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AN INVESTIGATION INTO THE POTENTIAL

OF THE MICROCOMPUTER AS AN AID TO TEACHING WRITING

IN THE PRIMARY SCHOOL

ABSTRACT

Over the last few years the number of microcomputers being used in primary schools has increased quite rapidly. The increase has been encouraged by many projects and schemes, which have declared the microcomputer to be a powerful resource that can enhance teaching and learning. In particular, writing has been frequently identified as a curriculum area which could benefit. This thesis is an investigation into the potential of the microcomputer as a resource to aid the teaching of writing. The research involved teachers with children in the seven to eleven age range.

The investigation began with a research programme, which involved fifteen teachers from different schools, who acted as case studies, and took part in a range of classroom microcomputer aided writing activities. The research included the monitoring of children's writing, classroom organisation, teaching methodologies, and the teachers' observations and opinions regarding the effectiveness of the microcomputer as a teaching aid.

The majority of the teachers who took part felt positively that the use of the microcomputer had been advantageous to their teaching provision. However, the results did not show a great extent of support, or indicate the particular areas and activities where provision could be enhanced. One important finding which did emerge was how much the teachers' teaching aims, objectives and current practices were correlated to the way the microcomputer use was implemented and developed. With reference to this finding a second research programme was initiated.

The second programme involved a further group of fifteen teachers who were based in the same school. The research included the monitoring of the teachers' knowledge and understanding of the teaching of writing, children's writing development, classroom organisation and methodologies, observations and opinions.

The results from this second research programme indicated that the microcomputer could be a valuable classroom resource, but there were certain considerations for it to be used effectively. Teachers need to know and understand what they want to teach, and how it is best achieved. The development of the microcomputer use needs to be within clearly defined whole school curriculum intentions, and relevant approaches to curriculum provision. The findings carried significant implications for school in-service work, and each teacher's professional development.

AN INVESTIGATION

INTO THE MICROCOMPUTER AS AN AID

TO TEACHING WRITING IN THE PRIMARY SCHOOL

ANNE JACKSON LIDDLE

THESIS SUBMITTED FOR THE DEGREE OF M.A. (EDUCATION)

1989

UNIVERSITY OF DURHAM
SCHOOL OF EDUCATION

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This is to certify, that none of the material offered
has previously been submitted by me for a degree in
this or in any other University.

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CHAPTER I

THE DEVELOPMENT OF A TEACHING FRAMEWORK

1.1 INTRODUCTION

Any investigation related to teaching must be based on certain underlying assumptions about the purpose of education and what teaching entails. The first part of this thesis (Chapters I,II,III) establishes:

- a) an educational framework for teaching in the primary school which sets the principles for the teaching of writing;
- b) a framework for a writing curriculum;
- c) current classroom practices in the teaching of writing.

This chapter considers the teacher's role in regard to educational aims, objectives, classroom provision and management, and the consequential implications in teaching writing.

1.2 THE ROLE OF THE TEACHER

In the last century training institutions appeared to function around the principle that schools were created from a single mould and what happened in the schools fitted a regular designed pattern. The function of the training establishment was to perpetuate this



stereotype, and the 'Master of Method' was employed in the model school to ensure that each new generation of teachers was poured into the same approved mould.(1) Society demanded that each generation should learn sufficient to be able to sustain and hopefully shape and develop the community, and this was a teacher's assignment. The role of the teacher was seen as the transmitter of acquired information, knowledge, skills and attitudes to the next generation to maintain the status quo of society. This perceived role was attacked by such people as John Dewey as early as 1916,(2) with his philosophies restated in the Hadow Report (1931),(3). However it wasn't until the publication of the Plowden Report (1967) (4), which supported Dewey's views, that the teacher's traditionally accepted role began to be more widely challenged.

-the curriculum is to be thought of in terms of activity and experience rather than knowledge to be acquired and facts to be stored."

(Hadow Report, 1931, quoted in 'Children and Their Primary Schools', 1967, pl94)

Over the last few decades the social, economic and technological developments have been rapid and dramatic carrying with them tremendous implications for children's educational needs.(5) For teachers to fulfil their role of catering for these needs the levels of skill, understanding, imagination and resilience, go far beyond the commonsense approach and mechanical competence fostered by schools and institutions in the past. Today for a teacher's role to be seen as purely 'information giver' would appear to be inconceivable, as the

amount of information available would be impossible for teachers to transmit. Now teachers must decide what basic information and knowledge children still need, what else they need in order to acquire and expand knowledge for themselves, and how these needs are to be satisfied.

Further educational considerations result from the significant social changes that have recently taken place. Millions of unskilled and semi-skilled jobs have been lost depriving many children of their anticipated working security and in many cases the incentive to learn. Fewer job vacancies tend to increase selectivity which in turn increases the demand for higher educational qualifications and standards. Unemployment and changes in occupational habits have increased opportunities for leisure activities and the need for the development of personal interests and relationships. (6)

The development of technology has not been solely confined to industry but has made significant contributions to the daily management of peoples lives. The effect on teachers is two fold, firstly, to equip children with the necessary knowledge and skills to control and use technology to their personal advantage, and secondly, to identify and incorporate pertinent technological learning experiences within their teaching provision.(7)

The role of the teacher can be identified through the educational

aims to be pursued. This role will develop and change, as aims must be constantly reviewed to meet the changing individual and social needs of the children.

"I shall take it as self-evident that each generation must define afresh the nature, direction, and aims of education to assure such freedom and rationality as can be attained for a future generation. For there are changes both in circumstances and in knowledge that impose constraints on and give opportunities to the teacher in each succeeding generation. It is in this sense that education is on constant process of invention."

(J.S.Bruner, "Toward a Theory of Instruction", 1966, p22)

There have been several investigations into educational aims by members of society and industry. These studies placed great importance on: the development of children's initiative; confidence in dealing with others; the ability to make judgements; solving problems and developing personal relationships. (8) Recent publications, 'The Warnock Report' (1978); 'The practical curriculum', (Schools Council Working Paper 70,1981); 'Primary Practice', (Schools Council Working Paper 75,1983); 'Better Schools', (A Summary..DES 1985); each identified a set of comparable educational aims.

"There is a wide agreement about the purposes of learning at school, in particular that pupils should develop lively, enquiring minds, acquire understanding, knowledge and skills relevant to adult life and employment and develop personal moral values."

(D.E.S., "Better Schools", A summary, 1985, p4)

The content of these aims imply that the role of the teacher can not be one of 'telling' but of 'facilitating growth', with the teaching emphasis on the determining of what and how learning experiences should be provided, in order for the growth to occur.

1.3 CURRICULUM OBJECTIVES

Within the last fifty years there has been a great deal of emphasis given to the exact content of what should be taught in schools and the setting of curriculum objectives. The benefits of defining objectives are stated to be many and wide ranging. Bloom et al (1956), (9) stated that determining objectives aided communication between teachers, and enabled them to understand more fully the relation between the experiences they provide and the learning which takes place in the children. Macintosh (1976), (10) felt that clearly defined objectives gave the teacher something to work towards and acted as a basis for measuring and evaluating outcomes. Gronlund (1970), (11) suggested that by stating teaching objectives as learning outcomes this would provide direction for the teacher, help them to choose the subject matter, teaching methods, and materials to be used, and provide them with a guide for assesement.

An analysis of curriculum objectives put forward in current educational documents indicates three groups of objectives:- global, general, and specific.

1.3.1 Global Objectives

An example of global objectives can be found in the D.E.S. booklet "The curriculum from 5-16", (1985, pages 42 to 47) It states that the curriculum offered to every pupil should be:-

BROAD: it should introduce the pupil to a wide range of knowledge, understanding and skills through a variety of curriculum areas;

BALANCED: each aspect should be allotted sufficient time to make its special contribution through a variety of teaching approaches:

RELEVANT: subjects should be taught so as to bring out their applications to the pupils' own experience and to adult life, and to give due emphasis to practical aspects;

DIFFERENTIATED: what is taught and how it is taught need to be matched to pupils' abilities and aptitudes.

1.3.2 General objectives

These relate to the areas and elements of learning and experience to be covered in the curriculum.

The areas and elements are commonly considered to be:-

Areas: aesthetic and creative, human and social, linguistic and literary, mathematical, moral, physical, scientific, spiritual, technological.

Elements: knowledge, concepts, skills, attitudes.

1.3.3 Specific Objectives

For significant teaching to take place a number of decisions must be made regarding the exact areas of knowledge to be acquired, the precise skills that the children need, how concepts are to be developed, what attitudes are most necessary to foster, and how evaluation of achievements will take place.

If what it is we want to achieve is first indicated in expressions of generality, these need to be unpacked into much more specific terms or little positive guidance is provided for educational practice. To be of value we must eventually analyse these ends down to particular achievements we wish pupils to reach, detailed enough for us to be able to judge how to promote these and not other achievements with which they could be confused, and detailed enough for us to be able to judge when pupils have and have not reached them.

(P.Hirst, Knowledge and the Curriculum, 1974, p16)

Examples of specific objectives for a range of curriculum areas can be found in the "Curriculum Matters", (HMI Series. 1985-1988). Although the setting of specific objectives such as prescribed in the series provides a basis to obtain curriculum structure, progression, cohesion, and implications for classroom teaching, they still do not have the detailed precision referred to by Hirst. They are narrow in the sense that they are confined to the outcomes expected of the curriculum, and have few references to the nature and learning conditions to be provided. There is a danger that the specific objectives stated might be taken as implying that the curriculum can be defined in linear, hierarchical and observable outcomes.

To meet the educational aims described earlier, the curriculum must also contain opportunities for children to achieve personal development, flexible attitudes and self sufficiency. To break down these learning outcomes into specifically obtainable objectives would be virtually impossible. To assume such a task would mean that general assumptions would have to be made, and the diversity of children's individual interests, abilities, attitudes and aspirations would virtually have to be ignored.

The curriculum to be taught needs to provide for two distinct elements, one being the cognitive/pyschomotor which includes the knowledge, concepts and skills to be acquired, the other being the affective, which includes the attitudes, social and life skills to be fostered. (13) The cognitive/pyschomotor element can be covered through the defining of specific learner outcomes. However, they can only be accomplished if the teacher is aware of the detailed structure and nature of the outcomes, how and when the outcomes are to be achieved and applied, the respective dependency and integration with other learning outcomes, and the assessment and evaluation that is necessary for successful development.(14) The affective element demands the teacher's complete awareness of the range of specific learning situations which can be provided, in order that the children are exposed to the most appropriate experiences at any given time. The teacher must also be aware of the relevant teaching activities and materials which could support the provision of the experiences, and most significantly, must understand the nature of his/her role and involvement in the learning taking place.(15)

The precise curriculum activities with regard to both elements, must always be determined within the school and classroom context, and with consideration for every child's individual needs and development.

1.4 TEACHING METHODS AND STRATEGIES

Any statement about teaching cannot be totally divorced from its

direct connection with learning, and therefore it is difficult to attempt an analysis of teaching methods and strategies available to teachers without reference to the intentions and content of what is to be learnt. Methods and strategies can and do vary considerably to meet the needs of the learner, and it is probably the teacher's ability to decide and change the strategies and styles which has most significance for successful teaching.

The curriculum is not the intention or prescription but what happens in the real situations. It is not the aspiration but the achievement. The problem of specifying the curriculum is one of perceiving, understanding and describing what is actually going on in the school and classroom.....The central problem of the study is the gap between our ideas and aspirations and our attempts to operationalize them.

(L. Stenhouse, An Introduction to Curriculum Research and Development, 1976, p2)

To differentiate between teaching methods and strategies and identify particular features can be compared with trying to divorce teaching from learning. However, for the purposes of the research and the necessity to establish facts upon which considerations and comparisons can be made, some of the main characteristics which can be associated with each aspect will be formulated. With reference to dictionary translations, teaching 'methods' have been identified as the procedures which the teacher employs to provide classroom activities, and 'strategies' as the considerations which the teacher includes in the management of the classroom activities.

Some of the main elements which can be attributed to methods and

strategies have been identified through:

- a) studies conducted by Adams (1970), Walberg and Thomas (1971), N. Bennett et al (1976), Dunkin and Biddle (1974), M. Galton et al (1980).
- b) an analysis of curriculum projects, 'Environmental Studies' (1967-71), 'School Maths Project' (1961), 'Science 5-13' (1967-75), 'Health Education 5-13' (1973-78), 'Art and Craft Education 8-13' (1969-72),

1.5 ELEMENTS RELATED TO TEACHING METHODS

Curriculum content.....the most general approaches are:- the teaching of separate subjects; the integration of subjects drawn from different curriculum areas; the integration of curriculum aspects drawn together into one curriculum area of knowledge.

Curriculum emphasis.....ie. the kind of learning being promoted:- the acquisition of skills, knowledge, concepts, information; developing personal qualities; establishing understanding.

Organisation.....ie. how the children arranged for work:- in groups by ability/mixed ability/friendship; as a class; individually placed.

Curriculum management.....ie. how the learning activities are arranged:- all the children are given the same task; children are in groups working on different levels of the same task; children are

grouped with each group given different tasks; children are given individual tasks.

Relationships....ie. how the teacher interacts with the children:- the teacher dominates; talking between children is restricted; the children talk with each other but only when necessary with the teacher; the teacher plays a dual role sometimes as a learner with the children sometimes as the guide; children are encouraged to talk to each other and to the teacher.

Motivation....ie. how the children react to learning:- children are rewarded for work accomplished correctly; purpose of the task is used as the focus for achievement; task is set so that success can be realised; children are given verbal or sign encouragement

Assessment....ie. how results are monitored and recorded:- teacher acts as observer; teacher discusses work with children; children report on activities, teacher marks work; the children are tested.

1.6 ELEMENTS RELATED TO TEACHING STRATEGIES

Learning situations.....ie how these are provided:- the knowledge, skills or facts to be acquired are stated by the teacher through examples, and then the children are given further examples to pursue; the teacher determines what has to be learnt, and then provides

situations in which the children are encouraged to acquire the knowledge, skills etc. for themselves; the teacher guides the children into providing their own situations in order to acquire knowledge, skills and concepts.

Learning experiences....ie. the nature of the children's involvement in the learning situations:- the children are directly involved in a practical way in relation to the learning to be acquired; they are experiencing the learning in a 'second-hand' way through books, pictures etc.; the children's experiences are provided through simulations, role play, games etc.; the experiences are of a theoretical nature.

Learning outcomes....ie. how are these outcomes determined:- the teacher controls them through pre-determined objectives; they are flexible and result from the interests and pursuits of the children as they learn, with the teacher acting as a facilitator and guide.

Learning control....ie. how is the rate and progression of learning controlled:- the teacher totally controls all the variables in respect of the class of children; the teacher controls the variables in respect of individual development; the work is arranged so that the children control their own rate and progression; some of the variables are controlled through the use of resources or arranged programmes of work.

Evaluation of learning....ie. how is the learning developed: the children's work is marked and further direction decided; the are children are observed as they work and the learning taking place adjusted and directed accordingly; the teacher has diagnostic criteria in the learning situations/ experiences being provided; the teacher makes assessment of each child's performance; the teacher makes an assessment of his/her own performance.

1.7 SUMMARY

In respect of educational provision and teaching there appears to be five areas for consideration shown in Figure 1, (page 16). It is against these areas that the potential of the microcomputer as an aid to teaching writing will be considered.

1) Educational Aims.....these act as a philosophical guide towards what we want the children to achieve. They should incorporate individual personal needs, the needs to function in society, and the needs to make sense of the world around and cope with change and development. These aims should be represented in the teaching of writing through activities which reflect the different associated needs and purposes.

2) Global objectives.....these form the educational framework which teachers use to formulate learning and teaching intentions. Examples

of these objectives could be: the need to be able to communicate; to have personal and academic standards; to develop moral values; the ability to work with other people; to develop an enquiring mind; to be able to solve problems; to be able to use information etc. Writing should be presented as a significant aspect of communication. The teaching of writing should promote relevant cognitive and affective development.

3) General objectives....these focus on an exact subject or area of knowledge to be provided in respect of the educational aims and global objectives. These would involve the knowledge, skills or processes to be pursued by the children, with consideration to the structuring and integration of writing with other curriculum areas and subjects.

4) Specific Objectives...these are the precise activities or experiences which are to be presented. These will have been determined with consideration to structure and sequencing of the knowledge, skills, information and concepts to be learnt and developed through writing. They should be relevant to individual needs, achievements and progression.

5) Teaching Methods and Strategies....these must be determined with consideration both to the nature of the specific objectives and with understanding of the child. They will involve the manner in which the learning is to be facilitated and the organisational support that will be needed. They will include the exact involvement and interaction of the teacher and the child in the learning situations. They must also contain an element of assessment in order to determine the achievement of the child, the success of the teacher, and present a basis for further teaching and learning decisions.

A FRAMEWORK FOR TEACHING IN THE PRIMARY SCHOOL

Educational Aim
To enable the child to function
as an individual and as a member of society

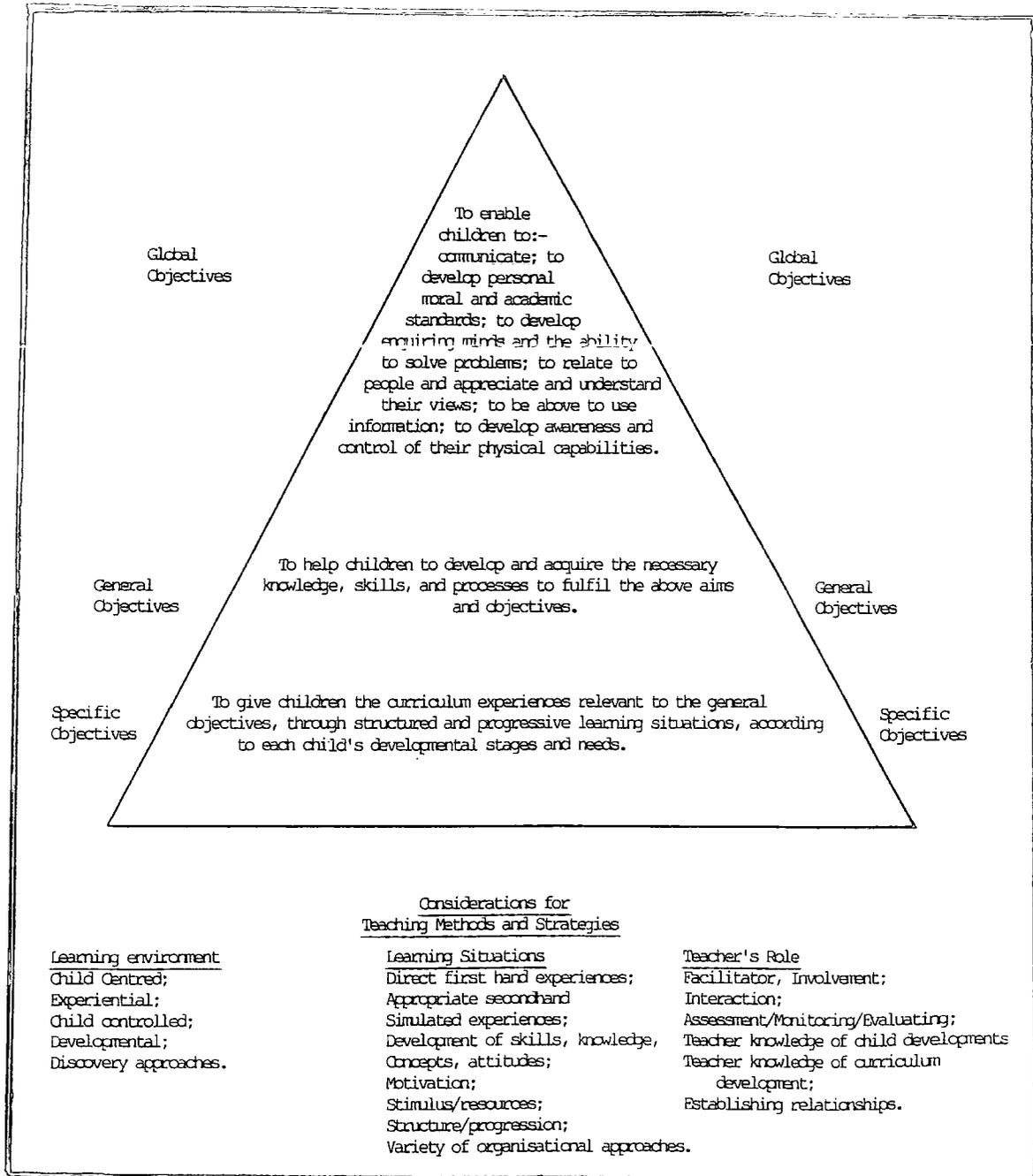


Figure 1

REFERENCES CHAPTER I

1. Rich, R. W., (1933), The training of teachers in England and Wales during the nineteenth century, Cambridge: University Park Press.
2. Dewey, J., (1916), Democracy and Education, New York: Macmillan.
3. Hadow Report, (1931), Report of the Consultative Committee on the Primary School, London: H.M.S.O.
4. Plowden Report, (1967), Children and Their Primary Schools, London: H.M.S.O.
5. Virgo, P., (1981), Learning for Change, Gloucester: Bow Publications Ltd., Orchard and Ind, Ltd.
6. Gordon, P. and Lawton, D., (1978), Curriculum change in the nineteenth and twentieth centuries, London: Hodder and Stoughton.
7. Wragg, E. C., (1984), Classroom Teaching Skills, London: Crook Helm Nichols Publishing Co.
8. Morton- Williams, R., et al., (1968), Young School Leavers, Schools Council Enquiry 1, London: H.M.S.O.
D.E.S., (1977), Education in Schools, A Consultative Document, (Green Paper), London: H.M.S.O.
Raven, J., (1977), Education Values and Society: The Objectives of Education and the Nature and Development of Competance, London: H.K.Lewis.
Raven, J., (1980), Parents, Teachers, and Children, Publication 73, Scottish Council for Research in Education.
9. Bloom, B. S., et al., (1956), Taxonomy of Educational Objectives, New York: McKay Co. Inc.
10. Macintosh, H. G., (1974), Techniques and Problems of Assessment: A Practical Handbook for Teachers, London: Arnold.
11. Gronlund, N. E., (1970), Stating Behavioural Objectives for Classroom Instruction, London: Collier-Macmillan.
12. Hirst, P., (1974), Knowledge and the Curriculum, London: Routledge and Kegan Paul.
13. Bruner, J. S., (1966), Toward a Theory of Instruction, London: Oxford University Press.
14. Stenhouse, L., (1975), An Introduction to Curriculum Research and Development, London: Heinemann.

CHAPTER II

THE DEVELOPMENT OF A FRAMEWORK

FOR THE TEACHING OF WRITING IN THE PRIMARY SCHOOL

The potential of the microcomputer as an aid for teaching writing can only be considered through an examination of its use in valid educational situations. This chapter establishes a framework for the teaching of writing, which was then used as a basis for the subsequent classroom microcomputer research activities.

The framework relates to the general educational teaching framework developed in Chapter I (page 16) linking educational aims, objectives and teaching methods, to a primary age writing curriculum.

2.1 EDUCATIONAL AIMS

Throughout history writing has often been acknowledged as the mark of cultural development. As early cultures developed they invented and adopted writing systems, now writing is accepted around the world as a necessary requirement for people to exist, make use of, and contribute to their environment.

Frank Smith (1) puts forward three reasons for the cultural need of writing :

- 1) Its evident utility as a tool for COMMUNICATION.
- 2) To provide a more or less permanent RECORD (of history and law).
- 3) The value of writing as an ART, the product of creativity.

Gunther Kress (2) also strongly associates writing with the ability to function in the world.

'the ability to produce written messages is equally necessary for sharing in and contributing to knowledge and to ideological activity, and for gaining a measure of power. Hence the unequal distribution of the uses of and participation in reading and writing have fundamental social, economic, and political consequences. Inability to use and control the forms brings with it exclusion from the benefits associated with their exercise

(Gunther Kress, Learning to write, p 10)

The inclusion of writing in the school curriculum has been undoubtedly recognised as essential to the fulfilment of educational aims, in respect of the needs of children as individuals, and as members of society.

2.2 GLOBAL OBJECTIVES

If the ability to communicate is a requisite for educational fulfilment then children must know and understand what communication entails, and acquire the relevant skills. The acknowledged four modes of language which make up the system of human communication are listening, speaking, reading and writing. The modes are composed of a range of interrelated and interdependent skills and concepts as well as some peculiar to each specific mode. Children should be able to use writing as an integral part of the complex system of language but be

able to recognise and utilise its own uniqueness as a communication tool.

Halliday (3) attributes three functions to language:

a) the "ideational" function by which language is used to help develop structure within learning experiences;

b) the "interpersonal" function which is necessary to all social needs;

c) the "textual" function which is to do with understanding and making use of language itself.

These three language functions can act as the foundation for the teaching and learning of writing. Writing can be identified with them in the following way: the first as a cognitive tool to help the exploration, clarification and understanding of learning experiences; the second to satisfy personal and social needs and requirements; and thirdly as a means of expressing ideas thoughts and needs, responding to situations, and developing writing in the context of communicating generally.

2.3 GENERAL OBJECTIVES

These objectives focus on the exact purposes for writing experiences. Frank Smith lists ten points for the use of language which he states are equally applicable to the utility of writing.

Writing can do everything that language in general can do.
(Frank Smith, *Writing and the Writer*, 1982, p14)

The ten points are:

1 INSTRUMENTAL: language as a means of getting things, satisfying material needs.

2 REGULATORY: controlling the behaviour, feelings or attitudes of others.

3 INTERACTIONAL: getting along with others, establishing relative status: establishing separateness.

4 PERSONAL: expressing individuality, awareness of self, pride, pleasure, anger grief.

5 HEURISTIC: seeking and testing knowledge.

6 IMAGINATIVE: creating new worlds, making up stories, poems.

7 REPRESENTATIONAL: communicating information, descriptions, expressing propositions.

8 DIVERTIVE: puns, jokes, riddles.

9 AUTHORITATIVE / CONTRACTUAL: statutes, laws, regulations, agreements, contracts.

10 PERPETUATING: records, histories, diaries, notes, scores.

An advocated frame of reference for writing experiences, first put forward in the Bullock Report "A Language for life" (4), can be found in the Schools Council Research Study (5). It identifies three main writing categories.

EXPRESSIVE:- to reveal and record the personal feelings, opinions, and thoughts of the writer; to share views and interpret situations; to develop ideas and establish relationships.

TRANSACTIONAL:- to inform people; to record facts; to exchange opinions; explain and explore ideas; construct theories; transact business; conduct campaigns; change public opinion; to make specific accurate reference to what is known in reality.

POETIC:- to use writing as an art form; to create patterns and "objects" from language; to please and satisfy the writer; to try and achieve satisfaction from a reader; to write using language for its own sake not as a means of achieving something.

A set of general objectives for teaching writing were formulated by grouping all the writing categories mentioned previously into three areas.

1) PERSONAL writing for children to:
express feelings, opinions and thoughts; share their views; interpret situations; persuade or control other people; create imaginary situations and events; explore personal views and knowledge.

2) FUNCTIONAL writing for children to: inform; record; explain and report; test and seek knowledge.

3) LITERARY writing for children to:
explore and experiment with language; gain and give pleasure through writing; appreciate and develop a variety of writing styles.

2.4 SPECIFIC OBJECTIVES

The global and general objectives serve as a rationale for the

nature and purpose of the writing experiences to be provided, but these need expanding to determine the exact content of the experiences. This will include: what the children are encouraged to write; how they will write; how the writing will be developed; how the children's own views and purposes will be catered for. These aspects need careful consideration in the provision of specific writing situations.

This means that the formation of specific writing objectives will involve:-

- a) the writing purpose with relevance to educational aims, global and general objectives. ie the range of personal, functional and literary writing needs.
- b) the task with relevance to the intended reader. ie appropriateness, style and stimulus.
- c) consideration of the writing process with reference to the content of the writing experience.
- d) awareness of the skills demanded by the experience, the reviewing of what has been written.

To supply a definitive list of specific objectives for the teaching of writing would be impossible because of the complex amount of variables involved. Some specific objectives can be found in the 'English 5-16: Curriculum Matters 1' document. (6) and 'English from 5-16: The responses to Curriculum Matters'. (7)

From the aims and objectives previously mentioned, a model for determining the provision of classroom writing experiences was identified. (Figure 2, page 24).

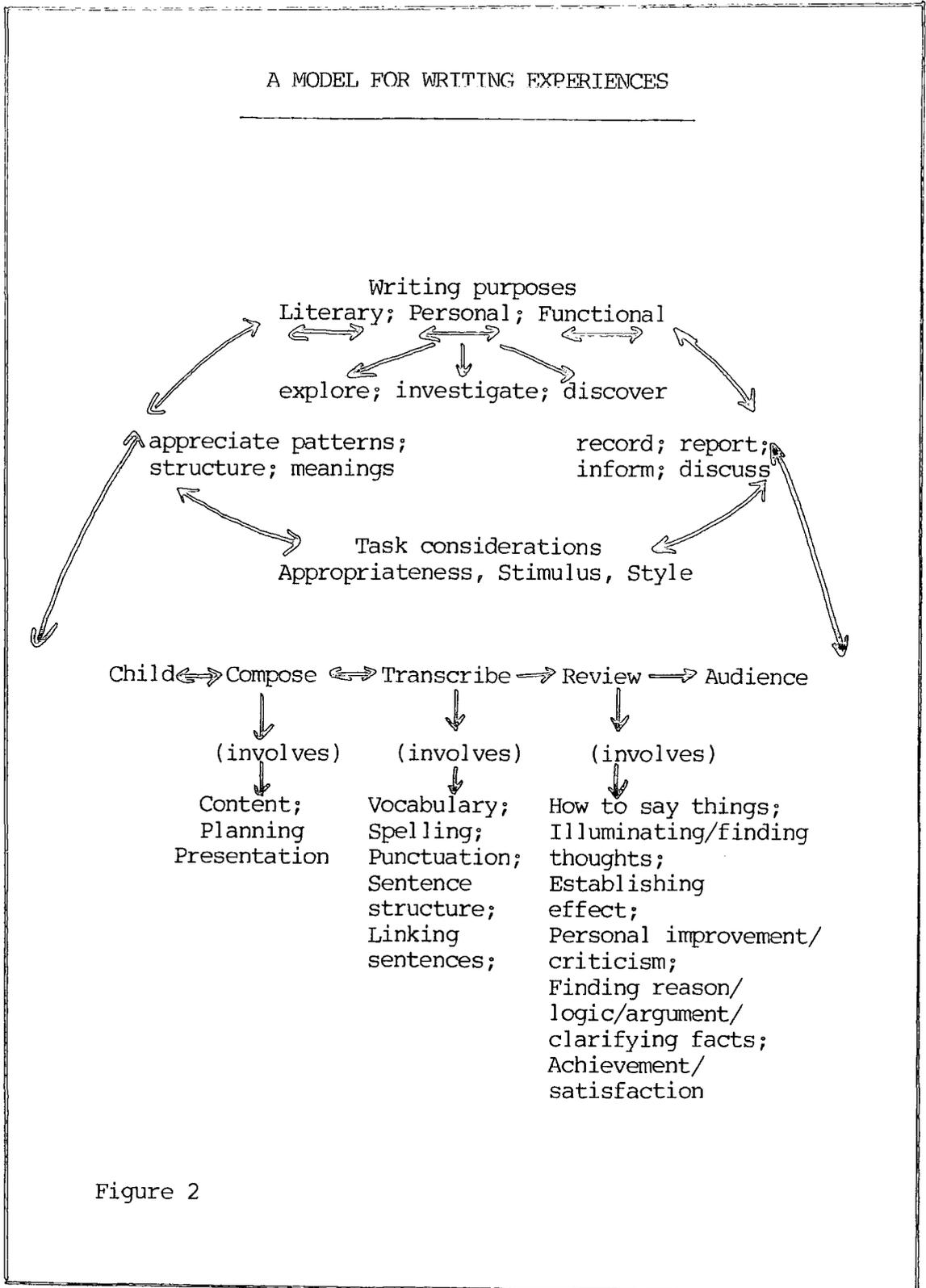


Figure 2

2.5 TEACHING METHODS AND STRATEGIES

Some key implications for teaching methods and strategies can be drawn from the writing model Figure 2, page 24. This is not intended to be a classification of writing experiences or teaching activities for an advocated writing policy. The points made are key issues commonly reiterated in several authoritative books, projects and reports on the subject of children's writing. The points are not totally comprehensive, but are meant to form a set of guidelines for the purpose of this research.

2.6 WRITING PURPOSE

Writing activities are essentially about communication, and children should be presented with opportunities which require them to write 'something' to 'someone', and recognise the need for the writing. The activities should involve the children in a wide variety of writing situations, so that a range of applications within the literary, personal and functional writing areas can be experienced and explored. In all writing situations it is implicit that successful teaching is based on the teacher's knowledge of the forms of writing, and the developmental needs and abilities of the children.

2.7 PERSONAL WRITING

This form of writing can act as a reflection and articulation of the writer's knowledge, ideas and feelings. It is the form most

closely related to speech, and is therefore the most pertinent to younger children as their starting point in writing development. It has its beginnings in talk through direct experiences, imaginative play, and learning situations of a practical nature. Through speech children can express their individuality and it is this quality that the teacher must try to encourage in written work. Children can use writing as a vehicle for saying what they think and feel in response to a variety of situations for different audiences. The nature of individual personal writing suggests, that children should only be presented with writing opportunities which allow them to draw from their own experiences.

Even in the initial stages of personal writing, it is important that children begin to review what they have written, in order to appreciate the effectiveness of their writing. At a later stage, individual personal writing becomes increasingly introspective, and children can use it as a way of examining their thoughts to find out what they think and feel. This writing is related to direct experiences, but can also result from responses to literature or other people's experiences.

Social personal writing can be seen as an extension to individual personal writing. Young children can be involved in this form of writing through simple shopping lists and letters, but it is a demanding form of writing and is probably most appropriate to children

at the upper end of the primary range. It differs from individual personal writing in that the children are asked to direct their writing to a specified audience in an appropriate style.(8)

2.8 FUNCTIONAL WRITING

This form covers three main aspects. Firstly, the writing can be a response to an experience such as a visit, a discussion, or an event. Such reports could reflect on what has been observed, and contain information which encapsulates involvement in the happening. Secondly, the writing can be a result of a practical activity. This could be through such as an environmental project survey where data is interpreted and inferences and conclusions can be made. It could also be through scientific experiments, or the setting up of problem solving activities related to other curriculum areas. This would involve the children in articulating questions, deciding upon future developments and presenting hypotheses. Thirdly, the planning and organising of a piece of writing to produce information or evidence such as lists and charts. This would involve the structuring of writing in a logical and appropriate way, so that results are obvious and conclusions can be made.

2.9 LITERARY WRITING

In this form of writing the emphasis is on the structure, meaning, and the linguistic features it contains. Writing situations should present opportunities for the children to explore and experiment with

vocabulary, structures, text organisation, presentation and the development of ideas. The writing activity should not be restrictive. It should encourage the children to be creative, using vocabulary and imagery in unusual, descriptive and original ways.

The sources for literary writing are many ie stories, poetry, songs, plays, riddles and jokes. Easy access to books and the regular reading of them can provide a rich source for children's literary awareness and a significant influence on their own writing. (9)

2.10 CONSIDERATIONS FOR THE SELECTION AND PROVISION OF WRITING

TASKS

The selection and presentation of writing tasks should be based upon certain key factors.

APPROPRIATENESS:-

- a) Writing should be recognised as a vital component in a child's intellectual, emotional and social development.
- b) Any writing task should be a relevant part of a whole learning experience not just the outcome.
- c) Writing should not be seen as an isolated curriculum subject. Children should be able to relate writing tasks to a range of curriculum activities and recognise its various functions within the range. An organisation of integrated general curriculum activities can widely support the interrelationship between different writing objectives and curriculum areas, and can promote the growth of writing abilities.

- d) Writing should be regarded as an opportunity to explore experiences, to realise and understand the learning taking place.
- e) A full range of writing experiences should be catered for, and teachers should be aware of balance and unity between the variety of writing situations they present.
- f) Consideration must be given to the process of writing development and its implications for each child when tasks are determined.
- g) The task should reflect the child's experience and knowledge of the intended audience.
- h) The purpose of the task should be explicit if children are expected to respond in a particular way, and appreciate the relevance and value of their response.

2.11 WRITING STYLES:-

Writing experiences should result from a range of learning situations, which present the child with opportunities to respond to a variety of writing purposes for different audiences. The situations should satisfy the child's need to experience functional, personal and literary responses. The audiences should be varied enough for the child to recognise the different writing demands. These can range from the child writing: for his/her self; for other children of their own and other ages; for his/her teacher; for other teachers; for parents; for visitors to the school; for contacts in industry; for people in different environments; for real and imagined people; for known and presumed people.

2.12 STIMULUS:--

The choice of writing stimulus, and the nature and extent of the teacher's involvement, inevitably determine the child's perception and organisation of the task. Writing opportunities should not be identified simply for 'writing' to take place, but for learning to take place. Each writing situation should be related to some aspect of development, with a specific objective in mind. A writing activity should be within the child's experience, and the expectation related to the child's capability and understanding.

'begin with the child's own experience and understanding, prefer present to absent, concrete to abstract, look for the most direct and accessible ways of enlarging experience.

(W. Harpin, *The second "R"*. 1976, p 117)

To present the widest range of writing experiences a variety of activities should be provided. The choice of the writing situation will inevitably come from the child's immediate need, whether this is identified and made obvious by the child, or identified by the teacher as being relevant to the child's writing development. How the writing situation is introduced, organised and conducted will be determined to a great extent by the purpose for the writing. In certain kinds of writing, eg. personal, children will need the freedom to pursue their own thoughts with the minimum of interference. In other situations, children will need to be made aware of the variety of ways the writing response can be made. A wide and stimulating curriculum can provide all the necessary classroom opportunities for

writing. How the children respond to the stimulus will depend on the teacher's skill in initiating the task, using the most pertinent resources.

The stimulus-response model of a narrowly conceived 'creative writing' lesson seems best used sparingly. Perhaps it can be most profitably linked to a sympathetic commentary by the teacher on the possibilities of structure, unity and harmony in writing, rather than a concentration on teacher-approved words and phrases. Linking writing to an evolving curriculum theme can provide indirect resources and experiences on which young writers can draw.

(R. Beard, *Children's Writing in the Primary School*, 1984, p92)

The choice of writing activities and stimuli will be governed by the following major concerns:

the child will be able to draw from educational and environmental experiences;

the writing can be seen by the child to have a purpose;

the child will have something positive to say;

the child has the necessary skills which the choice will demand;

the activity is pertinent to the child's development;

the most appropriate resources are used by the children.

2.13 CLASSROOM ORGANISATION

If writing experiences demand different results, then it is inevitable that no one form of organisation or writing situation can be used.

A possible organisational range could include:

individual work; work in small groups or large groups; class work;

child with teacher; child with other adults;

Possible writing situations could include:

a place with appropriate resources; a quiet area to listen, think or write; an area suitable for discussion.

2.14 THE WRITING PROCESS

When a writing purpose has been identified and an activity has been specified, the actual process of writing begins. From evidence produced in many books on writing, it appears that it is this aspect which is given the least attention by teachers. Teachers tend to be pre-occupied with getting children to "write about something", which becomes the main focus for writing and the real educational intentions are pushed aside.(10) Yet it is when the actual writing begins that 'learning' should take place. Too often the value of the writing is lost when the emphasis is on the production of the writing rather than the process.

2.14.1 COMPOSING:-

The actual composing part of the writing process has two distinct teaching implications.

1) the gathering together of information and knowledge about a particular writing function.

2) the selecting of suitable parts and ordering them in an overall plan to fulfil the writing purpose and satisfy the intended audience.

The first part of composition can be tackled in several ways through appropriate stimuli with the teacher providing any necessary support and guidance. In most cases, the initial introduction will involve discussion and dialogue. This can involve the teacher and children/child, the children on their own, or the children with another adult. However there will be occasions when children will begin their writing with no preliminary talk at all. In some cases it can be detrimental to have extensive preliminary talking. Harpin's project enquiries (1976) showed that in factual writing there seemed to be little effect from preliminary discussion, and in creative writing the discussion seemed to lessen the maturity of the writing.

Most discussions of the teaching of writing in schools somewhere include the assertion that talk must come first
.....To build this into our practice as a universal principle would, however, be a mistake.....We may in over-employing this approach, set boundaries for the writer of which we are unaware and inadvertently hinder the development in written language we are trying so hard to promote. In addition, the self-motivating writer is less likely to emerge, if these are the standard conditions of work.

(W. Harpin, Op.cit., p135)

One of the greatest challenges for children in the the writing process is the transference of their experiences from a spoken language source into a written symbolic form. (10) It is at this stage when intervention by the teacher will be most valuable. Through involvement at this stage, the teacher can gain vital information about children's capabilities and their understanding of the writing process, and thereby support their development.

Perhaps the relative influences of different factors which influence composing can only be judged properly by directly intervening in the writing process as it is going on, rather than asking people 'what they did' after they have finished.

(R.Beard, Op.Cit., p28)

Bereiter and Scardamalia (1982) (11) studied the composition aspect of the writing process and identified "procedural facilitation" as a distinct way in which children can be helped in the development of written language. This involved a kind of supportive consistent prompting by the teacher. They felt that eventually, the children can develop such self-cueing for themselves, and this can have significant results in early writing development.

Collaborative writing situations of child and child, or child with adult, encourage children to confer and study writing as it takes place. Through this discussion children can explore writing techniques and ideas, and develop an awareness of effective writing.

Children need to be helped to develop a range of writing procedures such as:

- to acquire pertinent techniques and skills;
- to analyse and become self critical;
- to develop awareness of the power of words and relevant arrangements;
- to be selective and pursue ideas;
- to be directed towards the writing goal;
- to structure their writing for effect and to achieve the purpose of their writing.

2.14.2 TRANSCRIBING:..

This aspect of the writing process covers a network of skills such as spelling, punctuation, use of vocabulary, sentence structure, and handwriting. Written communication has an acknowledged system of presentation, as there must be some agreement for the writing to be received and understood by a variety of recipients. However, the acquisition of the system of writing is only part of the process. If the writing process can be described as a "cycle of decisions" on what to write, how to write, and how to improve on what has been written, then the skills can be recognised as only a contributory aspect of the writing process.

It has been stated in most recent writing surveys that the transcribing area of the writing process is given a great deal of emphasis by teachers. This can have a detrimental effect on the development of children's writing, as it can detract from the real purpose of the writing. The acquisition of transcribing skills must be placed in the context of the total writing process, they must be seen as a means to achieve a writing purpose. Too often the skills are presented in isolation and without any regard towards developmental objectives.(12) Significant mastery of the skills can only result from a genuine recognition of the need to acquire them.

2.14.3 REVIEWING:-

The reviewing of writing involves editing, revising, and re-writing. In the course of editing their work children can become

involved in observing, testing, and learning the conventions of transcription which will make their writing acceptable to a reader. In the course of revising, the content and the composition can be reconsidered, new ideas may be developed or original ideas improved. Re-writing is the children's reponse to what has been edited and revised.

For young children in the initial stages of writing development reviewing and rewriting may not always be appropriate. Some children who lack confidence in their writing capabilities could find it inhibiting rather than encouraging. Even at later stages of development, reviewing and rewriting must be of a constructive nature rather than an expected aspect of the writing activity. Reviewing, evaluating, and rewriting activities should provide real opportunities for learning. (13) At this stage in the writing process teacher intervention can be significant. Children can be encouraged to question and evaluate what they have written, and be helped to acquire new skills and knowledge. They can be encouraged to develop an appreciation, understanding, enjoyment and mastery of writing.

2.15 SUMMARY:-

The following summary is related to Figure 3 (page 39) which shows a framework for the teaching of writing in the primary school. This framework is the educational basis for the organisation and evaluation of the subsequent microcomputer research activities.

EDUCATIONAL AIMS

Writing is a recognised system for communicating. Children need to understand and be able to utilise the system to function fully as individuals and as members of society.

GLOBAL OBJECTIVES

Communication consists of the interrelated aspects of listening, speaking, reading and writing, and children should be encouraged to develop their understanding of writing within this total language context. The main functions of writing can be identified as: a tool to support learning and the understanding of learning experiences; to meet social and personal needs; and to make full use of the power of this language mode as a communication device.

GENERAL OBJECTIVES

The three major purposes for writing can be regarded as personal, functional and literary. Within these functions there are various dependant specific objectives which will change according to the purpose of the writing, in relation to the intended audience. Children will need to encounter a range of writing demands, in a variety of situations, in order to experience and recognise the various purposes and to learn to respond appropriately.

SPECIFIC OBJECTIVES

These will be the exact writing situations to be provided by the

teacher. They should always be related to a specific writing function within a developmental framework.

METHODS AND STRATEGIES

These will involve many considerations:

organisaton;

resources;

stimulus;

teacher intervention and interaction;

the classroom environment;

the teacher's knowledge of the curriculum area;

the children's developmental stages and capabilities;

the assessment and evaluation of the teaching and learning.

A FRAMEWORK FOR TEACHING WRITING IN THE PRIMARY SCHOOL

Educational Aim
To enable the child to function
as an individual and as a member of society

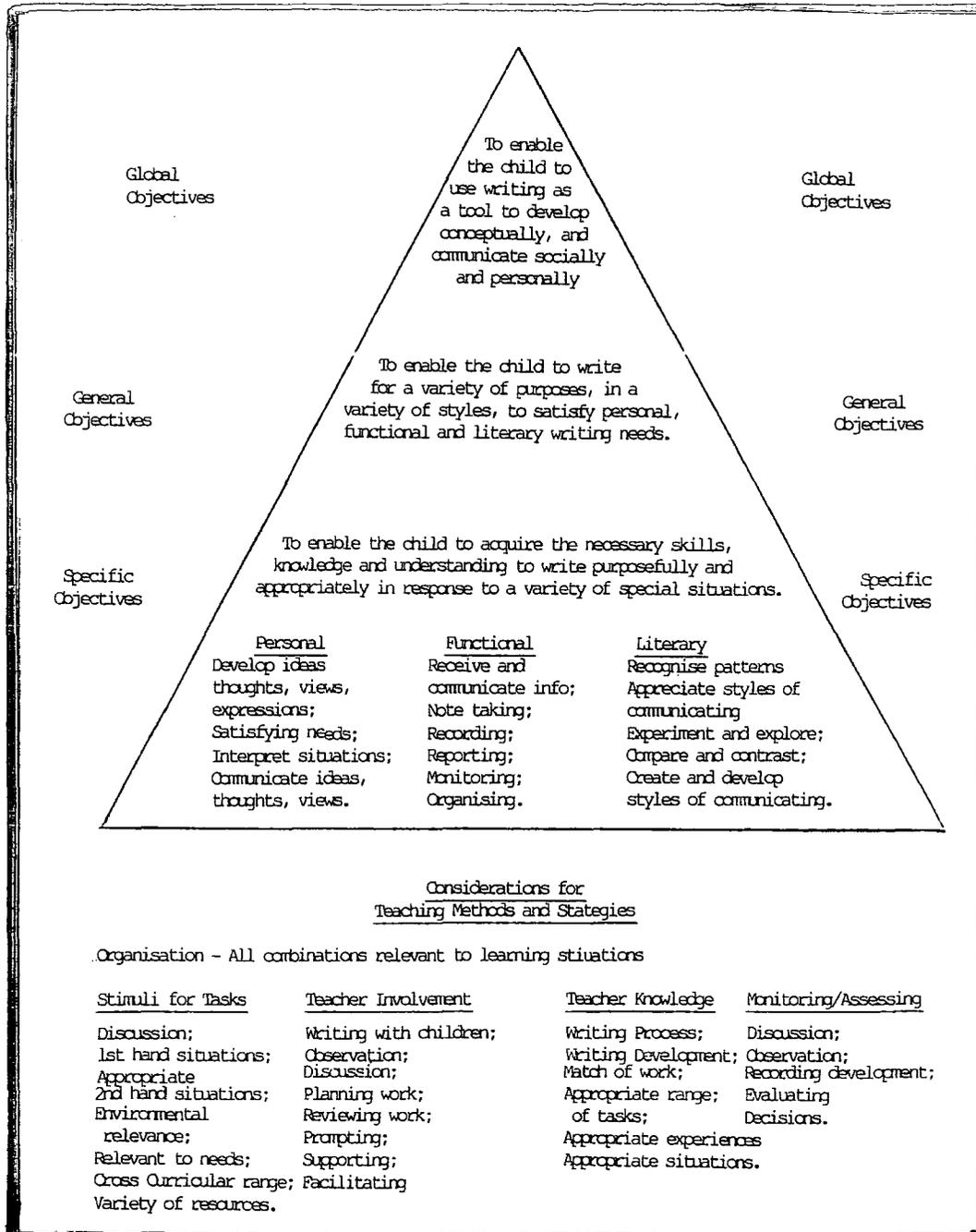


Figure 3

REFERENCES CHAPTER II

1. Smith, F., (1982), Writing and the Writer, London: Heinemann Educational Books Ltd.
2. Kress, G., (1982), Learning to Write, London: Routledge and Keegan Paul.
3. Halliday, M.A.K., (1970), Language structure and language functions, in Lyons, J., (ed), New Horizons in Linguistics, Harmondsworth, London: Penguin Books.
4. D.E.S., (1975) A Language for Life, (The Bullock Report), London: H.M.S.O.
5. Britton, J., et al., (1975), The Development of Writing Abilities, Schools Research Studies, London: Macmillan Education.
6. D.E.S., (1984), English from 5 - 16, London: H.M.S.O.
7. D.E.S., (1986), The responses: English 5 - 16, London: H.M.S.O.
8. Harpin, W., (1976), The Second 'R', London: Unwin Education Books.
9. Beard, R., (1984), Children's Writing In The Primary School, Kent: Hodder and Stoughton Educational.
10. Harpin, W., Op. cit.
11. Bereiter, C., and Scardamalia, M., (1982), From conversation to composition: the role of instruction in a developmental process, in Glaser, R., (ed) Advances in Instructional Psychology, Vol. 2, London: Lawrence Erlbaum Associates.
12. The Bullock Report, Op. cit.
13. Thornton, G., (1980), Teaching Writing, London: Edward Arnold Ltd.

CHAPTER III

A REVIEW OF CURRENT PRACTICES

IN THE TEACHING OF WRITING

In Chapter II a framework for teaching writing was established (Figure 3, page 39) in order to develop relevant microcomputer research activities. This chapter investigates current practice in the teaching of writing to compare with the framework, and also to form a basis for the monitoring and assessment of the research activities and evaluation of the subsequent results.

3.1 THE DEVELOPMENT OF WRITING IN THE PRIMARY SCHOOL

Ideas and principles on the purpose of writing, its place in education, and how it should be taught have been developing over a number of years. Prior to state education, and up to seventy years later, writing was regarded as having little significance with reading given paramount importance. The teaching of writing was based on learning and practising letter formation and the copying of written works.(1) The report 'The Teaching of English in England' (1921) (2) introduced the distinction of different types of writing, and emphasised the value of "self expression" as opposed to "artificial"

writing and the fundamental importance of speech. The Hadow Committee Report, (1931) (3) emphasised the role of the teacher as the "facilitator", and in keeping with this, drew attention to the types of writing situations children should be given, and the importance of relating them to the child's experiences and oral development. However, the report failed to acknowledge the purpose for writing, thereby ignoring some of the most valuable aspects of writing, and its place in educational development.

The teaching of English with all its related aspects was declared as central to the curriculum in a DES pamphlet, (1954), (4). This coincided with a significant change of emphasis in writing situations towards "free writing", and changes in teaching methodologies to achieve it. Teacher initiated tasks, with the emphasis on spelling and punctuation, were replaced with the provision of writing 'situations', where children were asked to respond freely to a wide range of selected stimuli.

Support for extending the ways in which children were asked to write continued quite strongly. This movement was further supported by the abolition of the '11 plus' junior to secondary transfer examination. The exam was narrowly focussed towards the formal aspects of writing ie grammar, spelling punctuation, and essay, with much of the writing taking place in the classrooms geared to these requirements.

In 1964 A.B. Clegg published an anthology of children's writing (5). This drew attention to two main kinds of writing "personal" and "recording", and the ways this writing could be stimulated. The Plowden Report (1967) (6), reiterated the value of exposing children to a variety of writing demands, and advocated children's own experiences as being the best source for "creative writing".

3.2 SURVEYS INTO SCHOOL WRITING PRACTICES

'A LANGUAGE FOR LIFE'; REPORT OF THE COMMITTEE OF INQUIRY
APPOINTED BY THE SECRETARY OF STATE FOR EDUCATION AND SCIENCE
UNDER THE CHAIRMANSHIP OF SIR ALAN BULLOCK FBA (1975)

Although in the late 1950's and 1960's there was an expansion in the kinds of writing children were asked to produce the report remarked:

What is open to question is whether this expansion has been as far-reaching as is sometimes believed.
(Language for Life, Op.cit., pl63.)

The report also highlighted teachers' misunderstanding of the kinds of writing they were encouraging, especially in the area of "creative writing".

'this lack of agreed definition reflects the absence of a clear rationale for the work to which it refers, and this applies equally to such terms as 'free', 'expression', and 'personal'. In our view the main stream of activity in the area of 'personal writing' should arise

from a continually changing context, not from a prepared stimulus. This context will be created from the corporate enterprises of the classroom and the individual interests and experiences of the children, cumulatively shared with the teacher and the rest of the group.

(Language for Life, Op.cit. pl63.)

The Bullock Inquiry and many other reports refer to the use of text book or work cards which provide artificial writing situations.

We believe that extensive reading and writing are of prime importance for language growth but that they should be supported by explicit instruction. We cannot accept that the development of language can be left to chance..... We must emphasise, however, that everything depends upon the teacher's judgement and his ability to ensure that what is taught meets the needs of the pupil in his writing. Explicit instruction out of context is in our view of little value.

(Language for Life, Op cit., p 172)

Although it is acknowledged that children do require skills and techniques, it is felt that they should be acquired through writing situations which will put the purpose and value of the skills in a meaningful context.

The solution lies in a recognition on the part of the teachers that a writer's intention is prior to his need for techniques. The teacher who aims to extend the pupil's power as a writer must therefore work first upon his intentions, and then upon the techniques appropriate to them.

(Language for Life, Op.cit., pl64)

In defining what "creative writing" entailed the Bullock Inquiry found a great inconsistency among teachers reflecting an absence of rationale for this aspect of writing. Furthermore, it indicated the

absence of a rationale for much of the teaching of writing in the primary age range.

The report expressed the view that much of the written work being done in schools was based on traditional teaching habits and expectations, rather than defined educational aims and objectives. Other survey results revealed that the most common organisational form for activities was class work, and that writing for topic work was directed mainly towards copying from reference books. Also shown was an emphasis towards formal aspects of writing even with young children.

The inquiry also drew attention to many other concerns:

the ambiguity among teachers regarding the meaning of writing terms (11.4);

the lack of structure in activities and the matching of activities to children's developmental needs (11.6);

the teachers' need to be aware of the processes involved in writing (11.7);

the directing of tasks to the teacher as the reader rather than a genuine "audience" (11.9);

the lack of support for drafting and editing of work (11.10);

the use of text books to provide a progressive working structure as opposed to the teachers setting their own specific objectives relevant to their children (11.22).

The following figure represents a summary of the Bullock Inquiry survey results, on the types of writing activities being presented by teachers. Numbers taken from the survey tables 52, 53, 56, 57, 58, 59 (pages 392, 393, 396 to 399)

Writing Area	Approx. no. of teachers teachers devoting up to 1 hour in this area	Approx. no. of teachers who do not do any writing in this area
6 year olds (No. of classes surveyed 1,417)		
personal/stories	27%	10%
creative etc		
topics	42%	45%
comprehension	50%	21%
vocabulary,		
grammar, punctuation	48%	51%
spelling	58%	40%
handwriting	79%	15%
9 year olds (No. of classes surveyed 1,253)		
personal/stories	50%	6%
creative etc		
topics	38%	21%
comprehension,	56%	12%
vocabulary,		
grammar, punctuation	73%	17%
spelling	94%	13%
handwriting	74%	24%

Figure 4

3.3 Surveys into school writing practices

Assessment of Performance Unit Reports.

"Language Performance in Schools: Primary Survey Report No. 1".,
(1981)

"Language Performance in Schools: Primary Survey Report No. 2".,
(1982a)

"Language Performance in Schools: Secondary Survey Report No. 1".,
(1982b)

"Language Performance in Schools: Secondary Survey Report No. 2".,
(1983)

Many of the remarks made in the Bullock Inquiry were shared in the survey reports. The Primary 1 and 2 Reports commented on:-

children's difficulties in adopting writing styles in respect of different audiences (P1 4.98 & P2 4.62,4.136);

the emphasis towards writing conventions in the work produced (P1 4.100) and in any editing (P2 4.114);

the lack of drafting and editing (P2 4.74);

the reports found that children generally favoured 'story telling' as a form of writing, however, it was suggested that this was because it was the most familiar form of writing to the children rather than the most interesting (P2 4.116);

many children felt that the writing they most disliked was that produced through the use of text books (P1 4.127)

The following is from a summary of the secondary report (1983) given in "Assessment of Writing, Pupils aged 11 and 15. A short report for teachers."(7)

The survey highlights the conflicting realities of much of school based writing. On the one hand, 'writing' in a day to day sense, is more a means of reproducing, recording and recycling knowledge, with scant personal investment on the part of either reader or writer.....on the other hand, when pupils pause to consider that writing might have a purpose or even pleasure beyond the demands of essential learning the model of writing they most frequently cite is that of fictional narrative, disregarding its many technical difficulties in favour of a belief that story writing, uniquely allows the use of the imagination.

(APU, The Assessment of Writing, (1986), p40)

The recommendations at the end of the summary are directed towards the major concerns from the survey results:-

"Pupils could be helped to improve their writing performance in the following ways:

- by producing less writing in total
- by being encouraged to write for a wider range of purposes and for a more varied readership
- by building on their existing skills as speakers of the language and being made aware of the contrasting demands of speech and writing
- by constructing for themselves, either as individuals or in groups, a definite purpose for what they write.
- by being given regular constructive and systematic feedback about the quality of their written work
- by being made aware of the place of writing in the process of learning and the value of note-taking and exploratory drafting
- by having opportunities to work collaboratively through the stages of composition and revision "

3.4 SURVEYS INTO SCHOOL WRITING PRACTICES

EVIDENCE FROM MAJOR REPORTS 1976-1981

N. Bennett, 'Teaching Styles and Pupil Progress', (1976)

DES, 'Primary Education in England', (1978),

DES, 'Education 5 to 9: an illustrative survey of 80 first schools in England', (1982a)

M. Galton, et al, 'Inside the Primary Classroom', (1980)

V. Southgate, et al, 'Extending Beginning Reading', (1981)

The Bullock Inquiry, and the A.P.U. surveys, have been the only primary research reports in recent years, which have directly researched the teaching of writing. The Southgate et al. report provided some detailed information about writing practices, and the other reports listed above contain research data about general primary classroom activities, with references to writing practices. Details in the findings vary considerably, however, they all present information about patterns of classroom activities which can be related to the teaching of writing, and certain inferences and generalisations can be made. The following points are some of the findings which were also supported in the Bullock Inquiry, and the APU surveys.

3.4.1 WRITING TASKS

The reports indicated that a great deal of time was given to writing, but the actual work produced did not particularly correlate with the allocation. In some cases lack of concentration on the

activity was attributed to lack of motivation.

Quite often, the reasons for the variations shown could be traced to motivation.....When writing about a book of his own choice, his task concentration was 70%. However, when he was asked to write about a television programme which had clearly not captured his interest, his concentration dropped to 33%.

(V. Southgate et al., *Extending Beginning Reading*, (1981), pl39)

The reports indicated that many learning activities were teacher directed, very often in a didactic way.

Children were frequently involved in writing tasks which had been set by the teachers. These activities were more common than writing initiated by the children.

(D.E.S., *Primary education in England*, (1978), 5.32)

The amount of time spent on discussion prior to classroom activities was low. There were common introductory patterns for writing activities, such as the use of T.V. programmes and stories, which were followed by the teacher asking questions and writing vocabulary on the blackboard for the children to use in their writing. In the D.E.S. 1982 report it was stated that copying from the blackboard took "too prominent a place" in about a third of the classes in the nine and 11-year- old age range.

The writing experiences presented to children fitted broadly into three areas, "free" or "creative writing"; "topic" work; and "exercises" to acquire or reinforce basic skills. "Free" writing was felt to be predominantly imaginative writing with some aspects of personal writing being neglected.

It was rare to find children presented with a writing task which involved presenting a coherent argument, exploring alternative possibilities or drawing conclusions and making judgements.

(D.E.S., Op cit. 5.36)

There was agreement in the Southgate and D.E.S. 1978 reports that topic work was done with the aid of numerous reference materials and books, and the writing consisted of "extensive" copying. In the teaching of basic skills the reports noted a heavy reliance on the use of text books.

Text books containing comprehension, grammar and language exercises were used to provide children with knowledge of language techniques and writing conventions, including spelling and syntax.....Text books featured in the work of almost every 9 and 11 year old class, and about two-thirds of 7 year old classes.

(D.E.S., Op cit., 5.45)

3.4.2 WRITING AIMS AND TEACHER INVOLVEMENT

Writing for different audiences reflecting different writing purposes was uncommon. As shown in the Bennett, ORACLE, and Southgate reports, most of the writing was directed towards story writing, recording of topic work, comprehension, grammar and spelling exercises. In each report there appeared to be a lack of consensus among the teachers regarding the function of various kinds of writing, especially in "personal writing".

There was strong evidence, that teachers placed a great deal of emphasis on the production of writing for classroom writing situations, rather than children's writing development. After activities had been

allocated children were inevitably left to pursue them alone.

While teachers may take satisfaction at the relatively high levels of work activity which were maintained in the classes studied there must be some concern about the isolation of many children while engaged on the work.

(M. Galton et al., ORACLE survey, (1980), p161)

There was little evidence to suggest that teachers based the activities on specific writing objectives or children's developmental needs.

Almost as much time was spent by teachers in helping children with spellings for their written work. Indeed, often these two activities ran concurrently; the class being engaged in reading and/or writing activities, the teacher sitting at her table and listening to one child reading on one side, while on her other side a queue of children formed to request help with spelling.

(V. Southgate et al., Op cit., p 317)

'all of these class writing periods were used by the teachers, as much for hearing individual children read from their reading books as for giving direct help and instruction in aspects of the main class activity.

(V. Southgate et al., Op cit., p 131)

Children working in groups was the most common form of classroom organisation reported, but most of their work was done individually, and collaborative work was incidental.

Most pupils return home after a day in school having had very little conversation on matters relating to work either with their teacher individually, or with their fellow pupils. If they do interact with the teacher they probably will be 'talked at' not 'talked with' and conversation between pupils will, in many cases, have nothing to do with work as such. While grouping, by increasing contact with the teacher, would seem to provide a partial answer to this situation, it is disturbing to find that, as used by the ORACLE teachers, it does not increase the amount of pupil-pupil interaction to any significant extent.

(M. Galton et al., Op cit., p 161)

Regular monitoring and assessing of children's work was hard to detect, with casual remarks being given by teachers, rather than systematic questioning and observation. Neither was there much evidence that work was marked to diagnose children's difficulties or needs, or to monitor their progress.

Surprisingly, in only about a third of the classes were samples of children's work regularly used to monitor their progress. In fewer than half of the classes was children's own written work used as a basis for teaching spelling, syntax, sentence structure or style.

(D.E.S., Op cit., 5.38)

The reports imply that there was a lack of concensus among teachers about what writing involved, and the nature of the writing process. There were strong suggestions that teachers emphasised the production of writing as the focus of experiences. There was also little evidence to suggest that teachers had a planned programme for the development of skills, or particularly designed activities to match children's developmental needs. There did not appear to be any indications that teachers writing with children was an accepted or regular practice.

3.5 SURVEYS INTO SCHOOL WRITING PRACTICES :

A PERSONALLY CONDUCTED SURVEY AS PART OF THE RESEARCH PROGRAMME.

This survey involving a small sample of a hundred teachers was taken as a preliminary research activity, to try and establish examples of how the teaching of writing was currently being approached. The

survey explored the teachers' views and classroom practices in teaching writing. Although the survey results could not be regarded as totally representative of all teaching, they did provide an indication of prominent teaching trends. The results were later compared with the teaching practices of the teachers involved in the microcomputer research activities, to determine whether their practices matched the current trends. The survey was also used to identify changes or similarities in patterns of practice, compared with the Bullock Inquiry, APU surveys, and other major reports mentioned earlier in the chapter.

Approximately 400 questionnaires were sent out in October 1985 to teachers of children in the 7 to 11 age range at schools in different regions throughout the country. 100 questionnaires were completed and returned. The questionnaire (See appendix 1) was formulated around three distinct teaching aspects with regard to the surveys and reports, the HMI discussion document "English from 5 to 16" (1984), and the Framework for the Teaching of Writing, Figure 3 Chapter II (page 39).

1. WHY...To investigate teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

(Questions 3A; 3B; 3C; 4D; 5D; 5E)

2. WHAT..To investigate the range and content of the writing experiences being provided by the teachers.

(Questions 2C; 2F; 4c; 4E; 5A; 4G; 4H)

3. HOW...To investigate how teachers organise writing situations, the use of resources and how children's writing experiences are monitored and developed.

Although the questions were devised to fit into the above categories, they were not asked in a specific order. This was so that the teachers could not detect the links and patterns within the questions, and answers could be cross referenced in the final analysis. The questionnaire was arranged so that a number of questions could be answered by ticking response boxes. This meant that the time needed to complete the questionnaire was kept to a minimum, and these answers could be analysed reasonably easily. The questions where response boxes were provided were mainly those directed towards the more practical aspects of writing provision, where it was reasonable to expect a range of limited answers, however, provision was also made for alternative or additional answers.

The range of possible responses were chosen with reference to the findings from the surveys, reports, and the framework for teaching writing (Figure 3 page 39). The responses had been arranged into specific categories, and answers generally followed particular patterns

and were fairly easy to collate. More than half of the teachers took advantage of using the spaces provided to make alternative responses. This did not complicate the analysis unduly, as in most cases the answer clarified previous answers, or meant the simple addition of a further category. The addition of categories was fairly small as most additional responses fell within certain common areas.

Some questions (2D, 3A, 5A) where the teacher could answer freely presented interpretation difficulties as the answers were not easily categorized. This meant that some answers were grouped under general headings, such as the "1st hand experience" or "2nd hand experience" headings in question 2D, (appendix 12A). Other answers were sub-divided, such as the term "communicaton" defined under several headings in question 3A, (appendix 3A). Two questions, 3B and 3C, (appendices 4A, 5A) presented problems for the teachers taking part in the survey. They were asked to tick only four of the possible responses to the question. The alternatives given were all feasible responses but priorities had to be given to determine the general teaching criteria. There were only ten responses missing from the total 100 sample, and only one teacher who commented on the difficulty of answering two questions.

3.6 100 SAMPLE QUESTIONNAIRE RESULTS: TABLED RESULTS

SHOWN IN APPENDICES 2A TO 15A

The returns showed that the teachers who had taken part in the

survey had an evenly distributed range of teaching experience. The minimum amount of teaching experience was two years (2 teachers), and the maximum was thirty two years (1 teacher).

The following three sections are the main findings from the questionnaire.

3.6.1 ANSWERS RELATED TO THE PURPOSES FOR THE DEVELOPMENT OF WRITING IN THE CURRICULUM, AND THE TEACHERS INTERPRETATION AND KNOWLEDGE OF WRITING TECHNIQUES AND SKILLS.

(Questions 3A, 3B, 3C, 4D, 5E)

1a) The majority of teachers identified writing as a means of communicating in society.

1b) There were few references to a personal need for writing, and only three distinct references to writing as a learning tool.

1c) Children's classroom writing was predominantly shared with the classroom teacher and peers. Less than one tenth of the answers referred to specific writing audiences outside the classroom. Less than a third of the answers mentioned parents as an audience.

1d) The qualities nominated as reflective of a 'good writer' were heavily weighted towards creative writing ie. imagination, expression, and vocabulary. Only a small minority of the teachers referred to

writing for different purposes.

le) The structuring of writing was given a high priority by at least two thirds of the teachers.

lf) The ability to relate ideas and adopt different styles of writing was given a low priority.

lg) The qualities lacked by 'poor writers' were biased towards the production of creative forms of writing. The lack of writing techniques and language experiences were mentioned only by a minority of the teachers.

lh) Nearly half of the teachers had not attended an inservice writing course within the last six years. This could reflect that writing is not considered a high priority curriculum area by either the teachers or LEA's.

3.6.2 ANSWERS RELATED TO THE RANGE AND CONTENT OF THE WRITING

EXPERIENCES BEING PROVIDED

(Questions 2C, 2F, 4C, 4D, 5A)

2a) Stories or creative writing were the writing tasks mentioned by a very high number of the teachers.

2b) The next most nominated area for tasks was formal language work.

2c) Topic and project work was mentioned by nearly half of the teachers.

2d) There was quite a significant difference between the number of tasks given to creative writing and factual writing.

2e) There were some discrepancies in the answers given to questions 2C and 2F in that science and topic work were given as curriculum areas regularly linked to writing (2F) and yet specific writing tasks were not mentioned. (2C) This could mean that the teachers recognised that writing was involved in the areas, but was not particularly identified as having a specific function.

2f) Less than a quarter of the teachers said that their children regularly planned their writing. (4C) This showed direct conflict to the answers given in 3B and 3C when teachers placed the structuring of writing as an important feature.

2g) Three quarters of the teachers said that most of the writing displayed in their classrooms was related to topic work. As topic work was not the major source of writing tasks (Answer 2C), then this would suggest that the displayed writing was not to realise audience objectives but more as topic information.

2h) Of the 87% of teachers who said they provided for children of

differing abilities only 12% mentioned the more able children.

2i) Less than a quarter of the teachers gave children individual or special work to do. Most teachers appeared to provide the same tasks and adjust their expectations of the results. This could suggest that teachers do not give any particular consideration to a structured developmental approach in their provision of writing experiences.

2j) Only one teacher referred to the monitoring of work as part of the educational provision.

3.6.3 ANSWERS RELATED TO HOW WRITING SITUATIONS ARE ORGANISED, THE KINDS OF RESOURCES BEING USED, AND HOW EXPERIENCES ARE MONITORED.

(Questions 2A, 2B, 2D, 2E, 4B, 4A, 4F, 4G, 5C)

3a) Teachers nominated formal language work and topic writing as the basis for most factual writing experiences.

3b) Three quarters of the teachers said they spent less than ten hours a week on writing. This could indicate that writing has not been regarded as having valid cross-curricular applications, and is perhaps regarded as mostly story or formal language work.

3c) Nearly three quarters of the teachers said they varied their

organisation for writing activities. This answer conflicted with answers to questions 2D and 2B which indicated tasks were given as class activities and did not involve much group collaborative work.

3d) Writing tasks were introduced mostly through class discussion.

3e) Nearly half of the teachers said, generally, they initiated the writing tasks. Many of the tasks were introduced through stimuli such as stories, pictures, and television.

3f) Stories and pictures were the most named as writing resources. Nearly half of the teachers used text books.

3g) Nearly half of the teachers said they used the microcomputer as a teaching resource, but this was not verified in the context of collaborative writing, (Question 4B), and drafting and editing of work. (Question 4F)

3h) Collaborative writing opportunities were provided by nearly two thirds of the teachers. The opportunities were directed towards specific tasks rather than learning situations.

3i) Less than half of the teachers expected reviewing, editing, and re-writing of work to be a regular feature of writing experiences.

3j) Children's work was monitored predominantly through marking and observation. Only half of the teachers said they used discussion as a monitoring strategy.

3k) Three quarters of the teachers used a combination of discussion, written comments, verbal comments, display, and marking to respond to children's work. Only a quarter of the teachers said the work was shared with readers other than themselves.

3.7 SUMMARY OF THE FINDINGS

- A) There appeared to be no clear rationale for the teaching of writing.
- B) Story writing was the focus for many of the writing situations.
- C) Writing for different reasons using different styles was not evident in the provision of writing situations.
- D) Writing situations appeared to be task oriented as opposed to meeting developmental needs.
- E) Teacher involvement in writing activities was minimal. Marking, written comments and verbal comments were typical of teacher interaction.
- F) Group organisation was used quite often in the organisation of writing tasks but not for actual collaborative writing.
- G) Reviewing, editing and re-writing of work was not fundamental to

writing experiences.

H) The main consideration in the writing process was towards transcribing skills.

I) The main focus in the provision of writing activities appeared to be the setting of tasks and not for the processes involved.

J) First hand experiences were used infrequently as a source for writing experiences.

K) The teacher was the main initiator of tasks.

L) The use of resources was limited.

REFERENCES CHAPTER III

1. Britton, J., et al., (1975), The Development of Writing Abilities, Schools Research Studies, London: Macmillan Education.
2. The Newbolt Report, (1921), The Teaching of English in England, London: H.M.S.O.
3. Hadow Report, (1931), Report of the Consultative Committee on the Primary School, London: H.M.S.O.
4. D.E.S., (1954), Language: Some suggestions for Teachers of English and Others, Pamphlet 26, London: H.M.S.O.
5. Clegg, A., (ed), (1964), The Excitement of Writing, London: Chatto and Windus.
6. D.E.S., (1967), Children and Their Primary Schools, (The Plowden Report), London: H.M.S.O.
7. White, J., (1986), The Assessment of Writing: Pupils Aged 11 and 15, Windsor: NFER- Nelson.

CHAPTER 1V

THE INTRODUCTION AND USE OF
MICROCOMPUTERS IN PRIMARY SCHOOLS

4.1 THE MICROCOMPUTER AND SOCIAL AND ECONOMIC CHANGES

Computers began to be used in industry during the early part of this century, but they were large and cumbersome to use with limited reliability, and were generally considered to be expensive scientific devices. The development of the microprocessor in the 1970's brought rapid changes in the use and applications of computer technology with immense social and economic implications.(1)

The rapidity of growth in the use of microprocessors and then applications, drew attention to the radical changes that society would have to make in respect of the way it stores and uses information.(2) This technological development also carried implications for changes and redistribution in the current modes of employment,(3) and the possible introduction of new ones which would demand different skills and work emphasis. (4)

In 1981 the Department of Industry issued a pamphlet indicating changes which had already taken place in a variety of industrial areas

and listed eighty six microelectronic industrial applications. (b) The list covered the effects at manual level through the use of robotics, at clerical level through electronic offices, and at professional level through information and management control. The list also had significant implications for home and leisure applications, with the inevitability that people would be in contact with some form of microelectronic technology on a day to day basis. Since the publication of the pamphlet the rapid growth of applications has continued, so that there are few industrial or commercial areas which have remained unaffected by this technology.

4.2 THE INTRODUCTION OF MICROCOMPUTERS INTO SCHOOLS

Terminals connected to main frame computers were being used by some children in schools in the mid 60's. The range of work was limited because of the infancy of this kind of development, and also because of the clumsiness, slowness, and expense of the equipment. The invention of the microprocessor was significant in that in computation it would do everything that the supposedly sophisticated large computers could do. In display it combined the text of print media and the images of visual media, in size it was compatible with household and school equipment. In addition, it was faster and more reliable to use, and what is probably the key factor, considerably cheaper to produce. A rapid expansion of microcomputer production began which

brought its facilities within the grasp of people in their homes, and children and teachers in schools. (6)

The introduction and expansive use of computers in schools in this country has been mainly through three sources;

1) individual teachers and a few schools excited by what they heard and saw about the microcomputer brought them into the classrooms to explore its potential, in turn they influenced school officials and Education Authorities;

2) parents became increasingly anxious about the preparation of their children for the new information age, and began to question and ask about an increase of microcomputer use within the schools;

3) the third and major source was through a Department of Trade and Industry scheme launched in 1980, which aimed to develop the use of micro-electronics in education. In 1982 the D.T.I. instigated the 'Micro-electronics Education Programme' (MEP), which specifically aimed to develop the use of micro-electronics in primary and educational special schools.

The D.T.I. scheme was administered by the Council for Educational Technology at the initial cost of nine million pounds. In 1983 the MEP Information File stated the aims of the programme to be:-

"- to promote, within the school curriculum, the study of microelectronics and its effects
- to prepare children for life in a society on which devices and systems based on microelectronics are commonplace and pervasive
- to help and encourage teachers to use the technology as an aid to teaching and learning"

In 1983, MEP announced that together with the Department of Trade and Industry, they were to arrange special support for Primary Schools. This was called the "Department of Industry's Micros in Primary Schools Scheme". The development and production of the scheme was made possible by substantial financial support from the Department of Trade and Industry. The scheme involved financial support to schools to purchase a Microcomputer, arrangements for teacher training through Local Education Authorities, the supply of training materials, and the supply of classroom materials. The result of the scheme was that from 1980, when a national survey revealed that only 32 primary/middle schools in the country had a microcomputer (7), the number of primary schools with a microcomputer went beyond 18000. Approximately 85% of the total of 22,860 primary schools in the country took advantage of the D.T.I. offer.

In 1984 statements from MEP indicated a significant extension to their function:-

"-The school curriculum would be enhanced by amending the content and approach of subjects within the curriculum and the development of new topics

- Microcomputer/ microprocessor equipment would be usefully applied
- Use would be made of the microcomputer in independent learning and information retrieval

- For those with special needs new devices/ systems would be used "
(MEP, "Building a Springboard", British Journal of Educational Technology, Vol. 11, No. 3, pp 201,220, 1984)

The nature and growth of MEP's involvement was comparable with the intensity of school microcomputer developments around this country,

and also across the world. The use and application of microcomputers began to be seriously investigated and resulted in a rapid growth in the production of software for schools, and a substantial increase in teacher in-service courses.

4.3 A REVIEW OF THE SOFTWARE CURRENTLY AVAILABLE AND CLASSROOM APPLICATIONS.

This review covers a wide selection of the software most commonly used in schools, and the claimed associated educational benefits to be obtained.(8)

A substantial number of 'adventure game' programs have been produced for the entire primary age range. They have received considerable acclaim from teachers as being supportive in the provision of language learning situations. One such program is 'The Tombs of Arkenstone' where the children are asked to find a stolen 'elfin ring' in order to save an imaginary 'Land of Arken' from the 'Forces of Darkness'. Most adventure programs have this 'solve an imaginary problem' approach. A report on the use of adventure games (MEP project INSET pack) stated that their value was a source for experiences involving:- role play; reading skills; thinking skills; communication skills; social skills; creative and aesthetic development; research and study skills.

Simulation programs provide children with opportunities to become

involved in situations which would be impossible to provide in reality, because of the danger or inaccessibility. A comprehensive range of simulation programs have been produced covering such diverse situations such as:- climbing Everest ('Summit':- Advisory Unit for Computer-Based Education, Hatfield); taking part in archaeological expeditions ('Expedition to Saqqara'; 'Dinosaur':- (Cambridge Micro Software), trying to live and survive as a fox, ('The Suburban Fox':- Ginn Software Publications); living in Scotland a 100 years ago, ('Scotland 100 Years Ago':- Simulation-Database Project, St. Andrew's College of Education.)

It is claimed that through microcomputer simulations children gain information, knowledge and an understanding and appreciation of environmental situations. The programs are intended to motivate children to make enquiries and explore areas of knowledge far beyond the simulated situation. Many case studies and projects suggest that an extensive range of learning experiences can be provided through the use of simulations. The range of experiences mentioned most frequently are: language work (oral and written); number work; historical and geographical research; group interaction and communication, planning and decision making; role play; creative and factual writing; mapwork; the use of resources and instruments; hypothesising and solving problems; collecting, using and presenting information.

A number of 'data handling' programs have been produced which provide children with opportunities to collect, classify and

investigate information in a variety of ways. Data handling programs can be used in a range of subject areas, and are regarded as very adaptable because they are 'content free'. They essentially provide a framework to which a teacher and children can add their own information and facts directly connected with current classroom work. This means that the subject of the program can be appropriately matched to the children's own interests, whereas, adventure games and simulations offer pre-determined subjects which would perhaps have to be imposed or manoeuvred into the learning situations.

Learning experiences claimed to be provided through data handling are:- collecting, classifying, analysing and interpreting information; using verbal and written communication; developing reading, writing and reference skills; hypothesising, decision making, and problem solving. (9) Applications for the 5 to 11 primary age range have included social studies, (10) science and natural history, (11) (12) , and Humanities, (13).

The use of the microcomputer as an aid to the teaching of language development has already been implied through the use of 'adventure games', 'simulations' and 'information handling', but support in the provision of specific language situations has also been widely claimed. These language situations include:- extended interaction and communication opportunities; activities to extend the

range and purposes of language (14); opportunities for children and teachers to investigate, analyse, reflect and pursue language experiences (15); the promotion of reading and extended reading activities (16); opportunities for children to become more actively involved in discovering and exploring language principles and developing conceptual awareness. (17)

A number of articles and books have been written regarding the language skills needed to use microcomputers,

'skills which are in some ways extensions to the traditional literacy skills of reading, writing and fact-finding.

(D. Chandler, *Exploring English with Microcomputers*, 1983, pl3)

These skills are considered to be psychomotor skills used in screen reading and key board use, and study skills used in compiling, accessing, sorting and processing information. (18)

Other microcomputer applications are being developed and are being acknowledged as potential support for teaching and learning activities. Software which presents sound and graphic displays is said to offer valuable educational experiences in the aesthetic curriculum areas. The use of programming languages such as LOGO and control technology applications, are claimed to encourage children to develop thinking, reasoning and problem solving skills. (19)

Of all the microcomputer uses wordprocessing has been one of the most acclaimed, as it is considered to have many significant

educational benefits in the teaching and development of children's writing. Wordprocessors allow children to enter, preview and edit writing on the screen, encouraging them to manipulate and experiment with the composition and presentation of text. Like data handling the wordprocessing facilities offer a framework for use, it is 'content free' for teachers to adapt to support curriculum needs, in a variety of curriculum areas. It is described as a tool for writing enabling children to be involved in the writing as 'real' writers', helping them to gain understanding of the processes involved through direct experiences.

4.4. THE RELEVANCE OF CURRENT SOFTWARE AND APPLICATIONS TO THE FRAMEWORK FOR TEACHING (FIGURE 1 P16)

4.4.1 EDUCATIONAL AIMS

The need for children to be familiar with microcomputers, and to be able to utilize them to maximum advantage in preparation for their future, is stated quite strongly in the MEP booklet 'All Change' (20). Evidence for movements in society which ought to be concerning all those engaged in educating children for the future is clearly stated. It implies that if preparation for future life is a primary aim, then teachers should not be educating children for a world that no longer exists. Microcomputers have become an important technology in the adult world, and therefore their educational importance to children is fundamental.

4.4.2 GLOBAL OBJECTIVES (Ref Figure 1 pl6)

The main advantage of the microcomputer over television, radio, video and the learning machines used in the past, is its facility to be interactive with the user. Since microcomputers elicit responsive behaviour and offer immediate feedback, users can be engaged in active intellectual exchange. The exact form of interaction can vary in type and intensity, according to the demands of the microcomputer program being used and the related learning tasks. As well as child with computer interaction, in certain learning situations the microcomputer could promote child with child, and child with teacher interaction, adding tremendous value to the learning situation. In comparison with other devices, the important distinction is felt to be the microcomputer's potential to stimulate knowledge acquisition and learning, instead of providing simple 'entertainment'.

The provision of learning environments through programs which encompass pedagogical, cognitive and social issues in real world terms, would seem to be fundamental to global "broad, balanced, relevant, and differentiated" objectives. (21) Microcomputer support towards the fulfilment of these objectives would appear to add new dimensions to traditional teaching provision. If children can be helped to gain a wider knowledge of the world through active enquiry, then hopefully they will acquire a realistic appreciation and understanding of learning structures and functions.

4.4.3 GENERAL OBJECTIVES (REF. FIGURE 1,P16)

The value in using the microcomputer to realise these objectives, is in its potential to support a range of subject areas and the integration of the subjects. The bringing together of areas of knowledge into learning situations can present powerful learning environments. The flexibility of choice and adaptation of programs can allow teachers to match experiences to needs, this means that the learning is more likely to be interesting, enjoyable, purposeful, productive and progressive.

4.4.4 SPECIFIC OBJECTIVES (REF FIGURE 1, P16)

Microcomputer use has been developed to support a wide range of curriculum areas and learning processes. In specific terms it can be:

a support for individual instruction on a singularly defined aspect such as the practise of a particular mathematical or language skill;

it can be used as an aid for the presentation of a specific area of knowledge;

it can be used as a tool to enhance understanding and development of a nominated area;

it can be used to facilitate investigations into ways of learning.

4.4.5 TEACHING METHODS AND STRATEGIES (REF.FIGURE 1, P16)

The microcomputer can be used to support individual, group and class activities, although, its power as a resource is more likely to be effective in a group situation, because of its stimulation of collaborative interactive learning. However, it can be used with significant impact in individual learning, because of its facility to systematically store facts, and reproduce the facts to aid diagnostic assessment.(22) The microcomputer can be the presenter and conductor of experiences, thereby releasing the teacher to become the 'observer' in order to evaluate and assess the learner's progress. (23) This situation can also present an opportunity for the teacher to evaluate their own success in the provision of learning situations.

Children find the microcomputer motivating to use and teachers can harness this with distinct advantage, it can be used as an incentive and a challenge. As a tool the microcomputer can be used for reinforcement, enrichment, or as a facilitator of learning experiences. Learning situations can be teacher or child initiated, or, with less effect, pre-determined by the microcomputer.

The microcomputer would appear to be a useful resource in several areas of teaching provision:

- it can be used to introduce aspects of knowledge which would be difficult to present in normal classroom situations;
- it can introduce children to new skills, allow the practise of

the skills and their applications into other activities;
it can be used to reinforce learning;
it can be an extra teacher;
it can act as a focus for the teacher and children to
become interactive learners;
it can become a facilitator for specific learning experiences;
it can serve as a point of reference for information and indicator
of progress.

From this review the microcomputer would appear to have a certain amount of potential as a teaching resource. However, as indicated in the findings of the 100 sample survey and through national articles, the regular use of the microcomputer in most schools is not obviously apparent.

4.5 REVIEW AND SUMMARY OF CURRENT MICROCOMPUTER USE.

There have been many newspaper, magazine, educational papers and projects, which have advocated the use of the microcomputer, with quite dramatic claims for its value as an educational resource.

This excellent program developed skills of decision-making, self-reliance and attitudes of co-operation and empathy as well as the full range of subject-orientated skills, knowledge and concepts.

(C.Drage and N.Evans, In search of adventure, Acorn User, April 1986, p149)

Computers will become the efficient way of doing things.

(P.Rowe, Computers open the door of knowledge, San Diego Union, March 1985, pC1)

'the computer with its word-processing capability, has encouraged a lot of children to really become avid writers, to go back and write

longer stories, to stick with a story. They take more risks because they can change it; they can revise it. They do a better job of writing.

(B. Armstrong, Rediscovering the Art of Writing, Washington Post, March 1985.)

A major use of the computer is as an information processor, with the user now having ready access to vast quantities of information.

(M.Schilling and B.Galpin, Information retrieval and learning, Report of the Spiral Project, University of Leicester, Microscope 19, 1986, p10)

Despite the claims and theories advocating the value of the microcomputer in classrooms, in reality, recent surveys do not support the views. A number of reports have indicated that as a resource the microcomputer has had a minimal effect on educational classroom provision. (24) The reasons given for the lack of effect have been mainly: a) poor educational software; b) teachers misuse of educational software; c) the inappropriate use of the microcomputer, through the lack of educational purpose and understanding of educational aims and objectives.

A national postal survey in May 1985 on 'The use of Microcomputers in Primary Schools'(25), suggested that microcomputer use by the majority of teachers was directed towards reinforcement of reading and language skills, drill and practise of number bonds and tables, and the presenting and reinforcement of mathematical facts. An analysis of 1986/1988 software catalogues shows a distinct bias towards programs for skill reinforcement and the presentation of

information and facts. The production and supply of these types of programs also implies teacher demand.

This narrowness of program use could be another major factor in the lack of effect in classrooms. Prior to 1980, microcomputer activities appear to have been focused around specific curriculum areas such as mathematics and reading, with the emphasis being on the exploration of learning outcomes and ignoring the learning process. Towards late 1970, cognitive and developmental psychology began to compete with behaviourism in providing theories of learning, and in offering a role for microcomputers in education. The distinction between the two aspects of learning was seen as especially pertinent to microcomputer use by W. Paisley (26) who described the distinctions as "object knowledge" and "process knowledge". He identified object knowledge as subject-matter knowledge dealing with fundamental questions and answers concerning people, places, objects, behaviours and events, whereas, process knowledge involves the ability to determine questions, to hypothesise, to perceive relationships, to interpret information, establish conclusions, and to think about one's own thinking. This significant distinction of potential microcomputer use was also put forward quite powerfully by Papert.

In many schools today, the phrase "computer-aided instruction" means making the computer teach the child. One might say the computer is being used to program the child. In my vision, the child programs the computer and, in doing so, both acquires a sense of mastery over a piece of the most modern and powerful technology and establishes an intimate contact with some of the deepest ideas from science, from mathematics, and from the art of intellectual model building.

(S.Papert, Mindstorms, 1980, p5)

It could be argued, that teachers use the microcomputer in a limited way because of the introductory software given to them through the D.T.I. scheme, when most schools first acquired a microcomputer. However, a National Survey taken in the U.S.A. in 1984 (27) had very similar results and no such scheme had been in operation. Indeed, through the M.E.P. an abundance of software directed towards "process knowledge" learning objectives was developed and distributed to schools through the Education Authorities between 1983 -87.

One further factor in the ineffectual use of microcomputers could be teachers' lack of understanding of its role in society. Microcomputers are currently a part of our changing society, and they will ultimately make many direct changes in people's lives. The lack of acknowledgement of change could be reflected in the use of the microcomputer in educational provision. Development and the advancement of civilisation can be associated with the development of facilities for intellectual communication (28). It is an undoubted fact that the radio, telephone and television have contributed to awareness within our society. The microcomputer presents communicative opportunities far beyond other devices. It can be used to receive, transmit, store, and analyse information, and it enables communication from, to and with itself. The facilities can make significant contributions to personal, social and community situations, but full use of the device will be directly related to the user's ability to understand and utilize the facilities.

Papert (1980) considers the educational use of the microcomputer important, not merely as part of future changes, but as an instrument to deal with change. He feels that education should be directed towards a projected future, and also towards preparation for continual change and development. The use of the microcomputer should not simply be to promote the use of the technology, but to help the children acquire fuller understanding of the processes of learning, which in turn promotes the ability to cope with change and development.

4.6 THE CHOICE OF WRITING AS THE RESEARCH AREA.

To investigate all the curriculum areas where the microcomputer could be used as an aid, and explore the claims and test the evidence as to its potential value, was recognised as being beyond the scope of this particular research. Therefore, three investigative areas were selected for consideration:

- 1) Data handling... which would be relevant to a number of curricular areas.
- 2) Programming...as a specific support for conceptual and intellectual development.
- 3) Text management... which could provide extended opportunities in writing and language development.

It was considered that microcomputer experiences in any of the above areas could enhance the skills and concepts associated with the current traditional curriculum. They could also encourage skills and concepts to be developed which are relative to the children's

technological future needs. The decision to investigate text management and the potential of the microcomputer as an aid in the teaching of writing was based on the following principles:

A) Writing is included in most curriculum activities being pursued in schools as well as being a curriculum subject itself. Writing involves children's intellectual, social and physical development, and can include a range of interrelated learning and teaching considerations, which in turn effect general educational provision and development. In this context the potential of the microcomputer as a teaching aid will have specific and general implications.

B) Teachers are involved with the provision of writing activities as part of their daily classroom work, a programme of active research into writing meant that teachers did not have to deviate from their normal work, and the research activities could be easily incorporated.

C) As writing activities are applied across the curriculum, each teacher taking part in the research could pursue their own schemes and objectives, and not have to introduce artificial research situations, therefore, the results were more likely to be realistic and authentic.

It was intended that the use of the microcomputer in the selected area would be investigated in relation to the teaching model produced

in Figure 1, (page 16). This model was produced as a basis for all teaching, therefore, any resulting principles or observations to emerge through the research in the one selected area might also have general implications.

REFERENCES CHAPTER IV

1. Evans, C., (1979), The Might Micro, London: Gollancz.
2. Stonier, T., (1980), The Wealth of Information, London: Thames Methuen.
3. Stonier, T., (1982), The impact of microprocessors on employment, Conference Paper Middlesex Polytechnic, quoted in Micoprimer Reader, London: Tecmedia.
4. Virgo, P., (1981), Learning for Change, Gloucester: Bow Publications Ltd., Orchard and Ind. Ltd.
5. Microelectronics the New Technology, (1981), London: Department of Industry Pamphlet.
6. Paisley, W., (1985), Children, New Media, and Microcomputers, in Children and Microcomputers, edited by M. chen and W. Paisley, London: Sage Publications Ltd.
7. Jones, R., (1981), National survey of primary schools using a computer, Cambridgeshire: Homerton College.
8. Aston, M., (1987), Taking Stock, and Hope, M., We've only just begun, Computers in Education, London: Times Educational Supplement Extra, 13.3.87.
9. Daines, D., (1984), Databases in the Classroom, Kent: Castle House Publications Ltd.
10. Ross, A., (1984), Information, icons and hypothesising, Microscope Social Edition, Northants: Castlefield (Publishers) Ltd.
11. Negus, M., (1981), Computers and Primary Science, Microscope 3, Northants: Castlefield (Publishers) Ltd.
12. Wake, B., (1984), Deetree, a Viewdata database - a potted history, Microscope Information Handling Special Edition, Northants: Castlefield (Publishers) Ltd.
13. Hodges, M., (1985), Can Data Handling help Children form Concepts in the Humanities Subjects?, Primary Contact Issue 3, Manchester: Didsbury School of Education.
14. Gray, T., (1983), Language work and the Computer, in Micro- Primer Reader, Leicestershire: CET, Tecmedia.
15. Frase, L. T., (1984), Knowledge, Information, and Action: Requirements for Automated Writing Instruction, in Journal of Computer- Based Instruction Vol. 11, No 2, pages 55-59, USA.

16. Cook, V. J., (1985), Computers in English Language Teaching, pages 18- 23, Brumfit, C., (ed.), London: Pergamon Press.
17. Keith, G., (1983), New machines for old mechanics, in Exploring English with Microcomputers, Chandler, D., (ed), Leicester: MEP/NATE/CET, Tecmedia.
18. Adams, A., (1983), in Exploring English with Microcomputers, Leicester: MEP/NATE/CET, Tecmedia.
19. Papert, S., (1980), Mindstorms Children Computers and Powerful Ideas, USA: Basic Books Inc.
20. Dutton, P., Nicholls, P., Prestt, B., (1984), All Change, Leicester: MEP, Tecmedia.
21. DES, The curriculum for 5 to 16, (1985), Curriculum Matters: an HMI series, London: H.M.S.O.
22. Liddle, A. J., (1983), Monitoring and Assessing Children's Conceptual Development, Primary Contact Issue 2, Manchester: Didsbury School of Education.
23. Weiner, E., and Weiner, L., (1984), Microcomputer Assistance for Language Problems, Journal of Learning Disabilities, Number 6, vol 17, USA
24. England, J., (1983), The Microcomputer, Curriculum Innovation and the Primary School. A consideration of some of the issues involved, London: University of London Institute of Education Library.
Adsett, N.E., (1985), Uses of Microcomputers in Teaching and Learning, London: University of London Institute of Education Library.
Johnson, D.C., and Cox, M.J., (1985), The uptake and usage of microcomputers in primary schools, London: Kings College London.
Rouse, M.D., and Evans, P.L.C., (1985), Drill and Practise computer programs do improve performance in arithmetic -- or do they?, London: University of London, Institute of Education.
Computers in Primary Schools: Thematic Review, (1988), Cleveland: Cleveland Educational Computer Centre.
25. Bleach, P., (1985), national postal survey conducted through the Reading and Language Centre, University of Reading, Berkshire on The Use of Microcomputers in primary Schools, London: Times Educational Supplement, May 1985.
26. Paisley, W., (1984), Rithms of the Future: Learning and working in the age of algorithms, USA: Paper presented at the Lake Arrowhead Conference on The Economy of California.

27. Becker, H.J., (1983), How Schools Use Microcomputers, Baltimore, USA: Report published in Classroom Computer Learning, Number 12 p41 - 44,
28. Prescott, (1847), Conquest of Peru, in Daines, D., (1983), Computing Its Long-Term Effects, Primary Contact, Issue 2, Manchester: Didsbury School of Education.

CHAPTER V

THE RESEARCH PROGRAMME

The research programme was designed to take account of a number of key issues identified in the earlier chapters.

1. The need for classroom practices to be based on relevant educational aims and objectives.

2. The importance of the teacher's knowledge and understanding of the aims and objectives in respect of curriculum provision.

3. The appropriate provision of learning experiences in relation to children's developmental needs.

4. The appropriate use of resources in learning situations.

5. The suitability of microcomputer programs to fulfil the curriculum writing objectives.

6. The ability of the teachers to use and apply the programs in their classroom practice.

5.1 THE RESEARCH PROGRAMME

A) With reference to the writing framework (Figure 3 p39), a number of

microcomputer programs were selected for use in the research writing activities.

B) The research project teachers were interviewed in November 1985 to establish their current classroom writing practices and their teaching aims and objectives. (For interview questions see appendix 19) The questions were the same as in the Questionnaire Survey. This helped to determine that the project teachers' views and practices were fairly consistent with teachers at a national level.

C) The teachers were visited at fortnightly intervals. They were given a program to use which was demonstrated and discussed.

D) The teachers were given record sheets to monitor initial program use and subsequent use when the program had been in operation for a longer period of time. (See appendix 20)

E) Researcher observation sheets were kept to record the teachers' verbal comments, organisational developments and the classroom activities which took place. (See appendix 21)

F) Samples of work were collected

G) A final interview was held with each of the project teachers in July 86. (See appendices 3D to 18D)

5.2 THE TEACHERS INVOLVED IN THE RESEARCH

The research began with the selection of a group of teachers, to act as case studies in a planned programme of classroom activities using the microcomputer as a resource. There were 15 teachers from 10 schools who took part in the research: ie. 1 teacher from each of 5 schools; 2 teachers from each of 2 schools; and 3 teachers from each of 2 schools. Each of the teachers had a class of children within the 8 to 11 age range. 12 of the teachers had access to a BBC Microcomputer with disc drive, and 3 had cassette based machines. None of the teachers had access to a printer.

Figure 5 (page 90) shows details of the teachers' organisational arrangements of their classes, the school size, age of building and catchment area.

5.3 THE INITIAL TEACHER INTERVIEWS

All fifteen teachers had been visited prior to the interview, when the research programme was explained and the teachers' participating role was outlined. The interviews took place in the teachers' own schools when they were free of teaching commitments. The interview was semi-structured in that the questions asked matched those in the Questionnaire used for the 100 teacher sample. All the questions were designed to be open-ended hopefully to promote more valid responses.(1)

The teachers were each asked the questions in the same way but were

SCHOOL AND CLASSROOM ORGANISATION OF TEACHERS TAKING PART
IN THE RESEARCH PROGRAMME NOVEMBER 85 TO JULY 1986.

Teacher Ref.Number	Approx. number on roll	Type of catchment area	Approx. age of building	Organisation
1 & 2	425	Council/ low price private houses	50 years	Age grouped classes
3	200	Council houses	10 years semi-open plan	Age grouped classes
4,5 & 6	450	Council houses	55 years	Age grouped classes
7 & 8	200	Council low/medium priced houses	15 years	Age grouped classes
9	150	Medium to high priced houses	30 years	Age, & some vertical grouping
10,11 & 12	300	Council/ low/medium priced houses	25 years	Age grouped classes
13	300	Council houses	20 years	Age grouped classes
14	300	Council/ low/medium priced houses	20 years	Age grouped classes
15	300	Low/medium priced houses	15 years open plan design	Age grouped classes

Figure 5

allowed to elaborate or qualify their answers. No comments were made to any reply other than those of a general nature, and only questions aimed at clarification were asked or answered.(2) A range of possible answers were prepared so that some answers could be ticked and the flow of the interview could be maintained. The interviews lasted an average of 25-30 minutes.

5.4 THE INTERVIEW RESULTS

Questions 1A, 1E (See appendix 2B)

The length of teaching experience of the teachers and how they generally organised their children for work.

The fifteen teachers involved in the research had teaching experience evenly spread from 1 to 20 years. As with the 100 sample the predominant classroom organisation was in working groups arranged by children's ability. A third of the teachers stated that their organisation was flexible and was matched to different classroom learning tasks.

Questions 3A, 4D, 3B, 3C, 5D, 5E. (See appendices 3B to 6B)

The teachers' perceptions of the educational purpose of their writing provision and what they wanted to achieve.

Question 3A. (If asked by a parent why children need to learn to write what would you say?)

The answers matched with the 100 sample in that the teachers felt that writing was an essential means of communication necessary to personal

and social life. As in the 100 sample, few teachers qualified their answer by stating the difference between social and personal needs. Only one teacher referred to writing as a specific language mode and its relationship to speaking and reading. Only one teacher saw writing as a means to facilitate learning.

Question 4D. Do the children ever share what they have written with other people?

The results showed that the writing done by the children was shared mostly with peers and teachers within their own classroom. This would suggest that their writing was aimed towards a fairly restricted audience, which would limit the range of writing styles.

Question 3B. Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

The main responses were structure, imagination and expression, which would appear to confirm remarks in the Bullock Report of teachers' emphasis of 'creative' writing as opposed to the development of writing for a balanced range of purposes.

Question 3C. Which qualities do you feel typifies a 'poor writer' in your class?

The answers conform with the 'good writer' answers with answers related to 'creative writing' abilities. Very few of the teachers mentioned the value of relevant experiences and writing techniques, or the relationship of writing to other language modes.

Question 5D. How long ago was the last in-service 'writing' based course you attended?

The results varied considerable from the 100 sample answers. A high percentage of the teachers said they had never attended a course. It may have been that in the interview they failed to recall courses, whereas teachers doing the questionnaire had more time to consider their answers. However, in both cases a large number of teachers had not attended courses within the last six years.

Question 5E. If you have attended a course where was it held?

The majority of teachers who had attended courses had been to L.E.A. courses, as in the 100 sample.

Question 2C. In a typical week what specific writing tasks are the children given?)

The answers given here showed a very strong emphasis towards story writing and formal language work.

Question 2F. In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities?

In the 100 sample the majority of teachers stated Literature and Project work as a regular link to writing activities.

This was reiterated with the research group of teachers although the use of Literature was not quite as pronounced. These answers correlate to the previous answers in respect of 'Literature' and 'story writing' but not in the respect of 'Project writing tasks' and 'reporting/factual writing'. This would seem to support the A.P.U.

findings that the writing produced in respect of project work tended to be copying directly from books, or re-writing sentences and labelling. In this sense the project work involved writing but not as a means to promote distinct writing experiences.

Question 4C. Do the children plan their writing tasks?

Few teachers stated that they regularly involved the children in planning their writing. The answers reflected the 100 sample answers with the planning of writing appearing to be approached unmethodically, not as a fundamental aspect of the teaching of writing.

Question 4E. What sort of work is displayed in your classroom at this moment?

These answers would appear to support the answers given to 2C and 2F showing an emphasis in story and project writing, with the possibility that the writing merely involved copied writing and labelling.

Questions 4G and 4H. How much of the time spent on writing activities is devoted to fictional writing aspects?

What sort of writing activities are done in the rest of the time?

It was expected that the answers from the small project group would not always generalise with a 100 sample, but these answers differed considerably in that a third of the writing time was allocated to fictional writing. The rest of the writing time was evenly given to project/formal/personal writing, whereas, in the 100 sample the time was quite evenly divided into fictional/ formal/ project writing.

Question 2B. How are your children organised when they are involved in writing tasks?

Most teachers answered that their organisation varied according to different tasks, and this answer was consistent with the 100 sample, however, it did not match the teachers answers in 1E that the organisation was usually in groups of similar ability.

Question 2A. In a typical week how many hours will the children be involved in writing activities?

The majority of the teachers gave their answer as being between 6 to 15 hours representing between a quarter to a half of the total time in the classroom. This answer was compatible with the 100 sample.

Question 2D. Can you describe how you generally introduce writing tasks?

Most of the writing tasks appeared to be teacher initiated and were introduced through class discussion, with the occasional use of resources.

Question 2E. Are there resources which you often use in supporting writing activities?

The answers were consistent with 2D in that resources were used to give children second hand experiences to work from. Most of the teachers interviewed indicated that the resource acted as a predetermined focus for the task and the children had to respond, the resource was not used purely as a supporting factor.

Question 4A. When your children are engaged in writing activities is this generally on an individual basis, or as a member of a group, or an individual doing a class or group task?

There was quite a significant difference in the answers given by the research teachers to the 100 sample. Two thirds of the teachers said their children worked as part of a class or group, whereas, two thirds in the 100 sample said that children were organised according to the task.

Question 4B. Do your children take part in collaborative writing activities?

A third of the teachers did not do any collaborative work. Most of the teachers who provided opportunities for collaborative work used it for factual writing activities. ie. project work

Question 5C. How do you respond to children's finished writing?

The answers were fairly consistent with the 100 sample, with discussion, verbal comments and marking being the main responses.

Question 4F. Do your children review, edit, and re-write their written work?

Only a fifth of the teachers undertook this aspect of the writing process on a regular basis. This compared with less than half of the 100 sample.

Question 5B. How do you monitor children's progress?

Marking was used to monitor work by the majority of teachers. One teacher did not monitor work at all.

5.5 SUMMARY OF THE INTERVIEW DATA

In most cases the answers given by the teachers in the research

were fairly consistent with the answers given by the teachers in the 100 sample. The only questions where answers differed greatly were for questions 4A, 4H, and 5B. These answers indicated a greater tendency towards class or group work (4A); a greater amount of time given to fictional writing (4H); and more teachers using marking as a monitoring device. It is possible that many teachers in the 100 sample used the alternative answers given in the questionnaire as prompts for their answers, therefore, some of their answers would not be totally accurate in respect of their general practice. The teachers in the research group had no prompts and therefore their answers were probably closer to their actual everyday practices. The teachers in the 100 sample would also have more time to reflect and cross check their answers and confer with colleagues.

5.6 THE INTRODUCTION AND USE OF THE MICROCOMPUTER PROGRAMS

Each teacher in the research group was visited every two weeks. On each visit the teacher was given a program to use and a brief demonstration of how it worked. Educational objectives and possible writing applications were discussed. The teacher was given two record sheets (See appendix 20), the first sheet was to fill in after the program was used for the first time, the second sheet was to be filled in at a later date to show further development.

The programs were chosen to correspond with the writing objectives

shown in the writing framework developed in Chapter 11 (Figure 3, page 39) The programs were gradually introduced one by one on subsequent visits. The record sheets were collected on each visit and further sheets distributed. After each visit the teachers' comments, questions, remarks, difficulties, successes and general observations were noted on a monitoring sheet. (See appendix 21)

The following pages 99 to 114 show a description of each of the programs used, and the collated views and uses of the programs by the project teachers.

5.6.1 Description of program "CARTOON" -- Written by Tony Jackson, Published by Newman College, Birmingham.

Program content and operation:-

The program consists of a series of pictures under three headings, 'A day out', 'Spooky Tales', 'Science Fiction'. The children select a heading and are shown as series of pictures. They then have to plan a story, select the relevant pictures, put them in order, and write a corresponding story. The children can choose to combine pictures from any of the headings. They can also choose the amount of time each picture frame stays on the screen, so that it matches their writing adding effect to their story. There is also a program option to make the completed story into a video recording.

Writing objectives:-

This program is designed to encourage the children to discuss and structure ideas, then plan and structure a written story.

Writing experiences:-

The planning and structuring of a story; the development of an appropriate style (factual, fictional, humorous, sad, imaginative); the identification of audience and the directing of the writing to the audience using appropriate vocabulary ; the opportunity to develop awareness of the difference between the spoken and written word and to develop appropriate writing techniques and skills; to draft, review and re-structure written work; to work in a collaborative writing situation.

Details from the teachers' record sheets on the use of programs - no. of respondents 15 Program Name..... CARTOON The numbers indicate the frequency of the responses to each particular heading.										
Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	15			9		5				1
Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
						15				
The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Verbal communication	Group collaboration	Sequencing	Creative ideas	Observation	Logic	Listening	Planning writing	Handling computer	Narrative
	8	6	9	4	3	2	2	5	2	3
The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
	14		6					1	1	
Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	14	1	1	2					5	

5.6.2 Description of the program "WORDPLAY" - Published by M.E.P. and contained in their 'Language Pack'

Program content and operation:-

The microcomputer uses words which have been entered into its memory to generate 'computerised' poems. The program contains some word files of different themes eg. Winter. These words are a variety of nouns, adjectives, verbs and adverbs. The words can be put together to form different phrase structures eg. adjective, adjective, noun, verb, adverb. The microcomputer randomly uses combinations of the structures to generate 'poems'. The children can enter their own theme words and their own phrase structures.

Writing objectives:-

This program allows the children to experiment with words and combinations of words to create poems.

Writing experiences:-

The children can experiment with word patterns and explore the power and effect that can be achieved through combining words in different ways. The children can also be helped to appreciate syntax. The program prints out the poems which the children can review and change.



Details from the teachers' record sheets on the use of programs - no. of respondents 15
 Program Name...WORDPLAY.....

The numbers indicate the frequency of the responses to each particular heading.

Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	13			9		4				

Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
			6				3	6		

The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Extended vocabulary	Illiterateness	Grammar	Word patterns	Effective use of words	Audience awareness				
	10	2	9	6	5	2				

The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
		7	1		2		9		6	

Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	5		10	5						

5.6.3 Description of the program "Storyline":- Published by M.E.P. in their 'Language Pack'.

Program content and operation:-

The program presents sets of randomly generated phrases. Each of the phrases contains a subject, a place and an action. eg "five little dwarfs sitting in a refrigerator arguing furiously". The children can keep or change any of the three parts of the phrase, until they find a phrase which they feel is suitable for them to develop into a story. Once a phrase has been chosen then the microcomputer poses a series of questions related to each part of the phrase, eg who, why etc. The children consider the questions and develop their story.

Writing objectives:-

The children are encouraged to structure and write an imaginative story.

Writing experiences:-

The children can explore and discuss the phrases in groups and write a collaborative story. The program encourages them to plan and logically structure their story. The children can develop and refine their ideas using the microcomputer as an initial prompt to recall experiences. The program can encourage the children's awareness of syntax and semantics in the use of written language.

<p>Details from the teachers' record sheets on the use of programs - no. of respondents 15</p> <p>Program Name..<u>STORYLINE</u>.</p> <p>The numbers indicate the frequency of the responses to each particular heading.</p>										
Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	12			5		10				
Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
			9	2		4				
The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Writing Structure	Planning writing	Punctuation	Para-graphing	Creative ideas					
	9	3	1	2	11					
The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
	9		6		9		15			
Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	15		12	6			5			

5.6.4 Description of the program "FRONTPAGE":- Published by M.A.P.E.
(Micros and Primary Education Association)

Program content and operation:-

The program allows the children to simulate the creation of newspaper pages. The children can insert headlines, prices, dates, stories and pictures and the program arranges them into a newspaper page layout. The program has editing facilities which allows the children to change and alter the position of words.

Writing objectives:-

The program emphasises the need for writing to address an audience and the use of appropriate styles, vocabulary, and presentation.

Writing experiences:-

The program encourages writing of different types. The children can write about personal thoughts and views, they can communicate factual information, or investigate the use of vocabulary to produce different effects. The children can be encouraged to realise the need to adopt styles of writing for different audiences. The children can also be helped to develop an awareness of presenting writing effectively. The program can promote collaborative writing, planning, reviewing, editing and re-writing of work.

Details from the teachers' record sheets on the use of programs - no. of respondents 15 Program Name FRONTPAGE..... The numbers indicate the frequency of the responses to each particular heading.										
a)	Initial introduction and organisational use of the program									
	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	15	8		4	1	9				
b)	Subsequent organisation									
	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
					1	14				
c)	The skills, knowledge, concepts etc. the teacher felt the children could develop									
	Written expression	Writing styles	Audience awareness	Group collaboration	Punctuation	Reviewing/editing	Presentation	Planning writing	Writing structure	Use and effect of words
	3	2	4	11	2	1	7	4	9	5
d)	The work produced by the children									
	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
				3	12			5		
e)	Teachers comments on how the program compared with their usual teaching provision									
	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	15			15	2				15	

5.6.5 Descriptions of the programs 'MALLORY', and 'MARTELLA TOWER', both written by Anita Straker, Published by M.E.P.

Program content and operation:-

Both of these programs are adventure games. In Mallory the children have to explore an imaginary manor in order to find a valuable object that has been stolen. In Martello Tower the children have to explore an imaginary tower and try to escape. As the children explore the Manor or the Tower they encounter numerous problem solving activities which they must solve in order to progress with the adventure. Their answers allows them to continue with their adventure or necessitates them to re-think their decision.

Writing objectives:-

The adventures involve note-taking and reviewing of notes to monitor the progress of the adventure. The children can be encouraged to express their views and interpretations of the adventure situations, or develop further imaginary situations as additional writing activities.

Writing experiences:-

The children can be encouraged to record happenings in a logical sequence, to select relevant information and take appropriate notes. They can use their writing as a source for interpreting situations and to make further deductions and comparisons. The programs also lend themselves for further factual or imaginative writing about the places (the manor or tower) and the people or things that might be there.

Details from the teachers' record sheets on the use of programs - no. of respondents 15 Program Name ADVENTURE GAMES (Martello Tower 'Mallory') The numbers indicate the frequency of the responses to each particular heading.										
a)	Initial introduction and organisational use of the program									
	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	14		1	1		14				
b)	Subsequent organisation									
	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
			5			8		2		
c)	The skills, knowledge, concepts etc. the teacher felt the children could develop									
	Note taking	Recording	Planning	Group collaboration	Imaginative writing	Problem solving	Ordering thoughts			
	5	4	6	8	9	6	5			
d)	The work produced by the children									
	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
	6		4						3	
e)	Teachers comments on how the program compared with their usual teaching provision									
	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
		2	11		4			6		5

5.6.6 Description of the program "TRACKS", Published by M.E.P. in their Language Pack.

Program content and operation:-

This program is based on the branching story principle. The children are shown an initial phrase to begin a story, they then develop the story by adding two connected but alternative phrases. These two phrases develop the story in different ways. The two phrases have then to be developed with two further phrases, and the story is developed in this branching manner until the children find a conclusion to their stories. The children have the option to pursue the specified program theme or create their own.

Writing objectives:-

The children have to develop a structured story and recognise the dependent nature of one phrase to another to make the story develop logically. The children are intended to write a story for others to read and therefore they have to consider the presentation and the appropriateness of the language and subject matter.

Writing experiences:-

The children have to plan and sequence the story logically. They can experiment with different phrases and styles to make the stories amusing, frightening etc.

Details from the teachers' record sheets on the use of programs - no. of respondents 15
 Program Name **TRACKS**

The numbers indicate the frequency of the responses to each particular heading.

Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
						15				
Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
			11					4		
The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Note taking	Planning writing	Writing structure	Divergent thinking	Group collaboration	Decision making	Creative ideas			
	4	8	4	1	5	2	5			
The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
	6				9		9		6	
Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	3		9	3	3	12			3	

5.6.7 Description of the program "CONCEPT WRITER", Produced through Stranmillis College, N. Ireland, available through M.A.P.E.

Program content and operation:-

The program is an simple word processor. It offers the children a range of facilities; they can correct mistakes; move text from one position to another; change the layout and presentation; save their work to use at a future date; print out their writing in a variety of print sizes.

Writing objectives:-

The program can help children with the drafting, reviewing, editing and re-writing of their work, encouraging them to appreciate and understand the process of writing.

Writing experiences:-

Words can be easily altered and the correcting of spelling errors can be put into perspective as minor amendments rather than the focus of reviewing. The program lends itself to collaborative writing as children working as a small group can see the screen quite easily. They can acquire writing techniques and skills from each other and experiment with their writing together. The printout presents texts for display or multiple copies for distribution, through this children can develop their appreciation of writing for an audience and learn to consider the value of good presentation.

Details from the teachers' record sheets on the use of programs - no. of respondents 15										
Program Name..WRITER.....										
The numbers indicate the frequency of the responses to each particular heading										
Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High : ability group	High ability children
	15			3	10	2				
Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
		11	15							
The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Reading skills	Spelling	Punctuation	Group collaboration	Grammar	Present-ation	Self criticism	Language skills		
	4	9	2	6	3	2	1	4		
The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
	9			10	15		12	3		
Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing.. skills
	15		2	10	2		7		11	

5.6.8 Description of the program "TRAY", Published by M.E.P. in the Language Pack.

Program content and operation:-

The program presents the children with texts to experiment with and explore. The teachers can use the existing files in the program or create their own. The children are shown a screen with only the punctuation marks showing. They can choose letters or groups of letters to be displayed on the screen until they complete the hidden text.

Writing objectives:-

Children can investigate word and sentence patterns and structures. They are encouraged to use word clues to comprehend what is written.

Writing experiences:-

The children can explore alternative language structures. They can be helped to identify common letter combinations and word patterns. Through the use of different texts they can learn to appreciate different styles of writing and the resulting effects.

Details from the teachers' record sheets on the use of programs - no. of respondents 15

Program Name... TRAY

The numbers indicate the frequency of the responses to each particular heading.

Initial introduction and organisational use of the program										
a)	Teacher Intro.	Intro. through Resources	Curriculum area intro.	Class use	Individual doing Class task	Group use	Low ability group	Low ability child	High ability group	High ability children
	15			13		2				
Subsequent organisation										
b)	Class use	Individual doing class task	Mixed ability	Low ability group	Low ability child	High ability group	High ability child	Program not used.		
			9					6		
The skills, knowledge, concepts etc. the teacher felt the children could develop										
c)	Extended vocabulary	Punctuation	Grammar	Cloze procedure	Group collaboration	Insight into language patterns	Writing styles			
	5	6	7	4	3	2	1			
The work produced by the children										
d)	Stories	Poems	Work for curriculum areas	Individual writing	Group writing	Class writing	Work for classroom audience	Work for variety of audiences	No work produced	
				4					5	
Teachers comments on how the program compared with their usual teaching provision										
e)	Was an advantage	Was a disadvantage	Had limited use	Extended provision	Cross curricular application	Difficult to use	Advan. to low ability children	Advan. to high ability children	Motivating	Supported writing skills
	2	3	4			6				

5.7 OBSERVATIONS FROM THE RESEARCH RECORD SHEETS

5.7.1 ORGANISATION

Although all of the teachers organised the children for work in groups, in most cases, all the class were engaged in the same kind of task, ie. they were all writing stories, reports or poems etc. When children were working on the microcomputer this often proved disruptive for the teacher. "What do I do with the rest of the class when the microcomputer group demand my attention", was quite a common complaint. An alternative approach was that children working on the microcomputer were given work which was different from the rest of the class. Usually, this work was unconnected with the rest of their classroom work and continuity was not considered. The general impression given by most of the teachers was that the use of the microcomputer was a "special event", and therefore the microcomputer activities were not regarded as "real" classroom activities. All of the teachers had timetabled access to the microcomputer and continuity with prepared programmes of work was practically impossible to follow.

With the exception of 2 teachers, all the teachers tried to use the programs with all the children in the class. In quite a number of cases if a program was found to be unsuitable for all the children in the class it was discarded. None of the teachers referred to any of

the children using the program in respect of particular developmental writing objective. In all cases the objectives were the same for all children but the expectations were adjusted accordingly. (See appendix 22) The majority of the teachers commented on the value of the microcomputer for use with remedial, or alternatively, the more able children. They felt that these children were being given further "working opportunities".

The most significant organisational change noted was in the number of teachers who tried collaborative writing groups. However, although all the teachers felt that there were language opportunities to be gained, they were dubious about the "quality" of the writing that was produced. (See appendix 23)

5.7.2 TEACHER INVOLVEMENT

All of the teachers initiated work with the microcomputer by demonstrating the mechanics of the program. Only on a few occasions did the teachers state the intended objectives of the work.

All of the teachers had been involved with prompting during the program use and supporting the children with reading and vocabulary. Some of the teachers made resource sheets to help the children with the program. (See appendix 24) There was little evidence to suggest that teachers had been involved in discussions about writing techniques or strategies with the children, and there was no evidence

of teachers writing with the children. When discussing the work produced, in most cases, remarks were confined to presentation, vocabulary and errors. There were very few comments of a diagnostic nature or references to developmental needs. Most of the responses to the work was through marking, verbal or written comments. (See appendix 25)

5.7.3 THE WORK PRODUCED BY THE CHILDREN

Apart from the programs 'Tray' and 'Tracks' all the rest were regarded as a stimulus for the production of a piece of writing. In some cases the program was used as a basis for writing done away from the microcomputer (See appendix 26). 'Storyline' and the adventure games 'Mallory' and 'Martello Towers' were also used for art and drama work.

Very little of the work produced involved reviewing, editing and re-writing, even with programs which would support this, ie. 'Writer' and 'Frontpage'. Amendments tended to be to spelling, punctuation, and adding to the length of the writing. (See appendix 27)

A few of the programs were used by the teachers to help the children with the structuring and planning of work. (See appendix 28)

By the end of the research period 11 of the teachers had access to a printer. A lot of printed work was displayed in the classrooms and

schools but very little had been initially directed toward an intended audience.

The majority of the work produced was imaginative/ creative writing. Seven of the teachers used 'Frontpage' for personal news items, and two teachers used "Writer" to produce factual topic reports. Although the programs selected would support the production of different styles of writing, few teachers referred to this. The only real evidence of teachers encouraging writing of different styles was with 'Frontpage' (See appendix 29)

5.7.4 TEACHERS' ATTITUDES AND COMMENTS

The main problem, voiced by all but two of the teachers in the group, was the lack of regular access to machines. The next most difficult problem was finding time to deal with the setting up of the equipment and sorting faults in the programs. (See appendix 30)

All but two of the teachers were genuinely enthusiastic about using the microcomputer. The teachers gave the impression that predominantly they felt that its use gave an additional stimulus for work, it also helped them to cope with certain groups of children who often presented problems. (See appendix 31). The programs also presented alternative ways of presenting tasks.

Only in three cases were there any distinct signs of changes in teaching provision strategies. These were in:

drafting and reviewing of work;

teacher involvement;

broadening of writing tasks to incorporate different writing skills.

In all other cases the teachers regarded the microcomputer as an additional way of supporting their existing provision.

5.8 THE FINAL INTERVIEW OF TEACHERS INVOLVED IN THE RESEARCH

The interviews were held in the teachers' own schools when they were free from teaching commitments. The questions were designed to cover four areas:-

- 1) The teacher's perception of the educational purpose of their writing provision and what they think they want to achieve.
- 2) The range and content of writing tasks and experiences being provided by the teacher.
- 3) The teacher's organisation of writing activities, the use of resources and how activities are monitored and developed.
- 4) The teacher's views on the potential of the microcomputer as an aid to their writing provision, in respect of the three areas above.

5.8 FINAL INTERVIEW RESULTS

5.8.1 THE TEACHERS' PERCEPTIONS OF THE EDUCATIONAL PURPOSE OF THEIR WRITING PROVISION AND WHAT THEY WANT TO ACHIEVE.

The answers in the final interview did not differ significantly from the first interview. The teachers generally gave answers which referred to writing techniques, vocabulary and imagination rather than overall writing objectives. (See appendix 3D, question 3A) This was reflected in classroom practice in that the writing situations provided for children concentrated on the development of writing aspects rather than the purposes for writing. This was also reflected in the nominations of the programs favoured by the teachers. (See appendix 16D)

Through the use of the microcomputer there was an increase in writing being shared with wider audiences. However, in all but two cases, this was not a predetermined objective directed towards specific audiences, but supported by the use of the printer which facilitated the display of pieces of writing beyond the classroom. (See appendices 3D, question 4D and appendix 8D, question 4E)

The skills and qualities aimed for by the teachers were virtually the same as those identified as the 'good writer' features in the first interview. Most answers were directed towards creative writing, with a minority of the teachers identifying writing for a variety of

purposes requiring different techniques. (See appendix 5D)

5.8.2 THE RANGE AND CONTENT OF WRITING TASKS AND THE TYPES OF EXPERIENCES BEING PROVIDED

The main writing areas were the same in both interviews ie stories, topic work and formal language work. (See appendix 7D)

There was a slight increase in the regular planning of written work. Two of the teachers said the increase had been prompted by the use of the microcomputer. (See appendix 8D, question 4C)

The amount of displayed written work had increased considerably through the use of the printers. However, most of the work was neat copies for display purposes. (See appendix 8D, question 4E)

Half of the teachers who took part in the project felt that the use of the microcomputer particularly benefited low ability children. In most cases the reasons given were such as "motivating", "added stimulus", "enabled them to work on their own". Only in a few cases were specific writing objectives named, eg. structuring and sequencing through 'Cartoon', presentation and planning through 'Frontpage'. (See appendix 9D)

There was an increase in factual writing tasks with a reasonable amount supported by the microcomputer, but it tended to be used for

printed reports and accounts for class display or group project books.

There was an increase in the amount of formal language work being done with the microcomputer than prior to the research project.

A limited amount of microcomputer supported creative writing and poetry writing was produced, but most of the writing was done away from the microcomputer with the programs being used as a stimulus. (See Appendix 10D)

The only organisational difference between the interviews was in the area of group work. Whereas, only one teacher used the microcomputer for group work in the first interview, in the final interview all the teachers said they used it in this way. Four teachers expressed reservations about its value in respect of collaborative writing. (See appendix 18D)

There was little change in how writing tasks were introduced, but the microcomputer featured more prominently as a resource support in the final interviews. (See appendix 12D, question 2D)

There was an increase in the amount of editing and reviewing of writing done by the children, although this tended to be amendments to spellings and adding to the length of the writing. (See Appendix 14D, question 4F)

There was little difference in the monitoring methods undertaken. Only four of the teachers felt that the microcomputer increased their opportunities to observe children writing, and helped them to become involved with the children. (See appendix 17D, question 14)

Most of the teachers had used the programs that had been given to them, and some had acquired further wordprocessor programs/chips. By the end of the research period most teachers were also using language programs which they had acquired for themselves. These were mainly skill practise programs, which were popular with the teachers. Of the programs used 'Tracks' and 'Wordplay' were the most disliked by a number of the teachers. Other programs 'Martello Towers', 'Storyline', 'Tray' and 'Cartoon' were also disliked by one or two of the teachers. When asked to nominate the program they liked best or found the most useful the answers were as follows:

four teachers"Cartoon" (A picture/story sequencing program);

five teachers"Front page" (A newspaper simulation program);

two teachers "Mallory" (An adventure game);

one teacher "Storyline" (A program where children can create their own phrases to act as a basis for a story idea);

three teachers ... "Writer" (A word processing program)

The majority of the teachers favoured the programs which provided stimulus for a writing task. (See appendices 16D)

All the teachers who took part in the research felt the use of the microcomputer was an advantage although five teachers had some reservations that the quality and quantity of writing was not particularly enhanced. (See appendix 17D). The main advantages were felt to be:

- the printing facilities;
- children being able to work together;
- a source of writing stimuli;
- motivation for writing;
- support for children who had writing difficulties.

The majority of the teachers thought they would use the microcomputer more if they had better access. Another great concern was organising its use, as many of the teachers felt that sometimes the microcomputer was an intrusion in their classroom routines. (See appendix 18D, question 23)

5.9 SUMMARY AND CONCLUSIONS

5.9.1 GLOBAL AND GENERAL OBJECTIVES

The potential of the programs to encourage writing purpose, in the sense of addressing different audiences in appropriate styles, was virtually unrecognised and unexplored. Several of the programs,

'Frontpage', 'Cartoon', and 'Martello Towers'/'Mallory', 'Writer' could have provided the basis for a range of factual and fictional writing opportunities. The emphasis of the writing activities pursued through the programs was on the production of imaginative pieces of writing and even variations in this area were limited. Only two teachers (Ref. 4 and 8) directed the children towards trying different styles of writing ie. personal thoughts, recording and reporting, and creative work, although some of the other teachers commented on the styles that emerged through the work. None of the teachers referred to any work specifically used to help children to develop their own understanding, thoughts and ideas. The monitoring sheets showed that task objectives identified by the teachers were nearly always related to the acquisition of writing skills and techniques.

5.9.2 SPECIFIC OBJECTIVES

There was a considerable amount of evidence to suggest that the teachers found a number of the programs useful for supporting certain aspects of writing ie. planning of writing ('Cartoon'), making notes (adventure games), exploring vocabulary and writing patterns ('Tray' and 'Wordplay'), presentation and effect ('Frontpage') However, the majority of the teachers did not seem to consider these aspects as the main focus for writing experiences, and did not particularly pursue or develop them. They seemed to regard the opportunities as incidental to the main task of achieving a piece of writing.

Very little attention was given to the possible microcomputer support for the actual writing process itself. The most common format for the presentation of writing situations was the introduction of a writing stimulus, and the nomination of an end product eg the collecting of vocabulary relevant to a chosen theme and the production of a poem, ('Wordplay'). All of the programs had the potential of being used for planning, reviewing editing experiences but the opportunities were only pursued incidentally. Even with the word processing program 'Writer' the emphasis in the production of writing was towards the presentation and correctness, and in some cases the length of the piece of writing. Most of the teachers did not seem to want to pursue the reviewing and editing of work in respect of changing or developing ideas, they did not appear to consider it of great importance. In one case (Ref. 1) the teacher felt that it was "counter productive".

5.9.3 TEACHING METHODS AND STRATEGIES

ORGANISATION

The use of the microcomputer appeared to offer substantial support for the provision of learning situations for individual children and small groups. In the case of individual children this tended to be for children with learning difficulties, with the focus being on motivation and stimulus not on the identification of program support

for specific learning difficulties. For group work most of the teachers identified the potential benefits of children working and learning together, although the group work was often directed towards an end result rather than the encouragement of the group interaction.

STIMULUS

All the teachers welcomed the additional teaching opportunities provided by the programs, which they felt provided variety in learning experiences. Most of the teachers regarded the programs as a stimulus for the production of a piece of writing, and only in a few cases were the programs linked to other curriculum areas. Even the adaptability of content free programs eg. "Writer", "Frontpage" was not particularly investigated.

TEACHER KNOWLEDGE

There was no evidence to suggest that programs were used to explore the extent of the microcomputer's potential in respect of the teaching of writing. There was also little evidence to suggest that program activities were matched to children's specific developmental writing needs, therefore, the potential of the programs to support specific needs was not identified. Although some specific writing needs were helped this happened incidentally.

As many the teachers did not particularly consider the teaching objectives or the structure of the learning to take place the results

were often poor. The teachers, in many cases, blamed the quality of the program rather than the mis-match of the activities, eg. "The children can produce better stories without using the microcomputer".

The potential of the microcomputer as a resource to improve methods of presenting writing experiences was not developed, as the teachers were predominantly preoccupied with the presentation of writing tasks rather than experiences. Only three of the teachers referred to the microcomputer as being a supportive method for presenting experiences, and this was in the context of reviewing and editing.

TEACHER INVOLVEMENT

It was in this area that there was a significant difference of opinion among the teachers, regarding the potential of the microcomputer as a support. Some of the teachers (Ref 4, 8, 15) felt that when the children were involved with developing their own work the results were clearly visible on the screen, and they could discuss the work with the children as it was taking place and encourage new ideas and skills to be acquired and tested. A few teachers felt they had opportunities to listen, observe and learn about the children and their understanding of the writing process. Other teachers felt that they wanted a resource to free them to be involved with other children in the class. Only one of the teachers (Ref 8) fairly regularly took part in writing activities with the children.

MONITORING

Only three teachers identified the microcomputer as an aid to monitoring the children's work. All the other teachers responded to work when it was finished, apart from giving support in order to help the children to complete the tasks. The reviewing, editing facilities offered by most of the programs were rarely used to record children's development of their work for diagnostic purposes. The facility for the printing out of work was also ignored as a system of monitoring work both for the teacher and the child.

5.10 SUMMARY

Even though all the teachers who took part in the research felt that the use of the microcomputer as a teaching aid was potentially advantageous (See appendix 18D), there were no significant results to indicate that the potential had been really investigated. The potential support for writing objectives was never established, as few of the teachers measured the use of the programs against the realisation of any set objectives.

Group collaborative work was identified as a possible organisational improvement, but this was not regarded realistically as a regular method to be adopted, as in most cases it conflicted with individual task expectations and general class organisation. The

support for the writing process through word processing facilities was not identified, as this again conflicted with general principles of directing children towards a task rather than learning experiences, and responding to work on completion and not as it was progressing.

The research findings supported most of the surveys, reports and views mentioned in Chapter III :

- a) teachers did not preview programs and analyse them to establish their educational function or to match children's developmental needs;
- b) the programs were not used with regard to educational objectives;
- c) teachers predominantly wanted support for the introduction and practise of skills;
- d) the programs were used to supplement existing curriculum provision and methods.

The research undertaken so far in the investigation indicated that the potential of the microcomputer as an aid to teaching could never really be identified, unless, teachers were prepared to modify their working organisation and their teaching role, and work towards defined objectives. Only two teachers in the group developed new ideas and made appropriate changes to their teaching methods and strategies. The other teachers used the microcomputer to support their existing

classroom provision and practices.

To pursue the investigation into the potential of the microcomputer as a teaching aid, a further group of teachers was approached to undertake further research, with substantial changes in the method of investigation in light of the initial findings.

CHAPTER VI

FURTHER DEVELOPMENT OF THE RESEARCH PROGRAMME

6.1 Establishing the second stage of the research

The second stage of the research began in September 1986 with fifteen teachers taking part. The group was chosen with reference to certain aspects which emerged in the first research stage.

a) It was noticeable in the Group 1 research, that teachers who were involved in the same school had the opportunity to talk and discuss things with one another. They tended to become more confident in handling the microcomputer, and incorporate its use into their teaching more readily than teachers who were working on their own.

b) Teachers in the Group 1 research who had a reasonable amount of access to a microcomputer had the opportunity, and more enthusiasm, to investigate possible microcomputer supported teaching and learning situations.

c) To realise the use of the microcomputer as an aid, the teacher must be able to operate it efficiently, know and understand the software being used and use it appropriately.

d) Teaching objectives must be identified in order to determine the areas where the microcomputer could be used in the teaching of writing .

e) To evaluate the microcomputer's potential as an aid to teaching, a variety of teaching opportunities using the microcomputer must be explored and compared with current practices.

f) In order to avoid the use of the microcomputer merely to supplement existing teaching provision, an assessment and evaluation of current practices and provision must take place.

6.2.TEACHERS INVOLVED IN THE RESEARCH

The teachers in Group 2 of the research were in the same school. (Ref point A) Their involvement in the research was arranged to coincide with a school curriculum development initiative as part of a curriculum review programme. Each school in the authority are asked to nominate a school or curriculum aspect or area to review each year and this school had chosen 'Writing' to be reviewed. (Ref point F)

The school was built in 1939 and is situated in a heavily built up

area near a town centre surrounded by industrial complexes. The school catchment area covers a range of medium and low priced private housing, council houses and flats. The school role was approximately 430 including the nursery children. The school was well equipped with microcomputer facilities. Every classroom had their own microcomputer which was either part of a network system or disc driven, and there were four printers available. (Ref point B). The school has a considerable amount of software including all the programs used by the teachers in the first research group.

The staff were organised in four working teams:-

five teachers of children in the 4 plus to 6 plus age range;

four teachers of children in the 7 to 8 plus age range;

four teachers of children in the 8 plus to 9 plus age range;

and five teachers of children in the 10 to 11 plus age range.

The Deputy Head of the school was appointed as the review co-ordinator.

The writing project aim was "To heighten teachers' awareness to the development of children's writing, and to provide opportunities for teachers to explore and expand upon curriculum writing initiatives for the promotion of writing development". Although all the teachers in the school were taking part in the school's writing review, only fifteen teachers whose children were aged between 6 plus and eleven plus were used in the research project. The research with Group 2

teachers began in September 1986. To establish the teachers' current writing provision, ideas and views a pre-research interview was held with the same questions and conditions used with Group 1 teachers.

6.3 THE MAIN POINTS FROM THE GROUP 2 PRELIMINARY RESEARCH INTERVIEWS (See appendices 2C to 14C)

1) Approximately half of the teachers organised their children for work in ability groups and the others varied their organisation according to the task. (Appendix 2C)

2) The majority of the teachers thought that the purpose of learning to write was to be able to communicate. (Appendix 3C)

3) The sharing of written work was mainly with the teacher and peers. (Appendix 3C)

4) The majority of teachers thought that the qualities representative of a good writer were imagination, expression, a good range of vocabulary and the ability to structure writing. (Appendix 4C)

5) The writing tasks given on a regular basis were stories, formal language work, and news or diaries. (Appendix 7C)

6)The curriculum areas most often linked to writing were named as Literature and Environmental Project work. (Appendix 7C)

7)The planning of written work in some way was done by fourteen teachers but only 3 did it as a regular feature of the work. (Appendix 8C)

8)Displayed written work was mainly topic work or poetry. (Appendix 8C)

9)Most of the teachers said they made provision for different abilities but generally they were referring to children of low ability. (Appendix 9C)

10)The results showed that fictional writing tasks took up a quarter to three quarters of writing time, and topic work and formal language work was done by all but one of the teachers in the remaining time. (Appendix 10C)

11)Nine of the teachers said they varied the organisation of the children for writing tasks according to the task three of the teachers continued with their general organisation of ability groups. (Appendix 13C)

12)The majority of the teachers said that each week their children

spent between a quarter and a third of their time doing writing activities. (Appendix 10C)

13)The introduction of tasks was usually through class discussion with the topic introduced by the teacher. (Appendix 12C)

14)The most common resources used to support writing activities were stories, pictures, blackboard or workcards. The use of the last resource was unusally high compared to the 100 sample and the teachers in Group 1. (Appendix 12C)

15)More than half of the teachers said their children did not take part in collaborative writing activities. (Appendix 13C)

16)Marking was the main way in which teachers responded to children's writing. (Appendix 14C)

17)Less than half of the teachers said their children reviewed, edited and re-wrote their work. (Appendix 14C)

18)The most common way of monitoring work was marking. (Appendix 15C)

The results shown in Appendices 3C to 15C indicated only one significant variation with the teachers in the 100 sample and Group 1

teachers. The Group 2 teachers all said that children did not take part in group tasks (Appendix 13C), however, this did not correlate with their other answers on classroom organisation (Appendices 2C and 12C) In general, there was little variation in:

- a) the teachers perceptions of the educational purpose for writing;
- b) the content of their writing provision;
- c) how they responded to children's work.

6.4 THE RESEARCH PROGRAMME

The research was designed to involve the teachers in the following activities.

a) Through discussion and prepared papers the teachers determined what the writing curriculum would involve and evaluated the current provision.

b) Each of the three terms had a writing focus which was nominated by the teachers before the beginning of each term. The teachers then organised their teaching to investigate and develop the focus.

c) Each teacher monitored the writing activities they provided, and recorded the results and observations.

d) Each teacher chose a group of children from the class and kept samples of work as a record of the activities. The samples were also

used for comparison with previous work.

e) The co-ordinator arranged team meetings, and prepared progress reports for the teams, and worked with the teachers in the classroom acting as an observer. Twice a term all the teachers in the school met to exchange views and observations.

6.5 THE BEGINNING OF THE RESEARCH

The co-ordinator was conscious of the importance to establish good team unity so that the team members would be able to meet the challenge of the inquiries into their classroom provision. The first questions the teams considered were:

What was good writing?;

How could it be achieved?

Through discussion the teams agreed to investigate the use of resources and stimuli in the provision of writing situations.

The first term's project was based on the following questions.

- a) How do we decide on the writing tasks we arrange for the children?
- b) How do we initiate writing tasks?
- c) What kinds of stimulus do we provide?
- d) What use do we make of resources?

6.6 THE MONITORING OF THE RESEARCH ACTIVITIES

After the first team meetings a monitoring sheet was prepared. (See

Appendix 32) This incorporated a number of key issues which the teachers felt were important in the provision of writing experiences:- task objective; initiating the activity; the use of resources; the children's involvement; monitoring of the task; evaluation of the activity; future development.

6.7 THE FIRST TERM OF THE RESEARCH THE PROVISION OF WRITING TASKS.

Each team agreed to follow a similar pattern of investigation into a number of writing situations arising from a range of stimuli:

- a) Visits;
- b) School events;
- c) Practical experiences;
- d) Resources eg pictures, stories;
- e) Technological resources i.e. cassette recorders, T.V., microcomputer;
- f) Curriculum areas eg.topic, drama etc.;
- g) Teacher given tasks.

6.7.1 WRITING ABOUT VISITS

The visits made by the teams included: the town square; the local museum; the park. Appendices 33,34,35 shows the respective results of visits to the town square with a class of 7 year old children; a visit to the museum with a class of 9 year old children; and a visit to the park with a class of 10 year old children. The results from the visits varied considerably as did the quality of the writing.

varied considerably as did the quality of the writing.

Appendix 35 shows that the children were simply asked to respond to the visit and write about it. Appendix 33 shows that the children were asked to observe some particular aspects and then write about them. Appendix 34 shows that the children were divided into groups and given specific things to observe in order to report to the rest of the class, and to subsequently write about it to contribute to a class book. In the first two cases, the children worked individually and produced their work on sheets of paper or in class writing books. In the last case the children worked in groups. They produced written pieces of work which were typed into the microcomputer, with one of the groups producing their entire report on the microcomputer. The teacher observations show that she thought there was no distinct difference in the quality of the work, but the microcomputer group worked better together. She further remarked on the several alterations and improvements all the groups made to their work when they typed it in.

6.7.2 WRITING ABOUT PRACTICAL EXPERIENCES

The practical experiences provided by the teachers included:- baking, making models, painting, examining and handling fossils, blowing bubbles, looking at snow, watching clouds. The writing covered different aspects:- recording the sequence of events; recording

personal factual and imaginary interpretations of activities; recording observations. Although the teachers felt that most of the activities produced some good written accounts many of the teachers commented on the children's difficulties in sequencing events, and the lack of observation skills.

The microcomputer was used in several different ways. In one class the children were asked to paint some pictures about space flowers which were connected with a space adventure program. The children were asked to produce first drafts on paper describing the flowers, and then type their stories into the microcomputer. The final drafts were printed and displayed with their paintings.

Another class of seven year old children worked in groups, supported by the teacher and some mothers, and blew bubbles and talked about them. Each group in turn, fed their words into the microcomputer using 'Wordplay', and then 'played' with them making them into poems to make a class poem book.

A class of eight year old children working in groups were asked to talk about the clouds in the sky. One group were given access to the microcomputer. There were asked to write individual thoughts down on paper, and then develop them on the microcomputer, with members of the group helping each other. The teacher felt that the children who had

access to the microcomputer were quite prepared to develop their work, whereas, children working on paper were much less enthusiastic.

6.7.3 THE USE OF RESOURCES

The most common resources used were stories, pictures and poems. Teachers felt that most of the children talked willingly and with interest, but the actual work that was produced was disappointing. This resulted when resources were introduced to the class and children were left to respond individually. One teacher felt that group work was a possible organisational alternative with children using a word processor. (Appendix 36)

One teacher organised the class into groups and gave each group a picture to write about. Initially all the children talked excitedly about their pictures and made up some imaginative verbal stories, but when they were transferred to paper the writing was mundane and did not reflect the initial excitement. The teacher organised one group to use a word processor for their story. After their first attempt she discussed the story with them pointing out that what they had written did not reflect the excitement they were trying to convey. They discussed the words and the structure of the writing and then re-drafted the work. (Appendix 37) The teacher felt the final piece of writing was very worthwhile, and commented that this was the first time she had ever written with a group of children.

Several microcomputer programs were used to present writing situations ('Storyline', 'Cartoon', 'Story', 'Martello Towers', 'Wordplay') The programs were used to produce individual and group stories and poems. In most cases, the teachers thought the programs stimulated some interesting work, however, the comments were related to technical skills such as planning and structure rather than quality of writing. Two teachers asked their children (aged eight) to listen to some recorded stories and write about them as a sort of review. The reviews were to be used for other children to read in order to select stories they would like to hear. One teacher selected one group of children to do this work as she thought it was too difficult for many of the class. One boy who usually produced very little writing became very involved with the task. The teacher was undecided whether it was the stimulus of the audio story or the motivation of using the word processor. There was quite a noticeable difference in his usual limited work from his book and the flowing but uncorrected work on the microcomputer. (Appendix 38)

6.7.4 WRITING ABOUT SCHOOL/SEASONAL EVENTS

The subjects for the writing included the school Harvest Festival, school assemblies, current world news, Halloween, Bonfire Night, Christmas. Without exception, the teachers talked and discussed the events with the children and then gave them a writing task. The tasks were presented in various ways and the results varied immensely. Most

of the teachers commented on the lack of interest by the children in writing down what they had talked about with enthusiasm. In one class, children aged eight, were given a class task of writing a report of a well known bible story. One group used the program Frontpage to represent it as a newspaper headline. (Appendix 39). Another class were asked to write about a personal memory. The teacher's record sheet shows a poor response to the class approach. (Appendix 40) Appendix 41 shows an individual child's response at a later date, using a word processor to draft and develop the work. Another class were asked to write group letters about bonfire night, for imaginary people, who for some reason had not taken part in any bonfire activities. The microcomputer was used for the group writing with the children being encouraged to review and re-write their work. (Appendix 42) Appendices 43 and 44 show two further examples of 'seasonal' writing. In Appendix 43 the teacher introduced the work through reading Autumn poems. She then asked the children, aged seven, to find a range of appropriate vocabulary to use with the program Wordplay to create poems of their own. In Appendix 44 a group of children aged nine, were asked to make a report of the Easter Service for display on the school noticeboard.

6.7.5 WRITING FOR CURRICULUM AREAS

The areas used were varied and included drama; art and craft; topics; history. The results were very similar in that most of the teachers felt that the children were interested and motivated in the writing area, but generally the writing produced fell short of the

children's initial verbal responses. The problem was getting the children to transfer words into writing, and getting them to explore and develop the technique to find the most efficient way of saying things. (Appendix 45)

6.7.6 WRITING RESULTING FROM TEACHER INITIATED TASKS

The tasks were decided and initiated by the teacher. Most writing situations involved the children in imagining or recalling experiences. The teachers felt their main problem, in most cases, was getting the children to identify what they wanted to say and find the best way to say it. Most of the teachers commented that they felt the children were pre-occupied with spellings etc. which stopped them from focussing on the task and interrupted the flow of ideas. This led many of the teachers into exploring the use of the word processor for the planning and drafting work.

6.8 A SUMMARY OF THE CO-ORDINATOR'S REPORT OF THE FIRST TERM'S RESEARCH ACTIVITIES

(For the full report see appendix 46)

The teachers identified the following aims and objectives for the provision of writing activities:-

1. Writing should be a tool to communicate socially and personally;
2. Writing should enable children to communicate in a variety of ways for a variety of purposes;

3. Writing situations should provide children with opportunities to use writing as a tool for learning;
4. Children should be helped to acquire a range of skills and techniques to write in a variety of styles;
5. Children should see the purpose for writing and be helped to recognise appropriate styles for a variety of audiences.

The next term's activities would include investigating the role of the teacher in writing situations, and how the writing process could be supported.

6.9 SUMMARY OF THE FIRST TERM'S RESEARCH

The provision of exciting situations for writing to take place did not always bring about the expected results. Teachers realised that once a stimulus had been provided then the real act of writing began in the response to the stimulus. It was in this context that the use of the microcomputer was felt to have potential as a teaching aid.

In the instances where microcomputer programs were used as a stimulus for writing the results showed little difference from writing resulting from other sources, in some cases the writing was inferior. Writing about 'real' things produced better work than responding to artificial microcomputer stimuli. When programs were used to support a specific aspect of writing development, such as the use of 'Cartoon' to promote planning and sequencing, children did produce some

significant writing. The teachers began to realise that the microcomputer was best used as an aid to enable writing, but not as the focus for the writing.

Many of the teachers commented on children's increased motivation to write using the microcomputer. The reasons for this was identified as: the enabling of writing through the releasing of children from the physical act of writing; the incentive of having printed copies. There was an increase in writing being displayed, and the directing of writing towards nominated audiences.

6.10 THE SECOND TERM'S RESEARCH: TEACHER INVOLVEMENT IN WRITING SITUATIONS AND THE PROCESS OF WRITING.

6.10.1 TEACHER INVOLVEMENT

The teachers devised writing situations which would involve them in writing activities in various ways, with the class, groups, or individuals. They felt that to be involved with children as they were writing was usually extremely difficult, but the use of the microcomputer presented and increased opportunities. Individually, and in groups, teachers found they became involved in helping children to acquire and appreciate writing techniques and develop ideas.

The results from collaborative microcomputer writing was significantly better than with traditional means. Children could read their writing easier on a screen, this encouraged them to contribute to the development of the writing, and increased their concentration. In ordinary group situations the child who held the pencil tended to control the group's ideas, and eventually other members of the group lost interest on the task when they couldn't see the writing. Teachers also found that they could join in with microcomputer activities quite easily, supporting and helping without appearing to interfere.

Teachers made frequent comments on the increased opportunities they had to observe children's individual and group writing as it was happening, which led to discovering and acquiring important developmental information about the children. Many teachers said they realised how little time they usually gave to the actual teaching of writing. Teachers who interacted with children as they were writing, found that they became more aware of children's individual developmental stages, and progress or difficulties were better supported. Younger children (aged 7 to 8) were helped with the structuring of their writing and transferring verbal ideas into written forms. Older children were encouraged to read their writing to make improvements, and this emphasised the correlation between reading and writing.

6.10.2 THE WRITING PROCESS

For most of the teachers, the problem in helping children with the writing process, was knowing exactly what the process entailed. Most writing activities were directed towards an end product, and rarely was writing regarded as a means for exploring ideas or as a learning tool. This was reflected in many of the tasks set by the teachers, writing appeared to be regarded as a curriculum subject, and not a means for supporting or learning about other subjects. In the process itself a great deal of emphasis was given to the composing and transcribing elements, with reviewing and drafting of work being neglected.

Teachers criticised children's preoccupation with spellings when they were writing, but it was very common for teachers to concentrate on spellings when they responded to children's work. Presentation and vocabulary were also given a great deal of emphasis by teachers, which drew children's attention away from the content of the writing activities. (Appendix 47)

Gradually as the teachers concentrated on the provision of tasks to achieve specific writing purposes, the importance of reviewing and drafting became more evident. Teachers gradually identified the reasons for encouraging children to explore, change and develop their writing:

to discover how to say things in different ways;

- to illuminate and find thoughts;
- to establish reason and logic;
- to argue and clarify facts;
- to establish effect;
- to develop personal improvement and criticism;
- to develop ideas;
- to achieve personal success and satisfy needs.

6.11 A SUMMARY OF THE CO-ORDINATOR'S REPORT FOR THE SECOND TERM OF THE RESEARCH (appendix 48)

The teachers tried to identify key stages in writing development and how they could interact with the children to support individual development. They explored the relationship between drafting and writing effectiveness. They decided that the third term's activities would involve the provision of writing situations to encourage different purposes for writing, and the fulfilment of the purposes.

6.12 SUMMARY OF THE SECOND TERM'S RESEARCH AND THE USE OF THE MICROCOMPUTER AS AN AID TO TEACHING

There was strong evidence to suggest that the microcomputer was a very positive aid in the provision of situations enabling the reviewing, editing, and drafting of work. In fact, some teachers felt that using the microcomputer was the only way this could be effectively developed in a busy classroom. The main problem had been the teachers' uncertainty concerning why children should review

and draft their work, and how this contributed to writing development.

The use of the microcomputer proved to be a very positive support for child/teacher interaction. Teacher involvement in writing situations increased substantially, and teachers became aware of their opportunities to facilitate writing at all stages of development.

6.13 THE THIRD TERM'S RESEARCH: WRITING FOR DIFFERENT PURPOSES

The teachers met and discussed the term's activities. They decided to investigate the provision of writing experiences to develop children's writing in three areas 'Personal', 'Functional', and 'Literary'.

6.13.1 WRITING FOR A PURPOSE: LITERARY WRITING

The teachers had difficulty in identifying what literary writing activities should include. At first, many of the teachers felt that it was mainly writing which involved children in creating stories around imaginary situations. Eventually, the activities which were pursued involved, the writing of stories and poetry where vocabulary and imagery were stressed, and experimentation with written language forms, structures and organisation of text. Through their experiences in the first two terms of the project, the teachers explored a variety of stimuli, to provide situations to encourage children to develop an awareness of different literary styles of writing.

Programs such as 'Cartoon', 'Wordplay', 'Tray', and a range of adventure games were used as a stimulus in the writing situation, but the majority of the microcomputer work was done using content free word processing software. In most cases the purpose for the writing was set by the teachers, and the microcomputer was used to support the production of an appropriate piece of writing.

Generally, teachers acknowledged that children were unlikely to produce a totally acceptable, successful piece of work in a first draft. The use of word processing facilities greatly enhanced children's opportunities to explore, experiment and choose the most appropriate style, vocabulary and arrangement for their writing. Many children for the first time considered presentation as part of the overall effect. (Appendix 49)

6.13.2 WRITING FOR A PURPOSE: FUNCTIONAL WRITING

The teachers used a wide range of stimuli for the writing activities. These covered visits, current news (school and world), practical activities, and environmental objects of interest. Data Handling programs were used to support the development of skills for collecting and retrieving information. The use of microcomputer adventure games for writing purposes was expanded. Whereas the games had been used mainly for encouraging imaginative pieces of writing, they began to be used for recording and note taking.

Teachers felt the programs which allowed children to emulate the production of newspaper pages were influential upon children's writing styles. Although the programs were often used to support factual writing they were also used to support other writing styles. (Appendices 50) The main attributes of the programs were felt to be the editing, presentation and printing facilities.

Most of the writing produced was through a variety of word processing software. The range of writing covered dinner menus, items for news boards, competition information, letters to various people, descriptions of models or paintings, book reviews and reports.

6.13.3 WRITING FOR A PURPOSE: PERSONAL WRITING

Of the three writing areas investigated, personal writing was the area teachers found the most difficult. In most cases, teachers chose activities carefully, with consideration given to children's experiences and abilities, but the results were disappointing. It was felt that children did not receive many opportunities to write about their innermost thoughts, feelings or ideas, and they found it difficult to respond. The writing which emerged was concerned mainly with reporting or recording, with the focus being on the reproduction of facts. Teachers felt the children had two main difficulties: transferring their verbal thoughts into writing; and using writing as a tool to develop their thoughts. Teachers felt that for children to develop the awareness and techniques required, there was a need to help children as they were involved in writing, and to provide more

opportunities for children to experiment with and examine their own writing. Screen displayed writing was particularly useful in providing opportunities for discussion, and drawing children's attention to appropriate techniques as they were writing. The children then initiated their own changes, and found alternative ways of developing their writing. Most teachers felt that children needed to review and draft work in order to develop their thoughts and ideas, and the word processor supported this.

6.14 A SUMMARY OF THE CO-ORDINATOR'S REPORT FOR THE THIRD TERM OF THE PROJECT (See appendix 51)

The teachers began to recognise the huge variety of writing situations that should be provided for children to appreciate the different purposes for writing. They found factual writing situations the easiest to provide. They admitted that literary writing needed to be expanded beyond story writing. The provision for personal writing needed to take into consideration children's interests, their individual experiences and capabilities, and the use of writing as a tool for identifying thoughts and clarifying their thinking.

Teachers began to realise the importance of choosing the most appropriate stimulus for tasks, and that children write best about the things they know and have experienced. Whatever the writing situation children should be aware of the purpose for the writing. They should be given opportunities to direct and develop their writing for a

range of intended audiences.

It was identified that organisational variety was important. Children gained insight into the writing process and acquired skills by working with other children in small or large groups, but sometimes they needed to work alone to develop their own thoughts and understanding. They also needed time to plan, structure, edit and re-write work in order to appreciate its effectiveness.

The teachers felt they needed to recognise when to intervene to support childrens' skill and knowledge acquisition, and establish understanding. The most significant aspect identified by the teachers was that writing development is not simply achieved through writing practise, but needs to be provided for and taught in a positive and structured way.

6.15 SUMMARY OF THE THIRD TERM'S RESEARCH

The teachers had considerable difficulty in deciding upon writing activities which involved a particular writing style. Generally, activities predominantly involved getting children to put words on paper. The provision of situations to achieve a particular effect meant that the teachers had to determine the reason for the writing, convey this to the children, and anticipate the needs of the children to accomplish the task. For many teachers this gave an entirely new emphasis for writing activities. Children had to be helped to match

the writing to the purpose, and not just get words down on paper.

The teachers recognised that most learning about writing was acquired as it was happening, and not when it was finished. This had direct implications for teacher and child involvement and interaction. Children needed to be encouraged to review as they wrote, and teachers had to intervene and interact with children, to help develop their awareness and understanding of the writing process. The microcomputer was identified as a valuable tool supporting teacher involvement and intervention in writing situations. Screen displayed writing enabled structures and techniques to be discussed easily. The teacher gained insight into the children's capabilities, and helped them to acquire appropriate skills and understanding relative to the writing purpose.

Screen displays allowed children to readily observe their own and others writing. This immediately tested the effect of the writing encouraging them to criticise and assess, and think about what was being written. Teachers acknowledged the effect of the children being involved in their own learning, and how much this sharpened their awareness and helped to increase their understanding. The children began to change and develop their writing because they saw the need, whereas previously, it was standard practice to copy the teachers' alterations.

It was recognised that in most writing situations children need the opportunity to:-

- assemble their thoughts;
- plan what they are going to write;
- consider the relevant style;
- choose the most appropriate vocabulary;
- put the words together effectively;
- structure and develop the writing;
- organise and present the writing.

In order to achieve this children need opportunities to experiment, to alter and re-shape their writing. The use of word processors were considered invaluable in enabling these opportunities.

Teachers found that the children responded better to genuine writing tasks rather than those contrived to practise a particular writing style. The printer use stimulated more work for display and audience directed activities, and this provided more genuine purposes for the children's writing involving different writing styles.

There was more experimentation with presentation through the use of the microcomputer. Children began to appreciate that letter size, the type of script, and the arrangement of the text contributed to the effectiveness of the writing.

One significant aspect of the term's work was the identification of

inappropriate microcomputer use. They identified that some writing had to be tackled individually and privately. Sometimes writing was planned better away from the microcomputer and finished off by using the microcomputer, and sometimes the opposite situation was more appropriate. Many activities involved necessary practical and preliminary work away from the microcomputer. There were times when the teacher needed to develop aspects of writing with the children away from the microcomputer. It was important for teachers to make sure that children had the skills to operate the software easily, as in some cases this could take precedence over the task and have detrimental results.

CHAPTER VII

CONCLUSION

7.1 ANALYSIS OF GROUP 1 AND GROUP 2 FINAL INTERVIEWS (See Appendices 3F to 18F)

The main goals the teachers felt they were pursuing had not altered from the pre- research interviews. It was noticeable in Group 1 that many of the teachers nominated a number of skills as 'goals'.(Question 6 on the interview sheet)

The range of curriculum areas used in writing activities were virtually the same as in the first interview. There was a slight increase towards writing connected with practical subjects such as Art and Craft, C. D. T., in Group 2.(Questions 3,15,16 on the interview sheet)

Group 1 nominated 'good writers' as those children who had predominantly acquired a number of skills. Group 2 tended to refer to aspects concerning the writing process. This showed a slightly

different emphasis in writing objectives since the first interview. (Questions 7, 8 on the interview sheet.)

Children's time spent on planning and re-writing of work was marginally greater in Group 2 than in Group 1. (Questions 20,21)

In both groups the organisation of children for writing activities was similar, with a strong tendency towards group work when the microcomputer was used. (Questions 2,17,19)

In the initiation of tasks and the use of resources there was a small increase in child initiated tasks and the provision of practical activities by teachers in Group 2. (Questions 4,5)

There were slightly more teachers in Group 2 than Group 1 who worked with children and observed them working. (Question 19)

All the teachers in both groups felt that using the microcomputer was an advantage as a teaching aid in the provision of writing situations. The main supporting points were:

- it produced more opportunities for collaborative writing;
- more writing was produced for display extending the writing audience;
- it became an additional stimuli for writing experiences;
- it motivated children to write.

A few of the teachers in Group 1 felt that it was a useful resource to support the writing process and teacher involvement in writing situations, but these feelings were much more evident with teachers in Group 2.

7.2 THE USE OF THE MICROCOMPUTER AS AN AID IN THE TEACHING OF WRITING

The research into the use of the microcomputer did not reveal any new means of teaching writing, neither did it identify any totally new classroom writing situations. The value of the microcomputer appeared to be identified as:

- a) enhancing and broadening the provision of writing situations;
- b) increasing opportunities for children to develop writing skills in meaningful ways;
- c) enabling the provision of situations which would help children to understand the writing process.

7.3 THE PROVISION OF WRITING SITUATIONS

Fundamentally writing is a means of communicating, a way in which something is said to an intended audience. The audience can vary from someone unknown, to someone quite specific, and from a large number of people to the writer writing for him/herself alone. Through writing for different audiences the different purposes for writing can be realised, and with this the most appropriate styles and presentations can be explored and experienced. (1) However, it is quite common for teachers to provide writing situations which have little connection

with real writing purposes. (Bullock Inquiry; APU Survey 1979; Research 100 sample; Research initial teacher interviews). Furthermore, the tasks are often teacher initiated with the teacher as the sole audience. (2)

Within the confines of a classroom the provision of real writing situations is quite demanding for teachers. The microcomputer was found to be helpful in this aspect. Facilities which eased presentation aided the production of newspaper articles, poetry anthologies, magazines, story books, noticeboard articles etc. Programs involving adventure games and data handling stimulated note taking and planning. The editing facilities of word processors encouraged the writing and circulation of reports and information. Record keeping and the creation of reference lists were aided by the use of data files.

During the research many of the microcomputer writing activities using wordprocessors became integrated with a range of curriculum areas. Previously, any writing based on real educational intentions was usually produced in designated writing periods, and writing for other curriculum areas was little more than copying or recording. Using microcomputer facilities to aid a variety of curriculum writing tasks helped to emphasise the different purposes for writing. Perhaps of even more importance, was the fact that children began to use writing to learn about other subjects, and use it as a tool for cognitive enhancement. (3)

7.4 WRITING FORMATS AND STYLES

The microcomputer word processing facilities encouraged exploration of text and presentation, which supported a variety of writing formats. The formats incorporated various writing features without the emphasis being solely on the correct use of vocabulary, spelling and punctuation.

The use of the printer increased the circulation of children's writing, which all teachers thought to be beneficial. Presentation of writing to a wide audience encouraged experimentation and the production of writing formats and styles. The sharing of writing helped children to appreciate the relevance and value of their own writing, and helped them to understand writing appropriateness through seeing the work of others.

7.5 THE WRITING PROCESS

It was in this area that the microcomputer was felt to have significant potential as a teaching aid. There were two aspects to the support:

- 1) the use of programs directly aimed at specific objectives, ie. planning, sequencing, transcribing;
- 2) the use of word processors to facilitate the process itself, ie. composition, transcribing, reviewing, drafting.

It was established, at the beginning of the research, that for the majority of teachers drafting and editing of writing was not a

recognised feature of classroom writing. There emerged two reasons for this:

- 1) the tedious nature of re-writing using pencil and paper;
- 2) the teachers' lack of understanding of the writing process and writing development.

In the early stages of writing children need to discover how to say things, to explore what they know, to recognise and understand the code of writing, to use logic and structure, to appreciate the appropriateness of their writing.(4) In later development the reviewing becomes even more significant,

'...Attaining a degree of mastery over stylistic conventions leads in turn to the discovery that writing can be used to affect the reader - that it can direct, inform, amuse, move emotionally and so on. Thence emerges the communicative stage. Once the students start writing for readers, it becomes a natural step for them to start reading their own writing, which sets in motion the writing-reading feedback loop on which the stage of unified writing depends. Once the feedback loop is functioning well, it will be natural to discover that it leads not only to improved writing but also to improved understanding - that loop constitutes a kind of dialogue with oneself. Thus may emerge the final, epistemic stage of writing development.

(C.Bereiter, (1980), Development of Writing, p89, in "Cognitive Processes in Writing" eds. Gregg and Steinberg)

The increased opportunities for children to use drafting, reviewing, and editing, as a recognised and regular aspect of their writing, would appear to make the microcomputer an invaluable aid to the teacher.

7.6 THE ORGANISATION OF WRITING SITUATIONS

There were no significant changes in the general organisational

methods of the teachers. However, there was an increase in group writing when the microcomputer was used. Group work prior to the research mainly consisted of group planning with one child doing the actual writing. Screen displayed writing encouraged each child to take part in the writing task. They were able to offer ideas and suggestions which were then implemented and displayed. This encouraged further suggestions, which were displayed prompting immediate feedback from their peers. The children observed each other's techniques and skills, and interchanges of writing knowledge took place.

Reading played an integral part in the writing. This important aspect of writing development had not been mentioned by any teacher in the initial interviews, and yet it is considered to be of vital importance to children in the early stages of writing. (5)

Having the group's work clearly displayed enabled the teacher to collect developmental information about the group members. The teachers found they could interact with the children in a natural and positive way, and then withdraw without taking control of the group.

Most teachers felt the microcomputer to be useful in helping children with particular difficulties. The use of the microcomputer was felt to be motivating for children who were reluctant to write or had difficulty in finding suitable content for their writing. The word processors helped the children who had co-ordination difficulties. The

struggle with the physical act of writing for young children, and even for some older children with co-ordination difficulties, can totally dominate and often destroy the value of the writing content. (6) Many of the teachers in Group 2 felt they had more opportunity to observe children as they were writing, and this helped them recognise problems, and make judgements regarding their developmental needs.

7.7 TEACHER INTERACTION AND INVOLVEMENT

The use of the microcomputer appeared to increase the opportunities for teachers to interact with children in two distinct ways.

1) A teacher's function is to observe children in their working situations so that judgements can be made about their intellectual functioning and the success of their learning. (7) The teachers found the use of the microcomputer gave them more time to observe the children working, allowing them more time to determine children's levels of abilities and identify problems. This allowed continuous diagnostic assessment of the children's performances, which meant that children were helped to overcome their problems as they occurred, and learning was positively encouraged. Unfortunately, in many classrooms the current practice of marking when a piece of writing has been finished, means that problems are often overlooked and the marking produces no further learning. (8)

2) The teaching of writing does not only mean the setting of tasks and responding to them when they are finished. Teachers should be

involved in talking and encouraging children to develop their experiences, and help them to understand the significant features of the task.(9) The use of the microcomputer provided opportunities in which the teacher could write with the children and become involved in the learning. It allowed teachers to comment, ask questions and direct children's attention to the aspects of writing relevant to the task. As well as the opportunity to teach, the teachers found they had the opportunity to assess the value of the learning situations they had provided.

7.8 THE IMPLICATIONS FOR THE USE OF THE MICROCOMPUTER AS AN AID TO TEACHING

The focus of the research was on a sample of thirty primary teachers teaching children between the ages of seven to eleven, and 'how' and 'what' they taught. It was designed to present teachers with the opportunities to use the microcomputer as an aid to their teaching of writing, and monitor changes in attitudes, beliefs, teaching provision, organisation and involvement. The thirty teachers were in two distinct research groups. As shown in Chapter V, the results from the first research group identified some issues, but the results related to the potential of the microcomputer as an aid were inconclusive. The results from the second group had more positive indications, with very significant implications for the realisation of that potential.

Most of the teachers in Group 1 of the research had few microcomputer facilities and restricted access, and their abilities to handle their machines were limited. It is only when microcomputers are a standard resource in a classroom and used on a daily basis that organisational, methodological and attitudinal changes can, or are likely, to occur. Group 2 teachers each had their own classroom microcomputer, and they could all handle it fairly competently. The teachers in Group 2 had taken part in a number of school and education authority in-service microcomputer familiarisation workshops, whereas some of the teachers in group one had only minimal training experiences, and others had had no training at all.

All of the teachers in Group 1 used the microcomputer to support their existing practices and rarely was this questioned or reviewed. Only in two cases were there any strong indications that the writing provision had been revised. Nearly all the teachers judged the value of the microcomputer by the success they had when combining it with existing practices. It was noticeable that the teachers organised the use of the resource to supply writing situations as distinct from learning situations, therefore, a lot of the microcomputer's potential remained unexplored.

The teachers in Group 2 completely reviewed the aims and objectives in the teaching of writing, and their classroom provision. The review was arranged so that they could work together, observe, monitor and

discuss. The collaborative approach decidedly enhanced the research. (10) Working together the teachers made a critical evaluation of their school's writing policy (appendix 52). They examined their knowledge of the curriculum area, existing provision and practices, the psychology of learning and writing development. When the teachers began to assess and review their own practices, the potential of the microcomputer as an aid began to emerge. (11)

Even though the majority of teachers in Group 1 felt the microcomputer to be a useful resource the actual effect was negligible. In Group 2 the effect was more noticeable, but due to the short period of the research, the results were just beginning to have significance when the research period ended. However, it is beyond doubt that the more effective use of the resource was linked to a number of crucial factors:

- the teachers' understanding of the subject area;
- their knowledge of the developmental patterns and patterns within the area;
- the use of appropriate teaching strategies in connection with the use of the resource;
- the use of appropriate organisational adaptations;
- the re-appraisal of the teaching role from instructor to facilitator.

7.9 THE IMPLICATIONS FOR THE MICROCOMPUTER AS A GENERAL CLASSROOM TEACHING AID.

The principal findings related to the potential of the microcomputer as an aid to writing provision, can also be transferred to the use of the resource to aid provision in other areas of the curriculum. The microcomputer can support facilitation of:

- child controlled learning;
- teacher interaction and involvement in learning;
- opportunities to diagnose and understand children's learning development;
- the development of learning processes;
- cross-curricular integration;
- the reinforcement of specific subject skills and knowledge.

A teacher's effective use of the microcomputer will correlate with his/her overall teaching effectiveness, which in turn is related to curriculum knowledge and understanding of child development; the ability to facilitate and manage children's learning; the fostering of appropriate learning attitudes.(12)

A school's success in realising the effective use of the resource will not be achieved through isolated use by some of its teaching staff. As in any kind of curriculum development a co-operative programme of review and research will need to be implemented. As shown through the research with the teachers in Group 2, the potential of the resource will probably only be achieved

through a school development policy and staff development.

" New teaching strategies are extremely difficult to learn and to set oneself to learn, especially when they cut across old habits and assumptions and invalidate hard-won skills. It is not enough to assume that teachers are in a good position to develop new strategies independently on the basis of common professional skills. Co-operative and well-organized effort is needed, and teachers working together have the same right and need as other professionals - such as doctors or engineers - to have access to consultancy and to draw upon research.....

I am inclined to believe that the key quality needed in a school, if development is to take place, is reflexiveness: a capacity to review critically and reflectively its own processes and practices."

(L. Stenhouse,(1975), An Introduction to Curriculum Research and Development, p176)

7.10 RECOMMENDATIONS

The research has implications for teacher in-service training in the use of microcomputer technology in the primary age range. In general, most training provided in the past has been through the provision of central policy models, with little consideration for the school or classroom needs of individual teachers. The training of teachers would most likely be more productive if it took place and was developed within school situations, when teachers could evaluate teaching and learning models put forward in terms of their current school provision. Teachers could develop school and individual programmes of work supported by their colleagues. In this way, the gap between policy and effective practice could be diminished, and the use of the resource identified and implemented appropriately.

All teaching is to bring about learning (13), therefore this research was incomplete in that it focussed primarily on identifying the microcomputer's value as a teaching aid, and did not evaluate the learning resulting from its use. Further research into children's attitudes, development and achievements would have to be undertaken and then correlated to the findings of this investigation, for the full potential of the microcomputer to be realised.

REFERENCES CHAPTER VII

1. Thornton, G., (1980), Teaching Writing, London: E.J.Arnold Ltd.
2. Britton, J., et al, (1975), The Development of Writing Abilities, p.63., London: Schools Research Studies, Macmillan Education.
3. Kress, G., (1982), Learning to Write, London: Routledge and Keegan Paul Ltd., London.
4. Britton, op.cit., p.47.
5. Harpin, W., (1976), The Second "R", , London: Unwin.
6. Kress, op.cit., p.57.
7. Harpin, op.cit., p.115.
8. Thornton, op.cit., p.38.
9. Harpin, op.cit., p.120.
10. Stenhouse, L., (1975), An Introduction to Curriculum Research and Development, London: Heinemann.
11. ibid, p.143.
12. Smith, B. O. and Orlosky D.E., Eds., (1978), Curriculum Development: Issues and Insight, Chicago, U.S.A.: Rand McNally College.
13. Hirst, P., (1974), Knowledge and the Curriculum, London: Routledge and Keegan Paul Ltd.

APPENDICES

PAGES 175 to 324

SURVEY QUESTIONNAIRE
FOR RESEARCH INTO
SCHOOL WRITING PRACTICES

PAGES 176 to 183

WRITING ACTIVITIES IN THE PRIMARY SCHOOL

This questionnaire is part of a research programme and has been designed to gather information related to writing activities in primary schools.



GRATEFUL THANKS ARE SINCERELY OFFERED TO ALL THE BUSY TEACHERS WHO KINDLY AGREE TO FILL IN THIS QUESTIONNAIRE



The questionnaire is for teachers with children in the 7+ - 11+ age range

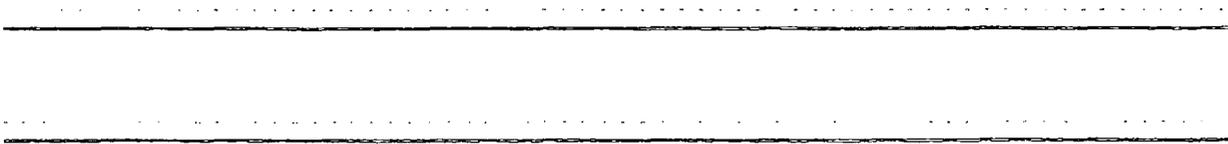
From the questionnaire it is hoped to establish some general patterns of classroom teaching activities and strategies, and therefore it is important that teachers answer the questions with reference to

typical, regular and actual classroom practices.

Teacher's names and names of schools are not required.

General Information

- 1A Length of teaching experience (in years)
- 1B Teaching responsibility (e.g. Sc.1, SC.2 etc)
- 1C Number of children in class.
- 1D Age range of children in class.
- 1E How are your children organised for classroom work activities? (e.g. in ability groups 4-6 children with groups based on reading ability)



2A In a typical week how many hours will your children be involved in writing activities?

.....

.....

2B How are the children organised when they are involved in writing tasks? (e.g. individually, group, class etc.)

.....

.....

2C In a typical week what specific writing tasks are the children given? (e.g. stories, articles, news, etc.)

.....

.....

2D Can you describe how you generally introduce writing tasks? (e.g. - The children are given pictures/books/ a story to write about.

e.g. - The class discuss various topics and individually the children write about their own choices.

e.g. - The children offer items of news and write about them)

.....

.....

.....

.....

.....

.....

2E Are there any resources which you often use in supporting Writing activities?

Pictures

Stories

Craftwork

Video/Film/T.V. Radio

Computer

Text books

Musical stimuli

Objects

Other

2F In your everyday teaching activities, are there curriculum areas which you feel you quite regularly link to writing activities?

P.E.	Drama	Art & Craft	Science	Literature
R.E.	Stories Poems	Maths	Project/ Env. Studies	

Music

Other

3A If asked by a parent why children need to learn to write what would you say?

.....
.....

3B Think of a child in your class who you would call 'a good writer' (for his/her age). Tick four of the following qualities which you feel typifies this 'good writer'.

- | | |
|-------------------------------|--------------------------------|
| Writing has structure | Has a good range of vocabulary |
| Writes in sentences | Good spelling |
| Writes in a variety of styles | Uses punctuation |
| Expresses feelings | Writes with expression |
| Writes with meaning | Writes with imagination |
| Writes for 'an audience' | Wants to write |
| Has a range of writing skills | Enjoys writing |
| Relates detailed experiences | Good presentation |
| Other | |

3C Tick four of the following which you feel typifies a 'poor writer' in your class.

- | | |
|--------------------------------------|--------------------------------|
| Writing lacks structure | Poor range of vocabulary |
| Doesn't use sentences | Poor spelling |
| Lacks writing techniques | Poor punctuation |
| Cannot express feelings | Writes without expression |
| Writing lacks grammar | Lacks imagination |
| Has nothing to say | Doesn't write much |
| Cannot relate experiences | Doesn't want to write |
| Lacks necessary language experiences | Doesn't like writing |
| Other | Poor co-ordination/handwriting |
| | Poor presentation |

3D How many children in your class do you feel have achieved a reasonable standard of writing for their age? (e.g. 15 out of)

..... out of

4A When your children are engaged in writing activities, is this generally on an individual basis, or as a member of a group, or as an individual doing a class writing activity.

Always as individuals	Mainly as a individual doing a class activity.
Always as a group	Mainly as an individual doing a group activity.
Depends on activity	Quite often as an individual
Other

4B Do your children take part in collaborative writing activities?

YES

NO

If yes, what sort of collaborative writing activities do they do? (e.g. reports, stories, poems etc.)

.....
.....

4C Do the children plan their writing tasks?

Regularly plan verbally	Sometimes plan verbally
Regularly plan written	Sometimes plan written
Always plan verbally	Never plan
Always plan written	
Other

4D Do the children ever share what they have written with other people?

No	Through display
Yes with peers	Yes with other teachers
	Yes with parents
Other

5A Do you make special provision for children of differing abilities?

YES

NO

If yes please give brief details

5B How do you monitor children's progress?

Discussion

Tests

Observation

Individual records

Marking

Work sampling

Other _____

5C How do you respond to children's writing?

Discussion

Marking

Written comments

Grades

Verbal comments

Display

Other _____

5D How long ago was the last in-service 'writing' based course you attended?

6 months within the last 3 years

1 year between 3 - 6 years

More than 6 years

Other _____

5E If you have attended a course where was it based?

School

Within L.E.A.

Nationally based

RESEARCH RESULTS

FOR

100 SAMPLE SURVEY,

RESEARCH GROUP ONE AND RESEARCH GROUP TWO

PAGES 184 to 266

APPENDICES 2A to 18F

APPENDIX 2(A)

100 Sample Questionnaire Analysis:.. General Information

.....

Question 1A:--Length of teaching service

.....

100 Sample

1-9 years	25%
10 -14 years	26%
15 - 19 years	27%
Over 20 years	22%

.....

Question 1E:--How are the children are organised for classroom work activities?

.....

100 Sample

Class	2%
Ability groups	42%
Social groups	5%
Mixed ability groups	13%
Varies according to task	35%
Age groups	2%
Individually	1%

APPENDIX 2(B)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- General Information

.....

Question 1A:-Length of teaching service

.....

	100 Sample	Research Group 1
1-9 years	25%	27%(4)
10 -14 years	26%	13%(2)
15 - 19 years	27%	27%(4)
Over 20 years	22%	33%(5)

.....

Question 1E:-How are the children are organised for classroom work
activities?

.....

	100 Sample	Research Group 1
Class	2%	7%(1)
Ability groups	42%	47%(7)
Social groups	5%	0
Mixed ability groups	13%	13%(2)
Varies according to task	35%	33%(5)
Age groups	2%	0
Individuallly	1%	0

APPENDIX 2(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview
Analysis: General Information

.....

Question 1A:--Length of teaching service

.....

	100 Sample	Research Group 1	Research Group 2
1 -9 years	25%	27%(4)	13%(2)
10 -14 years	26%	13%(2)	27%(4)
15 - 19 years	27%	27%(4)	27%(4)
Over 20 years	22%	33%(5)	33%(5)

.....

Question 1E:--How are the children are organised for classroom work
activities?

.....

	100 Sample	Research Group 1	Research Group 2
Class	2%	7%(1)	0
Ability groups	42%	47%(7)	40%(6)
Social groups	5%	0	7%(1)
Mixed ability groups	3%	13%(2)	13%(2)
Varies according to task	35%	33%(5)	40%(6)
Age groups	2%	0	0
Individually	1%	0	0

APPENDIX 3(A)

100 Sample Questionnaire Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

.....

Question 3A:- If asked by a parent why children need to learn to write what would you say?

The numbers indicate the responses given to each global writing objective heading.

.....

100 sample

To communicate ideas and feelings	22
To be able to communicate	28
Community/social communication need	15
Future need	6
A mode of communicating/ language mode	13
Personal need	14
Essential life skill	19
Need in everyday life	13
To make sense of the world	3
nil return	1

.....

Question 4D:- Do the children ever share what they have written with other people?

The numbers indicate the responses given to each heading.

.....

100 sample

No	1
With peers	93
With the teacher	65
With parents	29
Through display	9
Outside school	3
With other classes	1

APPENDIX 3(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

Question 3A:- If asked by a parent why children need to learn to write what would you say? The numbers indicate the responses given to each global writing objective heading.

Table with 3 columns: Objective heading, 100 sample, Research Group 1. Rows include: To communicate ideas and feelings (22, 7), To be able to communicate (28, 7), Community/social communication need (15, 2), Future need (6, 0), A mode of communicating/ language mode (13, 1), Personal need (14, 2), Essential life skill (19, 2), Need in everyday life (13, 1), To make sense of the world (3, 1), nil return (1, 0).

Question 4D:- Do the children ever share what they have written with other people? The numbers indicate the responses given to each heading.

Table with 3 columns: Response, 100 sample, Research Group 1. Rows include: No (1, 0), With peers (93, 15), With the teacher (65, 9), With parents (29, 2), Through display (9, 5), Outside school (3, 0), With other classes (1, 1).

APPENDIX 3(C)

100 Sample Questionnaire and Research Group 1 & 2 Initial Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

Question 3A:- If asked by a parent why children need to learn to write what would you say?

The numbers indicate the responses given to each global writing objective heading.

	100 sample	Research Group 1	Research Group 2
To communicate ideas and feelings	22	7	4
To be able to communicate	28	7	12
Community/social communication need	15	2	5
Future need	6	0	4
A mode of communicating/ language mode	13	1	0
Personal need	14	2	2
Essential life skill	19	2	0
Need in everyday life	13	1	2
To make sense of the world	3	1	0
nil return	1	0	0

.....

Question 4D:- Do the children ever share what they have written with other people?

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1	Research Group 2
No	1	0	0
With peers	93	15	13
With the teacher	65	9	12
With parents	29	2	2
Through display	9	5	2
Outside school	3	0	0
With other classes	1	1	2

APPENDIX 3(D)

Research Group 1 Initial and Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

.....
Initial Interview Question 3A:- If asked by a parent why children need to learn to write what would you say?

Final Interview Question 6:- What do you feel are the main goals you are working towards through your children's writing activities?
The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview	
To communicate ideas and feelings	7	4	
To be able to communicate	7	2	Other answers
Community/social communication need	2	0	referred to
Future need	0	0	skills and
A mode of communicating/ language mode	1	1	qualities which
Personal need	2	1	were reiterated
Essential life skill	2	1	in the answers
Need in everyday life	1	0	to question 7
To make sense of the world	1	0	

.....
Initial Interview Question 4D:- Do the children ever share what they have written with other people?

Final Interview Questions 12 and 14:- Do you feel any aspects of your writing provision have been supported by the use of the microcomputer? Have you changed or added anything to your writing provision since you started using the microcomputer?

The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
With peers	15	8
With the teacher	9	0
With parents	2	4
Through display	5	8
Outside school	0	0
With other classes	1	5

APPENDIX 3(E)

Research Group 2 Initial and Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

.....
 Initial Interview Question 3A:- If asked by a parent why children need to learn to write what would you say?
 Final Interview Question 6:- What do you feel are the main goals you are working towards through your children's writing activities?
 The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview	
To communicate ideas and feelings	4	8	
To be able to communicate	12	3	Other answers
Community/social communication need	5	6	referred to
Future need	4	2	skills and
A mode of communicating/ language mode	0	3	qualities which
Personal need	2	5	were reiterated
Essential life skill	0	0	in the answers
Need in everyday life	2	4	to question 7
To make sense of the world	0	3	

.....
 Initial Interview Question 4D:- Do the children ever share what they have written with other people?
 Final Interview Questions 12 and 14:- Do you feel any aspects of your writing provision have been supported by the use of the microcomputer? Have you changed or added anything to your writing provision since you started using the microcomputer?
 The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
With peers	13	8
With the teacher	12	6
With parents	2	5
Through display	2	10
Outside school	0	0
With other classes	2	7

APPENDIX 3(F)

Research Groups 1 & 2 Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they think they want to achieve.

.....
Initial Interview Question 3A:- If asked by a parent why children need to learn to write what would you say?

Final Interview Question 6:- What do you feel are the main goals you are working towards through your children's writing activities?

The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview	
To communicate ideas and feelings	4	8	
To be able to communicate	2	3	Other answers
Community/social communication need	0	6	referred to
Future need	0	2	skills and
A mode of communicating/ language mode	1	3	qualities which
Personal need	1	5	were reiterated
Essential life skill	1	0	in the answers
Need in everyday life	0	2	to question 7
To make sense of the world	0	0	

.....
Initial Interview Question 4D:- Do the children ever share what they have written with other people?

Final Interview Questions 12 and 14:- Do you feel any aspects of your writing provision have been supported by the use of the microcomputer? Have you changed or added anything to your writing provision since you started using the microcomputer?

The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview
With peers	8	8
With the teacher	0	6
With parents	4	5
Through display	8	10
Outside school	0	0
With other classes	5	7

APPENDIX 4(A)

100 Sample Questionnaire Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Question 3B:-Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

The numbers indicate the responses given to each heading.

.....

100 sample

Writing is structured	69
Good punctuation	13
Good spelling	17
Good handwriting	3
Presentation	19
Imagination	58
Expression	53
Enjoys writing	16
Good range of vocabulary	64
Adapts style	13
Can relate ideas and thoughts	11
Good command of written language	6

Nil returns from 100 sample 3

APPENDIX 4(B)

100 Sample Questionnaire and Group 1 Initial Interview Analysis:--
Teachers' perceptions of the educational purpose of their writing
provision and what they want to achieve.

.....
Question 3B:--Think of a child in your class who you would call a 'good
writer', what are the qualities which you feel typifies this 'good
writer'?

The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1
Writing is structured	69	13
Good punctuation	13	4
Good spelling	17	5
Good handwriting	3	3
Presentation	19	4
Imagination	58	9
Expression	53	7
Enjoys writing	16	2
Good range of vocabulary	64	8
Adapts style	13	4
Can relate ideas and thoughts	11	1
Good command of written language	6	2

Nil returns from 100 sample 3

APPENDIX 4(C)

100 Sample Questionnaire and Group 1 & Group 2 Initial Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

Question 3B:-Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1	Research Group 2
Writing is structured	69	13	12
Good punctuation	13	4	1
Good spelling	17	5	2
Good handwriting	3	3	2
Presentation	19	4	2
Imagination	58	9	10
Expression	53	7	12
Enjoys writing	16	2	3
Good range of vocabulary	64	8	12
Adapts style	13	4	2
Can relate ideas and thoughts	11	1	3
Good command of written language	6	2	3

Nil returns from 100 sample 3

APPENDIX 4(D)

Research Group 1 Initial and Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

Initial Interview Question 3B:- Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

Final Interview Question 7:- What writing skills/qualities would you like the children to achieve in their writing?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Writing is structured	13	11
Good punctuation	4	6
Good spelling	5	6
Good handwriting	3	1
Presentation	4	2
Imagination	9	11
Expression	7	9
Enjoys writing	2	0
Good range of vocabulary	8	10
Adapts style	4	6
Can relate ideas and thoughts	1	3
Good command of written language	2	4

Nil returns from 100 sample 3

APPENDIX 4(E)

Research Group 2 Initial and Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Initial Interview Question 3B:-Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

Final Interview Question 7:- What writing skills/qualities would you like the children to achieve in their writing?

The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
Writing is structured	12	9
Good punctuation	1	0
Good spelling	2	3
Good handwriting	2	0
Presentation	2	2
Imagination	10	11
Expression	12	8
Enjoys writing	3	6
Good range of vocabulary	12	10
Adapts style	2	9
Can relate ideas and thoughts	3	5
Good command of written language	3	7

APPENDIX 4(F)

Research Groups 1 & 2 Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Initial Interview Question 3B:-Think of a child in your class who you would call a 'good writer', what are the qualities which you feel typifies this 'good writer'?

Final Interview Question 7:- What writing skills/qualities would you like the children to achieve in their writing?

The numbers indicate the responses given to each heading.

.....

	Group 1 Interview	Group 2 Interview
Writing is structured	11	9
Good punctuation	6	0
Good spelling	6	3
Good handwriting	1	0
Presentation	2	2
Imagination	11	11
Expression	9	8
Enjoys writing	0	6
Good range of vocabulary	10	12
Adapts style	6	9
Can relate ideas and thoughts	3	5
Good command of written language	4	7

Nil returns from 100 sample 3

APPENDIX 5(A)

100 Sample Questionnaire Analysis: Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Question 3C:- Which qualities do you feel typifies a 'poor writer' in your class?

The numbers indicate the responses given to each heading.

.....

100 sample

Writing lacks structure	74
Poor punctuation/ spelling	13
Poor Grammar	8
Poor co-ordination/ handwriting	8
Poor presentation	17
Unimaginative	38
Lacks expression	37
Poor range of vocabulary	51
Lacks ideas	25
Lacks motivation	50
Cannot relate experiences	34
Lacks language exp. speech, reading etc	15
Lacks writing techniques	2
Poor self image	4

APPENDIX 5(B)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- Teachers' perceptions of the educational purpose of their
writing provision and what they want to achieve.

.....
Question 3C:- Which qualities do you feel typifies a 'poor writer' in
your class?

The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1
Writing lacks structure	74	6
Poor punctuation/ spelling	13	3
Poor Grammar	8	1
Poor co-ordination/ handwriting	8	5
Poor presentation	17	1
Unimaginative	38	4
Lacks expression	37	1
Poor range of vocabulary	51	6
Lacks ideas	25	6
Lacks motivation	50	1
Cannot relate experiences	34	3
Lacks language exp. speech, reading etc	15	2
Lacks writing techniques	2	0
Poor self image	4	1

APPENDIX 5(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis: Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.....
.....

Question 3C: Which qualities do you feel typifies a 'poor writer' in your class?
The numbers indicate the responses given to each heading.
.....

	100 sample	Research Group 1	Research Group 2
Writing lacks structure	74	6	1
Poor punctuation/spelling	13	3	2
Poor Grammar	8	1	0
Poor co-ordination/handwriting	8	5	6
Poor presentation	17	1	0
Unimaginative	38	4	4
Lacks expression	37	1	2
Poor range of vocabulary	51	6	8
Lacks ideas	25	6	0
Lacks motivation	50	1	7
Cannot relate experiences	34	3	3
Lacks language exp. speech, reading etc	15	2	6
Lacks writing techniques	2	0	2
Poor self image	4	1	0

APPENDIX 5(D)

Research Group 1 Initial and Final Interviews Analysis: Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

Question 3C: Which qualities do you feel typifies a 'poor writer' in your class?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Writing lacks structure	6	7
Poor punctuation/spelling	3	5
Poor Grammar	1	0
Poor co-ordination/handwriting	5	7
Poor presentation	1	3
Unimaginative	4	6
Lacks expression	1	5
Poor range of vocabulary	6	8
Lacks ideas	6	5
Lacks motivation	1	3
Cannot relate experiences	3	4
Lacks language exp. speech, reading etc	2	2
Lacks writing techniques	0	2
Poor self image	1	0

APPENDIX 5(E)

Research Group 2 Initial and Final Interviews Analysis: Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

Initial Interview Question 3C: Which qualities do you feel typifies a 'poor writer' in your class?

Final Interview Question 8: What do you think are the difficulties which prevent children achieving the skills/qualities you have mentioned?

The numbers indicate the responses given to each heading.

	Initial Interview	Final interview
Writing lacks structure	1	3
Poor punctuation/spelling	2	1
Poor Grammar	0	0
Poor co-ordination/handwriting	6	2
Poor presentation	0	0
Unimaginative	4	3
Lacks expression	2	5
Poor range of vocabular	8	10
Lacks ideas	0	4
Lacks motivation	7	4
Cannot relate experiences	3	7
Lacks language exp. speech, reading etc	6	8
Lacks writing techniques	2	5
Poor self image	0	0

APPENDIX 5(F)

Research Groups 1 & 2 Final Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Question 3C:.. Which qualities do you feel typifies a 'poor writer' in your class?

The numbers indicate the responses given to each heading.

.....

	Group 1 Interview	Group 2 Interview
Writing lacks structure	7	3
Poor punctuation/ spelling	5	1
Poor Grammar	0	0
Poor co-ordination/ handwriting	7	2
Poor presentation	3	0
Unimaginative	6	3
Lacks expression	5	5
Poor range of vocabulary	8	10
Lacks ideas	5	4
Lacks motivation	3	4
Cannot relate experiences	4	7
Lacks language exp. speech, reading etc	2	8
Lacks writing techniques	2	5
Poor self image	0	0

APPENDIX 6(A)

100 Sample Questionnaire Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Question 5D:- How long ago was the last in-service 'writing' based course you attended?

.....

100 sample

Within last year	23%
Between 1 and 3 years	17%
Between 3 and 6 years	14%
More than 6 years	30%
None	16%

.....

Question 5E:-If you have attended a course where was it held?

.....

100 Sample

None	16%
School	15%
L.E.A.	63%
Nationally	6%

APPENDIX 6(B)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- Teachers' perceptions of the educational purpose of their
writing provision and what they want to achieve.

.....

Question 5D:- How long ago was the last in-service 'writing' based
course you attended?

.....

	100 sample	Research Group 1
Within last year	23%	13%(2)
Between 1 and 3 years	17%	7%(1)
Between 3 and 6 years	14%	0
More than 6 years	30%	33%(5)
None	16%	47%(7)

.....

Question 5E:-If you have attended a course where was it held?

.....

	100 Sample	Research Group 1
None	16%	47%(7)
School	15%	0
L.E.A.	63%	40%(6)
Nationally	6%	7%(1)

APPENDIX 6(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis:- Teachers' perceptions of the educational purpose of their writing provision and what they want to achieve.

.....

Question 5D:- How long ago was the last in-service 'writing' based course you attended?

.....

	100 sample	Research Group 1	Research Group 2
Within last year	23%	13%(2)	7%(1)
Between 1 and 3 years	17%	7%(1)	0
Between 3 and 6 years	14%	0	13%(2)
More than 6 years	30%	33%(5)	47%(7)
None	16%	47%(7)	33%(5)

.....

Question 5E:-If you have attended a course where was it held?

.....

	100 Sample	Research Group 1	Research Group 2
None	16%	47%(7)	33%(5)
School	15%	0	7%(1)
L.E.A.	63%	40%(6)	53%(8)
Nationally	6%	7%(1)	13%(2)

APPENDIX 7(A)

100 Sample Questionnaire Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....
Question 2C:- In a typical week what specific writing tasks are the children given?

The numbers indicate the responses given to each heading.

.....
100 sample

Stories/Creative writing	89
New/Diaries	27
Reporting/Factual writing	29
Formal language	69
Poetry	21
Topic/Project	44
Maths	1
Science	7
Subjects ie history, Geography, RE	8
handwriting	3

.....
Question 2F:- In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities?
The numbers indicate the responses given to each heading.

.....
100 sample

P.E.	5
R.E.	39
Music	16
Drama	39
Literature (stories/Poetry)	81
Art/Craft/Handwork	45
Maths	24
Science	55
Topic/Project/EV Studies	81

APPENDIX 7(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis: The range and content of writing tasks and experiences being provided by teachers.

.....
 Question 2C: In a typical week what specific writing tasks are the children given?

The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1
Stories/Creative writing	89	15
New/Diaries	27	6
Reporting/Factual writing	29	8
Formal language	69	14
Poetry	21	1
Topic/Project	44	6
Maths	1	1
Science	7	2
Subjects ie history, Geography, RE	8	0
handwriting	3	2

.....
 Question 2F:- In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities? The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1
P.E.	5	1
R.E.	39	6
Music	16	1
Drama	39	2
Literature (stories/Poetry)	81	9
Art/Craft/Handwork	45	3
Maths	24	2
Science	55	6
Topic/Project/EV Studies	81	14

APPENDIX 7(C)

100 Sample Questionnaire and Research Group 1 & Group 2 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....
 Question 2C:- In a typical week what specific writing tasks are the children given?

The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1	Research Group 2
Stories/Creative writing	89	15	15
New/Diaries	27	6	11
Reporting/Factual writing	29	8	5
Formal language	69	14	15
Poetry	21	1	3
Topic/Project	44	6	8
Maths	1	1	1
Science	7	2	0
Subjects ie history, Geography, RE	8	0	0
handwriting	3	2	0

.....
 Question 2F:- In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities?
 The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1	Research Group 2
P.E.	5	1	1
R.E.	39	6	3
Music	16	1	1
Drama	39	2	5
Literature (stories/Poetry)	81	9	14
Art/Craft/Handwork	45	3	4
Maths	24	2	0
Science	55	6	3
Topic/Project/ EV Studies	81	14	15

APPENDIX 7(D)

Research Group 1 Initial and Final Interview Analysis:· The range and content of writing tasks and experiences being provided by teachers.

Initial Interview Question 2C:· In a typical week what specific writing tasks are the children given?

Final Interview Question 3:· What kind of writing activities do your children do regularly?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Stories/Creative writing	15	15
New/Diaries	6	5
Reporting/Factual writing	8	10
Formal language	14	15
Poetry	1	3
Topic/Project	6	10
Maths	1	0
Science	2	1
Subjects ie history, Geography, RE	0	2
handwriting	2	3

Initial Interview Question 2F:- In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities?

Final Interview Questions 15 & 16:- What specific fictional writing have your children done during this last term? What specific factual writing have your children done during this last term?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
P.E.	1	0
R.E.	6	2
Music	1	2
Drama	2	4
Literature (stories/Poetry)	9	15
Art/Craft/Handwork	3	2
Maths	2	4
Science	6	5
Topic/Project/ EV Studies	14	15

APPENDIX 7(E)

Research Group 2 Initial and Final Interview Analysis:·

.....
Initial Interview Question 2C:· In a typical week what specific writing tasks are the children given?

Final Interview Question 3:· What kind of writing activities do your children do regularly?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Stories/Creative writing	15	15
New/Diaries	11	8
Reporting/Factual writing	5	6
Formal language	15	10
Poetry	3	4
Topic/Project	8	11
Maths	1	0
Science	0	1
Subjects ie History, Geography, RE	0	0
handwriting	0	0

.....
Initial Interview Question 2F:· In your everyday teaching activities are there curriculum areas which you feel you quite regularly link to writing activities?

Final Interview Questions 15 & 16:- What specific fictional writing have your children done during this last term? What specific factual writing have your children done during this last term?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
P.E.	1	0
R.E.	3	2
Music	1	3
Drama	5	6
Literature (stories/poetry)	14	15
Art/Craft/Handwork	4	7
Maths	0	0
Science	3	1
Topic/Project/EV Studies	15	15
C.D.T.	0	4

APPENDIX 7(F)

Research Groups 1 & 2 Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by teachers.

Final Interview Question 3:- What kind of writing activities do your children do regularly?

The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview
Stories/Creative writing	15	15
New/Diaries	5	8
Reporting/Factual writing	10	6
Formal language	15	10
Poetry	3	4
Topic/Project	10	11
Maths	0	0
Science	1	1
Subjects ie history, Geography, RE	2	0
handwriting	3	0

Final Interview Questions 15 & 16:- What specific fictional writing have your children done during this last term? What specific factual writing have your children done during this last term?

The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview
P.E.	0	0
R.E.	2	2
Music	2	3
Drama	4	6
Literature (stories/Poetry)	15	15
Art/Craft/Handwork	2	7
Maths	4	0
Science	5	1
Topic/Project/ EV Studies	15	15
C.D.T.	0	4

APPENDIX 8(A)

100 Sample Questionnaire Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Question 4C:- Do the children plan their writing tasks?

.....

100 sample

Regularly/verbally	18%
Regularly/written	24%
Always/verbally	4%
Always/written	4%
Sometimes/verbally	25%
Sometimes/written	22%
Never	3%

.....

Question 4E:- What sort of written work is displayed in your classroom at this moment?

The numbers indicate the responses given to each heading.

.....

100 sample

None	7
Topic/project	75
Poetry	58
Class books	24
Handwriting	23
Stories	69
R.E.	9
Science	3
Number	4

Nil Returns from 100 sample 2

APPENDIX 8(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Question 4C:- Do the children plan their writing tasks?

.....

	100 sample	Research Group 1
Regularly/verbally	18%	27%(4)
Regularly/written	24%	20%(3)
Always/verbally	4%	0
Always/written	4%	7%(1)
Sometimes/verbally	25%	29%(3)
Sometimes/written	22%	27%(4)
Never	3%	0

.....

Question 4E;- What sort of written work is displayed in your classroom at this moment?

The numbers indicate the responses given to each heading.

.....

	100 sample	Research Group 1
None	7	2
Topic/project	75	8
Poetry	58	4
Class books	24	5
Handwriting	23	0
Stories	69	7
R.E.	9	1
Science	3	1
Number	4	0

Nil Returns from 100 sample 2

APPENDIX 8(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

Question 4C:- Do the children plan their writing tasks?

	100 sample	Research Group 1	Research Group 2
Regularly/verbally	18%	27%(4)	13%(2)
Regularly/written	24%	20%(3)	20%(3)
Always/verbally	4%	0	0
Always/written	4%	7%(1)	0
Sometimes/verbally	25%	29%(3)	33%(5)
Sometimes/written	22%	27%(4)	27%(4)
Never	3%	0	7%(1)

Question 4E:- What sort of written work is displayed in your classroom at this moment?

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1	Research Group 2
None	7	2	3
Topic/project	75	8	6
Poetry	58	4	6
Class books	24	5	1
Handwriting	23	0	0
Stories	69	7	2
R.E.	9	1	0
Science	3	1	0
Number	4	0	1

Nil Returns from 100 sample 2

APPENDIX 8(D)

Research Group 1 Initial and Final Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Initial Interview Question 4C:- Do the children plan their writing tasks?

Final Interview Question 20:- Do the children plan their writing tasks?

.....

	Initial Interview	Final Interview
Regularly/verbally	27%(4)	40%(6)
Regularly/written	20%(3)	27%(4)
Always/verbally	0	0
Always/written	7%(1)	7%(1)
Sometimes/verbally	20%(3)	13%(2)
Sometimes/written	27%(4)	13%(2)
Never	0	0

.....

Initial Interview Question 4E;- What sort of written work is displayed in your classroom at this moment?

Final Interview Questions 12, 14, 22 which referred to display work. The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
None	2	0
Topic/project	8	13
Poetry	4	1
Class books	5	3
Handwriting	0	0
Stories	7	11
R.E.	1	0
Science	1	3
Number	0	0

APPENDIX 8(E)

Research Group 2 Initial and Final Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....
Initial Interview Question 4C:- Do the children plan their writing tasks?

Final Interview Question 20:- Do the children plan their writing tasks?

.....

	Initial Interview	Final Interview
Regularly/verbally	13%(2)	40%(6)
Regularly/written	20%(3)	20%(3)
Always/verbally	0	33%(5)
Always/written	0	7%(1)
Sometimes/verbally	33%(5)	0
Sometimes/written	27%(4)	0
Never	7%(1)	0

.....
Initial Interview Question 4E:- What sort of written work is displayed in your classroom at this moment?

Final Interview Questions 12, 14, 22 which referred to display work. The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
None	3	0
Topic/project	6	10
Poetry	6	2
Class books	1	2
Handwriting	0	0
Stories	2	1
R.E.	0	0
Science	0	1
Number	1	0
Group work	0	6

APPENDIX 8(F)

Research Groups 1 & 2 Final Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Final Interview Question 20: Do the children plan their writing tasks?

.....

	Group 1 Interview	Group 2 Interview
Regularly/verbally	40%(6)	40%(6)
Regularly/written	27%(4)	20%(3)
Always/verbally	0	33%(5)
Always/written	7%(1)	7%(1)
Sometimes/verbally	13%(2)	0
Sometimes/written	13%(2)	0
Never	0	0

.....

Final Interview Questions 12, 14, 22 which referred to display work. The numbers indicate the responses given to each heading.

.....

	Group 1 Interview	Group 2 Interview
None	0	0
Topic/project	13	10
Poetry	1	2
Class books	3	2
Handwriting	0	0
Stories	11	1
R.E.	0	0
Science	3	1
Number	0	0
Group work	3	6

APPENDIX 9(A)

100 Sample Questionnaire Analysis:.. The range and content of writing tasks and experiences being provided by teachers.

.....

Question 5A:.. Do you make provision for children of differing abilities? If YES please give brief details.
Answers YES and NO shown and numbers indicate responses given to each heading.

.....

100 sample

No provision made	9%
Yes	87%

.....

Ref. to low ability only	75
Ref. to low and high ability	12
Modification of tasks	26
Extra teacher assistance	43
Special tasks/	21
Use of resources	12
Monitoring	1
Individual work	26

Nil returns on 100 sample 4

APPENDIX 9(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Question 5A:- Do you make provision for children of differing abilities? If YES please give brief details. Answers YES and NO shown and numbers indicate responses given to each heading.

.....

	100 sample	Research Group 1
No provision made	9%	7%(1)
Yes	87%	93%(14)

.....

Ref. to low ability only	75	12
Ref. to low and high ability	12	2
Modification of tasks	26	8
Extra teacher assistance	43	9
Special tasks	21	7
Use of resources	12	3
Monitoring	1	0
Individual work	26	2

Nil returns on 100 sample 4

APPENDIX 9(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interviews Analysis:- The range and content of writing tasks and experiences being provided by teachers.

Question 5A:- Do you make provision for children of differing abilities? If YES please give brief details. Answers YES and NO shown and numbers indicate responses given to each heading.

	100 sample	Research Group 1	Research Group 2
No provision made	9%	7%(1)	13%(2)
Yes	87%	93%(14)	86%(13)

Ref. to low ability only	75	12	10
Ref. to low and high ability	12	2	3
Modification of tasks	26	8	11
Extra teacher assistance	43	9	11
Special tasks	21	7	3
Use of resources	12	3	5
Monitoring	1	0	0
Individual work	26	2	3

Nil returns on 100 sample 4

APPENDIX 9(D)

Group 1 Initial and Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by teachers.

Initial Interview Question 5A:- Do you make provision for children of differing abilities? If YES please give brief details.

Final Interview Question 13:- Have you used the microcomputer with all the children in your class? Do you feel it benefits some children more than others?

The numbers indicate responses given to each heading. N/A indicates that these headings were not introduced in the final interviews.

	Initial Interview	Final Interview
Provision made for differing abilities	14	15
Micro used with all children	-	15
Teachers who feel particular children benefit	..	8
Ref. to low ability only	12	5
Ref. to high ability only	0	1
Ref. to low and high ability	2	2
Modification of tasks	8	N/A
Extra teacher assistance	9	N/A
Special tasks	7	N/A
Use of resources/ micro as resource	3	N/A
Monitoring	0	N/A
Individual work	2	N/A

APPENDIX 9(E)

Group 2 Initial and Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Initial Interview Question 5A:- Do you make provision for children of differing abilities? If YES please give brief details.

Final Interview Question 13:- Have you used the microcomputer with all the children in your class? Do you feel it benefits some children more than others?

The numbers indicate responses given to each heading. N/A indicates that these headings were not introduced in the final interviews.

.....

	Initial Interview	Final Interview
Provision made for differing abilities	13	15
Micro used with all children	-	15
Teachers who feel particular children benefit	-	13
.....		
Ref. to low ability only	10	5
Ref. to high ability only	1	2
Ref. to low and high ability	3	6
Modification of tasks	11	N/A
Extra teacher assistance	11	N/A
Special tasks	3	N/A
Use of resources/ micro as resource	5	N/A
Monitoring	0	N/A
Individual work	3	N/A

APPENDIX 9(F)

Research Groups 1 & 2 Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by teachers.

.....

Final Interview Question 13:- Have you used the microcomputer with all the children in your class? Do you feel it benefits some children more than others? The numbers indicate responses given to each heading.

.....

	Group 1 Interview	Group 2 Interview
Micro used with all children	15	15
Teachers who feel particular children benefit	8	13
.....		
Ref. to low ability only	5	5
Ref. to high ability only	1	2
Ref. to low and high ability	2	6

APPENDIX 10(A)

100 Sample Questionnaire Analysis:- The range and content of writing tasks and experiences being provided by the teacher.

.....

Question 4G:- How much of the time spent writing activities is devoted to fictional writing aspects?

.....

100 sample

0-25%	23%
25-40%	31%
40-55%	53%
55-70%	2%
over 70%	1%

.....

Question 4H:- What sort of writing activities are done in the rest of the time?

The numbers indicate the responses given to each heading.

.....

100 sample

News/reports	17
Topic/project work	55
Science	11
Letter writing	4
Formal Language work	52
Book reviews	27
Handwriting	6
R.E.	4

Nil returns on 100 sample 4

APPENDIX 10(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by the teacher

Question 4G:- How much of the time spent writing activities is devoted to fictional writing aspects?

	100 sample	Research Group 1
0-25%	23%	33%(5)
25-40%	31%	27%(4)
40-55%	53%	33%(5)
55-70%	2%	0
over 70%	1%	7%(1)

Question 4H:- What sort of writing activities are done in the rest of the time? The numbers indicate the responses given to each heading.

	100 sample	Research Group 1
News/reports	17	13
Topic/project work	55	14
Science	11	5
Letter writing	4	1
Formal Language work	52	11
Book reviews	27	1
Handwriting	6	2
R.E.	4	2

Nil returns on 100 sample 4

APPENDIX 10(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis:- The range and content of writing tasks and experiences being provided by the teacher.

Question 4G:- How much of the time spent writing activities is devoted to fictional writing aspects?

	100 sample	Research Group 1	Research Group 2
0-25%	23%	33%(5)	7%(1)
25-40%	31%	27%(4)	27%(4)
40-55%	53%	33%(5)	53%(8)
55-70%	2%	0	13%(2)
over 70%	1%	7%(1)	0

Question 4H:- What sort of writing activities are done in the rest of the time?

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1	Research Group 2
News/reports	17	13	4
Topic/project work	55	14	14
Science	11	5	3
Letter writing	4	1	1
Formal Language work	52	11	15
Book reviews	27	1	0
Handwriting	6	2	8
R.E.	4	2	0

Nil returns on 100 sample 4

APPENDIX 10(D)

Research Group 1 Initial and Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by the teacher.

.....

Initial Interview Question 2C: In a typical week what specific writing tasks are the children given?

Final Interview Question 15: What specific fictional writing have your children done during this last term? Did you use the microcomputer to support this work?

Question 16: What specific factual writing have your children done during this last term? Did you use the microcomputer to support this work?

The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview	Micro supported
Stories/Creative	15	15	3
News/diaries	6	5	0
Reporting/factual writing	8	10	6
Formal language	14	15	8
Poetry	1	3	4
Topic/Project	6	15	4
Maths	1	4	0
Science	2	5	0
Subjects ie. History Geography, RE	0	2	1
Handwriting	2	3	0
Drama	0	4	0
Music	0	2	0

APPENDIX 10(E)

Research Group 2 Initial and Final Interviews Analysis: The range and content of writing tasks and experiences being provided by the teacher.

.....

Initial Interview Question 2C:- In a typical week what specific writing tasks are the children given?

Final Interview Question 15:- What specific fictional writing have your children done during this last term? Did you use the microcomputer to support this work?

Question 16:- What specific factual writing have your children done during this last term? Did you use the microcomputer to support this work?

The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview	Micro supported
Stories/Creative	15	15	9
News/diaries	11	8	3
Reporting/factual writing	5	6	4
Formal language	15	10	5
Poetry	3	4	3
Topic/Project	8	15	6
Maths	1	0	0
Science	2	1	1
Subjects ie. History Geography, RE	0	1	1
Handwriting	0	0	0
Drama	0	0	0
Music	0	6	3
CDT	0	4	4

APPENDIX 10(F)

Research Groups 1 & 2 Final Interviews Analysis:- The range and content of writing tasks and experiences being provided by the teacher.

.....

Final Interview Question 15:- What specific fictional writing have your children done during this last term? Did you use the microcomputer to support this work?

Question 16:- What specific factual writing have your children done during this last term? Did you use the microcomputer to support this work?

The numbers indicate the responses given to each heading.

.....

	Group 1 Interview	Micro supported	Group 2 Interview	Micro supported
Stories/Creative	15	3	15	9
News/diaries	5	0	8	3
Reporting/factual writing	10	6	6	4
Formal language	15	8	10	5
Poetry	3	4	4	3
Topic/Project	15	4	15	6
Maths	4	0	0	0
Science	5	0	1	1
Subjects ie. History Geography, RE	2	1	1	1
Handwriting	3	0	0	0
Drama	4	0	0	0
Music	2	0	6	3
CDT	0	0	4	4

APPENDIX 11(A)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- Teachers' organisation of writing activities, the use of
resources and how activities are monitored and developed
.....

Question 2B:- How are your children organised when they are involved
in writing tasks?
.....

100 sample

Class	6%
Ability groups	17%
Social groups	4%
Mixed ability groups	0
Varies according	62%
Individual	11%

.....
Question 2A:- In a typical week how many hours will the children be
involved in writing activities?
.....

100 sample

0-5 hours	23%
6-10 hours	50%
11-15 hours	20%
16-20 hours	5%
21-25 hours	2%

APPENDIX 11(B)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- Teachers' organisation of writing activities, the use of
resources and how activities are monitored and developed.

.....
Question 2B:- How are your children organised when they are involved
in writing tasks?
.....

	100 sample	Research Group 1
Class	6%	0
Ability groups	17%	13%(2)
Social groups	4%	0
Mixed ability groups	0	0
Varies according	62%	73%(11)
Individual	11%	13%(2)

.....
Question 2A:- In a typical week how many hours will the children be
involved in writing activities?
.....

	100 sample	Research Group 1
0-5 hours	23%	13%(2)
6-10 hours	50%	61%(9)
11-15 hours	20%	20%(3)
16-20 hours	5%	7%(1)
21-25 hours	2%	0

APPENDIX 11(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interviews Analysis: Teachers' organisation of writing activities, the use of resources and how activities are monitored and developed.

Question 2B:- How are your children organised when they are involved in writing tasks?

	100 sample	Research Group 1	Research Group 2
Class	6%	0	13%(2)
Ability groups	17%	13%(2)	20%(3)
Social groups	4%	0	0
Mixed ability groups	0	0	0
Varies according	62%	73%(11)	61%(9)
Individual	11%	13%(2)	7%(1)

Question 2A:- In a typical week how many hours will the children be involved in writing activities?

	100 sample	Research Group 1	Research Group 2
0-5 hours	23%	13%(2)	7%(1)
6-10 hours	50%	61%(9)	73%(11)
11-15 hours	20%	20%(3)	7%(1)
16-20 hours	5%	7%(1)	13%(2)
21-25 hours	2%	0	0

APPENDIX 11(D)

Research Group 1 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources and how activities are monitored and developed.

Initial Interview Question 2B:- How are your children organised when they are involved in writing tasks?

Final Interview Question 2:- How are your children organised for writing activities? The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Class	0	0
Ability groups	2	3
Social groups	0	0
Mixed ability groups	0	0
Varies according to task	11	10
Individual	2	2

Initial Interview Question 4A:- When your children are engaged in writing activities is this generally, on an individual basis, or as a member of a group, or as an individual doing a class task?

Final Interview Question 17:- When your children are involved in writing activities using the microcomputer are they organised as individuals/groups/or as a class?

	Initial Interview	Final Interview
Individual	1	2
Group	0	5
Varies according to task	4	6
Individual doing a class task	4	2
Individual doing a group task	6	0

APPENDIX 11(E)

Research Group 2 Initial and Final Interviews Analysis: Teachers' organisation of writing activities, the use of resources and how activities are monitored and developed.

Initial Interview Question 2B: How are your children organised when they are involved in writing tasks?

Final Interview Question 2: How are your children organised for writing activities? The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
Class	2	0
Ability groups	3	2
Social groups	0	0
Mixed ability groups	0	0
Varies according	9	12
Individual	1	1

Initial Interview Question 4A:- When your children are engaged in writing activities is this generally, on an individual basis, or as a member of a group, or as an individual doing a class task?

Final Interview Question 17:- When your children are involved in writing activities using the microcomputer are they organised as individuals/groups/or as a class?

	Initial Interview	Final Interview
Individual	1	1
Group	0	7
Varies according to task	11	6
Individual doing a class task	3	0
Individual doing a group task	0	1

APPENDIX 11(F)

Research Groups 1 & 2 Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources and how activities are monitored and developed.

Final Interview Question 2:- How are your children organised for writing activities? The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview
Class	0	0
Ability groups	3	2
Social groups	0	0
Mixed ability groups	0	0
Varies according	10	12
Individual	2	1

Final Interview Question 17:- When your children are involved in writing activities using the microcomputer are they organised as individuals/groups/or as a class?

	Group 1 Interview	Group 2 Interview
Individual	2	1
Group	5	7
Varies according to task	6	6
Individual doing a class task	2	0
Individual doing a group task	0	1

APPENDIX 12(A)

100 Sample Questionnaire Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....
Question 2D:- Can you describe how you generally introduce writing tasks.

The numbers indicate the responses given to each heading.

100 sample

2nd hand exp.	48
eg.books,stories,TV	
1st hand exp.	24
eg.visits,objects	
Group discussion	7
Class discussion	63
Teacher initiated tasks	45
Vocabulary support	16
Children's initiatives	18

.....
Question 2E:-Are there any resources which you often use in supporting writing activities?

The numbers indicate responses given to each heading.

100 sample

Pictures	67
Craftwork	32
Computer	41
Music (records,tapes)	33
Stories	70
T.V.,radio,films	61
Text books	43
Visits etc	15
Objects	10
Blackboard/workcards	19

APPENDIX 12(B)

100 Sample Questionnaire and Group 1 Initial Interview Analysis:
 Teachers' organisation of writing activities, the use of resources,
 and how activities are monitored and developed.

.....
 Question 2D:- Can you describe how you generally introduce writing
 tasks.

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1
2nd hand exp. eg. books, stories, TV	48	11
1st hand exp. eg. visits, objects	24	6
Group discussion	7	1
Class discussion	63	11
Teacher initiated tasks	45	10
Vocabulary support	16	2
Children's initiatives	18	3

.....
 Question 2E:- Are there any resources which you often use in supporting
 writing activities?

The numbers indicate responses given to each heading.

	100 sample	Research Group 1
Pictures	67	8
Craftwork	32	0
Computer	41	3
Music (records, tapes)	33	1
Stories	70	5
T.V., radio, films	61	9
Text books	43	8
Visits etc	15	3
Objects	10	3
Blackboard/workcards	19	3

APPENDIX 12(C)

100 Sample Questionnaire and Groups 1 & 2 Initial Interview Analysis: Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....
Question 2D: Can you describe how you generally introduce writing tasks.

The numbers indicate the responses given to each heading.

	100 sample	Research Group 1	Research Group 2
2nd hand exp. eg. books, stories, TV	48	11	7
1st hand exp. eg. visits, objects	24	6	3
Group discussion	7	1	2
Class discussion	63	11	14
Teacher initiated tasks	45	10	9
Vocabulary support	16	2	2
Children's initiatives	18	3	4

.....
Question 2E: Are there any resources which you often use in supporting writing activities?

The numbers indicate responses given to each heading.

	100 sample	Research Group 1	Research Group 2
Pictures	67	8	9
Craftwork	32	0	3
Computer	41	3	6
Music (records, tapes)	33	1	2
Stories	70	5	10
T.V., radio, films	61	9	3
Text books	43	8	7
Visits etc	15	3	2
Objects	10	3	1
Blackboard/workcards	19	3	9

APPENDIX 12(D)

Research Group 1 Initial and Final Interview Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Initial Interview Question 2D:- Can you describe how you generally introduce writing tasks.

Final Interview Question 5:- How do you initiate writing activities/ how do the children become involved in writing activities?

The numbers indicate the responses given to each heading.

	Initial Interview	Final Interview
2nd hand exp. eg.books,stories,TV	11	13
1st hand exp. eg.visits,objects	6	5
Group discussion	1	5
Class discussion	11	10
Teacher initiated tasks	10	12
Vocabulary support	2	4
Children's initiatives	3	3

Initial Interview Question 2E:-Are there any resources which you often use in supporting writing activities?

Final Interview Question 4:- Are there any resources which you regularly use to support writing activities?

The numbers indicate responses given to each heading.

	Initial Interview	Final Interview
Pictures	8	5
Craftwork	0	2
Computer	3	11
Music (records,tapes)	1	0
Stories	5	7
T.V.,radio,films	9	7
Text books	8	9
Visits etc	3	4
Objects	3	4
Blackboard/workcards	3	5

APPENDIX 12(E)

Research Group 2 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....
Initial Interview Question 2D:- Can you describe how you generally introduce writing tasks.

Final Interview Question 5:- How do you initiate writing activities/ how do the children become involved in writing activities?

The numbers indicate the responses given to each heading.

.....

	Initial Interview	Final Interview
2nd hand exp. eg.books,stories,TV	7	10
1st hand exp. eg.visits,objects	3	9
Group discussion	2	5
Class discussion	14	3
Teacher initiated tasks	9	7
Vocabulary support	2	5
Children's initiatives	4	7

.....
Initial Interview Question 2E:-Are there any resources which you often use in supporting writing activities?

Final Interview Question 4:- Are there any resources which you regularly use to support writing activities?

The numbers indicate responses given to each heading.

.....

	Initial Interview	Final Interview
Pictures	9	6
Craftwork	3	5
Computer	6	9
Music (records,tapes)	2	4
Stories	10	7
T.V.,radio,films	3	2
Text books	7	5
Visits etc	2	7
Objects	1	5
Blackboard/workcards	9	4

APPENDIX 12(F)

Research Groups 1 & 2 Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Final Interview Question 5:- How do you initiate writing activities/ how do the children become involved in writing activities?
The numbers indicate the responses given to each heading.

	Group 1 Interview	Group 2 Interview
2nd hand exp. eg.books,stories,TV	13	10
1st hand exp. eg.visits,objects	5	9
Group discussion	5	5
Class discussion	10	3
Teacher initiated tasks	12	7
Vocabulary support	4	5
Children's initiatives	3	7

Final Interview Question 4:- Are there any resources which you regularly use to support writing activities?
The numbers indicate responses given to each heading.

	Group 1 Interview	Group 2 Interview
Pictures	5	6
Craftwork	2	5
Computer	11	9
Music (records,tapes)	0	4
Stories	7	7
T.V.,radio,films	7	2
Text books	9	5
Visits etc	4	7
Objects	4	5
Blackboard/workcards	5	4

APPENDIX 13(A)

100 Sample Questionnaire Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Question 4A:- When your children are engaged in writing activities, is this generally on an individual basis, or as a member of a group, or as an individual doing a class or group task?

100 sample

Individual	3%
group	1%
depends on task	66%
individual doing class task	19%
individual doing group task	11%

Question 4B:- Do your children take part in collaborative writing activities? If the answer is YES what sort of activities do they do?

100 sample

Yes	59%
No	41%

The numbers indicate responses given to each heading.

Reports	46
Plays	11
Stories	30
Magazines	16
Computer work	8
Poems	26
Project/Topic work	19

APPENDIX 13(B)

100 Sample Questionnaire and Group 1 Initial Interview Analysis:
Teachers' organisation of writing activities, the use of resources,
and how activities are monitored and developed.

Question 4A: When your children are engaged in writing activities, is
this generally on an individual basis, or as a member of a group, or
as an individual doing a class or group task?

	100 sample	Research Group 1
Individual	3%	13%(2)
group	1%	0
depends on task	66%	27%(4)
individual doing class task	19%	27%(4)
individual doing group task	11%	33%(5)

Question 4B:- Do your children take part in collaborative writing
activities? If the answer is YES what sort of activities do they do?

	100 sample	Research Group 1
Yes	59%	67%(10)
No	41%	33%(5)

The numbers indicate responses given to each heading.

Reports	46	6
Plays	11	1
Stories	30	3
Magazines	16	1
Computer work	8	1
Poems	26	1
Project/Topic work	19	5

APPENDIX 13(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Question 4A:- When your children are engaged in writing activities, is this generally on an individual basis, or as a member of a group, or as an individual doing a class or group task?

	100 sample	Research Group 1	Research Group 2
Individual	3%	13%(2)	7%(1)
group	1%	0	0
depends on task	66%	27%(4)	73%(11)
individual doing class task	19%	27%(4)	20%(3)
individual doing group task	11%	33%(5)	0

Question 4B:- Do your children take part in collaborative writing activities? If the answer is YES what sort of activities do they do?

	100 sample	Research Group 1	Research Group 2
Yes	59%	67%(10)	47%(7)
No	41%	33%(5)	53%(8)

The numbers indicate responses given to each heading.

	100 sample	Research Group 1	Research Group 2
Reports	46	6	4
Plays	11	1	2
Stories	30	3	2
Magazines	16	1	1
Computer work	8	1	4
Poems	26	1	2
Project/Topic work	19	5	1

APPENDIX 13(D)

Research Group 1 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Initial Interview Question 4B:- Do your children take part in collaborative writing activities? If the answer is YES what sort of activities do they do?

Final Interview Question 18:- What do you find is the best way of organising the use of the microcomputer? Why?

Initial Interview

Yes 10

No 5

The numbers indicate responses given to the headings.

Reports 6

Plays 1

Stories 3

Magazines 1

Computer work 1

Poems 1

Project/Topic work 5

Final Interview

Individual use 2 (Helps remedial and special needs)

Group work 6 (Supports collaborative work)

Class (for introducing work) 3 (All 3 teachers then said they usually had groups)

Varies according to task 6

APPENDIX 13(E)

Research Group 2 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....

Initial Interview Question 4B:- Do your children take part in collaborative writing activities? If the answer is YES what sort of activities do they do?

Final Interview Question 18:- What do you find is the best way of organising the use of the microcomputer? Why?

.....

Initial Interview

Yes 7

No 8

.....

The numbers indicate responses given to the headings.

Reports 4

Plays 2

Stories 2

Magazines 1

Computer work 4

Poems 2

Project/Topic work 1

Final Interview

Individual use 4 (Helps remedial and special needs)

Group work 9 (Supports collaborative work)

Class 0

Varies according to task 8

APPENDIX 13(F)

Research Groups 1 & 2 Initial and Final Interviews Analysis:-
 Teachers' organisation of writing activities, the use of resources,
 and how activities are monitored and developed.

Initial Interview Question 4B:- Do your children take part in
 collaborative writing activities? If the answer is YES what sort of
 activities do they do?

Final Interview Question 18:- What do you find is the best way of
 organising the use of the microcomputer? Why?

	Initial Interview Group 1	Initial Interview Group 2
--	------------------------------	------------------------------

Yes	10	7
-----	----	---

No	5	8
----	---	---

.....
 The numbers indicate responses given to the headings.

Reports	6	4
---------	---	---

Plays	1	2
-------	---	---

Stories	3	2
---------	---	---

Magazines	1	1
-----------	---	---

Computer work	1	4
---------------	---	---

Poems	1	2
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Project/Topic work	5	1
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Final Interviews

Individual use (Helps remedial and special needs)	2	4
--	---	---

Group work (Supports collaborative work)	6	9
---	---	---

Class	3	0
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Varies according to task	6	8
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APPENDIX 14(A)

100 Sample Questionnaire Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Question 5C:- How do you respond to children's writing?
The numbers indicate responses given to each heading.

100 sample

Discussion	68
Written comments	79
Verbal comments	71
Marking	63
Grades	5
Display	75
Read to others	28

Question 4F:- Do your children review, edit, and re-write their written work?

100 sample

Never	5%
Always	11%
Occasionally	42%
Quite often	34%
Rarely	9%

APPENDIX 14(B)

100 Sample Questionnaire and Research Group 1 Initial Interview Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Question 5C:- How do you respond to children's writing? The numbers indicate responses given to the headings.

	100 sample	Research Group 1
Discussion	68	10
Written comments	79	8
Verbal comments	71	10
Marking	63	10
Grades	5	0
Display	75	7
Read to others	28	8

Question 4F:- Do your children review, edit, and re-write their written work?

	100 sample	Research Group 1
Never	5%	7%(1)
Always	11%	0
Occasionally	42%	40%(6)
Quite often	34%	20%(3)
Rarely	9%	33%(5)

APPENDIX 14(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interview Analysis: Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Question 5C: How do you respond to children's writing?
The numbers indicate responses given to each heading.

	100 sample	Research Group 1	Research Group 2
Discussion	68	10	5
Written comments	79	8	4
Verbal comments	71	10	5
Marking	63	10	14
Grades	5	0	0
Display	75	7	1
Read to others	28	8	2

Question 4F:- Do your children review, edit, and re-write their written work?

	100 sample	Research Group 1	Research Group 2
Never	5%	7%(1)	20%(3)
Always	11%	0	7%(1)
Occasionally	42%	40%(6)	20%(2)
Quite often	34%	20%(3)	27%(4)
Rarely	9%	33%(5)	33%(5)

APPENDIX 15(A)

100 Sample Questionnaire Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....

Question 5B:- How do you monitor children's progress?
The numbers indicate responses given to each heading.

.....

100 sample

Discussion	51
Observation	73
Marking	80
Tests	43
Individual records	48
Work sampling	24
Own knowledge	0
Comparisons	0
No monitoring	0

APPENDIX 15(B)

100 Sample Questionnaire and Research Group 1 Initial Interview
Analysis:- Teachers' organisation of writing activities, the use of
resources, and how activities are monitored and developed.
.....

Question 5B: How do you monitor children's progress?
The numbers indicate responses given to each heading.
.....

	100 sample	Research Group 1
Discussion	51	5
Observation	73	2
Marking	80	9
Tests	43	0
Individual records	48	3
Work sampling	24	2
Own knowledge	0	2
Comparisons	0	1
No monitoring	0	1

APPENDIX 15(C)

100 Sample Questionnaire and Research Groups 1 & 2 Initial Interviews
Analysis:- Teachers' organisation of writing activities, the use of
resources, and how activities are monitored and developed.

.....
Question 5B:- How do you monitor children's progress?
The numbers indicate responses given to each heading.

.....

	100 sample	Research Group 1	Research Group 2
Discussion	51	5	7
Observation	73	2	3
Marking	80	9	10
Tests	43	0	0
Individual records	48	3	6
Work sampling	24	2	2
Own knowledge	0	2	0
Comparisons	0	1	0
No monitoring	0	1	0

APPENDIX 15(D)

Research Group 1 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

.....

Initial Interview Question 5B:- How do you monitor children's progress?

Final Interview Question 19:- When the children are writing what sort of things do you do? What is the nature of your involvement with the children as they are writing?

The numbers indicate responses given to each heading.

.....

	Initial Interview	Final Interview
Discussion	5	7
Observation	2	3
Marking	9	4
Tests	0	0
Individual records	3	0
Work sampling	2	0
Own knowledge	2	0
Comparisons	1	0
No Monitoring done	1	0
Encourage and support	0	7
Help with difficulties	0	5
Work with children	0	2

.....

Question 4F:- Do your children review, edit, and re-write their written work?

.....

	Initial Interview	Final Interview
Never	1	0
Always	0	0
Occasionally	6	8 (with micro)
Quite often	3	3
Rarely	5	4

APPENDIX 15(E)

Research Group 2 Initial and Final Interviews Analysis:- Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Initial Interview Question 5B:- How do you monitor children's progress?

Final Interview Question 19:- When the children are writing what sort of things do you do? What is the nature of your involvement with the children as they are writing?

The numbers indicate responses given to each heading.

	Initial Interview	Final Interview
Discussion	7	8
Observation	3	7
Marking	10	2
Tests	0	0
Individual records	6	0
Work sampling	2	0
Own knowledge	0	2
Comparisons	0	0
No Monitoring done	0	0
Encourage and support	0	8
Help with difficulties	0	6
Work with children	0	6

Question 4F:- Do your children review, edit, and re-write their written work?

	Initial Interview	Final Interview
Never	3	0
Always	1	2
Occasionally	2	5 (with micro)
Quite often	4	5
Rarely	5	0

APPENDIX 15(F)

Research Groups 1 & 2 Initial and Final Interview Analysis: Teachers' organisation of writing activities, the use of resources, and how activities are monitored and developed.

Initial Interview Question 5B: How do you monitor children's progress?

Final Interview Question 19: When the children are writing what sort of things do you do? What is the nature of your involvement with the children as they are writing?

The numbers indicate responses given to each heading.

	Group 1 Interview	Group 2 Interview
Discussion	7	8
Observation	3	7
Marking	4	2
Tests	0	0
Individual records	0	0
Work sampling	0	0
Own knowledge	0	2
Comparisons	0	0
No Monitoring done	0	0
Encourage and support	7	8
Help with difficulties	5	6
Work with children	2	6

Question 4F: Do your children review, edit, and re-write their written work?

	Group 1 Interview	Group 2 Interview
Never	0	0
Always	0	2
Occasionally	8	5 (with micro)
Quite often	3	5
Rarely	4	0

APPENDIX 16(D)

Research Group 1 Final Interview Analysis: The advantages or disadvantages in using the microcomputer as a resource.

Question 9: Which programs have you used? Numbers indicate number of teachers who have used the program.

Cartoon	15	Most of the teachers had used
Storyline	15	
Tracks	13	additional programs which were
Martello Towers	5	based on language activities
Mallory	9	
Wordplay	15	involving spelling, vocabulary,
Frontpage	15	punctuation, comprehension, puzzles,
Writer	15	
Prompt	2	word matching etc
Folio	2	
Pendown	2	
Tray	12	
News Bulletin	0	

Question 10: Is there a particular program you have liked or found to be more useful than the others? What do you feel are the benefits from the program? The numbers in brackets indicate responses to each heading.

4 teachers chose Cartoon for:-

planning and structuring of work (4); ideas for creative writing (4); writing stimulus (2); motivation (2); group work (2); discussion (3)

5 teachers chose Front Page for:-

planning of work (2); presentation (3); writing stimulus (3); variety of different sorts of writing (2); group work (2); motivation (4); display/print out (5); imagination (2); links with other curriculum work (3)

2 teachers chose Mallory for:-

planning of work (2); writing stimulus (2); reasoning (2); group work (2); collaborative work (1); supports different kinds of writing (1); imagination (2); links with other curriculum work (2)

1 teacher chose Storyline for:-

planning of work; collaborative work; developing a logical story; good for remedial help; writing stimulus

3 teachers chose Writer for:-

planning of work (2); editing (3); reviewing (2); re-writing (2); content free, application across the curriculum (3); motivation (3); encourages children to concentrate on content (1); collaborative writing (2); display/print out (3); different styles of writing (2); awareness of audience (1)

APPENDIX 16 (E)

Research Group 2 Final Interview Analysis:- The advantages or disadvantages in using the microcomputer as a resource.

Question 9:- Which programs have you used? Numbers indicate number of teachers who have used the program.

Cartoon	15	Most of the teachers had used
Storyline	15	
Tracks	14	additional programs which were
Martello Towers	8	
Mallory	11	based on language activities
Wordplay	15	
Frontpage	15	involving spelling, vocabulary,
Writer	15	
Prompt	6	punctuation, comprehension, puzzles,
Folio	11	
Pendown	6	word matching etc
Tray	15	
News Bulletin	5	

Question 10:- Is there a particular program you have liked or found to be more useful then the others? What do you feel are the benefits from the program? The numbers in brackets indicate responses to the headings.

2 teachers chose Cartoon for:-
planning and structuring of work (2); writing stimulus (2); motivation (2); collaborative work (2); discussion (2); reasoning.

4 teachers chose Front Page for:-
planning of work (4); presentation (4); writing stimulus (3); variety of different sorts of writing styles (4); group work (2); motivation (4); display/print out (4); collaborative work (4); links with other curriculum work (3)

1 teacher chose Tray for:-
collaborative work; children can appreciate language techniques; develops understanding of written language; content free; adaptable for children at different stages.

8 teachers chose one of the following word processors Writer/ Folio/ Pendown for:-
planning of work (6); editing (8); reviewing (8); drafting (8); content free, application across the curriculum (8); motivation (5); collaborative writing (8); display/print out (5); different styles of writing (8); awareness of audience (8); developing writing skills (2); presentation (6).

APPENDIX 17(D)

Research Group 1 Final Interview Analysis:- The advantages or disadvantages in using the microcomputer as a resource.

Question 12:- Do you feel any aspects of your writing provision have been supported by the use of the microcomputer?

Numbers indicate responses to each heading.

Print out aids display work	13
More collaborative work	7
Provides different writing stimuli	11
Motivates children to write	8
Aids editing, reviewing of work	3
Children can correct spellings etc and produce corrected work easily	5
Encouraging for children with co-ordination difficulties	4
Story books and newspapers etc for others to read can be produced more easily	3

Question 14:- Have you changed or added anything to your writing provision since you started using the microcomputer?

Numbers indicate responses to each heading.

More displayed work	8
More collaborative work	4
Teacher can observe children writing	3
Children can help each other write	2
Children do more varied types of writing	3
Children edit and review work more	3
Teacher is more involved in writing with the children	1

APPENDIX 17(E)

Research Group 2 Final Interview Analysis: The advantages or disadvantages in using the microcomputer as a resource.

Question 12: Do you feel any aspects of your writing provision have been supported by the use of the microcomputer?

Numbers indicate responses to each heading.

Print out aids display work	15
More collaborative work	10
Provides different writing stimuli	12
Motivates children to write	4
Aids editing, reviewing of work	10
Children can correct spellings etc and produce corrected work easily	5
Encouraging for children with co-ordination difficulties	2
Story books and newspapers etc for others to read can be produced more easily	2

Question 14:- Have you changed or added anything to your writing provision since you started using the microcomputer?

Numbers indicate responses to each heading.

More displayed work	10
More collaborative work	6
Teacher can observe children writing	7
Children can help each other write	6
Children do more varied types of writing	7
Children edit and review work more	8
Teacher is more involved in writing with the children	5

APPENDIX 17(F)

Research Groups 1 & 2 Final Interviews Analysis:- The advantages or disadvantages in using the microcomputer as a resource.
.....

Question 12:- Do you feel any aspects of your writing provision have been supported by the use of the microcomputer?
.....

Numbers indicate responses to each heading.

	Group 1	Group 2
Print out aids display work	13	15
More collaborative work	7	10
Provides different writing stimuli	11	12
Motivates children to write	8	4
Aids editing, reviewing of work	3	10
Children can correct spellings etc and produce corrected work easily	5	5
Encouraging for children with co-ordination difficulties	4	2
Story books and newspapers etc for others to read can be produced more easily	3	2

Question 14:- Have you changed or added anything to your writing provision since you started using the microcomputer?
.....

Numbers indicate responses to each heading.

	Group 1	Group 2
More displayed work	8	10
More collaborative work	4	6
Teacher can observe children writing	3	7
Children can help each other write	2	6
Children do more varied types of writing	3	7
Children edit and review work more	3	8
Teacher is more involved in writing with the children	1	5

APPENDIX 18(D)

Research Group 1 Final Interview Analysis:- The advantages and disadvantages in using the microcomputer as a resource.

.....
Question 22:- Do you feel the use of the microcomputer is an advantage or disadvantage to your writing provision?
.....

Advantage 15

Disadvantage 0

.....
Advantages (Numbers indicate responses to each heading):-

Produces work for display 13

Children write together more 8

Added stimuli for writing 12

Source for different styles of writing 3

Motivates children to write 6

Word processing supports writing process 3

Word processing encourages children 2

to be more critical of their writing

Print out of work makes children 4

feel more successful

.....
Disadvantages mentioned:-

Creative writing range was limited 3

Collaborative writing was of dubious value 4

Low ability children find keyboard

difficult to operate 3

High ability children can write

better stories without microcomputer 2

.....
Question 23:- Are there any difficulties in using the microcomputer in the classroom?
.....

Numbers indicate responses to each heading.

Lack of regular access/ more micros needed 13

Programs which go wrong 4

Lack of printer facilities 3

Organisation to make sure all children have access 5

Monitoring of work 3

Children using microcomputer demanding 5

too much attention

Fitting microcomputer work wih other 2

classroom work

APPENDIX 18(E)

Research Group 2 Final Interview Analysis:- The advantages and disadvantages in using the microcomputer as a resource.

.....
Question 22:- Do you feel the use of the microcomputer is an advantage or disadvantage to your writing provision?
.....

Advantage 15

Disadvantage 0

.....
Advantages (Numbers indicate responses to each heading):-

Produces work for display 15

Children write together more 11

Added stimuli for writing 9

Source for different styles of writing 8

Motivates children to write 5

Word processing supports writing process 6

Word processing encourages children 5

to be more critical of their writing

Print out of work makes children 2

feel more successful

.....
Disadvantages mentioned:-

Creative writing range was limited 0

Collaborative writing was of dubious value 0

Low ability children find keyboard 0

difficult to operate

High ability children can write 0

better stories without microcomputer

.....
Question 23:- Are there any difficulties in using the microcomputer in the classroom?
.....

Numbers indicate responses to each heading.

Lack of regular access/ more micros needed 3

Programs which go wrong 5

Lack of printer facilities 0

Organisation to make sure all children have access 0

Monitoring of work 2

Children using microcomputer demanding 2

too much attention

Fitting microcomputer work with other 0

classroom work

APPENDIX 18(F)

Research Groups 1 & 2 Final Interviews Analysis:- The advantages and disadvantages in using the microcomputer as a resource.

.....
 Question 22:- Do you feel the use of the microcomputer is an advantage or disadvantage to your writing provision?

All of the 30 teachers thought that using a microcomputer was an advantage, although 5 teachers in Group 1 felt the advantages were limited in some areas.

Advantages (Numbers indicate responses to each heading):-

	Group 1	Group 2
Produces work for display	13	15
Children write together more	8	11
Added stimuli for writing	12	9
Source for different styles of writing	3	8
Motivates children to write	6	5
Word processing supports writing process	3	6
Word processing encourages children to be more critical of their writing	2	5
Print out of work makes children feel more successful	4	2

.....
 Disadvantages mentioned:-

Creative writing range was limited	3	0
Collaborative writing was of dubious value	4	0
Low ability children find keyboard difficult to operate	3	0
High ability children can write better stories without microcomputer	2	0

.....
 Question 23:- Are there any difficulties in using the microcomputer in the classroom?

Numbers indicate responses to each heading.

Lack of regular access/ more micros needed	13	3
Programs which go wrong	4	5
Lack of printer facilities	3	0
Organisation to make sure all children have access	5	0
Monitoring of work	3	2
Children using microcomputer demanding too much attention	5	2
Fitting microcomputer work with other classroom work	2	0

EXAMPLES OF TEACHER
INTERVIEW, OBSERVATION AND RECORD SHEETS
and
CHILDREN'S WORK
from

RESEARCH GROUP ONE

Pages 267 to 294

267

Research into Writing Activities in the Primary School
Teacher Interview

General Information:

- 1.A. Length of teaching Experience in years?
- 1.B. Status?
- 1.C. Number of children in class?
- 1.D. Age range of children in class?
- 1.E. How are children generally arranged for work?

As a Class?	<input type="checkbox"/>	In pairs?	<input type="checkbox"/>
In ability groups?	<input type="checkbox"/>	In social groups?	<input type="checkbox"/>
Other,	<input type="checkbox"/>		

1.F. Have you ever attended a course/project on writing?

No	<input type="checkbox"/>	Within the	<input type="checkbox"/>	Within the	<input type="checkbox"/>	Over 5	<input type="checkbox"/>
		last year		last 3 years		years ago	

If you have attended a course/project where was it based?

within	L.E.A.	<input type="checkbox"/>	Outside	<input type="checkbox"/>	School	<input type="checkbox"/>
			L.E.A.			

Provision of Writing Experiences

2.A. In a typical week, how often would you say your children are engaged in writing activities?

Several times day?	<input type="checkbox"/>	Once a week?	<input type="checkbox"/>
Daily?	<input type="checkbox"/>	Twice a week?	<input type="checkbox"/>
When they need to?	<input type="checkbox"/>	Other	<input type="checkbox"/>

2.B. Generally how are the children organised when they are involved in the writing tasks?

Individually?	<input type="checkbox"/>	Pairs?	<input type="checkbox"/>
Group?	<input type="checkbox"/>	Class?	<input type="checkbox"/>
Varies depending on need?	<input type="checkbox"/>	Other?	<input type="checkbox"/>

2.C. In a typical week what specific writing tasks do the children do?

Stories/Creative Writing	<input type="checkbox"/>	Formal language work	<input type="checkbox"/>
News/diaries	<input type="checkbox"/>	Poetry	<input type="checkbox"/>
Recording an activity	<input type="checkbox"/>	Other	<input type="checkbox"/>

2.D. Can you describe how writing tasks are generally introduced?
i.e. What does it involve

Teacher initiated	<input type="checkbox"/>	Use of resources	<input type="checkbox"/>
Child initiated	<input type="checkbox"/>	Varies	<input type="checkbox"/>
Introduce via discussion	<input type="checkbox"/>	Via Practical work	<input type="checkbox"/>

2.E. Are there any resources which you use in supporting writing activities?

Pictures	<input type="checkbox"/>	Work cards	<input type="checkbox"/>
Craftwork	<input type="checkbox"/>	Stories	<input type="checkbox"/>
Computer	<input type="checkbox"/>	Video/Film/T.V. Radio	<input type="checkbox"/>
Musical stimuli	<input type="checkbox"/>	Text books	<input type="checkbox"/>
Other	<input type="checkbox"/>		

2.F. In your everyday teaching activities, are there curriculum areas which you feel you quite regularly link to writing activities?

P.E.	<input type="checkbox"/>	Drama	<input type="checkbox"/>	Art & Craft	<input type="checkbox"/>	Science	<input type="checkbox"/>
R.E.	<input type="checkbox"/>	Stories/ Poems	<input type="checkbox"/>	Maths	<input type="checkbox"/>	Env. Studies	<input type="checkbox"/>
Music	<input type="checkbox"/>	Other	<input type="checkbox"/>				

Writing purpose and children's writing development.

3.A. If asked by a parent why children need to learn to write, what would you say?

Expressing ideas & attitudes	<input type="checkbox"/>	Communication	<input type="checkbox"/>
Enjoyment	<input type="checkbox"/>	Social	<input type="checkbox"/>
Show teacher what they know	<input type="checkbox"/>	Other	<input type="checkbox"/>

3.B. Can you think of a child in your class, who you would describe as a good writer, and say what qualities he/she has which makes you think this?

		Good range voca.	<input type="checkbox"/>
Stories have structure	<input type="checkbox"/>	Good punctuation	<input type="checkbox"/>
Writes in sentences	<input type="checkbox"/>	Good spelling	<input type="checkbox"/>
Writes in a variety of styles	<input type="checkbox"/>	Good expression	<input type="checkbox"/>
Stories contain feeling	<input type="checkbox"/>	Writes a lot	<input type="checkbox"/>
Writes with meaning	<input type="checkbox"/>	Enjoys writing	<input type="checkbox"/>
Other	<input type="checkbox"/>	Imagination	<input type="checkbox"/>

3.C. What do you feel are the main features of a poor writer in your class?

Lack of ability to relate experiences	<input type="checkbox"/>	Poor range voca.	<input type="checkbox"/>
		Writes little	<input type="checkbox"/>
Poor co-ordination	<input type="checkbox"/>	Poor motivation	<input type="checkbox"/>
Cannot concentrate	<input type="checkbox"/>	Poor reader	<input type="checkbox"/>
Poor spelling	<input type="checkbox"/>	Poor speech	<input type="checkbox"/>
Other	<input type="checkbox"/>	Poor observation	<input type="checkbox"/>

3.D. What percentage of your class do you feel has a satisfactory standard of writing for their age?

Under 25% 25-50% 50 - 75% over 75%

Organisation and Content of writing tasks.

4.A. When your children are engaged in writing tasks, is this generally on an individual basis, or as a member of a group, or as an individual doing a class writing task.

Always as individuals	<input type="checkbox"/>	Mainly as a individual doing a class task	<input type="checkbox"/>
Always as a group	<input type="checkbox"/>	Mainly as an individual doing group tasks	<input type="checkbox"/>
Depends on task	<input type="checkbox"/>	Quite often as an individual	<input type="checkbox"/>
		Other	

4.B. Do your children take part in collaborative group work?

Yes No

If YES what activities do they do?

Producing plays	<input type="checkbox"/>	Producing stories	<input type="checkbox"/>
Experiments with language	<input type="checkbox"/>	Producing Reports	<input type="checkbox"/>
Producing an article	<input type="checkbox"/>	Adventure programs	<input type="checkbox"/>
Other			

4.C. Do the children plan what they write or do they just get on with it?

Regularly Plan	<input type="checkbox"/>	Sometimes plan (written)	<input type="checkbox"/>
Never Plan	<input type="checkbox"/>	Sometimes plan (verbally)	<input type="checkbox"/>
Always Plan	<input type="checkbox"/>	Other	<input type="checkbox"/>

4.D. Do the children ever share what they have written with other people?

Yes No

If YES then with whom?

Peers Teacher/s Parents Other

4.E. Is there any written work displayed in your classroom this moment?

Yes No

If YES then what?

Individual work	<input type="checkbox"/>	Handwriting	<input type="checkbox"/>
Descriptions of activities	<input type="checkbox"/>	Class books	<input type="checkbox"/>
		Other	<input type="checkbox"/>

4.F. Do your children ever rewrite things that they have written?

Never	<input type="checkbox"/>	Rarely	<input type="checkbox"/>
Always	<input type="checkbox"/>	Occasionally	<input type="checkbox"/>
Quite Often	<input type="checkbox"/>		

4.G. What proportion of total writing activities is given to fictional work?

0%	<input type="checkbox"/>	Under 25%	<input type="checkbox"/>	25% - 50%	<input type="checkbox"/>
50%-75%	<input type="checkbox"/>	Over 75%	<input type="checkbox"/>	100%	<input type="checkbox"/>

4.H. What is the other % devoted to?

Formal Language Work	<input type="checkbox"/>	Handwriting	<input type="checkbox"/>
Factual work/ Environmental Studies	<input type="checkbox"/>	Other	<input type="checkbox"/>

Assessment and Continuity

5.A. How do you respond to children's writing?

Discussion	<input type="checkbox"/>	Marking	<input type="checkbox"/>	Display	<input type="checkbox"/>
Written comments	<input type="checkbox"/>	Other	<input type="checkbox"/>	Verbal comments	<input type="checkbox"/>
				Read out aloud	<input type="checkbox"/>

5.B. Do you have a school policy for writing development?

Yes No

5.C. How do you assess children's writing development?

Formal school system	<input type="checkbox"/>	Observation	<input type="checkbox"/>
Personal formal system	<input type="checkbox"/>	Scores Grading	<input type="checkbox"/>
Marking	<input type="checkbox"/>	None	<input type="checkbox"/>
Discussion	<input type="checkbox"/>	Other	<input type="checkbox"/>

5.D. Do you make special provision for children of differing abilities?

Yes No

Ref. to poor children
Ref. to bright children

If YES then what provision?

Extra resources	<input type="checkbox"/>	Extra instructions	<input type="checkbox"/>
Modification of task	<input type="checkbox"/>	Extra teacher assistance	<input type="checkbox"/>
Other	<input type="checkbox"/>	Different approach to rest of class	<input type="checkbox"/>

5.E. Do you keep personal records of childrens written achievement?

Yes No

If YES then what?

Development chart	<input type="checkbox"/>	Scores	<input type="checkbox"/>	Samples of work.	<input type="checkbox"/>	Other	<input type="checkbox"/>
-------------------	--------------------------	--------	--------------------------	------------------	--------------------------	-------	--------------------------

5.F. Do you receive or pass on records on writing achievements?

Yes No

If YES then what?

Written records	<input type="checkbox"/>	Verbal comments	<input type="checkbox"/>
Gradings	<input type="checkbox"/>	Other	<input type="checkbox"/>

PROGRAM RECORD

Teacher Reference Number..... Initial use of Program.....

1. How did you introduce the program?

2. How many children were involved in using the program?

3. What was the ability of the children (e.g. average, mixed ability etc.)

4. What were the children's reactions/attitudes to the program?

5. How long were the children involved in using the program?

6. Comment on any difficulties encountered by the children.

7. What skills/knowledge did you feel the children might develop by using the program?

8. Comment on any difficulties encountered by you.

9. If you continue to use the program what kind of development do you think this would involve. (i.e. organisation, skills, extended activities etc.)

Teachers Reference Number.... Extended use of program.....

0. What do you feel was the best method of organisation you tried?

1. What (if anything) did the children produce?
(a) at the computer b) away from the computer)

2. What skills/knowledge etc. did you feel the children developed/
acquired?

3. With reference to the way you usually provide for the development
of the above skills etc., was the use of the computer an
advantage/disadvantage?

4. Can you comment on any observations/incidents relating to yourself
or the children which you feel have any significance?

5. In relation to the skills etc. experienced what do you feel
would be an extension or development of the program.

22775
Investigation into the potential of the Microcomputer

as an aid to teaching.

Appendix 41
Observer's teacher
monitoring sheet
Research Group 1

Observation Sheet Group Ref. No.

Organisation

Teacher involvement

Teacher Comments

Children's involvement

Organisation

Teacher involvement

Teacher Comments

Children's involvement

= 278 =

Investigation into the potential of the Microcomputer

as an aid to teaching.

Observation Sheet Group 1 Ref. No. 7

Organisation Program used 'Storyline'
 Class intro ... then mixed ability groups of 3
 All class were writing an account of a visit
 when the micro was being used - this was an aside effort

Teacher involvement

Teacher 'led' discussion
 Commented on spellings and punctuation
 Pursued 'ideas' but not content

Teacher Comments

The 'rest' of the class wanted to be involved.
 Teacher had no 'end' result in mind for work
 produced. Presentation applauded.

Children's involvement

Children were excited about using computer
 They did not plan story just let it develop.
 They did not attempt to read it or amend
 They did not have a purpose / or an audience
 to address their work to.

Organisation

Program used 'Frontpage'

All class asked to produce a newspaper headline
 and article about 'Sports Event'

Teacher involvement

Teacher talked to class and reminded them
 about event. Discussed vocabulary

Teacher Comments

Low ability children produced better work
 than usual

Children's involvement

Children worked together although in a
 mixed ability group 'high ability' children
 dominated the rest.

Some children had ideas which the teacher
 thought they "might do another day"

Teacher Reference No. 8

Writing Category Imaginative

Program Name Cartoon

Initial period of program use

(1) How was program introduced?

All 20 frames of Spooky Tales viewed by all class together - all made notes of what each frame displayed. Split into mixed ability groups

(2) Size of group?

2, 3 or 4.

(3) Children's ability i.e. above or /below /average

mixed

(4) Length of involvement time?

(5) What (if any) skills/knowledge etc. did you feel the children used/developed?

Use of keyboard
Organisational (editing work); social skills.
Creative imaginative writing was disappointing

(6) Comments on difficulties encountered by:

Children.....

Teacher..... 20 secs per frame insufficient for initial viewing.

(7) Comments on children's reactions/attitudes

Enthusiastic

(8) What (if anything) did the children actually produce/accomplish?

- a) cartoon on disc
- b) story in commentary form

Subsequent periods of program use.

(9) Comments on organisation regarding use of program (groups etc.)

Class viewing of available frames successful (except that 20 secs. not enough).

Cartoon making in groups.

(10) Brief comments on how the use of the program was developed.

1. View frames 2. choose & order frames while constructing commentary (story) - in groups

3. Edit cartoon & choose title 4. Store on disc

5 Display to class & tell story (Abandoned idea of synchronising story on cassette with video - too time consuming ∴ difficulty).

(11) Observations on value of program regarding development of writing skills etc.

Disappointed so far - I am not convinced that best writing comes from a group. I will try with individual work next.

(12) With reference to the way you usually provide for the development of the above skills --- was the use of the computer an advantage/disadvantage etc.



(13) Comments and your views on how the use of the program could be extended/improved/applied.

1. a space rocket launching.	2. a space rocket landing.	3. a moon and flying saucer.	4. space station in space.	5. spaceman and a rocket landing on the moon.
6. space monster blinking.	7. yellow and red monster.	8. a girl spacemonster with big ears.	9. inside a rocket.	10. a moon buggy.
11. doctor who's police box.	12. space transporter.	13. space-ship flying.	14. space craft landing.	15. space centre with space-craft docking.
16. meteor in space.	17. space shuttle launching.	18. space-craft blowing up.	19. space-station with radar on it.	20. robot with eyes flashing.

My Story

Example of marking Research Group

Picture Number

<p>1. When we got to Space - Station we went and got our space suits before the flight man Ashley Gary got packed up with food but the only problem was when you go to eat the food in space it would take to one place and when you go to get it, it moves back.</p>	1	10
<p>2. Inside the Space Rocket we went to bed and half way on ^{through} the duration night. We were rising up out of our beds and woke up Gary and Ashley up they were scared out of their wits. They didn't know that they were floating up in the air.</p>	9	8
<p>3. When we were in the space rocket out ^{saw} of the windows we ^{we} saw a flying saucer going to the moon. There was a big bang and all of a sudden there was nothing left of the flying saucer.</p>	18	9
<p>4. When we were in the rocket there was a funny noise. When me Gary and Ashley got and gone ^{went} and had a look out of the windows it was only the radar scanner.</p>	19	0

When we were flying over the moon we saw a spaceman. It looked like he was signalling us. So I went and told Gary and Ashley and we landed and picked him up and he said Thank you and me and Gary said dont mention it!

On the way back in moon Buggy we met up with a yellow and red monster. At first me Gary and Ashley thought that it was going to eat us but the spaceman said dont worry its only a book and we drove on

But the only problem was the yellow and red monster didnt give up. It was chasing us all over the moon. Gary kept asking what is he going to do to us? but then it stopped and we got into the rocket and took off.

When we took off from the moon Ashley snatched a space engine in addition to his bag. We were playing with it for a while and about 2 hours later Gary said I'm going to bed and Ashley said so am I so I said or I might as well go too.

In the morning when we woke up we saw 2 meteors fly past the windows. I said what were those? Ashley said what were those? and I said that thing that flew past just a minute ago. and Gary said it must have been a meteor and Ashley said was that all?

5	10
10	8
7	7
	10
16	8

After a while we came
a space docking centre a bit of
I said how about ~~some better~~
up in there. and I said ~~out there~~
might has well. We went in
space centre docking. There
several people like us and
were ~~with~~ robots. The captain
of the dock ~~was~~ and make
yourself at home

Then when we left the Space
docking. After a while we
were near home. So I
said to Ashley and Gary
come and get belted up
we were going to land and
my mum opened my bedroom
door and it was just a dream

2 8

THE END

EXAMPLE OF CHILD'S WORK FROM RESEARCH GROUP I
USE OF PROGRAM 'CARTOON'

Good

Fear In The Night Dawn Gowins

One day I was walking in a graveyard when I heard a noise. I decided to explore. It was very creepy and I was scared. As I was walking I was looking at the graves and I came to a grave I had never seen before. I flashed my light and there before me was Dracula's grave stone. I was astonished to see what I saw. I ran over and I heard a noise in the church. I heard a sound of laughter so I went around the church to see who was making the laughter noise. All of the boards were where the windows had been. I opened the door and I explored round there I saw a man with another three men and they had a silver cup in their hands and they were drinking something red. Then all there fell onto the floor. Then a large gust of

... some were coming towards
g my blood. I couldn't

+

EXAMPLE OF CHILD'S WORK FROM RESEARCH GROUP I
USE OF PROGRAM STORYLINE

Draft I

The house with a secret
At 13 shadworth drive the people
were getting ready to move to 251
Grange Avenue this house had been
built on some land that had wons
belongd to some gnomes. When the
house was built the gnomes were
very agry so they decided to move.
The brainiest of the gang said
take off your hat. All the magic
power of the gnomes was in their
hats. When the hats were wayd in
the air it made the spells they
wanted. Moggy and Brainy found a
home in a cupboard in the back
bedroom. The other two gnomes
greddy and sleepy found a home in
a cupbord in the kitchen. Moggy
and Brainy whisted to the other
two to show them their home
Greddyand sleepy thought this was
the best home so the decided to
stay there with Moggy and Brainy.

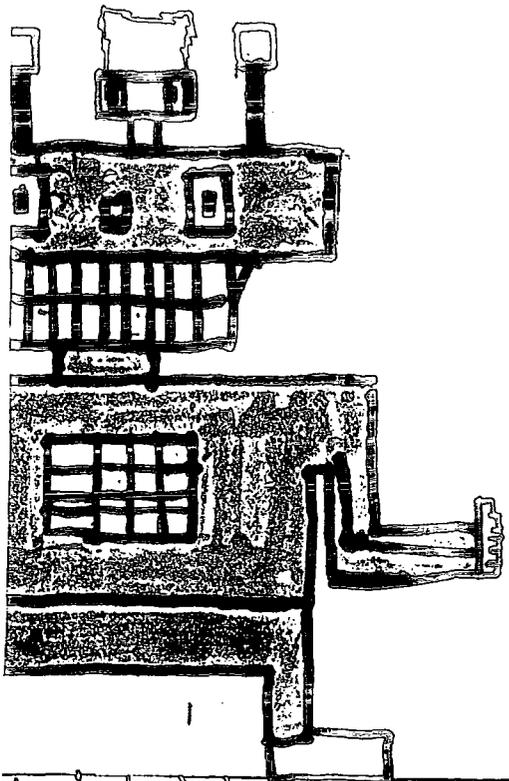
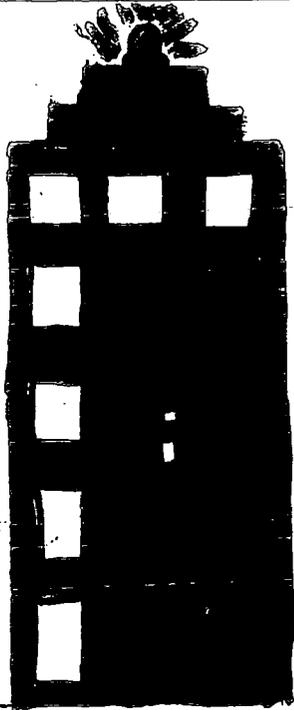
Clare, Madeline, Emma

EXAMPLES OF CHILDREN'S WORK FROM RESEARCH GROUP I

USE OF PROGRAM 'CARTOON'

① The Space box

REF 12



I was in space I saw a
Police box. A minute I was
in my space ship but I am
in the space box.

box landed I went out
a green robot it
e it and fire guns
at me.

The green robot seen a marshen
then ran of the marshen stud
there looking at me I saw a
Space station I ran over there
home.

there was computers
has funny chers
on bit all over
Ship then I there back

YOUR WEEKLY NEWS

20P

18.6.86

EASTENDERS ARE COPIERS

PEOPLE ARE NOW SAYING THAT THE TWICE A WEEK SOAP "EASTENDERS" ARE COPIERS! THEY THINK THAT THERE COULD BE A FIRE AT THE "QUEEN VIC" JUST AS THERE WAS AT THE "ROVERS RETURN" AND THAT ANGIE, THE COCKNEY BARMAID WILL DIE INSTEAD OF COMING BACK INTO THE SOAP LIKE BET LYNCH OF "ROVER'S RETURN." THE DIRECTOR OF "EASTENDERS", BRIAN WALSH SAYS "WE ARE NOT COPYING, WE JUST LIKE THE IDEA" THAT'S ALL." SO, ARE THEY REALLY COPYING?



LESLEY GRAHAM (OEN WATTS)

RADIO RENTALS

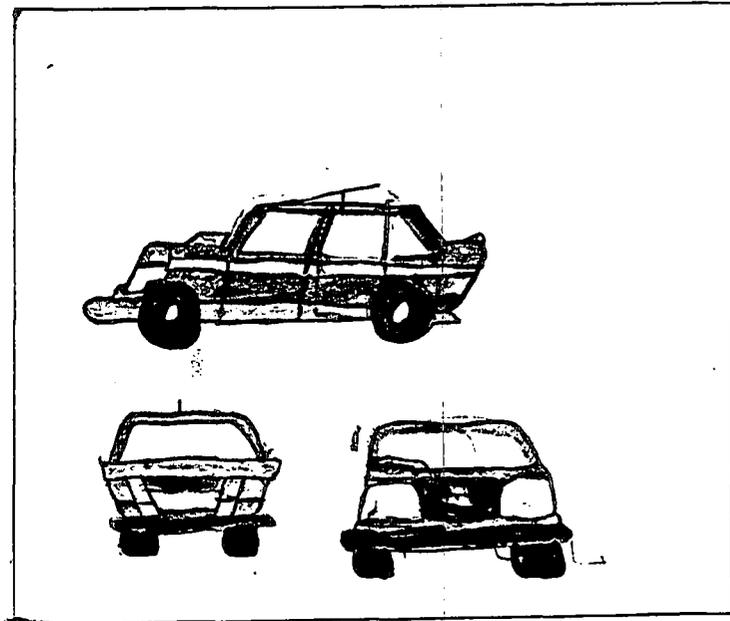
NORTHERN COURIER

20P

19 6 86

NISSAN LAUNCHES CAR OF TODAY

NISSAN OF WASHINGTON TODAY UNVEILED ITS NEW CAR NAMED THE "TRIO" WHICH WILL TAKE THE BISCUIT IN FAMILY SALOONS. 50,000 JOBS WILL BE CREATED IN MANUFACTURING THE CAR WHICH WILL BE A GREAT BOOST FOR THE NORTH-EAST. BUT THE CRUNCH WILL COME NEXT WEEK WHEN MANAGEMENT DECIDE THE COLOUR. CHOCOLATE IS A FIRM FAVOURITE. THE PLUSH INTERIOR SEATS ARE MADE FROM VELVET. IT HAS A POWERFUL 2.0 LITRE ENGINE, AND 6 SPEED GEAR BOX; 0-60 IN 9.3 SECS. ALTOGETHER A VERY NICE CAR. PRICE £6,500.



HOWNCASTLE FOR VOLVO

EXAMPLES OF CHILDREN'S WORK FROM RESEARCH GROUP I
USE OF PROGRAM 'FRONTPAGE'

Teacher Reference No. 11
Writing Category..... Imagination
Program Name..... Cartoon

Initial period of program use

(1) How was program introduced?

I showed all the frames for approx 10 secs. each. We discussed how to use them to illustrate a story. How many? Initially three "beginning, middle, end." They could return to computer to look at the frame if need be.

(2) Size of group? Whole class.

(3) Children's ability i.e. above or /below /average

mixed ability

(4) Length of involvement time? One hour - introduction + showing selecting then writing + drawing. Slow children took longer

(5) What (if any) skills/knowledge etc. did you feel the children used/developed?

How to work computer to see desired frame
observation, imagination, order of events
oral discussion verging on argument about content of frames.

(6) Comments on difficulties encountered by:

Children... Some needed to stand at computer others complained that they couldn't see the pictures.

Teacher..... NONE

(7) Comments on children's reactions/attitudes

It was new - they loved the clear bright pictures - they were ready to work.

(8) What (if anything) did the children actually produce/accomplish?

Short stories + pictures - and the urge to do another one

Subsequent periods of program use.

Cartoon

- (9) Comments on organisation regarding use of program (groups etc.)

group worked on prog. full afternoon selected frames to make story, tried sound effects and dialogue enhance pictures. Problem! we could not get the machine to record. Frustration!! Later explanation of how it could be done — but at the time a tremendous problem in class time.

- (10) Brief comments on how the use of the program was developed.

Using magazines / colour supplements. I asked children to produce a story after cutting out 3 or 4 pictures.

- (11) Observations on value of program regarding development of writing skills etc.

I would use this program it is very easily understood by children

- (12) With reference to the way you usually provide for the development of the above skills --- was the use of the computer an advantage/disadvantage etc.

assurable providing the machine works immediately

- (13) Comments and your views on how the use of the program could be extended/improved/applied.

selected frames to show: a rescue, or safety first, or a "don't talk to strangers", personal hygiene.

We teachers who are helping are interested in computers as teaching aids — but extending this to other members of staff is another matter. Our three computers are allocated on a daily basis — once a week perhaps twice when teacher sees it in class "Hell that thing — well it will have to wait — if I have time."

John WARING.
Robert's Stockton

PROGRAM RECORD

"WRITER"

Teacher Record Sheet
Research Group 1

Teacher Reference Number... 15 Initial use of Program.....

1. How did you introduce the program?
Used it in front of class on two or three occasions
in instructions in ex. book. Children wrote

2. How many children were involved in using the program?
All the class (25)

3. What was the ability of the children (e.g. average, mixed ability etc.)
Mixed

4. What were the children's reactions/attitudes to the program?
Enthusiastic.

5. How long were the children involved in using the program?
Difficult to say - used it for various purposes.

6. Comment on any difficulties encountered by the children.
Sometimes no gap between two words which
should only be separated by a . or , . treated as one
word by the W.P.

7. What skills/knowledge did you feel the children might develop by using
the program?
All skills with regard to written language
grammar, spelling, imagination etc. Some children
find it a pleasure to see their written work "in
print" - much tidier & neater than in their own ex. books!

8. Comment on any difficulties encountered by you.
None so far.

9. If you continue to use the program what kind of development do
you think this would involve. (i.e. organisation, skills, extended
activities etc.)

Applicable to all aspects of the
curriculum. Hope to encourage its use
from upper infants upwards.
I feel many children will produce more work
then freed from shackles of inability/aversion to
handwriting (especially boys).

0. What do you feel was the best method of organisation you tried?

Demonstrating it in front of class several times, then hands on experience.

1. What (if anything) did the children produce?

(a) at the computer

b) away from the computer)

Written work.

Written work pointed out (hard copy).

2. What skills/knowledge etc. did you feel the children developed/acquired?

Everything to do with written language - syntax, grammar, spelling and more enthusiasm for putting ideas onto paper.

3. With reference to the way you usually provide for the development of the above skills etc., was the use of the computer an advantage/disadvantage?

A distinct advantage

4. Can you comment on any observations/incidents relating to yourself or the children which you feel have any significance?

The pleasure on a certain child's face when he saw, for the first time, a neat hard copy of four sentences he had written. (The boy concerned was remedial and handwriting almost illegible).

5. In relation to the skills etc. experienced what do you feel would be an extension or development of the program.

I think "WRITER" as it stands is an excellent intro. to WP. Choice of "fonts" (e.g. jumbo sized print) would be desirable. - I think this is in the offing, anyway, unless already produced, in which case I'll have a copy!

EXAMPLES OF TEACHER
INTERVIEW, OBSERVATION AND RECORD SHEETS
and
CHILDREN'S WORK
from
RESEARCH GROUP TWO

Pages 295 to 324

QUESTION SHEET
(Guidelines for appraisal of writing project)

1. What was the writing task/experience?

2. What was the specific objective(s) for your observations?

3. What organisation was involved before initiating the task?

4. How was the task initiated?

5. What resources were used and how were they implemented?

6. What were the children's reactions to the task?

7. What problems/difficulties arose during the lesson?

8. What was actually produced?

9. What was your assessment of the writing experience and children's/teacher's interaction?

10. Comment on any future development that you can foresee or would like to happen.

A visit to the
(Guidelines for Appraisal of Writing Project) Town Square

1. What was the writing task/experience?

RE-WRITING STIMULUS → A WALK TO THE TOWN SQUARE.

Teacher Research Group 2
Square Record sheet

2. What was the specific objective(s) for your observation?

TO LISTEN AND HEAR THE VARIOUS SOUNDS (AND SIGHTS) IN A TOWN - DEVELOPING VOCAB. RELATED TO DIFFERENT SOUNDS.

3. What organisation was involved before initiating the task?

GENERAL WORK → FOLLOWING THEME FOR LAST 4 WEEKS, "IN THE TOWN."

4. How was the task initiated? IN 2 GROUPS.

ANGELA & MYSELF GIVING CONDUCTED TOUR OF TOWN SQUARE.

DISCUSSION FOLLOWED BACK AT SCHOOL.

5. What resources were used and how were they implemented?

STORIES - "THE LISTENING WALK" INTRODUCING VOCABULARY RELATING TO SOUNDS. WE HEAR OUTSIDE.

6. What were the children's reactions to the task?

ENJOYMENT;

INTEREST SHOWN GENERALLY IN PEOPLES REACTIONS ETC. NOISE OF CARS, MOTORBIKES, ROADWORKS.

* EMPHASIS ON OBSERVATION. MAKING THE CHILDREN MORE AWARE OF THEIR SURROUNDINGS

7. What problems/difficulties arose during the lesson?

DURING DISCUSSION IT BECAME PATENTLY OBVIOUS THAT THE CHILDREN DID NOT HAVE THE VOCABULARY TO DESCRIBE THEIR EXPERIENCES. IT BECAME A SITUATION WHERE IT WAS VERY DIFFICULT NOT TO PUT "WORDS IN THEIR MOUTHS"

→ NOT WHAT I BELIEVED TO BE THE POINT OF EXERCISE
→ I AIMED TOO HIGH, TOO SOON.

8. What was actually produced?

A GENERAL AWARENESS OF THE ENVIRONMENT
AN IMPROVEMENT IN LISTENING SKILLS →
HOPEFULLY !!

VOCABULARY EXTENSION RE SHOP NAMES: CHEMIST,
BUTCHER, BAKER, GREENGROCER.
A LITTLE WRITING.

9. What was your assessment of the writing experience and (children's/teacher's interaction?)

→ ① SOMEWHAT FORCED - A FALSE SITUATION.

→ WITHIN THEIR LIMITATIONS THEIR WRITING, THE FOLLOWING DAY, PRODUCED SOME THOUGHTFUL IDEAS.

10. Comment on any future development that you can foresee or would like to happen.

CONTINUATION OF DEVELOPMENT OF LISTENING SKILLS

QUESTION SHEET

Visit to the
Museum

(Guidelines for Appraisal of Writing Project)

Teacher Record Sheet

Research Group 2

1. What was the writing task/experience?

Writing about a visit to the Museum to see an exhibition of children's pictures models etc.

2. What was the specific objective(s) for your observation?

To see if the children could record accurately their observations and feelings in an interesting way to make a class book about the exhibition.

3. What organisation was involved before initiating the task?

The children were split into working groups

4. How was the task initiated?

Each group was given a subject for their writing eg scientific models, the portraits, the story illustrations, the animal paintings, the modelling section.

5. What resources were used and how were they implemented?

Pencils / Notepaper Sketch materials / crayons

6. What were the children's reactions to the task?

They were interested in the task but found it difficult to make notes. They 'fitted' around.

7. What problems/difficulties arose during the lesson?

The groups did not want to stick to the area they were asked to write about. They found it difficult to take notes. Some work was too much others lacked real observational detail.

8. What was actually produced?

Each group talked about what they had seen and wrote a first draft. One group wrote their draft on the computer (written). Each group then put their drafts into the computer and edited it. Some children did illustrations.

9. What was your assessment of the writing experience and children's/teacher's interaction?

There was not a lot of difference between the quality of the computer group to the others on the first draft, although the group seemed to collaborate better around the computer. When all groups came to the computer second draft (after difficult starts) they all made good alterations and really produced some good accounts. The range of work produced was factual and imaginative accounts.

10. Comment on any future development that you can foresee or would like to happen.

I think the balance of groups is important and I need to consider this. The children need help in drafting skills — to improve rather than correct. Children in computer group could see different things on the screen and helped each other. I think we will try a class newspaper with different groups producing different pages eg fashion, news etc.

1. What was the writing task/experience?

Teacher Record Sheet
Research Group 2

To write about "Autumn in the Park".

2. What was the specific objective(s) for your observation?

How had the children used their experiences to write more expressively e.g. using adjectives in describing objects seen.

3. What organisation was involved before initiating the task?

Children were divided into two groups and walked across to the Park.

4. How was the task initiated?

* Children were asked to look at fallen leaves, to handle them, walk across them, to listen to the crackling, to look at the shapes of the trees, colours, above & below their eye-level.

5. What resources were used and how were they implemented?

The natural resources in Whitehead Park.

Reference books for identifying trees & berries.

6. What were the children's reactions to the task?

Initially most excited & interested & apparently well motivated.

* FIRST HAND EXPERIENCE

7. What problems/difficulties arose during the lesson?

The children had a short span of concentration and would have preferred to play hide-and-seek among the bushes.

8. What was actually produced?

Orally the children had some beautiful ideas and used words very expressively. However in writing the children were more inhibited & the work was ~~was~~ stereotyped

9. What was your assessment of the writing experience and children's/teacher's interaction?

Bringing leaves and plants into the class-room would appear to be just as effective as taking the children out, by limiting the actual perimeter of observation.

10. Comment on any future development that you can foresee or would like to happen.

We must just continue to encourage the children in all aspects of creative development.

* DID WE ASK THEM TO WRITE WHEN TALKING ABOUT OBSERVATIONS WOULD HAVE BEEN SUFFICIENT

29/9/86

Appendix 36

QUESTION SHEET

(Guidelines for Appraisal of Writing Project)

Teacher Record Sheet
Research Group 2

1. What was the writing task/experience?

To write a story entitled "My baby dinosaur."

2. What was the specific objective(s) for your observation?

For the children to write a story that not only involved their imagination but also paid some attention to a beginning, middle and end.

3. What organisation was involved before initiating the task?

This task was an extension of this term's topic on "Dinosaurs". Several lessons on dinosaurs had already been presented to the children. I followed this on with pictures of the Natural History Museum etc.

4. How was the task initiated?

I grouped the class together and began to tell them a story about a family who went on their holidays to London; and whilst there they visited a museum.

5. What resources were used and how were they implemented?

The classroom already contained many books and pictures on Dinosaurs. The children had also made a large model of a dinosaur world which contained a shell with a tiny dinosaur inside. I showed them pictures of the museum but really, they were already on fairly familiar territory.

6. What were the children's reactions to the task?

Eager, attentive. Very willing to share their own experiences of the idea of visiting a museum. They were enthusiastic about choosing their own dinosaur and they soon settled down to writing. Some children did not want to use the beginning I had written on the board and so they chose their own which was similar in most instances.

Class 9. Miss R.

7. What problems/difficulties arose during the lesson?

Some children had difficulty structuring their story. Although they had the ideas and a logical sequence of events, they could not write a coherent text - there were omissions of words and phrases which stopped a flow of story.

8. What was actually produced?

A written story with a picture.

9. What was your assessment of the writing experience and children's/teacher's interaction?

Far better than the previous week which was left to the children's own creative ability. The lead in to this week's story gave the children a starting point and enough 'openings' for them to continue on their own. They enjoyed the humour and suspense of the egg opening and went and used classroom resources to help themselves if necessary. The group worked separately and hardly referred to each other but they worked well with me.

10. Comment on any future development that you can foresee or would like to happen.

Many of the pieces would work well on "WRITER" as the children could work in groups helping each other to edit the stories. Drama sessions could develop naturally and possibly some modelling.

WHY WAS THIS?

MIS - MATCH BETWEEN VERBAL ACCOUNT AND WRITTEN ACCOUNTS

EXAMPLE OF CHILD'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM WRITER

Draft I

david was at the seaside and he went fishing he trided to cach some fish he had his welles on the water went in his welles the water went in his welles oh he sed there is a crab he took his welles off

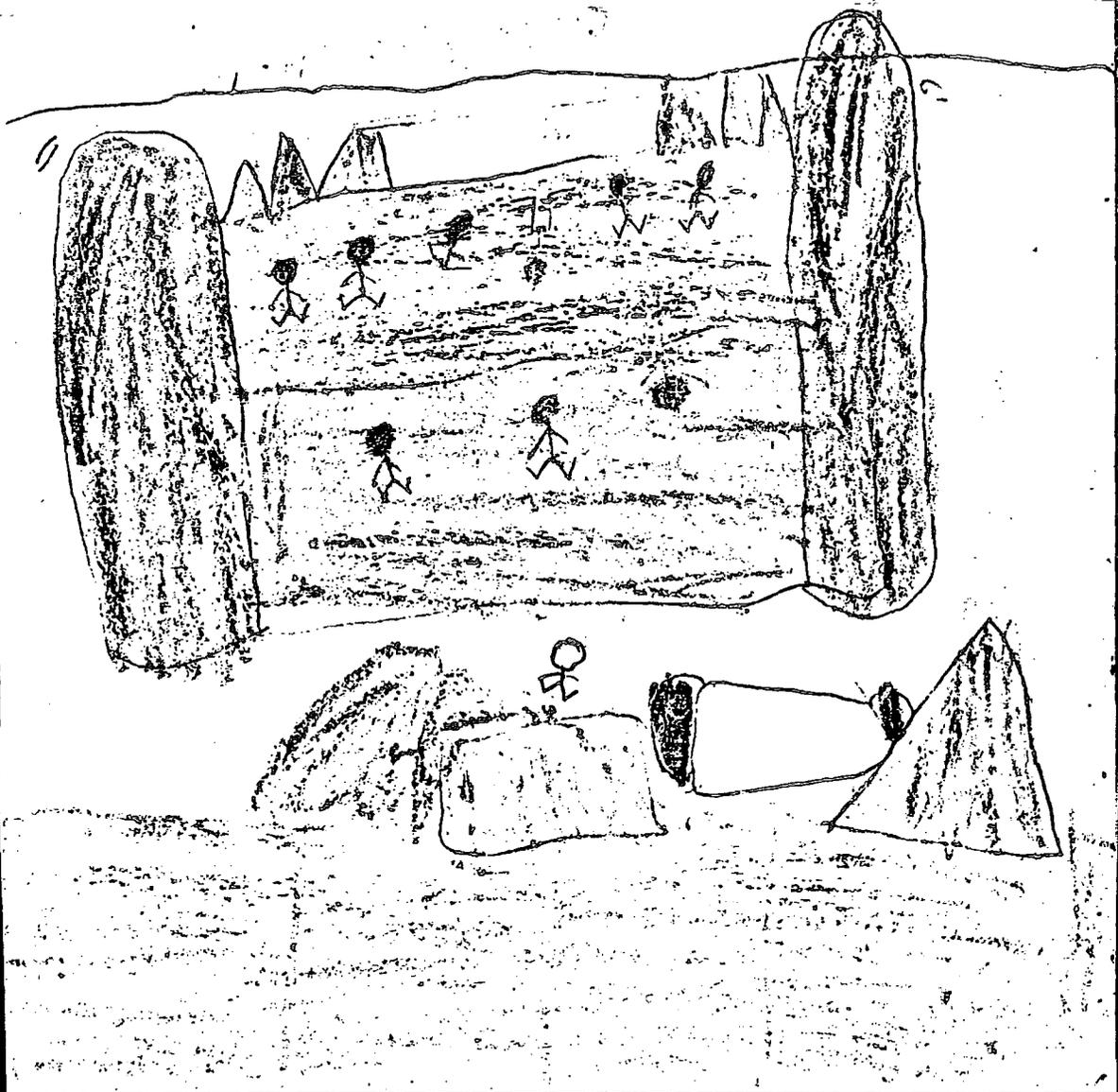
a very deep hole and he swam to shaw and he went back to the vilige that he lives in and when he took his welles off he got a shock he opend his eyes wide and put his hand in to nes welles to see whot it was he scremd very lowd ow ow ow ow and he sticke his hand in to his welles and he pulled out a crab oh he crid i have found a crab in one boot and a snal in another boot he acked his mum if he could keep them and she sed yes if you keep them out of my way as pets and he put them in a tub and he called them henny and penny

Paul, Mark, Karen, Victoria

EXAMPLE OF CHILD'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM WRITER

Monday September 15th
News

I went to the soft play and it was
good my dad went with me and Tony



A TIMES

2D

8000BC

YES-NOAH IS SAVED



A terrible tragedy has struck our town. Millions of people have been killed due to a freak flood. Noah says that it was God who caused the flood. Noah says it was because people are so evil. Noah was saved by building an ark. It took Noah ages. His family have been saved as well as two of every kind of animal. When I asked Noah what it was like in the ark I was told he found it very cramped. Many a family have been saddened by this terrible tragedy. Perhaps we should all try to mend our ways so this terrible tragedy doesn't happen again.

FROM SIN

QUESTION SHEET

Memories

Teacher Record Sheet
Research Group 2

(Guidelines for Appraisal of Writing Project)

1. What was the writing task/experience?

"A day to remember"

2. What was the specific objective(s) for your observation?

Could the children remember and write down the events of a special day in the order in which they occurred.

3. What organisation was involved before initiating the task?

None.

4. How was the task initiated?

We talked about going on a visit - buying a ticket first, then travelling to our destination - arrival & activities then journey home.

5. What resources were used and how were they implemented?

Children's experiences and personal memories of a birthday party, visit to Grandma, etc.

6. What were the children's reactions to the task?

Interested and ready to start.

7. What problems/difficulties arose during the lesson?

Despite the suggestion that they should write their ideas while they were fresh in their minds after discussion the children were still coming out for 'spellings'.

8. What was actually produced?

Mainly rather rambling accounts with too long an introduction and a brief conclusion.

The vocabulary that came from the discussion was very useful, however.

9. What was your assessment of the writing experience and children's/teacher's interaction?

I felt I had contributed much energy & enthusiasm; the children enjoyed talking & discussing, but the actual writing was disappointing.

10. Comment on any future development that you can foresee or would like to happen.

I shall repeat this exercise in a slightly different way.

EXAMPLE OF CHILD'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM WRITER

THE VISIT

Draft I

AUSTRIA

The thing i rember the most is the head caretaker she was really naggy.

I why i rember her is because one day when i was about 4 i was

colouring in when we went out i

left it out and i got told off for

it. the second time i went the

caretaker was really nice. The other

thing i rember is the outdoor

swimming pool you could take a bed

float. the second time i went

every thing was exatly the same

apart form the head caretaker

outdoor swimming pool you could

take a bed float. The second time

I went every thing was exactly the

same apart form the head caretaker

EXAMPLE OF CHILDREN'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM WRITER

Draft I

Dear cheryl and tommy last night
it was bonfire night it was good
all the bonfire looked good the
flames were colored and big the
people were wathing and they likd
it
+ireworks so I will tell you about
it the bonfire looked like this
ther was old wood piled up high
ther was s broken chair and rubish
someone lit the bonfire it was
sparking and spiting with sharp
crakle noises the flames wer
coloured red and orange and yellow
blue and gold and the people smild
and stard and stood rond wathing

Paul Victoria Karen

EXAMPLE OF CHILDREN'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM 'WORDPLAY' AND 'WRITER'

Appendix 44
School Easter Service

Program
'Writer'

At the easter service there was a competition to write a letter about mums which 204 children entered but only 3 could win out o different age groups . a boy won for the juniors and 2 girls won for the lower end If you win you get a bunch of flowers for your mum. A man from the national provincial building society came and presented the prizes he was called Mr. bestford. the letter had to say why you think your mum is the very best mum. the letter had to be in by March 27th and the prizes got presnted on the 3rd of April.

jolly and everyone felt happy again.

There was a competition to write a letter about mums which 204 children entered but only 3 could win from

EXAMPLE OF CHILDREN'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM WRITER

Draft I

We are doing a project in school about safety , in the design club we were asked to invent something about road safety. We invented a road sign-post that could move down to the ground and up in the air. It was powered by underground cables. The sign-post had no signs on, but you could clip on lots of different sign-heads. For example in icy weather you could put a sign head on saying "BLACK ICE AHEAD".

Colin and Ian

would be powered by underground cables. The sign-post had no signs on, but you could clip on lots of different sign-heads. For example in icy weather you could put a sign head on saying "BLACK ICE AHEAD".

These are the things we would need, wire, poles, wood, glue, nails, paint, ruler, saw.

Colin and Ian

Writing Project
First Term's Co-ordinator's Report

Once the idea of a writing project had been discussed with the teachers, I set about the task of looking at ways of tackling the task, working with teachers who were unused to working in a team called for careful planning, not only in terms of classroom organisation, but brought into being the subject of relationships. I had to ask myself the following questions:- How would I figure in the classroom?... To lead? To listen? To support? All three at different times perhaps. Teachers must not feel I was there to judge but to support and research with them into what is effective practice.

How can we improve as a working team is a very important question? How far is the success of the team work in a school related to curriculum structure and progression in the school? Is the team work important? The climate had to be right before we moved forward.

Once relationships were established I felt we were in a position to think about the following questions which we must address,

What is good writing?

How do we achieve good writing?

Have we established writing for different purposes and different audiences?

Do we have to change our existing practices?

Where do we start?

Having had a number of team meetings a continual comment "there seems to be a total lack of imagination", "stories seem to be stilted and lack imagination".

Was there some reason for this?

- a) Were we using resources to best advantage?
- b) Were we using a variety of resources?
- c) Was the task matched to ability levels?
- d) Was vocabulary being extended?
- e) Was the task sufficiently stimulating?
- f) Did the room invite a lively imagination?

Therefore I felt that to look at stimuli and the use of resources would give teachers an insight into what strategies produced better quality writing. I wanted teachers to recognise that to produce writing of good quality a vehicle was needed to be established acting as a springboard.

I therefore proposed to the teachers that in the first term of our project we investigate

- 1) How we decide on the writing tasks we arrange for the children.
- 2) How do we initiate writing tasks.
- 3) What kinds of stimulus do we provide.
- 4) What use do we make of resources.

Angela Puddick

(Guidelines for Appraisal of Writing Project)

1. What was the writing task/experience?

To describe the sights, sounds & smells of a fair ground which will set the scene for an exciting incident/chase/robbery to be developed in a further lesson.

2. What was the specific objective(s) for your observation?

Were the children able to produce good descriptive vocabulary.

3. What organisation was involved before initiating the task?

Finding suitable V.A. as stimuli.

4. How was the task initiated?

Discussion with the whole class - what were their memories of a visit to a fair? Sounds, smells & sights.

5. What resources were used and how were they implemented?

A large illustration of a fair-ground.
Stream organ music from the introduction of the T.V. programme 'Look & Read'.

Pencil & paper.

Work with a group followed with the children making notes before actually writing individually.

6. What were the children's reactions to the task?

Enthusiastic & interested.

7. What problems/difficulties arose during the lesson?

constant appeals for 'spelling'
Dissuading chn. from writing a lengthy introduction.

8. What was actually produced?

In most cases a fairly well written paragraph
but with punctuation missing or a plethora of
full-stops in the wrong places.

9. What was your assessment of the writing experience and
children's/teacher's interaction?

It was a stimulating subject, enjoyed by the children
but they tried to go too far ahead into the story instead
of concentrating on the initial descriptive scene-setting.

10. Comment on any future development that you can foresee or
would like to happen.

This theme will continue next week.

The children in the control group will work together on
the development of the story using W.P.

If requests for spelling are a
problem could they in did they
lead to focus on this in a
first draft? * strategies for finding the words

We began by looking at the whole process of writing and asking ourselves such questions as:-

Why do children write?

For whom do they write?

What does writing development mean?

We were concerned with our understanding of writing development, and its relationship with experience, continuity and progression. We felt we needed to be aware of the stages of development that children pass through to match the work we gave to them and to present meaningful writing situations. We felt it essential that we, as sensitive teachers are aware that a child's use of language is indicative of a stage of development, we must match our expectations to that level and not 'force feed' them, or allow work to be stilted and boring. A child's use and understanding of spoken language does not, in fact, help towards an appreciation of the senses. Perhaps this is why staff were disappointed with some of the children's written accounts as compared with their verbal accounts.

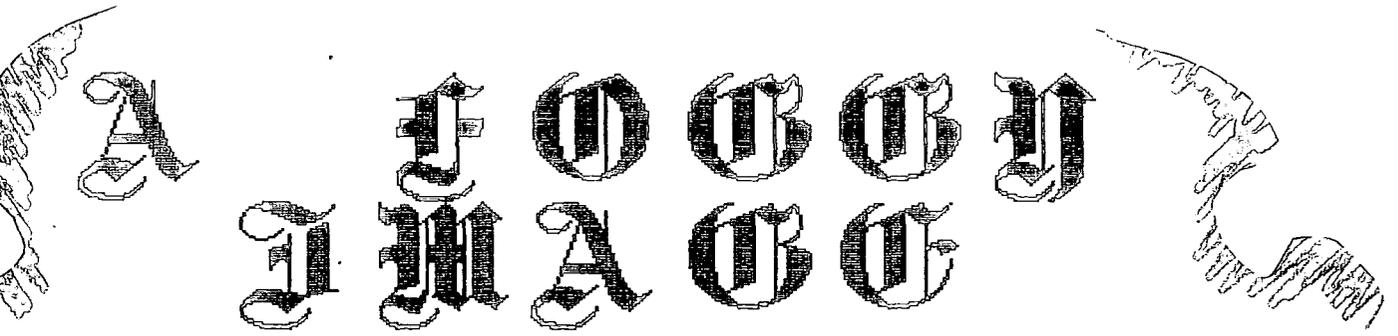
Supportive strategies are vital if the child is to be gently moved along the line of development. Meaningful intervention has a vital part to play. There is nothing to be gained by rushing headlong into writing tasks which create failure for children.

A considerable amount of time was given to the identification of strategies for intervention. We wanted to heighten the awareness of children learning to: alter, adjust, revise, re-write, reshape, cut and supplement to achieve greater quality and effectiveness. However, we had to decide on the purpose of 'alteration', why is reviewing and re-writing important? what did we want the children to gain? We felt that children (and teachers!) had to be helped to see that the success of a piece of writing must be judged on its effectiveness in relation to the purpose of the writing. Children had to be helped to acquire ways of looking at their writing and adjusting it until the purpose was achieved, not until a page of writing had been achieved.

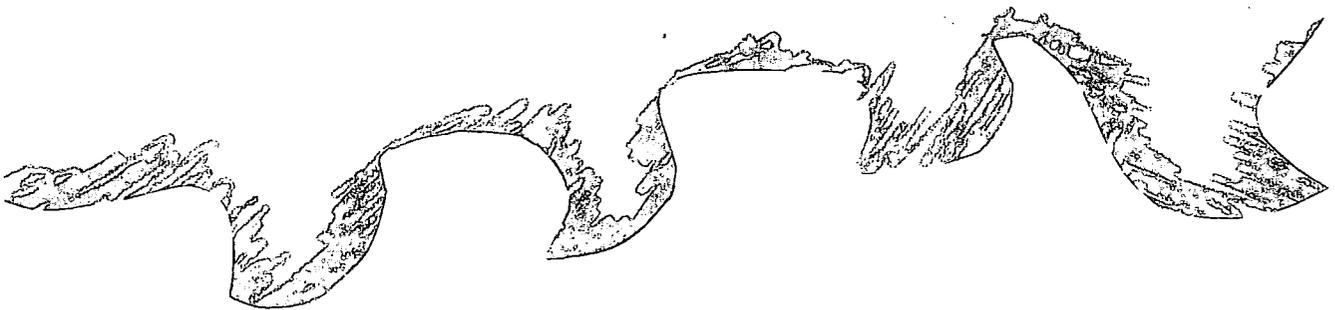
We decided that our next stage of research should be the provision of writing experiences to serve different purposes, with consideration to children's development and the fulfilment of writing purpose.

Angela Puddick

EXAMPLE OF CHILDREN'S WORK FROM RESEARCH GROUP II
USE OF PROGRAM 'PENDOWN'



It is silent except the gentle lapping
 the sea against our ship.
 I hear a foghorn in the distance.
 A deep moan sounds like the
 howling of the sea dog.
 It is so quiet that we can hear sounds
 like the creak of the ship that normally
 are lost in the sound of the sea.
 The swirling fog changes shape
 frequently.
 First a great howling grey wolf then a
 mermaid in a misty swirl.
 A loud shrill cry from the crows nest
 echoes in the damp cold morning air
 Is it a night?
 For everything is the same in the fog.



THE WORLD TODAY

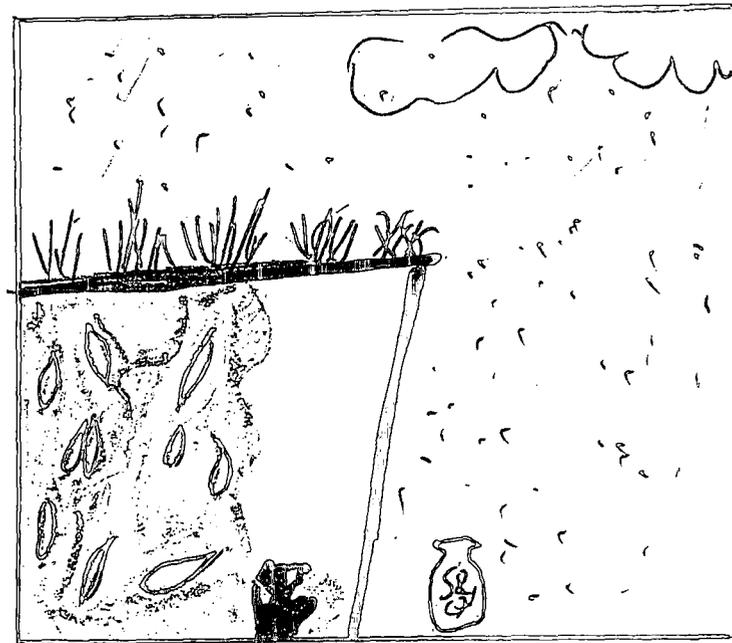
48P

3.6.2024

THE BIG DAY

Yest
went
The
off.
gray
cont
in t
unkn
it
spe
of
beh
grat
shut

YESTERDAY IT HAPPENED. YES IT REALLY HAPPENED. THERE WAS A STORM IN ETHIOPIA. BUT THE PEOPLE WERE WEAK. THEY COULD NOT DANCE FOR JOY. OVER FIVE HUNDRED PEOPLE IN ETHIOPIA DIED TRYING TO GET OUT IN THE RAIN. THIS MORNING THE FIRST BUDS FOR 35 YEARS HAVE BEEN SEEN.



LUXURY HOLIDAYS IN EGYPT

EXAMPLES OF CHILDREN'S WORK FROM RESEARCH GROUP 2
USE OF PROGRAM 'FRONTPAGE'

Writing Project
Third Term's Co-ordinator's Report

Appendix 51
Research Group 2.

As we moved into the third term we explored the ways and means by which children should be encouraged to write. It was recognised that writing experiences in school should provide a combination of activities supporting different styles of writing, and that children should acquire the skills and understanding to use the styles effectively.

Over the last term we have investigated ways of supporting literary, factual, and personal writing styles. Factual writing opportunities were found to be the easier to provide, control and develop. Literary writing was an area that most teachers were familiar with but needed expanding beyond story writing. Personal writing was found to be difficult for most teachers. Maybe this demanded the most knowledge of what children thought and what they were able to relate. Getting children to know what they think and say what they think proved to be very difficult, (has this implications for other areas of the curriculum?)

Teachers should always be aware of the right stimulus for the writing to take place. Children should write about things they know and can relate to, they should understand the purpose of the writing and then be helped to develop their writing to achieve the purpose. Opportunities for children to discuss with other children and adults before and as they write were found to be important to many writing tasks. Although in some cases children need to be alone to explore and review for themselves in respect of their own writing. Situations for writing can arise from most of the curriculum areas, and when this happens, the different styles of writing are more likely to become obvious to the children.

Teacher intervention is important if children are to acquire critical skills and learn to judge the effectiveness of their writing. Group writing activities were found to be helpful in encouraging children to look at their own and other people's writing critically. Teachers need to be aware of the development of writing skills and the demands of different writing styles.

Children do not acquire skills by being told of them they can only gain them through relevant experiences. Whatever the writing experience being presented the actual writing process will be the same. Children will need to prepare the content, structure it and review it to see if it meets the purpose.

The distribution and presentation of the work is important if children are to feel their writing is worthwhile. Writing should not be confined to children's books or solely to the child and the teacher. Writing is to be shared with others, it is to be talked about and read.

Writing is not something that just develops through practise, it needs teaching in a positive and structured way. It can be learned to be used and used to learn.

Angela Ruddick

Aims

- 1) To produce a well formed and legible continuous script which will be an efficient aid in future writing for life purposes and learning processes.
- 2) To encourage the child's "thinking process to explore, sort and decide on the best words for his thinking and the correct setting down for these words and their sequences.
- 3) To use language in a creative manner and encourage self expression of emotions as well as thoughts.
- 4) To develop clear notions of the roles of writing and of their appropriateness.
- 5) The children should feel that the point of writing should be a useful relationship to the child's experiences, interests, activities in school as well as out of school.
- 6) Writing as a mode of communication in both its creative and letter writing activity.

Objectives - Lower school

- 1) To encourage the correct way to hold a pencil and establish left to right orientation.
- 2) Initial writing patterns to encourage correct use of pencil.
- 3) Alphabet and number to trace.
- 4) Tracing and copying names from cards.
- 5) Tracing and copying words and later sentences underneath teachers writing.
- 6) Copying words, then simple sentences from the blackboard
- 7) Beginning to write own news and stories.
- 8) Individual dictionaries to help written work.
- 9) Writing accounts of class or individual activities.
- 10) Use of talking dictionary (language master) to help written work.
- 11) Word lists.

(Visual perception computer programs)

Objectives - Upper School

- 1) Continue and development of lower school work.
- 2) Spelling and dictionary work - studying the structure of words, meanings and use of appropriate words in own writing.
- 3) Comprehension exercises at level reached.
- 4) Writing formation - Nelson Handwriting Books.
- 5) Grammar - oral and written work using a selection of class books according to child's ability - also grammar that occurs from written work.
- 6) Retelling stories by the teacher - fiction or non-fiction.
- 7) Writing own stories, serials, free verse, poetry or plays.
- 8) Making story books for other children to read.
- 9) Factual notes for study work.
- 10) News sheets, diaries, reports of observations.

The opportunity to develop neatness and care in the presentation of written work.

BIBLIOGRAPHY

Adams, A., (1983), Exploring English with Microcomputers, Leicester: Tecmedia

Adsett, N. E., (1985), Uses of Microcomputers in Teaching and Learning, London: University of London Institute of Education Library

Adelman, C. and Alexander, R. J., (1982), The self-evaluating Institution: Practice and Principles in the Management of Educational Change, London and New York: Methuen

A.P.U. (Assessment Performance Unit), (1981), Language Performance in Schools Primary Survey Report No. 1, London: HMSO

A.P.U., (1982), Primary Survey Report No.2, London: HMSO

Armstrong, B., (March 1985), Rediscovering the Art of Writing, U.S.A.: Washington Post

Aston, M., and Hope, M., Computers in Education, London: Times Educational Supplement Extra, 13.3.87

AUCBE, (The Advisory Unit for Computer Based Education), (1985), Change in Perspective, Hatfield: AUCBE

Beard, R., (1984), Children's Writing in the Primary School, London: Hodder and Stoughton

Becker, H. J., How Schools Use Microcomputers, Baltimore, USA: Report published in Classroom Computer Learning, Number 12

Bell, J., et al, (1984), Conducting small-scale investigations in Education Management, London: Harper Educational Series.

Bennett, N., (1976), Teaching Styles and Pupil Progress, London: London Open Books Publishing Ltd.

Bereiter, C., and Scardamalia, M., (1982), From conversation to composition: the role of instruction in a developmental process, in Glaser, R., (ed) Advances in Instructional Psychology, Vol 2, London: Lawrence Erlbaum Associates

Bleach, P., (May 1985), The Use of Microcomputers in Primary Schools, A survey conducted through The Reading and Language Centre, University of Reading, Berkshire, London: published in the Times Educational Supplement

Bloom, B.S., et al, (1956), Taxonomy Of Educational Objectives, New York:McKay Co. Inc.

Bretton Language Development Unit, (1981), A Policy for Writers 9-12, Wakefield : Bretton Hall College of Higher Education

Bretton Language Development Unit, (1981), Stories for Personal Experience, Wakefield: Bretton Hall College of Higher Education

Britton, J., et al, (1975), The Development of Writing Abilities, Schools Research Studies, London: Macmillan Education

Brumfit, C., et al, (1985), Computers in English Language Teaching, from British Council ELT Documents, London: Pergamon Press

Bruner, J., (1966), Towards a Theory of Instruction, London: Harvard University Press

Cleveland Educational Computing Centre, (1988), Thematic Review, Cleveland: CECC

Chandler, D., et al, (1983), Exploring English with Microcomputers, London: Council for Educational Technology in association with The national Association for the Teachers of English

Chen, M., and Paisley, W., (eds), (1985), Children and Microcomputers, London: Sage Publications

Clegg, A., (ed), The Excitement of Writing, London: Chatto and Windus

Daines, D., (1984), Databases in the Classroom, London: Castle House Publications

Department of Trade and Industry, (1980), paper Microelectronics the New Technology, London: DTI

DES., (1954), Language: Some suggestions for Teachers of English and Others, London: HMSO

DES., (1967), Children and their Primary Schools (The Plowden Report), London: HMSO

DES., (1975), A Language for Life, (The Bullock Report, London:HMSO

DES., (1977), Education in Schools, A Consultative Document (Green Paper), London: HMSO

DES., (1985), The Curriculum for 5 -16, Curriculum Matters, an HMI Series, London: HMSO

Dewey, J., (1975), The Child and the Curriculum, London: Crook Helm

Dewey, J., (1916), Democracy and Education, New York: Macmillan

- Dunkin, M., and Biddle, B., (eds), (1974), The Study of Teaching, New York: University Press of America
- Dutton, P., et al, (1984), All Change, London: MEP.
- Ellingham, D.W.W., (1984), Handbook of Primary Education and Computing, London: Castle House Publications Ltd.
- England, J., (1983), The Microcomputer, Curriculum Inovation and the Primary School. A consideration of some of the issues involved, London: University of London Institute of Education Library
- Evans, C., (1979), The Mighty Micro, London: Gollancz
- Finlayson, H., (Sept. 1983), Paper presented at the British LOGO Users Group Conference, Loughborough.
- Fletcher, T.J., HMI, (1983), Microcomputers and Mathematics in Schools, (Discussion Paper), London: HMSO
- Fluegelman, A., and Hewes J.J., (1983), Writing in the Computer Age, LONDON: Century Publishing
- Forester, T., (1980), The Microelectronics Revolution, London: Basil Blackwell
- Francis, H., (1984), Minds of their Own, (An Inaugral Lecture delivered at the University of London Institute, June 84
- Frase, L.T., (1984), Knowledge, Information, and Action: Requirements for Automated Writing Instruction, USA: Journal of Computer-Based Instruction
- Freedman, A., Pringle, I., and Yalden, J., (eds), (1983), Learning to Write: First Language/Second Language, Ottawa, Canada: (Selected papers from th 1979 CCTE Conference
- Fullen, M., (1982), The Meaning of Educational Change, Toronto, Canada: The Ontario Institute for Studies in Education Press
- Galton, M., and Simon, B., (1980), Progress and performance in the Primary Classroom, London: Routledge and Keegan Paul,
- Galton, M., Simon, B., and Croll, P., (1980), Inside the Primary Classroom, London: Routledge and Keegan Paul
- Gray, T., (1983), Language Work and the Computer, in Micro- Primer Reader, Leicestershire: CET, Tecmedia
- Graves, D. W., (1983), Writing: Teachers and Children at Work, London: Heinemann Education,

Great Britain, Department of Education and Science, (1985), Quality in Schools, Evaluation and Education, London: HMSO

Goddard, N., (1974), Literacy Language - Experience Approaches, London: Macmillan Education Ltd.

Golby, (1978), Curriculum Design, London: Crook Helm

Gordon, P., and Lawton, D., (1978), Curriculum Change in the Nineteenth and Twentieth Centuries, London: Hodder and Stoughton

Gosling, W. E., (1980), Kingdom of Sand, London: Council for Educational Technology

Gronlund, N.E., (1970), Stating Behavioural Objectives for Classroom Instruction, London: Collier· Macmillan

Hadow, (1931), Hadow Report, Report of the Consultative Committee on the Primary School, London: HMSO

Harpin, W., (1976), The Second "R", London: Unwin

Harris, J., and Wilkinson, J., (1986), Reading Children's Writing, a Linguistic View, London: Allen and Unwin

Hartley, (1985), The Design and Evaluation of an Adaptive Teaching System, USA: International Journal of Man Machine Studies no 5,

Hirst, P., (1974), Knowledge and the Curriculum, London: Routledge and Keegan Paul Ltd.

Hodges, M., (1985), Can Data Handling help Children form Concepts in the Humanities Subjects?, Primary Contact Issue 3, Manchester, Didsbury School of Education

Hopkin, D., (1985), A Teacher's Guide to Classroom Research, Great Britain: Open University Press

Howe, J., (1981), Teaching Handicapped Children to Read: A Computer Based Approach, Amsterdam: North Holland

Howe, J., O'Shea, T., Plane, F., Inglis, R., (1982), Learning Mathematics Through LOGO Programming. The Transition from Laboratory to Classroom, Scotland: University of Edinburgh, Working Papers no 118.

Johnson, D. C., and Cox, M.J., (1985), The Uptake and Usage of Microcomputers in Primary Schools, London: Kings College London

Jones, R., (1982), Microcomputers Their Uses in Primary Schools, London: Council for Educational Technology

Keith, G., (1983), New machines for old machines, in Exploring English with Microcomputers, (ed) Chandler, D., Leicester: Tecmedia

Kress, G., (1982), Learning to Write, London: Routledge and Keegan Paul Ltd.

Large, P., (1980), The Micro Revolution, London: Pan

Liddle, A.J., (1983), Monitoring and Assessing Children's Conceptual Development, Primary Contact Issue 2, Manchester: Didsbury School of Education

Macintosh, H. G., (1974), Techniques and Problems of Assessment: a Practical Handbook for Teachers, London: Arnold

Mason, E., (1970), Collaborative Learning, London: Ward Lock Educational

M.E.P., (1982-84), Information Processing - project, Manchester: Manchester Teachers' Centre and Didsbury School Of Education of Manchester Polytechnic

Midwinter, E., (1975), Education and the Community, London: Allen and Unwin Ltd.

Morton-Williams, R., et al., (1968), Young School Leavers, Schools Council Enquiry 1, London: HMSO

Mullan, A. P., (1984), Children and Computers In the Classroom, London: Castle House Publications Ltd.

Musgrave, P. W., (1968), Society in Education in England since 1800, London: Methuen

Musgrove, F., and Taylor. P., (1969), Society and the Teacher's Role, London: Routledge and Keegan Paul Ltd.

Negus, M., Computers and Primary Science, Microscope 3, Northants.: Castlefield (Publishers) Ltd.

Newbolt Report, (1921), The Teaching Of English in England, London: HMSO

O'Shea, T., and Self, J., (1983), Learning and Teaching with Computers, Brighton: Harvest Press

Paisley, W., (1985), Children, New Media, and Microcomputers, in Children and Microcomputers, (eds) Chen, M., and Paisley, W., London: Sage Publications Ltd.

Papert, S., (1980), MINDSTORMS, Children Computers and Powerful Ideas, USA: Basic Books Inc.

Peacock, G., (1986), report-Using a Word processor in Two Schools, Microscope 19, Northants: Castlefield (Publishers) Ltd.

Piaget, J., (1926), Language and Thought of the Child, London: Routledge and Keegan Paul Ltd.

Raven, J., (1977), Education Values and Society: The Objectives of Education and the Nature and Development of Competance, London: H.K. Lewis

Raven, J., (1980), Parents, Teachers and Children, Edinburgh: Scottish Council for Research in Education

Rich, R. W., (1933), The training of teachers in England and Wales during the nineteenth century, Cambridge: University Park Press

Richardson, S. A., (1965), Interviewing: Its Forms and Functions, New York: Basic Books Inc.

Richmond, K. W., (1967), The Teaching Revolution, London: Methuen Co. Ltd.

Rosegrant, T., (1985), Using the Microcomputer as a Tool for Learning to Read and Write, Washington: Journal of Learning Disability, Vol 18 no 2.

Ross, A., (1982), Learning History with a Micro, Microscope 6, Northants: Castlefield (Publishers) Ltd.

Ross, A., (1983), Learning Social Studies with the Help of a Microcomputer, London: Heinemann Education

Rouse, M. D., and Evans, P.L.C. (1985) Drill and Practise computer programs do improve performance in arithmetic -- or do they?, London: University of London, Institute of Education Library

Schools Council, (1983), Primary Practice: a sequel to The Practical Curriculum, London: Methuen Educational

Simmons, H., (1981), Conversation Piece: The Practice of Interviewing in Case Study Research, (in Adelman. C. (ed) Uttering Muttering: Collecting Using and Reporting Talk for Social and Educational Research), London: Grant McIntyre

Smith, B. O., and Orlosky D. E., (eds), (1978), Curriculum Development: Issues and Insight, Chicago, USA: Rand McNally College

Smith, F., (1982), Writing and the Writer, London: Heinemann Educational Books Ltd.

Skillbeck, M., (1984), Evaluating the Curriculum in the Eighties, London: Hodder and Stoughton

Stenhouse, L., (1975), An Introduction to Curriculum Research and Development, London: Heinemann

Stonier, T., (1980), The Wealth of Information, London: Thames Methuen

Stonier, T., (1982), The impact of microprocessors on employment, Micro Primer Reader, Loughborough: Tecmedia

Thornton, G., (1980), Teaching Writing, London: E.J.Arnold Ltd.

Toffler, A., (1970), Future Shock, London: Pan

Toffler, A., (1971), The Third Wave, London: Pan

Virgo, P., (1981), Learning for Change, Gloucester: Bow Publications Ltd., Orchard and Ind. Ltd.

Wake, B., (1984), Deetree, a Viewdata database - a potted history, Microscope Information Handling Special Edition, Northants: Castlefield (Publishers) Ltd.

Weiner, E., and Weiner L., (1984), Microcomputer Assistance for Language Problems, USA: Journal of Learning Disabilities, Number 6, Vol 17.

Wharry, D., (1983), Science Using Computers, Primary Contact Issue 2, Manchester: Didsbury School of Education, Manchester Polytechnic

White, J., (1986), The Assessment of Writing: Pupils aged 11 and 15, Windsor: NFER- Nelson

Woods, B., (1981), Future Life, Loughborough: Micro-Primer Reader, Tecmedia

Wragg, E. C., (1984), Classroom Teaching Skills, London: Crook Helm Nichols Publishing Company

