
CHAPTER - V

PLANNING SCHOOL LOCATION

- 5.1 Planning and Education
 - 5.2 Educational Planning at District Level
 - 5.3 Importance of Planning School Location
 - 5.4 Some Guidelines for determining Location and Size of Schools
 - 5.5 General appraisal of the existing practice in Goa
 - 5.6 Preparation of an Educational map for each Taluka of Goa
 - 5.7 Criteria needed for determining Location and Size of Schools in Goa
 - 5.8 Identification of Perspective needs of every village and town in Goa and their indication in the Educational maps for the three Educational Zones of Goa
 - 5.9 Preparation of a Perspective Plan to accommodate the consolidated School needs of every village and town in Goa and indication of the same in the Educational map of Goa.
-

CHAPTER - V

PLANNING SCHOOL LOCATION

5.1 Planning and Education

The term "Planning" may be defined as an attempt to organise resources for the attainment of a selected goal or goals. It is, in other words, a purposeful activity directed with certain fixed objectives in mind such as the national goals of development. In India for example, the general purpose of planning is based on improving the life of the masses taking into consideration the welfare of all the citizens. It is democratic in nature and was in fact evolved as a result of the growth and development of a socialistic pattern of society. Planning is not limited to the economic sphere only but in fact extends to the total life of the citizens. Undoubtedly it is centralized but nevertheless it emphasises decentralization of units restricting private enterprise but at the same time promoting its activities to serve national interests.

In India, the objectives of 'Planning' in general and those of education are common since both are based on the goals of national development. In fact there is a strong

link between the two; for planning by itself is an educational process and the fruits of planning cannot yield results unless people are educated enough, to make full use of the increased means of production and are able to understand the aims of planning with a view of making a conscious effort to achieve them. Adequate planning helps to harness the national resources for the benefit of all the citizens to bring a change for the better, in their individual, social and economic make up. Planning helps to develop the educational system through which the educated citizens of the nation help in the building of a better social order and move forward to set higher goals of social and economic significance in pursuance of the objectives of national development.

Education thus becomes the means as well as the consequence of planning which in turn becomes the determinant as well as the determiner of education. Hence better education leads to better planning and better planning leads to progressive growth and development of educational facilities. Therefore it is obvious that 'Educational Planning' has a great contribution to make to planning in general whose basic objective in India is to provide "sound foundation for sustained economic growth, for increasing opportunities

for gainful employment and improving living standards and working conditions of the masses".⁸

Educational planning has a dual role specified by its normative and operative nature. The normative nature provides that philosophical backing based as it is on the goals of national development whereas the operative nature helps to predict school enrolment, types of jobs for which people are needed, the nature of training to be given, the number of teachers to be employed or trained, the number of school buildings to be constructed and so on, in the light of the aims and objectives set by the normative nature. In other words the normative nature acts as a backbone to the operative nature making educational planning more meaningful and effective.

Educational planning, like any other planning of an activity, adds to the efficiency of that activity as it requires anticipation of events which in turn leads one to visualize their structure and their likely impact. Educational planning, like any other planning, helps to effect a more equitable distribution of work-load and a better

8 Government of India, Third Five Year Plan, (New Delhi - Planning Commission, 1961);p06.

assessment of a given situation over a period of time leading to better efficiency and understanding among the people involved. Therefore it seems important for all people involved not only to understand thoroughly what is planned but also to participate in the very activity of planning, however small their role may be. Hence it is obvious that an activity like "Educational Planning has to be done, in a coordinated fashion, at four levels at each of which important decisions are taken: National, State, District and Institution"⁹. However, this does not seem to be the case as yet in India, as pointed out by the Education Commission of 1964-66,

which says "one of the major weaknesses of our system of planning is that it begins at the top and hardly ever descends down to the institutional level. Consequently most of our schools remain unconcerned with the educational development plans prepared at the State or National levels. Very often, they are not even aware of these plans and of their policies and programmes."

Hence it is "necessary to evolve the essential techniques and to initiate a process of planning at district and institutional levels"¹⁰ so that Educational Planning becomes more realistic and better implemented.

9 J.P. Naik, Educational Planning in a District(New Delhi : Asian Institute of Educational Planning and Administration, 1969): p.1.

10 Ibid

5.2 Educational Planning at District level

Although planning at the district level in all sectors including education, has been advocated for some years "very few district plans have been prepared in practice and even the theoretical aspects of the problem have not been examined adequately"¹¹ because most people believe Educational planning to be a function of some top level governmental agency such as the Planning Commission, the Central Ministry of Education or the Secretariat and the Directorates of Education of the State Governments.

Educational planning, which concerns every parent and family has to be taken as close to the people as possible and its administration can be best conducted by or in close association with local communities which implies that educational planning has to be decentralized to the district level and still further down to the level of each institution. However, this does not seem to be the case as various studies indicate that "there is hardly any Educational Planning done at the district level"¹². Evidently there

11 Ibid

12 Ministry of Education, Report of the Education Commission 1964-66 (New Delhi : NCERT, 1966); p.815

seems to be a great need for educational planning at the district level and therefore it is necessary to demarcate those areas of educational activity where it could be successfully carried out.

According to J.P. Naik, the Educational Adviser to the Government of India, educational planning at district level should be confined to those areas of educational activity where variations are permissible from district to district and where choices exist for decisions to be taken at district level. He has further suggested that the scope of the district plans should be determined with reference to resources available and recommended the following fields:

- "(1) Provision of facilities;
- (2) Non-teacher costs;
- (3) Work-experience and social service;
- (4) Programmes for non-student youth or adult education;
- (5) Education below university level;
- (6) Intensive utilization of existing facilities;
- and (7) Education and employment."¹³

However, only field 1 referring to the "Provision of Facilities" appears to be relevant to the present study and since this chapter only deals with "Planning School Location", the discussion hereafter will be limited exclusively to that very aspect.

¹³ Naik, Op. cit. p.2

5.3 Importance of Planning School Location

Since location and size of educational institutions are important aspects of educational development in a district, planning becomes an essential pre-requisite for achieving greater efficiency.

Unplanned and indiscriminate opening of schools creates disparities leading to duplication and waste, inefficiency and improper use of the limited resources available in men and money. Survey studies undertaken by prestigious educational authorities have pointed out that "several of our institutions are badly located; many of them are too small; and some are too big to be manageable".¹⁴

Another study entitled "All-India Educational Survey (1960)" reports that though some very small habitations have schools in them, far bigger habitations in the adjoining areas have, for years, remained without educational facility even at the primary school stage. Girls' schools are very few no doubt, but in some habitations there exists a girls school without any provision for the education of boys who have to walk a long distance to school.

14 Ministry of Education, Report of the Education Commission, 1964-66, (New Delhi : NCERT, 1966); p.303

The total population that would be benefitted does not always seem to have been taken into account while locating the schools.

In some cases, the habitations may be too small to justify a school in it; in some the school may be so badly located as not to attract a reasonable enrolment to justify even a single teacher school. These are, but a few possibilities, of ill-conceived planning.

The Education Commission (1964-66) also expressed its views on the subject by reporting that in recent years there has been a rapid multiplication in the number of small and uneconomic institutions which also tend to be less efficient at all stages of education and that it is necessary to correct this growing weakness and to carefully plan the location of all educational institutions so as to avoid overlapping, duplication or waste and to foster the establishment of bigger, more efficient and economic institutions.

All these disparities, duplication and waste resulting from unplanned and indiscriminate opening of schools only goes to show how important and necessary it is to plan the location of our educational institutions well in advance so that our limited resources may not be wasted "through the

establishment of Educational Institutions which duplicate or overlap the effort of one another"¹⁵.

Therefore every effort must be made to emphasise the importance of this aspect of planning the location and size of educational institutions when considering educational development plan for every district. If necessary this important aspect of planning the location could be made an integral part of the planning of the District Educational Plan itself so that a proper check could be kept on the growth and development of all the areas in the district. However, this would be a difficult task to undertake without adopting a rational policy which would in turn provide adequate guidelines for determining the location and size of each category of educational institutions.

Hence there appears to be a need for some guidelines to be established so that the location of the schools could be adequately planned for better efficiency and organised effort, based on the needs and aspirations of the local people.

5.4 Some Guidelines for determining location and size of Schools

The Education Commission (1964-66) spelling out some of the disparities resulting from unplanned and indiscriminate opening

15 Naik, Op. cit.p.7

of educational institutions in the past, stressed the need to adopt a rational policy in this matter and suggested the following criteria for consideration:

(a) Primary Schools: At this stage, accessibility is the overriding consideration and small schools, in spite of their heavier cost and lower efficiency, must be accepted. The optimum size of a school is:

for a lower primary school - 4 or 5 teachers and an enrolment of 160 to 200 i.e. a school of 4 or 5 classes;

for a higher primary school - a school of 7 or 8 classes, a teacher for each class (excluding the headmaster) and an enrolment of 300-400.

Wherever possible, schools of this size (or even bigger ones) should be established. This can be done in all urban areas and in villages of 1500 persons or more. Since small villages predominate small schools will have to be established, in spite of their comparatively greater cost and lower efficiency.

The general rule should be to establish a lower primary school within a mile, or so of the home of every child, and a higher primary school, within three miles. Villages with

a population of 200-300 should have a lower primary school and those with a population of 700 or more should have a higher primary school.

In view of the difficulties involved in the proposed criteria the Education Commission (1964-66) felt that the establishment of a large and more efficient primary schools would be facilitated if people could be persuaded to accept mixed schools at the primary stage and if small neighbouring villages could be induced to share a bigger and more efficient school in common, instead of insisting on their own schools, however small. The Education Commission (1964-66) suggested that attempts should be made to educate public opinion on these lines.

(b) Secondary Schools: In the secondary education and still more so in higher, accessibility becomes a comparatively minor consideration and the emphasis has to be shifted to the creation of institutions of a size that is economic and efficient. A well equipped and efficient secondary school should have at least three divisions in each of the three classes of secondary stage i.e. a total of nine divisions and an enrolment between 360 to 450. A school of this size can have a staff of about 20 teachers and provide all the necessary facilities without increasing the cost per student unduly. If the specifications are lowered to

two divisions per class or a total of six divisions and this is the very minimum possible - the enrolment will be between 240 to 300.

Considering the policy implications of the proposed criteria, the Education Commission (1964-66) stresses that an effort has to be made to slow down the proliferation of small and uneconomic institutions. New secondary schools should be established only in areas where a clear local need can be proved and where there is a reasonable chance of a new school growing to a reasonable size within five years or so. In order to achieve this goal, the Education Commission (1964-66) feels it is desirable to prescribe stringent conditions for recognition, and to enforce them strictly. A good working rule according to the Education Commission (1964-66) is to establish a lower secondary school serving a radius of five to seven miles with a total population coverage of 10,000 to 15,000 and to adopt the practice of providing transport in the form of a bicycle to students who live at comparatively long distances, and hostel facilities where necessary.

In brief the guide-lines suggested by the Education Commission of 1964-66 are the following:

(i) Lower Primary Schools

- (a) A lower primary school teaching classes I-IV should be available within one mile from the home of every child.
- (b) Villages with a population of 200-300 inhabitants should have a lower primary school.
- (c) An optimum sized lower primary school should have an enrolment of 160-200 pupils with 4 to 5 teachers.

(ii) Upper Primary Schools

- (a) An upper primary school teaching classes I-VII should be available within three miles of the walking distance from the home of every child.
- (b) Villages with a population of 700 and more inhabitants should have an upper primary school.
- (c) An upper primary school should be available for a group of three or four lower primary schools.
- (d) A normal sized upper primary school should have an enrolment of 300-400 pupils with 7 to 8 teachers excluding the headmaster. Schools of this size and even bigger should be available in all urban areas and villages with a population of 1500 and more.

(iii) Lower Secondary Schools

- (a) Lower secondary schools teaching classes VIII-X should be available within five to seven miles from the home of every child.
- (b) A lower secondary school should be established to serve a radius of five to seven miles with a population coverage of 10,000 to 15,000.

- (c) A well equipped lower secondary school should have at least 9 divisions i.e. 3 for each class with an enrolment of 360-450 students and a staff of about 20 teachers.

The very minimum specifications for a lower secondary school should be six divisions i.e. 2 for each class with an enrolment of 240-300 students.

(iv) Higher Secondary Schools

A higher secondary school should be available for a group of about four lower secondary schools.

Although the above suggestions are only broad indicators nevertheless they will serve as guidelines to examine the existing situation in Goa.

5.5 General appraisal of the existing practice in Goa

As at present the Government of the Union Territory of Goa, Daman and Diu does not have any established policy regarding the opening of new schools except heeding to public demands.

In order to achieve universal primary education, the administration makes special efforts to open new schools even in remote areas provided there are at least 20 students and no other lower primary school within a distance of 1.5kms.

In general, it appears, the non-availability of any type of school facility within a radius of 1.5 kms, is the only criteria applied for a new school of the type to be opened provided of course there are enough students to patronize it.

Once the need for opening a new institution is identified, the Assistant District Inspector of schools inspects the locality and then proposes a suitable site for housing the school. If the proposed site belongs to a private party it is then acquired by using the provisions of the Land Acquisition Act of 1894.

The construction of the school building is the responsibility of the Public Works Department, which carries out the work according to standard type designs meant for either one-room, two-roomed, three-roomed or four-roomed schools. In case of a large institution special plans are prepared in consultation with the Department of Education. If it is not possible to construct a building in good time, suitable buildings are then hired to run the school temporarily.

The staff required for the new school is provided by the Department of Education through a selection committee

headed by the Director himself. The furniture and the equipment needed for the school are purchased centrally by the Department of Education and then distributed through the zonal officers.

With regard to the private managements, the local trusts or committees come forward with proposals for starting new schools. The Department of Education however, has no commitment with regard to the acquisition of the land, construction of buildings or provision of equipment except that recognition may be given to the school and grant-in-aid paid, subject to the rules and regulations of the grant-in-aid code. It can, if requested, help the management, in procuring the land under the Land Acquisition Act of 1894.

As at present, the Department of Education, does not have any set 'Plan' for the development of education in Goa or for that matter for the whole of the Union Territory of Goa, Daman and Diu.

There are no educational maps available for the district of Goa to indicate the present location of the existing school facilities or the proposed location of those to be opened in the future.

TABLE VII

Talukawise distribution of Schools for different stages of Education in Goa
as on September 30, 1976

Sr. No.	Taluka	Items	NUMBER AND TYPE OF SCHOOL											Total for all Types of School
			LP	UP	LS	HS	LP+UP	LP+UP+LS	LP+UP+LS+HS	UP+LS	LS+HS	UP+LS+HS	LS+HS	
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
1	Pernem	Rural	70	1	1	-	20	-	-	10	-	-	-	102
		Urban	1	-	-	1	-	-	-	2	-	-	-	4
		Total	71	1	1	1	20	-	-	12	-	-	-	106
2	Bardez	Rural	78	3	2	-	12	21	-	13	-	-	-	129
		Urban	7	-	1	2	-	4	-	6	-	-	-	20
		Total	85	3	3	2	12	25	-	19	-	-	-	149
3	Bicholim	Rural	65	-	-	-	13	1	-	5	-	-	-	84
		Urban	6	-	-	-	1	1	1	2	-	-	-	11
		Total	71	-	-	-	14	2	1	7	-	-	-	95
4	Satari	Rural	87	-	1	-	8	-	-	1	-	-	-	97
		Urban	1	-	1	-	1	-	-	2	-	-	-	5
		Total	88	-	2	-	9	-	-	3	-	-	-	102
5	Sub-Total for North Zone	Rural	300	4	4	-	53	22	-	29	-	-	-	412
		Urban	15	-	2	3	2	5	1	12	-	-	-	40
		Total	315	4	6	3	55	27	1	41	-	-	-	452

(.....2)

: 2 :

TABLE III

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
6	Tiswadi	Rural	44	-	-	-	-	8	9	-	12	-	-	73
		Urban	13	-	1	2	1	1	5	1	6	-	-	29
		Total	57	-	1	2	2	9	14	1	18	-	-	102
7	Ponda	Rural	136	-	-	-	-	5	1	-	23	-	-	165
		Urban	2	-	-	-	-	-	1	1	-	-	-	4
		Total	138	-	-	-	-	5	2	1	23	-	-	169
8	Sanguem	Rural	95	-	-	-	-	-	3	1	7	-	-	106
		Urban	4	-	-	-	-	-	1	-	1	-	-	6
		Total	99	-	-	-	-	-	4	1	8	-	-	112
9	Sub-Total for Central Zone	Rural	275	-	-	-	-	13	13	1	42	-	-	344
		Urban	19	-	1	2	1	1	7	2	7	-	-	39
		Total	294	-	1	2	2	14	20	3	49	-	-	383
10	Mormugao	Rural	17	-	-	-	-	1	4	-	-	-	-	22
		Urban	9	-	-	1	6	5	5	-	4	-	-	25
		Total	26	-	-	1	7	9	9	-	4	-	-	47
11	Salcete	Rural	92	-	-	1	10	28	28	-	7	-	-	138
		Urban	22	-	-	2	1	6	6	-	9	-	-	40
		Total	114	-	-	3	11	34	34	-	16	-	-	178
12	Quepen	Rural	65	1	-	-	5	2	2	-	3	-	-	76
		Urban	-	-	-	-	-	1	1	-	1	-	-	2
		Total	65	1	-	-	5	3	3	-	4	-	-	78

(.....3)

: 3:

TABLE LII

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
13	Canacona	Rural	55	-	-	-	9	2	-	6	-	-	-	72
		Urban	-	-	-	1	-	1	-	-	-	-	-	2
		Total	55	-	-	1	9	3	-	6	-	-	-	74
14	Sub-Total for South Zone	Rural	229	1	-	1	25	36	-	16	-	-	-	308
		Urban	31	-	-	4	7	13	-	14	-	-	-	69
		Total	260	1	-	5	32	49	-	30	-	-	-	377
15	Grand Total for all Goa	Rural	804	5	4	1	91	71	1	87	-	-	-	1064
		Urban	65	-	3	9	10	25	3	33	-	-	-	148
		Total	869	5	7	10	101	96	4	120	-	-	-	1212

ABBREVIATIONS AND SYMBOLS USED
IN EDUCATIONAL MAPS

S.No.	SYMBOL		TYPES OF SCHOOLS
i	○	LP	LOWER PRIMARY
ii	▲	UP	UPPER PRIMARY
iii	□	LS	LOWER SECONDARY
iv	▭	HS	HIGHER SECONDARY
v	△	LP+UP	LOWER AND UPPER PRIMARY
vi	◻	LP+UP +LS	LOWER AND UPPER PRIMARY WITH LOWER SECONDARY
vii	◻	LP+UP +LS+HS	LOWER AND UPPER PRIMARY WITH LOWER AND HIGHER SECONDARY
viii	◼	UP+LS	UPPER PRIMARY WITH LOWER SECONDARY
ix	◼	UP+LS +HS	UPPER PRIMARY WITH LOWER & HIGHER SECONDARY
x	◻	LS+HS	LOWER AND HIGHER SECONDARY

EDUCATIONAL MAP SHOWING

LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF PERNEM TALUKA

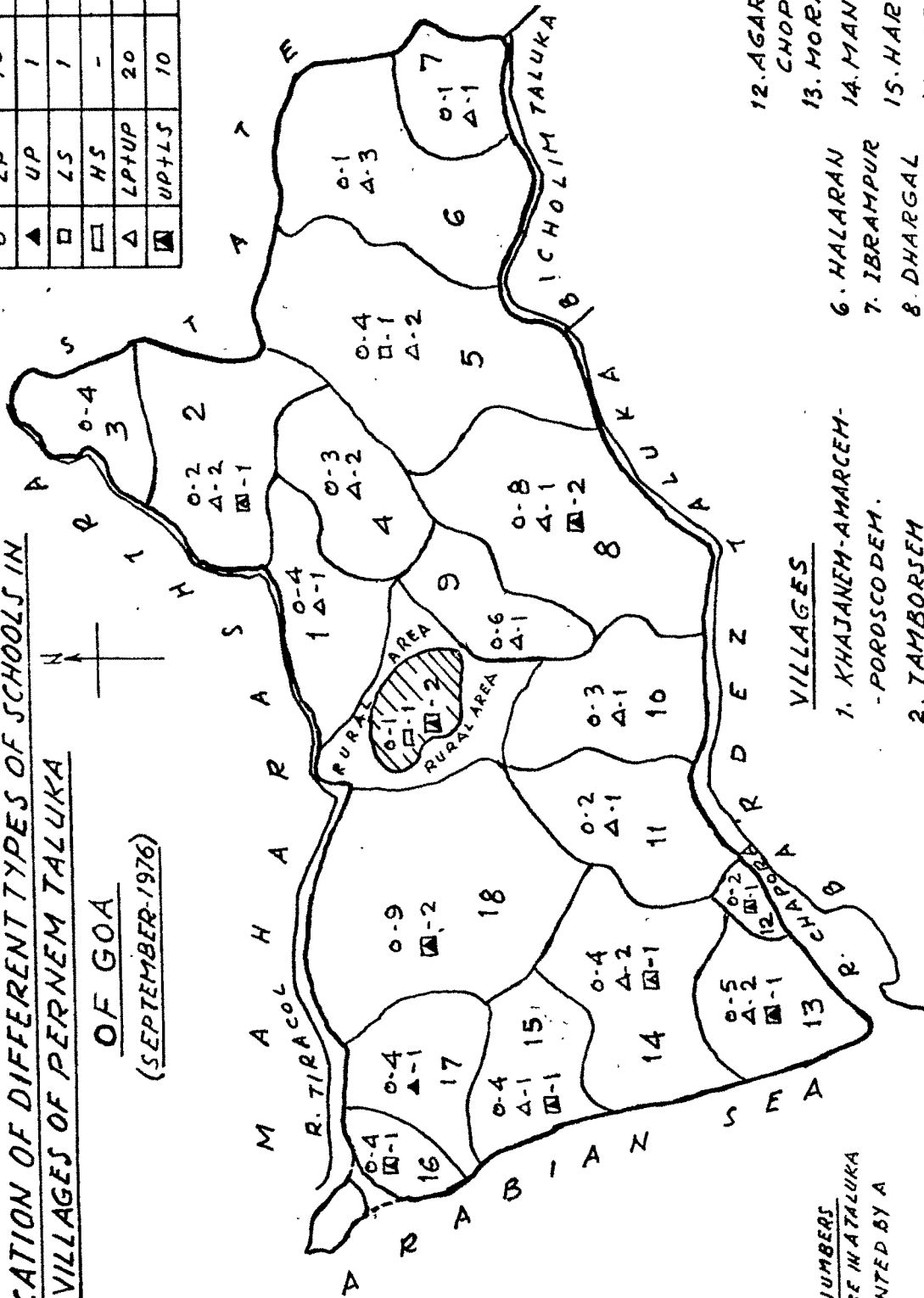
OF GOA

(SEPTEMBER-1976)

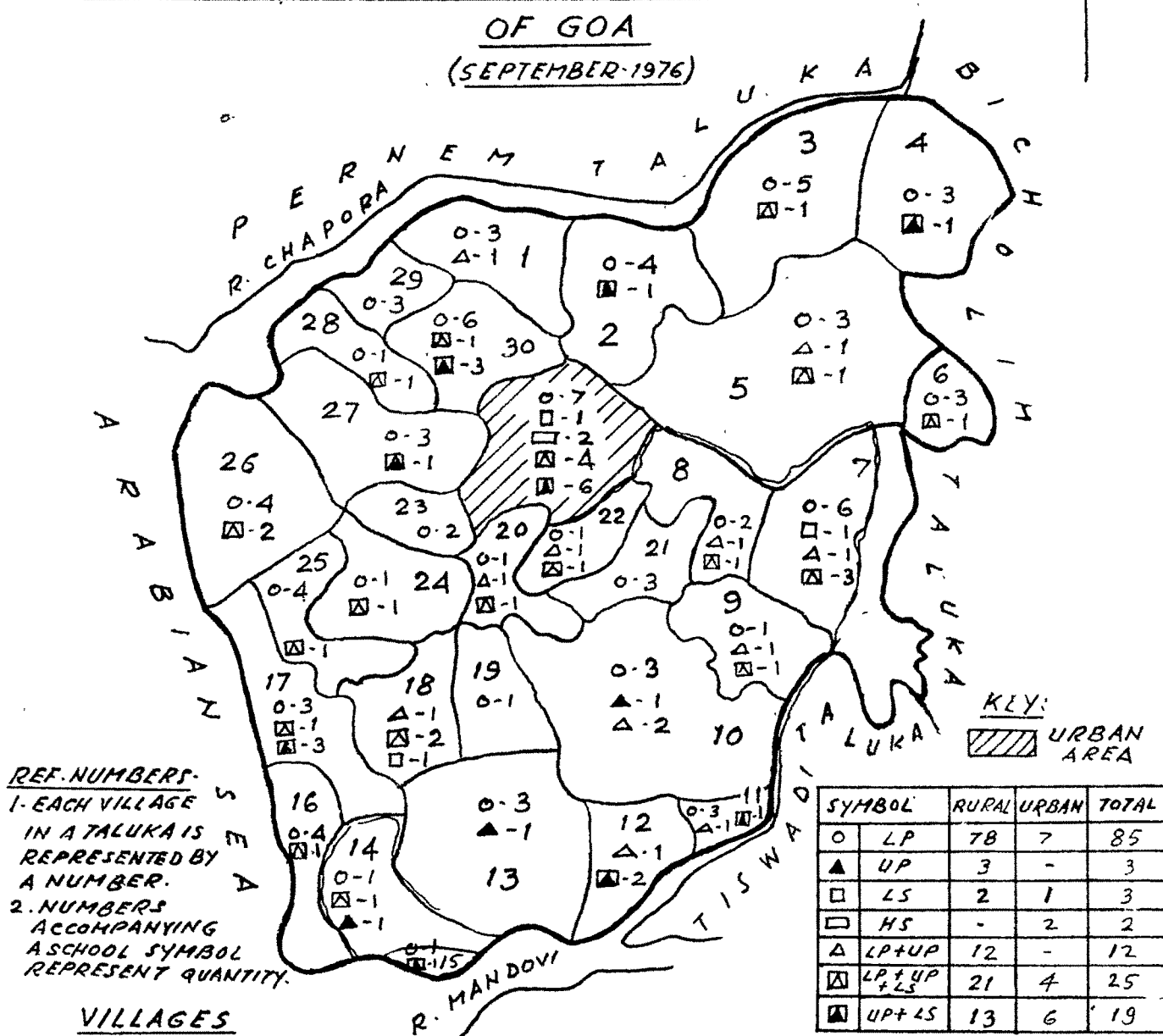
KEY: FIG. 21

URBAN AREA

SYMBOL	RURAL	URBAN	TOTAL
○ LP	70	1	71
▲ UP	1	-	1
□ LS	1	-	1
▢ HS	-	1	1
△ LPTUP	20	-	20
■ UP+LS	10	2	12



EDUCATIONAL MAP SHOWING
LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF BARDEZ TALUKA
OF GOA
(SEPTEMBER-1976)



REF. NUMBERS:
1. EACH VILLAGE
IN A TALUKA IS
REPRESENTED BY
A NUMBER.
2. NUMBERS
ACCOMPANYING
A SCHOOL SYMBOL
REPRESENT QUANTITY.

KEY:
 URBAN AREA

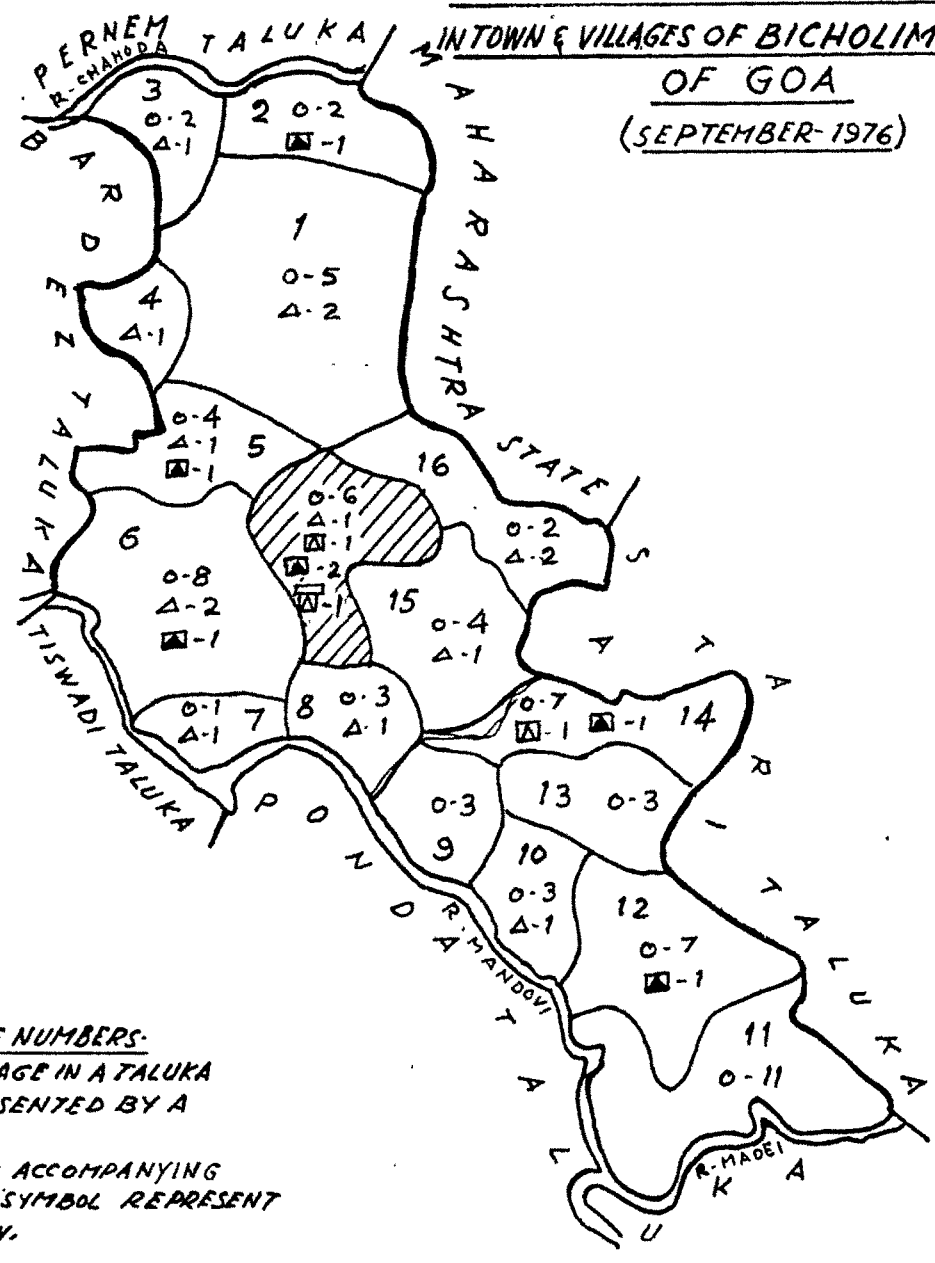
SYMBOL	RURAL	URBAN	TOTAL
○ LP	78	7	85
▲ UP	3	-	3
□ LS	2	1	3
▭ HS	-	2	2
△ LP+UP	12	-	12
◻ LP+UP+LS	21	4	25
◻ UP+LS	13	6	19

- VILLAGES
- | | | |
|------------------------|-----------------------|--------------------|
| 1. CAMORLIM | 11. SALVADOR DO MUNDO | 21. UKA-POL-PONELA |
| 2. COLVALE | 12. PENHA DE FRANCA | 22. BASTORA |
| 3. NADNA-REVORA | 13. PILERH-MAINA | 23. VERLA-CANCA |
| 4. PIRNA | 14. NERUL | 24. PARRA |
| 5. TIVIM-SEIGAI | 15. REIS-MAGOS | 25. ARPORA-NAGUA |
| 6. ASSONORA | 16. CANDOLIM | 26. ANJUNA |
| 7. ALDONA | 17. CALANGUTE | 27. ASSAGAO |
| 8. MOIRA-NACHINOLA | 18. SALIGAO | 28. SIOLIM-SODAEM |
| 9. POMBURPHA-OLAVALLIM | 19. SANGOLDA | 29. OXEL |
| 10. SOCCON | 20. GUIRIM | 30. SIOLIM-MARNA |

EDUCATIONAL MAP SHOWING FIG. 23

LOCATION OF DIFFERENT TYPES OF SCHOOLS

OF GOA
(SEPTEMBER-1976)



REFERENCE NUMBERS:
1. EACH VILLAGE IN A TALUKA IS REPRESENTED BY A NUMBER.
2. NUMBERS ACCOMPANYING A SCHOOL SYMBOL REPRESENT QUANTITY.

KEY:

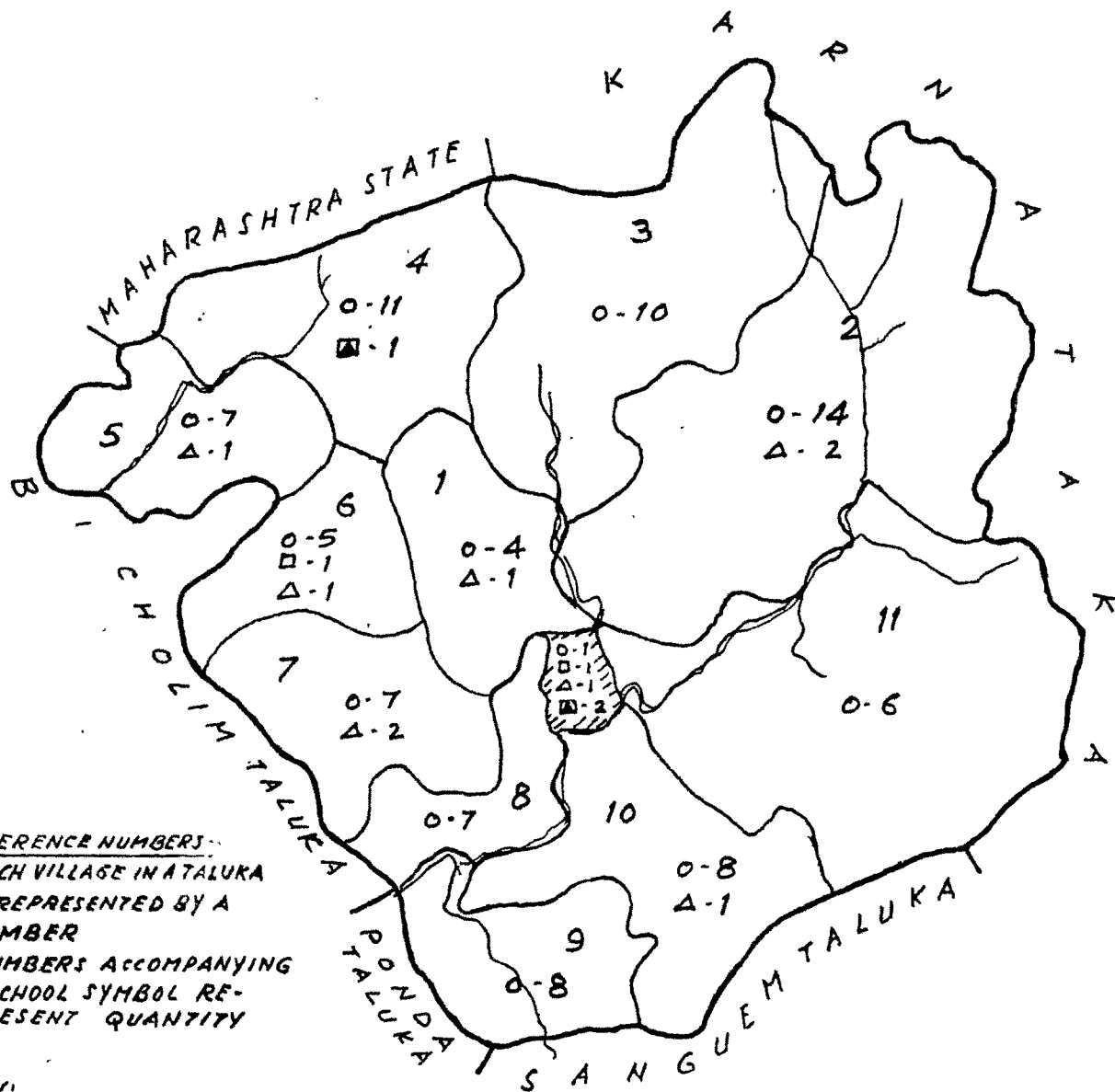
URBAN AREA

SYMBOL		RURAL	URBAN	TOTAL
O	LP	65	6	71
Δ	LP+UP	13	1	14
⊠	LP+UP+LS	1	1	2
⊡	UP+LS	5	2	7
⊞	LP+UP+LS+HS	-	1	1

VILLAGES


- | | |
|--------------------|------------------------------|
| 1. LATAMBARSEM | 9. AMONA |
| 2. SAL | 10. NAVELI |
| 3. MENKUREM | 11. PAILI-KOTHAMBI |
| 4. ADVALPALE | 12. SURLA-VELGUEM |
| 5. MULGAO-SIRIGAO | 13. KUDNEM |
| 6. MAYEM-VAIGUINEM | 14. SANKHALIM-HARWALEM-VIRDI |
| 7. NAROA | 15. KARAPUR-SARWAN |
| 8. PILIGAO | 16. MAULINGNEM |

EDUCATIONAL MAP SHOWING
LOCATION OF DIFFERENT TYPES OF SCHOOLS IN TOWN
& VILLAGES OF SATARI TALUKA
OF GOA
(SEPTEMBER-1976)



REFERENCE NUMBERS:-
1-EACH VILLAGE IN TALUKA
IS REPRESENTED BY A
NUMBER
2. NUMBERS ACCOMPANYING
A SCHOOL SYMBOL RE-
PRESENT QUANTITY

KEY:

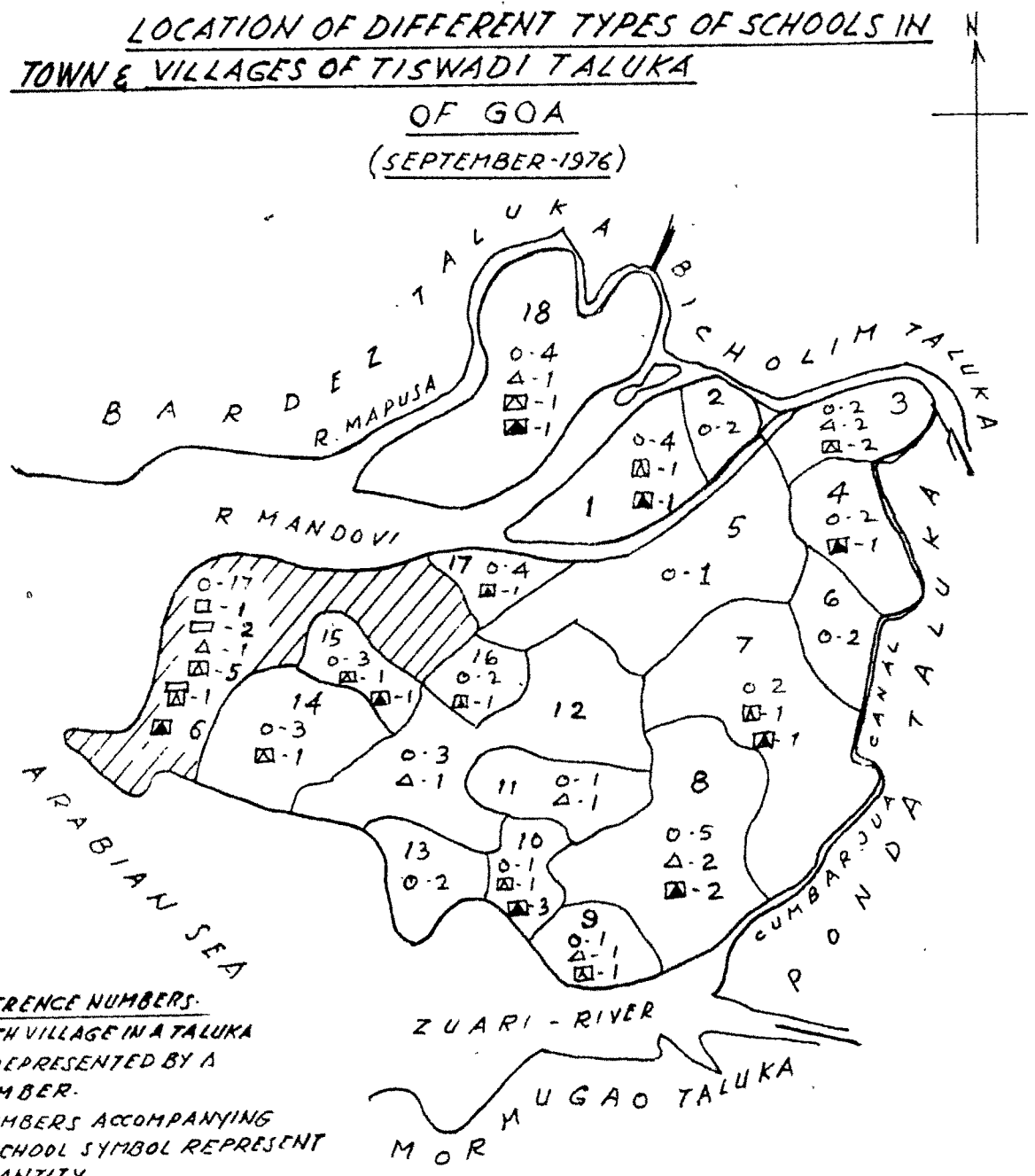
 URBAN AREA

SYMBOL		RURAL	URBAN	TOTAL
○	L.P.	87	1	88
□	L.S.	1	1	2
△	LP+UP	8	1	9
■	UP+LS	1	2	3

VILLAGES

- | | |
|-------------|---------------|
| 1. MAUZI | 7. PISSURLEM |
| 2. NAGARGAO | 8. BIRONDEM |
| 3. DONGURLI | 9. GULELI |
| 4. QUERIM | 10. KHOTODE |
| 5. PARIEM | 11. SANVARDEM |
| 6. HONDA | |

EDUCATIONAL MAP SHOWING
LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF TISWADI TALUKA
OF GOA
(SEPTEMBER-1976)



REFERENCE NUMBERS:
1 EACH VILLAGE IN A TALUKA IS REPRESENTED BY A NUMBER.
2 NUMBERS ACCOMPANYING A SCHOOL SYMBOL REPRESENT QUANTITY.

KEY:

URBAN AREA

SYMBOL		RURAL	URBAN	TOTAL
○	LP	44	13	57
□	LS	-	1	1
▢	HS	-	2	2
△	LP+UP	8	1	9
▣	LP+UP+LS+HS	-	1	1
▤	LP+UP+LS	8	6	14
▥	UP+LS	11	7	18

VILLAGES

- | | |
|-------------------------|------------------|
| 1. GOLTIM-NAVELIM | 10. STO. ANDRE |
| 2. S. MATIAS | 11. BATIM |
| 3. STO. ESTEVAO | 12. CURCA |
| 4. KUMBARJUA | 13. SIRIDAO |
| 5. SE OLD GOA | 14. TALEIGAO |
| 6. CORLIM | 15. STA. CRUZ |
| 7. CARAMBOLIM | 16. MERCES |
| 8. AZOSSIM-MANDUR-NEURA | 17. CHIMBEL |
| 9. STO. LOURENCO | 18. MADEL-CHORAO |

EDUCATIONAL MAP SHOWING
LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF PONDA TALUKA
OF GOA
(SEPTEMBER 1976)



REFERENCE NUMBERS:

1. EACH VILLAGE IN A TALUKA IS REPRESENTED BY A NUMBER.
2. NUMBERS ACCOMPANYING A SCHOOL SYMBOL REPRESENT QUANTITY.

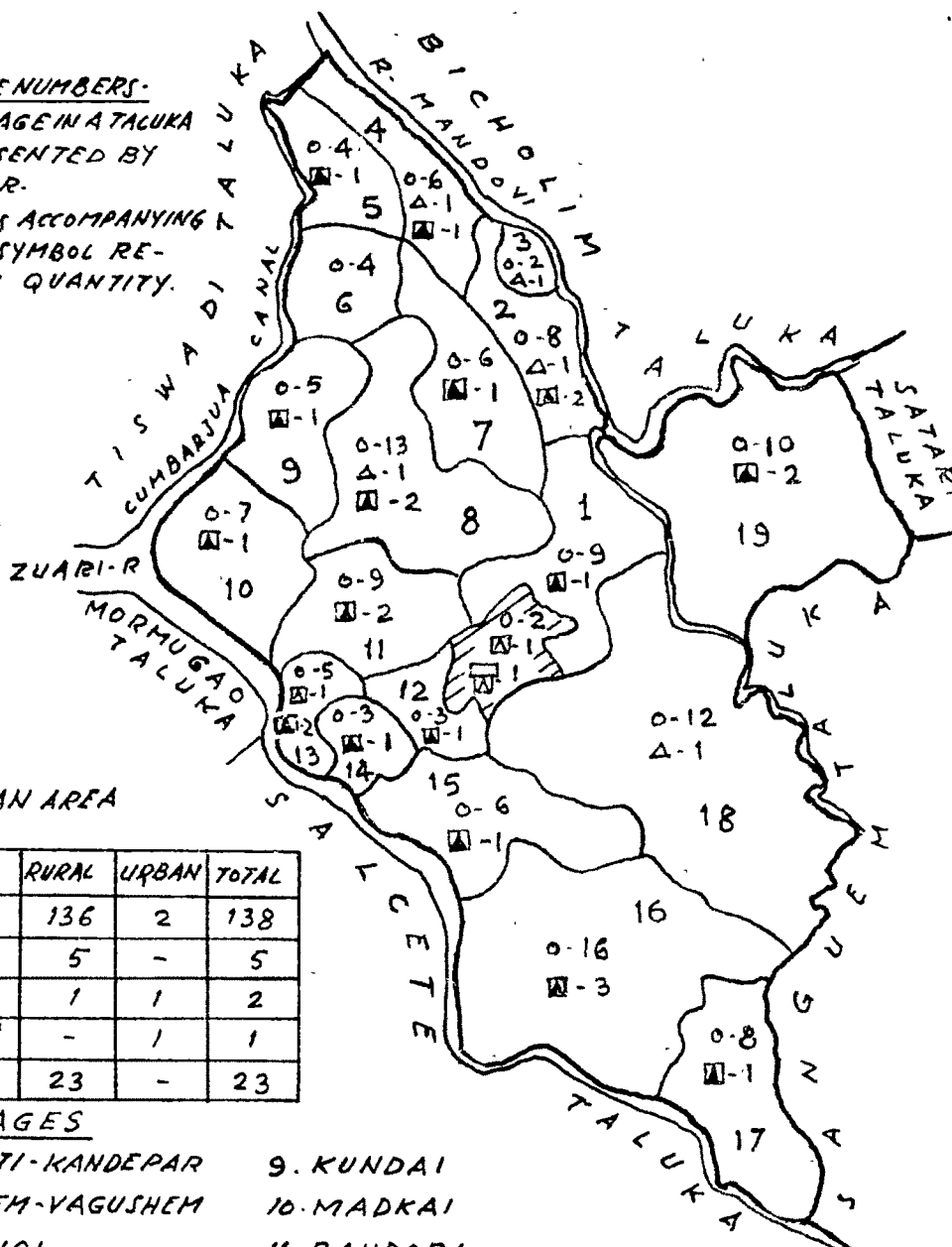
KEY:

URBAN AREA

SYMBOL		RURAL	URBAN	TOTAL
○	LP	136	2	138
△	LP+UP	5	-	5
◻	LP+UP+LS	1	1	2
◻	LP+UP+LS+HS	-	1	1
◻	UP+LS	23	-	23

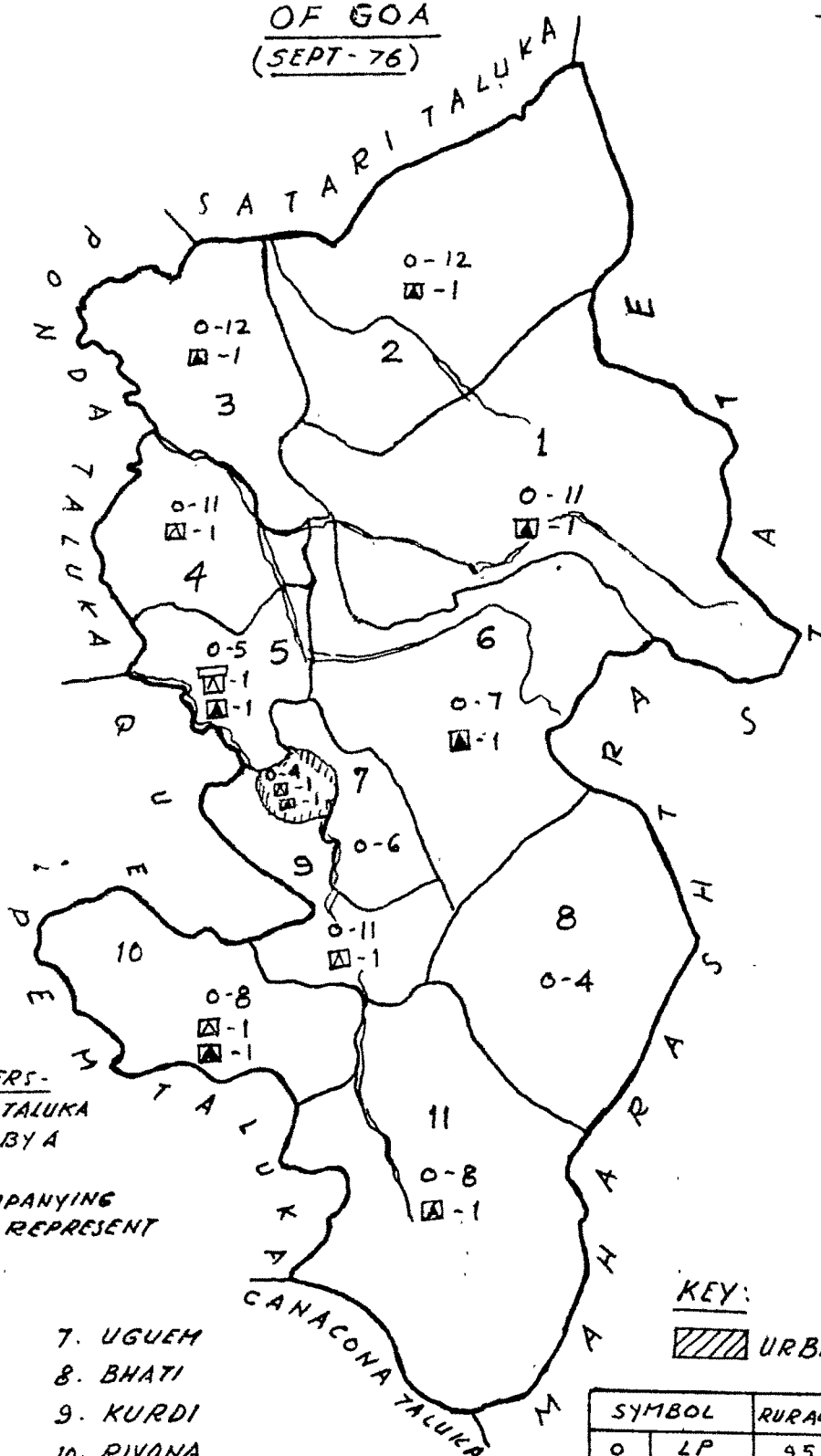
VILLAGES

- | | | |
|---------------------------|--------------------|----------------------|
| 1. KURTI-KANDEPAR | 9. KUNDAI | |
| 2. VEREM-VAGUSHEM | 10. MADKAI | |
| 3. VOLVOI | 11. BANDORA | |
| 4. BETKI-KAVDOLA | 12. DURBHAT | 18. BETORA-NIRANCHAL |
| 5. TIVIM-ORGAO | 13. QUEULA | 19. USGAO-GAUGEM |
| 6. BHOMA-ADEOLNA | 14. VADI-TALAU LIM | |
| 7. KERIM | 15. BORIM | |
| 8. VELLING-PRIOL-CUNCOLIM | 16. SIRODA | |
| | 17. PANCHWADI | |



LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF SANGUEM TALUKA

OF GOA
(SEPT-76)



REFERENCE NUMBERS-

1. EACH VILLAGE IN A TALUKA IS REPRESENTED BY A NUMBER.
2. NUMBERS ACCOMPANYING A SCHOOL SYMBOL REPRESENT QUANTITY.

VILLAGES

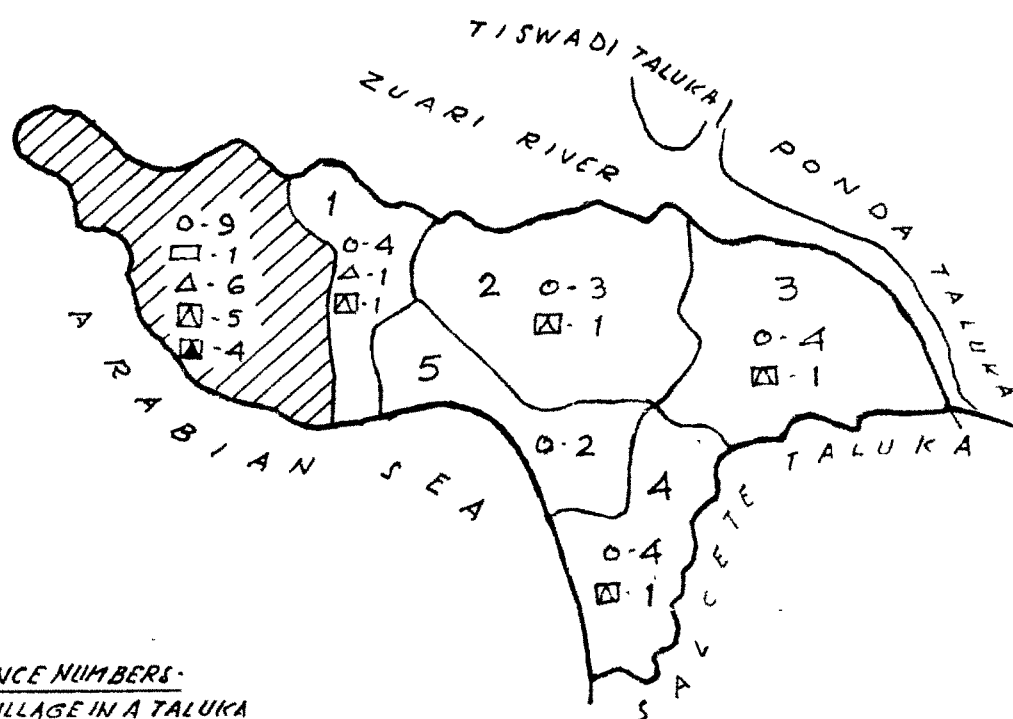
- | | |
|----------------|---------------|
| 1. COLLEM | 7. UGUEM |
| 2. SANCORDA | 8. BHATI |
| 3. DHARBANDODA | 9. KURDI |
| 4. DABAL | 10. RIVONA |
| 5. SAWARDE | 11. NETRAVALI |
| 6. KALAY | |

KEY:

URBAN AREA


SYMBOL		RURAL	URBAN	TOTAL
0	LP	95	4	99
	LP+UP+LS+HS	1	-	1
	LP+UP+LS	3	1	4
	UP+LS	7	1	8

EDUCATIONAL MAP SHOWING
LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF MORMUGAO TALUKA
OF GOA
(SEPTEMBER-1976)



REFERENCE NUMBERS:-
 1- EACH VILLAGE IN A TALUKA
 IS REPRESENTED BY A
 NUMBER
 2 NUMBERS ACCOMPANYING
 A SCHOOL SYMBOL REPRESENT
 QUANTITY.

KEY:

 URBAN AREA

SYMBOL		RURAL	URBAN	TOTAL
○	LP	17	9	26
□	HS	-	1	1
△	LP+UP	1	6	7
▤	LP+UP +LS	4	5	9
▥	UP+LS	-	4	4

VILLAGES

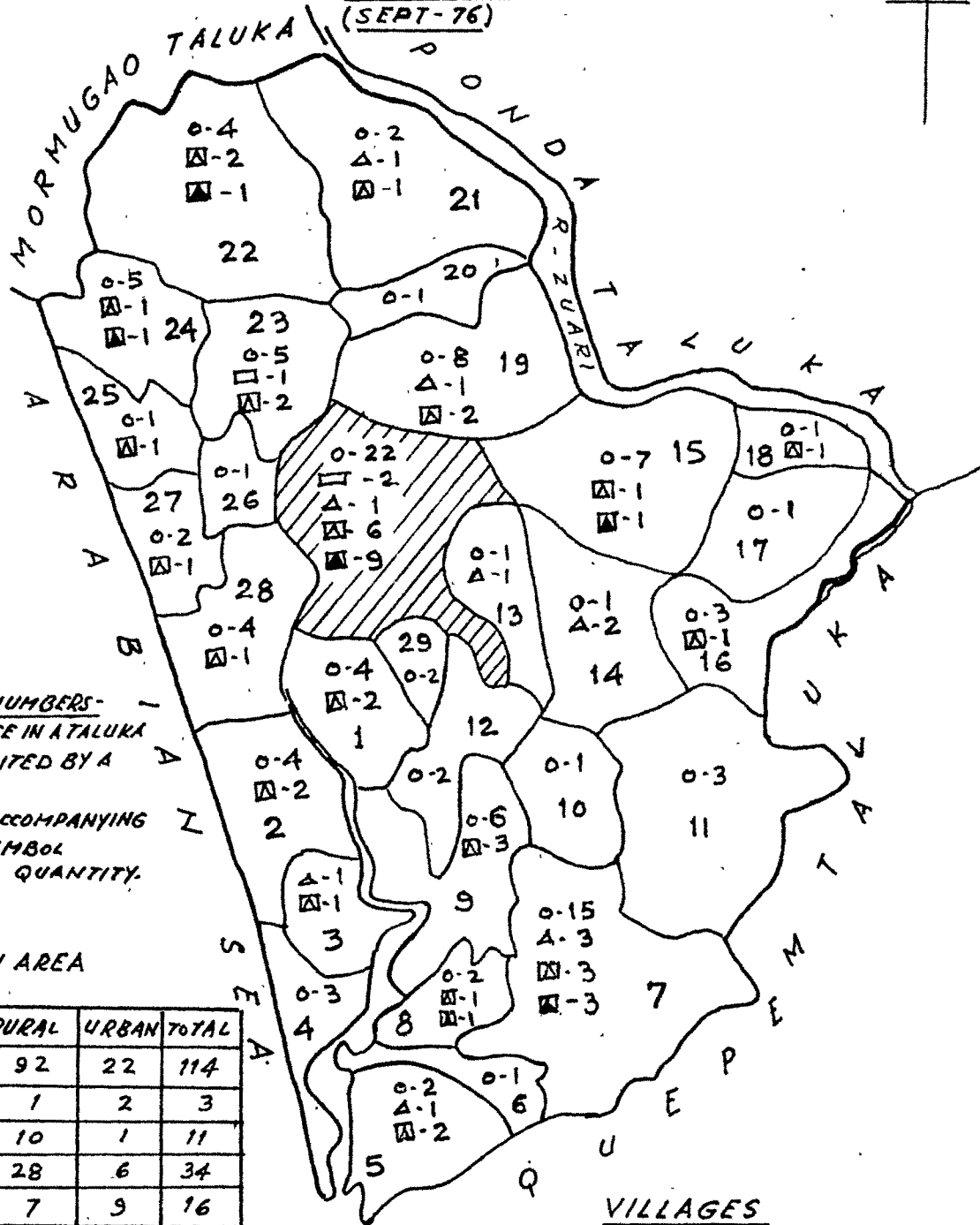
1. CHICALIM-BOGAMALO
2. SANCOALE
3. CORTALIM-QUELLOSSI
4. CANSAULIM
5. VELCAO-PALE

EDUCATIONAL MAP SHOWING

241 FIG. 29

LOCATION OF DIFFERENT TYPES OF SCHOOLS IN TOWN & VILLAGES OF SALCETE TALUKA

OF GOA
(SEPT-76)



- | | | | |
|----------------|------------------------|---------------------|---------------------------|
| 1. NAVELIM | 8. ASSOLNA | 15. CURTORIM | 22. VERNA-NAGOA |
| 2. VARCA-ORLIM | 9. CHINCHINIM | 16. CHANDOR-CAVORIM | 23. NUVEH |
| 3. CARHONA | 10. SARZORA | 17. GUIRDOLIM | 24. MAJORDA-CALATA-UTORDA |
| 4. CAVELOSSIM | 11. PARODA | 18. MACASANA | 25. BETALBATIM |
| 5. VELIM | 12. DRAMAPUR-SIRLIM | 19. RAIA-RACHOL | 26. SERAULIM |
| 6. AMBELIM | 13. DAVORLIM-DICARPALE | 20. CAMURLIM | 27. COLVA |
| 7. CUNCOLIM | 14. SAO-JOSE DE AREAL | 21. LOUTOLIM | 28. CONA-BENAU LIM |
| | | | 29. ARQUEM-BAIXO |

Quepem had 6.43% as indicated in Figure 30 and Canacona had 6.10% as indicated in Figure 31.

Considering the distribution of school facilities in the three educational zones of Goa, the North Educational Zone apparently has the highest number of 452 institutions representing 37.29% of the overall total of 1212 in Goa, followed by the Central Educational Zone with 31.60% and the South Educational Zone with 31.11% of the total school facilities in Goa. However, judging from the distribution of population in Goa, the South Educational Zone should have had the highest number of school facilities followed by the North and the Central Zones, as was pointed out earlier in Chapter IV.

With reference to the distribution of school facilities according to the number of sections available at different levels of school education, the South Educational Zone appears to be the most neglected educational zone in Goa, as pointed out earlier in Table XXXII and partly illustrated in Figure 13. According to the study, the North Educational Zone, has the highest number of lower primary school sections, providing on an average a lower primary school section, for every 673 inhabitants of the zone as against 710 inhabitants in the Central Educational Zone and

EDUCATIONAL MAP SHOWING

LOCATION OF DIFFERENT TYPES OF SCHOOLS IN
TOWN & VILLAGES OF QUELEPEM TALUKA

OF GOA
(SEPTEMBER-1976)

VILLAGES

1. SIRVAI

2. MALKARNEM

3. KAKODA

4. CURCHOREM

5. ASULDA

6. XELDEM-AMONA

7. AVEDEM-KOTHAMBI-CHAUFI
8. DEAO

9. AMBALIM

10. BALLI-ADONEM-BENDURDEM-TILOL-KHADDEM

11. FATORPA

12. NAQUERI

13. BARSHEN-KHADDEM

14. KANWEM

FIG. 30

- REFERENCE NUMBERS:
1. EACH VILLAGE IN A TALUKA IS REPRESENTED BY A NUMBER.
2. NUMBERS ACCOMPANYING A SCHOOL SYMBOL REPRESENT QUANTITY.

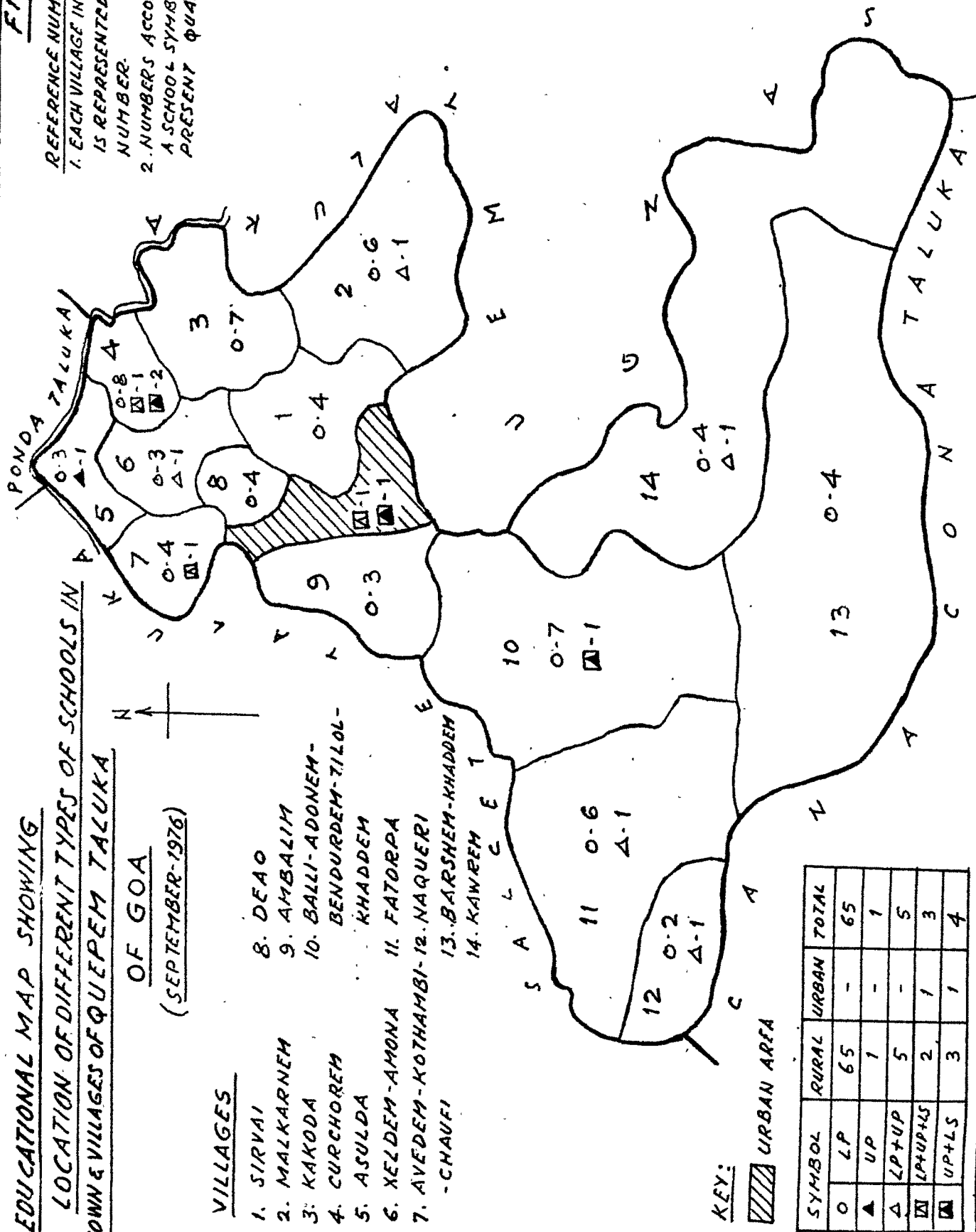


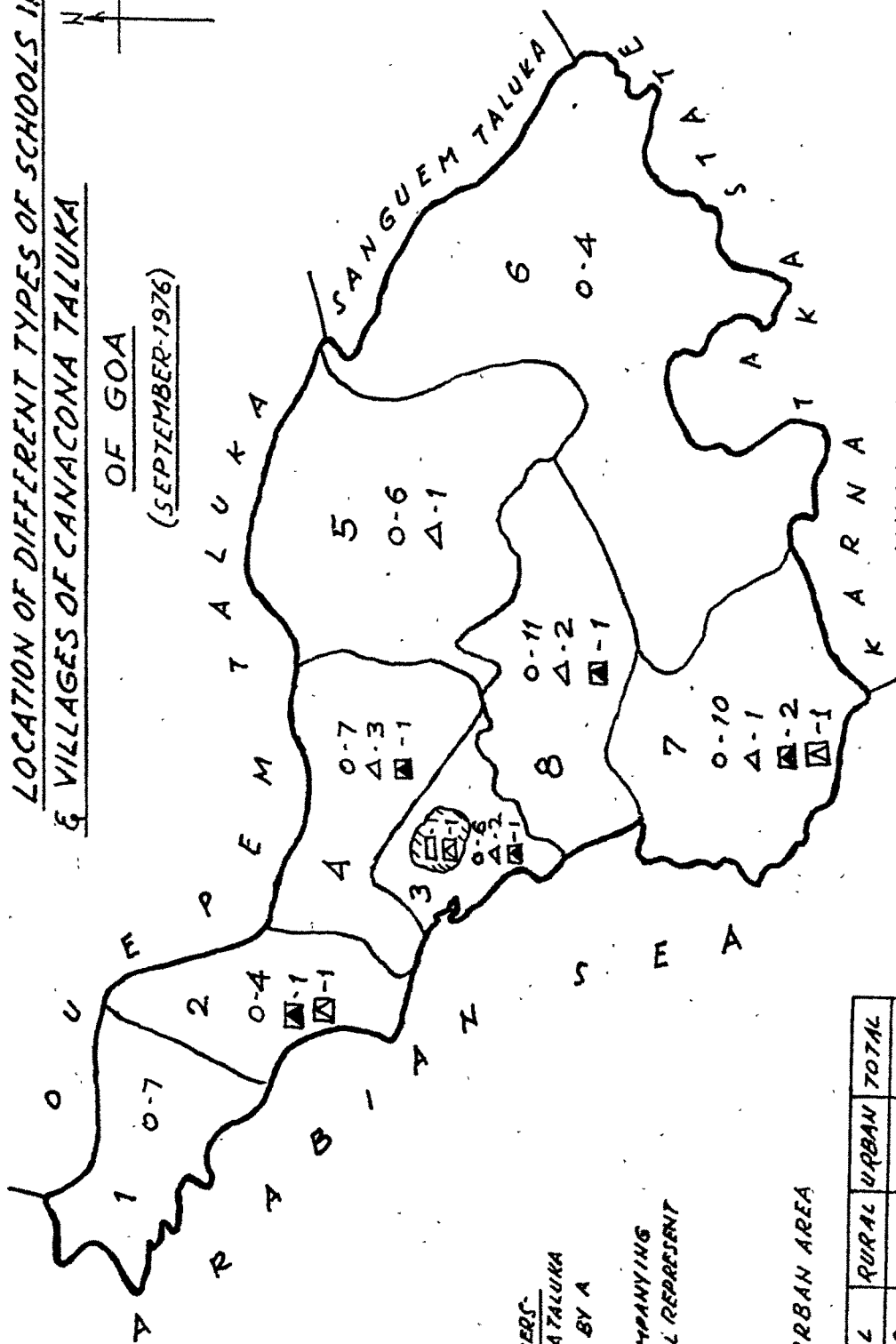
FIG. 31

EDUCATIONAL MAP SHOWING

LOCATION OF DIFFERENT TYPES OF SCHOOLS IN TOWN
& VILLAGES OF CANACONA TALUKA

OF GOA

(SEPTEMBER 1976)



REFERENCE NUMBERS:

1- EACH VILLAGE IN A TALUKA

IS REPRESENTED BY A

NUMBER

2. NUMBERS ACCOMPANYING

A SCHOOL SYMBOL REPRESENT

QUANTITY.

KEY:

▨ URBAN AREA

SYMBOL	RURAL	URBAN	TOTAL
0 LP	55	-	55
□ HS	-	1	1
△ LPTUP	9	-	9
▢ LPTUPHS	2	1	3
▣ UP+LS	6	-	6

VILLAGES

1. COLA
2. AGONDA
3. NAGARSE-PALOLEM
4. CANACONA
5. GAUNDONGREH
6. COTIGAO
7. LOLIEM-POLEM
8. PONIGUINIM

857 inhabitants in the South Educational Zone. In the case of upper primary school sections, again the North Educational Zone, has the highest numbers, providing an average of 2093 inhabitants for every upper primary school section, and in the case of secondary education, the Central Educational Zone, provides the best average of 3219 inhabitants for every lower secondary school section and also has the best average of 46,997 inhabitants for every higher secondary school section in the zone.

The analysis of stagewise distribution of school facilities in the three educational zones of Goa also indicates that the South Educational Zone has the least number of primary schools, representing 30.05% of the total whereas the North Educational Zone has 38.36% and the Central Educational Zone has 31.59% of the total primary school facilities in Goa.

In the case of secondary schools however, there is a slight difference in the percentage of the distribution in favour of the South Educational Zone, which has 35.44% of the total number of secondary schools, whereas the North Educational Zone has 32.91% and the Central Educational Zone has 31.65% of all the secondary schools in Goa.

This wide disparity in the distribution of school facilities in the three educational zones of Goa, obviously indicates the lack of a rational policy in the school development programme in Goa. As pointed out earlier in Chapter IV, the absence of a rational policy regarding the opening of new schools, has not only produced badly located and unevenly distributed schools throughout Goa but many of them are too small and perhaps a few too big to be handled efficiently. It is understandable to have a lower primary school with an enrolment of less than 100 pupils and in fact 72.39% do at present in Goa, as indicated in Table XXIV, and 7.83% even have less than 20, but, to have a lower secondary school with less than 100 students is difficult to believe, and with less than twenty it is simply inconceivable but yet there are such schools in Goa, as pointed earlier in Table XXVI.

Hence there seems to be a need to adopt a set criteria for determining the location and size of schools in Goa with a view to rectifying the existing situation.

5.7 Criteria needed for determining the location and size of schools in Goa

Taking into consideration that Goa has experienced a tremendous expansion of educational facilities during the

past 15 years, and also, in view of the fact that it had registered, in the 1971 Census of India, a comparatively high rate of literacy, many people in the educational circle of Goa, are of the opinion that the suggestions made by the Education Commission of 1964-66 for determining the location and size of schools, should be accepted with slight modifications and a few additions to suit the local conditions and the present practice prevailing in Goa. Accordingly, an attempt is made here to review the suggestions and modify them where necessary with a view to establishing a set criteria for determining the location and size of schools in Goa.

As noted in the earlier part of this Chapter the guidelines suggested by the Education Commission of 1964-66 are the following:

(i) Lower Primary Schools

- (a) A lower primary school teaching classes I-IV should be available within one mile from the home of every child.

This suggestion could easily be accepted in Goa by changing the words "one mile" to read as "one and a half (1.5 kms)" in view of the fact that as at present, there are no restrictions in Goa, to open any type of school any where except within the radius of 1.5 kms, of another school of the same type.

- (b) Villages with a population of 200-300 inhabitants should have a lower primary school.

This suggestion could also be accepted by changing the word "Villages" to read as "Habitations" in view of the fact that the present Educational Administration has been re-organised on the basis of 179 panchayat villages having 1601 rural habitations in Goa. Originally the administration covered 383 revenue villages with 1773 rural habitations. The amalgamation of most of the revenue villages and some of the habitations, has naturally increased the number of inhabitants in the reorganised panchayat villages and also in the much reduced number of rural habitations. The population figure of "200-300" should also be changed to read as "200-699".

- (c) An optimum sized lower primary school should have an enrolment of 160-200 pupils with 4 to 5 teachers.

This suggestion could be accepted as it is, since it is based on sound economics to be applicable any where.

(ii) Upper Primary Schools

- (a) An upper primary school teaching classes I-VII should be available within three miles of the walking distance from the home of every child.

This suggestion could be accepted after changing the words "three miles" to read as "three kms" on almost the same grounds as those specified for altering the suggestion in (i)-(a).

- (b) Villages with a population of 700 and more inhabitants should have an upper primary school.

This suggestion could also be accepted after changing the word "villages" to read as "habitations" for the same reasons specified for the change in (i)-(b).

- (c) An upper primary school should be available for a group of three or four lower primary schools.

This suggestion could be accepted as it is, because of its general nature.

- (d) A normal sized upper primary school should have an enrolment of 300-400 pupils with 7 to 8 teachers excluding the headmaster. Schools of this size and even bigger should be available in all urban areas and villages with a population of 1500 and more.

This suggestion could also be accepted as it is, because of its general nature and sound economics.

(iii) Lower Secondary Schools

- (a) Lower secondary schools teaching classes VIII-X should be available within five to seven miles from the home of every child.

With reference to the reasons already specified under (i)-(a), this suggestion could be accepted after changing the words "five to seven miles" to read as "five kms".

- (b) A lower secondary school should be established to serve a radius of 5 to 7 miles with a population coverage of 10,000 to 15,000.

Since there are hardly any villages with over 10,000 inhabitants the above suggestion could be modified to read "5,000 to 10,000" instead of "10,000 to 15,000" to suit the needs of Goa and the words "5 to 7 miles" also should be changed to read "5 kms".

In addition to accepting the modified suggestion two other conditions should also be considered in view of the fact that most villages do not have a large population. They are :

- (1) Villages with a population of 5000 or more should have a lower secondary school.
- (2) Two or more neighbouring villages with four or more upper primary schools should have at least one lower secondary school amongst them.
- (c) A well equipped lower secondary school should have at least 9 divisions i.e. 3 for each class with an enrolment of 360-450 students and a staff of about 20 teachers. The very minimum specifications for a lower secondary school should be 6 divisions i.e. 2 for each class with an enrolment of 240-300 students.

This suggestion of the Education Commission of 1964-66 could also be accepted in Goa as it is, because of its economic basis.

(iv) Higher Secondary Schools

A higher secondary school should be available for a group of about four lower secondary schools.

In addition to accepting the above suggestions, the criteria for Goa should also include:

- (1) Villages with a population of 14,000 or more should have a higher secondary school.
- (2) Two or more neighbouring villages with a combined population of 15,000 or more should have a higher secondary school provided they also have at least four lower secondary schools amongst them.
- (3) Each taluka should have at least one higher secondary school, provided it also has at least three lower secondary schools.

In brief, the criteria to be adopted in Goa, for determining the location and size of schools, is as follows:

(i) Lower Primary Schools

- (a) A lower primary school teaching classes I-IV should be available within 1.5 kms from the home of every child.
- (b) Habitations with a population of 200-699 inhabitants should have a lower primary school.
- (c) The optimum sized lower primary school should have an enrolment of 160-200 pupils with 4 to 5 teachers.

(ii) Upper Primary Schools

- (a) An upper primary school teaching classes I-VII should be available within three kilometers of the walking distance from the home of every child.
- (b) Habitations with a population of 700 and more inhabitants should have an upper primary school.
- (c) An upper primary school should be available for a group of three or four lower primary schools.
- (d) A normal sized upper primary school should have an enrolment of 300-400 pupils with 7 to 8 teachers excluding the headmaster. Schools of this size and even bigger should be available in all urban areas and villages with a population of 1500 and more.

(iii) Lower Secondary Schools

- (a) Lower secondary schools teaching classes VIII-X should be available within five kilometers from the home of every child.
- (b) A lower secondary school should be established to serve a radius of five kilometers with a population coverage of 5,000 to 10,000.

- (c) Villages with a population of 5000 or more should have a lower secondary school.
- (d) Two or more neighbouring villages with four or more upper primary schools should have at least one lower secondary school amongst them.
- (e) A well equipped lower secondary school should have at least 9 divisions i.e. 3 for each class with an enrolment of 360-450 students and a staff of about 20 teachers. The very minimum specifications of a lower secondary school should be 6 divisions i.e. 2 for each class with an enrolment of 240-300 students.

(iv) Higher Secondary Schools

- (a) A higher secondary school should be available for a group of about four lower secondary schools.
- (b) Villages with a population of 14,000 or more should have a higher secondary school.
- (c) Two or more neighbouring villages with a combined population of 15,000 or more should have a higher secondary school, provided, they also have at least four lower secondary schools amongst them.
- (d) Each taluka should have at least one higher secondary school, provided it also has at least three lower secondary schools.

Having established a set criteria for determining the location and size of schools in Goa, the next step is to identify the prospective needs of every village and town in Goa, in addition to the school facilities presently made available.

5.8 Identification of Perspective Needs of every village and town in Goa and their indication in the Educational map of the three Educational Zones of Goa

With the help of the established criteria for determining the location and size of schools in Goa, the additional school facilities needed in every village and town in Goa, were identified as shown in Table LIII.

According to the analysis, the whole district of Goa, is in need of 627 additional school facilities for all types of schools, almost all of which, with the exception of two, are needed in rural areas.

The majority of the school needs, representing 92.82% are for primary education and only 7.18% for secondary.

With reference to school needs in various talukas of Goa, Salcete Taluka appears to indicate greater demand than all the others. Its total requirement, for additional school facilities, represents 28.29% of the total perspective needs for the whole of Goa. Bardez Taluka comes next with 20.41%, followed by Tiswadi with 10.69% and all the others make up for the balance of 40.51%. The least demand for additional school facilities comes from Satari Taluka which has the shorest list, representing only 2.23% of the total.

TABLE LIII

Perspective needs of each Taluka for different stages of School Education in Goa, in addition to the School facilities presently made available

Sr. No.	Taluka	Items	NUMBER AND TYPE OF SCHOOLS REQUIRED											Total for all Types of Schools
			LP	UP	LS	HS	LP+UP	LP+LS	LP+UP+LS+HS	UP+LS	UP+HS	LS+HS	LS+HS	
			4	5	6	7	8	9	10	11	12	13	14	
1	Pernem	Rural	21	10	1	1	2	-	-	-	-	-	-	35
		Urban	-	-	-	-	-	-	-	-	-	-	-	-
		Total	21	10	1	1	2	-	-	-	-	-	-	35
2	Bardez	Rural	79	34	2	5	8	-	-	-	-	-	-	128
		Urban	-	-	-	-	-	-	-	-	-	-	-	-
		Total	79	34	2	5	8	-	-	-	-	-	-	128
3	Bicholim	Rural	14	15	4	2	1	-	-	-	-	-	-	36
		Urban	-	-	-	-	-	-	-	-	-	-	-	-
		Total	14	15	4	2	1	-	-	-	-	-	-	36
4	Satari	Rural	-	10	3	-	-	-	-	-	-	-	-	13
		Urban	-	-	-	1	-	-	-	-	-	-	-	1
		Total	-	10	3	1	-	-	-	-	-	-	-	14
5	Sub-Total for North Zone	Rural	114	69	10	8	11	-	-	-	-	-	-	212
		Urban	-	-	-	1	-	-	-	-	-	-	-	1
		Total	114	69	10	9	11	-	-	-	-	-	-	213

: 2 :

TABLE LIII

	2	3	4	5	6	7	8	9	10	11	12	13	14
6	Tiswadi	Rural Urban Total	37 - 37	15 - 15	1 - 1	2 - 2	12 - 12	- - -	- - -	- - -	- - -	- - -	67 - 67
7	Ponda	Rural Urban Total	15 - 15	28 - 28	- - -	3 - 3	1 - 1	- - -	- - -	- - -	- - -	- - -	47 - 47
8	Sanguem	Rural Urban Total	9 - 9	13 - 13	- - -	2 - 2	1 - 1	- - -	- - -	- - -	- - -	- - -	25 - 25
9	Sub-Total for Central Zone	Rural Urban Total	61 - 61	56 - 56	1 - 1	7 - 7	14 - 14	- - -	- - -	- - -	- - -	- - -	139 - 139
10	Mormugao	Rural Urban Total	17 - 17	10 - 10	- - -	1 - 1	1 - 1	- - -	- - -	- - -	- - -	- - -	29 - 29
11	Salcete	Rural Urban Total	121 - 121	36 - 36	2 - 2	6 - 6	13 - 13	- - -	- - -	- - -	- - -	- - -	178 - 178
12	Quepem	Rural Urban Total	21 - 21	14 - 14	5 - 5	1 - 1	5 - 5	- - -	- - -	- - -	- - -	- - -	46 1 47

(.....3)

: 3 :

TABLE LIII													
	2	3	4	5	6	7	8	9	10	11	12	13	14
13	Canacona	Rural	12	5	1	1	2	-	-	-	-	-	21
		Urban	-	-	-	-	-	-	-	-	-	-	-
		Total	12	5	1	1	2	-	-	-	-	-	21
14	Sub-Total for South Zone	Rural	171	65	8	9	21	-	-	-	-	-	274
		Urban	-	-	-	1	-	-	-	-	-	-	1
		Total	171	65	8	10	21	-	-	-	-	-	275
15	Grand Total for all Goa	Rural	346	190	19	24	46	-	-	-	-	-	625
		Urban	-	-	-	2	-	-	-	-	-	-	2
		Total	346	190	19	26	46	-	-	-	-	-	627
Percentage to Total			55.18	30.30	3.03	4.15	7.34	-	-	-	-	-	100%

Shifting the arena to the educational zones of Goa, the South Educational Zone apparently has the highest claim, representing 43.86% of the total perspective needs for the whole of Goa, as compared to 33.97% claimed by North Educational Zone and only 22.17% claimed by the Central Educational Zone of Goa.

The South Educational Zone claiming the lion's share of the total perspective needs of additional school facilities in Goa, should not come as a big surprise, because it has been the most neglected zone in the past, although it is the most populated of all the other zones in Goa.

The individual requirements of every village and town for different types of schools in each taluka of Goa are indicated separately in the educational maps for the three educational zones of Goa.

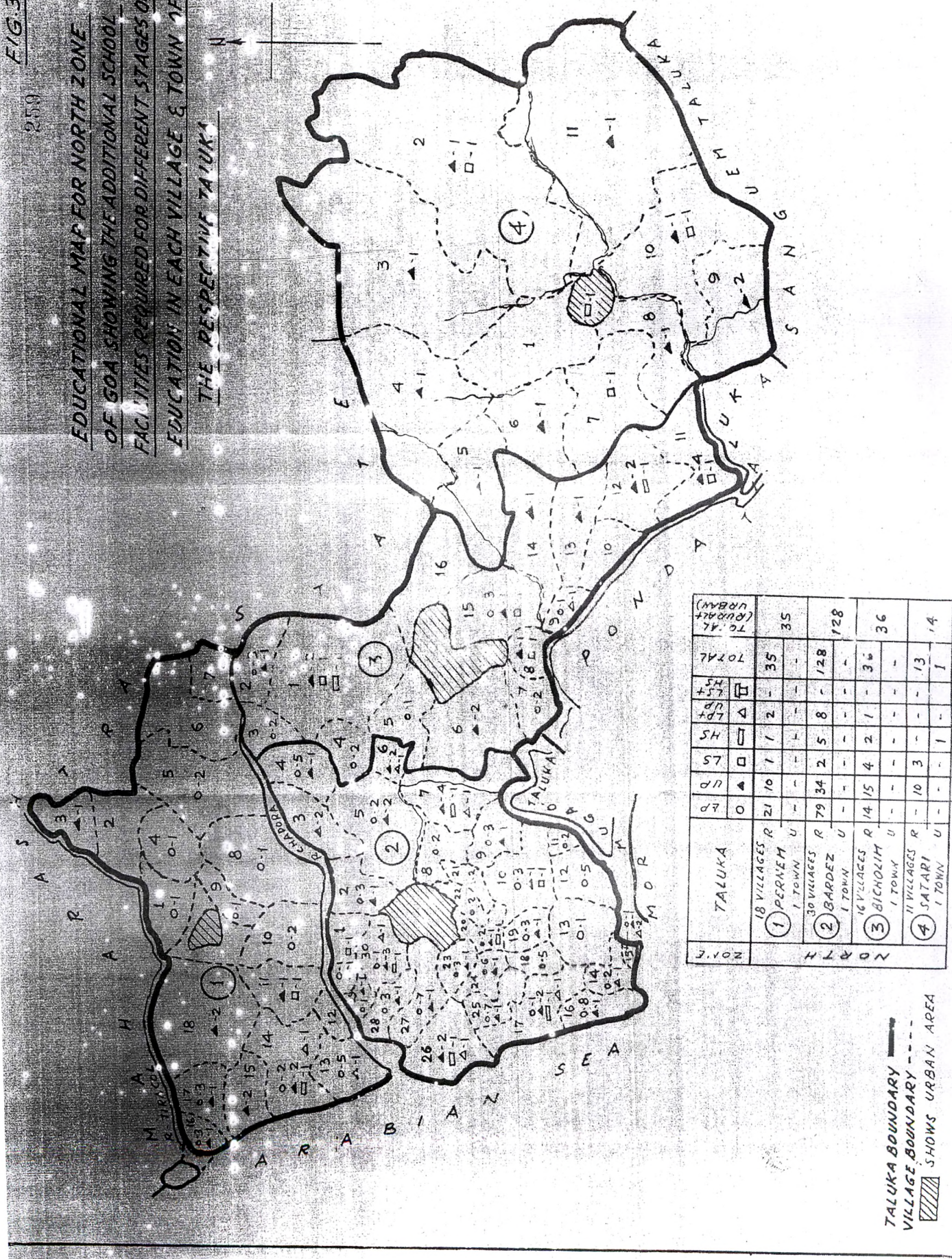
The perspective needs, in addition to the school facilities presently made available in the North Educational Zone of Goa, are indicated in the educational map in Fig.32; those of the Central Educational Zone, in Fig.33; and the rest, referring to the South Educational Zone, are indicated in Fig.34.

Now that the position of the existing school facilities as well as the perspective needs of school education in every

ABBREVIATIONS AND SYMBOLS USED
IN EDUCATIONAL MAPS

S.NO.	SYMBOL		TYPES OF SCHOOLS
i	○	LP	LOWER PRIMARY
ii	▲	UP	UPPER PRIMARY
iii	□	LS	LOWER SECONDARY
iv	▭	HS	HIGHER SECONDARY
v	△	LP+UP	LOWER AND UPPER PRIMARY
vi	◻	LP+UP +LS	LOWER AND UPPER PRIMARY WITH LOWER SECONDARY
vii	◻	LP+UP +LS+HS	LOWER AND UPPER PRIMARY WITH LOWER AND HIGHER SECONDARY
viii	◻	UP+LS	UPPER PRIMARY WITH LOWER SECONDARY
ix	◻	UP+LS +HS	UPPER PRIMARY WITH LOWER & HIGHER SECONDARY
x	◻	LS+HS	LOWER AND HIGHER SECONDARY

EDUCATIONAL MAP FOR NORTH ZONE
OF GOA SHOWING THE ADDITIONAL SCHOOL
FACILITIES REQUIRED FOR DIFFERENT STAGES OF
EDUCATION IN EACH VILLAGE & TOWN OF
THE RESPECTIVE TALUKA

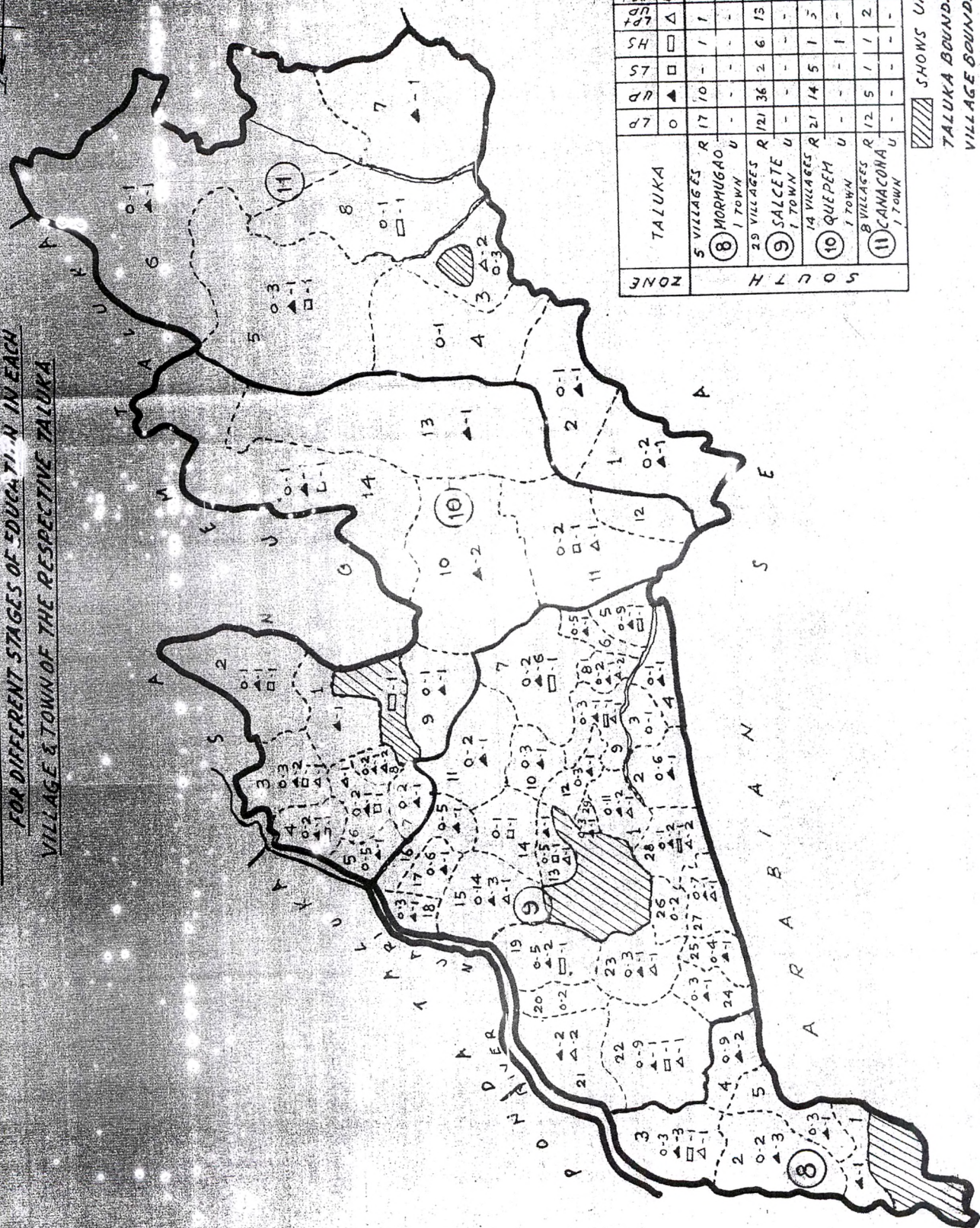


EDUCATIONAL MAP FOR CENTRAL ZONE OF
SHOWING THE ADDITIONAL SCHOOL FACILITIES REQUIRED
FOR DIFFERENT STAGES OF EDUCATION IN E
VILLAGE ETOWN OF THE RESPECTIVE TALUK.



	TALUKA		07	08	09	SH	Δ	AD + AD	74' OL
CENTRAL ZONE	18 VILLAGES R TISHANDI CITY	R	37	15	-	1	2	12	67
	(5)	U	-	-	-	-	-	-	-
	19 VILLAGES R PONDA TOWN	R	15	28	-	3	1	47	-
	(6)	U	-	-	-	-	-	-	-
	11 VILLAGES R SANGUEM TOWN	R	9	13	-	2	1	25	-
	(7)	U	-	-	-	-	-	-	-

SHOWS URBAN AREA
TALUKA BOUNDARY -
VILLAGE BOUNDARY -



ZONE	TALUKA	P	UD	S7	HS	LD+ LS+	H	TOTAL
SOUTH	5 VILLAGES R	17	10	-	1	-	-	29
	(8) MORNHUGAO 1 TOWN U	-	-	-	-	-	-	-
	29 VILLAGES R	121	36	2	6	13	-	178
	(9) SALCETE 1 TOWN U	-	-	-	-	-	-	-
	14 VILLAGES R	21	14	5	1	3	-	46
	(10) QUEDEM 1 TOWN U	-	-	-	-	-	-	1
SOUTH	8 VILLAGES R	12	5	1	1	2	-	21
	(11) CANACOWA 1 TOWN U	-	-	-	-	-	-	-

village and town of Goa are known, the next step is to prepare a 'Perspective Plan' and indicate the same in a consolidated educational map of Goa.

5.9 Preparation of a Perspective Plan to accommodate the "Consolidated School Needs" of every village and town in Goa and indication of the same in the Educational Map of Goa

Since a wide disparity was noticed earlier, in the distribution of the recognised schools in the three educational zones of Goa, a sectionwise study of school facilities at different levels of school education, was carried out, in respect of the existing situation registered on September 30, 1976, the identification of the perspective needs that followed and the consolidated demand that resulted on the basis of the established criteria.

According to the study, as on September 30, 1976, there were 1637 school sections for all stages of school education in Goa. In addition to this, 673 school sections were identified as "Perspective Needs" in terms of the established criteria. Thus raising the total need of school sections in Goa to 2310 which represents at present the 'Consolidated Demand' of every village and town in Goa. This consolidated demand for 2310 school sections for different stages and levels of school education in Goa is made up of

1462 lower primary sections representing 63.29% of the total, 562 upper primary sections representing 24.33%, 246 lower secondary sections representing 10.65% and 40 higher secondary sections representing 1.73% of the total, as indicated in Table LIV and illustrated in Fig. 35.

The analysis of the consolidated demand for school sections in different talukas of Goa indicates that Salcete Taluka with 464 school sections, representing 20.09% of the total, has the highest number, followed by Bardez with 366, representing 15.85%, Ponda with 252, representing 10.91%, Tiswadi with 239, representing 10.35% and so on, pointing thereby to a more equable distribution of school facilities, in-keeping with the population distribution in each taluka of Goa, as illustrated in Fig.36.

With regard to the distribution of school sections in the three educational zones of Goa, the analysis of the consolidated demand indicates that the South Educational Zone has the longest list of school needs, representing 36.06% of the total number of school sections needed for the whole of Goa. But this, should not come as a surprise because the South Educational Zone is the most populated zone, though most neglected as well, as pointed out earlier.

TABLE LIV

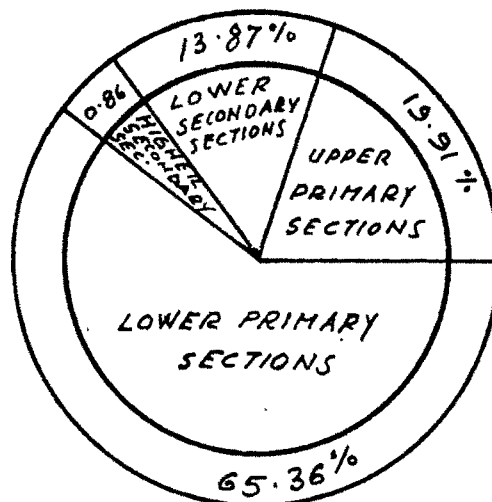
Distribution of School Sections by Stage and Level indicating the Situation as on September 30, 1976 in each Taluka, together with their 'Perspective Needs' and 'Consolidated Demand' for School Development in Goa.

Sr. No.	Taluka	School Education in Goa															Total for all Stages		
		Primary Stage						Secondary Stage											
		Lower Level			Higher Level			Lower Level			Higher Level								
		ES	PN	CD	ES	PN	CD	ES	PN	CD	ES	PN	CD	ES	PN	CD			
1	Pernem	91	23	114	33	12	45	13	1	14	1	1	2	138	37	175			
2	Bardez	122	87	209	59	42	101	47	2	49	2	5	7	230	136	366			
3	Bicholim	88	15	103	24	16	40	10	4	14	1	2	3	123	37	160			
4	Satari	97	-	97	12	10	22	5	3	8	-	1	1	114	14	128			
5	Sub-Total for North Zone	398	125	523	128	80	208	75	10	85	4	9	13	605	224	829			
6	Tiswadi	81	49	130	42	27	69	34	1	35	3	2	5	160	79	239			
7	Ponda	146	16	162	31	29	60	26	-	26	1	3	4	204	48	252			
8	Sanguem	104	10	114	13	14	27	13	-	13	1	2	3	131	26	157			
9	Sub-Total for Central Zone	331	75	406	86	70	156	73	1	74	5	7	12	495	153	648			
10	Mormugao	42	18	60	20	11	31	13	-	13	1	1	2	76	30	106			
11	Salcete	159	134	293	61	49	110	50	2	52	3	6	9	273	191	464			
12	Quepem	73	26	99	13	19	32	7	5	12	-	2	2	93	52	145			
13	Canacona	67	14	81	18	7	25	9	1	10	1	1	2	95	23	118			
14	Sub-Total for South Zone	341	192	533	112	86	198	79	8	87	5	10	15	537	296	833			
15	Grand Total for All Goa	1070	392	1462	326	236	562	227	19	246	14	26	40	1637	673	2310			

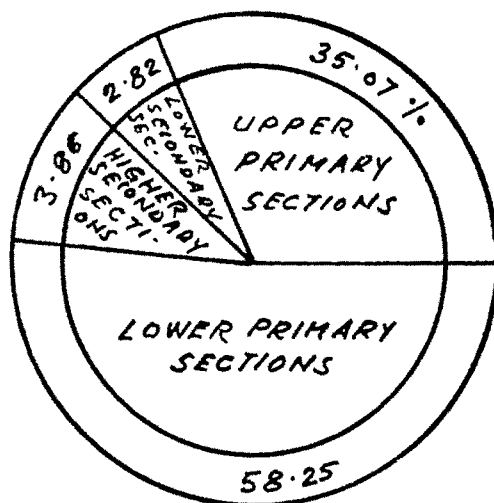
* Abbreviations used: ES = Existing situation, PN = Perspective Needs, CD = Consolidated Demand.

COMPARATIVE FIGURES FOR PERCENTAGE DISTRIBUTION
OF SCHOOL SECTIONS FOR DIFFERENT LEVELS OF SCHOOL
EDUCATION IN GOA

(a) AS EXISTING AT PRESENT



(b) AS REPRESENTED UNDER
PROSPECTIVE NEEDS



(c) AS REPRESENTED IN THE
"CONSOLIDATED DEMAND"
PLAN

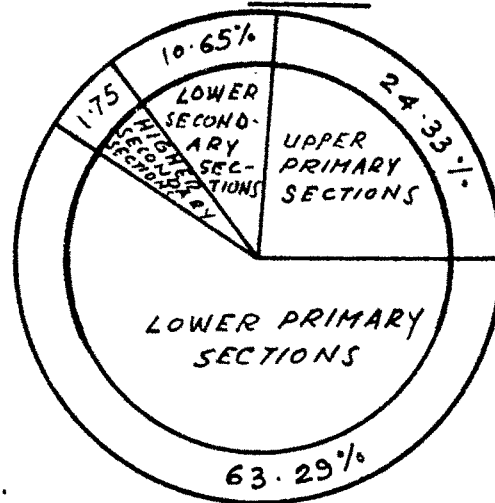
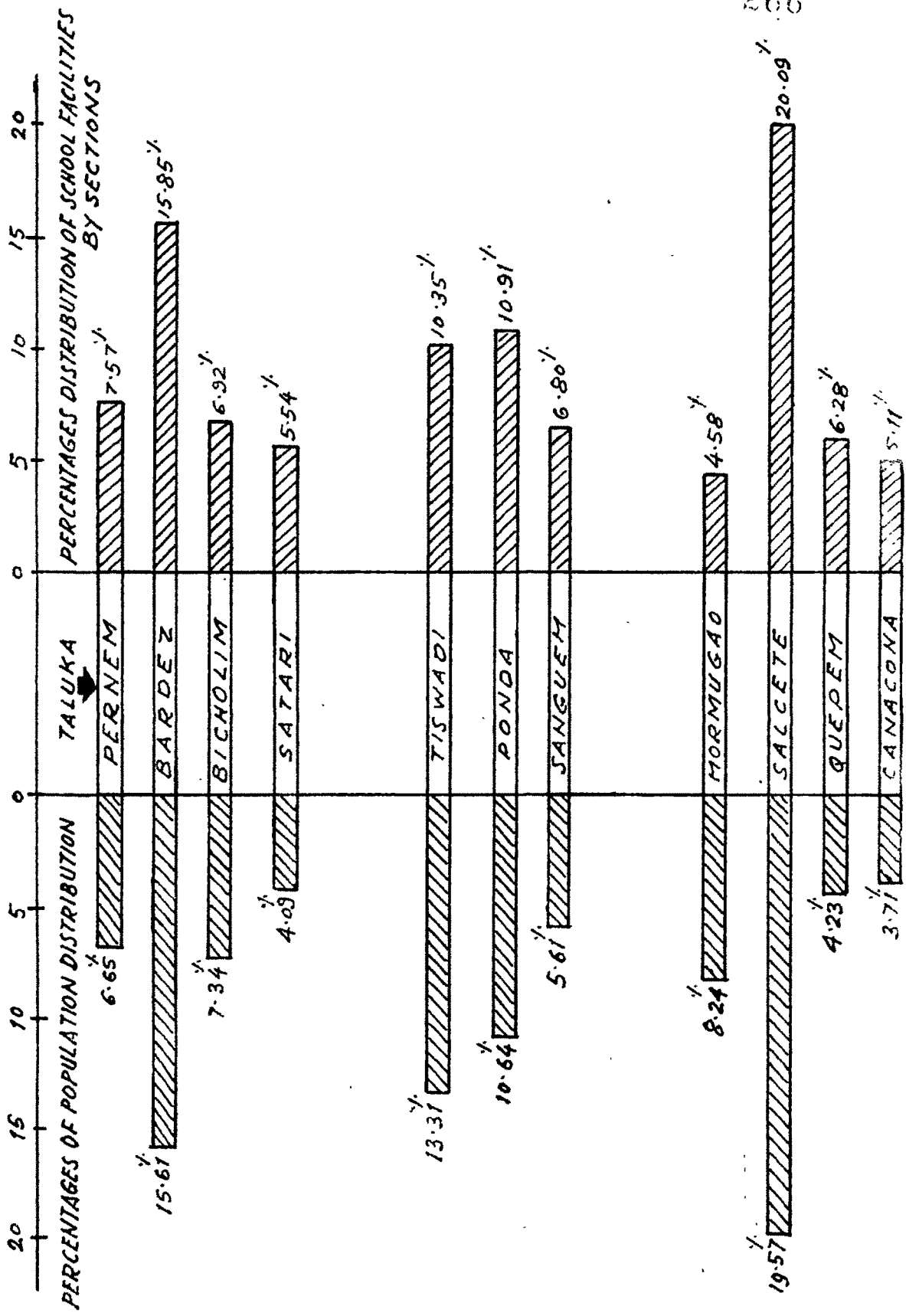


FIG. 36

COMPARATIVE PERCENTAGES OF POPULATION DISTRIBUTION AND CONSOLIDATED DEMAND
FOR SCHOOL SECTIONS IN EACH TALUKA BASED ON THE ESTABLISHED CRITERIA FOR SCHOOL

LOCATION IN GOA



The South Educational Zone represents 36.75% of the total population of Goa but its total share of school facilities by sections amounts to only 32.80% of the total number of school sections for the whole of Goa, as compared to 36.90% of school sections in respect of the North Educational Zone, which represents only 33.70% of the total population of Goa and 30.24% of school sections concerning the Central Educational Zone which represents the balance of 29.55% of the population, as indicated in Table IV. However, according to the consolidated demand, based as it is on the established criteria, this disparity in the distribution of school sections stands rectified, for the South Educational Zone now has, the highest number of school sections, representing 36.06% in comparison to 35.89% in the North Educational Zone and 28.05% in the Central Educational Zone.

Since the sectionwise distribution of school facilities in the three educational zones, as represented in the consolidated demand plan, appears fairly equable and proportionate to the distribution of population in each zone, the next step to be taken was to prepare a 'Perspective Plan' for all types of schools and for different stages of school education in Goa, after examining the suitability of the

Zonalwise Population and the distribution of School Facilities by Stage and Level in Goa as on September 30, 1976 and as represented in the consolidated demand based on the established Criteria

Population (1971)	Items	No. of School/Sections by Stage and Level					Total
		Primary		Secondary		Z	
		Lower	Upper	Lower	Upper		
267,913 (33.70)	As at 30.9.76	NORTH ZONE		75 (33.0)	4 (28.0)	605 (36.96)	
	As per consoli- dated demand	398 (37.2)	128 (39.3)	85 (34.6)	13 (32.5)	829 (35.89)	
234,987 (29.55)	As at 30.9.76	CENTRAL ZONE		73 (32.2)	5 (35.7)	495 (30.24)	
	As per consoli- dated demand	331 (30.9)	86 (26.4)	74 (30.0)	12 (30.0)	648 (28.05)	
	As at 30.9.76	SOUTH ZONE		79 (34.8)	5 (35.7)	537 (32.80)	
	As per consoli- dated demand	406 (27.8)	156 (27.8)	87 (35.4)	15 (37.5)	833 (36.06)	
292,220 (36.75)	As at 30.9.76	341 (31.9)	112 (34.4)	227 (100)	14 (100)	1637 (100)	
	As per consoli- dated demand	533 (36.4)	198 (35.2)	246 (100)	40 (100)	2310 (100)	
795,120 (100)	As at 30.9.76	FOR ALL ZONES OF GOA		227 (100)	14 (100)	1637 (100)	
	As per consoli- dated demand	1070 (100)	326 (100)	246 (100)	40 (100)	2310 (100)	

Figures in the parentheses indicate percentage of the Total of Schools/Sections

existing institutions and reorganising them to accommodate the consolidated demand for school sections from every village and town in Goa, as indicated in Table LVI.

According to the 'Perspective Plan' 1606 schools, for various stages and levels of school education in Goa, are required in order to satisfy the consolidated needs of every village and town in Goa. Out of these, 1458 schools, representing 90.78% of the total are to be located in the rural areas of Goa so as to serve the need of 1601 rural habitations in 179 panchayat villages where 74.44% of the total population of Goa resides. Only a small balance of 9.22% of the schools are to be located in the urban areas, where 25.56% of the population of Goa resides.

From the overall total of 1606 schools in Goa, 1025, representing 63.82% of the total are to be operated at the lower primary level, 325, representing 20.24% at the upper primary level, 216, representing 13.45% at the lower secondary level and 40, representing 2.49% of the total at the higher secondary level, as illustrated in fig.37(a). A comparative distribution by school sections is also given in Fig. 35(c).

Transferring the scene to the educational zones of Goa, the South Educational Zone has a provision in the 'Perspective

TABLE LVI

Perspective Plan for all Types of Schools for Different States of Education in Goa based on the Urban as well as the Villagewise needs of each Taluka in terms of the established Criteria

Items	NUMBER AND TYPE OF SCHOOLS												Total for all Types of Schools
	LP	UP	LS	HS	LP+UP	LP+UP+LS+HS	LP+UP+LS	UP+LS	UP+LS+HS	UP+LS+HS	LS+HS	LS	
	2	3	4	5	6	7	8	9	10	11	12	13	14
Rural	80	-	1	-	32	1	-	9	1	-	-	-	124
Urban	1	-	-	1	-	-	-	2	-	-	-	-	4
Total	81	-	1	1	32	1	-	11	1	-	-	-	128
Rural	123	2	1	-	53	18	4	14	-	-	1	-	216
Urban	7	-	1	2	-	4	-	6	-	-	-	-	20
Total	130	2	2	2	53	22	4	20	-	-	1	-	236
Rural	64	-	1	-	27	3	-	4	1	-	1	-	101
Urban	6	-	-	-	1	1	1	2	-	-	-	-	11
Total	70	-	1	-	28	4	1	6	1	-	1	-	112
Rural	77	-	1	-	15	3	-	1	-	-	-	-	97
Urban	1	-	-	-	1	-	-	2	-	-	1	-	5
Total	78	-	1	-	16	3	-	3	-	-	1	-	102

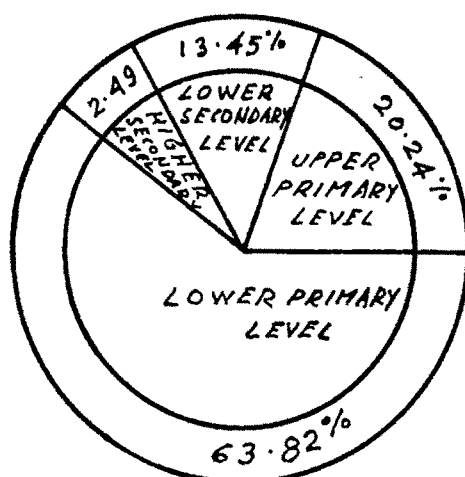
(.....2)

7. SUB-TOTAL FOR NORTH ZONE											
Rural	344	2	4	-	127	25	4	28	2	2	538
Urban	15	-	1	3	2	5	1	12	-	1	40
Total	359	2	5	3	129	30	5	40	2	3	578
6. Tiswadi Taluka											
Rural	66	-	-	-	34	8	2	12	-	-	122
Urban	13	-	1	2	1	5	1	6	-	-	29
Total	79	-	1	2	35	13	3	18	-	-	151
7. Ponda Taluka											
Rural	123	-	-	-	34	1	-	20	3	-	181
Urban	2	-	-	-	-	1	1	-	-	-	4
Total	125	-	-	-	34	2	1	20	3	-	185
8. Sanquém Taluka											
Rural	91	-	-	-	14	2	2	6	1	-	116
Urban	4	-	-	-	-	1	-	1	-	-	6
Total	95	-	-	-	14	3	2	7	1	-	122
9. SUB-TOTAL FOR CENTRAL ZONE											
Rural	280	-	-	-	82	11	4	38	4	-	419
Urban	19	-	1	2	1	7	2	7	-	-	39
Total	299	-	1	2	83	18	6	45	4	-	458
10. Mormugao Taluka											
Rural	24	-	-	-	12	3	1	-	-	-	40
Urban	9	-	-	1	6	5	-	4	-	-	25
Total	33	-	-	1	18	8	1	4	-	-	65
										271	

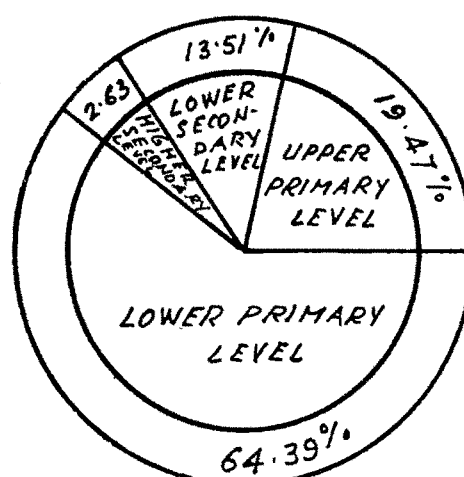
(.....3)

PERCENTAGE DISTRIBUTION OF SCHOOLS AT DIFFERENT
LEVELS OF SCHOOL EDUCATION AS PROPOSED IN THE
PERSPECTIVE PLAN

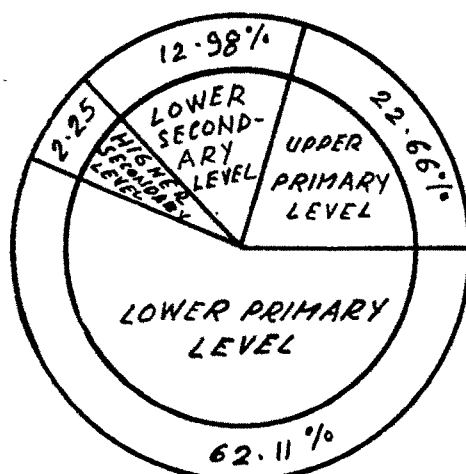
(a) AT ALL-GOIA LEVEL



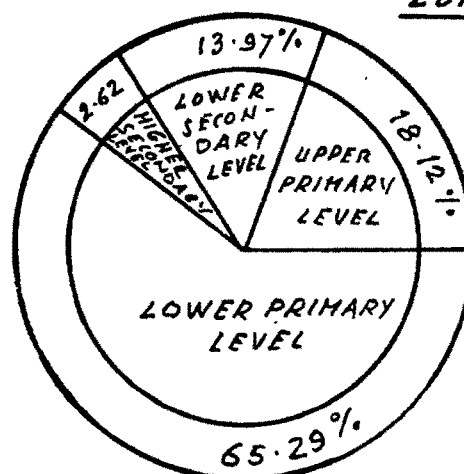
(b) FOR SOUTH EDUCATIONAL ZONE



(c) FOR NORTH EDUCATIONAL ZONE



(d) FOR CENTRAL EDUCATIONAL
ZONE



Plan' for 367 lower primary schools, representing 64.39% of the total number of schools in the zone, 111 upper primary schools, representing 19.47%, 77 lower secondary schools, representing 13.51% and 15 higher secondary schools representing 2.63% of the total, as illustrated in Figure 37(b).

The North Educational Zone, has a provision for 359 lower primary schools, representing 62.11% of the total number of schools in the zone, 131 upper primary schools representing 22.66%, 75 lower secondary schools representing 12.98% and 13 higher secondary schools, representing 2.25% of the total, as illustrated in Figure 37(c).

The Central Educational Zone has a provision in the 'Perspective Plan' for 299 Lower primary schools representing 65.29% of the total number of schools in the zone, 83 upper primary schools representing 18.12%, 64 lower secondary schools representing 13.97% and 12 higher secondary schools, representing 2.62% of the total, as illustrated in Fig.37(d).

Comparative figures for zonal distribution of schools and sections by stage and level of school education as referred in the 'Perspective Plan' are also given in Table LVII. A close study of the figures indicates that the school facilities proposed in the 'Perspective Plan' are

TABLE - LVII
Zonal distribution of Schools/Sections by Stage and Level and also Ratio of Upper Primary Level to Lower Primary Level and Higher Secondary Level to Lower Secondary Level for Goa as indicated in the Perspective Plan

Sr. No.	Educational Zone	I t e m s	Number of Schools/Sections by Stage and Level					
			Primary Stage Level		Secondary Stage Level		Ratio of Higher Level to lower level	
			Lower No. of Schools/Sections	Upper No. of Schools/Sections	Ratio of Upper level to Lower level	Lower No. of Schools/Sections	Upper No. of Schools/Sections	
1	North	i) Schools ii) Sections	359 523	131 208	1 : 3 1 : 3	75 85	13 13	1 : 6 1 : 7
2	Central	i) Schools ii) Sections	299 406	83 156	1 : 3 1 : 3	64 74	12 12	1 : 5 1 : 6
3	South	i) Schools ii) Sections	367 533	111 198	1 : 3 1 : 3	77 87	15 15	1 : 5 1 : 6
4	All Zones of Goa	i) Schools ii) Sections	1025 1462	325 562	1 : 3 1 : 3	216 246	40 40	1 : 5 1 : 6











almost evenly balanced and proportionately distributed in the three educational zones of Goa with regard to the schools as well as in respect of the school sections.

It should also be observed that the ratio of 1 : 3 recommended by the Education Commission of 1964-66 in respect of upper primary schools to lower primary schools appears to be clearly maintained in the 'Perspective Plan' in all the educational zones of Goa as well as at the All-Goa level .

In view of the fact that there are good many indicators to show that the school facilities proposed in the 'Perspective Plan' are fairly well balanced and proportionately distributed according to the needs of the population of Goa, the next and final step was to prepare an educational map for the whole of Goa and mark therein the location of schools for different stages of school education as proposed in the 'Perspective Plan', and indicated in Figure 38.

REFERENCE KEY TO EDUCATIONAL MAPS
in Figure No.32,33,34 and 38

1. School Symbols and Abbreviations

- | | | |
|-------|---|---|
| i) | Lower Primary - LP - |  |
| ii) | Upper Primary - UP - |  |
| iii) | Lower Secondary - LS - |  |
| iv) | Higher Secondary - HS - |  |
| v) | Lower Primary with Upper Primary -
(LP + UP) |  |
| vi) | Lower and Upper Primary with Lower
Secondary - (LP + UP + LS) |  |
| vii) | Lower and Upper Primary with Lower
and Higher Secondary - (LP + UP +
LS + HS) |  |
| viii) | Upper Primary with Lower Secondary -
LP + LS |  |
| ix) | Upper Primary with Lower and Higher
Secondary - (UP + LS + HS) |  |
| x) | Lower and Higher Secondary -(LS+HS) |  |

2. Reference Numbers

- i) Each Taluka in the Three Educational Zones of Goa is represented by an encircle number
- ii) Every village in each Taluka of Goa is represented by a number
- iii) A number accompanying a school symbol represents quantity.



3. Names of Educational Zones, Talukas and Villages

(i) North Educational Zone - Four Talukas

(1) PERNEM TALUKA - 18 villages

1. Khajanem - Amarcem - Poroscodem;
2. Tamborsem;
3. Torse;
4. Varkand Nagazar;
5. Kasarwanen; Ozari - Chande;
6. Halaran;
7. Ibrampur;
8. Dhargal;
9. Virnoda;
10. Tuem;
11. Parsem;
12. Agarwada - Chopadem;
13. Moraji;
14. Mandrem;
15. Harmal;
16. Keri - Terchol;
17. Palije;
18. Korgao

(2) BARDEZ TALUKA - 30 villages

1. Camorlim;
2. Colvale;
3. Nadna - Revora;
4. Pirna;
5. Tivim-Seigal;
6. Assonora;

7. Aldona;
8. Moira-Nachinola;
9. Pomburpha - Olavalim;
10. Soccon;
11. Salvador do Mundo;
12. Penha de franca;
13. Pilern-Maina;
14. Nerul;
15. Reis-Magos;
16. Candolim;
17. Calangute;
18. Saligao;
19. Sangolda;
20. Guirim;
21. Uka-Pol-Ponela;
22. Bastora;
23. Verla-Canca;
24. Parra;
25. Arpora-Nagua;
26. Anjuna;
27. Assagao;
28. Siolim-Sodaem;
29. Oxel;
30. Siolim-Marna

(3) BICHOLIM TALUKA - 16 Villages

1. Latambarsem;
2. Sal;
3. Menkurem;
4. Advalpale;
5. Mulgao-Sirigao;
6. Mayem-Vaiguinem;

7. Naroa;
8. Piligao;
9. Amona;
10. Naveli;
11. Pali-Kothambi
12. Surla-Velguem;
13. Kudnem;
14. Sankhalim-Harwalem-Virdi;
15. Karapur-Sarwan;
16. Maulingnem.

(4) SATARI TALUKA - 11 Villages

1. Mauzi;
2. Nagargao;
3. Dongurli;
4. Querim;
5. Pariem;
6. Honda;
7. Pissurlem;
8. Birodem;
9. Guleli;
10. Khotode;
11. Sanvarden.

(ii) Central Educational Zone - Three Talukas

(5) Tiswadi Taluka - 18 Villages

1. Goltim-Navelim;
2. S. Matias;
3. Sto. Stevao;
4. Kumbarjua;
5. Se Old Goa;
6. Corlim;

7. Carambolim;
8. Azossim-Mandur-Neura;
9. STO-Lourenco;
10. Sto. Andre;
11. Batim;
12. Curca;
13. Siridao;
14. Taleigao;
15. Sta. Cruz;
16. Mercedes;
17. Chimbél;
18. Madel-Chorao.

(6) PONDA TALUKA - 19 Villages

1. Kurti-Kandepar;
2. Verem-Vagushem;
3. Volvoi;
4. Betki-Kawdola;
5. Tivim-Orgao;
6. Bhoma-Adeolna;
7. Kerim;
8. Velling-Priol-Cuncolim;
9. Kundai;
10. Madkai;
11. Bandora;
12. Durbhat;
13. Queula;
14. Vadi-Talaulim;
15. Borim;
16. Siroda;
17. Panchwadi;
18. Betora-Niranchal
19. Usgao-Gaugem.

(7) SANGUEM TALUKA - 11 Villages

1. Collem;
2. Sancorda;
3. Darbandoda;
4. Dabal;
5. Sawarde;
6. Kalay;
7. Uguem;
8. Bhati;
9. Kurdi;
10. Rivona;
11. Netravali.

(iii) South Educational Zone - Four Talukas

(8) MORMUGAO TALUKA - 5 Villages

1. Chicalim-Bogamalo;
2. Sancoale;
3. Cortalim-Quellosi;
4. Cansaulim;
5. Velcao-Pale.

(9) SALCETE TALUKA - 29 Villages

1. Navelim;
2. Varca-Orlim;
3. Carmona;
4. Cavelossim;
5. Velim;
6. Ambelim;
7. Cuncolim;
8. Assolna;
9. Chinchinim;
10. Sarzora;

11. Paroda;
12. Dramapur-Sirlim;
13. Davorlim-Dicarpale
14. Sao-Jose De Areal;
15. Curtorim;
16. Chandor-Cavorim;
17. Guirdolim;
18. Macasana;
19. Raia-Rachol;
20. Camurlim;
21. Loutolim;
22. Verna-Nagoa;
23. Nuvem;;
24. Majorda-Galata-Utorda;
25. Betalbatim;
26. Seraulim;
27. Colva;
28. Cona-Benaulim;
29. Aquem-Baixo.

(10) QUEPEM TALUKA - 14 Villages

1. Sirvai;
2. Malkarnem;
3. Kakoda;
4. Curchorem;
5. Asulda;
6. Xeldem-Amona;
7. Avdem-Kothambi-Chaufi;
8. Deao;
9. Ambalim;
10. Balli-Adonem-Bendurdem-Tilol-Khaddem;
11. Fatorpa;

12. Naqueri;
13. Barshem-Khaddem;
14. Kawrem.

(11) CANACONA TALUKA - 8 Villages

1. Cola;
 2. Agonda;
 3. Nagarse - Palolem;
 4. Canacona;
 5. Gaundagrem;
 6. Cotigao;
 7. Loliem-Polem;
 8. Poniguinem.
-

EDUCATIONAL MAP OF GOA SHOWING THE LOCATION
OF SCHOOLS FOR DIFFERENT STAGES OF EDUCATION
PROPOSED IN THE PERSPECTIVE PLAN IN TERMS OF THE
ESTABLISHED CRITERIA AND EDUCATIONAL NEEDS OF
EVERY VILLAGE & TOWN IN EACH TALUKA OF GOA



