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EDUCATION AND TO-MORROW

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EDUCATION AND TO-MORROW

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WITH A FOREWORD BY

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JAMES NISBET AND CO., LTD.

22, BERNERS STREET, LONDON, W.1

*Made and printed in Great Britain
by The Aberdeen University Press
First published in 1936*

TO
W. H. YOUNG

*Because he has always seen details in
the light of principles and never allowed
officialdom to fetter his creative spirit*

FOREWORD

THE disorders of our time have made planning fashionable. What makes Dr. Stead's book of outstanding importance is that the planning he proposes, in the field of education, is neither an inventing of make-shift palliatives nor a game of escape from disturbing realities. This book combines shrewd insight into what is immediately practicable with length of vision into human possibilities. As an administrator Dr. Stead has worked wonders in his own area, on the side of what he himself calls *administrative* re-organisation. It has to be seen to be believed. I knew his district as a schoolboy ; and I find it difficult to express my feelings at the completely changed atmosphere produced in that area in the past few years.

Dr. Stead, however, is not content with this achievement. He presents an unusual combination of practical administrator and educational theorist. He insists that his labours remain incomplete unless administrative re-organisation is followed by *educational* re-organisation. He believes this because he realises so vividly our present national and international ills. We are witnessing, in his view, a race between plastic adjustment and catastrophe. His book is no mere *tour de force*, but is put forward as an earnest expression of the faith that is in him ; namely, that the difficulties of this age and of the years ahead can only be overcome, in our rapidly changing world,

by planning (both on its material and spiritual sides) an education which develops initiative, tolerance, and the questing will.

What does Dr. Stead mean by educational re-organisation properly so-called? It goes without saying that he is not taken in by the confusion between "training" and "education." There are forms of human training which are little better than Pavlov's conditioning of dogs. These are designed to produce stereotyped beings which can be fitted into the jig-saw puzzle of an efficient and stable, but stagnant State. That is the way of dictatorships. Nearer home (as Dr. Stead is quick to point out) the same purpose is achieved, with less deliberation, by a mainly academic education devised to suit definite classes of occupations, and providing a limited entry into those classes. Our present travesty of primary education; our lack of provision for further schooling which is sufficiently varied in kind to suit all sorts of citizen; our reliance upon the old and the safe—these are the means by which we, in our generation and country, evade the immense possibilities which educational re-organisation might bring into being.

The distinction between training and education may perhaps be illustrated by the following contrasting statements. "Education is an attempt by the adult members of a human society to shape the development of the coming generation in accordance with its own ideals of life." (*Encyclopædia Britannica*). Here, clearly, training only is intended. Hence the need for Kant's warning that "Children ought to be educated, not for the present, but for a possibly improved condition of man in the future." This brings out what is additionally required to convert training into education. It

is the main value of Dr. Stead's work that this contrast is made vivid, and fully documented. Training is good enough for barbarous societies ; though it contains in itself the seeds of decay, because (in human as well as in insect communities) there can be no standing still. Arrested development means loss of function and consequent regression. Training is not, however, enough for a progressive civilised society. We have, naturally, to put into circulation the frozen assets of our social heritage ; but we must also go further, and foster rational criticism of that heritage as the only preservative against decay.

How is this great task to be begun ? By supplementing our present concentration upon administrative reforms with truly educational reforms. In short—we must add to practice, thought about practice. Dr. Stead provides us with valuable and practical suggestions as to how we may set about examining critically the methods and curricula of schools, and relate them to future needs. An idle pottering of the fancy over such questions, according to Dr. Stead, is not enough : a radical reconsideration of first principles is essential. He has many wise things to say about almost every side of educational activity : from nursery schools to adult education, from population problems to the cultural amenities of new housing estates. If in these matters, as in most other human concerns, the only cure for bad thinking is to think better, then a dose of Dr. Stead's book can be recommended.

A. E. HEATH.

University College,
Swansea.

PREFACE

THIRTY years ago I entered an Elementary School in the South-East corner of London to take up an appointment as an Assistant Master. I was then eighteen years old and had already served for three years as a Pupil Teacher in a Hampshire school. I was subsequently to have experience in many types of schools, to carry out research work in educational psychology and to engage in the work of educational administration. But the experiences of that first full-time post remain amongst my most vivid memories. I was responsible for the "teaching" of some seventy "Standard IV" boys. They came to school after hours of early morning work in the delivery of papers or milk. The gates of the school were shut during school hours for two reasons—to keep the parents out and the children in. Mass methods of instruction were the only practical ones and "education" was conceived as the acquisition of unrelated and undigested facts.

Eight years ago the Education Committee of the Borough of Chesterfield determined to carry through a complete reorganisation of the educational system under their control. Since then condemned schools have been closed, defective ones reconstructed and new buildings erected. Adequate facilities and equipment have been provided which make it possible for each school to carry out its allotted task. This

programme was completed just over two years ago, when it became apparent that the provision of buildings and equipment, and the re-classification of children, were not enough. There was a need to examine critically the methods and curricula of the schools and the principles upon which current practice was based. This led to the preparation of a second Report for the consideration of the Chesterfield Committee—one entitled “Educational Reorganisation—the Second Phase.” It was out of that Report that the present volume has developed. Many of those who read it asked that its subject matter should be made more generally accessible, and it is in response to these requests that the present volume has been prepared.

It appears at a time when Western civilisation is passing through difficult and dangerous days. An increasing number of thoughtful people hold that the cure for the current ills lies in a closer understanding of, and control over, human forces. This volume tries to emphasise such a point of view. If the motives called into operation in the School are acquisition, competition, envy and aggression, then we must not be surprised if those same motives are found to lie at the basis of adult activity. But if we can devise a system of education whereby co-operation, creative activity, courage to face new situations, tolerance, and mutual understanding become the attitudes characteristic of the children, then we may hope that the same outlook will become more common in the wider world outside the schools.

This volume is intended to stimulate discussion upon these vital topics. It does not profess to answer all the many questions which a critical examination of the working of the

educational system of this country will raise. The success of a teacher is properly measured by the extent to which the questing attitude is raised in the pupil's mind and not by the number of facts imparted. It is hoped that questions concerning principles, methods and curricula will be raised by the thesis of this work and that this will lead to a personal, critical examination of the bases of existing action.

Old faiths may die, but the old formulæ live on, and in no sphere of life is this more true than in that of education. There is always a temptation to base action upon a formula rather than to make that constructive effort which results in its being rooted in a faith. But no formula expressive of a dead faith can vitalise our educational system. The false faiths of to-day can only be challenged by those imbued with a living one—and it is the function of education to develop such a faith in and through the schools.

It would be impossible to mention by name all those to whom I am indebted. The Chairman (Alderman H. Cropper, J.P.) and members of the Chesterfield Education Committee have made service in their area a privilege and a joy. Many colleagues in the educational services have assisted and encouraged me, both by their words and by their practical work. Particularly do I owe a debt of gratitude to Messrs. J. H. Slatcher, B.A., and C. Middleton, M.A., for many wearying services cheerfully and readily given. Finally, this volume could not have been prepared but for the very practical help supplied by the members of my office staff.

H. G. STEAD

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INTRODUCTION

*“ Be not content ; contentment means inaction !
The growing soul aches on its upward quest.”*

CHAPTER I

INTRODUCTION

THE study of human societies and of human achievement shows that there is no such thing as continuous and uniform development. Progress is not unbroken progress in a straight line towards a definite and clearly conceived end, but is rather an alternation of periods of consolidation and of ferment. The society achieves an "integration of custom," a state which is more static than dynamic, and into this state some disruptive thought intrudes. This challenge to action may be met in many ways, and upon the selection of the right response depends the future of the society. The response must carry the society through the following period of integration of custom, and so confront it with fresh challenges. There is growth so long as this process continues : there is arrest and decline if it ceases. Many of the societies which have come to birth have been arrested—some at one stage of their development, others at another. Over-specialisation seems to have been always one of the causes of arrest. The Spartans, the Esquimaux, the Nomads and the Polynesians all concentrated upon specialisation at one stage or another—and all are dead or decadent civilisations to-day. The cult of militarism, the pastoral life or the life of the hunter enables its devotees to deal satisfactorily with problems concerning the comparatively narrow fields within which they are expert. It fails when the challenge comes on a wider basis and fails just because of its efficiency in the narrower field. These considerations raise questions of obvious importance to a civilisation which is variously described as mechanical or industrial. Is modern Western civilisation concentrating upon

industrial development to the neglect of other vital things? Is its industrial success something which is indicative of a narrowing of interests and an incapacity to deal with wider human problems?

Successively the challenges which come to a society vary in their nature. In more primitive times they tend to be physical—the challenge of the geographical environment, or of other tribes. Should these be successfully responded to, there come other challenges, less physical but more psychological, challenges due to the conflicting ideas and values. In the earlier stages of growth, expansion of territory may be a successful response to a challenge; at a later stage the response may take the form of a development in technique. But each of these responses give rise to other challenges of a more subtle nature. Mere increase in bulk is not a sign of growth and development; neither is technical progress. Other civilisations besides our Western have expanded over wide areas—and collapsed. Others, again, have developed a high technique (the Spartans, the Esquimaux and the Nomads) but have become arrested and declined. Something further appears to be essential.

When the present state of Western civilisation is considered the significance of the suggestions made above becomes apparent. Western civilisation has spread over most of the inhabitable globe—but does that growth in bulk correspond with that inner growth which is the criterion of real progress? The technical progress of the same civilisation has been amazing—but again, is this real growth? One thing appears to be quite definite. Western civilisation is in a state of ferment. Challenge after challenge is coming to it and its future depends upon the nature of the responses it makes. Some see in the ferment of the times the birth pangs of a new civilisation; others are equally confident that we are witnessing the death throes of an old one. All agree that the restlessness, the fear, the sense of frustration and the loss of a sense of values, all of

which can be seen in the Western world to-day, are signs of a change. They constitute a challenge and the future of Western civilisation depends upon the response. It has been suggested that the nature of the challenge varies through the ages. The challenge to-day is on the human level. Men have learned to control their physical environment and physical forces. They have not yet learned how to control themselves.

The main thesis of this work is that the next generation will be faced with this challenge and that upon them will depend the success with which it is met. If the response is to be a successful one they must be capable of that courage which goes out to meet and mould the future, and not actuated by that fear which seeks a refuge in the apparent certainties of the past. They must have learned that "the proper study of mankind is man," and through increased wisdom have achieved more self-control of their own motives and sources of action with a consequently deeper imaginative sympathy for their fellows.

These qualities can only be developed through the best possible utilisation of the facilities for education, and so the problem confronting Western civilisation to-day is essentially an educational one. Whenever a civilisation has been sorely tried its wiser statesmen have examined the basis and structure of its educational system. In a re-orientation of this system they have seen the best hope for the future. A completely hopeless people either sinks into that apathy which is the forerunner of death, or is fertile soil for violent revolution. Perhaps the last hope to be surrendered is that the coming generation will be spared some of the anxieties, the fears and the hopelessness of the present one. This hope, not always consciously expressed, is to be found in the majority of parents. It is sometimes misdirected in its aim, frequently warps the judgment, and results too often in undesirable actions. But it is a motive which the educator must use in his efforts to bring about educational reform. Keeping in view the situation

outlined above, it is obvious that there is an urgent need to examine critically the principles upon which current educational practice is based in order to determine to what extent they meet the needs of children who will grow up to be citizens of a questing, restless, fearful, changing world. Faulty practice must be abandoned and no consideration based on tradition or prejudice must be allowed to ensure its retention. Sound basic principles must be enunciated and applied, and if this is impossible within the framework of the existing system, then that system, or parts of it, must be ruthlessly destroyed. Temporary expedients are always unsatisfactory, although they may be characteristic of the modern world.

Since the War much has been heard of Educational reconstruction. This country has had its "Educational" Re-organisation, and the rulers of Italy, Germany, Russia, Turkey, Austria and France have all been quick to seize upon the fact that in the control of the methods employed and material used in the Schools and Youth Organisations lies their one hope of perpetuating the system for which they stand. It may not be without significance that the main concern of continental reformers has been with the subject matter taught, while this country has largely concerned itself with problems of organisation. This point will receive further attention at a later stage in this book. Here it is sufficient to point out that it has led to a belief entirely false, that administrative re-organisation is necessarily educational re-organisation. Schools have been reconstructed, the children have been re-grouped, and where this has been done we speak of a "re-organised area." But none of this re-organisation is necessarily *educational*. The underlying principles upon which the system is based have not been examined—far too often they are unrealised. Methods and curricula remain much the same—some slight variations occurring merely by the operation of educational fashion. It is mainly with this second group of problems that this volume is concerned.

In a dynamic society the function of education is not to preserve society (as in a static society) but to construct it. The development of any society is directed by the reactions of the individuals composing it. Education must prepare for this work of constructive creation, not for the blind acceptance of a place in a mechanised mob. The danger of over-specialisation has been indicated already, and there must be trained, not the future industrial unit alone, but the whole child. "For when the whole man shall be educated in all men, then shall mankind be nearer to humanity." Speaking at the Annual Conference of the New Education Fellowship in 1930, Sir T. Percy Nunn said: "We have all got hold of a dream we are trying to convert into reality, that education is not something to be given to the elite of a nation to sunder the classes more than nature has done, but that it is something to develop the whole manhood and womanhood of a nation." This positive, constructive, and creative duty of education does not imply a neglect of the past. The Schools should look to the past and focus in themselves all that is finest and of enduring significance. But they must also look to the future—to the re-shaping of life and to its re-direction.

In these respects our present system fails lamentably. Good as it is in parts, efficiently as it works within its limited field, it does not meet the needs of a troubled, restless, questing world. At the Annual Conference of the National Union of Teachers held at Scarborough in 1934, Dr. C. Norwood said: "A nation's capital is its youth, that undying procession of human life, that flood of promise and possibility which goes on springing up in generation after generation, but which we, in large measure at the present time, suffer to go to waste and futility."

The last phrase is a challenge to all concerned in education, and in a growing society will evoke a response. The only satisfactory one will eliminate the waste and replace feverish action by purposive activity. To this end the following discussion is directed.

PRESENT POSITION IN EDUCATION

“Much of the crisis which now threatens us is due to public ignorance of perfectly simple things. . . . That is a reflection upon the character of our education.”

“Against the vast background of modern perplexity and social embitterment, a system in which children leave whole time education at the age of fourteen, is seen to be imbecile.”

CHAPTER II

PRESENT POSITION IN EDUCATION

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NATIONAL crises arouse interest in educational affairs but do not commonly induce that attitude of mind which is essential to a right judgment upon the problems which arise. Gerald Heard has pointed out that in the political sphere two natural reactions are apparent in times of stress. On the one hand there is a form of hysteria "which tries to bluster out of its fear, as a small boy whistles in the dark," and on the other hand there is an anxiety neurosis which realises that the time for action is short and that civilisation may founder before a remedy is reached. The first reaction leads often to an over-emphasis on the physical—on mighty armaments, on extensive factories, on swifter transport—or, in the sphere of education, on finer buildings and more elaborate equipment. Viewing these, the blusterer seeks to forget his own inner insufficiency and to judge his success by an external measure. The individual who is subject to the anxiety neurosis may become obsessed by a sense of frustration and an almost paralysing fear brought about by the speed at which the crisis is approaching, and action in a "panic" may result. The first state of mind sees in the "system" a solution to the problems of the times; the second leads either to a passive attitude of frustrated resignation or to an irritable and irritating, restless and unco-ordinated type of activity.

Whichever type of activity is followed, political reformers see in the control of education a powerful means of attaining

their ends. So Mussolini re-writes history books for the schools of Fascist Italy and stresses physical training of a militaristic nature. Hitler determines to "ruthlessly eliminate from the schools all elements of non-Germanic origin," while France develops technical training in the hope that increasing skill will counterbalance decreasing numbers. Stalin postulates a political aim for the educational work of New Russia, while in England the political and social issues are avoided by a concentration of the attention upon the more material aspects of education. This has always been the case. An interesting parallel might be drawn between the recurrent crises of a nation and the development of its educational system.

In both there are some periods marked mainly by an integration of custom and others by the ferment of thought. In the history of civilisation the fields of action, upon which the recurrent challenges are made, change. From being on the purely physical level in the primitive society they become increasingly psychological in more advanced ones. In fact this transference of the field of action would appear to constitute the true criterion of progress. Failure to proceed beyond the physical level means arrest and subsequent decline. The growing society is challenged on the higher level and it is on this level that the challenge must be answered. Many thinkers have pointed out the fact that man is confronted with two problems—one external and the other internal. There is, as Bertrand Russell has said, the "chaos without and the darkness within." And Sir Arthur Ewing, in his Presidential address to the British Association, said, "Man was ethically unprepared for so great a bounty (*i.e.* the inventions of the Machine Age). In the slow evolution of morals he is still unfit for the tremendous responsibility it entails. The command of nature has been put into his hands before he knows how to command himself." The danger is obvious. The rapid improvement in technique has placed into the hands of

men powers which multiply enormously the effects of their actions. These forces are in themselves neither good nor evil : everything depends upon the use to which they are put. And their use depends in turn upon the direction of human activities. It is useless to speak of the possibility of the cessation of invention for a period just as it is idle to condemn the evil use of inventions. Inventions are tools and like all tools are non-moral. But if man cannot control his passions and cannot control the direction of his activities, the situation is as dangerous as if a child has been given explosives and matches with which to play. It should be clear that the attention of educators must be turned to the problem of the "darkness within" if the coming generation is to be fitted for the task of facing the problems awaiting solution.

The movement for a reformed system of Education did not spring suddenly into being in the difficult post-war days. In this country there were many before the war who questioned the adequacy of the existing system and who were experimenting a long various new paths. Many saw the widening breach between what was and what might be. Much educational practice was the result of the mental climate of the age—that stock of common slogans, phrases and words which are used to avoid the effort of real thought. The machine was in the ascendant and so machine-ideas and conceptions coloured much "thought." The very vocabulary of the educational world reflected this. "Standards of attainment," "the average child," "a Standard VI child," and so on, all imply a view of education in which the child is a unit in a vast machine. Other educational practice was based on custom and existed only because of its history. There has been always this preference for the state based upon the "integration of custom." In all the normal spheres of man's activity, religious, social, political and economic this passive state has been more welcome than the activity brought about by the ferment of original thought. The effort of action is always easier than

the effort of thought. Men weary of the strain of continuous thought and soon lose the erect posture of the mind. This is why so many promising ideas fail to achieve results and why pioneers so frequently become conservators. In pre-war days it seemed almost as if nothing could disturb the working of the vast machine which was the industrial world.

But into this self-satisfied and complacent world Darwin and Huxley threw the disruptive thought of evolution, and the war completed their work by revealing to mankind the terrible truth, that in spite of all his vaunted power of control over more and more powerful machines he had failed in the primary task of controlling his own impulses. Yet, as Bertrand Russell writes : “ We should keep in our minds as a guiding thread the conception of gradual chequered progress perpetually hampered by the savagery which we inherit from the brutes, and yet gradually leading on towards mastery of ourselves and our environment through knowledge. The conception is that of the human race as a whole, fighting against chaos without and darkness within, the little tiny lamp of reason growing gradually into a great light by which the night is dispelled. . . . In the struggle against chaos without and darkness within the *battlefield is the Schools* (italics added) and the remedy lies in the realms of thought and feeling in the first place.” In other words, the assets of the pre-war mechanised world were physical and mechanical, while the defects were mainly psychological. To cause a *physical* nuisance is to commit an offence and we take steps to remove such a nuisance. There appears to be no good reason why mental nuisances should not be similarly removed, and uneducated people are one that might, generally speaking, be abolished by sound education. This proneness to concentrate on the physical and overlook the psychological is responsible for many inconsistencies in national life and will be noted later. Good houses, fine streets, suitable school buildings, an efficient sanitary system, water, electricity and gas supplies are all

desirable, but in themselves they cannot make a happy community. Ultimately the deciding factor lies in the minds of the citizens—if they are fearful, or anxious, or suffering from injustice, the possession of physical goods is almost a mockery.

It is not an exaggeration to say that the renewed interest in education in this country in the post-war period was concerned mainly with the chaos without. It concerned organisation and facilities for education more than education itself.

The Board of Education in England has set up a Consultative Committee, composed of experts in various branches of education, to whom from time to time various educational questions are referred for consideration and report. In February 1924 the following reference was made :—

- “(1) To consider and report upon the organisation, objective, and curriculum of courses of study suitable for children who will remain in full-time attendance at Schools, other than Secondary Schools, up to the age of 15, regard being had on the one hand to the requirements of a good general education and the desirability of providing a reasonable variety of curriculum, so far as is practical, for children of varying tastes and abilities, and on the other to the probable occupations of the pupils in commerce, industry and agriculture.
- “(2) Incidentally thereto, to advise as to the arrangements which should be made (a) for testing the attainments of the pupils at the end of their course ; (b) for facilitating in suitable cases the transfer of individual pupils to Secondary Schools at an age above the normal age of admission.”

In this reference there are some implications which should be carefully noted. In the first place it assumes a leaving age of fifteen in “ Schools other than Secondary.” Twelve years later educationists are still awaiting the raising of the age, and until this is done, the re-organisation of education (as apart from administration) visualised by the Hadow Committee cannot

be effected. Secondly, (2) (b) implies a continuance of the cleavage between "Secondary Schools" and "Schools other than Secondary." The leaving age for the majority of children in Secondary Schools is sixteen; if that for children in Schools other than Secondary were to be raised to fifteen, it would seem desirable to go a further stage and raise it to sixteen immediately and abolish the distinction between the two types of schools. As it stands in the terms of reference, transfer may be made for the sake of one more year at School—or because of an unwarranted distinction between the Schools.

The Committee reported towards the end of 1926. At this time the Chairman of the Consultative Committee was Sir W. Henry Hadow, and the fact that this Report is commonly known as *The Hadow Report* is indicative of the interest it aroused. Its main recommendations expressed the view of the Committee that the Primary Stage of education should cease at eleven plus, and that all subsequent education is in effect "Secondary." For some few children this stage would continue until eighteen or nineteen years of age; for some others to sixteen; for the majority to fourteen (or fifteen if the leaving age was raised). Suggestions were made as to a practical bias in the concluding years of the new Senior School courses (for children to fourteen or fifteen).

The publication of this Report was the signal for the outbreak of a burst of enthusiasm for education. It seemed likely that the leaving age would be raised—a hope doomed to be followed by a series of disheartening disappointments. But Authorities were stirred into action; some from real educational motives, others because it was the educational fashion of the day to "re-organise in accordance with the Hadow Report." Some effected a genuine re-organisation of their Schools—providing adequately for the various activities visualised in the Report. Others merely re-organised the School population and fondly believed that if they had Infants in one set of Schools, Juniors in another and Seniors in a third,

they were completely re-organised—no matter how poor the facilities provided might be. Again, some Authorities watched the interests of the Infant and Junior children during “re-organisation.” Others so were spell-bound by the magic of eleven plus that the Seniors got all the plums. The failure of the attempt to raise the School Leaving Age and the onset of the economy period killed a great deal of the enthusiasm that had been engendered. Much of the blossom failed to produce fruit and a certain measure of disappointment and disillusionment followed. Such re-organisation as had been effected was not based upon that fundamental re-stating of the principles of education, and their application in the Schools, which was so necessary to meet the needs of the age.

In 1928 a further question was referred to the Consultative Committee by the Board of Education :

“To enquire and report as to the courses of study suitable for children (other than children in Infants’ Departments) up to the age of eleven in Elementary Schools, with special reference to the needs of children in rural areas.”

The Committee reported in 1931. The division of education into Primary up to the age of about eleven years and Secondary beyond that age was again stressed, and it was pointed out that Primary education itself fell into two well-marked periods—one extending up to the age of seven plus and the other comprising the period between seven plus and eleven plus. It will have been noted that the terms of reference specifically raised the question of suitable courses of study for these children. The recommendations included many suggestions regarding methods and curricula. Amongst them was one which should be painted in gold in a prominent place in every Junior School. “*We are of opinion that the curriculum of the primary school is to be thought of in terms of activity and experience rather than of knowledge to be acquired and facts to be stored.*” Here is a guiding principle for Junior Schools. For

many reasons—because of the pressure of the transfer examination at eleven plus, because of the idea that the three Rs are the business of the Junior School, because it means vision, experiment and new paths—this dictum has not received the attention it deserves. Here, we have a definite case of the strange concentration on the administrative aspects of education noted above. The most striking recommendations contained in the first Hadow Report were administrative, and greeted with enthusiasm, but the vital recommendation of the second report was truly educational and passed almost unnoticed.

Early in 1931 a third question was referred to the Consultative Committee :

“To consider and report on the training and teaching of children attending Nursery Schools and Infants’ Departments of public elementary Schools, and the further development of such educational provision for children up to the age of seven plus.”

The Committee reported in 1933. It cannot be said that its Report did for the early stages of the child’s school life what the original Hadow report had done for the later years. There was hardly the same boldness shown in the findings. One of the major questions under discussion was that of the value of Nursery Schools (separate from existing Infants’ Schools and admitting children at two years of age) and Nursery Classes (adjuncts of existing Infants’ Schools and admitting children at three years of age). The Committee found that “the nursery school has a value of its own as an *educational instrument*” (Recommendation No. 73), while in its previous recommendation (No. 72) it stated that it was a “desirable *adjunct* to the national system of education ; and that in districts where the housing and general economic conditions are seriously below the average a Nursery School should, if possible, be provided” (*italics added*). A further suggestion was that the Nursery School should be developed separately from the Infants’ School. Here is to be seen once more the emphasis

on the physical and the neglect of the psychical. Although the Nursery School "has a value of its own as an educational instrument" it is only to be provided where "housing and general economic conditions are seriously below the average." Its main function is viewed as a palliative for unsatisfactory housing and distressing economic conditions—not as an educational instrument. That is, it is conceived as remedying a physical defect—not a psychical one. Yet it can be argued that it is the single child of the middle class parent that is in most need of the early social, physical and sensory training given in the Nursery School. Habits which form the basis of anti-social behaviour in later life are of early growth. The child in a large family is in less danger of becoming anti-social than the spoilt single child. The Report did not solve the problems confronting those interested in education up to the age of seven plus. If Nursery Schools are desirable they can hardly develop apart from Infants' Schools—for the latter are of the same nature, and to have a separate type of School for children from five to seven, would not be desirable. The real ground for the provision of Nursery Schools is educational and psychical.

Much has been written and much more spoken about the effects of the re-organisation set in progress by the Reports of the Hadow Committee. The benefits are many and real. Old schools have been replaced by new ones and more adequate provision has been made for the proper instruction of older children. But all along there has been the tendency to think of re-organisation in terms of schools and age-groups and not in terms of principles, curricula and methods. To apply the terms used above, the chaos without has been partially removed, but the darkness within has been but little illuminated. It may be argued that the increasing emphasis on practical activities is a sign that questions relating to curricula and methods are receiving attention. This cannot be denied, but unfortunately there has to be added the undoubted fact that much of this

practical work finds a place in the curriculum because it happens to be the educational fashion of the hour. In many cases it is not there because of any conviction as to its value or because any thought has been devoted to its purpose, but simply because of the magic of a phrase.

Again, in recent educational activities one can see perhaps an example of the working of the tendency to attempt to measure growth by external factors—the size and number of the schools or the improved technical equipment. Important as these are—they do not necessarily mark growth. But they provide something to which attention can be directed when haunting doubts as to the efficiency of the “system” arise in the mind.

The external re-organisation which has been carried out is not enough, in fact it is not *educational* re-organisation in the real meaning of those words. There remains the greater task—one which calls for intense and concentrated thought. The principles underlying the educational system of this country must be closely examined, and the methods used must be thoroughly overhauled. Only in this way can any educational re-organisation worthy of the name be effected and only through such a revitalised education can the coming generations be prepared to take their part in the building of a new and better civilisation. Without such an education they will adopt one or other of the alternatives referred to at the beginning of this chapter, and in ready acceptance of dictatorships or in hopeless apathy contribute to the disruption of the civilisation of which they are the heirs.

CHARACTERISTICS OF THE AGE

“Many troubles here and abroad exist to-day because men hold anger, bitterness and suspicion in their hearts to one another.”

“Our present standards of intellectual worth are mainly conventional, and based largely upon our ability to use words.”

(there is) “a pronounced and irremediable divorce between the intellectuals and the man in the street.”

“There is no alleviation for the sufferings of mankind except veracity of thought and action, and a resolute facing of the world as it is.”

“Until the child changes his outlook on life, there will be no peace among men.”

CHAPTER III

CHARACTERISTICS OF THE AGE

THE conception of a static society has long since been abandoned and has been replaced by that of a dynamic one. It has been pointed out that there is general acceptance that the present is an age of change, but a divergence of opinion as to the direction of that change. This uncertainty about the future develops doubt as to what constitutes appropriate action and brings to many a feeling of frustration.

Some people seem to view the changes as having been brought about by causes outside the control of human agency. They say "The machine is in control," or, "The forces are world forces" and so excuse themselves from action. It is obvious that if the forces are super-human ones, then human action is useless. But this is only one expression of the philosophy of defeatism. It is the seeking for an apparently rational excuse to avoid making the effort required in constructive thought. It removes from society any element of self-determination and views that society as conditioned entirely by external forces. It neglects all history and takes no account of the lessons to be learnt from a study of other civilisations. For such a study shows that unless there is growth in self-determination, there is no real progress and that mere response to external stimuli is the mark of arrest, if not of decline.

For others, the multiplicity of suggested remedies constitutes a stumbling block. The fact that so many able thinkers differ so acutely both in their diagnosis of the disease and in their proposed cures, causes doubt to arise with respect to them all. And while this doubt increases, the crisis of the illness

comes rapidly nearer. If a number of apparently competent men, drawn from various divisions of Western civilisation, cannot agree as to the cause of the illness, and having so disagreed, further differ on remedial treatment, then it would appear that civilisation is in decline. For the thinkers are all "men of like passions," using the same fundamental processes and subject to the same general influences. The differences *must* arise from errors which could be eradicated. There *must* be some fundamentals which are common and most differences must be fortuitous. If our Western society is in decline it must be because the wrong things have been emphasised and because the Gods worshipped are not real Gods but Devils in disguise. This bewilderment makes action well-nigh impossible. It breeds fear lest the wrong prophet should be followed and it induces a negative attitude of mind where the need is for positive constructive action.

A recognition of the changing nature of the age, together with a feeling of incapacity to control or guide the direction of the change, is therefore one of the most clearly marked features of this age. And to respond effectively to the demands of such an age it is essential that there should be developed individuals who possess flexible minds and who are capable of—indeed who welcome—creative activity. It would not be an exaggeration to say that much of the education in the past has produced the rigid type of mind which bases activity upon fixed ideas. Much of what has been called educated thought and activity has been reproduced thought and imitative action. Education has provided retreats from life rather than approaches to it. In a static age this might not be dangerous, even if it were not desirable. In a dynamic age it is both undesirable and positively dangerous. "What the world needs most at the present time is a race of men and women of independent thought and judgment, able to recognise the difficulties of a perplexed humanity, and endowed with sufficient wisdom and initiative to attempt a solution.

Therefore we want to ensure that our educational system will develop such qualities instead of stifling them. Like Dewey, we want an education that will be an education in adaptability." A progressive society must adapt its educational system to the idea of change and must learn how to combine flexibility of mind with firmness of purpose.

In periods of changing ideals and shifting values there is always a temptation to recall the virtues of a past age, and to believe that a pace backwards into the known is better than a step forward into the unknown. It is forgotten that conditions never completely repeat themselves. The physical environment may remain the same, but the human environment changes. Many shrink from the coming of the new because it is of an unfamiliar pattern. This fear of the unknown and a feeling of frustration developed by uncertainty, together with the contagion of mob-hysteria, form the background against which the dictatorships of modern Europe should be viewed. In such a society the would-be Dictator has only to assert loudly enough that he knows the solution to the problem and there will be many willing to surrender to him control of both thought and action. It is this renunciation of the rights of the individual that leads to the political, literary, economic and other dictatorships of the age. If this is the disease, then the cure is obvious. Instead of a surrender of the powers of the individual, there must be a use of them. And there must be an education which will teach their use in the first place and give some indication of the direction of the activity in the second. This does not imply a love of change just for the sake of change. It does indicate the need to examine critically proposed changes and the development of a reasonable attitude in place of a prejudiced one. It stresses the value of the individual and the danger of the mechanical mass-produced human robot, to the community.

Incidentally, another characteristic of the age has been touched upon here. It is a machine age—one which has

witnessed an enormous development of machinery and the use of machine-power. The early years of this development were full of promise and men were enthusiastic as to its possibilities. Gradually the idea of the machine became part of the mental stock-in-trade of the age, and from thinking of machines, men came to think of men as machines, and finally to "think" as machines. Instead of the effort of thought there was substituted the infinitely easier effort of habitual action and the replacement of thought by the acceptance of phrases and slogans. So developed the system of mass "education" in the early days of elementary education in this country. The units in the large classes, taught at the same pace by the same technique, were not individuals and were not treated as individuals. They were the raw material which was to undergo the same processes at the same time, and which was to be turned out of the factory at the end of the process as similar standard articles. In the industrial sphere, the viewing of workers as "hands," as part almost of the machines they operate leads to industrial unrest, based on a resentment not always consciously expressed. With Schools and Factories based on this conception of a standardised individual, it is not difficult to see the source of some of the troubles of present-day civilisation. Individuality is lacking and the spirit of standardisation has affected the minds of men. The outward and visible signs of standardisation—similar activities carried out in identical fashion—have been succeeded by an inward and spiritual standardisation of "thought." Not without reason do Dictators and would-be Dictators dress their followers in shirts of a given hue. A satirical picture of a completely standardised world is drawn by Aldous Huxley in his "Brave New World," while Professor A. M. Low in "Our Wonderful World of To-morrow" says, "Instead of consulting the Schoolmaster about the most suitable profession for his son, a father will telephone the family doctor, who will advise a visit to Sir Somebody Somebody (BXT 101) the medico-

engineering specialist. Having determined that the boy's brain is of the required capacity, the specialist will perform a simple and painless operation which will induce an intense desire to be an engineer, and give him the special qualities necessary for success in this profession." The pictures drawn by Huxley and Low may appear to be fantastic, but they represent possible futures for men as automata. Ultimately they are both examples of the Procrustean bed—a general mould into which the individual must be fitted. If too long, he must suffer amputation ; if too short, he must be stretched. So a second characteristic of the modern world can be added to the one already stated. In addition to a feeling of the imminence and need of change, there is an idea of man as part of a machine, and a glorification of the machine thus implies a glorification of man. If the old education has tended to develop this conception, then it is the task of the new education to develop an individual with the independent mind. So to the quality of flexibility required in the citizen of the new world there can now be added independence.

This conception of man as a machine has had another effect, for it has led to the neglect of most of the non-physical factors in the life of man. It has made the age not merely a machine age but also a materialistic age. For a long time Science connoted the physical sciences—Physics, Chemistry and Mathematics—those upon which the actions of the machines were based. Only in recent times have there been any signs of a recognition of the value of the Biological and Psychological Sciences. It was not until the machine age had passed its zenith, that Darwin and Huxley infused the ferment of the theory of evolution into an intellectually complacent world. It has taken fifty years for Biology to win recognition in the religious world. It may take as long for it to win recognition in the political sphere, but the time will come. Man, proud of his conquest of the material and physical parts of his environment, and made vain through

his mastery of the machines, has forgotten the human part of his environment, and is stunned and bewildered by the unexpected consequences of his omission. The task of removing this "darkness within" will be difficult, for man has ever found it hard to look himself in the face. Modern man has nearly learned not to feel shocked at the sight of the human body, but is still afraid to look openly at the human mind. This emphasis on the material, to the neglect of the human, has led to the employment of a false measure of progress.

Many people consider our buildings, our streets, our roads and our machines and point to them as a proof of our progress. "See," they say, "the wonderful things we have made and built. Is it possible that there can be any question of decline in the face of such marked evidence of progress?" Here again one detects the fallacy of mistaking physical progress for human progress. Whenever there has entered into the mind of man—either as an individual or in the mass—a doubt as to his real effectiveness and his ability to cope with a challenge confronting him, he has taken refuge in external structures of imposing dimensions and, viewing these, has stilled the questioning voice and so reassured himself. So the Egyptians built Pyramids, and the Romans made an Empire, Babylon created gardens in a desert, and the Singhalese subdued the tropical forest and erected magnificent public buildings. All must have thought themselves safe. But sometimes the external structure marked the coming of decline—it represented the result of a last feverish burst of activity, the assertion "it's *bound* to be all right"—but always with the haunting fear in the background.

In the realm of education the operation of this process can be plainly seen. In recent years much has been heard of "educational re-organisation," but this re-organisation has been a re-organisation of the tools of education rather than of education itself. In a supplement on "Education Affairs"

published in "Time and Tide" for January 25th, 1936, it is stated :—

But after all physical fitness, money, buildings, are not education. They are only the means of education, the tools. And they are tools which even when provided in abundance can sometimes be ill-used. Good health is indispensable to a worthy civilisation, is one of its purposes indeed ; but good health is also compatible with complete savagery and the breakdown of such civilisation as we may have built up. In many of the reforms discussed this last month—particularly in respect of physical training—Germany has long preceded us. She has built up an apparatus of education in many respects superior to ours. But the magnificence of that apparatus has not prevented its employment to ends which most English men and women would regard as definitely evil. To put it in slightly different terms, education although "thorough," prolonged, intensive, has utterly failed to produce in Germany the type of mind which will enable the mass of men to preserve such goods as even the Athenian of twenty-five hundred years since managed to acquire ; education has not produced a political and social wisdom necessary for a free civilisation.

If this is correct, and there is every reason to believe it is, then a third quality can be added to those which must be developed in the coming generations. They must receive an education which will arouse a sense of *human* values and of their importance in civilisation.

This emphasis upon the physical and material which has been stressed so frequently has resulted in the development of another factor in modern civilisation—an over-emphasis upon the value of the competitive spirit. So long as the aim of life is the control of the physical, or the acquisition of the material, so long must competition be the dominating motive

to action. Material success can be measured by physical quantities and results compared. In this way arises the glorification of the large thing or the large quantity. The work of children is measured by marks gained and not by the effort made and the activity expended. The large mark is held to be "better" than the smaller one, and the question of the way in which it is better is not considered. So develops, as an extreme of this process, the worship of the colossal—of the larger trust, the big circulation, the "omnibus" volume, the super-liner, the piling up of armaments and many other features of modern Western civilisation. There is far more competition to produce the paper with the largest circulation than to produce the most intelligent one. This implies a false set of values, based upon an undue emphasis on the measurable quantity and a corresponding neglect of the more elusive quality. But if what has been said about the importance of man himself—apart from his acquisitions—is correct, then it is at once clear that competition of the kind indicated loses its false value and has to be replaced by a motive which is of a more human nature. This in turn means a development of control over the crude passion for self-assertion, and again a point is arrived at where the need for control of human forces appears essential if the power which has come to mankind in and through the machines is not to be misused. The individual who is striving to outdo his own previous best (in any activity) will be using his desire for self-assertion in a wise way. However, much competition needs replacing by co-operation and the elimination of undue competition in the adult world is mainly dependent on its elimination in the schools. It is the height of folly to base a system of education upon competition and then to lament the presence of the same spirit as the main motive in the world at large. The wave of extreme nationalism which seems likely to engulf so much of present civilisation, and which results in such crude and cruel action, has its roots based upon a self-assertion fed by fear and needing the

physically large to reassure it. The world-wide competition in armaments is an admission of spiritual bankruptcy.

There are many other characteristics of the present age to which reference might be made, and hardly two thinkers would agree upon their relative importance. Perhaps one other may be mentioned here—what has been termed the “breaking of the old anchorages.” Old values have gone; old beliefs and faiths are in the melting pot. Mankind searches for new anchorages and re-statements of political and religious faiths. Perhaps this is the fundamental task of the present generation. Only a faith can prevail against a faith, and if the false faiths now so exultant in the world are to be desposed, it will only be by those possessed of a consuming faith in their own beliefs. Since the war there has been a bewildering loss of faith in nearly every sphere of thought. A spiritual hunger and a home-sickness of soul beset to-day the whole human race. Amid the chaos of a stunned and bewildered world the only permanent value is the *force of an ideal* to move the minds of men. It is only through a right education that individuals can be developed with the vision to state the ideal and the will to work for its achievement.

They will only become useful members of local or national groups when they have some understanding of the purpose of the group or groups to which they belong. Groups and societies are effective in so far as they are self-conscious—realising their aims and working for their achievement. Group self-consciousness grows through the recognition by the individual of the aim of the group and by his acceptance of it as a desirable one. Not every member can fully realise the aim; but “awareness” of it (as one may be “aware” of beauty without necessarily being an artist) can be developed in all. Some groups have comparatively narrow aims—in such cases there is a danger lest the narrow aim be substituted for the wider one of the welfare of the whole community.

Here, then, are a number of characteristics of the present

age—loss of ideals and sense of value, uncontrolled change, worship of the mechanical and material, neglect of biology and psychology (*i.e.* of the human elements in the environment), prevalence of mass thought, exaltation of the competitive spirit. A right system of education is the only way in which these defects can be remedied and the challenge to our western civilisation successfully met. Before dealing with this, however, it is essential that another factor in the problem should be considered in detail—the population question. It is obvious that the quality and quantity of the future citizens is a vital factor in the type of civilisation they will help to develop. Many statements have been made concerning the fall in the birth rate, and the future numbers in our society. Other statements have raised important issues on the question of the increase of mental defect. To these questions the next chapter of this volume will be devoted.

THE POPULATION OF THE FUTURE

“ The subject of population growth is one of vital interest to every intelligent citizen.”

“ Population changes are symptoms of changes affecting the whole fabric of social life—and therefore affect the question of education.”

“ Children have ceased to be a form of old-age insurance.”

CHAPTER IV

THE POPULATION OF THE FUTURE

SOME of the problems confronting the educator at the present time have already been indicated. "We educate the rising generation," said Professor J. J. van der Leeuw, "not that they should be adapted to a world in a state of crisis, a world of chaos and ignorance, but that they should create out of the life that is in them the world of the future. Then we must educate *beyond ourselves* (italics added). The educator of to-day must understand the life that is trying to find a voice in the newer generation."

If the educator is to educate "beyond himself," if he is to consider the trend of civilisation and prepare for society as it will be, then he will be forced to take cognisance of possible changes both in the numbers and the quality of the children entering the schools.

Any marked increase or decrease in the total population or in the proportion of children in such a population, or in both, or any considerable significant change of relative mentality, would constitute factors of the greatest significance in the future development of society and the educationist would have to consider them in attempting to find a solution to the problems confronting him. After a period in which population questions have been either neglected or the subjects of jests, there has developed an uneasiness of mind upon the subject and a greater recognition of its importance. The materialistic view that increase in population is correlated with progress in civilisation has led to a fear that a decline in

numbers implies a decadent civilisation. If the criterion of progress is a physical one—either increase in size or numbers—then the cause for alarm at a declining population is well founded. Even if the criterion is not that of numerical increase, it is clear that striking fluctuations in population will bring about social changes of far-reaching effect. Such changes are vital matters for the educationist and the current neglect of them must be remedied.

It is true that in Circular 1426 (April, 1933) the Board of Education published a report by the Government Actuary giving the estimated numbers in the various groups attending Elementary Schools up to and including 1948. The Board pointed out that special circumstances might be operative in local areas, but anticipated that "the Government Actuary's observations will afford valuable assistance to Authorities in dealing with problems of accommodation, staffing and organisation." There is no hint here that the figures might indicate a need for a searching examination of the social tendencies of which they are a reflex, or of any change in the organisation of the society on which they were based. It is possible that the problems of *education* raised by them might be of much greater importance than those of "accommodation, staffing and organisation." Another aspect of the figures which demands attention is the range of the population over which they are applicable. It is essential to know whether the fall in the size of the age groups is general, or whether it varies from group to group. For obviously different interpretations are necessary in the two possibilities.

In addition to the Report of the Government Actuary, two other studies of the same problem have been published recently. In the *Sociological Review* for April, 1934, Dr. Grace Leybourne published a carefully prepared estimate of the future population of Great Britain. The estimate was extended up to 1976 and the population was divided into four groups.

- (i) 0-15 years,
- (ii) 15-45 years,
- (iii) 45-65 years, and
- (iv) over 65 years.

In addition to the fall in the total population with which all recent social statisticians have been concerned, Dr. Leybourne showed that there would be startling changes in the relative sizes of the various groups. Before discussing these in more detail, the second study referred to above should be noted. It is contained in a volume "The Twilight of Parenthood," by Dr. Enid Charles (Watts, 1934), and deals with the population question as a whole and over the whole world. As Dr. Charles states in her preface, "The subject of population growth is one of vital interest to every intelligent citizen. This is so for two reasons. One is that in place of the Malthusian menace of over-population, there is now a real danger of under-population. The other is that population changes are themselves symptoms of changes affecting the whole fabric of social life."

The figures of the Government Actuary's Report give the estimated number of children on the Registers of public elementary schools on 31st March each year. To arrive at these figures, assumptions have to be made about birth rates subsequent to 1934. It should be pointed out that most of the figures referred to in this section are estimates, based on assumptions. But the assumptions are reasonable ones and only likely to be falsified by some radical change of tendencies in evidence to-day. Such changes might occur either through the deliberate action of society, the edicts of a Dictator, or the introduction of a new factor. The assumptions made by the Government Actuary were based upon the fact that the average number of births for the four financial years 1928-32 was 642,000, while the number for the calendar year 1932 was only 614,000. "Having regard to the persistent decline in fertility," he prepares three estimates assuming (a) that the

average number of births per year in future years will be 625,000, (b) that it will be 600,000, and (c) that it will be 575,000. The first assumption means that the birth rate will remain at a figure a little above the present one ; the next that there will be a slight decrease ; and the third that the present fall in numbers will continue. The full table is printed in the Statistical Appendix (Table I) and from it will be seen that on the first assumption there will be a drop of 334,000 children in attendance at elementary schools by 1948 (assuming the age of attendance remains the same), while on the second and third assumptions the fall will be 497,000 and 657,000 respectively, during the same period.

Dr. Leybourne's estimate covers a wider field (Statistical Appendix, Table II). In arriving at it, it is assumed that the birth rate will stabilise in 1944. The estimate is probably as accurate a one as is possible, and reveals some highly important and significant facts. Dr. Leybourne writes : " Looking at the figures arrived at . . . we see that the population of Great Britain will increase slowly for a few more years and will then decline. In 1941 the total population will be about the same as in 1931. The decline will be slow at first ; in 1951 the total will be about two millions less than now (1934). Thereafter the decline becomes more rapid, so that twenty years later, on the same assumptions, it will have fallen by another ten millions. . . There will be at the same time important changes in the age and sex constitution of the population. . . . The nature of the changes in age constitution is shown when the percentages which these groups form of the whole population at different dates are calculated.

		1931		1951		1976
0-15	..	24.2	..	15.5	..	12.5
15-45	..	46.9	..	47.4	..	36.6
45-65	..	21.7	..	25.9	..	33.4
Over 65	..	7.2	..	11.2	..	17.5

(All figures are percentages of total population.)

"In 1951 the total working population (15-65) will be relatively larger than in 1931 (73.3 per cent. as against 68.6 per cent.), but the increase will be mainly in the older section of the working force. *The dependants will include relatively more elderly people and relatively fewer children* (italics added). . . . In regard to the sex ratio, there will be a tendency, as the years pass, towards an equalisation of the proportion of the sexes in the population as a whole. . . . This equalisation will be actually realised in the age-group 15-45, which is the group that from one point of view matters most; even in 1941 the surplus of women in this group will be negligible."

Dr. Charles' volume covers still wider ground, for it discusses the trend of population growth in many countries and in various groups in different societies. On the question of the total population of this country, Dr. Charles writes, "At the present time (1933) . . . the population (of England and Wales) has practically ceased to increase. If no further changes in fertility and mortality rates take place, a stable age composition will eventually be reached. When this point has been reached the population will be reduced in the proportion 3 to 4 in each subsequent generation. The determination of the exact length of time implied by the term generation . . . has never been found to diverge very much from thirty years. Let us suppose that the present fertility and mortality rates of England and Wales remain as they are. . . . A population equivalent to that of England and Wales (about 45 millions) would be reduced to less than 6 millions (*i.e.* about half the size of Greater London) in about 200 years." At the present time, every four female children born in England and Wales leave on an average three female descendants. In other words, even if the present birth rate continues, the number of potential mothers will diminish by a quarter in each generation. This trend to sterility cannot be modified in the slightest degree by any increase in longevity which hygienic science may bring about. All the latter would do would be to add to the proportion of older people in the population.

But Dr. Charles' volume is not concerned only with questions relating to the population as a whole. She discusses in detail the problems aroused by a differential birth rate between different social classes and different areas. Tables III and IV of the Statistical Appendix are reproduced from her volume and these tables show clearly the variations, and from a study of these some deductions of great importance can be made. In the first place, there is no obvious connection between unemployment and an excess of human beings. Further, the situation is not one in which proposals which aim at improving the race by restricting births is likely to be satisfactory. "The infertility of civilised communities is now so low that any policies tending to lower fertility still further will be prejudiced by fear of racial extinction, when the facts become known." The facts stated so far do not warrant any conclusions being drawn as to the quality of the population. There is insufficient evidence of significant differences in intelligence between social classes with differing fertility rates. In addition, the difference in fertility rates tends to become less pronounced. The apparent correlation between unskilled labour and high fertility is due to the fact that members of a large family have to look for the work which is most remunerative at an early age, and therefore tend to gravitate to unskilled work at comparatively high initial wages but with no prospects. They cannot afford to wait for the other type of post and the question of their suitability for the work does not enter into the question. At the present time the birth rates of the more fertile groups are approaching the level of the less fertile ones, and this fact indicates a further fall in the total birth rate. The gross rate appears likely to continue to fall steeply for some time to come.

The causes of this decline are many. The decade which preceded the decline of the birth rate in England was marked by two important series of events. The Royal Commission of 1861-63 on conditions of children's employment initiated fresh restrictions on child labour in a succession of measures

which culminated in the Consolidating Act of 1878. In 1870 the Education Act set up School Boards, and the Compulsory By-Law Act of 1880 made school attendance compulsory. The child had ceased to be an asset and was becoming more and more of a liability. Expanding opportunities for social improvement, new professions, the gospel of self-help and thrift, these and many other similar things were characteristic of the decades preceding the decline in fertility. The world-wide depression of 1879 may have been the starting point.

Here again can be seen changes, the effects of which still lie in the future, but which are indicative of a shifting of the emphasis. During the days in which the outlook of the machine age was at its brightest, children were an asset to their parents, in fact, they were almost equivalent to material possessions. Their value was, in part at least, a material value. Now legislation has changed this, and for an ever-increasing length of time children tend to be a liability. A world that has learnt to measure with a material yard-stick is devising a means of freeing itself from this liability. The course adopted may wreck the present system of society, or it may drive society to consider the problem of its rejuvenation from a new angle and so devise a solution to the problem through previously unheard-of channels. The importance of the problem is clear.

The system of education in vogue is not blameless. Dr. Charles, towards the end of her volume, makes some positive suggestions regarding education which at first sight appear retrogressive, but which are seen in a clearer light when the basic principles underlying them are grasped. These will be discussed in detail later on, but here it is enough to say that they are based on the value of productive activity. As a commentator on Dr. Charles' work has said, "We need to remember that both occasional physiological sterility and the artificial sterility which an increasing number of people impose upon themselves are of far less racial significance than is the

emotional sterility and self-centredness for which our economic system, and our schemes of education are mainly responsible." Here is an accusation which must either be refuted or a challenge which must be met.

It has been stated that there is no direct evidence in the facts and figures already quoted which can be used when the *quality* of the population is under discussion. In 1929, however, the Mental Deficiency Council published a report based upon the results of an enquiry made in six selected districts—three urban and three rural. This report focussed attention upon the problem of the mentally deficient child and some account of the published results should be given here.

The Report adopted the usual classification of defective children into idiots, imbeciles and feeble-minded. Although this classification was developed independently of the more modern and scientific use of Intelligence Tests, the latter are now universally used as a means of diagnosis. Perhaps the most reliable of these is what is known as the Binet-Simon Test, or one of its revisions. This Test is an individual one, that is, it is applied separately to each child. It was developed by Binet and Simon in Paris, for the purpose of devising a means of diagnosing defective children. It consists of a number of simple "Tests" arranged in groups. Each group consists of units which the normal child of a given age should be able to perform satisfactorily. The individual Tests vary in kind, so as to call into operation as wide a range of activity as possible. The Tests were standardised by application to a large number of children before they were employed for diagnostic purposes. The method is for the child to be given the Tests (there is a standardised procedure). It is found that he passes the Tests for, say, a child of 7, but fails with those applicable to a child of 8. He is then said to have a mental age of 7. Hence arises the conception of a mental age as something distinct from the chronological age. A child's chronological age may be 10 years 6 months; his

mental age may be 8 years 6 months (the Test provides for months as well as for years), and he is therefore said to be two years retarded. Or his mental age may be 12 years 6 months, and in such a case he is advanced. From these conceptions there has further developed that of the Intelligence Quotient, usually denoted by the letters "I.Q." It is obtained by

multiplying the fraction $\frac{\text{Mental Age}}{\text{Chronological Age}} \times 100$. It is clear that if the mental age is equal to the chronological age the I.Q. = 100, while if the mental age is the greater the I.Q. will be above 100, and if the chronological age is the greater the I.Q. will be below 100. In other words, the average child has an I.Q. round about 100, while the dull or defective child will have one below 100 (the amount below 100 being a measure of the defect) and the bright child one of over 100.

When tested by means of mental tests, very few idiots show an Intelligence Quotient of more than 20, very few imbeciles one higher than 40, and few feeble-minded children one above 70. Therefore as a rough classification we have—

Classification.	I.Q.
Idiots	Below 20
Imbeciles	20-50
Feeble-minded ..	50-70

The Report suggested that all children younger than 11 and with a mental ratio of 50 and below should be regarded as notifiable, and that the same should apply to children older than 11 and with a mental ratio of 55. This ratio (50 or 55, according to age) should be regarded as the lower borderline for *retarded* children, 80 being the upper one. In larger towns it is suggested that this upper limit might be 85.

Tables VII, VIII and IX of the Statistical Appendix give the main results arrived at. Table VII gives the percentage of the school population between 7 and 14 with mental ratios

of a certain value. Table VIII shows the incidence of defect in the areas investigated—first by separate sexes and then in the total, while Table IX gives estimated numbers for the whole country.

The Committee reports that the figures obtained “enable us to state with some measure of confidence that the mean incidence of mental deficiency in England and Wales is about 8 per 1,000.” This incidence is higher than that given by all previous investigators, and the question arises as to whether the figures indicate that there has been an increase in the incidence of mental defect in the country in recent years. The number given in the Report under discussion is nearly double that based on the data of the investigators for the Royal Commission in 1906. One reason for this may be that it is now possible to conduct a more thorough enquiry than it was thirty years ago. Methods of diagnosis have improved and more precise standards have been elaborated. The Report states that this may account for a large part of the increase, if not for the greater part of it. There still remains “some evidence that the numbers of mentally defective persons in this country relative to the increase in population are now higher than they were twenty years ago.” The fact that more defectives survive may account for the larger numbers of low grade defectives living to-day, and the question as to whether a greater proportion of children *born* in recent years are mentally defective than was the case in previous generations remains an open one. Only if this occurs, can it be said that there has been a real increase in mental deficiency in the course of the last few generations. The disturbing feature of the figures which have been quoted is the differential incidence in rural and urban areas, and it seems difficult to avoid the conclusion that in the rural areas there has been an increase in the *birth rate* of the mentally defective. The complex problems and the obvious dangers to a country of such a differential incidence of mental defect, when considered in conjunction with the facts of the

differential birth rate referred to in the earlier part of this section, are too patent to need explanation.

One important point demands some attention. In the course of their Report, the Committee direct attention to the incidence of physical defect amongst these defective children. For example, 1.7 per cent. of mentally defective children are partially blind (as against .09 in normal children) ; 3.5 per cent. are partially deaf (.53 for normal children) ; 11.3 per cent. have speech defects and 12.7 have defective vision. "Signs and symptoms of neurosis were frequently encountered among the mentally defective group of children," it is stated. These facts are very suggestive and should result in the figures quoted being received with caution—as indicating the need for investigation rather than a complete statement of the facts. The tests applied were mainly "intellectual"—a standard which is not necessarily a complete one. What are the possibilities? Apparent mental defect may be due to :—

- (a) some specific physical defect,
- (b) some emotional disturbance which acts as an inhibitory force,
- (c) general mal-nourishment,
- (d) real mental defect.

Now of these four classes, some of the children included in three can be removed from the defective class and be made *effective* by proper treatment following sound diagnosis :—
(a) can be (and often is) dealt with by special adjuncts to aid the defective sense and then by special educational methods ;
(b) is a matter for a Psychological Clinic, and the success attained in many cases indicates the value of the work such a Clinic can do ; (c) is a factor in the problem which is generally overlooked. If there is general mal-nourishment the brain suffers and mental work deteriorates.

Sound nourishment is essential for a sound mentality. Many acute observers are convinced that there are circumstances operative to-day which can only mean an arrested

general development with a consequent mental retardation, if not positive arrest of growth. The main danger lies in the future, for under-nourishment now means a future generation which will be incapable of bearing the physical and mental burdens which a changing civilisation will call upon them to bear. Preventive steps are the soundest form of social insurance and would repay the expense involved in more ways than one.

Those whose mentality is affected by emotional disturbances constitute a large class, and what is more important in the present connection—a class for which much can be done. It is noteworthy that there has been developed an elaborate system of public health services, but that little attention has been paid to the urgent need for public mental services—outside the institutional treatment of the definitely insane. Yet there are minor mental ailments which, if treated in time, can be cured. The proper treatment of such cases among children would result in a greater capacity to face the problems of life.

It would free human energy and add to human happiness. When such cases were removed from the numbers included amongst mental defectives, we should have some idea of the incidence of *real* mental defect. What we really want to know is the number of defective *stocks* more than the number of defective individuals.

Reference must be made here to one recommendation of this Committee. "We recommend that all those children hitherto known as educable mentally defective children should be regarded as a single *educational* (italics added) and administrative unit, and should be given a similar type of education adapted to their degree of retardation. We suggest that this unit should be known as the 'Retarded Group.'" The range of mental ratios suggested for this group is 55-80 (55-70 "lower grade" and 70-80 "upper grade"). The Committee argues that these form a homogeneous unit, and can be

dealt with as such. But the proposal is open to grave objections. In the first place, to re-emphasise a point already made, the criterion of "intelligence" is largely one of "academic intelligence," and this is by no means all the story. In the second place, the suggested name means that "retardation" (which is often remediable) acquires a classificatory connotation like "defective." It is easy—fatally easy—to take the next step and say, "Once retarded, always retarded." It is a "defeatist" word and such words should have no place in the educator's vocabulary. Then the proposed classification of schools on a basis of mental ratios savours too much of American mass efficiency—the gospel of standardised units. It illustrates the kind of organisation to which the mental climate of a machine age makes people peculiarly susceptible. The Committee illustrates its views by a diagram—passing from colonies to secondary schools. It is a perfect *system*, but the child would get pigeon-holed and enmeshed in a mass of red tape. Life cannot be so confined.

It has been suggested earlier in this Section that these I.Q.s may be affected by a variety of factors, and do not necessarily represent the inherent ability of the child. Of such factors, it is probably true to say that emotional disturbances, overstrain and mal-nourishment are the most important. With suitable treatment many of these apparent defects are remediable. This does not mean that some of the dull and backward class can be raised to the normal class, but much more than this. For many of those now appearing in the normal class could be similarly raised to the super-normal class. In other words, a great deal of mental energy which is now wasted could be freed for constructive work. It is this consideration which makes the establishment of a Psychological Clinic a matter of such importance. In the Appendix will be found a scheme for the establishment of such a centre. Here it is only necessary to stress that such a centre is *not* a centre where defectives are treated. It is primarily a place where the normal child is kept

in good mental health, and where the nature of his mental ailments (sometimes temporary in nature and sometimes more lasting) can be diagnosed and treated.

Certain definite conclusions can be drawn from the facts presented in this section. Briefly, they are as follows :—

- (1) That under existing conditions there will be a definite fall in the total population of this country and a corresponding fall in the school population.
- (2) That this fall in numbers is occasioned by
 - (a) a *general* decline in the number of births, and
 - (b) a differential birth rate as between certain classes.
- (3) That there are indications of an increasing incidence of mental defect, but this point requires further investigation before it can be considered as established.

That these changes in the total population, in the relative sizes of various age groups and in its quality, will bring definite and startling changes in the social and economic structure of our society is obvious. There are, moreover, certain educational results which will demand attention. The most important is, that with dwindling numbers each child will become an increased asset to the community. The burden it will have to carry as an adult will be greater, and this will mean a longer and more carefully planned period of education. If increased machinery replaces numbers, then technical education (for the invention of machines to eliminate labour) will be of added value, but care must be taken to ensure that an intensive specialised technical education does not replace that more general education which is so imperative in a growing society. Specialisation, and over emphasis on technique leads to arrested growth. It is efficient in one direction, but incapable when faced with problems arising in other spheres. It develops a “one track” mind—and this is a handicap, not an advantage, in dealing with a world in which the problems are many and varied. In such a world there must be, above

all, that flexible mind and that willingness to face change upon which stress has been laid already.

The situation is complex and difficult to evaluate. There is a real danger that with diminishing numbers there will come a belief that in technical development and material strength arrest may be prevented and growth continued. On the other hand, there is the danger that an increase in the rate of decline in population and unwarranted deductions as to its quality may lead to panic measures which promise well but which prove ultimately useless. It is the next generation that will have to meet the changes which will follow the decline in the birth rate, and that generation must be so educated that they meet the new situation with reason and not prejudice.

Before leaving this section, brief reference must be made to the effect of fluctuating age groups on juvenile employment. Table XII gives the number of children (14-18) available for employment (or employed) in Great Britain for various years up to and including 1940. These are estimates—but probably as reliable as any estimates can be. From them it can be seen that in 1935 the number of young people between the ages of 14 and 18 will exceed that of 1933 by 115,000, and in 1936 by 306,000, while in 1937 the excess will have risen to 443,000. This last figure is actually larger than the total number in the age group 14-15 in 1933. The effect of the increase is, in fact, as though a whole new age group were added to the four between 14 and 18. In other words, a *reduction* of the school leaving age by one year to 13 years would have the same effect as the increase will have in 1937. This is a serious matter, and one which calls for action. The effects of these population questions on educational thought and administration will be discussed in a later section.

GENERAL PRINCIPLES OF EDUCATIONAL RE-ORGANISATION

“The citizen of a democracy must be a man of independent judgment ; he must care intensely for freedom ; he must respect the individuality of others and therefore be tolerant of opinions in conflict with his own ; he must prefer methods of discussion and persuasion to methods of force.”

“There must be enough people who refuse to submit their minds to external control, who think for themselves, think actively, think scientifically, think honestly, intelligently, lovingly, mercifully, about everything that comes within the range of their consciousness, and then act fearlessly in the light of that thinking.”

“The Curriculum is to be thought of in terms of activity and experience, rather than of knowledge to be acquired and facts to be stored.”

CHAPTER V

GENERAL PRINCIPLES OF EDUCATIONAL RE-ORGANISATION

IF there is any truth in what has been written so far, the situation to be faced is of the following nature. Our modern civilisation is in danger of disintegrating into chaos. A rapid development of machines and of new sources of mechanical power has placed into the hands of men a means whereby the effect of their actions is enormously increased. At the same time there has been but little development in the control of human motives, and no development of new values to replace the old ones. The result is that there has developed a cult of the worship of the machine and machine-originated standards—size, speed and multitude. In addition, the development of the mechanical, and the lack of development of the psychological, have resulted in the misuse of the newly-won powers and a resulting fear of their ultimate effects. The “field of action” of the drama of the development of human society has shifted from the mechanical level to the human and psychological level. Success in answering the challenge on the former field does not ensure success when the challenge lies in the latter. In fact, success in the one, since specialisation tends to develop the “one-track” mind, may make success in the other more difficult of achievement. The situation may be summed up by saying that civilisation is physically mature but psychologically still adolescent. As

the youth in adolescence is frequently bewildered by the strange forces developing within him, and is alternately elated and depressed, and is always in need of imaginative and sympathetic help, so a bewildered people is unable to understand and direct the operative forces, and is in need of that kind of assistance which only education, in its highest sense, can give. Many human forces are now directed towards undesirable ends with one result that a competition in re-armament is to decide the question of "national superiority." Here can be seen the current confusion of thought—the use of a material measure of what is essentially something of human value. Other human forces remain entirely uncontrolled and unco-ordinated, with the result that action is unprincipled and contradictory.

The connection between such a world and education is well expressed in the following extract from an Educational Supplement to "Time and Tide," dated 28th January, 1936 :

"Looking at the events of the last twenty years it would be a bold man indeed who would declare our civilisation to be firmly set and incapable of disintegration into sheer chaos. If that danger is real, it sets for us a criterion by which we may test educational values. To what extent does a given type of education give promise of helping us to meet the crisis of civilisation? For if organised society reverts to anarchy; if owing to educational deficiencies we drift to a repetition of an experience like that of the last War, then whatever virtues an education might possess otherwise, it would avail us little. At this stage of the world's development the final test by which we should judge educational reform is this: Will it help us to avoid the breakdown which almost certainly threatens?

"The civilisation of any people reflects the state of its knowledge, and is in a large measure determined by that knowledge,' says Professor William McDougall, 'if,

then, we have reason to be profoundly dissatisfied with the state of our civilisation, we shall do well to consider whether there is not some radical defect in our knowledge.' The defect, in his view, is the neglect of the social sciences : ' In their development lies our only hope of remedy ' :

“ ‘ The physical sciences, while conferring many benefits, have produced a complexity of our civilisation which far outruns our present understanding and power of control. We may hope to attain the much-needed understanding in time to avert the ultimate, and probably the rapid, decline of our civilisation, only if we take in hand, energetically and with resources at least equal to those hitherto devoted to the physical sciences, the study of man and society.’ ”

The nature of the real re-organisation of education which is essential emerges from these considerations. It must produce individuals capable of controlling themselves instead of individuals merely instructed in the means of the control of forces external to themselves. It must also develop sound standards of value and a willingness to face the difficult tasks of re-shaping and re-directing the course of civilisation. Unless this is done, there will remain large masses who fearfully retreat from life instead of adventuring forth to meet it, and who are willing to accept passively ideals and standards of value imposed from without.

In attempting to arrive at a clearer conception of the principles upon which any scheme of educational re-organisation should be based it will be as well to endeavour to trace the historical reason for existing theory and practice. Often elements remain from custom, and custom alone. Successive ages find differing reasons for the same practice. A survey of the reasons given for the value of a classical education would prove illuminating, and would include every motive from utility to snobbery. Custom is powerful and any attack upon

tradition is usually resented. As a well-known writer says (I. Murphy—"Primitive Man : His Eternal Quest") : "The strength of custom lies . . . in its adaptation to a stage of mental development in which the effort of action is preferred to the more exacting effort of thought, especially if co-ordinative and prolonged. Its powerful appeal consists in its evasion, by practical solutions, of life's problems, and of the strain which reflection imposes upon the ill-developed co-ordinative forces of the savage brain. . . . Its supreme disadvantage is that the mental effort to break through tribal conditions and age-long practices is as difficult as for the individual to conquer ingrained personal habits. . . . The tendency to rest on what has proved safe is stronger by far than the adventurous impulses to launch out upon the new and the unknown. . . . (It) is an illustration of the difficulty in maintaining the erect posture of mind and of the tendency to relapse to various forms of rest from mental strain and fatigue which are characteristic of Primitive Man." Although this extract refers specifically to primitive man it indicates the power of custom in all stages of development. To prefer to follow custom blindly instead of launching out "on the new and unknown" is a common trait of mankind. In fact it may be said to be one of his customs. But it makes for indolence of mind, and this is a positive danger in times of change. It is necessary, therefore, to examine the educational practice of the day and to determine how much of it is due to custom and how much to sincere belief.

Much of our educational theory can be traced to an origin in the fifteenth century Renaissance, when the individual awoke from a world of mediæval unity and, proudly asserting his individuality, set out to conquer the world. In these days this individuality has degenerated, both in the personal and national worlds, into *separateness*. Hence we find intense and universal competition in the lives of individuals and blatant nationalism characteristic of international affairs. Mankind is seeking a new unity, one in which a new resolution of the

conflict between the individual and society shall be possible. It is necessary here to point out that modern dictatorships are not experiments in this direction but are reversions to an older order (adapted to meet modern circumstances) under the influence of the desire to escape the burden of thought. It may be that our Western civilisation is growing old and losing that creative energy which enabled it to meet vigorously earlier challenges. The dictatorships of modern Europe substitute action (controlled externally to the individual) for thought, and recoil from the adventure into the new world. Democracy is impossible under such conditions, and if the modern democratic state is to be maintained "the erect posture of mind" must be developed. Under a dictatorship the individual surrenders himself to the state, in which he has a definite place, and to which he is forced to give unswerving and unquestioning allegiance. But such a state does not solve the problem—it simply denies its existence. Individuality has ceased to exist and men and women are as uniform in belief, values and thought, as the shirts in which the Dictators so love to array their adherents. On the other hand, it can be asserted that a self-centred individuality was one of the legacies of the Renaissance. Gradually some considerable measure of religious and political freedom was won and the process received further impetus by the work of John Locke and the events of the French Revolution. To enquire into the extent to which the basic principles have been adopted up to the present would take us too far afield, but it is sufficient for our purpose to point out that the new freedom came ultimately to be considered as freedom to compete, more than freedom to co-operate. And it would seem useless to expect a world free from crude nationalism (which is competition) so long as competition is one of the main motive powers in educational systems and is characteristic of *vital* individual affairs.

The Renaissance led to a revival—first in France and Italy

and later in this country—of book learning. “Culture” was the ability to read and write Latin and Greek. Traditionally Mathematics and Logic had some place in the curriculum but academic learning was the object of education. There were intermittent protests against this. Milton, for example, appalled at the inability of the youths of his day to deal with practical affairs, wrote his “Tractate on Education” in an attempt to improve things. And later on (mainly subsequent to the Great International Exhibition of 1850) technical education was advocated as a means of maintaining the industrial supremacy of Britain. This development led to much argument as to the relative value of “cultural” and “vocational” education, and in the fog of this discussion (and others) the needs of education (unadulterated and unadjectived) were largely forgotten. The statement will arouse controversy and will be indignantly denied in some quarters, but it is true to-day to say that the term “education” in this country implies mainly academic education, that it is essentially an education devised to suit a definite class of occupations, and that its main object is to act as a doorway into these classes. No wonder that it is so frequently stated that education has failed !

It cannot be reasonably maintained that there has been any system of real education in this country, in spite of the alleged spread of it in this country since 1870. There has been a more or less effective system of training for certain specific occupations, and this has constituted in the main what has been known as secondary education. The real object of this type of training is seen in the attitude of the less-well-to-do towards it. For them it furnishes a path by which their children can escape from the economic difficulties which they have themselves suffered. To achieve this end they are prepared to make sacrifices. In the service of this system examinations have been developed, and in order to add to its efficiency, the curriculum has been transformed from activities into subjects of instruction

and severely limited in content. Elementary education has been largely a drill in the use of educational tools. The early school leaving age and the very large classes have necessarily led to this, since it is possible to employ mass instruction for this purpose. Admittedly there has been some change, and what is perhaps of greater importance, a desire for further and more vital changes. But there has been much more training than education. Even as a "cultural" education the existing system has failed, for it has not led to the present generation to produce a distinctive culture of its own. It lives largely on the culture of past ages, with the result that there is an ever widening gap between the "intelligentsia" and the "man in the street." Culture has ceased to be rooted in reality, and the "man in the street" distrusts the "intelligentsia." This state of affairs has been developed partly through a confusion of thought which has occurred over the conception of the place of "work" in life. The nineteenth century witnessed a progressive and partially successful attempt to remove from the lives of young children what may be termed "economically exploited labour." The age at which children could be so employed was gradually raised and the hours shortened. Unfortunately, the term "work" was used to cover two quite diverse conceptions—economically exploited labour and creative work. No distinction was made between these, and so *both* were removed from the child's life. The result was that the content of education became more and more remote from the environment of the child and any real contact between the School and the world was rendered well-nigh impossible. Education became increasingly a *flight* from life and not an *approach* to life.

Put slightly differently, for those engaged in labour, literature became largely a compensation and an escape, while art became typified by the "art" of the industrial towns. Those individuals with more leisure became increasingly pre-occupied with themselves, and for them literature tended to

become a Religion and a drug. Their views on Art were expressed in the slogan "Art for Art's sake." A well-known French journalist, Mme. Odette Keun, writing in "Time and Tide" during 1935, said: "The immense majority of the intellectuals of England are deceptive guides. They have no longer any reality of spirit: they are afraid of reality; they evade reality and nibble at things that are safe or that are old. They play a futile game with psychological motives, considering complexes, which they balance one against the other, for their own delectation, or for the technical appreciation of their fellow craftsman. . . . (There is) a pronounced and irremediable divorce between the intellectuals and the man in the street. . . . It is probable that the isolation of the English intelligentsia is due to the pernicious educational system which segregates better-off children in preparatory schools, public schools, and the older Universities, where they grow up without contacts with the rest of the people in their own country. They are trained academically to think and judge of past events, not to whet their minds on the present and future, so that by the time they are normally mature and educated, they have lost spontaneity, élan, the passion that has its roots in realness. Put down in a world quite different from the restful and artificial environment they are used to, out of touch with the emotionally aliver class, they can only attempt to find their way out by intellectual means, and the panaceas they offer for human salvation are so highly theoretical that they can hardly be grasped by anyone who is not a specialist. They are not even blind leaders of the blind—they are no leaders at all; they cannot make an appeal; they neither move individuals nor stir masses to follow them."

This progressive separation of culture and creative work had educational repercussions. The general recognition that there was something almost dehumanising in much of the labour necessary in a machine world, and a desire to keep the child from such labour as long as possible, and to make

his school life as different from his later life as possible, led to the development of the extreme "play way," as an almost unconscious reaction from anything savouring of the "work" way. Unfortunately, the distinction drawn above between creative work and routine labour was not made. The recent development of various craft and other activities in the schools is a sign of a changed attitude, but it is necessary that the principle involved should be explicitly stated. The need is to *restore creative work (of all types—craft and academic) to its proper place in the child's life and to provide real approaches to life and not retreats from it.* No questions of inferiority or superiority should arise between different subjects. The simple truth is, that varying children have varying needs and develop in varying ways. It is admitted that a large proportion of children are unfitted for that kind of academic training which is now called education. The solution arrived at by some critics would be to abandon attempts to subject them to any extended learning at all. But as Mr. Aldous Huxley has written :

"The existing system suits only that relatively small section of the youthful community able to learn from books, to think analytically, to make use of abstractions—and, incidentally, to pass examinations. The rest it leaves out in the cold.

"The ideal, it seems to me, is a multiple system, providing several different kinds of training and using different means to achieve the common end of all education—the fullest possible development of the child.

"Huge numbers of children (and also adults) cannot learn a subject in terms of abstractions. They can only learn through their hands, by doing. Some of these might be led on through practice to a comprehension of general, abstract theory, but there are doubtless many more for whom practice must remain, so far as knowledge goes, an end in itself.

“ This does not mean that, for such people, higher education should be reduced merely to attendance at a vocational school. It is possible to conceive of a kind of liberal education given in terms of practice.”

Commenting upon this, “ Time and Tide ” in the supplement referred to above, added :

“ In that case, somehow we must manage to make this ‘ concrete ’ teaching a vehicle for understanding society, if the method of democracy, the submission of public policy in the last resort to the decision of the multitude, is to continue at all. We have a right to be saved from destruction by our neighbour’s ignorance. It is all very well to insist that children should not be compelled to learn what they do not want to learn. But the right to have no knowledge of social processes carries with it the obligation not to interfere in those processes.”

It must be admitted that our present educational system encourages the advancement of the pupil who can absorb facts and accept opinions uncritically, and discourages the type of child who is disinclined to use its intelligence unless it recognises some practical or human significance in the studies prescribed for it.

The development of a sound curriculum has been hampered by that false psychological doctrine known as the “ Theory of Transfer ”—a theory which appears to have been put forward mainly with the object of justifying the dominating position held by the old classical subjects in the curriculum. It was held that the study of certain subjects, more particularly Mathematics and the Classics, so developed the general mental power of the mind, that a thorough course in either enabled the scholar to do almost anything well in later years. In its more crude form this doctrine is discredited, but in various subtle ways it appeals to many educationalists. If it were true, there would be no educational problem other than that of the general training of the mind. But as Professor Cyril

Burt has pointed out, "Careful research has shown that neither the mind as a whole nor its separate functions can be trained by simply exercising them." Education consists rather in implanting specific habits, memories, ideas, forms of manual and mental skill, intellectual interests, moral ideals and a knowledge not only of facts and conclusions, but also of methods. The secondary school curriculum still includes many subjects which the majority of the pupils will never need to use in after-life. There may be non-psychological grounds for their retention. But it can be no longer supported by claiming that they supply "a valuable mental gymnastic" or provide "an all round training for the mind." There are, however, general methods and ideas, such as clear thinking and intellectual honesty, which should become habitual in the whole of a pupil's thinking. It is possible for these to be learnt in one subject and then applied in another, within certain limits and under certain conditions. This kind of transfer will be more effective the more nearly alike are the two subjects, and the more the pupils can be brought to realise the importance of applying such principles to all their work.

The general acceptance of this training motive as a determining factor in the curriculum has prevented other more important considerations from receiving due weight. It has led to an over-emphasis on one portion of the curriculum and a corresponding neglect of others, and, also, to an increasing divorce between the activities of the school and those of the larger world outside. Further, because training, even of this type, has been restricted in quantity, more particularly for scholars lacking the means to pay for it (or to be more accurate—to pay the cost of part of it) there has developed a competition for it and a view that its object is really economical and not cultural.

In the chapter on Population questions reference was made to Dr. Enid Charles' recently published volume, "The Twilight of Parenthood." Towards the end of her work she

attributed some of the blame for a dangerous state of affairs to the imperfections of the educational system of the country. She writes, "Our present educational practice exists almost exclusively of forcing mathematics upon children who have nothing to measure, foreign languages on children who have no opportunities to use them in social intercourse, literary composition upon children who have nothing to write about, history on children who know next to nothing about the social institutions into which they have blundered, geography on children who have never travelled beyond the confines of one country, and who in many cases may never travel beyond the confines of one country. . . . In a rational system of education the child would begin by learning to perform all the manual operations carried out by the adults around him. . . . Every new access of experience in the life of an individual should mean increased ability and desire for fresh knowledge and skill, and there is no reason why this process should not continue up to an advanced age. A community in which education is a life-long pursuit will not confine its interest to one generation. Each new generation will be welcomed as an opportunity for a new educational experiment." Leaving out of consideration, for the time being, the constructive part of this question, it may be argued that the destructive criticism is exaggerated and unjustified. But there is some truth in it, and in so far as it directs the attention to the need for education arising out of experience and leading to other experiences, it merits consideration.

It is now possible to state some principles upon which any re-organisation of education must be based. It must provide for all types of ability and for a variety of capacities. It must develop the open mind—the mind which is necessary in a dynamic society. It must be organised in the interests of the younger generation and competition must be eliminated as its chief motive. It must become more realistic—more closely in contact with the world and less based on passive acceptance

of the culture of a past age. An educated class must be replaced by an educated people. It must provide for all and not merely for a selected few. It must develop individuals, not train units of a mass, and it must also imbue these individuals with the will to serve the community. This does not imply complete subordination of the individual to the community, for it may be that on occasions the individual may best serve the community by way of protest and even rebellion. In brief, education must furnish an approach to life and not a retreat from it.

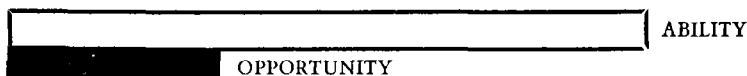
Judged by any such set of principles much re-organisation is desirable and is in fact long overdue. Even our present provision for "secondary" education is woefully inadequate. In a recent issue of the *Sociological Review* (April, 1935), Gray and Moskinsky published a lengthy report on "Ability and Opportunity in English Education." The Report is based upon an enquiry into some 10,000 children from five different types of schools: "In the group which received the opportunity to pursue a higher education, and in the two contrasting groups of free and fee-paying pupils." This Report has been reprinted and is worthy of the serious study of all those interested in education. In Table IX of the Statistical Appendix to this book is reprinted a table showing the estimated totals with high ability in various groups, while Table X shows the mal-adjustment of Ability and Opportunity.

As before, the letters "I.Q." denote "Intelligence Quotient," while I.B. stands for "Index of Brightness," a measure devised for the purposes of the research and indicating the relative degrees of promise of the various groups. 100 is the measure of average promise; above 100 indicates possibilities above the average, and below 100 the opposite. The figures quoted in the Report can be represented diagrammatically as follows, and this brings out the main facts that emerge very, very clearly.

CHILDREN OF I.Q. 130

(Numbers proportional to lengths of rectangles)

(a) Free Pupils



(b) Fee-paying Pupils



Among other points of interest are the following. "An educational policy concerned with the training of a sufficient number of children to supply the social demand for highly educated persons will be mainly directed to the provision of adequate facilities for the higher education of children of elementary school origin." How this can best be done will be discussed subsequently. The Report points out "that on the highest criterion of ability 45 per cent., and on the lowest one, 49 per cent. of the total number of gifted children in the school population do not enjoy the opportunity of a higher education," and that "taking children of equally high ability, seven fee-paying pupils will receive a higher education for every one free pupil." "In the whole school population, more than 50 per cent. of the able pupils are without the opportunity of higher education," while, "if we consider children who fall *below* the selected level of ability, for every one free pupil who is afforded an opportunity of a higher education, there are 162 fee-paying pupils who enjoy the same advantage."

There is only one conclusion that can be drawn from these facts. The present system fails even to cater for all those who have the specific type of ability for which it was devised. In order to differentiate between those suitable in ability it introduced an extraneous additional factor—ability to pay fees.

In other words, the system is one-sided and biased in addition.

The original Hadow Report stressed the view that all post primary education was secondary. Much lip service has been paid to this principle and the demand for "Secondary Education for all" has been insistent in some quarters. If by this is meant the *existing* type of secondary education for all, then its adherents are wedded to a slogan expressing an undesirable aim and are also incapable of thought. Such a policy would merely widen the gap between education and the affairs of life. But there is a sense in which the demand may express a real necessity. If it is agreed that education should deal with abilities other than academic, then it is true that *all* children can benefit by secondary education. This raises at once the question of the extent of the education to be given and also one as to its content. Education for a dynamic world implies education in the power of handling controversial issues. This cannot be done when most children leave school at fourteen : it is more than doubtful if it can be done when they leave at fifteen. Some little time ago the Archbishop of York, speaking at a prize giving at a Secondary School at Sheffield, said : "The year sixteen to seventeen is worth twice as much as fifteen to sixteen, and seventeen to eighteen is worth four times as much as sixteen to seventeen." Most people would agree, but would ask why the scale should start at fifteen. Why should not the table begin : "The year fourteen to fifteen . . ." etc. ? The demand for secondary education for all must carry with it a universal raising of the leaving age to sixteen, the provision of facilities in various directions—language, mathematics, art, music, technology, and so on—for those whose *capacity* warrants it, and a widening of the connotation of the term "Secondary education." A modern community needs all the abilities of all its citizens if it is to respond adequately to the challenge now being made to it. A wise community will take steps to develop these abilities.

So long as the examination system continues in its present form, the emphasis on the academic side which is now so heavy will continue. The elementary school child between the ages roughly of ten and twelve is subjected to a transfer examination of an academic nature. Upon his or her success in this examination depends the possibility of higher education. Owing to the pressure of parents and arising from the desire for success that can be quantitatively determined, Junior School teachers are tempted to frame their curricula upon the needs of this examination. In the existing Secondary Schools, the cramping effect of School Certificate and Matriculation examinations is all too obvious. It is easy to declaim against the examination system, but to do so and at the same time to offer no remedy, is worse than useless. Yet the examinations tend to perpetuate a state of affairs which is detrimental to the development of a sound system of education, for they over-value success in the more academic subjects and they develop a spirit of competition. It has been suggested that the wrong emphasis might be avoided by reversing the present state of affairs and devising an examination to discover those possessing ability other than academic—and having admitted these to specialist schools, sending the remainder to secondary schools of the existing type ! This might lead ultimately to the development of the state of mind shown by the small boy, who in reply to another lad who said, “ Say, Bill, I thought thee wor goin’ to ‘ daft ’ school,” remarked, “ So I wor ! But I *couldn’t pass t’exam.*” Apart from this suggestion, there appears to be only one sound remedy, and that is to make all schools of the post-primary stage equal in status. And to ensure this, it would appear desirable that they should each be of sufficient size to permit of classification within themselves—in other words, that they should be multi-bias schools. There seems little reason for any definite specialisation prior to eleven years of age. At this point the question of the secondary school examination enters into the question. The present

examination emphasises entirely the wrong aspect of education. It tests, in the words of the second Hadow Report, "facts acquired" instead of "experience gained." The proposal which is now generally advocated of separating entirely the School Certificate from the Matriculation Examination would do much to remedy the evil. It would reserve the Matriculation Examination solely for those who intended to proceed to a University, and it would enable the basis of the School Certificate to be so widened as to allow for courses in Art, Music, Crafts, etc., ranking equally with those in Latin, French and Mathematics. It would certify that the holder had completed a four-year Post-Primary course in the stated subjects.

Primary education is preparatory secondary education in one sense, but in another it is an end in itself. Its proper object is the development of the child, not for what he may become, but for what he is. The present system sacrifices the welfare of the many to the good of the chosen few. In order that a few may "win scholarships" and proceed to an academic education, the majority are forced through a course of study for which they have no capacity, and in which they have no interest. A boy in a Junior School was overheard to say, "And worrying over what my father would say about my record card, I forgot to look at the robin's nest in the garden." There is a summary of the tragedy of much Junior School work. In worrying over something unchildlike, the child forgot to do the childlike thing !

Reference has already been made to Nursery Schools and to the desirability of these being universally provided and made a single unit with existing Infants' Schools. It is unnecessary to do more than refer to this point here, in order to indicate the suggested complete scheme.

Infant-Nursery Schools	..	..	2-7
Junior Schools	..	..	7-11
Multibias Secondary Schools	..	..	11-16

One thing must be made clear. There is a vast difference between simplification of the system of education and its standardisation. Uniformity is not desirable—it is characteristic of the machine-made product. The Education Authority can provide the skeleton of a school, but it is the staff, the scholars and the parents who work together to make the dry bones live.

In the chapter upon population, it was pointed out that it would appear probable that much apparent mental defect is remediable, and that for this reason an adequate system of psychological treatment has been suggested. It is obvious that a community cannot afford to waste potential capacity. The same is true of vocational guidance work. The day when casual entry into employment was possible is passing rapidly. It is essential that ability should be utilised to its fullest capacity. So there should develop a sound vocational guidance service, able to determine the main direction of the individual adolescent's ability, and advise him or her and the parents as to suitable occupations. Similarly, employers would be assisted in obtaining the most suitable candidates for vacancies. All this is merely giving effect to the dictum, that "the only goal worthy of humanity is the greatest possible enlargement of all human capacities."

So at all points of the system indicated above, psychological advice would be available. This is an application of the view expressed above that there is need to dispel some of the "darkness within." At present medical services are supplied which deal most efficiently with bodily ailments. But mental troubles (not major ailments, but those equivalent to the bodily ailments treated at clinics) are neglected.

A curriculum based on different principles has been suggested, and the need for widening it (even to include what are commonly known as controversial issues) has been shown to be essential.

What might be called "the eternal conflict" remains. Do

we educate the individual in order that he may develop all his capabilities to their greatest extent—or do we educate him for a place in society and admit that there must be some curtailments of his possibilities? The first alternative makes for unrest in society; the other path may lead to greater contentment, certainly for society and perhaps for the individual. The answer is surely that the object of education is to assist the individual to develop the highest form of the self-regarding sentiment of which he or she is capable. The self-regarding sentiment is that group of feelings and ideas which centre in our ideal of ourselves. It is developed by contact with parents and teachers, with our fellow men and by our reading of the lives and doings of others. It gives us our conception of ourselves at our highest and best. We feel shame and sorrow when we fall beneath the standard, full of joy when we reach or excel it. It is never a static standard—it grows or decays throughout life. Gradually our pupils develop such a sentiment, and as it develops external control is replaced by internal discipline. This is a gradual process—in the past achieved by far too few individuals. But it is the end of true education, and once it is recognised that the criterion is within us, and that our worth is a measure of our personality, then there will come, too, a recognition of the worth of others. Valuing one's own personality should lead to a willingness to appreciate the same thing in others. This value becomes separated from rank, or wealth, and resides in that which is man, apart from the trappings—his personality. People are fond of quoting as the aim of education, "I came that ye might have Life." It should be remembered that the same speaker was referring to the close of the period of *formal* education when he said, "It is *expedient* for you that I go away." Parents and teachers would do well to realise this, and to prepare the children in their charge for the time when they will have to stand alone and face the challenge of the world. Such individuals may feel called upon to challenge the society in which they live—

but their challenge will be one based upon conviction, and will add life to the society in the end, instead of aiding a process of stagnation.

Nothing has been said about what may be called the popular educational topic of the day—education for leisure. And nothing really need be said about it ! Those who argue about “ education for leisure ” as distinct from “ education for work ” or anything else, are missing the whole point. What the world needs is just education—based on sound principles. Then there will be no “ problem of the right use of leisure.” One might draw a distinction between “ education for liberty ” and “ education (or, rather, training) for slavery.” But only the former is *education* ; the latter is mechanical training, a conditioning of human beings as Pavlov conditioned his dogs. If the education given in our schools develops interests and provides opportunities for controlled experience, those who receive it will never be at a loss to employ *all* their time in occupations which are desirable because they satisfy desires and furnish outlets for creative construction. Only so will a culture develop expressive of the present age.

It will have been observed that nothing has been said either on the subject of the Juvenile Instruction Centres for the younger unemployed, or with reference to Continuation Schools. This is not due to an oversight. The Centres for the unemployed are not intended to form any permanent part in the educational system. The regulations under which they work provide for their closure if and when the number of unemployed juveniles falls. They take no account of the time of employment or the nature of the employment. Their buildings are mainly of a temporary nature, and they do not pretend to make any contribution to the permanent solutions of the problems confronting society. They are based on the conception that work is best for youth, unemployment (leisure)

is evil, and that education is a little better for young people than leisure, but a good deal worse than work.

The Education Act of 1902 visualised the establishment of a system of Continuation Schools in the country. But much water has flowed under the bridge since 1902, and the cry of "Back to the Fisher Bill and Continuation Schools" is not one which has much to recommend it. If half-time education benefits adolescents, then full time education can surely be made still more effective. Education can be made just as realistic in a properly organised school as it can be in a works' school. And contact between industry and education can be developed by means other than devoting half the child's life to each. The education which a dynamic society needs to give its future citizens is one which deals in an ever-widening manner with those activities of man which are connected with his life outside the mechanical work done by most. The technical specialists can be trained—but even they need to have a broad basis of general education to fit them for citizenship and for their lives as men, apart from their lives as technicians. The greater should include the lesser.

From these general considerations it is necessary to turn to more detailed ones in an attempt to find actual means by which the principles enunciated can be applied in practice. It is necessary to ask what of the old should be retained ; what abandoned and what of the new added ?

The problem is the release of the latent human energy of society and its transformation into the kinetic form.

APPLICATION OF PRINCIPLES (I)

(SCHOOL LEAVING AGE, ADMINISTRATIVE
AREAS, BUILDINGS AND EQUIPMENT)

“ The old education forced information into the child ; the new calls forth life from the child.”

“ So long as examinations dominate the system, the main affair of the School will be to impart ad hoc instruction in facts and skills. The claims of a real education, the ideal of which is to produce a civilised person, have in the circumstances no chance of being represented in the curriculum or in the Time Table.”

CHAPTER VI

APPLICATION OF PRINCIPLES (I)

IT would obviously be impossible for any Local Education Authority to put into operation forthwith all the principles discussed in this volume. In this country the educational system is organised as a partnership between the Central and Local Governments. Generally speaking, the Central Government makes the Law and the Local service is responsible for its administration. Government control is maintained through the grant regulations and the advisory work of the Central Board of Education and its Corps of Inspectors. Often, however, the initiative which ultimately leads to legislation develops on the periphery and then pressure of public opinion leads to legislative action.

Some of the changes visualised in this volume would require legislative action, some depend upon the provision of suitable and adequate equipment and apparatus, while others, such as a re-orientation of the purpose of education, changes in the curricula and improved methods, call for a change of heart more than for a change in the law. It has already been pointed out that there is a very real danger of the latter changes being neglected and an equally great need of insistence upon their fundamental importance. The legislative changes, and the improved buildings and equipment, are the means by which changed principles and a new spirit can function. The greatest educational needs of to-day are a critical examination of the fundamental purpose of education, and a plain statement of its aim, followed by a survey of the various problems in the light of this aim, setting them forth as parts of a whole and not as a series of separated and isolated conundrums each

calling for independent answer. Only by this means can action be directed towards one end and cease to be a series of sporadic improvisations called forth to deal temporarily with the immediate demands of troublous times.

It will be as well to start an examination of the necessary and desirable changes in the educational system at those points where legislative action would be necessary.

(a) *The School Leaving Age*

The effective working of a scheme such as that which has been outlined requires the raising of the school leaving age to sixteen. At the present moment a Bill to raise the age to fifteen, with exemptions, is before the House of Commons. The exemption clauses have, however, raised a storm of protest throughout the country, from people of varying political faiths and from organisations of many types. The Association of Education Committees (an Association composed of representatives of most Local Education Authorities in the country) passed at a Special Conference a resolution urging the Government to raise the age of leaving to fifteen without exemptions, but with maintenance allowances. The unanimity of opinion on this matter can be realised from the fact, that out of a meeting of 460 delegates there were only sixteen in opposition. It remains to be seen what effect these protests will have upon the policy of the Government as set out in the Bill, but there is no doubt that the volume of support for a school leaving age of fifteen is much greater than many people realised. A leaving age of fifteen would be a real step forward and in keeping with the usual procedure in social reform—progression by gradual steps. But it would appear that there are a number of reasons which make the present a suitable time to consider the whole question of whether it would not be advisable to take steps to deal more radically with the problem of the School Leaving Age. First of all, there is the question of the individual. It has been

pointed out that many of the evils of the present day originate in the lack of control of human forces. It is during adolescence that the more important of these forces appear and develop, and it is therefore essential that during this period the individual should be placed in an environment which will assist in real growth and not definitely retard it. Speaking at a Conference of the Association of Education Committees recently, one speaker is reported to have said, referring to the proposed system of exemptions, "The most serious position would arise with regard to the return to school or any other course of instruction of any children who had left school at fourteen, and had worked for some months in a factory or works, and had then become unemployed and had to return to school. Think of the effect which would be produced in school by an unwilling youth or girl, after months of contact with industrial conditions, being compelled to return to school life, to mix with other children. What would be their attitude to the discipline of the school and what effect would dissemination of undesirable knowledge gained by them be upon the children in the school?" This passage should arouse reflections of a grave nature and perhaps not entirely those anticipated by the speaker. For it suggests that there is a wide divergence between school life and adult life in ideas and ideals. The only logical deduction that can be drawn from the statement is that either the school world or the adult world (or perhaps both) is based upon undesirable principles and that between them there is such a gulf that the child must inevitably find grave difficulty in bridging it. The question is raised immediately as to what part education has played in the development of the undesirability of this external world, and whether there is not contained in the passage the whole argument for an extension of the school leaving age to cover the entire period of adolescence. For it obviously suggests that in the adult world human powers are used in the service of undesirable ends, and the only cure for this is a system which will

permit of the development of these powers under conditions providing them with more suitable means of expression than they have at present, with the *ultimate* end of improving standards in the world beyond the school. As it stands, the passage is a criticism of both the schools and present-day society, and indicates the need for a critical examination of both. That such changes are possible as would result in major social reforms was indicated by Professor Julian Huxley in a recent address. Reporting this address, the *Sheffield Telegraph and Star* for 12th February, 1936, stated, "The speaker thought that if scientific research in Psychology were applied to education it should be possible to bring up a generation who would be practically free of difficulties due to complexes, who would live a saner and happier life, and who would not be prone to capture by the emotional slogans of this or that party." It would therefore appear to be imperative that education should cover the vital years of adolescence both in the interests of the individual himself and of the society of which he is to be a member.

This conclusion is reinforced by other considerations. Earlier in this work it has been demonstrated that there is a falling birth rate, and further, that there are sources of ability which are as yet untapped. An organisation which failed to develop and utilise its material resources and which sat and watched them run to waste would be looked upon as incompetent and deserving of failure. But the stage at which society views as lunacy the neglect of its human resources has not yet been reached. It cannot be argued that there is a surplus of human energy available for the right development of society, even if it is true that there is an excess of production in the material field. Society would benefit from the development of its present human resources. It is possible to go further than this, and say that it is *essential* that they should be developed if Western civilisation is to avoid disaster. If this is true to-day, it obviously becomes urgent in a diminishing

population. Where there are fewer children it is imperative that all their capacities should be developed. It is no use waiting until the catastrophe is upon us. The children now at school will have to face the changes which will be forced upon society by the rapid decrease in population, and they must be given every possible weapon to equip them for their task. The chief weapon is that conferred by a sound education ; to refuse to furnish it on account of economy is to adopt a selfish policy, one which takes no thought for the life of the members of the future society. On this second count, therefore, a raising of the school age to cover the period of adolescence appears to be the only sound policy.

Stress has been laid upon this purely from the point of view of the needs of an educated democracy. Other reasons are sometimes adduced. It is argued that the raising of the school age will reduce adult unemployment, or will absorb unemployed teachers, or will keep adolescents from deterioration. All or any of these results may be desirable, but they should come as subsidiary results to the one *positive* task of creating a society capable of facing the difficult days ahead.

The raising of the age to at least sixteen would abolish the existing cleavage between "secondary" and elementary education. The average leaving age at existing Secondary Schools is sixteen years. Some small proportion of children stay on after that age, but sixteen is the age recognised as that marking the conclusion of the normal school course. A *general* leaving age of sixteen would remove the major obstacle to the provision of a general scheme of education. It would make it possible to abolish the Minor Scholarship examination now commonly held for children from ten to twelve, and with that would go much of the existing bitter spirit of competition for a few places in a Secondary School. All senior schools would become Secondary Schools—with a wider conception of the meaning of the term "secondary education." The changes would mean further that opportunity

of development would be provided for all children of whatever type of ability. The case for such a raising of the age seems to be unanswerable, and seems to have everything in its favour. It would seem wiser to raise the age to sixteen and abolish irritating differences rather than raise the age to fifteen and leave just one year between the leaving ages of "Secondary" and "Primary" Schools.

(b) *Administrative Areas*

Reference has already been made to the fact that there are different controlling bodies for "elementary" and "secondary" education in some areas, and to the need there is for some change in this system of control. The first Hadow Report stressed the desirability of the education of all children beyond eleven plus being considered as secondary education, while the development of the re-organised Senior Schools has resulted in much work of a recognised Secondary School standard being carried out in them. If the school leaving age were raised to fifteen, there would be still less reason why the Senior Schools provided for the majority of children, and those for the selected few, should be kept under two separate codes of regulations. If the general leaving age were sixteen, every reason, except that of snobbery, would disappear. It is, therefore, imperative that this question of administrative areas for education should be considered in conjunction with that of raising the school leaving age. The present position arises from the undue influence of tradition, and is a relic of the past which might well now be relegated to the museum of educational curiosities. The present position is that County and County Borough Authorities are what are commonly known as Part II Authorities, and as such are responsible for the administration of both Elementary and Secondary Education, while the non-County Boroughs and some Urban Districts are known as Part III Authorities, and as such are responsible for Elementary education only. In the areas of such Part III Authorities,

Secondary education is controlled by the Part II Authority in whose area the Borough or Urban District is situated. Many Part II Authorities delegate their powers for Higher education to the Part III Authorities in their areas, while others do not. There are also wide differences in the degree of freedom given by the Part II Authority to the Part III Authority in its area. The present position cripples the activities of the Part III Authorities, and prevents them from developing comprehensive schemes, since, strictly speaking, they can only provide "elementary" education. And the conception of what constitutes elementary education has to be made very elastic if it is to cover all the work done in the modern Senior Schools. Several suggestions for dealing with this difficult problem have been made. One is that the work of the new Senior Schools should be recognised as Secondary and that the control of them should pass from the hands of the Part III Authorities into those of the Part II's. This would leave the Part III Authorities with the care of elementary (primary) education only. Clearly this would be the first step towards the complete abolition of Part III areas. The latter is the second suggestion which has been made—that the Part II Authority should control *all* forms of education within its area and that Part III Authorities should be eliminated. Some recent legislation suggests that there is a measure of support for this solution. Powers have been given to Part II Authorities and not to Part III ones. It is true that there is usually a clause permitting the Part II Authority to delegate its powers, should it so decide, but this would appear to be a device for utilising the existing Authorities pending their absorption. The real result of these acts is to curtail the powers of the Part III Authorities, and such curtailment is a sinister omen. After curtailment of powers may come complete abolition. A third suggestion sometimes made is that *all* authorities should be made responsible for all forms of education within their areas, *i.e.* that Part III Authorities

should take over, in their own areas, the control of Higher education.

But to abolish Part III Authorities, either by absorbing them in the County areas, or by giving them complete powers, does not solve the real problem. Such a step would still leave a number of areas in the country too small for effective control, while there would be others so large as to be unwieldy. It is as ridiculous for Part II Authorities to argue that they should absorb all Part III Authorities as it is for the latter to claim that they should all continue to exist. The need is for educational areas, focussed upon some suitable centre, and large enough to enable the educational services within them to be organised efficiently. The conception is that of the country divided into a number of educational provinces. There is a precedent for this in the developments now taking place in the control of such services as the supply of water, electricity, and transport. In the earlier days of these services there was much to be said for the policy of placing the duty of providing them in the hands of existing authorities. But the increase which has taken place in the number of duties so delegated, and the extension of the services themselves, have made the duties of the average County or Borough Council so multifarious that a consideration of the whole problem of Local Government is necessary. The advantages of co-ordination both now, and in connection with the problem of provision for the future, have become obvious. Water Boards, Electricity Boards and Transport Boards have been established, and there seems to be an equally good case for the setting up of Education Boards.

(c) *Buildings*

The building is not the school—it is the physical basis in and about which the school develops. Many excellent schools have been developed in poor buildings and *vice versa*. On the other hand, the provision of suitable and adequate buildings

enables more effort to be concentrated upon the real work of the school—that of developing the children. When the difficulties caused by badly-planned and inadequate buildings are always before the mind, there is a tendency to believe that the removal of these difficulties is all that matters. Many Authorities are being confronted by problems caused by slum clearance and housing schemes. Others have congested areas in which it is impossible to obtain new sites, and in which the existing schools have no space available for extension and present no possibility of reconstruction. Difficult problems arise in both sets of circumstances, but in the case of the new housing estates foresight should result in planning. It is now recognised that to plan a school without adequate provision for playing fields is to be guilty of lack of forethought, and that sufficient space around the school must be controlled to permit of extension should this become necessary. But it is not always that a further preliminary step is taken. The site for the school or schools on an estate should be decided upon before the houses are erected, otherwise the only available sites may be unsuitably placed. The schools should serve as the cultural centre for the estate. In them (suitable rooms being provided for the purpose) should meet Estate Associations, Dramatic Guilds, Clubs, etc., while social events, concerts, lectures and cinema shows should be given. The weak point of many new housing estates is this lack of facilities for cultural activities upon them. Housing in the purely material sense is not enough. There must be provision made for, and encouragement of, all those activities which will turn a housing estate into a living community. The great need for such provision is now generally recognised, and its importance for the adolescent is stressed in a recently issued Report of the Board of Education Juvenile Organisations Committee (Report on the Need for Youth Community Centres on New Housing Estates). It is pointed out therein that “only rarely has it been found possible to provide a community centre for any of the

new housing estates,” and “nowhere has a centre yet been provided adequate to the needs of the community.” Again, “little imagination is required to realise that it is not enough merely to rebuild slum houses elsewhere, but that there must be adequate means where life can be made enjoyable, co-operative and progressive.” The Report points out that centres for adolescents and adults should ideally be complementary, the one to the other, and that their common use is not a satisfactory solution. “The most practical solution is to provide under one roof a sufficiency of accommodation to give effective separation of adults and juveniles, as for example, two wings in one building.”

There is no doubt that there is an urgent need for such community centres, and that their development would have far-reaching cultural effects. It is clear that they can best be developed in connection with the new schools now being erected upon housing estates. A certain amount of the provision can serve a triple purpose of use by the school, adolescents and adults. And the cost of providing the additional accommodation required would be less if it were part of the larger scheme than if it were carried out independently. The school would not be “a thing apart,” and the closer contacts and community of interests which would develop between the residents of the estate (who would be largely coincident with the parents of the children attending the schools), could do nothing but increase the effectiveness of the education provided. The type of provision required for this communal work would include a gymnasium (with changing rooms and shower baths), club rooms, workshops, light craft rooms, a library, a canteen, smaller rooms for use as offices, a committee room and a hall, with a properly equipped stage, bioscope and the necessary dressing-rooms.

For the school building itself, light, air and bright decorations are essential. There seems no doubt, too, that the old classroom is passing. In Infant and Nursery Schools space is

essential. It is entirely unnatural for children of the ages from two to seven to sit still. It is through activity that they learn. Facilities for "pets," for drama (trees and grass banks are invaluable), rhythmic and dancing are all essential. Above all, space is required—lots of open floor spaces unencumbered by benches and tables. Sleeping accommodation, a dining-room and washing facilities are all necessary. A garden should always be provided, and the apparatus should be constructed for individual and not mass use. With such facilities, good physical habits can be inculcated, social training can begin, and the senses developed. It should be noted that the success of Infant and Nursery Schools is due to the fact that the children are brought into contact with *things*, and encouraged to enter into fuller life, not to retreat from it. It is regrettable that this sound principle is forgotten in the subsequent stages of education. In the Junior School space and facilities for "free" activities are still an essential. A short time ago, a certain Authority presented a Report upon the re-organisation of a particular area under its control. Of a certain school it stated, "This school should become a Junior School, since the rooms are not large enough for Senior School work."

This indicates a view of the Junior School child which is entirely false, but far too prevalent. It is based upon a conception of the amount of space in which he can sit still and absorb facts and opinions, not upon that needed for the activity which brings development.

Activity is characteristic of him, and to argue that because he is small he requires little space, is to use analogy in the worst possible way. Once again, these children require space in which they can move about and in which they can *make* and *do*—the characteristic activities of young children. Generally speaking, Junior Schools have benefited by far the least in the first stage of re-organisation. It is recognised that existing buildings must be utilised, but the space given by decreasing numbers should be used to make the poorer building more

adapted to its purpose. A hall is essential in every case. In Senior Schools there has been a more general recognition of the need for providing for activities of the non-academic type. But many schools still have to work under conditions which render real progress well-nigh impossible. A good and well-equipped gymnasium, an art room (not a classroom used as an art room), a science laboratory, a hall fitted with a good stage and a cinematograph, and various types of classrooms are *essential*. To these should be added in any new schools a library, a music room, rest rooms and an "interview" room for dealing with vocational guidance, together with the necessary staff rooms. Such a school could develop into the multi-bias Secondary School visualised in the earlier part of this volume.

In any area there will be required certain special institutions to deal with special classes of children. The need for a Psychological Centre has been pointed out already. If it is correct that psychological research applied to education could result in a removal of many of the complexes from which so many people suffer to-day, and could make for a saner and happier life for all, then delay in this matter is more than criminal. A conveniently situated building where minor mental ailments can be diagnosed and treated, where causes of juvenile delinquency can be investigated, and where vocational advice can be given, constitutes the first need. The building should provide waiting rooms, testing rooms and rooms for remedial treatment. There should also be provided facilities for research by the staff, since such work is essential to maintain and develop the open attitude of mind. There should be a children's medical psychologist, an educational psychologist, a social worker and other helpers on the staff. Such a centre can do much to assist in the removal of those obstacles which prevent children from realising their potentialities, while it can also do much to cure cases of delinquency. All those interested in this subject should read Dr. Margaret Lowenfeld's

recently published book, "Play in Childhood." This volume, written by one of the pioneers of psychological work among children, is an inspiration to those who realise the benefits that such work can confer on children.

Special provision is also required for physical defectives and for those children whose mental defect is irremediable. For the physical defectives the essentials are equipment and facilities which will enable them to overcome, as far as possible, the disability caused by their defect, and to develop compensating abilities. For the mental defective provision should be made for training in good physical habits and in such social activities as they are capable of performing. Classes will be small, since the work here must be individual—suited to each child.

The School Journey and Camping movement has proved the value of a change of surroundings in many cases, both from the physical and the mental standpoints. There is much to be said for all Educational Authorities whose areas are industrial ones having under their control some centre which they can use as a "holiday" school for certain cases. A quiet, secluded building in country surroundings is the ideal place, and such places are not difficult to find when so many country houses are being diverted from their former use and being converted into Youth Hostels and similar institutions. In peaceful surroundings, with good food and regular sleep, and with the social education which can be given in such places, the sick child gains renewed health and courage, and is able once more to take its place amongst its normal fellows, while the normal child widens his contacts, enlarges his interests, and is brought into touch with aspects of life other than those in his home area.

(d) *Equipment and Apparatus*

Earlier in this volume some reference has been made to equipment. In the Infants' and Nursery Schools a good variety of educational toys and apparatus for sense training is

essential. A simple type of rest bed—easily dismantled and stored—is necessary, and brightly-coloured ware for meals. A plentiful supply of mats (young children prefer the floor to the formal seat), together with chairs and tables specially designed for doing things, completes the list of desirable equipment. Paper, crayons, pencils (thick), etc., are all included in the apparatus required. A piano, a gramophone and suitable records, and percussion band instruments provide music for games, exercises and training. In the Junior School, locker desks in some rooms and flat tables in others seem to be the best combination, with the proviso that the desks must not be allowed to determine the nature of the work done. There is very much to be said for rooms without desks, but with a few tables of suitable size and height.

Wash basins in some rooms, gas points (for craft purposes), a water supply and storage room are all essential. Above all, there must be space to move about. Provision for music and organised games must be made, together with the usual school stationery. Books should be well-prepared and printed, and variety is better than uniformity. In these days, some really excellent samples of the book producer's art are available for school use, and such books instil a love of the beautiful in the child's mind. In the Senior Schools, machinery for use in various crafts, a bioscope and an epidiascope should be added to the usual equipment of the good Senior School. If education is to cease to be academic, then facilities for dealing effectively with the other interests developed must be provided. A subject can be damned by the provision of shoddy facilities for carrying out the practical work involved.

APPLICATION OF PRINCIPLES (II)

(CURRICULA AND METHODS)

“An education that does not begin by evoking initiative, and end by encouraging it, must be wrong.”

“The School should deliberately provide opportunities and material for the study and discussion of the main social and political problems of the day.”

“When I have done with him, he shall not be a grammarian, or a geographer, or a scientist. He shall be first and foremost a man.”

CHAPTER VII

APPLICATION OF PRINCIPLES (II)

IT is in curricula and teaching methods that change is most necessary, and the two are inextricably interwoven. School examinations can only test a knowledge of facts; if they endeavour to go beyond this they result merely in the reproduction of some point of view accepted uncritically from the teacher. This pressure of examinations often rules out from the curriculum those very aspects of a "subject" which furnish the best educational media. The prevalence of large classes makes mass methods of instruction the only possible ones in some cases, and this results in the curriculum being limited to those subjects, or parts of subjects, which lend themselves to this type of teaching. When to these two factors is added that of the weight of tradition, both in the matter of what is taught and how it is taught, the obstacles to any real educational re-organisation become apparent. To these difficulties there can be added one more. Many of those engaged in the service of education are themselves the product of the "system," and criticism is far too often stifled by that consideration. It is easier to follow the conventional educational path than it is to function as a member of a creative minority. If in earlier years the possibilities of a real education did present themselves to the novice, the temporary unrest died down quickly, to be replaced by an unquestioning acceptance of the customary. The outer world contributes to this process, since it looks with suspicion upon new ideas wherever they occur—and with peculiar objection if they arise within the school. And so to inertia bred in the crust of custom

must be added fear of incurring the censure of others. So the vicious circle is continued. It must be admitted that it is infinitely easier to adopt the usual method unquestioningly. It means less effort of thought, the handing over of more and more of life to the control of habitual responses. But the teacher should be under no illusion. The things which a child learns first from his teacher are attitudes—not facts. Subservience to the printed word, or to those “in authority,” an acceptance of low standards of taste and work, the substitution of habit for thought—these are all ~~acquired~~ quickly by children. On the other hand, the unrest of the questing mind and the courage that seeks for truth “whithersoever it may be found” are not lost. For the growing child has the spark of that same spirit within him, since it is the spark which has carried mankind forward from the slime. The methods employed and the curricula followed should develop and strengthen this spirit of unrest. The function of a school is to send out into the world young people who are discontented, but who have such informed wills that they will be driven to attack the sources of their discontent. If the schools continue to send out complacent individuals who are willing to submit to a dictatorship of both thought and action, then the fate of our civilization is certain.

When a Bill to raise the school leaving age was introduced by the last Labour Government, there appeared in *Punch* a cartoon indicating that the child of fourteen was not anxious for another helping of “that old stuff.” The suggestion was timely and to the point. There was, and is, a danger lest the raising of the school leaving age should be used merely to extend the number of those subject to the current type of education. Owing to the fact that this latter has been the gateway to certain occupations, and because it could be obtained only by payment (of part of the cost only) or by competition, it has been estimated at a value far above its worth *as education*. Whether it really educated (*i.e.* whether it developed

latent capabilities) was not considered. It opened the door to "respectable" and "safe" occupations, and that was what mattered in a world characterised by uncertainty and fear.

With the school leaving age raised to fifteen or sixteen, the whole position would have to be thoroughly examined. The curricula of both existing Secondary Schools and post-Primary (Elementary) Schools must be brought under review, as must also the methods of instruction used. It would be disastrous if, as the school leaving age were raised, the new Senior Schools lost their identity by the process of imitating the curricula and methods of existing Secondary Schools. Yet this is a very real and present danger. The danger is lest the prestige (not so much educational as economic) of the term "secondary" may lure educationists into an entirely false conception of the meaning of the phrase "secondary education for all."

This danger of widening opportunities for secondary education resulting only in an increased number of those passing through the present unsatisfactory secondary school course brings about a reaction in some minds which results in a danger of quite a different nature. Rebelling against an "academic" education of the type now provided, such reformers seek salvation in a "practical" type of education. Various forms of craft work replace studies in mathematics and languages, and it is claimed that *this* is secondary education for the masses. This distinction is a false one. The essential features of all good craft work are design, choice and use of material, and executive ability. An essay, or the solution to a problem in mathematics, may be good craft work just as much as the making of a model aeroplane or a rock garden. Those who have been most involved in this controversy have failed to realise the underlying truths. The "academists" have not realised that creative power can be developed by the use of wood, or stone, clay or soil, just as much as it can through the medium of words and figures, while the "practicalists"

have not understood that it is possible to use words and figures in the same creative sense as other raw material. Spearman has pointed out that there is one general factor which permeates all our activities—our general intelligence, and the only deduction from this is that performances in craft, and academic studies will be correlated. The specific factors which operate in addition to the general ones may affect individual performances.

These two errors must be avoided if the curricula and methods of the new schools are to be based ~~upon~~ sound principles. There must be neither slavish imitation of the old academic education, nor an unreasoning and unreasonable revolt from it. There must be some principle underlying both the construction of the curricula and the development of method. It is suggested that the principles can be stated generally as follows. It is recognised that children have varied capacities and abilities and differ widely in their interests. It is admitted that the primary function of the educational system is to provide such an environment (human and physical) as will develop these capacities and interests and so lead the child to creative activity. It is believed that in such an environment the child will develop initiative and independency and so the adult will cease to be an unreasoning adherent to political and other dictatorships. The actual medium in which the instruction is to be carried out will vary with the children. For some, words will be the medium (again it must be emphasised that it is not the mechanical use of words that is intended, but the craftsman's skill in varying degrees that is to be developed), for others stone, numbers, soil, and so on, will replace words. The *essentials* of the method will remain constant whichever medium is employed: it will vary in details with the medium. So, too, the essential *purpose* of the instruction will remain the same whatever child is being educated.

Such a view of the purpose and content of the curriculum

would perhaps do much to remedy the existing lack of co-ordination between the various "subjects" of the normal school course. The school time-table is far too often thought of as a controlling force over the curriculum. The history of education will provide the reasons for this, but although planning of work is essential, there is nothing to be said for a system which insists on a child's interest moving in a series of clockwork jumps from one subject to another. If there were unity of purpose in the curriculum, much would have been achieved. But with an education based upon a conception of activity, the time-table must perforce be much more elastic and fluid than one in which subjects

" . . . cabin, crib, confine, bind in,
To saucy doubts and fears."

The rigid time-table may give the visitor to the school the impression that it is a well-oiled, smooth-working *machine*. It may feed the lust for power so common in the human race to see staff and children move like automata at the sound of a siren, bell or whistle. But these are the first steps on the way to robot-like actions, and as such entail grave dangers. Some types of instruction, such as the teaching of technique in language, numbers, or craft activities, can be given satisfactorily when working with a fixed time-table. Others cannot, and the problem of the time-table can only be satisfactorily solved when this fact is recognised.

Another factor which has a bearing upon method is the nature of the class which forms the teaching unit. There is possible, theoretically, classes of every size—from one to hundreds. With classes of one or two, completely individual methods of instruction are possible, although there may be wanting facilities for social education, while at the other extreme the over-large class means that only mass-instruction can be given. There has been a tendency to reduce the size of classes, and this tendency will receive a further impetus as the number of children in the schools falls with the falling

birth rate. There are many questions, however, which await an answer based upon sound investigation. What are the upper and lower limits of the most satisfactory class—the one which can be taught effectively? Does this size vary with the age of the pupils?—it has been *assumed* up to present that it does. Does it vary with the type of work being attempted? And beyond these questions lie others bound up with the *nature* of the class as a teaching unit. Should it be as homogeneous as possible—both in age and ability? Or should it be composed of children of varying ability? ~~There~~ has been a decided tendency recently to make the class as uniform as possible both in respect of age and attainments. The reasons given are usually that more rapid progress can be made under these circumstances and that it is possible to grade the work to be done in keeping with the capacities of the children. It is admitted that these are sound reasons for the customary procedure, but there is need again for a thorough investigation of the problem. It may be that uniformity of age and attainment in the class leads to a uniformity which is akin to mass instruction in the methods used. There is also a more subtle danger lest a wrong estimation of the ability of any individual child may be made—by parent, teacher or child—because the standard of reference is the class in which he is working. The group is a selected one and the estimate might be different in a non-selected group. A further factor which should receive consideration is the fact that the more uniform in age and ability the class becomes, the more remote it is from the actual conditions of social life. It tends to make the schools reflect, perhaps only faintly but still definitely, those static, organised states of the Utopias which place every citizen in his pre-destined groove, and some actual dictator-ridden states of modern Europe. It may well be that uniform groups are advisable, or even preferable, when the tools of education are being taught, but a more natural grouping of the children might be advisable under other circumstances.

Uniformity of age and acquirements tends to lead to comparisons and competition. Co-operation is natural in a varied group and the valuable lessons of social help can be inculcated in such a group.

Recently much has been written and spoken on the subject of education for leisure. Partly because of the larger numbers of unemployed juveniles and adults and the need for providing them with opportunities for occupations which will do something to prevent their deterioration, partly because of an increasing recognition of the fact that the solution of the problem of unemployment lies in a reduction in working hours of those employed, and partly because of the mechanical nature of much work with the resulting need for human interests outside working hours, this problem has been to the forefront in discussions upon education. There is no doubt that the deadening nature of much of the work of the world and the gradual desirable increase in the hours of leisure, make it essential for the educator to consider to what extent the education that is provided develops interests which will continue to develop when the child leaves the school. There are a number of indications that this has not been the case in the past. Has the literature read in schools *generally* developed an interest which has been of value in later life? The circulation figures of various public and other libraries cannot be quoted as evidence that it has, for much of the reading is undertaken as a retreat from life and not as an approach to it. Again, much science teaching (a change is taking place here) has been of little value as a stimulant of interest. Yet in recent years there has been seen a wide development of the hiking movement, with the result that an ever-increasing number of adolescents are walking through country rich in botanical, zoological, and historical interests. There is a tendency to count the success of the walk by the mileage covered and not by the experiences gathered. Yet if the Senior Schools developed an interest in bird life, animal

life, plant life, the structure of rocks, and what might be termed "field history," there is no doubt that there would be much *more* of interest for the hiker on his tramps abroad. These are the lines of approach to the question of "education for leisure," but it will be observed that the method is a general one, that of developing interests in such a way that they will lead the individual into life and give him the will to face and attempt a solution of its problems, and not drive him to seek for retreats. It might be said with truth that there is no real problem of a special education for leisure, but only ~~the~~ the general problem of supplying the best kind of education. The educated individual will occupy his leisure in a rational manner. In fact, one of the best descriptions of the educated person is that he can enjoy his own company, and one of the most acute tests of such a person is what he does with his time when he is not *forced* to do anything. As it was expressed in a booklet, "The Coming of Leisure," which was prepared prior to a conference organised by the New Education Fellowship and held at St. Andrews in August, 1935 :

"Up to now our national education has been based on the belief that we must teach a child a certain number of 'subjects' which shall have some relevance to the way in which he is to earn his living, which will equip him with a modicum of knowledge, and perhaps give him the facility for acquiring more. The fact that he is a living personality with an inborn right to attain 'completeness' has been but slowly recognised. And the realisation that without this completeness he cannot be an adequate member of society has come more slowly still. The idea of educating for the 'complete child' involves a type of education which satisfies the physical, intellectual, emotional and spiritual sides of human nature and which recognises no separation between work and play. More than adequate efforts have been expended on the intellectual training of the child ; the

time has now come for recognising his need of all those activities which we lightly place under the heading of 'leisure time occupations.' ”

With the power of using leisure time in a rational way, its exploitation by the providers of commercialised amusements would cease.

One of the disquieting features of modern life is the desire of people, young and old alike, to be amused and entertained by others and their willingness to pay considerable sums for this to be done. The stimulus has to come from without ; it does not originate from within. Yet young children exhibit an opposite tendency. They want to *do* things themselves, not for other people to do things for them. Montessori has related the story of the child who sobbed when its bucket was filled with stones *by the nurse*. The reason for the change from the love of activity characteristic of the child to the desire of the adult to be amused must be somewhere within the realm of education. In the modern adult there seems little left of the urge to create or to do—either culturally or politically, socially or religiously. We live on the culture of a past age. Our lack of interest in political matters is shown by the small percentage of votes cast in any ordinary municipal or national election—and many of those who vote do so in a sheep-like manner at the nod of some dictator—openly acknowledged or otherwise. Desirable social changes are retarded by the passivity of those who could do much to effect them. It is not that the urge to do and to create is not present. The fact is that it is repressed and not developed—that it is sacrificed to the development of conventional modes of thought and action. And yet, as Professor Whitehead has written, “An education which does not begin by evoking initiative and end by encouraging it must be wrong.” The general opinion of workers amongst young people of fourteen to eighteen would seem to be that it is most difficult to arouse in them any interest in further education, and that the young people of to-day are

unwilling to accept responsibility. While not subscribing entirely to this opinion, it has to be admitted that it contains an element of truth. The responsibility would seem to be with educationists to see that young people are given the opportunity to adjust themselves to a changing world. Adolescence tests not only the young people themselves but also the educational system under which they have been developed. Admittedly it can be argued for the defence, that up to the present time the majority of young people have been deprived of guidance at the very time when it was most needed, owing to a low school leaving age. And if this disability has not yet been removed, much can be done to hasten its removal and to prepare for that type of education which is essential as a preparation for life in a changing world.

In the attempt to unify the curriculum and to make it more dependent upon interests than upon subjects, the views expressed by Branford in "Janus and Vesta" may be found to be helpful. He suggests that on the basis of their main interests people can be classified into three groups—Humanists, Scientists and Craftsmen. The Humanists are mainly interested in literature, history, etc.—the nature and life of man. The Scientists are concerned with the investigations of mankind—in whatever sphere of thought—they are concerned with a *method* of investigation. The Craftsmen are interested in the work of mankind (in a wider sense than that in which the word is often used)—his arts and crafts and practical abilities. The Scientist and Craftsman must also have something of the Humanist's outlook, just as the Humanist will find interest in the investigations of the Scientist and the work of the Craftsman. Here is a suggested basis for the development of the new Senior Schools on the multi-bias plan already suggested. It gives a three-fold division, with Humanistic studies as the connecting thread. It places Craftsmen on equality with Humanists and Scientists and develops in each respect for the others.

It should be noted that Humanistic studies furnish the connecting thread which should run through the whole of the curriculum. Herein lies the germ of that ability to understand, and having understood, to control, the human forces. It has been stressed that one of the main causes for the troubles of our civilisation is the neglect of these human powers to the exaltation of mechanical forces. The new education must lead to realisation of the importance of the human element in civilisation and of the need for control of passions if the giant forces developed by mechanics are to be adequately controlled and beneficially used.

If it is argued that the nature of the environment militates against such an education as visualised herein being practical, it should be remembered that a falling birth rate should bring with it a better environment and that this should in turn react upon the ability of children to profit by the scheme proposed.

The foregoing principles are applicable to all types of schools and should govern in a general way the whole of the school activities, while the methods used should be based upon their application.

Infant and Nursery Schools

The provision of Nursery-Infant Schools for all children between the ages of two and seven years would make it possible to carry out effective training in sound physical habits and to provide for progressive sense-training. The fall in the birth rate will reduce the numbers in these schools and enable that space to be provided which is so essential if the activities appropriate to young children are to be carried out. Present Nursery School methods should be used throughout such schools. They are not intended to give a few children a "flying start" in the educational race, nor is it intended that formal instruction should be commenced at an earlier age than is now the case. These children have to have a varied assortment of apparatus (which need not be elaborate) in order that

they may be brought into contact with real things. In the Nursery they receive an invaluable social training and a sound foundation is laid down upon which the rest of their education is to be based. Attached to such schools there should be a garden and some lawn. The whole object of the Nursery-Infant School is to develop and not to repress. It has been pointed out already that the justification of these schools is their necessity from the point of view of the educational process. They enable sound foundations to be laid. Incidentally they perform, in many areas, a social function, but this is a secondary and not the primary purpose for their existence. The provision for Infants has always been one of the brightest spots in the educational history of this country, and there appears every likelihood of a continuance of this happy state of affairs.

Junior Schools

Of the Junior Schools it is not possible to speak so hopefully. The blight of the Transfer Examination at eleven plus is operative throughout the course and leads to an emphasis on the three R's out of all proportion to the needs of the children of the Junior School ages. The Junior child *can* be taught arithmetical rules and spelling. His memory is probably as retentive as ever it will be, and this ability should be used. But this is not the whole of the story. Anyone who has studied children of this age must have been impressed with their interest in making and doing, *i.e.* with activities that have a basis on reality and which constitute approaches to life. This interest can be made to serve as the basis of much that is real education. It is education of the type visualised by the Report of the Hadow Committee when it said that the Junior School curriculum was to be thought of as "activity and experience, rather than of knowledge to be acquired and facts to be stored." The child of Junior School age is a confirmed individualist, with interests and capacities of his or her own.

All too soon these children learn to wear a mask—or, rather, a series of masks. They commonly have one for each parent and one for each teacher and use these masks to prevent undue probing into the real child behind them. They are shy and diffident and often live in a world over the entrance to which is written, “No admittance to adults.” It is the task of education to provide an environment in which the child’s capacities can be developed and in which its interests will grow. Far too often the reverse is what occurs. Capacities with which the child is well endowed are overlooked and not developed, while one which is weak is overpressed. Failure to respond adequately leads to a loss of self-confidence and the child develops an inferiority complex which forms the greater part of the attitude to life which he takes from the school into life. It is not to be wondered at that such children in later life feel a sense of inability to cope adequately with a complex and changing world, and seek what appears to be safety in custom and dictatorships. The idea is still current that education is only gained from books and that the still-seated attitude is that which is necessary. It is experience in handling things and in doing things which these children need, and this implies movement and activity and not passivity. The child must be guided in the direction of “those ends which his own spirit is obscurely seeking.” The “making and doing” of the Junior School must find its origin in the interests of the children. Much so-called craft work is sham—the children have no interest other than that of satisfying the demands of the teacher—either in its origin or in its process or in its completion. From each “centre of interest” there radiate paths in many directions which furnish possibilities for work of a varied type. Composition is a subject in which the benefit of this is soon apparent. Everyone who has had much experience with children recognises again and again ideas in children’s essays—and actual phrases—which are not the children’s, but the teacher’s. The practice involved by such “compositions”

may benefit the teacher through the effort to express ideas concisely and clearly—but it is the *child* that should be receiving training. And there are children's ideas and a children's vocabulary (a very different thing from a *childish* vocabulary) appropriate to the stage of development reached. To encourage a child merely to reproduce the ideas of another is the first stage on the slippery slope to approval of dictatorships. The teacher's task here is a difficult one. Very often much excellent and strenuous work goes largely unrewarded because it is misdirected. There are teachers who are so active themselves that there remains little time in which they can allow the children to be active. Young children should not be expected to be unnaturally quiet. If they are, it is time to suspect what is their *real* activity. The teacher has often to wait and watch—wait for the right moment to intervene and watch for the signs of awakening interest. It is harder to do this, and it is less impressive than for the teacher to be always active. Here another point arises—the place of co-operative work. Far too often children are led to the conclusion that working together is cheating—that each must work by himself in an effort to beat the rest. This may be a satisfactory philosophy for the few who are successful. It can be nothing but disheartening for the many who gain from it only the knowledge that in what apparently matters in school life they are failures. The evil of it does not finish there. The doctrine of competition is enthroned and carried into the world outside the school, and becomes ultimately one of the sources of that blatant nationalism which is characteristic of the age. By some strange reasoning, co-operative craft work is often permitted, but co-operative work in arithmetic is termed “cheating.” This error has arisen from the over-emphasis of the academic aspect of education. In the past, success in such work has been the pass word which has opened the gate to certain types of work. An academic education was supposed to train the mind for such work and, on this assumption, the

student who had imbibed most would be most suitable for the work. So the test was the examination result, and competition between individuals for top places. Two things were overlooked. First of all there was the assumption that a correlation existed between examination success and capacity for certain types of employment—a correlation which has yet to be proved. Secondly, it was not remembered that only the formal aspect of a subject can ever be tested by an examination. One cannot test the experience which the child undergoes. Education becomes a process of acquisition, and the educated man seen as one with a goodly hoard of facts. Education as the development of an attitude to life is overlooked. Why children in real difficulties should not assist one another in arithmetic or English it is difficult to see. On occasions it is, of course, necessary to test the child's own work, but often a word or two of explanation from another child will do more than much explanation from the teacher. The two children are nearer together in outlook and experience than the child and the teacher can be, unless the latter is possessed of a child-like (not childish) mind. It may be argued that there is a danger of the lazy child accepting passively any help offered and so being confirmed in his laziness. Even if this were so—is the danger greater than that which now exists, of the child being convinced that it is only through competition that success can come? But it is not admissible that this laziness *would* be encouraged. Some tendency that way might exist in the early days of the change-over to this new method. But a skilful teacher could correct it and the sense of fairness which is characteristic of young children would help. The result would be the replacement of a spirit of competition between children by one of co-operation, and “there is no joy like the joy of those who have sweat together on a common job.”

The curriculum of the Junior School should be overhauled, not only with the view of eliminating those parts which are

unsuitable, but also in order to consider if there are omissions which should be made good. It must be remembered that the present curriculum is still the one which was considered essential in the early years of the Elementary School. As has been pointed out, the "transfer" theory accounts for the inclusion of some subjects, and custom and tradition for others. The real tests are those previously stated—does the work give the child an approach to life, and not a retreat from it? Does it develop in him an "awareness" and the desire to create—no matter in how humble a manner? The preparatory course of many who proceed to higher education is different in content and emphasis from that given in Junior Schools. If the leaving age is to be raised and *all* post-primary education is to be secondary, then it is essential that the Junior School must give a sound preparatory education, not a sound preparatory *elementary* education. This raises the question of the place of foreign language teaching in the Junior School. It may be objected that to include a foreign language is to do the very thing to which objection was taken earlier in this Report, *i.e.* the undue stressing of the academic side. But whether this were so or not would depend upon the *motive* for teaching it, the *method* of teaching it, and the *attitude* towards it. The world becomes more and more one unit and people live closer together than ever before. The days of isolation have passed—in spite of some people's loud-voiced reiteration of a parrot cry that in isolation is safety. The fact is, that isolation is impossible in the modern world, and no more need be said about it. English children know there are French children and German children and Russian children—and take an interest in the lives and activities of these children. Their games, their books (so long as they are the equivalent of their own "twopennies" and not "classics," in which children only take a polite and formal interest because in some strange way it pleases the adults who preside over their destinies!), their songs and their work have an attractive interest. Here

we have the real motive for language teaching—the desire to enter more fully into the lives and minds of the people whose language is to be learnt. Games in the language, songs in the language, plays and stories in the language all extend the vocabulary learnt, and so long as the learning is an *activity* and not merely the acquisition of rules (the proper time for these comes later—we teach children to speak and read before we teach them grammatical rules—even in English) nothing but good can result. It is suggested that the desirability of teaching some foreign language (not *necessarily* French—custom accounts largely for the prominence given to this language in existing Secondary Schools) in the Junior Schools on the lines indicated should be seriously considered. The suggestion may be contrary to the present regulations for Elementary Schools—in which case the sooner the regulations are altered the better.

In all that has been said about the Junior Schools, the aim has been to suggest means by which the competition which stultifies real educational work can be eliminated, and the varied interests of the child can be made the basis of a full and sound education in and through *activity*. The Infant Schools of the country have always had (largely on account of their separate origin) a spirit of freedom and elasticity permeating them. The new Senior Schools have now their opportunity to break new ground. The Junior School has been placed in bondage. It is waste of time to attempt to allocate the blame for this. What has to be done is for all those concerned with, or interested in, this work to devote thought and effort to breaking the bonds and to substituting freedom for them. A freer timetable (*can* a Junior child split up his interest as exactly as the prevalent timetable does it for him?), a freer discipline, a freer outlook are alike necessary. Until these are achieved, there can be no satisfactory educational re-organisation.

Senior (Post-Primary) Schools

It is the new Senior Schools that the fruits of the work carried out in the Infants and Junior Schools is garnered. In much of what follows it is assumed that the school leaving age has been raised to fifteen or sixteen. This does not detract from what is said. The days of a leaving age of fourteen for most children are over and any practical discussion must deal with what will be to-morrow—not what is to-day. Amongst other activities which might be expected to find a place in a school which forms a healthy progressive society are : music (orchestral and choral), literature and the drama, discussion groups on political and social topics, applied scientific studies (especially field work in Nature Study—a necessity when hiking has such an appeal to youth), archæology (hikers again !), art (for producers and consumers), wood and metal work of various kinds, elementary engineering, physical training, etc.

ENGLISH is, of course, a basic activity and should have for one of its aims clearness of expression, good speech, and an “awareness” of the works of great writers ! Good speech is one of the most valuable means for removing undesirable social differences, while the value of an ability to express ideas accurately and clearly is too obvious to need argument. But mere repetition of the ideas of the teacher is useless. Children can describe what they have experienced, but such work means individual compositions. The easier path is that of reproduction of the teacher’s ideas in very slightly altered phrasing. This teaches the children nothing except a ready acceptance of the ideas of authority and makes them ready soil for the growth of dictatorships. The same is true of uncritical reading. There is far too much study of what are called “classics” in our schools. Examinations are partly responsible, but perhaps even more at the root of the matter is an unexpressed conviction that our taste must be impressed upon others. There is an element of grim humour about this, for

as adults we do not commonly read those books which we prescribe as suitable for children. In other words, we follow tradition and convention in this matter as in many others. And, because we (or some external examiner) measure our success by examination marks, we have to concentrate the children's attention on those parts of the work which provide suitable examination questions. These are the formal parts—definiteness is essential and this is the inculcation of opinion. The æsthetic value cannot be measured nor the emotional reaction tested. So we use unsuitable works and select the less important aspects of such works for intensive study as an introduction to the study of English literature. And we dare to be surprised that children fail to *develop* a taste for literature in after life ! The development of any interest must start with something in the child's mind. Adventure, thrillers and school tales are the staple reading diet of children from nine to thirteen (boys and girls). *From* this reading the interest in literature must take its root. Mere gibing at the schoolboy's "twopennies" won't do it. All that it does is to breed in the child a profound contempt for the teacher's taste. No one can really teach literature to a child unless he is as familiar with the child's *approved* literature (the "twopennies") as he is with the finest classics of the ages. He has to help the child to depart from one station and to arrive at the other, and to do this he must know the station of departure as well as the arrival platform. Too often the child approves what the teacher approves, having learnt that this is one of the things which makes life easier. But this is the way of the Literary Dictatorships, and its effect is seen to-day in the operation of Book Societies (who choose the "book of the month" for you) and of the Literary Sections of the Popular Press (which do the same thing). A chart of "marks" is even published showing those books which by sales or enquiries have scored heaviest during the preceding month. This seems the complete surrender of individual taste and judgment. *Why* can

the Book Guilds and papers do it? And if it is done in literature, is it done in art, in politics, in all spheres of activity? The answers to these questions cause all educationists serious thought.

Recently it has been suggested in several quarters that newspapers should be used more frequently in schools than is at present the case. This has much to commend it, since it is true "that the newspaper will form the only literature with which many of the children . . . will come into contact in their later years." (We cannot stop to enquire *why* this statement is true now—the answer would throw some light on the literature teaching of the past.) One publisher states that the newspaper story provides an "untapped supply of matter possessing valuable characteristics" and refers especially to (a) definiteness, (b) interest and (c) suitability of language. This is getting close to the heart of the matter. Those are the things required in children's literature. Has the literature used in past years been characterised by them, or is it only in the newspaper story that they can be found? The importance of children being able to read newspapers with understanding is recognised, but the interest must not be arrested at that point. And what can be said of the "blurb," advertising an English book based upon newspaper extracts which states, "The exercises in this book are intended primarily for children of *twelve to fourteen years of age, whose Intelligence Quotients range from 70 to 90, i.e. children who are from two to four years retarded.* They have also been found of considerable value when used among children of a *little higher mental capacity and even with bright children of eleven years*" (*italics added*). Comment on this passage would be superfluous! It gives a lurid picture of the accepted view of the mind of the average newspaper reader. To develop discriminative newspaper readers is certainly one of the aims of the teaching of English. But it should not end there.

If there is any truth in the contentions put forward in this

Volume, then it is obvious that an interest in HISTORY, in its widest sense, must be developed in the citizens of to-morrow. This subject arouses controversies, and as previously mentioned, it is often maintained that these have no place in the school. To that there is only one retort. If they have no place in the school, how *are* young people to learn to deal with them efficiently and sensibly in later life? We have taught "facts" for sixty years. The teaching of facts without the inculcation of right feelings about the facts is only a very minor part of real education. The question of the teaching of patriotism at once comes into the limelight. What shall children be taught about their own country? There are two possible courses. They can be trained to that blatant form of patriotism which will lead them to stand at street corners, wave their flags and shout, "My Country—right or wrong." Or they can be educated to that finer sense of patriotic feeling which urges them to ensure that their country makes the highest possible contribution to the common good of humanity, while recognising, too, that other people make similar contributions and have equal rights. There will be pride when the nation adds much to the common stock; sorrow when achievement falls short of the promise. This is an extension of the development of the self-regarding sentiment in the individual. It makes of patriotism a dynamic force in the service of a free people, not a static one capable of manipulation by Dictators. Often this view is accepted, but only in the letter and not in the spirit. Do we want the type of citizen visualised? Do we not rather encourage the one who will accept *our* opinion without argument? Once again the examination system has adversely affected education. It has been pointed out that examinations emphasise the *markable* elements, not the living ones. Examination answers must be definite, and this need for definiteness leads directly to the inculcation of opinion. Again, the need to "cover the syllabus" leads to undue haste, and leaves no time for discussion.

In the Preface to his recently published volume, one of greatest interest to those concerned with the problems raised in this Report, Dr. E. C. Walker says, "It is maintained, furthermore, that we are failing to train level-headed men and women who can pick their way with integrity and intelligence through the intricacies of modern political and economic life. Against the traditional accusation of neglect the schoolmaster has, however, the justification that he is not responsible for what happens to his ex-pupils during the important years of adolescence which follow their release from school. Education for some five million young people in England finishes at the age of fourteen years. The State sees fit to ignore their intellectual welfare, unless they are the unfortunate victims of unemployment, until at the age twenty-one, or eighteen years in the event of that national disaster War, they are called upon to accept full responsibilities of citizenship."

Here is the argument for raising the school leaving age and for using the additional years to give such an education as will have wise action for its result. This involves a capacity to deal effectively with controversial subjects.

In his volume, "The School" (XXth Century Library), Mr. W. B. Curry says, "The power of dealing intelligently with difficult and controversial issues should be one of the main results and objectives of education on its intellectual side. The world is not likely to grow less difficult to understand, and that reliance upon reason and persuasion, which ought to be the basis of a democratic society, is not possible unless the difficult art of dealing with controversial issues is fairly widespread. In most schools in the past there has been too much reliance upon authority and instruction, and the children have been too often the passive recipients of what was supposed to be the wisdom of their teachers. *But children learn to think in the same way that they learn everything else, by practice under suitable conditions and skilful guidance. They learn to think by thinking* (*italics added*). If they are to learn to deal with

controversial issues in the right way, then they must deal with those issues while at school. . . . This means that in the classroom there should be more discussion and less lecturing than has been customary hitherto, and contemporary issues and dangerous topics should not be excluded and that schools should be places of free speech and free thought." "The only avenue to wisdom," writes Professor Whitehead, "is by freedom in the presence of knowledge, but the only avenue towards knowledge is by discipline in the acquirement of ordered fact. While, therefore, there must be definite instruction and serious orderly study, there should also be more discussion and less emphasis on mere rapidity of instruction than in the ordinary school. The school should deliberately provide opportunities and material for the study and discussion of the main social and political problems of the day." This passage expresses so clearly what is felt by an increasing number of educationists that it is worth quoting as a whole. History in its widest sense is the study of the common adventure of mankind—sometimes going forward, often retreating, but always moving. If education is to prepare for a changing society, its future citizens must be given the means of exercising directive control. In respect to the so-called facts of history, it is as well to realise that even these vary according to the race, nationality, religion and place in society of the child. There is (as yet) no absolute truth, no single standard by which the facts can be measured. One person calls a certain event "The Civil War" another terms it "The Great Rebellion." A Hindu speaks of the "Indian War of Independence," whereas we refer to "The Indian Mutiny." The German version of Jutland differs widely from our own. The inculcation of dogmas is always easier than the education of the open mind, but it should be remembered that honesty is the first essential of any satisfactory educational system. It must be admitted that the charge of teaching "propaganda" always means the teaching of tenets in which the critic does not believe.

If our own doctrine is triumphant, it is orthodoxy ; if some other prevails, it is heresy. This raises one final question. Should schools exist to maintain authority and the *status quo* ? The answer, if it is to be a logical one, must include the systems of Stalin, Hitler and Mussolini as well as the British Constitution. From what has been said, an answer should emerge. We live in a changing society and for *that* kind of society we must educate or fail in our task. The dangers of freedom in this matter are less than the dangers of authority. We may make a restless world—but it will be one striving for progress. The other way leads to intense nationalism, dictatorships and wars.

The education given in the past “ must have been an exceedingly bad preparation for the management of that (*i.e.* Western) society, and particularly for its management by the democratic method.” So stated a writer in a supplement upon “ Education and Citizenship ” in “ Time and Tide ” for October, 1935. He added, “ the Western World, then, is conscious that its civilisation is threatened and does not know how to meet the threat. The forces of disorder and chaos seem to grow almost daily in destructive power. . . . More serious even than the material insecurity is the growing instability of moral values. Things which yesterday the millions proclaimed as the greatest goods in life—political liberty, freedom of discussion, the rights of intellectual investigation and speculation, the right of man to dispose of his own life, to proclaim his beliefs—things for which twenty years ago millions were prepared to die, are now declared by the same millions or their immediate successors to be evil things, fit only to be swept away.”

This is a serious challenge to all educationists, and concerns the teaching of Civics in the Schools and Universities. One weakness may be the stagnation of moral, social and political science during a period which has witnessed enormous progress in the realm of physical science. One of the immediate and

necessary steps is to help future citizens to an understanding of the nature of the society in which they will have to live. Present day economic and political problems are complex, and the main issues can only be made clear by systematic study. It is not sufficient for the future citizen to know the duties of a Town Council or a Parish Council or the functions of a Mayor or an Alderman. To place all the emphasis on these is to stress once more the facts which can be acquired instead of the attitude of mind which functions. Such a conception of "Civics" would make it a good examination subject, but would not necessarily do anything towards the development of the good citizen. It may not be possible to make all the issues clear to all the citizens. But the cultivation of a sense of awareness to the problems will do something towards maintaining the open mind which seeks for solutions, and is not to be fobbed off with expedients.

The necessity for the inclusion of Civics in the curriculum is overwhelming, but it must be the inculcation of an attitude and not the acquisition of facts. If it is correct that we are witnessing a race between disaster and education, and that our handicap is the neglect of human (social) science, then the concentration of our attention upon Civics is a basic step. In the quarterly journal of the British Institute of Adult Education, Mrs. Hubback wrote recently, "It should, then, be the aim of education for citizenship to equip the citizen for the 'choice before him,' so that he may support the better rather than the worse general policy. It should, indeed, be possible, even while still at school, and certainly later, to put before him the main facts and principles, whether these be moral, economic, or political, which lie behind the chief questions of the day. It should be possible, for instance, both to explain the reasons and to instil in him the desire for international co-operation rather than for nationalistic self-sufficiency; for the peaceful settlement of international disputes and disarmament rather than for the use of force—without finding it necessary to

explain in detail the technique of the League of Nations or of any particular aspect of disarmament. Again, it should be possible to advocate that poverty should be eradicated, that every citizen should enjoy a minimum of healthy living, and to discuss the moral and economic issues involved without necessarily advocating any particular economic creed."

To this statement of the aims of a sound education in Civics may be added a further one by Sir Ernest Simon. He deems it necessary that education for citizenship should aim directly at

- (a) Stimulating interest in the affairs of the modern world.
- (b) Imparting some knowledge, both of recent history and of the political and economic affairs of the world to-day.
- (c) Developing the power and habit of clear thinking about public affairs.
- (d) Developing the ability as far as humanly possible, to recognise and discount both emotional propaganda used by others, and the effects of his own prejudices.

The place and function of PHYSICAL EDUCATION in the new schools is now generally recognised, although the reasons which make it such a vital subject are not generally understood. The advance of science has brought in its train a replacement of physical labour by mechanical labour. The machine usurps many of the functions of the limbs and the lack of adequate physical exercise leads to mental instability. It is significant that the hiking movement should have developed so spontaneously at this period in the world's history. Added to this is the fact that the speeding up of life owing to an increasing use of machinery has had an effect upon the nervous system. Again, the cinema and the wireless have introduced forms of entertainment which involve no physical effort, but which arouse the emotions and make no demands upon the intellect or the will. The result is that other outlets are sought ~~of a~~ of an unsatisfactory nature. Unable to play themselves,

lads play football by proxy as spectators, and it may be argued that the modern gambling craze originates in active participation being replaced by passive observation for the majority of adolescents.

Facilities for field games and a good gymnasium fitted with shower baths are essentials for every Senior School. Nor must the physical training be viewed as inferior in any way to the other activities of the school. This has one important implication. The school must not measure the success of its physical training by the success of a selected team of gladiators at football, netball, hockey or cricket. What matters once more is the effect of the development on the average pupil, and whether the training is benefiting the non-expert as well as the expert. Some reference to hiking and school journeys will be made subsequently. Here it may be noted that gardening, assisting with school playing fields, communal craft work, etc., all furnish excellent opportunities for physical training work of a less formal nature.

CRAFT WORK covers many activities and only a few general considerations can be dealt with here. For girls, homecraft training is valuable as a means for satisfying the creative urge. The work cannot be *mass* work—that is, children cannot all reach the same stage. Once craft work is beyond the creative ability of the child it ceases to satisfy and delight him or her, and develops a sense of inferiority. Many an unintellectual child has its self respect saved by practical activities. But this is not the whole of the story. Craft work develops the power of reflective thought about concrete problems, and furnishes approaches to life. There is the selection of the appropriate material, the choice of tools and the planning of the method, to be considered. “Man thought in terms of tools and things before he thought in terms of words.” We have so stressed the verbal side of our education that it is easy to see whence has arisen the existing divorce between our culture and environment. The child who learns to think in terms

“tools and things” is on the way to discovering the secret of thinking in terms of words. Further, scientific method is taught, for there is the need to collect and arrange the data before the job is started. And each operation is an experiment, the truth of the theory behind which is proved or disproved by the result. Again (particularly in Homecraft), preconceived notions and prejudices are attacked and the power of suggestion lessened, for success in one method raises questions as to the efficacy of others. Above all, there is developed some power of creation, for all good craft work involves the attempt to convert a vision into a reality. This cannot be better expressed than it is in the following lines :

“ Things to cajole or labour, shape or twist
 According as they list, to their imaginings :
 Things pliant or obedient.
 Pigments and syllables,
 Filaments or stones,
 Metal and plastic clay,
 Which do obey,
 A dominating mind, an own,
 A maker's right.
 Through them to bring into the light
 Visions that had been pent.”

To help the child to realise those “pent visions” is the worthiest of all educational objectives.

GEOGRAPHY and its allied activities furnish an important section of the curriculum, if only because it is in his environment that the child finds so many of his interests. At the same time, there is a danger lest the environment comes to be regarded as the main factor in development, for this leads to the mechanistic view. Civilisation proceeds by way of response to challenges. The challenges may come from various sources—the environment, new ground, pressure without, blows. And so on. The response comes from within. The

fate of civilisation depends upon the effectiveness of this response. Geography is being taken more and more out of the classroom and is becoming more and more of an activity and less of a theoretical "subject." School Journeys (long and short), camps, etc., are all becoming common. There is still room, however, for much development in this direction. If children are to have any insight into the lives of others, they must see various types of environment and the workers in them. It is probable that we shall in time see the wisdom of letting them actually participate in various activities. To watch hay makers develops a very different feeling from that gained by *making* hay throughout a summer's day! These School Journeys are often the forerunners of a love for hiking in post-school days. No one who has not had actual experience of it can realise the wonderful work which is being done by the Youth Hostel Movement. Social education is gained and respect for the opinions of others is enhanced. In one Hostel during a very short period there were present Dutchmen, Germans and Americans, as well as Englishmen. And all "classes" were represented from manual workers to students at the newer and older universities. Social service to the Hostel was given by all—discussions were interesting and keen. The School Journey is the training ground for this youth movement which is going to develop a new outlook amongst the younger part of the population. The School Journey movement must be developed so that all children can have the opportunity of seeing conditions of life which are different from their own.

SCIENCE is another source of interest which needs development. More particularly is there room for progress in the Biological sciences. Plants, birds, fossils, insects and the life of ponds and rivers are things of interest to children. If this interest is developed, the hikers of the future will go out with additional interests and will be able to continue their studies in later life. The many other possibilities cannot be discussed

now, but in the foregoing pages enough has been said to indicate the outlook to be fostered.

The same is true with reference to other subjects. ART (for consumers and producers) includes activities of essential value, as does also MUSIC (orchestral and choral). Language will arise from interest in the activities of other children and should be developed from this. In every case it is the *activity* that is vital—not the acquisition of facts. If language is an activity, children will *talk*. Otherwise they will only utter sounds.

It will have been noticed that nothing has been said about MATHEMATICS—not even about Arithmetic ! The reason is that the same general principle must operate here. In everyday life, in craft work, in science, there is a need for certain forms of calculation, and with these forms the child will have a motive for becoming familiar. They will be activities and not acquisitions. The rest of Mathematics is a matter for the specialist. For the average child, the calculation of a bill, simple problems of measurement, the reading of meters and the calculation of the cost (gas or electricity), the checking of a wages account and one or two other similar calculations will supply most of his needs. Some boys will require simple Algebra—the solution of simple equations, logs, and some numerical trigonometry and geometry for use in craft and scientific work. But why he should make intricate calculations in stocks and shares, and puzzle over conundrums concerning pipes and taps which fill or empty baths in a variety of times, it is difficult to see. The allocation of time to various activities will have to be carefully thought out. It is clear that the need is a more unified timetable and a closer bond between the various activities. We have to remember that it is the *whole* man we are educating—not Rousseau's greengrocer or the grammarian.

Methods.

Some suggestions as to methods to be adopted have been made during the course of the preceding section. The methods which are desirable in a system of education such as that visualised follow from a consideration of its chief aims. It is essential that co-operation should replace competition and that mass instruction should be replaced by individual development. The child must be active—not merely a recipient of facts and opinions. This raises a question of the pace of instruction—always a difficulty where classes are large or when the children forming them are of varying ability. Many teachers divide the class into sections of different ability, and perhaps this is the best device under existing conditions. But this leads to the attitude—“ Oh, that’s the ‘ C ’ section ; what can you expect from them ? ” and this attitude is present in the children. In one section it develops a sense of superiority ; in another a sense of inferiority. A teacher had given a lesson upon Christ and had pointed out that He was born in what is often called “ the lower class.” She added that this made this section feel that He was like them—not some person in high position far removed from them. After the lesson, a little girl in the *upper* section of the class whispered to the teacher as she walked round, “ Rather nice for *them* (she meant the *lower* section of the class) to think He was one of them, isn’t it ? ” This is not snobbery. In a child of the age of those concerned the remark has no *moral* significance. It is just acceptance of facts as they exist. With the reduction in size of classes and a recognition of the equal value of various activities, some of this classification may go. There is an ever-present danger of “ defeatism ” in the present system. Children in the “ bottom section ” are viewed as hopeless ; often children from whole areas are damned from the start. It must be remembered that real success with difficult children is the crown of a teacher’s task. Where children of varying abilities are urged along

at a common pace, damage is bound to result. If the pace is that of the brightest, then the rest are either overstrained or become discouraged. If it is that of the "average" child, then some brighter ones are held back and some of the rest urged forward too rapidly. The conception of an education which is based upon *activity* and not upon acquisition implies individuality of pace. It means, further, that the varying abilities of the individual children must be determined and utilised. The new educational method must arise from the nature and needs of the child and not be based upon the demands of a set syllabus. There is room for much research work here. During recent years there have been developed methods which have endeavoured to provide for this individuality. Amongst these are the Dalton method, the Decroly method and others. It is not advisable for any teacher to adopt any method in all its details. Children vary in needs and temperaments, and so do teachers. Each good teacher adds something individual to the general method used, and it is through this procedure that improved methods are developed. If it is remembered that the need of the schools to-day is a method which develops activities in an individual, and if this is held as a *faith*, the necessary methods will soon be devised.

At this point it may be as well to add a few reflections upon the question of discipline. It is said again and again that corporal punishment has been reduced to a minimum. But this *in itself* is not what really matters. Earlier in this volume it has been stated that some of the difficulties of the world to-day arise from the fact that the importance of material and physical things have been stressed and psychological factors neglected. Examples of this are easy to find. Much more attention is devoted to the physical aspect of health in school children than to the mental aspect. And in many current views, and in much current practice, the same false division is made in matters of discipline. There is no virtue in abolishing or restricting physical punishment if it is replaced by unsuitable

mental punishment. After all, physical punishment is definite and of short duration. But some forms of mental punishment—the sarcastic word, the making of the “culprit” the object of derision by a class—are lasting. These things may adversely affect the whole future of the child. The memory of them lasts and develops attitudes of mind which definitely retard sound development. The discussion of a child with visitors in the hearing of the child and the class is another objectionable process. So far as corporal punishment is concerned, there is one sound rule. The more serious the offence, the less is it a case for corporal punishment. In every such case the *cause* for the offence must be found. A mental disease requires diagnosis and treatment. The breaking of rules, such as punctuality, behaviour on the ringing of a bell, etc., is on a different level. But we are not progressing if the bitter, sarcastic tongue is replacing the cane as an instrument of punishment in the schools. Rules should be reduced to a minimum, should be positive, perfectly understood and invariably kept. It must be remembered that each new rule makes a new class of potential criminals, and that every rule not invariably applied invites the “subjects” of the rule to “take a gamble.” The number of external rules should diminish as children develop. The winning of liberty is the process whereby dependence on external control is replaced gradually by power of control from within. It is *this* factor which is so often missing in defectives.

Bound up with this question is that of the place of School Prefects, Form Captains, etc. It is very questionable whether there is any place for these in the Junior School. It would be very interesting to discover the *real* reasons for the sudden appearance of these “ranks” in Primary Schools. Children of Primary School age are not fitted for the responsibility which such posts involve. It is unnatural to expect them to act as supervisors of the behaviour of their fellows. Children will accept the decisions of adults; they resent the control of

their own kind. The system develops an evil sense of power in some children and a fear of retaliation in others. It is difficult to see any good being derived from it. In the post-Primary Schools the question is a more open one, but still bristles with difficulties. The children are *not* commonly mature enough to take the responsibility involved. If their control is merely that of the teacher vicariously exercised, the exercise of it places them in an unfair position. It has been known for a sensitive child to ask to be relieved of the post of Form Captain. Perhaps with children of fifteen to eighteen some *training* in the power of control can be given, but it is doubtful whether an undeveloped individual (as surely children of twelve to fifteen are) *can* exercise powers of control in any manner beneficial either to those controlled or to the controller himself. Co-operation for a common purpose—that of getting on with the task of the school—is all to the good. But if Prefects, etc., are given any *real* power—they are not mature enough to exercise it wisely ; if they are *not* given real power—the system is a sham. This raises questions, too, of self-government. Generally speaking, children of fourteen and upwards can begin to co-operate—but the ability to use power wisely has to be developed and it is not possible to give *complete* self-government to immature minds.

Considerations of the problems of methods give rise to questions concerning the use of such adjuncts to teaching as the film and the wireless and the gramophone. These are all products of the machine age and may be used in a mechanical fashion. In so far as they can be used for mass education—to induce mass feeling and thought—they may be dangerous and may destroy individuality. But that is no reason for decrying their value, for they have become a permanent and rapidly developing factor in the life of the community. The Educator has to learn how to control and use these tools of education in a way *which will further the aim which he has in view.

The film in the school has a dual use. It may be used to

give "background," or it may be employed as a means of "instruction." The "background" film requires little or no commentary—its purpose is to make the child more aware of the world around him. Instructional films stress some specific aspect of a school subject—the formation of clouds, the social or industrial life of a people, or some part of physical geography. Such films require careful preparation if the point to be made is not to be overlaid with unnecessary detail. The question as to whether the silent film or the "talkie" is best for this purpose requires consideration. Generally speaking, it would appear that the silent film has many advantages. If it can be stopped and parts re-shown, the teacher can explain the salient features of the point under demonstration and can stress the important sections. The children can ask questions and discuss the points of interest. The "talkie" is necessarily standardised in the explanation given and might tend to produce a standardised audience. The main argument in favour of the "talkie" is that a number of experts can be called into service and so increase the number of "contacts" with the watchers' minds. On the whole, it would appear preferable to reduce the standardised commentary to a minimum, and to rely on the individual commentary of the teacher.

The problem of the film produced for entertainment is a big one. Children see many films with their parents, and what they see has a great influence upon their standards of value and upon their taste. This is admitted, and it is also admitted that the general standard of films shown at present is not such as to encourage a hope that these standards will rise. What was said earlier about the place of controversial issues in schools is equally true here. *It is in the schools that the taste of the coming generation will be formed.* And in the schools there must be provided opportunities for the development of a higher standard of taste in films. With a people mass-educated, the film will only induce mass values and mass emotional

reactions. The critical powers of the audience are dimmed and taste deteriorates. This indicates the need for good "entertainment" films in schools, as well as good "instructional" ones. Again, much of what has been said about literature is true here. There is no need for the children to become too "highbrow." Cowboy and other adventure films have a proper place in the programme suitable for children. The need is to develop a critical attitude towards films, and this must begin in the schools. At present film-going is largely a matter of habit—numbers go whether the film is good or bad. Various methods have been suggested for fostering this critical attitude and for raising the standard of taste. The British Film Institute has made a start in the task of creating and organising a demand for improved films. Branches of the Institute are being organised with the object of obtaining public support for the exhibition of first-class films, while lectures and discussions on film topics will help to develop an understanding public. In the schools the use of good films for cultural purposes will assist in the improvement of the commercial film, for the children will later on demand the standards of intelligence and reality to which they have been accustomed.

With education viewed as an activity, another development may be possible—the actual production and taking of a film by the children themselves. This would result in the gaining of much experience of artistic and technical problems concerned with the film industry. In its turn this would result in an understanding which would stimulate criticism, and so lead to an increased demand for better films. There is no doubt that the time has come when every post-Primary School at least should be equipped for the showing of instructional and entertaining films, and that the same facilities should be provided in Junior Schools as soon as possible.

The use of the wireless in schools is now common. The danger of the wireless is obvious—the listener may be entirely

passive, and there may be *no* activity on his part. He accepts what he is told without questioning. On the other hand, this adjunct to teaching can be used to stimulate and develop interest. To derive value from the development of broadcasting (both in the school and in the community as a whole), it is necessary to develop critical listeners—not passive ones. Good listeners are developed, not born. In the early stages, it is questionable whether note-taking in any form is desirable by the members of the class. It distracts the attention from the main task—that of listening. Later on, very rough notes may be taken, but these should be only of words and phrases needing explanation or amplification—and can be scribbled on a “jotter” in pencil. They should be brief, and not the main object of the lesson. Another danger is that of the standard scheme of work in order that the broadcast lesson may “fit in.” The early publication of the courses to be given is a big advantage to schools, and the B.B.C. is making every effort to make the service one of real value. From the educationist’s point of view there must be the inculcation of the active attitude of mind and the development of powers of criticism. Otherwise the acceptance of broadcasts in an uncritical manner may lead to a state when the first object of the would-be dictator will be the capture of the Broadcasting Service. The B.B.C. gives advice on sets and their upkeep and use, and again a good set is essential in each school if education is to be for a changing society and is to play its part in forming the culture of the future.

The gramophone, too, has its part to play, but again there is the ever-present danger of replacing an individual activity by a mechanised one. For musical appreciation, for the development of taste and for similar purposes, the gramophone is a valuable servant in the hands of a live teacher. But it cannot replace entirely individual performance. School orchestras, pipe bands, school choirs, all provide real musical activities. Excessive use of the gramophone may lead to the

power to produce music, the power of being musically *active* being the ability of a few specialists only.

There remains one other point which should be made. The activities which have been discussed must be *real* activities and not *sham* ones. Much "craft" work now done has no *reality*—it is "in the air." Children love practical work, with an object. Attention has been directed to the divorce between culture and the "man in the street." For a long time we have gradually widened the gap between work and children, and this volume has advocated the extension of the period during which work is kept from the children's lives. But this is because work has meant the exploitation of the labour of children for the benefit of others. But to divert children's activities from work in the best sense is wrong, and leads to that separation between culture and work which has been noted so often in the course of this volume. In Bernard Shaw's "John Bull's Other Island," the Mad Priest is made to say, "I dream of a world where work is play and play is life : three in one and one in three." That is the conception which the child should have of the activities in which he participates. To him they must be work, play and life—"three in one and one in three."

The Teaching Profession

A discussion on education would not be complete without some reference to the Teaching Profession, for it is upon the Teachers that the main burden of building the new world must be. If their pupils are to show initiative, then the Teachers must also possess it. If the children are to be individuals and not units in a crowd, then individuality must mark the Teacher. If courage in the face of the changing world around us is essential to the salvation of our civilisation, then Teachers must be courageous. Each Teacher must ask himself or herself the questions, "Have I initiative?" "Am I an individual?" "Am I courageous in facing changing situations?" Above

all, the welfare of the child must be kept for ever in the forefront. Hazlitt wrote, "See him there, the urchin, seated in the sun, with a wall at his back and a book in his hand. He has a still thicker wall before him—the wall that hides him from the future." No better picture could be drawn of the function of education in a changing world. The urchin is there—in the sunshine of his childhood days. He has a book in his hand—symbolic of the education which he needs. There is a wall at his back—the protection and sense of security given by Parents and Teachers. But before him lies that thicker wall, and over that wall lies the world awaiting him—a world of change and one which will call for all his powers of initiative and all his courage. The Teacher's task is to enable him to leave the security of the first wall and to scale the second one. If he retreats to the first wall—he fails to grow up. If he never scales the second, he can never use his full powers. The Teachers must have made their adventures over the second wall and have come back with courage undimmed, and the thrill of achievement still present, to help their charges to scale that second wall. They cannot *lift* the child over it—to do so would increase his dependence upon them. It is often hard to stand back when the fingers are itching to assist. But each child that scales the wall and goes bravely forward to the new world is the glory of those who have helped in his education. Routine work and unimaginative work must disappear from our schools. (By routine work is meant work repeated again and again in preference to the effort of thought required in devising new means of approach.) Only when there is a *hurtful* longing to assist the child to scale his particular wall will the best work be done. It has been said, "In every School at least one spirit walks abroad." The spirit is often that of some Teacher whose ideals turned the dry bones of the building into the living school. A great opportunity awaits the Teachers of to-day. They alone can decide the issue. The response to the challenge of the age

will lead either to victory or defeat. Only a faith can prevail against a faith. With faith in themselves and their mission the Teachers can yet save the world.

Parents

The days are long past when the gates of a school were shut at 9 a.m. for the dual purpose of keeping the children in and the parents out. One of the marked features of the first stage of re-organisation has been the increased interest shown by parents in the work of the schools. They have not always agreed with the proposals made, but there has been no doubt as to their interest. It has been said that every hope can be taken from people except one—the hope of a better future for their children. In these days that hope has been most marked. The provision of improved buildings and equipment, and the use of improved methods have been welcomed as evidence of an interest in the future of the children. The attendance at open days and the interest shown in the work of the school are signs of the parents' appreciation of the improvements made. This is true of the majority of parents and it is an encouraging feature of educational work. But there remains much to be done. More co-operation between home and school is necessary and should be secured. It should be possible to organise some kind of Parents' Association at each school in order to enlist the active support of mothers and fathers. Parents will listen to talks upon school problems, and discussions are always illuminating. The aim is to avoid conflict and encourage co-operation. In this way progress can be accelerated and much unhappiness in the child's life avoided. The Home and School Council of Great Britain has done much to encourage co-operation between Parents and Teachers and issues a very useful pamphlet giving suggestions for the formation of Parent-Teacher Associations.

CONCLUSION

‘ This is the true joy of life ; the being used for a purpose recognised by yourself as a mighty one ; the being thoroughly worn out before you are thrown on the scrap heap ; the being a force of Nature instead of a feverish little clod of ailments and grievances, complaining that the world will not devote itself to making you happy.’

‘ There is a new culture ahead, a new way of life for intellectual pioneers. That life is no longer for scholars only. It is for all who wish to have it.’

CHAPTER VIII

CONCLUSION

THIS volume has advocated a change in the principles upon which most of the educational work of Western civilisation is based. The main thesis put forward is that we live in a changing world and that an education which develops initiative, the open mind, and the questing will is essential if the difficulties of this age and of the years ahead are to be successfully overcome. A fresh challenge has made itself apparent to our Western civilisation. The challenge to produce the means of life for an increasing population has been met and overcome. The present challenge is to mankind itself. Can our civilisation remove the "darkness within"? Can it control man's passions—his anger, his greed, his selfishness? Can we build a society wherein mankind can effectively use what he has so efficiently learned to produce?

Through his faculty for invention man has produced machines by which mechanical power of great magnitude is placed at his disposal. But he has so far failed to control the human forces at whose disposal this power is placed. So he is fearful of the consequences, and exhibits a desire to avoid the issue.

The answer to the challenge will be given by the coming generations. Any educational system which does not give them facilities for acquiring that attitude which will assist them in the struggle fails in its self-appointed task. It has been said that the schools must follow—not lead. This statement is based on a false view of education. We educate for the future—beyond ourselves.

Educationists must recognise that their task is "a mighty one." In their hands lies the decision whether the rising generations shall go into the battle with hope of victory, or with the certainty of defeat. Theirs is the joy of being used in the service of a mighty purpose, and their reward is the knowledge that their one-time pupils no longer require the support of their Teachers. Of the beginning of the process of Education the Teacher should be able to say, with sincerity, "I came that ye might have life and that ye might have it more abundantly." And if he has given that life abundant to his pupils there will come a time when he can say to them, perhaps with regret and sorrow, but with equal sincerity, "It is expedient for you that I go away." For if the Teacher came in the service of "abundant life" and can leave his pupils without fear of the results, there is real "joy for that a man is born into the world."

Educators should always be able to claim :

"We are the workers of a new dawn . . .

. . . Men who look forward and not back."

That forward view will reveal to them the vision of all seekers—the spires of the City of God—that world wherein Truth and Beauty and Justice hold sway. They will not reach it themselves, but their pupils will set out towards it with higher hopes and braver hearts because of their Teachers' help. To turn back means the loss of ground gained by previous generations ; to go forward ensures that the coming generations will see more clearly both the spires and the paths by which the City may be approached. In days of anxiety and fear the known retreat appears to be so much the more desirable, and the forward path so dangerous and full of risk. But retreat means withdrawal and withdrawal, in the face of challenge, means arrest and decadence in any society.

It has been said that we are witnessing a race between catastrophe and education. If Western civilisation is to be saved from collapse and decadence, then it will be saved by a

generation capable of creating new institutions for a new social order. It is hoped that this small volume will serve the purpose of stimulating thought upon this matter. It is an attempt to express the underlying principles of what must be the second phase of educational re-organisation. If educators have faith in their work the false faiths of the current days can be overcome.

STATISTICAL APPENDIX

- Table I. Numbers of Children of School Age, 1938-1948.
- Table II. Estimate of Population of Great Britain (1931-1976).
- Table III. Birth Rates in Certain Classes.
- Table IV. Birth Rates in Large Towns.
- Table V. Mentally Defective and Retarded Children.
- Table VI. Incidence of Defect.
- Table VII. Mental Defective Persons in England and Wales.
- Table VIII. Employable Persons in Great Britain, 1933-1940.
- Table IX. Ability and Opportunity amongst Scholars.
- Table X. Mal-adjustment of Ability and Opportunity.

TABLE II

DR. GRACE LEYBOURNE'S ESTIMATE OF POPULATION OF GREAT BRITAIN, FROM *The Sociological Review*, APRIL, 1934
(*Estimated Future Population of Great Britain in Hundred's*)

AGES.	MALES								FEMALES.								PERSONS															
	1931	1936	1941	1946	1951	1956	1966	1976	1931	1936	1941	1946	1951	1956	1966	1976	1931	1936	1941	1946	1951	1956	1966	1976	1931	1936	1941	1946	1951	1956	1966	1976
0-15	5,474.3	5,079.8	4,432.9	3,842.8	3,344.0	2,688.6	2,517.7	2,072.5	5,366.3	4,987.3	4,358.4	3,707.9	3,277.2	2,629.3	2,500.5	2,033.6	10,840.6	10,067.1	8,791.3	7,610.7	6,621.2	5,317.9	5,048.2	4,106.1	21,073.4	20,070.2	17,791.3	16,550.0	14,621.6	13,017.2	10,103.8	8,178.8
15-45	10,073.4	10,307.2	10,003.8	10,590.0	10,130.1	9,378.2	7,600.5	6,020.6	10,070.2	10,089.3	10,009.2	10,631.4	10,089.3	9,315.6	7,000.9	5,911.6	21,052.6	21,356.5	21,033.0	21,221.4	20,210.4	18,693.8	15,201.4	11,962.2	9,730.0	9,730.0	9,730.0	9,730.0	9,730.0	9,730.0	9,730.0	
45-65	4,543.4	4,615.8	4,617.2	4,604.5	5,016.0	5,430.7	5,789.1	5,407.0	5,186.6	5,464.9	5,671.7	5,855.9	6,045.3	6,251.3	6,163.9	5,507.7	9,730.0	10,080.7	10,288.9	10,550.4	11,061.3	11,688.0	11,953.0	10,914.7	3,210.3	3,210.3	3,210.3	3,210.3	3,210.3	3,210.3	3,210.3	
65+	1,395.7	1,577.3	1,773.7	1,807.4	1,950.1	1,960.0	2,043.9	2,333.7	1,814.6	2,062.4	2,352.9	2,610.2	2,810.0	2,933.9	3,215.2	3,395.2	3,210.3	3,639.8	4,120.6	4,507.6	4,770.0	4,893.9	5,259.1	5,728.9	44,833.5	45,144.1	44,830.8	43,800.1	42,671.9	41,193.6	37,521.7	
Total	21,486.8	21,640.2	21,487.6	21,024.7	20,449.2	19,763.5	18,041.2	15,833.8	23,340.7	23,503.9	23,352.2	22,805.4	22,222.7	21,430.1	19,480.5	16,878.1	44,833.5	45,144.1	44,830.8	43,800.1	42,671.9	41,193.6	37,521.7	32,711.9	Total	21,486.8	21,640.2	21,487.6	21,024.7	20,449.2	19,763.5	18,041.2

TABLE III

BIRTH RATES IN CERTAIN SOCIAL CLASSES—ENGLAND AND WALES

(From Dr. Enid Charles' "Twilight of Parenthood")

	1911 Births per 1000 Married Men under 55 Years of Age	1921 Births per 1000 Married Men under 55 Years of Age.
1 Upper and middle class	119	98
2 Intermediate	132	105
3 Skilled workmen ..	153	134
4 Intermediate	158	153
5 Unskilled workmen ..	213	178
6. Textile workers.. ..	125	110
(not included above)		
7 Miners (do)	230	202
8 Agricultural labourers (do)	161	155
9 Working classes	175	152
All classes	162	141

TABLE IV

BIRTHS IN DIFFERENT QUARTERS OF VARIOUS LARGE TOWNS

(From Dr. Enid Charles' "Twilight of Parenthood")

Classes of Population	London	Paris	Berlin	Vienna.
Very Poor.. ..	147	108	157	200
Poor	140	95	120	164
Comfortable	107	72	114	155
Very comfortable	107	65	90	153
Rich	87	53	63	107
Very Rich.. ..	63	34	47	71
Average per 1000 women ..	109	80	102	153

TABLE V

PERCENTAGES BASED ON FINDINGS IN REGARD TO MENTALLY DEFECTIVE AND RETARDED CHILDREN BETWEEN THE AGES OF SEVEN AND FOURTEEN

(From Report of Mental Deficiency Committee)

Mental Ratio.	Urban Areas.		Rural Areas.	
	Percentage of age group or school population.	Increment.	Percentage.	Increment.
Below 50 ..	0.38	—	0.61	—
Below 55 ..	0.58	0.20	0.97	0.36
Below 60 ..	0.93	0.35	1.73	0.76
Below 65 ..	1.44	0.51	3.00	1.27
Below 70 ..	2.22	0.78	5.11	2.11
Below 75 ..	3.75	1.53	8.96	3.85
Below 80 ..	6.80	3.11	17.84	8.88

TABLE VI

INCIDENCE OF DEFECT IN EACH AREA PER 1000 CHILDREN BETWEEN SEVEN AND FOURTEEN IN THE SCHOOL POPULATION
(From Report of Mental Deficiency Committee)

(A) Incidence per 1000 Boys

Area.	No. of boys between 7 and 14 on school registers.	Feeble-minded.	Imbeciles.	Idiots.	Total.
Urban area A	6468	15 00	4 48	0 03	20 41
" " B	5225	18 37	3 25	1 15	22 78
" " C	7301	20 97	2 78	0 69	24 44
Rural area D	4758	36 99	5 46	1 68	44 14
" " E	4621	31 53	5 81	1 87	39 20
" " F	5196	36 18	5 39	1 15	42 73

(B) Incidence per 1000 Girls

Area.	No. of girls between 7 and 14 on school registers.	Feeble-minded.	Imbeciles.	Idiots.	Total.
Urban area A	6669	12 58	2 25	0 15	14 99
" " B	5462	15 56	1 63	1 10	18 49
" " C	6715	19 95	3 42	0 60	23 97
Rural area D	4553	31 41	3 73	1 10	36 24
" " E	4403	34 98	4 77	1 14	40 88
" " F	4906	30 17	3 67	1 02	34 86

(C) Incidence per 1000 Boys and Girls

Area.	No. of children between 7 and 14 on school registers.	Feeble-minded.	Imbeciles.	Idiots.	Total.
Urban area A	13137	13 78	3 35	0 53	17 66
" " B	10687	16 94	2 53	1 12	20 59
" " C	13919	20 48	3 09	0 65	24 21
Rural area D	9311	34 26	4 62	1 49	40 37
" " E	9224	33 17	5 31	1 52	39 99
" " F	10102	33 26	4 55	1 09	38 90

TABLE VII.—ESTIMATED NUMBER OF MENTALLY DEFECTIVE PERSONS IN ENGLAND AND WALES
(From Report of Mental Deficiency Committee)

(A) Children

Area.	Sex.	Population under 16.	Feeble-minded.	Imbeciles.	Idiots.	All Grades.
Urban Areas	M. . .	4,270,600	42,111	0,929	2,482	54,479
	F. . .	4,231,000	34,863	7,404	1,396	43,706
	M. and F. . .	8,510,600	76,974	17,333	3,878	98,185
Rural Areas	M. . .	1,114,800	18,127	3,809	758	22,374
	F. . .	1,074,900	15,855	2,698	645	17,181
	M. and F. . .	2,180,700	33,982	6,198	1,403	41,558
All Areas	M. . .	5,194,400	60,238	13,423	3,240	76,853
	F. . .	5,105,900	50,718	10,102	2,041	62,890
	M. and F. . .	10,700,300	110,956	23,531	5,281	139,743

(B) Adults

Area.	Sex.	Population over 16.	Feeble-minded.	Imbeciles.	Idiots.	All Grades.
Urban Areas	M. . .	10,530,500	38,226	10,425	3,264	52,021
	F. . .	12,192,000	41,697	9,266	1,585	54,426
	M. and F. . .	22,722,500	79,923	19,691	4,849	104,447
Rural Areas	M. . .	2,879,100	16,440	4,952	893	22,284
	F. . .	2,988,100	17,331	3,765	986	22,082
	M. and F. . .	5,867,200	33,771	8,717	1,879	44,366
All Areas	M. . .	13,409,600	54,666	15,377	4,157	74,305
	F. . .	15,180,100	59,028	13,031	2,571	74,508
	M. and F. . .	28,589,700	113,694	28,408	6,728	148,813

TABLE VII—*continued*

(C) Children and Adults

Area.	Sex.	Total Population.	Feeble-minded.	Imbeciles.	Idiots.	All Grades.
Urban Areas	M.	14,810,100	80,337	20,354	5,746	106,500
	F.	16,423,000	76,560	16,670	2,981	96,132
	M. and F.	31,233,100	156,897	37,024	8,727	202,632
Rural Areas	M.	3,993,900	34,507	8,452	1,651	44,658
	F.	4,063,000	33,186	6,463	1,631	41,266
	M. and F.	8,056,900	67,753	14,915	3,282	85,924
All Areas—	M.	18,804,000	114,904	28,806	7,397	151,138
	F.	20,486,000	109,746	23,133	4,612	137,398
	M. and F.	39,290,000	224,650	51,939	12,009	288,556

(Author's note :—"The slight discrepancy in the total for all grades arises from the use of incidence tables calculated to two decimal places.")

E MATED NUMBER OF PERSON -18) AVAILABLE FOR EMPLOYMENT (OR EM
(FIGURES IN THOUSANDS) GREAT BR

(From "The Boy," 1933—Stated to be based on figures of Ministry of Labour)

Age.	1933.	1934	1935	1936	1937	1938.	1939	1940
14	296	438	405	398	372	355	349	343
15	347	367	519	481	466	436	416	416
16	529	471	471	696	644	631	586	502
17	584	542	476	487	717	662	645	603
Total	..	1750	1871	2062	2199	2051	2001	1924

TABLE IX

ESTIMATED TOTALS WITH HIGH ABILITY IN VARIOUS SCHOOL CATEGORIES, AGED 9.0-12.6, WITH PERCENTAGES OF EACH IN TERMS OF TOTAL SCHOOL POPULATION WITH HIGH ABILITY

Reprinted from Gray and Moskusky's "Ability and Opportunity in English Education"—Sociological Review, April, 1935

School.	I Q				I B.			
	130 and over		140 and over		120 and over		130 and over	
	No	Per cent	No	Per cent	No	Per cent.	No.	Per cent.
Elementary, 9.0-11.0	279,000	39.2	174,000	37.9	277,000	42.0	171,000	40.5
Elementary, 11.1-12.6	190,000	26.7	100,000	21.8	154,000	23.4	82,000	19.4
Central..	92,000	12.9	66,000	14.4	84,000	12.7	56,000	13.3
Secondary Free Pupils	39,000	5.5	36,000	7.8	38,000	5.8	35,000	8.3
Secondary Fee-payers, Private and Preparatory	34,000	4.8	24,000	5.2	32,000	4.8	22,000	5.2
	77,000	10.8	59,000	12.9	74,000	11.2	56,000	13.3
Total with High Ability	711,000	100.0	459,000	100.0	659,000	100.0	422,000	100.0

TABLE X

ABILITY AND OPPORTUNITY IN HIGHER EDUCATION. (AGE GROUP 9 0-12.6)

Reprinted from Gray and Moskinsky's "Ability and Opportunity in English Education"—*Sociological Review*, April, 1935)

	I Q			I B		
	130 and over		140 and over	120 and over.		130 and over.
	No.	*Percent.		No.	*Per cent	*Per cent.
ALL PUPILS (2,286,000):						
(a) No. with high ability of ..	509,000	24.9	353,000	523,000	22.9	14.1
(b) No. of (a) with opportunity ..	151,000	6.6	137,000	147,000	9.4	5.8
(c) No. of (a) without opportunity ..	418,000	18.3	216,000	376,000	16.5	8.3
(d) No. with opportunity but without high ability ..	7,000	0.3	21,000	11,000	0.5	1.1
FREE-PAYING PUPILS (275,000):						
(a) No. with high ability of ..	142,000	51.5	106,000	136,000	49.5	36.0
(b) No. of (a) with opportunity ..	142,000	51.5	106,000	136,000	49.5	36.0
(c) No. of (a) without opportunity ..	—	—	—	—	—	—
(d) No. with opportunity but without high ability ..	133,000	48.5	169,000	139,000	50.5	64.0
ALL PUPILS (2,561,000):						
(a) No. with high ability of ..	711,000	27.8	459,000	659,000	25.7	16.5
(b) No. of (a) with opportunity ..	293,000	11.5	243,000	283,000	11.0	9.1
(c) No. of (a) without opportunity ..	418,000	16.3	216,000	376,000	14.7	7.4
(d) No. with opportunity but without high ability ..	140,000	5.5	190,000	150,000	5.9	7.8
TOTAL MALADJUSTMENT (3(c) + 3(d)) ..	558,000	21.8	406,000	526,000	20.5	15.2

* The percentages refer to the relation between the figures in the rows and the figures in brackets in column 1.

