*—Quarterly returns relating to the Tea, Rubber, Coffee and Cardamom estates were received directly from the plantations registered under the Plantation Labour Act, 1951. The returns up to the 2nd Quarter, 1970 were processed in the Bureau and the statements on employment, attendance, absenteeism, earnings and hours of work were prepared and sent to the Director, Labour Bureau, Government of India.

The above details in respect of the estates from which returns were received for the 2nd Quarter, 1970 are given in Table No. III.

6. *Monthly returns on Industrial Disputes.*—Monthly data on industrial disputes resulting in work stoppages were being received regularly from the District Labour Officers of the State in the pro forma "Monthly Review of work stoppages".

After scrutiny, the State tables are prepared every month. Monthly statements were sent regularly to the Director, Labour Bureau, Simla.

Annual Statistics of Industrial disputes in the State which resulted in work stoppages, during the year 1970 are furnished in Table No. IV.

7. *Annual statements under the Maternity Benefit Act for the year 1969.*—As usual, the Chief Inspector of Factories and Boilers furnished the data under the Maternity Benefit Act, in respect of the factories covered by the Act, for the year 1969 also. Similarly data relating to the plantations covered by the Act were obtained from the Chief Inspector of Plantations, Kottayam.

During the year 1969, there were 903 factories and 384 plantations covered by the Maternity Benefit Act. In the 653 factories from which annual returns were received during the year, the number of claims

accepted and paid either fully or partially was 3403 and an amount of rupees 1.51 lakhs was paid as maternity benefits. In plantations, 8517 claims were accepted and paid, in the 234 estates submitting returns. A sum of Rs. 9.35 lakhs has been paid as maternity benefits to these women.

8. *Annual returns under the Indian Trade Unions Act.*—As the work relating to “the statistics of trade unions” in the State has been transferred to the “Statistics Unit” newly formed in the State Labour Department, no work on this item has been done during the year under report.

9. *State Training Programme on Improvement of Labour Statistics.*—During the year, the District Level Training programme intended for the Officers and staff of the Labour Department, the Inspectorate of Factories and Boilers and the Bureau of Economics and Statistics, has been completed. The programme of training for the staff of the primary units viz. factories, plantations, trade unions, shops and commercial establishments, etc. has also been commenced. Training classes were conducted at Alwaye, Trivandrum and Kozhikode during the period. Steps are being taken to organise the training classes in other industrial centres of the State in consultation with the Labour Department and the Inspectorate of Factories and Boilers.

TABLE No. I

Particulars regarding the number of factories and average daily employment in some selected industries in the State

<i>Sl. No.</i>	<i>Nature of Industry</i>	<i>No. of working factories</i>	<i>Average daily employment</i>
1.	Tea	.. 121	5131
2.	Cashew	.. 264	97494
3.	Beedi and cigar	.. 41	1140
4.	Cotton Textiles	.. 193	15192
5.	Coir Factories	.. 144	4247
6.	Saw Mills	.. 297	4260
7.	Printing presses	.. 234	5232
8.	Chemicals and chemical products	.. 69	8067
9.	Bricks and Tiles	.. 227	12618
10.	Repair of Motor Vehicles	.. 154	4794

TABLE No. II

Average earning of factory employees in some selected industries in Kerala

<i>Sl. No.</i>	<i>Industry</i>	<i>Average daily earnings</i>	<i>Average annual earnings</i>
(1)	(2)	(3)	(4)
1.	Rice Mills	.. 4.16	1091
2.	Sugar	.. 8.78	2671
3.	Oil Mills	.. 4.37	1273
4.	Tea Factories	.. 5.43	1642
5.	Cashew	.. 3.22	729
6.	Beedi	.. 6.88	2060
7.	Cotton Textiles	.. 6.60	2135
8.	Coir Factories	.. 7.26	1977
9.	Saw Mills	.. 5.78	1524
10.	Printing	.. 9.74	2933
11.	Heavy Chemicals	.. 10.26	3681
12.	Soap	.. 13.77	4174
13.	Bricks and Tiles	.. 6.88	2073
14.	Repairs of Motor Vehicles	.. 10.88	3296

TABLE No. III
 Statistics of Registered Plantations during the quarter ending 30-6-1970

	Total	Tea	Rubber	Coffee and Cardamom
No. of Plantations on the Register ..	414	163	138	113
No. of Plantations submitting returns ..	205	104	64	37
Total No. of workers on Rolls in the Plantations submitting returns ..	76875	64214	10922	1739
(a) Garden Labour ..	65893	57165	7336	1392
(b) Outside Labour ..	10982	7049	3586	347
Absenteeism in Plantations during the month of June 1970 ..	Garden labour Outside labour	19.7 per cent 21.3 "	19.6 per cent 15.3 "	18 per cent 34.4 "
Average monthly earnings in June 1970 ..	Garden labour Outside labour	84-93 79-68	Men Women Minors	Men Women Minors
Average daily earnings during June 1970 ..	Garden labour Outside labour	3-31 2-98	111-23 104-91 4-47 4-13	72-76 90-06 2-86 2-92
		70-84 63-75 2-78 2-53	92-38 96-86 3-56 3-65	58-89 62-96 2-36 2-24
		49-02 46-24 2-23 1-73	66-33 74-00 2-57 2-52	48.81 .. 1-79 ..

TABLE No. IV
Particulars of work stoppages during 1970

Serial number	Industry	By causes											Details of work stoppages		
		Total No. of disputes	Wages	Bonus	Working conditions	Retrenchment	Others	No. of workers normally employed	No. of workers affected	Total No. of mandays lost					
1		2	3	4	5	6	7	8	9	10	11				
	Total	..	273	115	15	6	7	130	86135	73248	611720				
1	Plantations	..	37	17	3	1	1	15	16890	16735	63156				
2	Textiles	..	6	3	..	1	..	2	950	836	3771				
3	Cashew	..	1	..	..	..	..	1	896	820	820			
4	Tiles	..	26	6	2	2	2	14	4363	4397	43340				
5	Saw Mills	..	12	10	..	..	..	2	642	640	4219			
6	Coir	..	3	2	..	..	..	1	70	70	2800			
7	Miscellaneous	..	188	77	10	2	4	95	62324	49750	493614				

TABLE No. IV—(cont.)

Serial number	Industry	Result				Method of termination					No. of strikes continuing	
		Successful	Unsuccessful	Partially successful	Indefinite	Conciliation	Direct or negotiation	Adjudication	Mediation	Others		No. of token strikes
		12	13	14	15	16	17	18	19	20	21	22
	Total	146	1	40	7	97	69	2	22	4	57	22
1	Plantations	19	..	6	..	10	11	..	4	..	10	2
2	Textiles	3	..	1	..	2	1	..	1	..	1	1
3	Cashew	..	..	..	..	..	..	..	..	..	1	..
4	Tiles	14	..	2	1	9	5	1	2	..	6	3
5	Saw Mills	10	..	1	1	9	3	..	..	..	..	..
6	Coir	2	..	..	..	2	..	..	..	..	..	1
7	Miscellaneous	98	1	30	5	65	49	1	15	4	35	15

II. Industrial Statistics Unit

The object of the scheme 'Strengthening of Industrial Statistics Unit' is to collect information on the economic structure and working of the industrial establishments in the State in the factory and non-factory sectors. The scheme consists of two parts. Part I envisages the tabulation and analysis of the A.S.I. schedules canvassed by the N.S.S. Organisation from registered factories and Part II—a sample survey on unregistered industrial establishments in the rural areas of the State.

Part I of the Scheme was sanctioned in G.O. (Rt.) No. 291/66/Plg., dated 20th October 1966 with officers and staff consisting of one Assistant Director, one Research Officer, two Research Assistants, two U.D. Compilers, six L.D. Compilers, one L.D. clerk, one L.D. Typist and one Peon. Out of the sanctioned strength, two L.D. Compilers were not in position during the year. Sri K. Balakumaran Nair and Sri John Thomas Chirayath held the post of the Assistan, Director during 1970-71. Sri John Thomas Chirayath (Assistant Director) and Sri P. R. Krishna Pillai (Research Officer) were in-charge of the unit at the end of the year. Sri P. P. Philipose, Deputy Director (Planning) was in overall charge of the Unit. Tabulation of A.S.I. schedules 1966 was attended to during the year under report. The drafting of the report of the A.S.I. 1965 was also in progress.

Part II of the scheme namely the survey on unregistered industrial establishments (rural) started in 1969-70 was continued during the year under report. The field work was attended to by the 15 investigators (5 U.D. and 10 L.D.) posted for the survey. The listing work was completed in 1969-70 itself and detailed enumeration started in April 1970. 25 per cent of the units selected from 11 industry groups chosen for special study was covered in the detailed enumeration. Altogether 2509 units were enumerated in detail, each unit being visited thrice at four months' interval and details collected to study seasonal changes. The three rounds of visit were completed by the end of December 1970. Arrangements were made to continue the survey in another set of 140 Revenue Villages and the field work started in January 1971.

Tabulation and analysis of the data—As no separate staff was sanctioned for the tabulation and analysis of the data collected under the 2nd part of the scheme, the staff sanctioned under Part I attended to this item of work also. The listing schedules (Schedule No. 1) were tabulated during the year under report.

In addition to the above a scheme for the collection of statistics of Small Scale Industries in the unorganised sector in the urban areas, sponsored by the Government of India was also undertaken by this unit. A scheme for listing the industrial units in the urban areas was

sanctioned in G.O. MS. 38/70/ID dated 29th January 1970. All the Industrial units (both registered and unregistered) were listed from all the 95 urban centres in the State by engaging 100 Compilers/Investigators on a monthly honorarium basis. The nucleus staff posted for the tabulation work were relieved of their duties on the A.N. of 30th June 1970 on expiry of the period of sanction.

A Directory showing the details of the unregistered industrial units employing 5 or more persons was prepared using the data collected in listing schedules. The editing and coding of the data was attended to by the existing staff of the Industrial Statistics Unit.

A scheme for conducting detailed enumeration of the units employing 5 or more persons was sanctioned in G.O. MS. 137/71/ID, dated 26th March 1971 with the following staff for the field work:—

1. Chief Supervisor	..	1
2. Investigator (U.D.)	..	2
3. Investigator (L.D.)	..	8

Arrangements were made to start the survey in April, 1971.

Printing the Directory.—Arrangements are being made to get the Directory of the Small Scale Units printed at an early date.

III. (1) 80 Column Mechanical Tabulation Unit

The unit consisting of 80 Column machines continued to function as a medium for doing tabulation of data of N.S.S. and other Sample Surveys mechanically. During the period under reference the schedules in respect of N.S.S. alone were taken for processing.

The following schedules were taken for punching and verification:

1. 19th Round N.S.S. Schedule	17
2. 20th do.	17
3. 20th do.	17.1
4. 21st do.	16
5. 22nd do.	16
6. 23rd do.	12

Tables in respect of the following schedules were also prepared and presented:—

1. 22nd Round N.S.S. Schedule	12
2. 19th do.	17
3. 20th do.	17
4. 21st do.	17

6,80,000 Cards were purchased during the period for the use of the Unit.

Out of the 10 operators, one operator was promoted and transferred and two other operators were given transfer. The new operators posted in the above vacancies were given training and actual work was given to the new operators after two to three weeks when they gained sufficient practice in punching and verification. Three operators were attending the work in this unit on working arrangement. As per G.O. MS. No. 3/71/Plg. dated 22nd March 1971 the sanctioned strength of L.D. Punch Card Operators was raised from 11 to 14 following a similar reduction in the number of L.D. Compilers. The total strength of Punch Card Operators is thus fixed as 2 U.D. and 14 L.D. Operators. Government have pleased to sanction compensatory allowance of Rs. 25 p.m. to each operator as per the G.O. given above.

III. (2) 40 Column Mechanical Tabulation Unit

The 40 Column Mechanical Tabulation Unit was in existence during the year 1970-71 also. The unit consists of the following data processing equipments and staff:—

Equipments:	Hand punches	..	2 Nos.
	Hand verifiers	..	2 „
	Automatic Key punch	..	1 No.
	Sorter	..	1 No.
	Tabulator	..	1 No.
Staff:	M.T. Supervisor	..	1 No.
	Operators	..	6 Nos.

The unit has undertaken the work of punching, verifying and tabulating the data on Vital Statistics for the State. During the year, data on Vital Statistics for the years 1969 and 1970 were completed. Particulars required by the Registrar-General of India and by the State Director of Health Services were prepared and furnished. Statements to be included in the Vital Statistics Bulletin 1969 and 1970 were also prepared.

IV. Industries and Plantation Section

The collection and consolidation of plantation statistics continued to be the main item of work of this Unit.

The scheme for the improvement of plantation statistics is a Plan Scheme of this Department. The main object of the scheme was to obtain reliable statistics on the following aspects in respect of Rubber, Coffee and Tea estates in the State.

1. Area under crop.
2. Area from which yield is obtained.
3. Quantity of yield.
4. No. of workers employed.

Sample surveys on Rubber and Coffee estates are being conducted in this State since 1961-62.

In order to increase the percentage response of the mailed questionnaire system adopted for the survey, a new design was introduced from X Round of the sample survey onwards for Rubber and Coffee estates. According to the new procedure fresh sample of estates have to be selected every year. The District Statistical Offices were requested to prepare a list of all Rubber and Coffee estates in the District, the list of all Rubber estates as on 1st January 1970 and that of Coffee estates as on 30th June 1970.

The sample survey on Rubber estates conducted during the year under review was the 10th Round in the series. The data collected during the previous round (9th Round) were being analysed and consolidated. The report of the sample survey on area under and production of rubber conducted in 1968 was already published (Report No. VII).

The 10th Round of the survey on Coffee estates was conducted during the year and it was in progress. It will be completed by the end of June 1971. The collection and consolidation of data relating to 9th Round were in progress. The report on the sample survey on area under and production of Coffee conducted during 1968-69 (8th Round) was already published (Report No. VI).

V. Co-ordination of Official Statistics

As per G.O. Rt. No. 180/70/Plg., dated 18th July 1970 Government have sanctioned the implementation of a scheme for the co-ordination of Official Statistics to co-ordinate the activities of the Statistical Units in the various Government Departments with a view to improve the quality, timeliness and coverage of data. Government have also sanctioned the creation of a temporary post of one Deputy Director and a Stenographer. Accordingly the Deputy Director assumed charge with effect from 11th December 1970 F.N. As such the activities of the division cover only a little more than three months of the period under report.

During this period, some preliminary work like preparing a questionnaire to elicit the details of work being attended to by the various units and getting them filled up by direct contact, etc. were attended to.

CHAPTER V

VITAL STATISTICS AND DEMOGRAPHIC RESEARCH UNIT

I. Vital Statistics

The Bureau of Economics and Statistics is responsible for the compilation, analysis and publication of Vital Statistics Report for the State.

Source of data.—The registration work of birth and death in the rural areas of Travancore-Cochin area is attended to by the staff of the Health Department, and in the Malabar region the work is attended to by the staff of the Revenue Department for the previous year. But after the implementation of Birth and Death Registration Act come into force the work in the rural area is attended to by the Panchayat Executive Officers for the whole State. The collection of data in the urban area is done by the Municipal/Corporation staff for the entire State. The Executive Officers of the Panchayat Department and Commissioners of the Municipal/Corporation collect the filled-in Birth and Death Cards and pass them on to this Department. To facilitate the regular and speedy flow of the returns the Department has introduced "Service Unpaid" system with Postal Department since 1964.

Processing of data.—The collected filled-in Birth and Death Cards are coded in the Vital Statistics Section of the Bureau and passes on to the Mechanical Tabulation Unit for tabulation. The data are processed, and various statements are prepared by the Vital Statistics Section.

Data published:

1. Statements of birth, death, still birth, infant deaths and maternal deaths and their rates for the year 1969.
2. Statements of births, deaths, still births, infant deaths and maternal deaths for the Municipalities/Corporations having a population of 30,000 and over.
3. Live births, deaths, still births, infant deaths, maternal deaths and their rates for the Municipalities/Corporations having a population of 30,000 and over.
4. Live births, still births, deaths, infant deaths and maternal deaths relating to towns and cities having a population of 30,000 and over district-wise.
5. Infant death in Kerala by age and sex.
6. Month-wise distribution of live births for the State (Rural-Urban).
7. Month-wise distribution of live births in the Municipalities and Corporations.

8. Month-wise distribution of deaths (State).
9. Month-wise distribution of infant death (State).
10. Age-wise distribution of death—according to sex (State).
11. Death from specified diseases.
12. Death by causes.
13. Sex ratio at birth (District-wise).
14. Deaths classified according to age—District-wise and sex-wise.
15. Births by religion and sex—District-wise.
16. Death by religion and sex—District-wise.
17. Birth by religion in the cities and towns.
18. Death by religion in the cities and towns.
19. Death—month-wise in the towns and cities.
20. Infant death—month-wise in the towns and cities.
21. Death by age and sex in the Municipalities and Corporations.
22. Order of birth by age group of mothers (State—Rural—Urban).
23. Order of birth by age group of mothers for each town and city.
24. Average number of children born to mothers of different age group for the State—Rural and Urban.
25. Average number of children born to mothers of different age group in the towns and cities.
26. Taluk-wise figures of birth, death, infant deaths, still births and maternal deaths and their rates.

Periodical statements.—The following are the out-going periodicals:

1. Daily report of epidemic diseases.
2. Weekly report of epidemic diseases.
3. Weekly telegram of epidemic diseases.
4. Weekly statement of death due to communicable diseases relating to the towns and cities having a population of 30,000 and over.
5. Weekly statement of notified diseases.
6. Annual statement of births and deaths.
7. Monthly statement of vital statistics.

The periodicals are sent to the Director General, Health Services, New Delhi; Registrar General of India; Director of Health Services, Trivandrum; Superintendent of Government Presses (for publication in the Government Gazette).

A statement showing the district-wise figures of births, deaths, still births, infant deaths and maternal deaths and their rates for the year 1969 in appended is Table II of Administration Report to the Director of Health Services. It is to be noted that these figures are the total number of events registered.

Improvement of Vital Statistics.—The followings schemes for the improvement of Vital Statistics were continued during the year:—

1. Sample Registration.
2. Strengthening of Vital Statistics Organisation at Headquarters.
3. Strengthening of Statistical Unit in the Municipalities.
4. Strengthening of District Statistical Offices.
5. Model Registration in Rural Health Centres.
6. Setting up of Mechanical Tabulation Unit.

Strengthening of Vital Statistics Organisation in the headquarters—The staff pattern is given below:

1. Deputy Director	..	1
2. Assistant Director (Nosology)	..	1
3. Research Officer	..	1
4. Research Assistant	..	1
5. M.T. Supervisor	..	1
6. Accountant	..	1
7. Typist	..	1
8. Clerk	..	1
9. Punch Card Operator	..	6

Compilation, processing, analysis of data, preparation of reports, etc., are attended to by the staff.

Strengthening of District Statistical Offices.—Under the schemes one Senior Research Assistant and one L.D. Compiler had been posted in the District. They attended to the timely flow of returns from the Taluk Registrars to the Headquarters. The Senior Research Assistant, supervises the work of the statistical staff posted in the Municipalities of the District. One of the important items of work of the Senior Research Assistant is to carry out effective spot checks in selected areas to spot out unregistered events and make arrangements to get them registered. The District Statistical Officer, Senior Research Assistant, Research Assistant and U.D. Compilers in the Municipalities are also the checking officers of registration of birth and death.

Strengthening of Vital Statistics Unit in Municipalities and Corporations.—The scheme is introduced with a view to encourage registration of Vital Statistics events that occur in the urban area. One Deputy Health Officer is posted in each of the Corporations and Municipalities having population more than one lakh and Vital Statistics staff are posted in all the other Municipalities.

Method of improvement of registration.—A film “Vital Records” (2 copies 35 m.m.) stressing the need and importance of registration have been exhibited in the theatres in the Municipalities and Corporations. Slides also were shown in the theatres of many of the Municipalities.

Also the film 8 copies 16 mm. supplied by the Ministry of Information and Broadcasting, were supplied to the District Statistical Officers to be shown in the rural areas.

II. Strengthening of Vital Statistics in Municipalities/ Corporations

The scheme was in operation in the three Corporations and 25 Municipalities and in Guruvayoor Township during the year under report. Under the scheme the posts of 5 Deputy Health Officers have been filled up during the year and they were posted in the 3 Corporations (Trivandrum, Cochin, and Kozhikode) and 2 major Municipalities (Quilon and Alleppey). The Deputy Health Officers were given preliminary training in the Bureau for a period of one week about the basic concepts of Vital Statistics and about their duties/functions in the improvement of Vital Statistics in the Municipalities.

TABLE No. II

District-wise—Rural—Urban—Birth, still birth, infant death and maternal death and their rates for the year

State/District	Population (1969)	Birth		Death		Still birth		Infant death		Maternal death		
		No.	Rate	No.	Rate	No.	Rate	No.	Rate	No.	Rate	
1	3	4	5	6	7	8	9	10	11	12	13	
State	Total	20321249	378716	18.64	87186	4.29	2910	7.63	7519	19.85	292	0.77
	Rural	18375139	271569	14.78	65021	3.54	500	1.84	5148	18.96	217	0.80
	Urban	1946110	107147	55.06	22165	11.39	2410	22.00	2371	22.13	75	0.68
Trivandrum	Total	2097184	41668	19.87	8493	4.05	391	9.30	789	18.94	15	0.36
	Rural	1758017	18491	10.52	4442	2.53	9	0.49	366	19.79	8	0.43
	Urban	331722	23177	69.87	4051	12.21	382	16.21	423	18.25	7	0.30
Quilon	Total	2333644	43999	18.85	8978	3.85	546	12.26	827	18.80	39	0.88
	Rural	2224227	35599	16.01	7576	3.41	149	4.17	652	18.32	26	0.73
	Urban	109417	8400	76.77	1402	12.81	397	45.13	175	20.83	13	1.48
Alleppey	Total	2177392	43500	19.98	10298	4.73	222	5.08	736	16.92	23	0.53
	Rural	1867507	31963	17.12	7962	4.26	45	1.41	532	16.64	14	0.44
	Urban	309885	11537	37.23	2336	7.54	177	15.11	204	17.68	9	0.77
Kottayam	Total	2083179	39167	18.80	8273	3.97	150	3.82	933	23.82	12	0.31
	Rural	1929381	32787	16.99	6634	3.44	93	2.83	782	23.85	12	0.36
	Urban	153798	6380	41.48	1639	10.66	57	8.86	151	23.67	..	..
Ernakulam	Total	2255891	46527	20.81	9006	4.02	648	13.74	738	15.86	16	0.34
	Rural	1854826	28508	15.37	5438	2.93	59	2.07	441	15.47	12	0.42
	Urban	381065	18019	47.29	3568	9.36	589	31.65	297	16.48	4	0.21

TABLE No. II—(cont.)

State/District	Population (1969)	Birth		Death		Still birth		Infant death		Maternal death		
		No.	Rate	No.	Rate	No.	Rate	No.	Rate	No.	Rate	
1	2	3	4	5	6	7	8	9	10	11	12	13
Trichur	Total	1971357	26342	13.36	4402	2.23	74	2.80	364	13.82	10	0.38
	Rural	1837149	16708	9.08	2967	1.62	54	3.22	261	15.62	10	0.60
	Urban	134208	9634	71.78	1435	10.69	20	2.07	103	10.69	..	..
Palghat	Total	2136177	32953	15.42	10986	5.14	303	9.11	994	30.16	75	2.26
	Rural	2011061	27302	13.58	8951	4.45	11	0.40	662	24.25	48	1.76
	Urban	125116	5651	45.17	2035	16.26	292	49.13	332	58.75	27	4.54
Kozhikode	Total	3146249	61517	19.55	15914	5.06	421	6.80	1288	20.94	64	1.03
	Rural	2662026	43143	15.07	11609	4.06	40	0.93	795	18.43	51	1.18
	Urban	284223	18374	64.65	4305	15.15	381	20.31	493	26.83	13	0.69
Cannanore	Total	2040176	43043	21.10	10336	5.31	155	3.59	850	19.75	38	0.88
	Rural	2030945	37068	18.26	9442	4.65	40	1.08	657	17.72	36	0.97
	Urban	109231	5975	54.70	1394	12.76	115	18.88	193	32.30	2	0.33

NOTE.—1. Birth Rate = Total No. of Live births × 1000/Population.

2. Death Rate = Total No. of Deaths × 1000/Population.

3. Infant Death Rate = Total No. of Infant death × 100.

Total No. of Live Births.

4. Still Birth Rate = Total No. of Still Birth × 1000.

Total No. of Live Births + Still Births

5. Maternal Death Rate = Total No. of Maternal Death × 1000.

Total No. of Live Births + Still Births.

During the year the following reports were published:—

1. Vital rates in the Mattancherry Town for the year 1967.
2. Vital rates in the Municipal Town of Tellicherry for the year 1968.
3. Vital rates in Mavelikara Municipality for the year 1968.

Model Registration—Survey of cause of death.—The Scheme of Model Registration—Survey of cause of death was continued in the 18 Primary Health Centres selected in 1969-70.

Medical Certification of cause of death.—During the year under report the scheme was extended to the two cities of Cochin and Kozhikode and the two major municipal towns of Quilon and Alleppey. The Medical Officers in charge of the institutions both Government and Private, working in the above cities and towns were also requested to forward the certificates showing the cause of death.

III. Sample Registration Scheme (Rural)

The scheme "Sample Registration (Rural)" was initiated by the Registrar General of India in order to arrive at reliable estimates of birth and death rates. In Kerala the scheme is being implemented by the Bureau of Economics and Statistics. The scheme was launched in July 1965 in 150 sample units, randomly selected from the rural areas of Kerala, and it was continued in 1970-71 also in the same 150 samples.

Staff Pattern.—The technical staff for the scheme is as shown below:

1. Chief Supervisor	(one)	on Rs.	375-800
2. Research Assistants	(two)	"	220-370
3. Upper Division Complier	(one)	"	130-270
4. Lower Division Complier	(nine)	"	90-190
5. Part-time Enumerators	(150)		
(One hundred and fifty)			

The Deputy Director (VS) in the Bureau is the State Supervising Officer for the scheme.

Agency for field work.—The part-time Enumerators constituted the primary agency for field work and they were appointed, one in each sample unit, at the beginning of the survey in 1965. In a few instances the Enumerators who were found to be unwilling or indifferent were replaced by fresh hands. In all other cases the persons appointed in 1965 continued. The Enumerators were selected from among the staff belonging to the Development, Revenue and Education Departments, like School Teachers, Village Assistants, etc. Most of them are School Teachers. Retired persons are also appointed as Enumerators.

The part-time Enumerators are paid a remuneration of Rs. 15 for sample units with population below 500; Rs. 20 for units with population between 500 and 1500; and Rs. 25 for units with population 1500 and above. An additional amount of Rs. 5 is paid to those who are working in hilly-tracts and water-logged areas.

SCHEME OF WORK:

(i) *Continuous registration by the part-time Enumerators.*—The Enumerators do continuous registration of births and deaths as they occur. All events of births and deaths are recorded by them in the birth and death registers kept by them. For this purpose they contact the concerned households and collect the information. The details of events registered by them in the birth and death registers during a month are copied and sent to the headquarters and District Offices in the form of monthly statements.

(ii) *Informant system.*—In order to ensure that all the vital events are registered without omission and time-lag, the Enumerators have arranged with some local people (informants) to make a note of all the births and deaths which they come to know of. The informants are selected mostly from among persons who take part in ceremonies or functions connected with births and deaths, like local dais, midwives, barbers, washermen, priests, etc. The Enumerators contact these informants at regular intervals of one week or ten days and gather information about births and deaths which took place in the area. As the Enumerator appointed for a sample unit has been in position for a sufficiently long period he can very easily gather this information from the informants and other persons of the locality acquainted with him. After getting information from the informants regarding the occurrence of births and deaths in the vicinity, the Enumerator visits the households in which the events have occurred and collects complete information regarding the events and records the details in the birth and death registers kept by him.

(iii) *Quarterly visits by Enumerators.*—The informant system is one source for gathering information regarding the occurrence of births and deaths. But it is possible that the informants may miss some events, particularly those occurring outside the sample area to usual residents of the sample. In order to net all events occurring during a quarter the Enumerator visits each and every house/household in the sample area and collects information on births and deaths that have occurred during the quarter and records the events in the registers.

(iv) *Half-yearly survey by Supervisor.*—An independent checking of all the vital events in the sample is done through a Half-yearly Survey carried out every six months. This survey is done by a Supervisor who has been assigned one or a few samples and he visits each and every household in the sample area and lists all the births and deaths that

have taken place during the half-year period (January to June or July to December) and collects other details pertaining to these events. This work is done by the Supervisor independent of the Enumerator and without referring to his birth and death registers which would be called back to the District headquarters at the beginning of each half-yearly survey before the supervisor proceeds to the sample. This step is taken to ensure complete independence of the two attempts made to net all the vital events. The events registered continuously by the Enumerators are matched with the events listed by the Supervisor; unmatched events and extra events found out by the Supervisor, are then verified by another investigation. This re-verification is generally done by a higher officer who in the course of this checking may come across events that both the Enumerator and Supervisor have failed to include. A final list of correct events is then prepared and sent to the headquarters office.

(v) *Intensive enquiries.*—After each half-yearly survey a minimum of 10 per cent of the sample units are selected and enquiries are conducted in these sample units. This is another independent enquiry to ascertain the extent of missing of events by the Enumerator and Supervisor. The intensive enquiry in each of the selected sample is done by an officer of the Bureau other than the Supervisor. The results of the intensive enquiries are used to work out correction factors in the finalisation of the vital rates.

Supervisors.—The District Statistical Officer and Senior Research Assistant inspect the field work at the District level and the Chief Supervisor inspects the field work at the State level. The Deputy Director (Vital Statistics) who is the State Supervising Officer is in overall charge of the scheme.

Training to Enumerators and Supervisors.—The part-time Enumerators were given training at the District headquarters before the survey was started in 1965. Thereafter refresher training was imparted to them in 1969 and 1970. The Supervisors are usually given training before the commencement of every half-yearly survey.

Tabulation and analysis.—According to the Scheme, the Bureau has to furnish the following data to the Registrar-General of India.

(a) Monthly consolidated data obtained from continuous registration of events by Enumerators.

(b) Details of events detected through half-yearly surveys.

(c) Population of sample units as found from half-yearly survey.

(d) Details of events detected through intensive enquiries.

(e) Annual report on the results of the survey.

Enquiries conducted during 1970-71.—During the year under report, sample registration work was conducted in the same 150 villages. The half-yearly survey was conducted for the half-years ending June and December 1970.

Results of the Survey.—The estimated rates of birth and death for the various strata for the year 1968-69 together with their standard errors are given in the appended statement.

Miscellaneous.—During the year under report the Registrar-General of India organised two workshop trainings for the officers associated with sample registration work. Sri K. Mailerum Perumal Pillai, Chief Supervisor attended the Functional (Refresher) Training conducted in New Delhi from 17th to 21st of August 1970 and Sri S. Bhagavatheswara Iyer, Deputy Director attended the Foundation (Basic) Training conducted there from 21st to 24th of September 1970.

The sixth annual conference on Sample Registration was held in Poona from 17th to 20th of December 1970 and Sri S. Bhagavatheswara Iyer, Deputy Director attended the conference. The question of revising the various Sample Registration Survey forms and schedules was discussed in detail in the conference and it was considered necessary to up-date the information on age and marital status of the individuals enumerated in form 2. The need for full-time staff for intensive supervision of the continuous enumeration and of Half Yearly Surveys was also recognised.

Estimated rates of birth and death and their standard errors (1968-69)

Sl. No.	Stratum No. and description	No. of Sample Units selected from stratum	Birth rate	Standard error per cent	Death rate	Standard error per cent
1	2	3	4	5	6	7
1	I-A	1	33.39	..	9.54	..
2	I-B	1	40.18	..	4.59	..
3	I-C	5	28.82	7.09	9.72	1.99
4	I-D	29	30.87	1.28	10.01	2.09
5	Total (I Low land)	36	30.98	1.45	9.74	1.85
6	II-A	1	12.14	..	2.43	..
7	II-B	6	30.94	10.67	8.53	0.27
8	II-C	18	30.49	5.76	10.65	2.82
9	II-D	66	32.21	1.16	10.05	0.58
10	Total (II Mid land)	91	31.45	1.67	9.93	0.29
11	III-A	..	..	..	..	..
12	III-B	1	33.30	..	13.66	..
13	III-C	3	40.42	1.41	9.81	2.00
14	III-D	19	32.06	1.62	10.43	2.88
15	Total (III Highland)	23	32.78	2.05	10.45	4.59
16	State A	2	15.56	..	3.57	..
17	" B	8	32.78	10.06	8.14	0.28
18	" C	26	30.90	4.85	10.39	7.31
19	" D	114	31.85	0.79	10.11	1.29
20	Total State	150	31.54	1.13	9.97	1.96

N.B.—Stratum A is constituted by villages with 1961 census population below 500.
 " B do. between 500 and 999.
 " C do. between 1000 and 1999.
 " D do. between 2000 and above.

IV. Demographic Research Centre

The Demographic Research Centre in the Bureau of Economics and Statistics, Trivandrum was started in August 1958 for conducting investigations of socio-economic factors affecting fertility, collecting information on attitude to family planning, studying the effect of family planning programme and other aspects of the population problem. A brief description of the items of work undertaken and completed during the year under review is given below.

1. *Studies completed.*—(i) *Demographic particulars of sterilised persons in Kerala 1967-68.*—The study reveals that the characteristics of sterilised persons during the reference period are more or less similar to those found during the previous year. The results bear evidence that the vasectomy is becoming more popular over the successive years and it is more so in the older age groups. The results of the religion-wise analysis show that the lower acceptance rate of sterilisation among Muslims continues. The impact of the programme is marked more among educated persons and those in the low income groups.

An increasing trend over the years is seen in respect of the number of sterilisations. The number of sterilisations conducted in 1967-68 works out to 3.2 per 1,000 (1967-68) population.

(ii) *A Demographic profile of the sterilised persons in Kerala 1957-67.*—This paper presents a comprehensive report based on the data from the inception of the programme till the end of March 1967 highlighting the changes over the years.

The percentage of female sterilisation to the total number of sterilisations has shown a decreasing trend from 33 in 1956-61 to 19 in 1966-67. The medium age at the time of sterilisation is 37.5 years for males and 30.3 years for females.

35% persons, 37% males and 29% females have 3 or less children living at the time of sterilisation.

About 4% males and females sterilised have no male children while the percentage having no female child is 7. The preference for male children is evident from this.

(iii) *Social and cultural aspects of fertility of women in Kerala.*—In this study, an attempt is made to analyse the social and cultural aspects of the families which influence the fertility of women in Kerala using the population census data for the year 1901 to 1931. Since socially valued goals are realised through family the analysis has been made on the basis of the traditional families of Kerala. Three types of families are considered in this study. They are the Brahmin type, the Tarawad type and the Artisan type.

The Brahmin type indicates a lower level of fertility than the Tarawad type and Artisan type. The child-married women ratio ranges from 655 to 1079 for Brahmin type and 827 to 1355 for Tarawad type and 830 to 1284 for Artisan type during the period 1901 to 1931. An average of 5.89 children in Brahmin type, 6.3 children in Tarawad type and 7.12 children in Artisan type families are born to married females of completed fertility.

(iv) *Evaluation of Family Planning activities in Perumkadavila Block, Trivandrum District.*—The data for the study were collected through a sample survey. The objectives of the study were to find out:

(i) the percentage of eligible couples who have come under family planning hold.

(ii) their preference to various methods of birth control.

(iii) determinants of fertility in various groups of couples, taking into account several factors such as age, duration of marriage, age at marriage, age at first delivery, etc.

(iv) levels of knowledge, attitudes and practices on family planning in accordance with the socio-economic situation as determined by marital status, education, occupation, income, religion, etc. of couples.

(v) demographic particulars of sterilised males and females and after effects of sterilisation.

(vi) obstacles to family planning.

The survey reveals that knowledge of family planning has a close bearing on education. Preference for higher age at marriage of boys and girls and age at first delivery are also closely associated with education.

(v) *A study of the I.U.C.D. acceptors in Kerala during 1966-67 and 1967-68.*—The study gives a broad indication of the characteristic of I.U.C.D. acceptors in Kerala during 1966-67 and 1967-68.

About 80% of the I.U.C.D. acceptors belong to the age group 25-39 years. I.U.C.D. is seen to be less popular in the early years of marriage and after 40 years.

About 50% in 1967-68 adopt I.U.C.D. when they have 3 or less children living. Only very few (6% women with less than 2 children and 15% of the women with more than five children) adopt I.U.C.D.

2. *Reports in the process of finalisation.*—The following reports are in the process of finalisation.

(i) Population of Kottayam District.

(ii) A study on the massive vasectomy camp at Ernakulam during November-December 1970.

(iii) Peculiarities in the labour participation rate of Kerala.

3. *Studies in Progress*.—The following studies have been taken up by the centre and are in progress.

(i) Study of sterilised persons and I.U.C.D. acceptors (1968-69).

(ii) A study of Basic Family Planning Registers in Public Health Centres.

(iii) Some aspects of migration in Kerala.

(iv) Study of differentials in input output in Family Planning in Trivandrum District.

(v) Attitude survey among workers in factories and estates.

(vi) The process of urbanisation in Kerala.

4. *Seminars, Conferences and Training Classes*.—The Officers of this centre participated in various seminars, conferences and training classes during the period under review.

Sri S. Bhagavatheeswara Iyer, Deputy Director, participated in the All India Seminar on "Evaluation of Family Planning in India" held at the International Institute for Population Studies, Bombay from 13th to 15th July 1970.

Sri P. S. Gopinathan Nair, Assistant Director was deputed for the six weeks' sub-regional training in Fertility and Evaluation of Family Planning jointly sponsored by the Government of India and the E.C.A.F.E. and conducted at the International Institute for Population Studies, Bombay from 1st November 1970 to 12th December 1970.

Sri S. Bhagavatheeswara Iyer, Deputy Director (Population) attended the meeting of the expert group of the D.C.A.R. Committee held on 16th March 1971 at the National Institute of Family Planning, New Delhi.

The Officers of the Demographic Research Centre continued to be associated with the training of Medical Officers at the Orientation Training Centre at Neyyattinkara. The Director and the Deputy Director, Vital Statistics were associated in the training imparted to the Senior Medical Officers in the Department of Social and Preventive Medicine, Medical College, Trivandrum.

5. *Kerala Demographic News Letter*.—The centre started the issue of the bi-annual news letter in October 1963. During the year under review two news letters were published, one in April 1970 and the other in October 1970.

6. *Publications released.*—

1. Demographic particulars of sterilised persons in Kerala 1967-68.
2. A Demographic profile of the sterilised persons in Kerala 1957-67.
3. Population of Cannanore District.
4. Social and cultural aspects of fertility of women in Kerala.
5. A study of the I.U.C.D. acceptors in Kerala during 1966-67 and 1967-68.

CHAPTER VI

ADMINISTRATIVE INTELLIGENCE

I. Administrative Intelligence Unit

Administrative Intelligence Unit was organised in this Bureau with effect from 1st November 1961. The object of the unit is the collection, compilation and analysis of Community Development Statistics on a rationalised and standardised basis.

The unit attends to the collection and compilation of administrative data and preparation of the following reports:—

(i) *Monthly Progress Report on C.D. Programme.*—The data in prescribed pro forma are being forwarded by all the 144 Blocks to the concerned District Statistical Officers. The District Statistical Officers consolidate the reports and prepare analytical reviews at the district level. Copies of the reviews are sent to this Bureau, concerned District Collectors and to Government.

(ii) *Quarterly Progress Report on C.D. Programme.*—The data in the form prescribed for this are being furnished by all the Blocks to the District Statistical Officers who in turn submit the same to this office for consolidation and review of progress. The staff of this unit consolidates the data and prepare the progress reports for each quarter. Copies of the reports are being submitted to the State Government and Government of India.

(iii) *Annual Progress Report—Part I on C.D. Programme for the year ending March.*—Procedure is the same as for C.D. Programme. The consolidated report is being submitted to the State Government as well as Central Government.

(iv) *Annual Progress Report—Part II for the year ending June.*—The procedure followed is the same as for Annual Progress Report—Part I.

(v) *Quarterly Reports on Local Development Works.*—In this case also, the quarterly reports are being prepared by the Bureau and submitted to Government.

(vi) *Quarterly Reports on Rural Man-power Programme.*—The primary data in the prescribed form are being furnished by the Blocks where the programme has been implemented (in 63 Blocks now). The Administrative Intelligence Section consolidates the data and prepares the Quarterly Progress Report and its review and submits to the State Government and the Government of India. Copies of the review are being sent to the concerned Block Development Officers, District Collectors and the Project Evaluation Officer, Trivandrum.

(vii) *Quarterly Reports on Applied Nutrition Programme.*—This programme is in operation in 50 Blocks now. Primary data are being received in this office from these Blocks. Consolidated Quarterly Progress Reports are being prepared and submitted to Government.

(viii) *Reports on Special Programme.*—Preparation of the Progress Reports pertaining to Yuvak and Mahila Mandals Programme, Fisheries Development Programme and Intensive Poultry Development Programme are also attended to by this Section.

Yuvak and Mahila Mandals Programme is in operation in all Blocks except Post-stage II Blocks. Fisheries Development Programme is in operation in 6 Blocks and Poultry Development Programme in 2 centres namely Pettah in Trivandrum District and Muvattupuzha in Ernakulam District.

This section prepares the quarterly reports of all items under Special Programmes at the State level and submits to Government.

(ix) *Annual Progress Report on Tribal Development Block.*—The section collects the information from the Tribal Development Block and submits the same to Government.

All the reports prepared in this unit are being submitted to the Government of India by the State Government.

II. Applied Nutrition Programme

The Applied Nutrition Programme was started in Kerala during the year 1963-64 as subsidiary plan of operations for an Applied Nutrition Programme in India. In G.O. (MS.) 368/64/A & RDD., dated 19th June 1964 Government accorded sanction for the conduct of

evaluation studies on Applied Nutrition Programme in the 5 Blocks of Trivandrum Rural, Athiyannur, Kottarakara, Ollukara and Talipramba where the programme was introduced in 1963-64. The scheme envisages the pre-action phase, action phase and post-action phase study of the programme.

The pre-action phase study envisages a survey of the conditions existing at the time of opening the project. The action phase study envisages the survey and study of the implementation of the A.N.P. including its organisational aspect while the post action phase study attempts at the assessment of the impact, the programme is making in the area of operation.

The study was at first entrusted to the evaluation unit attached to the Agricultural and Rural Development Department. The field work of the pre-action phase survey was conducted by the evaluation unit in the 5 A.N.P. Blocks with the assistance of one Junior Statistical Inspector in each Block. The work relating to the evaluation study was subsequently transferred to the Bureau of Economics and Statistics. The field work of the action phase survey in the 5 Blocks was thereafter completed. The reports relating to both pre-action and action phase surveys in respect of the above Blocks were prepared and sent to Government. The pre-action phase survey relating to the second series of eight A.N.P. Blocks namely Vettikkavala, Pattanakad, Koovappady, Kaduthuruthy, Kunnamangalam, Payyan-noor, Attappady and Chittoor was taken up and completed in 1968-69. The reports relating to the same is being written up.

The date relating to post-action phase survey in respect of the first series of Blocks and action phase survey of the second series of eight Blocks are being processed preliminary to the preparation of the reports. The post-action phase survey in the second series of 8 Blocks was started in March 1971 and it is scheduled to be terminated in February 1972.

Training Unit.—During the period under report, twenty-nine personnel at intermediate level of this Bureau were given training in statistical methods, economic concepts, official statistics, etc. The period of training was about 12 weeks. One officer each was sent for training in labour statistics at Labour Bureau, Simla; in Housing Statistics in the National Building Organisation, New Delhi and in Evaluation Training under Programme Evaluation Organisation at Delhi.

CHAPTER VII

OTHER SAMPLE SURVEYS AND PILOT SURVEYS

I. National Sample Survey

1. *Organisation.*—The National Sample Survey Organisation of the Government of India which came into existence in 1950 has been conducting sample surveys every year on a nation-wide basis for collecting necessary socio-economic and agricultural data required for planning and other purposes by the Central and State Governments. The State has been participating in the survey on a matching basis.

2. *Period of Survey.*—The period of one round of the survey is normally one agricultural year beginning with 1st July and ending with 30th of June next. The field work of 24th round of National Sample Survey was completed by the end of June 1970 and the 25th round was started from July 1970. The field work of 25th round is scheduled to be completed by the end of June 1971.

3. *Subject coverage.*—For each round the subject coverage, sample design and tabulation programme are finalised by the Central Statistical Organisation, Government of India. The technical work relating to the details of the sample design, design of schedules, etc., is done by the Indian Statistical Institute, Calcutta. During the 25th round National Sample Survey, 360 rural villages and 144 urban Blocks are selected for the collection of socio-economic data. In all the 360 rural villages, crop surveys are also conducted besides the socio-economic enquiry. In the N.S.S., the data on socio-economic characteristics are collected by the method of personal interview and crop statistics are obtained by the method of direct physical observation.

The following schedules are canvassed during the 25th round of National Sample Survey :

<i>Sl. No.</i>	<i>Schedule No.</i>	<i>Description</i>	<i>Sector</i>
1.	0.1	General Schedule	Rural
2.	0.2	do.	Urban
3.	5.0	Land Utilisation Survey	Rural
4.	5.01	List of plots for Land Utilisation Survey	Rural
5.	16 (R)	Integrated Household Survey	Rural and Urban
6.	16(R)S	Indebtedness of non-manual employee households	Urban
7.	16.1	Economic condition of small cultivation households	Rural
8.	16.2	Economic condition of the rural non-cultivating wage-earner households	Rural

Sample design (Rural).—The sample design for the rural sector is a stratified two stage one in which the first stage units are census villages (1961 census) and they are selected with probability proportional to size. The State has been divided into 15 strata. For each stratum 4 sub-samples of 6 villages each have been selected. The second stage units are households for socio-economic schedules and cluster of plots for crop survey schedules. 360 villages are selected for the survey for 25th round.

Sample design (Urban).—The design is a stratified two stage one, where strata are formed on the basis of the population of towns and cities. The State has been divided into two strata, the first stratum consisting of the towns and cities with a population of less than 50,000 and the remaining towns and cities forming stratum 2. A total of 144 blocks are selected for 25th round National Sample Survey.

Tabulation.—Tabulation and analysis of data collected from State samples of National Sample Survey are being attended to by this section. The tabulation and analysis of data relating to the following schedules were completed during the year:

1. Population birth and death	20th round
2. Do.	21st round
3. Integrated household schedule abridged	19th round
4. Do.	20th round
5. Integrated household schedule with detailed particulars of trading enterprise	20th round

The tables prepared by this bureau for the State samples in respect of the above items were exchanged with the tables prepared by the Indian Statistical Institute for the central tables.

Reports:

1. Report on "Villages in Kerala" based on the data collected in the 19th round of National Sample Survey, July 1964 to June 1965—under print.

2. Reports on "Labour force status in Kerala" based on the 21st and 22nd rounds of National Sample Survey are being prepared.

3. Preparation of Report on "Housing condition in Kerala" based on the data collected in Schedule 1.0 of 17th round of National Sample Survey is in progress.

4. Preparation of Report on "Population birth and death in Kerala" based on the data collected in Schedule 12 of 19th round of National Sample Survey is in progress.

II. Wage Structure Survey

As in the previous years, the survey for the collection of wage rates in the sectors of construction, trade and commerce was continued in the 17 municipalities and also in 27 panchayats at the rate of 3 in each district.

III. Collection of data on Road Mileage and Expenditure

The Transport Research Directorate in the Ministry of Transport, Government of India is publishing an Annual Bulletin called "The Basic Road Statistics of India". The data relating to this State required for the above publication are being collected from different departments, like Public Works Department, Municipality, Panchayats, Electricity Board and Port Trust. Statistics of mileage under each category of road, viz. cement, concrete, black top, etc. and expenditure incurred therefor are being collected from the above departments and compiled as per the pro forma prescribed by the Transport Ministry. Data on the above are compiled for each district in this section. Further, expenditure figures on construction and maintenance of major buildings also are being collected and compiled in this section. The statement for the year 1968-69 has been compiled during the period under report.

IV. Collection of Statistics on Cinema and Entertainment tax

The data on Cinema and entertainment tax for the quarters ended 30th September 1969 to 30th September 1970 have been collected from district offices and compiled for publication.

V. Panchayat Index Cards

Basic Statistics relating to all Panchayats in the State are being collected through the District Statistical Offices for the preparation of Panchayat Index Cards. Data for the years 1968 and 1969 are being collected from District Offices.

VI. Housing Statistics Unit

As per G.O. (Rt) 196/67/Plg. dated 28th July 1967, a Housing Statistics Cell was set up (1st September 1967) in the State on a three tier basis, one unit each in the Public Works Department (in the Chief Engineer's office), in the Directorate of Municipalities and a Co-ordinating Unit in the Bureau of Economics and Statistics which attended the following items of work:

1. *The unit of the Housing Cell in the Public Works Department.*— This unit collected and consolidated the statistics of building construction activities undertaken by the State Government agencies costing Rs. 20,000 and above. The compilers posted in the Chief Engineer's office were deputed to the offices of the Executive Engineer to collect the required data.

The collection of data relating to the market prices of building materials and wages of building labour from the Public Works Department division offices was also attended to.

2. *The unit of the Housing Cell in the Department of Local Bodies.*—This unit collected from the municipalities in the State the quarterly returns in Schedule II relating to the construction activities of buildings undertaken by the private individuals and forwarded the consolidated statements to the co-ordinating unit in the Bureau. Data on prices of building materials and wages of building labour for every quarters were also collected from the three municipalities.

3. *The co-ordinating unit of the Housing Cell in the Bureau of Economics and Statistics.*—The consolidation and processing of the data received from other units of the Housing Cell in the Public Works Department and Directorate of Municipalities were attended to by the co-ordinating unit in the Bureau of Economics and Statistics. This unit also collected prices of building materials and wages of building labour from the District headquarters on the last day of every quarter and the consolidated data were transmitted to the National Building Organisation, Government of India. The data on building construction activities costing Rs. 20,000 and above were also collected by this unit directly from the Kerala State Road Transport Corporation, Universities of Kerala and Calicut, Electricity Board and the Plantation Corporation. This unit is collecting the building construction activities of the private individuals of the three city corporations in the State and compilation and consolidation work are also attending to.

A report on Tax Incidence on Housing in Trivandrum City was published by this unit during the period under review.

Staff pattern of the Housing Cell—1. The Co-ordinating Unit.—One Research Officer and one L.D. Compiler were working in this scheme. One Research Assistant has been posted in this unit on a working arrangement. Sri A. V. Mathai was the Research Officer of this unit during the period.

Sri P. P. Philipose, Deputy Director and Sri K. Balakumaran Nair and Sri John Thomas Chirayath, Assistant Directors were in charge of the Housing Cell during the period under review.

2. *The unit in the Public Works Department.*—One Research Officer and 4 L.D. Compilers were working in this unit during the year. Sri P. Vasudevan Namboodiri and Sri Abdul Wahab were the Research Officers of this unit during the period under review.

3. *The unit in the Directorate of Municipalities.*—One Research Assistant and 2 Lower Division Compilers were attending to the work in this unit during the period under review.

VII. Cost of cultivation of Ginger

This is a Centrally sponsored scheme for which the entire expenditure will be met by the Central Government. An amount of Rs. 1.56 lakhs has been sanctioned by the Government of India for conducting three rounds of the above survey during the Fourth Five Year Plan period.

The object of the study is to estimate the cost of cultivation of Ginger per hectare and per tonne of raw as well as dry produce.

The survey is confined to five taluks in the State representing the major ginger growing tracts viz., Kottayam, Meenachil, Thodupuzha, Muvattupuzha and South Wynad Taluks.

Four census villages (Karas) from among the Ginger growing villages are selected at random in each taluk. In each selected kara a list of operational holdings under ginger is prepared by visiting the households. Among these, the operational holdings located within a radius of two miles from the households are separately listed and stratified into the following three groups according to the area under ginger cultivation.

Stratum I	—	Less than one acre
Stratum II	—	One acre and above but less than 3 acres
Stratum III	—	Three acres and above

From each of the above strata four operational holdings are selected by simple random sampling method for detailed enquiry. Thus the study covers 240 holdings in all the five taluks selected in the State. For estimating yield per hectare crop cutting experiments are conducted in five holdings selected at random from among the 12 holdings in each village. The size of the experimental plot for crop cutting experiments is 2 metre square. Driage experiments are also conducted in 2 out of the five holdings selected for crop cutting with a view to determining the yield of dry produce.

The field work of the first round of the survey was started in June 1970. The field work was carried out by 10 Investigators.

Two villages were allotted to each of these Investigators. The field work of the survey was completed in all the 20 villages by 31st January 1971.

Preliminary tabulation of data was done by the Investigators working under the scheme, who were brought to the Head office for a period of 2 months for this purpose.

The expenditure incurred for the survey during the year 1970-71 is Rs. 49,461.14.

VIII. Family Budget Survey of working class Households—1970

A Family Budget Survey of working class households was conducted in the State in 1965-66 under a Committee of Direction. Subsequently representations were received from Trade Unions and other interested parties that there was no occasion for them to make their case effective owing to the absence of their representatives on the Committee and hence as per G.O. MS. No. 60/67/Plg. dated 15th November 1967, a Committee under the Chairmanship of Sri K. N. Kunjukrishna Pillai was appointed by the Government to recommend to Government any additions or alterations to the above report. On the basis of the recommendations of this Committee, Government have sanctioned in G.O. MS. No. 28/70/Plg. dated 22nd August 1970, a scheme for the conduct of a fresh family budget survey in the State with 1970 as the base year, with a view to revising the existing weighting diagram for the construction of consumer price indices for various categories of workers.

The survey is conducted by the Bureau of Economics and Statistics under a Committee of Direction consisting of the following members :

- | | | |
|-----|------------------------------|----------------------------------|
| 1. | Sri K. S. Lakshmana Panicker | (Chairman) |
| 2. | „ P.P. Philipose | (Member-Secretary) |
| 3. | „ S. V. Pandit | } Members representing employers |
| 4. | „ O. C. Mathew | |
| 5. | „ S. Sreenivasan | |
| 6. | „ B. Ananthasubramonia Iyer | |
| 7. | „ M. Sreedhara Pillai | |
| 8. | „ J. F. Kurian | |
| 9. | „ K. Pankajakshan | |
| 10. | „ K. Ravindranathan | |

Of these, Sri S. Sreenivasan has subsequently tendered his resignation and Government have yet to nominate one against the resultant vacancy.

The survey will be carried out in the following centres :

- (a) All District Headquarters
- (b) Mundakayam
- (c) Punalur
- (d) Munnar
- (e) Meppadi and
- (f) Chalakudy

Out of these 15 centres, Trivandrum, Quilon, Ernakulam and Kozhikode will be termed as major centres and the rest as minor centres.

A nucleus staff consisting of one Research Officer (on Rs. 325-725), one Research Assistant (on Rs. 220-370) and one L.D. Compiler (on Rs. 90-190) was sanctioned for assisting the Committee in its preliminary work.

The Committee started functioning on 1st October 1970. During the year under report the Committee conducted sittings at Trivandrum (October 1970), Kozhikode (November 1970), Kalpetta/Meppadi (November 1970), Cannanore (November 1970), Alwaye (December 1970) and at Quilon (February 1971) for meeting representatives of various trade unions and other employer's organisations. During the course of the year, the scheme of work and the various schedules to be used for the survey have been finalised. Selection of shops for collection of base prices and retail prices of the selected commodities has also been finalised during the period.

The field work relating to the survey is proposed to be completed in one year and the following field staff will attend to the work :

1. Chief Supervisors on Rs. 375-800 2 Nos. (one at Kozhikode and another at Trivandrum).
2. U. D. Investigators on Rs. 130-270 19 Nos. (Two Investigators each in the four major centres and one Investigator each in the minor centres).

Government sanction for posting the above field staff and the administrative staff has been received as per G.O. Rt. No. 90/71/Plg. dated 29th March 1971, and arrangements have been made to impart necessary training to these field staff. The detailed survey of households is expected to start by the 1st of May 1971.

IX. Evaluation Division

With the advent of the Five Year Plans the need for evaluation was felt in all fields of development and more especially in those in which new or expanded activities are undertaken. An Evaluation Unit was therefore constituted in 1966 in the Bureau of Economics and Statistics for attending to evaluation work in the manner and along the guide lines recommended by the Working Group on Evaluation appointed by the Planning Commission. Since the formation of the State Planning Board in 1967, this unit was functioning as part of the Planning Board, the Evaluation Machinery being headed by the Chief Evaluation Officer.

Sri K. S. Lakshmana Panicker continued as the Chief Evaluation Officer during the period under reference. Sri K. Balakumaran Nair took charge as Deputy Director on 14th July 1970 vice Sri G. Kuttappan Pillai, Deputy Director deputed as Research Officer in the Pilot Research Project (I.A.P.), Trivandrum. Sri T. P. Joseph took over as Assistant Director on 2nd December 1970 vice Sri N. George John transferred to Industries Division. Sri M. K. Bhaskara Pillai, Research Officer was deputed for nine weeks Evaluation training at Delhi from 12th October 1970. Sarvasree K. P. Satyadas, R. Janardhanan and A. M. Haridasan Nair, continued as Research Officers in the Division throughout the year under reference.

The twelve posts of U.D. Compilers created in 1969-70 in lieu of the twelve posts of Economic Investigators included in the approved staff pattern, were changed as three U.D. Compilers in the Head Office and nine U.D. Investigators in the field as per G. O. Rt. No. 188/70/Plg.. dated 4th August 1970.

The staff position during 1970-71 is as follows :—

Chief Evaluation Officer	..	1
Deputy Director	..	1
Assistant Director	..	1
Research Officers	..	3
Research Assistants	..	4
Compilers U.D.	..	4
Compilers L.D.	..	3
Investigators U.D.	..	9

Studies undertaken during 1970-71.—Tabulation and analysis of data connected with three studies, viz. Second Evaluation of I.A.D.P., Utilization of Co-operative Credit and Cost of Cultivation of Paddy were completed. Draft reports of the first two studies were under preparation and that of the third study was in the final stage at the end of the reference period.

New studies taken up during 1970-71 were those connected with the programme for promoting small industries in the State. As the first phase of the programme, evaluation study on industrial estates was taken up with a view to identifying areas of failure and success and to throw light on the constraints which hindered the progress of the programme. Another study undertaken was on the working of small scale industries in the State to assess the progress in the development of small units both registered and un-registered in the urban and rural areas. The field work in respect of the first study was completed and tabulation of data was in progress. The field survey of the second study was in full swing.

Two evaluation reports viz., "Problems of Minor Irrigation Works in Kerala—A Pilot Evaluation Study" and "Andoorkonam Yela Development Programme" were released during the year.

In addition to the routine work, the Division has participated in preparing the report on Economic Development of Kerala. A Committee of Direction on the conduct of "Family Budget Survey of working class Households" was constituted by Government with the Chief Evaluation Officer as the Chairman. He also served as a member of the committee constituted for reporting "Planning for Employment in Kerala".

Total expenditure incurred for Evaluation Machinery was Rs. 1,19,364 during the year under report.

Evaluation studies on soil conservation schemes were also taken up by this division as directed by Government. A separate report is given below for the same, as the expenditure towards the same was met from the funds of Soil Conservation Department.

X. Evaluation Studies on Soil Conservation Schemes

These studies were undertaken as a part of the scheme for evaluation of the Soil Conservation Department. The technical guidance and supervision rest with the Evaluation Division. The scheme which was sanctioned in 1968-69 was completed during the period under reference and the report was published. Tabulation and analysis of the Bench Mark Survey conducted in 1969-70 as per Government sanction G.O. Rt. No. 16/70/Agri., dated 2nd January 1970 were completed and the report was under finalisation.

In G.O. Rt. No. 2328/70 Agri., dated 2nd July 1970 Government accorded sanction to conduct evaluation studies on Soil Conservation Programmes in a planned manner from 1970-71 onwards with the following staff:—

Research Officer	..	1
Investigator/U. D. Compiler	..	2
Investigator/Compiler L.D.	..	6

The budget provision for the year was Rs. 28,400.

During the period under report the following schemes were taken up for evaluation study.

1. Attumuttathuthekkemathikayal Scheme (as a case study)
2. R. Block kayal scheme.
3. Soil conservation measures in the catchment areas of Kundha Project (Kerala Portion).

The main objective of the studies were to assess the impact of these schemes on productivity, cropping pattern and cultural practices in the areas. In addition to these schemes, Soil Conservation Schemes already implemented in the agriculture lands in the hilly tracts of the State were also taken up for evaluation in the districts, Alleppey, Kottayam, Ernakulam, Malappuram and Palghat. Of these studies, the draft on Attumuttathu Thekkemathi kayal was finalised. The field work in respect of the other studies was in progress in 1970-71.

The expenditure for the scheme under 31-J-ii Evaluation on Soil Conservation in 1970-71 was Rs. 15,917.60.

XI. Social Services Division

The Social Services Division of the State Planning Board deals with the plan schemes coming under the following heads of development:

1. General Education
2. University Education
3. Technical Education
4. Cultural Programmes
5. Health
6. Welfare of Backward Classes
7. Housing and Urban Development
8. Labour and Labour Welfare
9. Social Welfare
10. Public Co-operation.

The Division, along with the other divisions of the Planning Board, was engaged in the finalisation of the State's Draft Fourth Five Year Plan (1969-74) and the preparation of the annual plan for 1971-72 during the year under report. Initial work relating to the annual plan for 1972-73 has also been started. The Division was associated in the preparation of "Economic Review" for 1970. Data relating to Social Services were collected for the preparation of an Evaluation Study of Plan Schemes initiated by the Evaluation Divisions of the Planning Board. A paper of Elementary Education was prepared during the year under report.

The staff of the Social Services Division consists of one Assistant Director, two Research Officers, two Research Assistants and one Compiler. The Division is working under the supervision of the Deputy Director (Econometrics).

XII. Manpower Planning Unit

The work relating to the Fact Book on Manpower is of a continuous nature requiring periodical follow up and revision. The first edition of the Fact Book on Manpower was brought out by the Bureau of Economics and Statistics in 1966. Since the publication of the first edition more data on population, labour force etc. have become available in greater detail. During the year under report an attempt has made to revise the Fact Book on Manpower. Since more data have to be incorporated, it is found convenient to prepare the revised edition of the Fact Book in three parts in three separate volumes, each part containing data on specific aspects of Manpower. During the year under report, Part I of the Fact Book relating to "Population and Labour Force" has been completed.

CHAPTER VIII PUBLICATIONS

The publication of the Bureau is mainly responsible for the collection, compilation and publication of all important statistical data relating to the State. Enquiries for statistical data received from other State Governments, Government of India, State Departments and other agencies are also dealt with in this section. The following are the important publications prepared in this section during 1970-71.

I. Statistical Hand Book of Kerala 1968

Copies of the publication which was prepared and sent to press during the year 1969-70 for printing were received from the press and were distributed during the year under report.

II. Statistical Hand Book of Kerala 1970

Since there was time lag in the collection of data for the next issue of the Statistical Hand Book, it was decided to bring out the issue as Statistical Hand Book of Kerala 1970 incorporating all the latest available information. Collection of data was almost completed during the year under review and most of the Statistical tables prepared.

III. District Statistical Hand Books

District Statistical Hand Book, Quilon (1966) has been got printed and ready for issue. District Statistical Hand Book (1966) for Alleppey, Kottayam, Ernakulam, Palghat, Kozhikode and Cannanore are under print. Data for the preparation of District Statistical Hand Book 1967 relating to 9 districts have been collected, scrutinised and finalised. Data for the year 1968 have been collected from 8 districts and being scrutinised.

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IV. Preparation of Statistical Year Book of Municipalities and Towns

Data for the preparation of Statistical Year Book of Municipalities and Towns for the year 1967 have been collected. The work relating to the collection of data for the year 1968 is in progress.

V. Annual Statistical Abstract 1966-67 and 1967-68

Collection of data for the Annual Statistical Abstract 1967-68 was completed during the year. The matter is ready for printing. Collection of data for the next issue of the Abstract is in progress.

VI. Graphic Unit

The Graphic Unit attached to the Publication Section has been rendering assistance to the Finance Department in the Secretariat, State Planning Board, etc. in the preparation of charts and diagrams in addition to the work relating to the preparation of charts and diagrams for the Bureau. The Bureau participated in the Exhibition at Quilon and Trichur during the period. A large number of maps and charts prepared by the Graphic Unit were displayed. Charts and diagrams were prepared for inclusion in the report on Annual Survey of Industries, Season and Crop Reports, District Hand Books, etc.

Publications issued during the year 1969-70.—

1. Demographic particulars of sterilised persons in Cannanore District.
 2. Fact Book on Population and Family Planning.
 3. Population of Ernakulam District.
 4. National Sample Survey Report No. 11.
 5. Report on Crop Cutting Survey—Winter and Summer Crop of paddy.
 6. Agricultural Statistics—1968-69.
 7. Economic Review of Kerala—1969.
 8. Season and Crop Report—1968-69.
- These are now priced publications.

Library.—During the year under report a reference section has been introduced with several volumes of reference books in the main Library of the department.

430 books were purchased for the Library during the financial year 1970-71. 113 journals and periodicals on economics, statistics and allied subjects were subscribed in addition to periodical publications received free of cost and on exchange basis. The subscription for 8 daily newspapers and two economic dailies was continued.