

PEDAGOGY IN HIGHER EDUCATION

What can Cultural Historical Activity Theory (CHAT) contribute to the solution of the problems facing higher education today? This edited volume brings together the work of an international group of scholars and researchers to address this important question. Drawing on contemporary interpretations of CHAT, the contributors take on a wide scope of issues, ranging from pedagogy to administration and from teacher preparation to university outreach. An introduction presents the key principles of CHAT. Subsequent chapters address such issues as effective ways of teaching large undergraduate classes, providing support for struggling writers or for students with disabilities, opening up opportunities for students from historically underserved communities, preparing students for the professions, and building bridges between higher education and the wider community. Readers with an interest in higher education will encounter ideas in these chapters that will prompt them to rethink their role in preparing today's students for tomorrow's challenges.

Gordon Wells is Professor of Education Emeritus at the University of California, Santa Cruz. As an educator, his particular interest is in fostering dialogic inquiry as an approach to learning and teaching at all levels, based on the work of Vygotsky and other sociocultural theorists.

Anne Edwards is a professor of education at the University of Oxford, where she co-convenes the Oxford Centre for Sociocultural and Activity Theory Research. She has written extensively on cultural historical approaches to learning in the workplace and in formal education settings.

Pedagogy in Higher Education

A Cultural Historical Approach

Edited by

GORDON WELLS

University of California, Santa Cruz

ANNE EDWARDS

University of Oxford



CAMBRIDGE
UNIVERSITY PRESS

Cambridge University Press & Assessment
 978-1-107-01465-7 — Pedagogy in Higher Education
 Edited by Gordon Wells, Anne Edwards
 Frontmatter
[More Information](#)



CAMBRIDGE
UNIVERSITY PRESS

Shaftesbury Road, Cambridge CB2 8EA, United Kingdom

One Liberty Plaza, 20th Floor, New York, NY 10006, USA

477 Williamstown Road, Port Melbourne, VIC 3207, Australia

314–321, 3rd Floor, Plot 3, Splendor Forum, Jasola District Centre, New Delhi – 110025, India

103 Penang Road, #05–06/07, Visioncrest Commercial, Singapore 238467

Cambridge University Press is part of Cambridge University Press & Assessment,
 a department of the University of Cambridge.

We share the University's mission to contribute to society through the pursuit of
 education, learning and research at the highest international levels of excellence.

www.cambridge.org

Information on this title: www.cambridge.org/9781107014657

© Gordon Wells and Anne Edwards 2013

This publication is in copyright. Subject to statutory exception and to the provisions
 of relevant collective licensing agreements, no reproduction of any part may take
 place without the written permission of Cambridge University Press & Assessment.

First published 2013

First paperback edition 2015

A catalogue record for this publication is available from the British Library

Library of Congress Cataloging-in-Publication data

Pedagogy in higher education : a cultural historical approach / [edited by]

Gordon Wells, Anne Edwards.

pages cm

Includes bibliographical references and index.

ISBN 978-1-107-01465-7 (hardback)

1. Critical pedagogy. 2. Education, Higher – Philosophy. I. Wells, Gordon, 1935–

LC196.P453 2013

370.11'5–dc23 2013012172

ISBN 978-1-107-01465-7 Hardback

ISBN 978-1-107-56594-4 Paperback

Cambridge University Press & Assessment has no responsibility for the persistence
 or accuracy of URLs for external or third-party internet websites referred to in this
 publication and does not guarantee that any content on such websites is, or will
 remain, accurate or appropriate.

Contents

| | |
|--|-----------------|
| <i>Author Biographies</i> | <i>page vii</i> |
| 1. Introduction: The Changing Face of Higher Education <i>Gordon Wells and Anne Edwards</i> | 1 |
| 2. Goal Formation and Identity Formation in Higher Education <i>Deborah Downing Wilson and Michael Cole</i> | 18 |
| 3. Using a Cultural Historical Approach to Understand Educational Change in Introductory Physics Classrooms <i>Chandra Turpen and Noah Finkelstein</i> | 44 |
| 4. Taking Responsibility for Learning: CHAT in a Large Undergraduate Class <i>Gordon Wells</i> | 60 |
| 5. CHAT and Student Writing <i>David R. Russell</i> | 73 |
| 6. Assessment in Higher Education: A CHAT Perspective <i>Anton Havnes</i> | 89 |
| 7. The Agency of the Learner in the Networked University: An Expansive Approach <i>Russell Francis</i> | 105 |
| 8. Supporting Access to Science and Engineering through Scientific Argumentation <i>Tamara Ball and Lisa Hunter</i> | 123 |
| 9. Using CHAT to Understand Systems to Support Disabled Students in Higher Education <i>Jan Georgeson</i> | 140 |

| | | |
|-----|---|-----|
| vi | <i>Contents</i> | |
| 10. | Internship: Navigating the Practices of an Investment Bank <i>Natalie Lundsteen and Anne Edwards</i> | 155 |
| 11. | Identity Change in the Context of Higher Education Institutions <i>Jorge Larreamendy-Joerns</i> | 169 |
| 12. | Developing Skills for Collaborative, Relational Research in Higher Education: A Cultural Historical Analysis <i>Ioanna Kinti and Geoff Hayward</i> | 181 |
| 13. | Teacher Education in the Public University: The Challenge of Democratising Knowledge Production <i>Viv Ellis</i> | 198 |
| 14. | What Does “Transformation of Participation” Mean in a University Classroom? Exploring University Pedagogy with the Tools of Cultural Historical Theory <i>Holli A. Tonyan and Glenn Auld</i> | 215 |
| 15. | Gentle Partnerships: Learning from the Fifth Dimension <i>Honorine Nocon and Monica E. Nilsson</i> | 228 |
| | <i>Index</i> | 245 |

Author Biographies

Glenn Auld is a senior lecturer working in education, teaching in the areas of language and literacy at Deakin University in Melbourne, Australia. His research interests include indigenous literacies with new media and literacies in higher education. Glenn was the inaugural winner of the Betty Watts Award for research in indigenous education from the Australian Association of Researchers in Education. He is currently exploring preservice teachers' placement experiences in a remote indigenous community.

Tamara Ball is a postdoctoral educational researcher working with the Institute for Science and Engineer Educators (ISEE) and the Sustainable Engineering and Ecological Design (SEED) collaborative at the University of California, Santa Cruz. She is interested in understanding how curricular and cocurricular innovations can support meaningful campus-community connections in higher education and improve learning outcomes. Her research focuses on educational designs that emphasize student initiative and agency through inquiry or problem-based learning and scientific argumentation. Her work is broadly informed by Cultural Historical Activity Theory. Dr. Ball has worked as a research Fellow with several National Science Foundation Centers for Learning and Teaching.

Michael Cole is a professor of communication, psychology, and human development at the University of California, San Diego. He is currently the director of the Laboratory of Comparative Human Cognition, where broad study of the role of culture in development is a central theme. He was one of the editors of Vygotsky's *Mind in Society* (1978) and author of *Cultural Psychology: A Once and Future Discipline*, published by Belknap Press of Harvard University Press (1996). He was also the originator of The Fifth Dimension, a model of university-community partnership that now exists in many countries.

Anne Edwards is the director of the Department of Education at the University of Oxford and with Viv Ellis convenes the Oxford Centre for Sociocultural and Activity Theory Research (OSAT). She is also a visiting professor at the University of Oslo. She has worked in the area of professional learning, using a CHAT perspective, for the last twenty years. Her most recent research and publications focus on the relational aspects of expertise in interprofessional collaborations on complex problems. She is also one of the founding editors of *Learning, Culture and Social Interaction*, a new journal published by Elsevier.

Viv Ellis is professor and head of Education at Brunel University in London, UK, and Professor II at Bergen University College in Norway. Prior to Brunel, he was a university lecturer in the Department of Education at the University of Oxford and co-convenor of the Oxford Centre for Sociocultural and Activity Theory Research. With Jane McNicholl, he is author of *Transforming Teacher Education: Reconfiguring the Academic Work* (Bloomsbury, 2014).

Noah Finkelstein is a professor in the Department of Physics at the University of Colorado, Boulder, and conducts research in physics education. He serves as a director of the Physics Education Research (PER) group at Colorado and is also a director of the Integrating STEM Education initiative (iSTEM) to establish a national-scale center for STEM learning. Finkelstein's research focuses on studying the conditions that support students' interest and ability in physics – developing models of context. These research projects range from the specifics of students learning particular concepts, to the departmental and institutional scales of sustainable educational transformation.

Russell Francis is a postdoctoral research Fellow with the Linnaeus Centre for Research on Learning, Interaction and Mediated Communication in Contemporary Society (LinCS) at the Department of Education, Communication and Learning, University of Gothenburg. His work explores the implications of media change for learning, cognition, and education.

Jan Georgeson graduated from Oxford University (1980, experimental psychology) and worked on research projects examining reading and visual perception. She took a PGCE at Bristol Polytechnic in 1984 and taught children with special educational needs in secondary, primary, and preschool settings. She completed a doctorate in educational disadvantage and special educational needs at Birmingham University in 2006 and then joined the Improving Disabled Student Learning in Higher Education project of the Teaching and Learning Research Programme. Since then she has been involved in projects

supporting schools to collect data about disabled pupils and investigating interprofessional working by early years practitioners.

Anton Havnes is a professor at the Centre for the Study of Professions at Oslo and Akershus University College for Applied Sciences. His main interests of research are learning and assessment in higher education, professional education, workplace learning, and educational development in higher education.

Geoff Hayward is the head of the School of Education at the University of Leeds. Previously he worked in the Department of Education at the University of Oxford where he was the director of research; the associate director of the ESRC Research Centre for Skills, Knowledge and Organisational Performance (SKOPE); and a director of the Nuffield 14–19 Review of Education and Training. His research interests include vocational education and training policy and practice, higher education–business interaction, and sociocultural theory.

Lisa Hunter is the director of the Institute for Scientist and Engineer Educators at the University of California, Santa Cruz, and the director of the Akamai Workforce Initiative at the University of Hawaii. She develops, manages, and evaluates education programs aimed at increasing the diversity of science, technology, engineering, and mathematics (STEM). Her work focuses on inquiry, diversity, and equity and how they are related. Her projects are primarily aimed at promoting changes in higher education at the undergraduate and graduate levels.

Ioanna Kinti is currently a visiting lecturer in the Department of Public Policy and Business Administration at University of Cyprus and an associate research Fellow with the ESRC Research Centre for Skills, Knowledge and Organisational Performance (SKOPE) at the Department of Education, University of Oxford, where she received her doctorate in 2008. A member of the Oxford Centre for Sociocultural and Activity Theory Research (OSAT) group at the Department of Education during her doctorate and postdoctorate years, Ioanna is now focusing her research and teaching on knowledge, learning, and collaborative expertise within and between organizations.

Jorge Larreamendy-Joerns is an associate professor and chair of the Department of Psychology at Universidad de los Andes (Colombia). His empirical work inquires, from a sociocultural perspective, about science learning in formal and informal settings and issues such as learning and identity. He has been a visiting professor at the Learning Research and Development Center

(University of Pittsburgh). Currently, his teaching focuses on research methods (particularly discourse analysis and ethnography) at the graduate level.

Natalie Lundsteen is a higher education researcher and consultant. She received her doctorate from the University of Oxford and is currently a research associate in the Oxford Centre for Sociocultural and Activity Theory Research (OSAT) in the Department of Education at the University of Oxford and a research associate in the Centre for Skills, Knowledge and Organisational Performance (SKOPE) at the University of Oxford and Cardiff University. Her current research projects focus on the development of expertise in practices, student development theory, and university student transition experiences.

Monica E. Nilsson is an assistant professor of education in the Department of Child and Youth Studies at the University of Stockholm, Sweden. She received her PhD in education from the University of Helsinki, Finland, in 2003. Dr. Nilsson's research focuses on early childhood education and on higher education.

Honorine Nocon (PhD, University of California, San Diego) is an associate professor of linguistically diverse education at the University of Colorado, Denver, and the associate dean for Teaching and Learning in the School of Education and Human Development. Nocon uses qualitative methods and a sociocultural historical lens in her research on the development of language, culture, and content knowledge in contexts in which people from diverse culture groups interact. An ethnographer of formal and informal learning contexts, Nocon is an affiliate scholar with the Laboratory of Comparative Human Cognition at the University of California, San Diego.

David R. Russell is a professor of English in the rhetoric and professional communication area at Iowa State University. He has published widely on writing in the disciplines and professions, international writing instruction, and computer-supported collaborative learning. All are theorized with Cultural Historical Activity Theory and genre theory. His book, *Writing in the Academic Disciplines: A Curricular History*, examines the history of American writing instruction since 1870. He coedited a special issue of *Mind, Culture, and Activity* on writing research, *Writing Selves/Writing Societies: Research from Activity Perspectives*, and *Writing and Learning in Cross-National Perspective: Transitions from Secondary to Higher Education*.

Holli A. Tonyan (PhD) is an assistant professor of psychology at California State University, Northridge. After completing undergraduate studies in psychology at Carleton College, she completed graduate psychological studies

in education at the University of California, Los Angeles, where she studied links between and among the ecologies of home, child care, and peers as contexts for development. During a postdoctoral fellowship in psychology at the University of California, Santa Cruz, she studied Cultural Historical Activity Theory. She was a lecturer of early childhood education at Monash University in Melbourne, Australia, before taking her current position.

Chandra Turpen is a research associate at the University of Maryland, College Park. She completed her PhD in physics at the University of Colorado at Boulder, specializing in physics education research. Chandra's work involves designing and researching contexts for learning within higher education. In her research, Chandra draws from the perspectives of anthropology, cultural psychology, and the learning sciences. Through in situ studies of classroom and institutional practice, Chandra focuses on the role of culture in science learning and educational change. Chandra pursues projects that have high potential for leveraging sustainable change in undergraduate STEM programs and makes these struggles for change a direct focus of her research efforts.

Gordon Wells is a professor of education at the University of California, Santa Cruz. His particular interests are fostering dialogic inquiry as an approach to learning and teaching at all levels, based on the work of Vygotsky and other sociocultural theorists. Previously, he was the director of the Bristol Study of Language Development (1969–84) and a professor at the Ontario Institute for Studies in Education/University of Toronto (1984–2000), where he was involved in a collaborative action research project, "Developing Inquiring Communities in Education" (DICEP), funded by the Spencer Foundation. Previous books he has authored include *The Meaning Makers* (second edition), *Multilingual Matters* (2009); *Dialogic Inquiry*, (Cambridge University Press 1999); and *Action, Talk and Text: Learning and Teaching through Inquiry* (Teachers College Press 2001).

Deborah Downing Wilson is a research associate in the Laboratory of Comparative Human Cognition and a lecturer at the University of California, San Diego. Her research, writing, and teaching explore the intersection of education, culture, and communication, with a focus on the social and intellectual development of university students. Her ethnographic research is conducted among undergraduates engaged in academic activities in intercultural settings, both on and off the university campus. She is particularly interested in experiential learning, in facilitating the transition from student life to engaged citizenship, and in promoting the smooth deployment of university-acquired knowledge in the larger social arena.