



# **The Development of Senior Secondary and Tertiary Education**

**(RETYPE DOCUMENT)**

**October 1978**

THE DEVELOPMENT OF  
SENIOR SECONDARY AND  
TERTIARY EDUCATION

OCTOBER 1978

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## Chapter 1 : Introduction

1.1 During the past two decades, the Government's main priority, in the development of education in Hong Kong, has been the progressive extension of the period of universal education. The first aim was to make primary education available to all. The White Paper of 1965<sup>1</sup> outlined a scheme for providing subsidised primary school places for all who want them. By 1971 there were sufficient primary school places for all children in the age-group; measures were then taken to make primary education free and compulsory. The main proposal in the 1974 White Paper<sup>2</sup> was to extend universal education to the junior secondary forms. From 1978, all primary school leavers will be offered three years of junior secondary education and tuition fees will be abolished in junior secondary forms in all schools in the public sector. The Director of Education's powers to enforce school attendance will be extended progressively until they cover children up to their fifteenth birthday who have not yet completed Form III.

1.2 Thus, every Hong Kong child will have nine years of basic education. This will be universal, free and compulsory and will extend to his 15th birthday or completion of Form III. This will enable a child to remain in school until he has attained an appropriate age for entering industrial or general employment. Beyond this stage, education will remain voluntary and will take diverse forms, to reflect the different aptitudes and inclinations of students and their wish to study full-time or on a part-time basis, in conjunction with employment. Some kind of selection is necessary, as most of the courses available assume some level of previous attainment and are pitched at a standard which not all students can meet. Therefore places on these courses should be provided only for a proportion of the population. It is not the intention to extend free education beyond the basic nine years, though fee remission or grant and loan schemes will protect those who would otherwise face financial hardship.

1.3 The priority given to primary and junior secondary education has had the advantage of enabling tangible results to be achieved in a relatively short period of time, though there have been disadvantages. The expansion of subsidised primary education at a faster pace than secondary education has enabled most of the younger generation in Hong Kong to receive a basic education and to master essential skills of literacy and numeracy, but it led to severe competition for secondary school places in the public sector, which has exerted an unhealthy influence on primary school teaching. Furthermore, by concentrating resources on the quantitative expansion of education, less has been available for qualitative improvements.

1.4 The current review of senior secondary and tertiary education has attempted to remedy some of these defects. By putting forward measures for the quantitative expansion of all stages of education beyond the basic course, it aims to reduce the competition for places among suitable students. It makes proposals also for qualitative development.

1.5 The proposals in this White Paper will do much to raise the standard of that part of the education service within its purview. Some of them, in particular the improved courses of teacher training and the greater range of opportunities for extended education, with the resulting increase in the numbers of well-educated young people, should have beneficial effects on education as a whole. Yet no statement of policy should seek to impose a fixed pattern on future development. Education policy must be subject to a continuous process of review and be receptive to new ideas. The Government has therefore agreed, in response to a suggestion from the Board of Education, to initiate as a longer-term development an overall review of the education system. This review will be conducted by a mixed group of local residents and overseas experts. Its main aim will be to consider the inter-relationship of each part of the education service and the effectiveness of its contribution.

1 *Education policy*

2 *Secondary Education in Hong Kong over the Next Decade*

1.6 The Green Paper<sup>1</sup> published in November 1977 put forward proposals on the development programme for education beyond the basic nine-year course, in the period up to 1986. The discussions which ensued were extensive and thorough:-

- senior officers from the Education Department participated in a series of meetings arranged by the Home Affairs Department with community leaders to explain the proposals;
- a summary leaflet in Chinese was distributed through public libraries, city district offices etc.;
- educational bodies and the public at large were invited to comment on the proposals in the Green Paper; their comments and views expressed in articles in the press were considered and discussed within the Government;
- the Secretary for Social Services held discussions on the Green Paper with representatives of the main tertiary institutions;
- a team from the Home Affairs Department and the University of Hong Kong supervised a survey of the opinions of teachers and school principals, students, parents and employers on aspects of the Green Paper;
- an expert from the University of London Institute of Education made a three-week visit to Hong Kong in February and March 1978 to advise on various aspects of educational planning, in particular the social and economic implications;
- the Green Paper was the subject of a debate in the Legislative Council during July and August 1978.

*1 Senior secondary and tertiary education: a development programme for Hong Kong over the next decade*



## Chapter 2 : Principal targets and decisions

2.1 The principal measures described in succeeding chapters are: -

- subsidised places in senior secondary forms (Forms IV-V), in technical institutes and adult education centres, to be expanded to the full extent of demand from suitable students by the early 1980s;
- subsidised sixth-form places to be made available for up to one-third of students entering subsidised Form IV places two years previously, provided that the schools consider them to be suited academically to the demands of a sixth-form course;
- private non-profit-making schools which are suitable and willing to be brought by stages within the full scheme of assistance provided under a common Code of Aid;
- the curriculum to be broadened, with greater emphasis on practical and technical subjects, and improved facilities and support services to be provided;
- an improved scheme of teacher training;
- ordinary technician and equivalent commercial programmes to be expanded through the technical institutes, thus enabling the Polytechnic to concentrate on programmes at the higher technician and technologist levels;
- the approved expansion programmes for sixth-form and tertiary education to be achieved partly through the post-secondary colleges, to which assistance will be provided in respect of places on two-year courses at sixth-form level and on subsequent two-year courses directed towards professional and vocational qualifications;
- the number of students taking degree courses to be increased, by an expansion of the two universities, by the introduction of part-time internal degrees at the universities and, subject to the advice of the University and Polytechnic Grants Committee (UPGC), by a limited degree programme at the Polytechnic;
- improvements to be made to the Education Department's adult education courses and assistance provided to selected adult education projects run by voluntary agencies.

2.2 It must, however, be realized that as noted in Appendix 2, the financial cost of implementation of these measures is high. Accordingly, the timing of their fulfilment will be subject to a regular review of the overall resources available to the Government and of the share of them which properly can be made available for senior secondary and tertiary education.

### **Chapter 3 : The broad approach in educational planning**

3.1 The Government expressed the aim in the Green Paper of providing a range of opportunities, mainly in senior secondary forms, technical institutes and adult education centres, for students wishing to continue their education on a subsidised basis after completing Form III. It noted that the present curriculum in senior secondary forms is not suited to the aptitude and inclinations of all students in the age range and that most of those who are likely to complete successfully an academic course leading to an examination such as the Certificate of Education Examination are within the top 40% of the ability spectrum. Such considerations influenced the proposed rate of provision of subsidised senior secondary places.

3.2 While these remain important considerations which must influence planning, other factors should also be taken into account. First, the Government does not wish the new central arrangements for selection and allocation at Form III to constitute a major hurdle for students in the junior secondary forms. The selection process ought if possible to become a guide to the school and the student on the most suitable avenue for his continued education. Second, the raising of private non-profit-making schools to fully-aided status, as discussed in Chapter 5, provides a suitable opportunity to provide a higher proportion of senior secondary places. In view of these considerations, the Government will seek to increase the number of subsidised senior secondary places beyond the target proposed in the Green Paper. Details of the new expansion programme are given in Chapter 4.

3.3 In formulating proposals on the rate of expansion of publicly-provided or subvented places in tertiary education (i.e. all types of post-school education for which completion of at least five years of secondary education is normally required), the Green Paper attempted to reconcile the following factors:-

- (i) student demand for tertiary education;
- (ii) the proportion of students capable of meeting the academic standards which the courses require;
- (iii) the likely manpower demand for persons of a good general education or with special qualifications, and the capacity of the economy to provide satisfactory and rewarding employment for such highly-educated people.

3.4 While it is desirable that the Government should help people to realise their educational goals, the latter are partly influenced by the student's ambitions for his own career. A study of the relationship between educational attainment and subsequent earnings for the working population as a whole, using data from the 1976 By-census, has indicated that a higher level of educational attainment improves a student's prospects of higher earnings substantially. This feature in part explains the preference of many young people for continuing in full-time academic study rather than for starting work. On the other hand, the overproduction of graduates who have no chance of following careers appropriate to their skills and attainments causes social problems which are all too evident in many overseas countries.

3.5 A further factor to be taken into account is that at present many Hong Kong students obtain higher education overseas, but these openings may not always be available. It is necessary to ensure that adequate educational opportunities are available within the local community.



3.6 Having regard to these considerations, the following guidelines for future action have been formulated:-

- (i) Adequate numbers of qualified people should be available to meet the needs of the diversified, technologically-sophisticated industries that Hong Kong hopes to attract. Furthermore, a relative increase in their numbers could encourage graduates to accept employment in jobs which, though less remunerative, are socially beneficial.
- (ii) A reasonable share of the cost of extended education should be met through fees, coupled with satisfactory arrangements to provide relief to students from less affluent families.
- (iii) Opportunities must be developed for part-time day education, in conjunction with employment, as an alternative to full-time academic study. To avoid a shortage of able young people entering craft apprenticeships in industry, employers will have to be more willing to release employees for day-time courses of technical education and to make their terms of service more attractive, as compared with those of non-technical employees. Recruitment and remuneration policies should take account of factors other than possession of a certificate or completion of a course: tests of skill proficiency, open to all, would increase the value of demonstrated competence.
- (iv) In view of the uncertainty about future job opportunities, courses should be flexible, capable of leading to various kinds of further study and career openings rather than be relevant only to a narrow range of jobs.
- (v) A range of tertiary education courses should be developed for Form V leavers, as well as Form VI leavers.
- (vi) The content and quality of education should be such as would promote greater adaptability, proficiency in a wide range of technical skills, broad perspectives, and the capacity to think logically and to communicate effectively.

## Chapter 4 : The expansion programme for post-Form III education

4.1 The Government will expand the number of places available in schools, technical institutes and adult education centres for Form III leavers on a subsidised basis. The aim will be to meet during the early 1980's the full demand from students who are suitable for the kind of courses which the schools or other institutions provide.

### *Senior secondary forms*

4.2 The programme for senior secondary places (Forms IV-V) described in the Green Paper was designed to provide for 50% of the 15 year-old population by 1981. (Students allocated junior secondary places in 1978, under the new arrangements that have replaced the Secondary Schools Entrance Examination (SSEE), will complete Form III in 1981.) Due to the continuing decline in the size of the 15-year old population, which will be reduced by more than 30% in the decade 1977-86, the places available in 1981 would provide for about 63% of the population in 1986.

4.3 The Government will seek to increase the number of subsidised senior secondary places beyond the target proposed in the Green Paper. It is now the intention to increase the number of subsidised school places for Form III leavers, which was less than 21,000 in the 1977-78 school year, to about 57,000. This target would provide for about 60% of the 15 year-old population<sup>1</sup> in September 1981 and over 70% by September 1986. Details of the build-up of places are given in Appendix 1.

4.4 These additional places will be created primarily through the school building programme. As noted in the Green Paper, 102 new secondary schools, including converted primary schools, will have been completed by 1981. It is also planned to build extensions to some existing schools, so that more Form IV-V classes can be provided. Moreover, Form IV-V classes will be introduced in secondary modern schools, which have hitherto offered only junior secondary classes, to bring them into line with the class structure in standard schools.

4.5 To increase the number of subsidised senior secondary places further, places will be bought in private non-profit-making schools, where hitherto only junior secondary places have been bought. (Changes are also envisaged in the future financial arrangements for these schools, as described in Chapter 5.) Some existing private independent schools may also be included within the scheme of public-sector support, provided that they adopt non-profit-making status, that their facilities and operating standards are satisfactory and that their places are required to meet approved targets.

4.6 The class structure of schools will be altered to provide more senior secondary places. Some of the schools in the building programme were planned as asymmetrical schools, providing eight class streams in Forms I-III and only two class streams in Forms IV-V. Advantage will be taken of the decline in the size of the junior secondary population to reduce the number of junior secondary streams in these and other private non-profit-making schools to six, thus enabling the number of senior secondary streams to be increased to four. Most of the existing fully-aided grammar and technical schools will, after the full implementation of flotation, contain six junior secondary class streams and four senior secondary streams, which will remain the basic structure for the majority of secondary schools in Hong Kong. However, since the approved new system of allocation to Form I is based on ability and parental choice, some schools will attract a higher proportion of the ablest students. Accordingly, the Director of Education will select certain schools to develop a fully symmetrical structure of five streams throughout Forms I-V. He will base his

1 This estimate is based on the latest population projections which forecast a 15-year old population of 95,450 in 1981 and 77,290 in 1986

choice on those schools which attract the greatest number of able students in the new secondary school allocation arrangements, so as to minimize transfers between schools after Form III.

4.7 There will be some restructuring of pre-vocational schools, to enable a limited number of senior secondary streams to be started for students capable of becoming technicians. Most students from prevocational schools are expected, upon completing Form III, to continue to enter craft-level courses in technical institutes.

4.8 Flotation is designed to achieve a more intensive use of teaching facilities by providing more classes than classrooms in a school, with special rooms being used as form bases. The Government considers that flotation represents an efficient use of school accommodation, without any sacrifice in quality, and the system will be used in all types of class structure described in the preceding paragraphs. Extended day, an arrangement whereby classes are staggered throughout the day, enables flotation to be practised without loss of practical facilities. It has proved unpopular with schools because it is cumbersome to administer, and the Government does not intend to require schools to continue with it, as laboratory and workshop facilities can be provided through the alternative means described in Chapter 5.

4.9 Finally, the Director of Education may open a limited number of extra Form IV classes in some new schools, using accommodation which will be spare until the junior secondary streams have been fully developed.

4.10 Part of the 15 year-old population will be in subsidised places in other types of schools, such as special schools, English-speaking schools and certain special institutions such as the Police Cadet School. There are approved expansion schemes covering all these forms of education.

4.11 The number of subsidised senior secondary places available in 1981 may be sufficient to meet the full demand from students for whom a senior secondary course is suitable and who wish to remain in full-time school education, rather than to pursue other alternatives. If any shortfall should remain, this will be met in subsequent years as the population in the age-group continues to fall. The building programme will continue between 1981 and 1986 only insofar as is necessary to make up the loss in junior secondary places resulting from the restructuring of classes and the opening of special classes. For this purpose, in addition to the 102 new secondary schools already in the building programme, nine prevocational schools and five standard schools may be required, mainly in the developing New Towns, thus raising the number of new schools in the programme to 116.

4.12 While the Government's aim will be to meet the full demand from suitable students for subsidised senior secondary education, it is important that available provision does not run ahead of this demand. The sizeable surplus of primary places arose because of the need to meet a local demand, in addition to demand throughout the territory as a whole. While the school building programme has been designed to place new secondary schools in areas of population growth, additional schools will not be built purely to meet a local need, if there is spare capacity in subsidised secondary schools elsewhere. If a surplus of senior secondary places should develop within the approved class size of 40, some of the schools that have been allowed to develop a fully symmetrical structure will be required to revert to a structure providing six junior secondary streams and four senior secondary streams. This would create additional Form I-III places to meet the increase in the 12-14 year-old population, which will begin in 1983, and thus reduce the requirement for new school building. An improved distribution of schools will be achieved through re-provisioning schools from the existing urban areas into new areas of population growth.

4.13 The achievement of major policy targets within available resources depends on the Director of Education's ability to prescribe the structure and size of classes within public-sector

schools. In the revised Code of Aid that is currently in preparation, the necessary controls over these aspects of aided schools' organisation will be more clearly defined.

#### *Technical institutes*

4.14 Capacity for 12,700 places on first-year courses at the post-Form III level will be provided in technical institutes by 1981. The Government will proceed also with the sixth technical institute at Tuen Mun, which is expected to be required by 1984 to meet the needs of the growing population and industry in this area. Upon completion of this new institute, there will be total capacity on craft-level courses for about 15,000 Form III leavers. Various modes of attendance will be available to meet the different needs of students.

#### *Adult education centres*

4.15 Those who choose to take senior secondary courses by evening study at adult education centres will be enabled to do so. The capacity of these centres will be expanded or contracted in accordance with demand.

#### *Selection and allocation*

4.16 The Director of Education has already announced the introduction by 1981 of a centralised system of selection and allocation for Form III leavers who wish to continue their education in schools or technical institutes in the public sector. These arrangements have been designed to minimise transfers between schools and to rely on internal assessments rather than on a public examination. A review will be conducted by 1983 to assess the effectiveness of these arrangements.

#### *Post-Form III education for disabled students*

4.17 Specific measures will be taken, upon the advice of the Rehabilitation Development Co-ordinating Committee, to enable suitable disabled students to continue their education at the post-Form III level and beyond. Some will be integrated into technical institutes or ordinary senior secondary classes. The Tuen Mun Technical Institute, like that at Kowloon Tong, will provide special facilities for them. Other disabled students will require a modified curriculum in a special school or vocational training centre.

#### *Fees*

4.18 As has already been noted, it is not the Government's intention to extend free and compulsory education beyond the junior secondary stage. The Government believes that those who choose to take their education to higher levels, with the prospect of better opportunities for development and advancement, should meet a reasonable share of the cost. The fee remission scheme will ensure that no student is prevented from continuing his education in the public sector on account of an inability to pay fees.

4.19 The Government considers that the standard fee in senior secondary forms should be adjusted to a more realistic level, thereby reducing the greatly increased burden on public funds which the expansion programme will bring. The last increase in secondary school fees was in 1965, following proposals in the White Paper on Education Policy. Since then, the average annual cost of a place in Forms IV-V in an aided school has risen from under \$800 to about \$3100. Moreover, the present shortage of senior secondary places in the public sector has meant that many students wanting a senior secondary education have had to attend private schools where fees may be high and where no fee assistance is available from the Government. The secondary

school expansion programme described in this Chapter will enable many more students to have a senior secondary education in the public sector, where fees are lower and where fee remission arrangements are available.

4.20 The standard fee in Forms IV-V will be increased by two stages to \$600 per annum and the standard fee in Form VI will be increased by two stages to \$800 per annum; these increases will begin in September 1979. At the same time, non-standard secondary school fees (which apply mainly to schools in the New Territories) will be aligned by four stages with standard fees. Most secondary schools in the New Territories are located in the main urban areas. The Director of Education believes that the Government and aided secondary schools in the New Territories are of equal standard to those in Hong Kong and Kowloon, and it is his aim to maintain this equality. Accordingly, a lower level of fees in schools in the New Territories is no longer justified.

4.21 The levels of standard and non-standard school fees will thus be:-

	<i>Annual school fees per school year (\$)</i>				
	<i>1978-79</i>	<i>1979-</i>	<i>1980-</i>	<i>1981-</i>	<i>1982-</i>
		<i>80</i>	<i>81</i>	<i>82</i>	<i>83</i>
Forms IV-V					
Standard fee	400	500	600	600	600
Non-standard fee	200	300	400	500	600
Form VI					
Standard fee	450	620	800	800	800
Non-standard fee	220	330	450	620	800

## Chapter 5 : Improving the quality of secondary education

5.1 The Government attaches considerable importance to improving the quality of secondary education. The Government's responsibility extends mainly to providing adequate resources for accommodation, for the employment of trained teachers and other professional staff, for the use of teaching aids, and for the promotion of pre-service and in-service training schemes. The Education Department's Advisory Inspectorate guides schools on how their curriculum and teaching methods might be improved.

5.2 By improving the quality of education, the Government seeks to enable schools to realize more satisfactorily their prime functions, which might be summarised as being to help children to acquire:-

- (i) a lively interest in the world around them and an ability to think for themselves and make decisions;
- (ii) a sense of moral and social values, including respect for others and their views and beliefs;
- (iii) competence in the basic skills of literacy and numeracy;
- (iv) an appreciation of the world's cultural heritage, in particular that of their own community;
- (v) a realisation of Hong Kong's place in the world and its inter-dependence on other parts of the world;
- (vi) a basis of mathematical, scientific and technical knowledge and skills to prepare them for the fast-changing, highly technological society in which they will live and work;
- (vii) a knowledge, through a school-based guidance system, of the career opportunities available to them.

5.3 Qualitative and quantitative aspects are inter-related. The school building programme will not only increase the numbers receiving secondary education but will enable more students to take their education in schools located in the new population centres. These schools will be provided with purpose-built accommodation, sufficient laboratory and workshop facilities and the resources to employ trained teachers.

5.4 One of the unsatisfactory features of the existing secondary school structure is that there are too many different types of school, with different financial arrangements applicable to each. The Government's aim is to develop a simplified structure with more uniform financial assistance. Some progress towards this goal has already been made. The conversion of 36 assisted private schools to fully-aided status was completed in September 1978. As mentioned in Chapter 4, it is proposed to convert the three-year secondary modern schools so that they will provide senior secondary as well as junior secondary courses. The Government will not extend the bought-place scheme to senior secondary forms in private independent schools and will terminate the buying of junior secondary places in schools of this type which do not have good facilities and operating standards.

5.5 The Government proposes to raise to fully-aided status those private non-profit-making schools which are suitable and willing. It is intended to introduce this scheme to existing private non-profit-making schools in four stages, beginning in September 1979. All new schools

which are scheduled to open in or after September 1979 will be established on a fully-aided basis from the outset.

5.6 As the private non-profit-making schools are brought under the Code of Aid, their class size in senior secondary forms will be reduced to a maximum of 40, as in other aided schools. The shortage of trained graduate teachers will prevent any further lowering of the maximum class size for some years hence, though this will be a goal for the mid-1980's.

5.7 As a result of these measures to simplify the secondary school system, there will be three main types of school:-

- (i) Government schools;
- (ii) schools financed under the Code of Aid;
- (iii) private schools operating without any Government grant (including those schools of acceptable standard where Government will continue to buy junior secondary places).

The 1965 White Paper laid down the policy that the Government should provide schools only where an aided school cannot be provided. Accordingly, very few new Government secondary schools have been built in the developing areas. In view of the replacement of the Secondary School Entrance Examination by new allocation arrangements based on district "nets", and as the popularity of Government secondary schools has not waned, it is desirable that the option of secondary education in a Government school should be available in each main area. Accordingly, the 1965 White Paper policy will be modified so that henceforth there will be, within the approved expansion programme, a wider geographical distribution of Government secondary schools. The planned building programme will be modified to include new Government secondary schools at Tuen Mun, Taipo and Shun Lee Tsuen in East Kowloon, in addition to the Government schools already planned for Yuen Long and Lantau.

5.8 The Green Paper expressed the Government's aim to promote good curriculum design. This was seen as requiring a broader curriculum in Forms IV-V which would provide for as many students as possible, as well as studying languages, science and social studies, to take at least one practical or technical subject, such as Art and Design, Ceramics, Design and Technology, Home Economics, Dressmaking and Commerce. The Government does not intend to depart from the present practice of leaving decisions on the curriculum to the schools themselves, but will encourage schools to offer practical and technical subjects by providing the necessary resources. In order to enable a strong element of practical and technical subjects to be introduced in Forms IV-V, as well as in Forms I-III, practical rooms will be provided wherever there is spare accommodation or scope for extensions. In addition the Government proposes to construct centrally-located workshops, the facilities of which would be shared by schools which cannot provide sufficient practical rooms within their own premises. Two central workshops, one on each side of the harbour, are planned for completion by September 1980. The further development of such workshops will be planned as required. These various measures will serve as alternatives to the intensive use of existing laboratory and workshop facilities which extended-day arrangements were intended to provide.

5.9 It is envisaged that most of the new schools will, within a course of general education, make substantial provision for practical and technical subjects, as discussed in the preceding paragraph. Existing secondary technical schools will continue, with improved facilities and a curriculum that is more closely related to modern developments in technology. Some of the schools being built in those New Territories towns which are underprovided with secondary technical schools may likewise specialise in technical subjects, if this is in accordance with the

wishes of the sponsors and the local community. The building of more prevocational schools will increase the number of students who have obtained a good grounding in technical education during their junior secondary years, and the introduction of senior secondary classes into these schools will provide further opportunities for their students to take their technical education to a higher level.

5.10 A broadening of the curriculum will meet the needs of students with a wide range of aptitudes. Moreover, as the expansion programme progresses, new approaches to the teaching of academic subjects within a senior secondary course should be developed to meet the needs of students from the wider ability-range which will then be found within the public sector. It is highly desirable to maintain the present standards of the higher grades (Grades A-E) in the Hong Kong Certificate of Education Examination, which are used in the selection of students for entry to the sixth form and to tertiary education and by Government and industry in the selection of new employees. If these grades were to be pitched at lower ability levels, the examination would no longer be challenging to the abler students and overseas recognition might be affected. The problems of examining students from a wide range of ability, whether by separate examinations pitched at different levels or within a common examination, have been considered for several years by the Schools Council in England and Wales and by an advisory committee in Scotland. The Government will ask the Hong Kong Examinations Authority to consider the most suitable arrangements for Hong Kong, having regard to experience in Britain and elsewhere.

5.11 Various improvements will be made to the support facilities and services available in schools. Particular importance will be attached to developing school libraries as resource centres under the direction of teacher-librarians. The audio-visual facilities available in the Visual Education Centre have improved considerably in recent years; this development will continue, in particular by providing for the local production of resource materials such as teaching kits. The Government's main priority in educational television (ETV) in schools will lie in expanding and improving programmes for the junior secondary curriculum. However, ETV programmes may have a limited application to some aspects of the curriculum for senior secondary forms, and some programmes for the senior secondary curriculum will be prepared, though it is not intended that ETV should be used extensively in teaching at that level.

5.12 In order to provide greater impetus to curriculum innovation, the Education Department will, as a pilot project, establish small working teams of teachers, temporarily seconded from their normal teaching duties in aided and Government schools, to prepare model teaching programmes and supporting materials and, through schemes of in-service training, to familiarise teachers with their use.

5.13 A statement about the Government's programme for the development of Music will be made separately.

#### *Teacher training*

5.14 The Green Paper proposed to improve the quality of non-graduate teachers by extending the pre-service training course to three years, by seeking a higher educational standard among applicants and by introducing a systematic programme of refresher training for serving teachers. Account must also be taken of other objectives, in particular ensuring a regular supply of trained teachers to meet teaching vacancies as they arise and providing basic training for untrained serving teachers.

5.15 After giving further consideration to these proposals in the course of a review of teacher training, the Government has concluded that a three-year course of teacher training may not be necessary for students who have already obtained a good standard of general education.



Accordingly, it has decided to introduce, with effect from September 1980, a three-year course for students who enter a college of education with Certificate of Education qualifications. Students holding at least Grade E at the Advanced Level Examination in two subjects relevant to the main school curriculum may be admitted directly to a two-year college course, provided their language proficiency is adequate. All students who obtain the Teachers' Certificate under the new arrangements will be given the same incremental credit on entry to the teaching profession as applies at present to students completing the extended third year of the college course.

5.16 The Technical Teachers' College will introduce in September 1980 a three-year course for those who will teach technical subjects in schools. Practical experience of industrial applications of technical subjects will be provided as an integral part of the training programme. Mature students with industrial experience and technical qualifications who wish to teach in a technical institute will continue to receive a one-year full-time course of training. The existing two-year part-time training courses for serving teachers in technical institutes will also continue and similar courses for teachers of technical subjects serving in schools will be mounted as the need arises.

5.17 The levels of assistance under the student finance scheme for college of education students will be improved with effect from the 1979-80 academic year. It is proposed that the maximum maintenance grant should be set at \$2000 per annum for full-time students at all stages of their initial training and the interest-free loan be raised to a maximum of \$2400 per annum.

5.18 In-Service Courses of Training for Teachers (I.C.T.T.), which are designed to provide a basic training course for serving non-graduate teachers, will continue but, since demand for the primary courses has been rapidly declining in recent years, courses will be offered after 1979 only when circumstances warrant it. To enable suitable untrained teachers to undergo training, it is not intended to raise the minimum entrance qualifications or to vary the teaching service requirements for entry to any of the I.C.T.T. courses, but the secondary courses will be extended to three years for all entrants in 1980, with a corresponding adjustment of the entry point on the Certificated Masters/Mistresses scale. A wider choice of subjects will be made available in the secondary courses.

5.19 The expansion of senior secondary places will increase substantially the demand for graduate teachers. The Director of Education has recently completed a review of the requirement for graduate teachers arising from the secondary school expansion programme. On the basis of present trends in the proportion of graduates entering teaching, and after allowing for the supply from overseas universities and for those graduates who are expected to come over to the public sector from private schools, he has concluded that sufficient graduates should be available, subject to a class size of 40 being maintained.

5.20 While it is not proposed to make post-graduate training obligatory, measures have been taken which will provide a strong inducement to those graduates who make teaching their permanent career to take a course of teacher training. It has been agreed with the Grant and Subsidised Schools Councils that new graduate entrants to the aided sector should be required to undertake a course of teacher training before they would be eligible for promotion, as is already required in the Government sector. A new scheme comprising a short, intensive full-time element, followed by part-time training in conjunction with teaching employment, has been introduced at the University of Hong Kong, in order to make teacher training more effective and more attractive to graduates. The Chinese University will continue to run both part-time courses and full-time pre-employment courses.

5.21 As proposed in the Green Paper, the Government will introduce regular courses of refresher training for serving teachers who have already taken a course of basic training but who

need a course of further training to up-date their understanding of modern teaching methods. The first courses will be mounted in the colleges of education on a part-time day-release or block-release basis, beginning in September 1980. They will be open to graduate and non-graduate teachers whose course of basic training was completed at least five years ago. Performance on these courses will be assessed and it is hoped that schools will attach importance to a teacher's performance in these and in similar courses when considering his suitability for promotion. In addition, the shorter in-service training courses conducted by the Education Department Inspectorate will continue. These have already been expanded substantially in recent years. Third-year courses for serving secondary school teachers will continue to be available in the colleges, with a wider choice of subjects than at present.

5.22 Allowance for these various training schemes for serving teachers will be made within schools' staffing complement.

5.23 Much attention will be given, in both pre-service and in-service courses, to developing proficiency in language and in improving communication skills. The present policy of leaving to the school authorities decisions on the use of Chinese or English within the school will continue. The drive to improve the standard of Chinese in schools will be intensified. There is also an urgent need to improve standards in English, which is the medium of instruction for about 84% of senior secondary students. It is desirable that all who teach through the medium of English should themselves possess an adequate standard of English and be able to correct erroneous use of the language by their students. An English Language Adviser has been seconded from the British Council to prepare proposals for raising the standards of English within schools and teacher training programmes. He will consider specialised facilities for the training of non-graduate teachers of English, so that a high level of professionalism in English language teaching may be achieved. Arrangements have been made with the British Council for in-service courses in the use of English for teachers who use it as the medium of instruction. In order to improve proficiency in English among graduate students at the university Schools of Education, both universities have been invited to submit proposals to the University and Polytechnic Grants Committee for developing an English Language Unit in each of the Schools of Education.

5.24 The accommodation requirements at the colleges of education have been considered in the course of the review of teacher training. The spare capacity available in the colleges in recent years will be absorbed by the planned increase in new students to meet schools' requirements for additional teachers and by the extended pre-service and refresher training programmes described in this chapter, but the establishment of an additional college will not be necessary.

5.25 The Technical Teachers' College will remain as a separate institution. Its present accommodation in the former Morrison Hill Primary School is not satisfactory, except on a temporary basis, though it will be provided with additional accommodation of a higher standard when it moves into part of the converted Victoria Technical School annex in September 1979. It is intended that permanent premises should be provided for the Technical Teachers' College on a site adjacent to the technical institute now being built at Kowloon Tong. It is hoped that these premises will be available in September 1982.

## **Chapter 6 : The development of sixth-form and tertiary education**

### *Sixth-form education*

6.1 The Government will provide subsidised sixth-form places for up to one third of students entering subsidised Form IV places two years previously, subject to sufficient numbers of suitable students seeking admission. Calculated on this basis, the maximum requirement for subsidised sixth-form places is shown in Appendix 1. In view of the rapid development of Form IV-V places planned, there might be some eventual shortfall if sixth-form level places were to be provided in schools alone. Accordingly, the Government will encourage the development of courses at the sixth-form level in other institutions as well as schools, as discussed later in this chapter.

6.2 Schools should satisfy themselves that students to be admitted to a sixth-form course are capable of meeting the requisite academic standard. In this connection, Principals of Anglo-Chinese schools should have regard to the present requirement that school candidates for the Advanced Level Examination of the University of Hong Kong should have obtained, at one sitting of the Certificate of Education Examination, at least Grade C in two subjects and Grade E in four other subjects or, alternatively, Grade C in four subjects and Grade E in one other subject, including English. It is desirable that sixth-form students should have exceeded these minimum requirements except where there are extenuating circumstances.

6.3 Not all students who complete a sixth-form course will be able to proceed to higher education, but a well-designed course of sixth-form education should still be beneficial to them. There has been dissatisfaction with the present sixth-form examination arrangements and their impact on the curriculum. The Board of Education has therefore appointed a Committee on Sixth Form Education with terms of reference

"Having regard to the overall needs of both sixth-form leavers who enter higher education and those who do not, to consider and recommend to the Board of Education how the sixth-form curriculum should be broadened."

The Committee is expected to complete its work by March 1979. The Government will give further consideration to possible changes in sixth-form education after receiving the Committee's report and the Board of Education's recommendations thereon.

6.4 Since 1945 there has been a steady decline in the proportion of the senior secondary population in Chinese Middle Schools, which now amounts to only about 16%. In case the lack of a two-year sixth-form course might be a contributing factor in this decline, those Chinese Middle Schools which wish to offer a two-year course will be assisted to do so.

### *Tertiary education*

6.5 The Government recognises the importance of striking a proper balance between courses at different levels, so that the structure of education can meet the range of employment opportunities and the aptitudes of the students.

6.6 After the approved target for the current triennium of 10,330 students in 1980-81 has been achieved, it is proposed that the combined undergraduate population at the two universities should grow at 3% annually. On this basis, the university student body would be more than 12,000 by the mid-1980's. The Government will consider during the 1980's whether this growth rate should be changed, having regard to the demand from well-qualified students for entry to local universities, to the opportunities available overseas and to the employment prospects of graduates.

6.7 The Government will adopt other measures designed to increase further the number of students on degree courses. First, the Government will ask the universities to prepare proposals for part-time degree courses, designed mainly for mature students. The time of introduction and the number of students to be enrolled will be decided when the costs have been estimated but the Government hopes to establish by the mid-1980's a combined total at both universities of about 1,000 students on these courses.

6.8 The Polytechnic will be invited to advise whether a limited degree programme would be a desirable development and, if so, to prepare proposals. The Polytechnic will be asked to advise also on the most suitable arrangements for validation of any such degree awards. These proposals will be considered by the UPGC before final decisions are taken by the Government.

6.9 By the early 1980's, when its present expansion programme has been completed, the Polytechnic will accommodate about 12,000 full-time and equivalent part-time students (providing for a total student body of nearly 30,000 according to the present student mix). Its main premises at Hung Hom do not allow for much further expansion and its population will be held stable at about this level, so that overcrowding does not occur. The Government will provide for the continued expansion of technician and commercial education by enabling the Polytechnic to concentrate a greater proportion of its work at the Higher Diploma and Higher Certificate levels, and by providing for some of its present ordinary Diploma and Certificate courses to be taken over by the technical institutes, though a substantial proportion of the Polytechnic's work will remain at the ordinary Diploma and Certificate level.

6.10 There will be six technical institutes with the completion of the institutes at Kowloon Tong and Tuen Mun; all are located in major centres of population and industry. While their prime function will remain the provision of craft-level courses and it is intended that their craft-level enrolments should reach the 33,000 envisaged in the Green Paper, all the institutes are capable of further expansion quite rapidly, through the building of extra storeys or annexes, to meet additional demand at the technician level. The technical institutes are well suited to provide ordinary Diploma and Certificate programmes with a good complement of practical experience, including programmes for the commercial and service industries. As larger units, providing a more diversified spread of craft, technician and commercial courses, the technical institutes should be able to operate on a more cost-effective basis and to offer better facilities for the students. It is intended that the facilities for the Diploma and Certificate courses in the technical institutes should be at the same standard as similar courses in the Polytechnic.

6.11 It is proposed to expand capacity of the technical institutes in this way in the early 1980's. The extent of such developments will depend on the extent to which the existing planned capacity for technician courses within the technical institutes is found to be inadequate. Additional accommodation for Morrison Hill Technical Institute will become available in the annex in the Victoria Technical School building, when the part which is to be occupied temporarily by the Technical Teachers' College from 1979 is vacated, upon the opening of new premises for the College in Kowloon Tong.

6.12 By these means there will be developed an ample and well-balanced spread of technical and commercial courses at the craft, technician, higher technician, technologist and professional levels. At each level, priority will be given to part-time courses which are integrated with employment, through which students will gain the practical job experience which will complement their studies and enable them to understand the practical relevance of what they have learned.

6.13 There will continue to be close consultation between the Polytechnic and technical institutes over the planning of courses, so that technician education in the various institutions can

be integrated. A common credit-unit system has been established, which enables students at the technical institutes to follow programmes which are complementary to those in the Polytechnic and which can facilitate their transfer to courses in the Polytechnic. This system will continue to be developed.

6.14 The provision of places at the universities and the Polytechnic makes a heavy demand on public funds. While a high level of expenditure is necessary in order to maintain courses at the appropriate standard, advantage should be taken of suitable opportunities for savings. The Government will ask the UPGC to moderate expenditure whenever this does not lower academic standards or other real benefits to the students and the community.

#### *Post-secondary colleges*

6.15 The Government intends to regularise the role of the post-secondary colleges, which the Post Secondary Colleges Ordinance envisaged as private institutions offering four-year courses for Form V leavers. It has become increasingly difficult for private institutions to run courses of tertiary education at a good standard, while keeping costs at a level that most students can afford.

6.16 The Government is anxious that approved post secondary colleges should be placed on a sound financial basis to ensure that reasonable standards are maintained. Yet if the Government is to provide financial support, it must be able to decide how colleges should complement the courses available elsewhere and how they can contribute most effectively to tertiary education. The size of the colleges, their level of academic operation and the types of courses they provide have a crucial bearing on the costs that are required to maintain appropriate facilities.

6.17 The levels at which there would appear to be the greatest need to supplement what the public sector is able to provide lie in extending the range of opportunities for the Form V leaver wishing to take a two-year course at the sixth-form level and to continue thereafter for two further years on a course which will equip him with a professional or other vocational qualification. Following discussions with representatives of the approved post-secondary colleges, the Government proposes to assist in the provision of places at the colleges at both these levels, provided that the colleges restructure their courses. The rate of assistance for each student taking a two-year course at the sixth-form level would be calculated with reference to the unit cost for a sixth-form place in an aided grammar school. The rate of assistance for each student taking a subsequent two-year professional or vocational course would be at 120% of the unit cost figure for a sixth-form place. Although the level of fees for each course will be determined by the colleges, subject to the approval of the Director of Education, the subsidy in respect of students at the sixth-form level will be adjusted to take account of the standard fee applicable to sixth forms in schools. The subsidy for students on the two-year post-Form VI courses will assume a present fee level of \$2,500 (which is the lower of the fees presently charged by the two colleges registered under the Ordinance for entry in the 1977-78 academic year).

6.18 The two-year courses at the sixth-form level will lead to the Hong Kong Advanced Level Examination, to an examination which is recognised as being of an equivalent standard (such as the G.C.E. Advanced Level Examination or the International Baccalaureate) or to a new examination, the syllabus for which would be proposed by a college and assessed by the Hong Kong Examinations Authority as being at an equivalent level.

6.19 The qualifications awarded to students completing satisfactorily the two-year post-Form VI courses will be aligned with those awarded by the Polytechnic to comparable students. The Director of Education will arrange for independent assessments to be made of the standard on which the award was based, so that the basis for comparison with the Polytechnic would be clear.

6.20 It is understood that the colleges may wish to run one-year courses for those students completing the two-year post-Form VI courses who have demonstrated the ability to proceed to a higher award. This is agreed on the understanding that such courses will attract no further financial assistance from the Government. The Government will be prepared to recognise the students who complete the courses satisfactorily as having the same eligibility and entitlements upon entry to Government service as would be granted to students at the Polytechnic who had studied one year beyond the Higher Diploma level, provided that it is established by independent assessment that the courses had reached this standard.

6.21 Fee remission arrangements for students on the courses at the sixth-form level will be a matter for the colleges. Students on the two-year post-Form VI courses will be eligible to apply for grants and loans on similar terms as students at the colleges of education. A loan scheme on more generous terms than that already available is proposed for needy students on the further one-year courses. This improved loan scheme may be offered also to existing students at the colleges, with effect from September 1979. It would be for the colleges to provide from their private resources any further support required by students.

6.22 Student numbers on these courses will be limited to what is necessary to meet approved development targets for the public sector and to what the colleges' present capacity can accommodate without overcrowding. It is not intended to expand the total number of students presently at the colleges, nor to extend this scheme to any colleges other than those which have already been approved under the Post Secondary Colleges Ordinance.

6.23 The scheme being offered to the colleges will enable them to contribute towards the Government's targets for sixth-form and tertiary education, in return for financial assistance for them and their students, while retaining the status of private institutions with a considerable measure of freedom over curriculum and syllabuses. It will enable the awards offered by the colleges to be aligned with those provided in other institutions.

6.24 The Post Secondary Colleges Ordinance will be amended to reflect the new role for the colleges described in this White Paper. Each college will have the option of retaining its present form, with the existing range of courses and awards; if it so elects, there would be no direct financial assistance to the college, though the Government would make available a student loan scheme. Alternatively, the college may choose to accept Government financial support in accordance with the arrangements described in this chapter, which are proposed to take effect from September 1979. The Government's financial responsibilities under this scheme, including the management of the student finance scheme, will be discharged through the Education Department. A scheme of control will be drawn up and the colleges will be required to submit to the Education Department annual statements of income and proposed expenditure and audited accounts showing that the terms of the scheme had been complied with.

6.25 The programmes described in the Green Paper would have provided opportunities for 33% of the population in the relevant age-group to receive a subsidised course of tertiary education by 1986, compared with 18% in 1977. Under the proposals in this White Paper, these opportunities will be increased further, in particular through the expansion of technician courses in technical institutes and the introduction of subsidised courses at approved post-secondary colleges.

## Chapter 7 : The development of adult education

7.1 Education is a continuing life-long process, and the Government welcomes the development of educational opportunities for mature students. Many such opportunities are already available in Hong Kong through a rich variety of social, educational, cultural and recreational activities provided by many private and public organisations. The Government's contribution has come through the courses provided by the Education Department or by publicly-financed institutions of higher education. In future, the Government will, as discussed later in this chapter, introduce a scheme of subvention for those voluntary organisations which organize "retrieval" education courses - i.e. courses designed specifically to meet the needs of those who do not have the advantage of a strong formal education. Other types of privately-run adult education courses will not be subsidised by the Government, as mature students should normally be expected to meet the cost through their earnings.

7.2 The development of part-time degrees has been described in the preceding chapter. The universities at present provide a range of non-degree courses, including informal courses, through their Extra-Mural Departments. These will continue to develop with the growth of the universities and no change in their financing policy is envisaged. The part-time courses of technical education at the Hong Kong Polytechnic and technical institutes also represent an important part of continuing education.

7.3 The activities of the Education Department's Adult Education Section include the running of secondary education courses using the facilities of Government and aided schools. These courses provide an additional avenue for students who want to take their education to the senior secondary level but who are unable to study during the day-time. It is the Government's intention to expand these courses to meet demand from suitable applicants. Such courses have hitherto not usually been able to cover the full senior secondary curriculum because they lacked access to laboratories and other special rooms. With effect from September 1979, the Government proposes to make the necessary payments to enable such access to be provided and the services obtained of laboratory technicians and other professional support staff.

7.4 The Education Department provides a range of "retrieval" general education courses. These will be continued. The administration of the Department's adult education courses will be strengthened by the appointment of co-ordinators and specialist advisers, with additional administrative support in the adult education section. The main thrust of the Government's policy for developing retrieval adult education courses will be directed to assisting voluntary organisations to complement and supplement the Education Department's own courses. A scheme of subvention will be introduced for that purpose. Suitable courses for subvention might include:

- (a) courses designed to improve basic literacy in Chinese;
- (b) general education for particular groups, such as factory workers and fisherfolk (including re-orientation to land-based living);
- (c) re-orientation and Cantonese-language courses for newcomers to Hong Kong from other parts of Asia;
- (d) social and moral education;
- (e) activities in geographical areas not covered by the Education Department's services.

7.5 Non-profit-making voluntary organisations will be invited to propose suitable courses in terms of these guidelines, which will be subvented on a project basis (i.e. not annually

recurrent, though renewal of subvention will be considered annually, subject to satisfactory progress with the project and availability of funds). Activities proposed for subvention must meet a demonstrable demand from low-income groups and be of benefit to the community at large. Any subvention would be limited to a contribution towards the cost of staff and essential equipment. Students would still be expected to meet part of the cost of the course, though those from eligible families may in certain circumstances be assisted with their fees through the public assistance scheme.



## Appendix 1

### (a) *Planned growth in subsidised places at the post-Form III level*

	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86	1986-87
A. 15 year old population	113,440	112,770	108,390	101,670	95,450	89,740	84,290	79,690	76,210	77,290
B. Full-time school places										
Government Schools	3,360	3,360	3,880	5,000	6,200	5,880	5,880	5,880	5,880	5,880
Aided Schools <sup>1</sup>	16,192	21,976	24,357	26,741	48,800	49,080	49,200	49,200	49,160	49,160
Other Types <sup>2</sup>	970	1,330	1,530	2,105	2,150	2,215	2,270	2,305	2,360	2,460
% in full-time school education	18	24	27	33	60	64	68	72	75	74
C. Full-time places in technical institutes	1,530	1,530	2,240	2,520	2,560	2,600	2,640	2,880	3,080	3,130
% in full-time education	19	25	30	36	63	67	71	76	79	78
D. Part-time day and evening places in technical institutes	7,780	7,780	9,000	9,600	10,060	10,060	10,060	11,880	11,970	11,970
Evening places on senior secondary courses in adult education centres <sup>3</sup>	1,160	1,160	1,400	1,520	1,960	2,040	2,200	2,200	2,200	2,200
% in full time or part-time education	27	33	39	47	75	80	86	93	98	97

#### Notes:

1. Including schools in the process of becoming fully-aided.
2. English-speaking schools, Police Cadet School, 15 year olds in special schools.
3. Places will, in accordance with stated policy, be expanded or contracted to meet demand. This is the expected requirement for Form III leavers.

**Appendix 1 (Cont'd)**

*(b) Requirement for subsidised Lower/Middle Form VI Places*

1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86	1986-87
6,000	6,400	6,520	8,450	9,410	10,580	18,330	18,320	18,360	18,360

Note:

This is the maximum requirement to meet the stated policy of providing subsidised sixth-form places for up to one-third of students entering subsidised Form IV places two years previously. Such places will be provided in schools and in approved post-secondary colleges. The actual number of places provided in any given year may vary slightly from the target according to the stage of development of the institutions involved.

## Appendix 2

### Financial implications of the programmes in the White Paper

#### (a) Cumulative additional recurrent expenditure

\$m	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Senior secondary & sixth form education (including sixth form courses in post-secondary colleges)	-	45.4	85.5	140.9	227.6	293.9	353.3	384.2	395.2
Technical institutes	-	5.4	17.9	24.8	31.9	37.6	43.0	49.4	53.9
Colleges of education	-	2.5	7.2	22.0	26.7	27.2	28.1	28.8	29.6
Universities, Polytechnic and tertiary level courses in post-secondary colleges	-	24.0	59.2	97.4	115.4	127.1	134.5	142.5	150.5
Adult education	-	2.1	7.4	10.6	11.6	12.2	13.2	14.0	14.6
Total	-	79.4	177.2	295.7	413.2	498.0	572.1	618.9	643.8

#### (b) Capital expenditure

\$m	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Senior secondary and sixth form education	17.9	33.7	26.5	64.1	34.0	18.2	8.0	8.0
Technical institutes	8.1	17.3	14.4	15.8	19.5	20.4	9.9	3.8
Colleges of education	-	0.3	2.2	6.0	3.5	1.0	-	-
Universities and Polytechnic	82.8	162.5	122.8	65.7	55.0	40.0	40.0	40.0
Total	108.8	213.8	165.9	151.6	112.0	79.6	57.9	51.8

Note: Figures refer to financial years. They include student grants but not central administration expenses. The normal annual increase required to maintain existing services is included also.