

AN EVALUATION OF THE IMPLEMENTATION OF THE "SCHOOL ENVIRONMENTAL
POLICY AND MANAGEMENT PLAN" IN SCHOOLS IN MPUMALANGA

by

ALETHA MARIA DE LANGE

submitted in accordance with the requirements
for the degree of

DOCTOR OF EDUCATION

in the subject

DIDACTICS

at the

UNIVERSITY OF SOUTH AFRICA

PROMOTER: PROF C P LOUBSER

JUNE 2004

“ Schools can contribute to making the environment everybody’s business by being active learning environments... schools and learners can move to action to address and report on the many problems ...” (Asmal 2000:1).

dedicated to Riaan and Anri

ACKNOWLEDGEMENTS

- Professor C.P. Loubser for his guidance and continuous support.
- Sappi and Selati for sponsoring the printing of the Mpumalanga edition of the school environmental policy and management plan.
- Department of Education (Mpumalanga) for their support of the development and implementation of school environmental policies and management plans in school in Mpumalanga.
- All officials in the Department of Agriculture, Conservation and Environment (Mpumalanga), who contributed to the success of the implementation of school environmental policies and management plans in Mpumalanga.
- All schools, principals, teachers and pupils from schools in Mpumalanga who made valuable contributions for this research.

Opinions and conclusions expressed in this research are those of the author, and should not be attributed to any of the institutions acknowledged above.

SUMMARY

Environmental education is a response to the environmental crisis. Due to the diversity of the environment, environmental education processes face a challenge, locally and globally, because it should respond to the diversity of local environmental issues, and contribute towards the addressing of local environmental issues. It is therefore important that environmental education programs focus on local environmental issues, and in the analysis there of accommodates investigative, problem solving and environmental action skills, because such programs proof to be more successful.

The introduction of environmental education into formal education can only be successful within a structure that is conducive to a holistic integrated approach and accommodates investigative, problem solving and environmental action skills.

Research however proves that within the school context, environmental education processes, as well as the addressing of local environmental issues, is fragmented.

The development of a school environmental policy and management plan can provide a valuable framework for a holistic approach to the organization of environmental education processes in schools, that is integrated with the

curriculum, resulting in the effective management of resources and the addressing of local environmental issues.

Through this research, the implementation of school environmental policies and management plans in Mpumalanga was evaluated, in terms of the integration of environmental education processes in the curriculum, the organization of environmental education processes in schools, the effective management of resources in schools, and the addressing of local environmental issues.

The conclusion was drawn that the implementation of school environmental policies and management plans contributes towards curriculum integration of environmental education, the organization of environmental education processes, the management of resources and the addressing of environmental issues in schools. The more exposure a school gets in terms of implementation of school environmental policies and management plans the higher the achievement in the mentioned areas. It can therefore be deducted that exposure to the implementation of school environmental policies and management plans will lead to the integration of the environment in the curriculum, the organization of environmental education processes in schools, the management of resources and the addressing of environmental issues in schools.

Key terms:

Environmental education; Environmental policy; Environmental issues;
Environmental management; Environmental integration; Education for
sustainability; School environmental policy; Curriculum development; Curriculum
integration; Resource management.

AN EVALUATION OF THE IMPLEMENTATION OF THE “SCHOOL ENVIRONMENTAL POLICY AND MANAGEMENT PLAN” IN SCHOOLS IN MPUMALANGA

CONTENTS:

Acknowledgements

Summary

CHAPTER 1: INTRODUCTION

1.1	Background to the study	1
1.2	Problem statement and purpose of the research	7
1.3	Research methodology	10
1.3.1	Literature search	10
1.3.2	Document development	10
1.3.3	Competition	11
1.3.4	Workshops	12
1.3.5	Analysis of reports	12
1.3.6	Research method	12
1.3.7	Selection of schools	14
1.4	Value/Importance of the research	15
1.5	Definition of concepts	20
1.5.1	Acronyms and abbreviations	23
1.6	Research programme	25

CHAPTER 2: LITERATURE REVIEW

2.1	International perspectives	27
2.1.1	Introduction	27
2.1.2	Historical background	30
2.1.3	A new focus on environmental education	35
2.1.4	“Active involvement”	41
2.2	National perspectives	44
2.2.1	Introduction	44
2.2.2	Historical background	45
2.2.2.1	Before 1972	45
2.2.2.2	1972-1988	58
2.2.2.3	1989-1994	52
2.2.2.4	1994 onwards	53
2.2.3	A new focus	57
2.2.3.1	Broadening of the perception on environment	57
2.2.3.2	Introduction of environmental education into formal education	60
2.2.3.3	NEEP	62
2.2.3.4	Active participation in learning	68

CHAPTER 3: LITERATURE REVIEW

3.1	Introduction	74
3.2	Influence of perspectives on education on environmental education:	74
3.2.1	Influence of Behaviorist perspectives	74
3.2.1.1	Teaching methods	77
3.2.1.2	Models of behaviorism	79
3.2.1.3	Application of the behaviorist perspective to this study	80
3.2.2	Influence of the Experiential Learning Perspective (ELP)	81

3.2.2.1 Teaching methods	84
3.2.2.2 Models	85
3.2.2.3 Application of the ELP to this study	86
3.2.3 Influence of the liberal humanist perspective	86
3.2.3.1 Teaching methods	90
3.2.3.2 Application of the liberal humanist perspective to this study	90
3.2.4 Influence of the constructivist perspective	90
3.2.4.1 Teaching methods	95
3.2.4.2 Models	97
3.2.4.3 Application of the constructivist perspective to this study	99
3.2.5 Influence of the socially critical perspective	100
3.2.5.1 Teaching methods	103
3.2.5.2 Models	105
3.2.5.3 Application of the socially critical perspective to this study	106
3.3 Conclusion	107

CHAPTER 4: RESEARCH METHODOLOGY

4.1 Introduction	109
4.2 Research methodology	110
4.2.1 Research design	111
4.2.2 Preparation for data collection	113
4.2.2.1 Document development	113
4.2.2.2 Competition	115
4.2.2.3 Workshops	116
4.2.3 The sampling plan	120
4.2.4 Data collection	120

4.2.5	Data analysis	121
4.2.5.1	Coding procedures	122
4.2.5.2	Description of data/measuring instruments	125
4.3	Conclusion	125

CHAPTER 5: ANALYSIS AND DISCUSSION OF RESULTS

5.1	Curriculum integration	126
5.1.1	Analysis of results of curriculum integration	131
5.1.2	Discussion of results-curriculum integration	139
5.2	Organisation of environmental education processes	142
5.2.1	Analysis of results for organization of environmental education processes	143
5.2.2	Discussion of results – organization of environmental education processes	148

CHAPTER 6: ANALYSIS AND DISCUSSION OF RESULTS

6.1	Management of resources	151
6.1.1	Analysis of results for management of resources	152
6.1.2	Discussion of results – management of resources	159
6.2	Addressing of environmental issues through the development and implementation of solutions	162
6.2.1	Analysis of the results for addressing of environmental issues	166
6.2.2	Discussion of results – addressing of environmental issues	172

CHAPTER 7: CONCLUSION

7.1	Introduction	176
7.2	Summary of research results	177
7.3	Hypothesis confirmation	180
7.4	Deductions	181
7.5	Limitations of this research, and suggestions for future research	182
7.6	Recommendations	183
7.6.1	Documentation	183
7.6.2	Capacity building	184
7.6.3	Poverty alleviation potential	185
7.7	Conclusion	185
	APPENDIX A:	187
	APPENDIX B:	188
	BIBLIOGRAPHY	190
	LIST OF FIGURES:	
	Figure 3.1 The Hines model of responsible behavior	80
	Figure 3.2 Dialogue – Encounter – Reflection	85
	Figure 3.3 A model for developing and sequencing education for sustainability	98
	Figure 3.4 Action research spiral	105
	LIST OF TABLES:	

Table 5.1	Per region results in terms of curriculum integration	132
Table 5.2	Per type of school results in terms of curriculum integration	133
Table 5.3	Subcategories for curriculum integration	133
Table 5.4	Per region results in terms of organization of environmental education processes	144
Table 5.5	Per type of school results in terms of organization of environmental education processes	144
Table 6.1	Per region results in terms of management of resources	153
Table 6.2	Per type of school results in terms of management of resources	153
Table 6.3	Subcategories for management of resources	154
Table 6.4	Per region results in terms of addressing of environmental issues	167
Table 6.5	Per type of school results in terms of addressing of environmental issues	167
Table 6.6	Subcategories for addressing of environmental issues	168