

LEARNER'S NAME

BOOKWALTER **WILLIAM** **KEITH**

(LAST) (FIRST) (MIDDLE MAIDEN)

July 5, 1951

(BIRTHDATE)

289-44-1205

(SOCIAL SECURITY NUMBER)

AUTORIZATION

REGISTER

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DEGREE AWARDED

Degree Conferred: **Doctor of Philosophy**

Area of Specialization: **Human Development with Specialization in Cognitive Development and Education**

Project Demonstrating Excellence (dissertation) Title: **"The Development of Four Logical Structures in a Sample of Colombian Children"**

RECORD OF ATTENDANCE

Matriculated: **December 2, 1994** Entry Colloquium: **Cincinnati, OH**

Certification: **July 29, 1995** Graduation: **December 2-11, 1994**

(Admission to Doctoral Candidacy) **July 31, 1998**

DOCTORAL COMMITTEE

~~William Keith Bookwalter~~ (The Learner serves as chairperson)

~~Mary T. Sheerin, Ed.D. (Core Faculty)~~

~~Darrell G. Phillips, Ph.D.; George Bondra, Ed.D. (Adjunct Faculty)~~

~~Annie J. Adams, Ph.D.; Larry D. Etter, M.S. (Peers)~~

Second Reader: **Barry Heermann, Ph.D.**

PREVIOUS DEGREES EARNED

National University San Diego, CA	M.S.	Educational Administration	1982
Ohio State University Columbus, OH	B.S.	Secondary Education	1973

Official Transcript Summary

The Union Institute

The Graduate School

LEARNER:

William Keith Bookwalter

COURSE OF STUDY	Equiv. Credit		COURSE OF STUDY	Equiv. Credit
Title	Hours		Title	Hours
INTERDISCIPLINARY STUDIES (RESIDENCY REQUIREMENTS)			PROJECT DEMONSTRATING EXCELLENCE (DISSERTATION)	
INTS 700: Colloquium in Interdisciplinary Studies and Research	6		RSCH 880: The Theories and Research of Jean Piaget	5
INTS 760: Peer Days: Issues in Higher Education	5		RSCH 881: Critique and Assessment of the Piagetian Paradigm	5
INTS 780: Seminar: African Americans and Native Americans: Explorations in Narrative, History, and Place	3		RSCH 882: Quantitative and Qualitative Research Methods	5
INTS 781: Seminar: The Monastic Tradition, Contemplative and the Spirit of Organization	3		RSCH 900: Project Demonstrating Excellence (Dissertation)	15
INTS 782: Seminar: Story, Memoir, and Personal Narrative	3		TOTAL SEMESTER CREDIT HOURS:	93
DIRECTED STUDIES, READINGS, AND EXPERIENCES (NEW LEARNING)			NOTE: The Union Institute has adopted a new course numbering system/transcript option for graduate school learners. Thus, course numbers and/or titles on the final official transcript may differ from any previously issued interim transcript.	
DSRE 710: Adult Learning and Development	3			
DSRE 711: The Biological Underpinnings of Human Development	3			
DSRE 712: <i>dap</i> Institute: A Developmental, Piagetian Approach to Math and Science Instruction	4			
DSRE 713: The Ecology of Consciousness, Attention, and Memory	3			
DSRE 714: Learning Styles	3			
DSRE 715: A Survey of Theories of Development	3			
INTERNSHIPS				
INTP 790: Staff Development: The Reciprocal Teaching/Reading Process and the Writing Process	12			
INTP 791: "Sciencing" Center for the Development of Logical Thinking	12			

The equivalent credit hours are calculated according the following formula. Each quarter hour represents a minimum of thirty hours of directed study activity; one semester hour equals at least forty-five hours of directed study activity. These activities may include relevant courses, directed studies, independent studies and readings, and/or professorial contacts that directly relate to each particular area of study contained in this transcript.

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COURSE OF STUDY - NARRATIVE DESCRIPTION

INTERDISCIPLINARY STUDIES (RESIDENCY REQUIREMENTS)

INTS 700: COLLOQUIUM IN INTERDISCIPLINARY STUDIES AND RESEARCH

A ten-day residential seminar for the presentation and clarification of The Union Institute's process of self-directed doctoral study, critical analysis of program proposals, in-depth discussion with Core Faculty and Peers, and review of various research methodologies and criteria for determining mastery of the field.

INTS 760: PEER DAYS: ISSUES IN HIGHER EDUCATION

Ten, eight-hour Peer Study Days related to issues in higher education. Learning methods included presentations, practical experiences, readings, and discussions. Convened and attended by Peers in The Union Institute Graduate College.

INTS 780: SEMINAR: AFRICAN AMERICANS AND NATIVE AMERICANS: EXPLORATION IN NARRATIVE, HISTORY, AND PLACE

A seminar that examined the historical dimensions of African/Native American contact, the factors that determine current interactions and visions of the two populations, the authentic voices of Red/Black communities, and new ways of perceiving differences thereby establishing new subjective centers of analysis.

INTS 781: SEMINAR: THE MONASTIC TRADITION, CONTEMPLATIVE, AND THE SPIRIT OF ORGANIZATION

A seminar at the Trappist Monastery in Bardstown, Kentucky that explored the intersection of spirituality and organization development. Experiences of the contemplative religious life were combined with the formal study and simulative applications of an organizational team building model that places spirit at the heart of its processes.

INTS 782: SEMINAR: STORY, MEMOIR, AND PERSONAL NARRATIVE

A seminar that analyzed the role of stories in shaping, preserving, and transmitting cultures, as well as in defining personal identities. Fields drawn upon included literary and cultural criticism, rhetoric, cultural anthropology, cognitive psychology, linguistics, history, and organizational studies. Peer presentation and critical analysis.

DIRECTED STUDIES, READINGS, AND EXPERIENCES (NEW LEARNING)

DSRE 710: ADULT LEARNING AND DEVELOPMENT

An in-depth study of the theories and practice of adult learning and development; women's development of self, voice, and mind; and a developmental approach to promoting adult growth in school settings.

DSRE 711: THE BIOLOGICAL UNDERPINNINGS OF HUMAN DEVELOPMENT

A study to identify the physical and biological elements that affect human development and learning. Areas of investigation included genetics, neurobiology, nutrition, brain-based research on learning, the biological foundations of multiple intelligence theory, and the relationship of ecology and human health.

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COURSE OF STUDY - NARRATIVE DESCRIPTION

DSRE 712: *dap* INSTITUTE: A DEVELOPMENTAL, PIAGETIAN APPROACH TO MATH AND SCIENCE INSTRUCTION

In-depth training in the Developmental Activities Program (*dap*), a research-based, Piagetian, hands-on, integrated, individualized math/science program for pre-school thru grade 3 including the study of developmental sequences, practice in questioning and interaction techniques, classroom management, evaluation of student progress via clinical interviews, selection of appropriate material, and interpretation of research results.

DSRE 713: THE ECOLOGY OF CONSCIOUSNESS, ATTENTION, AND MEMORY

An in-depth study of selected theories of consciousness representative of physical, psychophysical, and physical/psycho-spiritual paradigms; theories of attention and memory; and theories of metacognition in relation to learning competence.

DSRE 714: LEARNING STYLES

Forty hours of workshop sessions and an in-depth study of the Dunn and Dunn Learning Styles Model that included a review of the research base and the design of individualized activities, materials, and classroom environment.

DSRE 715: A SURVEY OF THEORIES OF DEVELOPMENT

A study and analysis of the major, comprehensive theories/views of human development and various conceptualizations of human growth, evolution, maturation, socialization, language acquisition, cognition, moral reasoning, motivation, and learning.

INTERNSHIPS

INTP 790: STAFF DEVELOPMENT: THE RECIPROCAL TEACHING/READING PROCESS AND THE WRITING PROCESS

A fourteen-month internship in staff development that involved the teaching of the reciprocal teaching/reading process and the writing process to elementary students, secondary students, and faculty members.

INTP 791: "SCIENCING" CENTER FOR THE DEVELOPMENT OF LOGICAL THINKING

A nine-month internship that involved the organization and operation of an elementary/middle school science laboratory aimed at the development of logical thinking through an individualized program of hands-on exploration and experimentation.

PROJECT DEMONSTRATING EXCELLENCE (DISSERTATION)

RSCH 880: THE THEORIES AND RESEARCH OF JEAN PIAGET

Major works by Jean Piaget and about Piaget's model of the intellectual development of children were studied in depth.

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COURSE OF STUDY - NARRATIVE DESCRIPTION

RSCH 881: CRITIQUE AND ASSESSMENT OF THE PIAGETIAN PARADIGM

An examination of the criticisms and lasting contributions of Piaget's model of intellectual development and their contextualization within a holistic educational paradigm.

RSCH 882: QUANTITATIVE AND QUALITATIVE RESEARCH METHODS

A study of historical, qualitative, descriptive, correlational, causal-comparative, and experimental methods for educational and social research. Data analyses included basic descriptive and inferential statistical methods with special attention given to non-parametric statistics for the behavioral sciences.

RSCH 900: PROJECT DEMONSTRATING EXCELLENCE (DISSERTATION)

See Abstract.

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PROJECT DEMONSTRATING EXCELLENCE (DISSERTATION)

ABSTRACT

"The Development of Four Logical Structures in a Sample of Colombian Children"

Colombian children (N=120) from three age levels ranging from 5.6 to 8.6 years were given four Piagetian tasks to determine differences in performance amongst subjects of the same age range, amongst different age ranges, and between males and females. Tasks measuring the pre-classificatory ability to make collections, class inclusion, ordering by length, and conservation of number were administered using the clinical interview method. Results indicated that on a pass/non-pass basis, amongst subjects of the same age range, there was no difference of performance on the Collections Task and only a small difference of performance on the Class Inclusion Task, the Ordering-by-Length Task, and the Conservation of Number Task. However, on the basis of a comparative analysis of score variation within each task, a wide range of performance was found amongst subjects of the same age range on all four tasks. Regarding differences in performance amongst the three age ranges (5.6-6.5 years; 6.6-7.5 years), results indicate that there was a statistically significant difference only on the Ordering-by-Length Task. Concerning differences in performance between males and females, it was found that, with the exception of a slightly superior performance by males on the Conservation of Number Task, there were no statistically significant differences. This study included a review of the critiques of the Piagetian model of cognitive development and an analysis of the components of the model recognized as constituting contributions which will probably have a lasting effect on the fields of developmental psychology and education.