VITA

Mark H. Bickhard

Date: 30 Dec 16

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EDUCATION: Ph.D. Human Development; University of Chicago; 1973.
Dissertation: A Model of Developmental and
Psychological Processes.

Clinical Internship; University of Chicago Counseling Center; 1969-1971.

M.S.   Statistics;   University of Chicago; 1970.

B.S.   Mathematics;   University of Chicago; 1966.

PROFESSIONAL EXPERIENCE:

Henry R. Luce Professor in
Cognitive Robotics and The Philosophy of Knowledge
Philosophy, Cognitive Science, Psychology, Biology, Counseling, Computer Science
Lehigh University - 1990 to present.

Director, Institute for Interactivist Studies, Lehigh University
2000 to present

Director, Complex Systems Research Group, Lehigh University
1999 to 2005

Director, Cognitive Science Program, Lehigh University,
1992 to 2003.

Psychologist License, State of Pennsylvania, 1991

Professor, Educational Psychology
  University of Texas at Austin - 1986 to 1990.

Associate Professor, Educational Psychology
  University of Texas at Austin - 1979 to 1986.

Assistant Professor, Educational Psychology
  University of Texas at Austin - 1972 to 1979.

Research Consultant; The Center for Psychosocial Studies,
  Chicago; 1977 to 1980.

    A center devoted to the development of a critique of social processes and
    institutions from a psychological perspective. Its then current focus was on
    the nature and construction of social meaning. My involvement derived from
    the center's interest in my models of psychological and sociological processes.

Certification and Licensing; Texas Board of Examiners
  of Psychologists; 1975.

Research Consultant; National Opinion Research Center,
  University of Chicago; 1973 to 1977.

    Multiple-stage least squares analyses of continuous national survey data with
    respect to structural systems models of contemporaneous and time lagged
    national influences.

Contract Instructor; California School of Professional
  Psychology, Los Angeles; Summer 1975.

Visiting Senior Study Director; National Opinion Research
  Center, University of Chicago; May 1973 to August 1973.

    A continuous full probability national survey, whose clients were primarily
    federal agencies, including HEW, DOA, DOT, and FEO. My responsibilities
    were most centrally involved with the agency relationships in Washington,
    D.C., project management, and the design of a software system and computer
    language for the file maintenance and statistical analysis of the data.

Research Consultant; University of Chicago Industrial
  Relations Center; Summer 1970 to Summer 1972.

    The focal project that I was involved with was the design and analysis of a
    large scale model of organizational processes. The model was a two layer
    hierarchically embedded structural model involving several sets of social
    psychological variables on work groups as the primary analytic units.

Longitudinal data was collected from a large service corporation over a three year period.

Psychotherapist; Chicago Counseling and Psychotherapy Research Center; Summer 1971 to Summer 1972.

The center was organized by the members of the University of Chicago Counseling Center on their own time and at their own expense when the clinical program was eliminated at the University. The Center was conceived of as a community service organization with low fees and extensive community contacts. We were engaged primarily in individual therapy, but with some group, family, and child therapy.

Research Statistician; Illinois State Commission on Drug Abuse; Summer 1970 to 1971.

My primary involvement was with the development of explanatory and predictive models for such variables as cessation of criminal activities, holding a job, successful heroin detoxification, length of stay in treatment, optimal treatment mode for various personality types, etc.

Group Leader; Employment Service Institute; Fall 1970 to Fall 1971.

Computer Programmer; various settings; 1964 to 1978.

Psychotherapist; Private Practice; 1975 to 1990.

TEACHING EXPERIENCE:

Courses Taught:

Robophilosophy#
Philosophy of Physics#
Philosophy Faculty Seminar: Naturalism#
Philosophy of Psychology#
Metaethics#
Philosophy of Language
Philosophy of Mind
Cognitive Robotics#
Philosophy of Biology
Action, Free Will, and Fate
The Minds of Men and Robots
Philosophy Faculty Seminar: The Origins and Errors of Analytic Philosophy#
Philosophy Faculty Seminar: A Naturalism of Persons#
Philosophy Faculty Seminar: Ontological Psychology#
Philosophy Faculty Seminar: The Whole Person#
Figures and Themes in 19th Century Philosophy: Pragmatism#
Figures and Themes in Contemporary Philosophy: Early Analytic#
Figures and Themes in Contemporary Philosophy: Naturalism#
Ontological Psychology#
Philosophy of Science#
Introduction to Linguistics
Senior Seminar in Cognitive Science
Foundations of Cognitive Science#
Cognitive Modeling#
Current Topics in Cognition
Psycholinguistics#
Dynamics of Learning and Development#
Seminar - Communication and Language#
Advanced Seminar in Cognition: Representation and Cognition#
Systematics and Evolution
Artificial Intelligence
Research Methodology#
Linear Models and Decisions#
Child Development - Cognitive#
Child Development - Language#
Child Development - Social#
Construction of Personality#
Seminar on Personality#
Motivation and Emotion
Personality and Mental Health
Ethics, Values, and Psychology#
Biological Bases of Behavior
Fortran Computer Programming#
Individual in Society

Individual Through the Life Cycle
Introduction to Developmental, Social, and Personality
Introduction to Individual Counseling
Client Centered Therapy#
Experiential Psychotherapy#
Existential Psychotherapy
Philosophical Foundations of Psychotherapy#
Counseling Practicum Seminar
Advanced Seminar in Psychotherapy#

#These courses are original developments of mine

PROFESSIONAL MEMBERSHIPS:

American Association for the Advancement of Science
American Association for Artificial Intelligence
American Mathematical Society
American Philosophical Association
American Psychological Association
American Psychological Society
Association for Symbolic Logic
Cognitive Development Society
Cognitive Science Society
EUCOG III
International Society for History, Philosophy, and Social Studies of Biology
International Society for Theoretical Psychology
International Society for the Study of Behavioural Development
Jean Piaget Society
Linguistic Society of America
Mathematical Association of America
Philosophy of Science Association
Society for Machines and Mentality
Society for Philosophy and Psychology
Society for Research in Child Development
The Mind Association

EDITORIAL BOARDS

Editor *New Ideas in Psychology*
Journal of Cognitive Systems Research
Science & Consciousness Review

BOARD MEMBERSHIPS:

Board member, *Jean Piaget Society*, 2005 — 2008; 2009 — 2012; 2013 —
2016.

AWARDS AND RECOGNITIONS:

Awards.

Henry R. Luce Professorship in Cognitive Robotics and the Philosophy of Knowledge. Three Year Extension Award. Henry R. Luce Foundation. $350,000 1995-1998.

Associate Investigator: Reduction and emergence in non-linear dynamical systems. 3 Year Funding 1998-2000. Australian Research Council. University of Newcastle, Australia

Principal Investigator. National Science Foundation: Biocomplexity: Complex Systems from Physics to Biology - Incubation Award. 1 year: 2000-2001. $99,970. Lehigh University Complex Systems Group.

International Associate, International Research Exchange Grant, Australian Research Council, 2001: Investigation of foundational concepts and principles for complex organised autonomous systems. Universities of Newcastle [Australia], the Basques [Spain], and Lehigh [USA].

Recognitions.

Symposium on Foundational Questions in Linguistics. With commentary by Petr Sgall, Victor Yngve, Richard Janney, E. Itkonen. Organized by Jacob Mey and Richard Janney of the *Journal of Pragmatics*. Symposium organized around my work in linguistics at the International Congress of Linguists, Quebec, Canada, August 11, 1992.

Fulbright student attending Lehigh in order to work with me. Sonia Jiménez-Suárez, a Fulbright student from the University of the Andes, Bogota, Colombia, on psychopathology and psychotherapy. 1992.

Invited for six week visit to University of Newcastle, Australia, to work with Professor Cliff Hooker and his graduate students. June, July, 1995.

Presented the Inaugural Master Class in Cognitive Science at Philosophy And Computers & Cognitive Science (PACCS), State University of New York, Binghamton, September 18, 1998.

Six week visit from Dr. Wayne Christensen, from University of Newcastle, Australia, to work on my model, November-December, 1998.

Organized an International conference on Adaptive Agent Dynamics and Cognition, Lehigh University, April 23-25, 1999.

Three week visit from Dr. Wayne Christensen, from University of Newcastle, Australia, to work on my model, May 1999.

Sabbatical visit, six weeks, to work on my model by Richard Campbell, Professor, from Australian National University, Canberra, Australia, April-May, 2000.

First Prize, Best Paper Award - General Systems, Anticipation, and Epistemology at CASYS 2000, Fourth International Conference on Computing Anticipatory Systems, August 7-12, 2000, Liege, Belgium.

Three week visit to work on my model by Professor Georgi Stojanov, from SS. Cyril and Methodius University, Skopje, Macedonia, September, 2000.

Invited Faculty, Bolzano International Schools in Cognitive Analysis, Bolzano, Italy, September 18-22, 2000.

Inaugural Address for Cognitive Science Program, Montclair State University, New Jersey, October 11, 2000.

Invited plenary address: An Integration of Motivation and Cognition. *Development and Motivation Conference*, April 16-18, 2002, Bowness, The Lake District, England.

Invited plenary address: Process and Emergence: Normative Function and Representation. *Processes — Analysis and Application of Dynamic Categories. An Interdisciplinary Workshop on Non-Reductive Theories of Processes*. June 5-8, 2002, Sandbjerg Castle, Sønderborg, Denmark. Sponsored by the University of Aarhus, Denmark.

Invitation to *Getting beyond Genes, Neurons, and Individual Minds*. University of Minnesota, Minneapolis, April 18-20, 2003. Organizer: Evelyn Fox Keller.

Invitation as a Primary Lecturer, University of Geneva, Archives Jean Piaget, Advanced course of the Foundation Piaget on *Norms and Development*, September 22-27, 2003.

Invited faculty for the Herbstakademie, *Complex Systems in Psychology*; Monte Verità, Ascona, Switzerland, October 18-22, 2003.

Invited Plenary Talk Austrian Society for Cognitive Science. Conference on *Cognitive Science and Cybernetics*. Vienna, Austria, 13-15 November, 2003.

Invited Plenary Speaker *Creativity and Education*. Taipei, Taiwan 20 – 22 May 2005.

Invited Plenary Speaker *Jean Piaget Society* meetings. Vancouver, 2 June 2005.

Editor *New Ideas in Psychology* Elsevier Publishers, as of January 1, 2005.

Invited Plenary Speaker *American Association for Artificial Intelligence Fall Symposium: From Reactive to Anticipatory Cognitive Embodied Systems*, 3-6 November 2005, Arlington, Virginia.

Invited opening talk. Representation and Motivation: Two Aspects of One Underlying Interactive System. Neural Information Processing Systems (NIPS) workshop on *Grounding Perception, Knowledge, and Cognition in Sensori-Motor Experience*. 8 December 2006, Whistler, Canada.

Invited opening talk. Interactive Cognition. Workshop on *Embodying Cognition: Towards an Integrative Approach*. 14-16 December 2006, Palma de Mallorca, Spain.

Invited plenary speaker. Issues in Process Metaphysics. Symposium on Philosophical Issues in Self-Organization. 20 Sep 07 *Center for the Ecological Study of Perception and Action*, September 20-21, 2007, University of Connecticut.

Invited plenary speaker. The Emergence of the Social Level of Reality. 28 Sep 07 Conference on Levels of Reality. *Mitteleuropa Foundation*. (27-29 Sep 07). Bolzano, Italy.

Special issue of *Synthese* on the Interactivist Model:

Bickhard, M. H. (2009). Interactivism: introduction to the special issue. *Synthese 166*(3), 449-451. DOI 10.1007/s11229-008-9371-1

Bickhard, M. H. (2009). The interactivist model. *Synthese 166*(3), 547-591. DOI 10.1007/s11229-008-9375-x

Keynote talk. Society and Creative Rationality. Celebration of 40th anniversary. December 5, 2008 University of Guanajuato, Mexico

Special issue of *Axiomathes* on the Interactivist Model:

Bickhard, M. H. (2011). Does Process Matter? An Introduction to the Special Issue on Interactivism. *Axiomathes, 21*:1–2. DOI 10.1007/s10516-010-9124-x

Bickhard, M. H. (2011). Some Consequences (and Enablings) of Process Metaphysics. *Axiomathes, 21*:3–32. DOI 10.1007/s10516-010-9130-z

Campbell, R. J., Bickhard, M. H. (2011). Physicalism, Emergence and Downward Causation. *Axiomathes, 21*: 33-56. DOI: 10.1007/s10516-010-9128-6

Fellow of the American Psychological Association, Division 24, Theoretical and Philosophical Psychology, August, 2014.

Fellow of the American Psychological Association, Division 7, Developmental Psychology, August, 2015.

Fellow of the American Psychological Association, Division 1, General Psychology, August, 2016.

Invited plenary speaker: Representing as an Agentive Activity, Not a Structure. *Situating Cognition: Agency, Affect, and Extension.* The Institute of Philosophy, University of Warsaw.

Your paper is one of the 5 most highly cited papers published in Cognitive Development   The editors of *Cognitive Development* are delighted to inform you that your paper, **Stepping off the pendulum: Why only an action-based approach can transcend the nativist-empiricist debate**, published in 2013 is one of the most highly cited papers during 2014, 2015 and up until June 2016.

PUBLICATIONS AND OTHER CONTRIBUTIONS:

Books

Bickhard, M. H. (1980). *Cognition, Convention, and Communication*. New York: Praeger Publishers.

Bickhard, M. H., Richie, D. M. (1983). *On the Nature of Representation: A Case Study of James Gibson's Theory of Perception*. New York: Praeger Publishers.

Campbell, R. L., Bickhard, M. H. (1986). *Knowing Levels and Developmental Stages*. Contributions to Human Development. Basel, Switzerland: Karger.

Bickhard, M. H., Terveen, L. (1995). *Foundational Issues in Artificial Intelligence and Cognitive Science: Impasse and Solution*. Elsevier Scientific. Paperback edition: (1996).

Martin, J., Bickhard, M. H. (2013). *The Psychology of Personhood: Philosophical, Historical, Social-Developmental, and Narrative Perspectives*. Cambridge: Cambridge University Press. Paperback edition: (2014).

Monographs

Bickhard, M. H. (1980). A Model of Developmental and Psychological Processes. *Genetic Psychology Monographs*, **102**, 61-116.

Bickhard, M. H. (2003). An Integration of Motivation and Cognition. In Smith, L., Rogers, C., Tomlinson, P. (Eds.) *Development and motivation: joint perspectives*. Leicester: British Psychological Society, Monograph Series II, 41-56.

Chapters

Bickhard, M. H. (1980). On Models of Knowledge and Communication. In Maya Hickmann (Ed.) *Proceedings of a Working Conference on the Social Foundations of Language and Thought*. Center for Psychosocial Studies, Chicago.

Bickhard, M. H. (1987). The Social Nature of the Functional Nature of Language. In Maya Hickmann (Ed.) *Social and Functional Approaches to Language and Thought*. Academic.

Bickhard, M. H. (1989). The Nature of Psychopathology. In Lynn Simek-Downing (Ed.) *International Psychotherapy*: *Theories, Research, and Cross-Cultural Implications*. Westport, CT: Praeger Press.

Bickhard, M. H. (1991). Cognitive Representation in the Brain. Invited chapter in *Encyclopedia of Human Biology*. *Vol. 2*. Academic Press, 547-558.

Bickhard, M. H. (1991). The Import of Fodor's Anti-Constructivist Argument. In Les Steffe (Ed.) *Epistemological Foundations of Mathematical Experience*. New York: Springer-Verlag, 14-25.

Bickhard, M. H. (1991). A Pre-Logical Model of Rationality. In Les Steffe (Ed.) *Epistemological Foundations of Mathematical Experience*. New York: Springer-Verlag, 68-77.

Bickhard, M. H. (1992). How Does the Environment Affect the Person? Invited chapter in L. T. Winegar, J. Valsiner (Eds.) *Children's Development within Social Contexts: Metatheory and Theory*. Erlbaum, 63-92.

Bickhard, M. H. (1992). Scaffolding and Self Scaffolding: Central Aspects of Development. Invited chapter in L. T. Winegar, J. Valsiner (Eds.) *Children's Development within Social Contexts: Research and Methodology*. Erlbaum, 33-52.

Campbell, R. L., Bickhard, M. H. (1992). A Deconstruction of Fodor's Anticonstructivism. In L. Smith (Ed.) *Jean Piaget: Critical Assessments*. Routledge, chapter 72, 134-148. (Reprint of 1987)

Bickhard, M. H. (1992). Piaget on Variation and Selection Models: Structuralism, logical necessity, and interactivism. In L. Smith (Ed.) *Jean Piaget: Critical Assessments*. Routledge, chapter 83, 388-434. (Reprint of 1988)

Bickhard, M. H. (1995). World Mirroring versus World Making: There's Gotta be a Better Way. In L. Steffe, J. Gale (Eds.) *Constructivism in Education*. (229-267). Erlbaum.

Bickhard, M. H. (1995). Is Cognition an Autonomous Subsystem? In Seán Ó Nualláin, Paul McKevitt (Eds.) AISB-95 Workshop on *Reaching for Mind: Foundations of Cognitive Science*, Sheffield, England, 3-7 April, 1995. The Tenth Biennial Conference on AI and Cognitive Science organised by the Society for the Study of Artificial Intelligence and Simulation of Behaviour and the Department of Computer Science at the University of Sheffield.

Bickhard, M. H. (1996). The Emergence of Representation in Autonomous Embodied Agents. Papers from the *1996 AAAI Fall Symposium on Embodied Cognition and Action*. Chair: Maja Mataric. Nov 9-11, MIT, Cambridge, MA. Technical Report FS-96-02. Menlo Park, CA.: AAAI Press.

Bickhard, M. H. (1996). Troubles with Computationalism. In W. O'Donohue, R. F. Kitchener (Eds.) *The Philosophy of Psychology*. (173-183). London: Sage.

Bickhard, M. H. (1997). Is Cognition an Autonomous Subsystem? In S. O'Nuallain, P. McKevitt, E. MacAogain (Eds.). *Two Sciences of Mind*. (115-131). John Benjamins.

Bickhard, M. H. (1997). Cognitive Representation in the Brain. In Dulbecco (Ed.) *Encyclopedia of Human Biology. 2nd Ed*. (865-876). Academic Press.

Bickhard, M. H. (1998). Constructivisms and Relativisms: A Shopper's Guide. In M. R. Matthews (Ed.) *Constructivism in Science Education: A Philosophical Debate*. (99-112). Kluwer Academic.

Bickhard, M. H. (1998). Whither Representation? In M. A. Gernsbacher, S. J. Derry (Eds.) *Proceedings of the Twentieth Annual Conference of the Cognitive Science Society*, University of Wisconsin-Madison, August 1 - 4, 1998, 150-155. Erlbaum.

Bickhard, M. H. (1998). A Process Model of the Emergence of Representation. In G. L. Farre, T. Oksala (Eds.) *Emergence, Complexity, Hierarchy, Organization*, Selected and Edited Papers from the *ECHO III Conference. Acta Polytechnica Scandinavica*, Mathematics, Computing and Management in Engineering Series No. 91, Espoo, Finland, August 3 - 7, 1998, 263-270.

Bickhard, M. H. (1998). Robots and Representations. In R. Pfeifer, B. Blumberg, J.-A. Meyer, S. W. Wilson (Eds.) *From Animals to Animats 5*. (58-63). *Proceedings of the Fifth International Conference on Simulation of Adaptive Behavior*. Zurich, Switzerland, August 17 - 21, 1998. MIT.

Bickhard, M. H. (1998). Genuine Representation in Artificial Systems. In G. Antoniou, J. Slaney (Eds.) *Advanced Topics in Artificial Intelligence*. (27-38). Springer.

Bickhard, M. H. (1999). Representation In Natural and Artificial Agents. E. Taborsky (Ed.) *Semiosis. Evolution. Energy: Towards a Reconceptualization of the Sign*. (15-25). Aachen: Shaker Verlag.

Bickhard, M. H. (1999). The Dynamics of Representation. In B. Hayes, C.A. Hooker, R. Heath, A. Heathcote (Eds.) *Proceedings of the Fourth Australian Cognitive Science Conference*. Newcastle: University of Newcastle, Australia. ISBN 0 7259 1059 3 http://psychology.newcastle.edu.au/~heath/cogsci97/

Bickhard, M. H. (1999). How to Fill Empty Symbols. In B. Hayes, C.A. Hooker, R. Heath, A. Heathcote (Eds.) *Proceedings of the Fourth Australian Cognitive Science Conference*. Newcastle: University of Newcastle, Australia. ISBN 0 7259 1059 3 http://psychology.newcastle.edu.au/~heath/cogsci97/

Bickhard, M. H. (2000). Dynamic Representing and Representational Dynamics. In E. Dietrich, A. Markman (Eds.) *Cognitive Dynamics: Conceptual and Representational Change in Humans and Machines*. (31-50). Erlbaum.

Bickhard, M. H. (2000). Emergence. In P. B. Andersen, C. Emmeche, N. O. Finnemann, P. V. Christiansen (Eds.) *Downward Causation*. (322-348). Aarhus, Denmark: University of Aarhus Press.

Bickhard, M. H. (2000). Motivation and Emotion: An Interactive Process Model. In R. D. Ellis, N. Newton (Eds.) *The Caldron of Consciousness*. (161-178). J. Benjamins.

Bickhard, M. H. (2001). The Emergence of Contentful Experience. In T. Kitamura (Ed.) *What Should be Computed to Understand and Model Brain Function*? (217-237). Singapore: World Scientific.

Bickhard, M. H. (2001). Function, Anticipation, Representation. In D. M. Dubois (Ed.) *Computing Anticipatory Systems*. *CASYS 2000 - Fourth International Conference*. (459-469). Melville, NY: American Institute of Physics.

Bickhard, M. H. (2003). The Biological Emergence of Representation. In T. Brown, L. Smith (Ed.) *Emergence and Reduction: Proceedings of the 29th Annual Symposium of the Jean Piaget Society*. (105-131). Erlbaum.

Bickhard, M. H. (2003). Mind as Process. In F. G. Riffert, M. Weber (Eds.) *Searching for New Contrasts*. (285-294). Vienna: Peter Lang.

Bickhard, M. H. (2003). Process and Emergence: Normative Function and Representation. In: J. Seibt (Ed.) *Process Theories: Crossdisciplinary Studies in Dynamic Categories*. Dordrecht: Kluwer Academic.

Bickhard, M. H. (2004). The Social Ontology of Persons. In J. I. M. Carpendale, U. Muller (Eds.) *Social Interaction and the Development of Knowledge*. (111-132). Mahwah, NJ: Erlbaum.

Bickhard, M. H. (2006). Developmental Normativity and Normative Development. In L. Smith, J. Voneche (Eds.) *Norms in Human Development*. (57-76). Cambridge: Cambridge University Press.

Bickhard, M. H. (2007). Learning is Scaffolded Construction. In D. W. Kritt, L. T. Winegar (Eds.) *Education and Technology*. (73-88). New York: Rowman & Littlefield.

Bickhard, M. H. (2008). Are You Social? The Ontological and Developmental Emergence of the Person. In U. Müller, J. I. M. Carpendale, N. Budwig, B. Sokol (Eds.) *Social Life and Social Knowledge*. (17-42). New York: Taylor & Francis.

Bickhard, M. H. (2008). Is Embodiment Necessary? In P. Calvo, T. Gomila (Eds.) *Handbook of Cognitive Science: An Embodied Approach*. (29-40). Amsterdam: Elsevier.

Bickhard, M. H. (2009). Interactivism. In J. Symons, P. Calvo (Eds.) *The Routledge Companion to Philosophy of Psychology*. (346-359). London: Routledge.

Bickhard, M. H. (2010). Is Normativity Natural? In M. Milkowski, K. Talmont-Kaminski (Eds.) *Beyond Description: Normativity in Naturalised Philosophy*. (14-30). London: College Publications.   Invited

Bickhard, M. H. (2010). Interactive Knowing: The Metaphysics of Intentionality. In R. Poli, J. Seibt (Eds.) *Theory and Applications of Ontology. Philosophical Perspectives*. (207-229). Springer.   Invited

Bickhard, M. H. (2011). Systems and Process Metaphysics. In C. Hooker (Ed.) *Handbook of Philosophy of Science. Philosophy of Complex Systems, Vol. 10*. (91-104). Amsterdam: Elsevier.   Invited

Bickhard, M. H. (2011). Myths of Science: Misconceptions of Science in Contemporary Psychology. In H. J. Stam (Ed.) *Theoretical Psychology — Contemporary Readings. Vol. II* (57-71). London: Sage. ISBN**:** 978-1-84920-773-7   reprint of Bickhard, M. H. (1992). Myths of Science: Misconceptions of science in contemporary psychology. *Theory and Psychology*, *2*(3), 321-337.

Martin, J., Bickhard, M. H. (2013). An Introduction to the Psychology of Personhood. In Martin, J., Bickhard, M. H. (Eds). *The Psychology of Personhood: Philosophical, Historical, Social-Developmental, and Narrative Perspectives*. (1-18). Cambridge: Cambridge University Press.

Bickhard, M. H. (2013). The Emergent Ontology of Persons. In Martin, J., Bickhard, M. H. (Eds). *The Psychology of Personhood: Philosophical, Historical, Social-Developmental, and Narrative Perspectives*. (165-180). Cambridge: Cambridge University Press.

Bickhard, M. H. (2014). Model interaktywistyczny. In Marcin Miłkowski (Ed.) Kognitywistyka. Reprezentacje (109-165) Warsaw, Poland: Przeglad Filozoficzno-literacki.   Translation of Bickhard, M. H. (2009). The interactivist model. *Synthese 166*(3), 547-591.

Bickhard, M. H. (2014). Robot Sociality: Genuine or Simulation? In J. Seibt, R. Hakli, M. Norskov (Eds.) *Sociable Robotics and the Future of Social Relations. Series: Frontiers in Artificial Intelligence and Applications*. (81-86). IOS Press, Amsterdam.

Bickhard, M. H. (2016). Metatheoretical Issues in Personality Psychology. In Hal Miller (Ed.) *SAGE Encyclopedia of Theory in Psychology*. (549-551). London: Sage.

Bickhard, M. H. (2016). The Anticipatory Brain: Two Approaches. In V. C. Müller (Ed.) (2016). *Fundamental Issues of Artificial Intelligence*. (259-281). Switzerland: Springer.

Bickhard, M. H. (2016). Cognition and the Brain (abstract). In Gershenson, C., Froese, T., Siqueiros, J. M., Aguilar, W., Isquierdo, E. J., Sayama, H. *Proceedings of the Artificial Life Conference 2016*, Cancun, Mexico, 6 July 2016, pg. 17. Cambridge, MA: MIT press.

Articles

Bickhard, M. H., Ford, B. L. (1976). Adler's Concept of Social Interest: A critical explication. *Journal of Individual Psychology*, *32*, No. 2, 27-49.

Moore, N., Bickhard, M. H., Cooper, R. G. (1977). The Child's Development of the Concept of Family. *Resources in Education* and *ERIC Document Reproduction Services*.

Bickhard, M. H. (1978). A Reply to "*Social Interest: A Reply to Bickhard and Ford.*" *Journal of Individual Psychology*, *34*, No. 1, 27-35.

Bickhard, M. H. (1978). The Nature of Developmental Stages. *Human Development*, *21*, 217-233.

Bickhard, M. H., Ford, B. L. (1979). Subjective Adaptationalism: An Adlerian metapsychology. *Journal of Individual Psychology*, *35*, No. 2, 162-186.

Bickhard, M. H. (1979). On Necessary and Specific Capabilities in Evolution and Development. *Human Development*, *22*, 217-224.

Bickhard, M. H. (1980). Functionalism in Adlerian Psychology. *Journal of Individual Psychology*, *36*, No. 1, 66-74.

Bickhard, M. H. (1980). Outline of a Theory of Psychological Processes. Unpublished manuscript edited and included in *Piaget's Genetic Epistemology 1965-1980*. R. Vuyk, New York: Academic Press.

Bickhard, M. H. (1980). Approaches to the Study of Mind. *Cognition and Brain Theory*, *3***,** No. 4, 146-152.

Bickhard, M. H. (1982). Automata Theory, Artificial Intelligence, and Genetic Epistemology. *Revue Internationale de Philosophie*, *36*, No. 142-143, 549-566, Invited paper for a special issue on Jean Piaget.

Bickhard, M. H., Cooper, R. G., Mace, P. E. (1985). Vestiges of Logical Positivism: Critiques of Stage Explanations. *Human Development*, *28*, 240-258.

Campbell, R. L., Bickhard, M. H. (1987). A Deconstruction of Fodor's Anticonstructivism. *Human Development*, *30*, 48-59.

Richie, D. M., Bickhard, M. H. (1988). The Ability to Perceive Duration: Its Relation to the Development of the Logical Concept of Time. *Developmental Psychology*, *24*, 318-323.

Bickhard, M. H. (1988). Piaget on Variation and Selection Models: Structuralism, logical necessity, and interactivism. *Human Development*, *31*, 274-312.

Bickhard, M. H. (1988). The Necessity of Possibility and Necessity. Review of Piaget's *Possibility and Necessity Harvard Educational Review*, *58*, No. 4, 502-507.

Bickhard, M. H., Campbell, R. L. (1989). Interactivism and Genetic Epistemology. *Archives de Psychologie*, *57*(221), 99-121.

Bickhard, M. H. (1989). Ethical Psychotherapy and Psychotherapy as Ethics. *New Ideas in Psychology*, *7*(2), 159-164.

Wedemeyer, N. V., Bickhard, M. H., Cooper, R. G. (1989). The Development of Structural Complexity in the Child's Concept of Family: The Effect of Cognitive Stage, Sex, and Intactness of Family. *Journal of Genetic Psychology*, *150*(4), 341-357.

Bickhard, M. H. (1991). How to Build a Machine with Emergent Representational Content. *CogSci News*, *4*(1), 1-8.

Bickhard, M. H. (1991). Homuncular Innatism is Incoherent: A reply to Jackendoff. *The Genetic Epistemologist*, *19*(3), 5.

Campbell, R. L. Bickhard, M. H. (1991). If Human Cognition is Adaptive, Can Human Knowledge Consist of Encodings? Commentary on "Is Human Cognition Adaptive?" by John R. Anderson *Behavioral and Brain Sciences*, *(14)*, pp. 488-489.

Christopher, J. C., Bickhard, M. H. (1992). Remodeling the As If in Adler's Concept of the Life Style. *Journal of Individual Psychology*, 76-85.

Bickhard, M. H., Campbell, R. L. (1992). Some Foundational Questions Concerning Language Studies: With a Focus on Categorial Grammars and Model Theoretic Possible Worlds Semantics. *Journal of Pragmatics, 17(5/6)*, 401-433. Target article for commentary in a special double issue.

Campbell, R. L., Bickhard, M. H. (1992). Clearing the Ground: Foundational Questions Once Again. *Journal of Pragmatics*, *17(5/6)*, 557-602.

Bickhard, M. H. (1992). The Strange Case of Bi-Photo-ism: Paul Churchland as the 8th Annual Selfridge Lecturer in Philosophy. *CogSci News, 5*(1), 5-6.

Bickhard, M. H. (1992). Commentary on the Age 4 Transition. *Human Development*, *35*(3)182-192.

Bickhard, M. H. (1992). Myths of Science: Misconceptions of science in contemporary psychology. *Theory and Psychology*, *2*(3), 321-337.

Campbell, R. L., Bickhard, M. H. (1992). Types of Constraints on Development: An Interactivist Approach. *Developmental Review, 12*(3), 311-338.

Christopher, J. C., Bickhard, M. H., Lambeth, G. S. (1992). Splitting Kernberg: A Critique of Otto Kernberg's Notion of Splitting. *Psychotherapy*, *29*(3), 481-485.

Campbell, R. L., Bickhard, M. H. (1993). Knowing Levels and the Child's Understanding of Mind. *Behavioral and Brain Sciences, 16*(1), 33-34.

Bickhard, M. H. (1993). Foundations of Language Studies. In Crochetière, A., Boulanger, J., Ouellon, C. (Eds.) *Proceedings of the XVth International Congress of Linguists. Vol. I.* (237-242). Québec: Les Presses de L'Univeristé Laval.

Bickhard, M. H. (1993). Representational Content in Humans and Machines. *Journal of Experimental and Theoretical Artificial Intelligence*, *5*, 285-333.

Bickhard, M. H. (1993). On Why Constructivism Does Not Yield Relativism. *Journal of Experimental and Theoretical Artificial Intelligence*, *5*, 275-284.

Bickhard, M. H. (1993). Staircase? How Can We Tell? Review of *The Mind's Staircase* by Robbie Case. *American Journal of Psychology, 106*(4), 577-633.

Bickhard, M. H., Christopher, J. C. (1994). The Influence of Early Experience on Personality Development. *New Ideas in Psychology*, *12*(3), 229-252.

Bickhard, M. H. (1994). Rocks, Frogs, and the Cartesian Gulf: Toward a Naturalism of Persons. *New Ideas in Psychology*, *12*(3), 267-276.

Christopher, J. C., Bickhard, M. H. (1994). The persistence of basic mistakes: Re-exploring psychopathology in Individual Psychology. *Journal of Individual Psychology, 50*, 223-231.

Bickhard, M. H. (1995). Transcending False Dichotomies in Developmental Psychology — Review of *Beyond Modularity*. by A. Karmiloff-Smith. *Theory and Psychology*, *5*(1), 161-165.

Bickhard, M. H. (1995). Intrinsic Constraints on Language: Grammar and Hermeneutics. *Journal of Pragmatics*, *23*, 541-554.

Bickhard, M. H. (1995). Review of *Understanding Origins*. *Philosophical Psychology*, *8*(1), 112-116.

Bickhard, M. H. (1995). Who Interprets the Isomorphisms? *New Ideas in Psychology, 13*(2), 135-137.

Bickhard, M. H. (1996). Sobre los principios de la ética en Counseling y Psicoterapia. *Revista Argentia de Clínica Psicológica, V*(1), 37-49.

Bickhard, M. H., Campbell, R. L. (1996). Topologies of Learning and Development. *New Ideas in Psychology*, *14*(2), 111-156.

Bickhard, M. H., Campbell, R. L. (1996). Developmental Aspects of Expertise: Rationality and Generalization. *Journal of Experimental and Theoretical Artificial Intelligence*, *8*(3/4), 399-417.

Bickhard, M. H. (1997). Constructivisms and Relativisms: A Shopper's Guide. *Science Education*, *6*, 29-42.

Bickhard, M. H. (1997). Review of *The Search for Mind*. *Minds and Machines*, *7*, 125-128.

Bickhard, M. H. (1997). Emergence of Representation in Autonomous Agents. *Cybernetics and Systems: Special Issue on Epistemological Aspects of Embodied Artificial Intelligence, 28*(6), 489-498.

Bickhard, M. H. (1997). Piaget and Active Cognition. *Human Development., 40*, 238-244.

Bickhard, M. H. (1998). Levels of Representationality. *Journal of Experimental and Theoretical Artificial Intelligence*, *10*(2), 179-215.

Bickhard, M. H. (1998). Constraints on the Architecture of Mind. *New Ideas in Psychology, 16*(2), 97-105.

Levine, A., Bickhard, M. H. (1999). Concepts: Where Fodor Went Wrong. *Philosophical Psychology, 12*(1), 5-23.

Bickhard, M. H. (1999). Interaction and Representation. *Theory & Psychology, 9*(4), 435-458.

Bickhard, M. H. (1999). On the Cognition in Cognitive Development. *Developmental Review*, 19, 369-388.

Bickhard, M. H. (2000). Information and Representation in Autonomous Agents. *Journal of Cognitive Systems Research*, *1*(2). http://www.elsevier.nl.

Bickhard, M. H. (2000). Review of B. Shanon, *The Representational and the Presentational*. *Minds and Machines*, *10*(2), 313-317.

Bickhard, M. H. (2000). Autonomy, Function, and Representation. *Communication and Cognition — Artificial Intelligence*. Special issue on: The contribution of artificial life and the sciences of complexity to the understanding of autonomous systems. Guest Editors: Arantza Exteberria, Alvaro Moreno, Jon Umerez. 17(3-4), 111-131.

Bickhard, M. H. (2000). A Historical Approach to Teaching Introductory Cognitive Science. *CogSci News, 11*(1,2), 2-3.

Bickhard, M. H. (2001). The Tragedy of Operationalism. *Theory and Psychology, 11*(1), 35-44.

Bickhard, M. H. (2001). Why Children Don't Have to Solve the Frame Problems: Cognitive Representations are not Encodings. *Developmental Review, 21*, 224-262.

Christopher, J. C., Bickhard, M. H., Lambeth, G. S. (2001). Otto Kernberg's Object Relations Theory: A Metapsychological Critique. *Theory and Psychology, 11*(5), 687-711.

Bickhard, M. H. (2001). Error Dynamics: The Dynamic Emergence of Error Avoidance and Error Vicariants. *Journal of Experimental and Theoretical Artificial Intelligence, 13*, 199-209.

Bickhard, M. H. (2002). Critical Principles: On the Negative Side of Rationality. *New Ideas in Psychology, 20*, 1-34.

Christensen, W. D., Bickhard, M. H. (2002). The Process Dynamics of Normative Function. *Monist, 85*(1), 3-28.

Campbell, R. L., Christopher, J. C., & Bickhard, M. H. (2002). Self and Values: An Interactivist Foundation for Moral Development. *Theory and Psychology, 12*(6), 795-823.

Bickhard, M. H., Campbell, D. T. (2003). Variations in Variation and Selection: The Ubiquity of the Variation-and-Selective Retention Ratchet in Emergent Organizational Complexity. *Foundations of Science, 8*(3), 215-282.

Bickhard, M. H. (2003). Variations in Variation and Selection: The Ubiquity of the Variation-and-Selective Retention Ratchet in Emergent Organizational Complexity, Part II: Quantum Field Theory. *Foundations of Science, 8*(3), 283-293.

Bickhard, M. H. (2003). Some notes on internal and external relations and representation. *Consciousness & Emotion, 4*(1), 101–110.

Bickhard, M. H. (2004). Process and Emergence: Normative Function and Representation. *Axiomathes — An International Journal in Ontology and Cognitive Systems, 14*, 135-169.

Bickhard, M. H. (2004). A Challenge to Constructivism: Internal and External Sources of Constructive Constraint. *Human Development, 47*, 94-99.

Bickhard, M. H. (2004). Normativity and Mind. Review of *Duality of the Mind: A Bottom Up Approach Toward Cognition*. by Ron Sun. *Contemporary Psychology, 49*(2), 156-158.

Bickhard, M. H. (2004). Why Believe in Beliefs? *Behavioral and Brain Sciences, 27*(1), 100-101.

Stojanov, G., Bickhard, M. H. (2004). Representation: Emulation and Anticipation. *Behavioral and Brain Sciences, 27*(3), 418.

Bickhard, M. H. (2005). Consciousness and Reflective Consciousness. *Philosophical Psychology, 18*(2), 205-218.

Bickhard, M. H. (2005). Anticipation and Representation. In C. Castelfranchi (Ed.) *From Reactive to Anticipatory Cognitive Embodied Systems*. (1-7). AAAI Fall Symposium, Technical Report FS-05-05. Menlo Park, CA: AAAI Press.

Bickhard, M. H., Campbell, R. L. (2005). Editorial: New Ideas in Psychology. *New Ideas in Psychology, 23*(1), 1-4.

Bickhard, M. H. (2005). Functional Scaffolding and Self-Scaffolding. *New Ideas in Psychology, 23*(3), 166-173.

Bickhard, M. H. (2007). Modern Approaches to Language. *New Ideas in Psychology, 25*(2), 67-69.

Bickhard, M. H. (2007). Language as an Interaction System. *New Ideas in Psychology, 25*(2), 171-187.

Christopher, J. C., Bickhard, M. H. (2007). Culture, Self and Identity: Interactivist Contributions to a Metatheory for Cultural Psychology. *Culture & Psychology, 13*(3), 259-295.

Bickhard, M. H. (2007). Mechanism Is Not Enough. In Q. Gonzalez, M. Eunice, W. F. G. Haselager, I. E. Dror (Eds.) Mechanicism and Autonomy: What Can Robotics Teach Us About Human Cognition and Action? Special issue of *Pragmatics and Cognition, 15*(3), 573-585.

Bickhard, M. H. (2008). Issues in Process Metaphysics. *Ecological Psychology, 20*(3), 252-256.

Bickhard, M. H. (2008). Social Ontology as Convention. *Topoi, 27*(1-2), 139-149.

Bickhard, M. H. (2009). Interactivism: A Manifesto. *New Ideas in Psychology 27*, 85–95.

Bickhard, M. H. (2009). The Biological Foundations of Cognitive Science. *New Ideas in Psychology 27*, 75–84.

Bickhard, M. H. (2009). Interactivism: introduction to the special issue. *Synthese 166*(3), 449-451.

Bickhard, M. H. (2009). The interactivist model. *Synthese 166*(3), 547-591.

Bickhard, M. H. (2009). Emergence: Process Organization, not Particle Configuration. *Cybernetics and Human Knowing, 15*(3-4), 57-63.

Bickhard, M. H. (2009). Some Remarks on Process Metaphysics and Representation. *Cybernetics and Human Knowing, 15*(3-4), 71-74.

Bickhard, M. H. (2011). The Dynamics of Acting. Humana Mente, 15, 177-187.

Ziemke, T., Bickhard, M. H. (2011). Cognitive Robotics: Introduction to the Special Issue. *New Ideas in Psychology*, *29*(3), 201-202. DOI:10.1016/j.newideapsych.2011.02.002

Bickhard, M. H. (2011). Does Process Matter? An Introduction to the Special Issue on Interactivism. *Axiomathes*, *21*:1–2. DOI 10.1007/s10516-010-9124-x

Bickhard, M. H. (2011). Some Consequences (and Enablings) of Process Metaphysics. *Axiomathes*, *21*:3–32. DOI 10.1007/s10516-010-9130-z

Campbell, R. J., Bickhard, M. H. (2011). Physicalism, Emergence and Downward Causation. *Axiomathes*, *21*: 33-56. DOI: 10.1007/s10516-010-9128-6

Bickhard, M. H. (2011). On the Concept of Concept. *Journal of Theoretical and Philosophical Psychology*, *31*(2), 102-105.

Allen, J. W. P., Bickhard, M. H. (2011). You Can't Get There From Here: Foundationalism and Development. *Behavioral and Brain Sciences*, *34*(3), 124-125.

Allen, J.W.P., Bickhard, M. H. (2011). Normativity: A Crucial Kind of Emergence. *Human Development*, *54*, 106-112. DOI: 10.1159/000327096

Allen, J. W. P., Bickhard, M. H. (2011). Emergent Constructivism. *Child Development Perspectives*. *5*(3), 164-165. Invited DOI: 10.1111/j.1750-8606.2011.00178.x

Bickhard, M. H. (2012). A Process Ontology for Persons and Their Development. *New Ideas in Psychology*, *30*(1), 107-119.

Martin, J., Bickhard, M. H. (2012). An Introduction to the Special Issue on "The New Psychology of Personhood". *New Ideas in Psychology*, *30*(1), 86-88.

Allen, J. W. P., Bickhard, M. H. (2013). Stepping Off The Pendulum: Why Only an Action-Based Approach Can Transcend the Nativist-Empiricist Debate. *Cognitive Development, 28*, 96-133.

Allen, J. W. P., Bickhard, M. H. (2013). The Pendulum Still Swings. *Cognitive Development, 28,* 164-174.

Allen, J. W. P., Bickhard, M. H. (2013). Beyond Principles and Programs: An Action Framework for Modeling Development. *Human Development, 56*, 171-177.

Bickhard, M. H. (2013). The Creativity of Development and the Development of Creativity. Papers from the *AAAI Spring Symposium Technical Report SS-13-02: Cognitive Development: A Perspective from Artificial Creativity, Developmental AI, and Robotics*. Association for the Advancement of Artificial Intelligence. Palo Alto, California: AAAI Press.

Bickhard, M. H. (2013). Action, Anticipation, and Construction: The Cognitive Core. *Constructivist Foundations, 9*(1), http://www.univie.ac.at/constructivism/journal/9/1

Bickhard, M. H. (2014). What Could Cognition Be, If not Computation … or Connectionism, or Dynamic Systems? *Journal of Theoretical and Philosophical Psychology*, *35*(1), 53-66. DOI - 10.1037/a0038059

Bickhard, M. H. (2015). The Metaphysics of Emergence. *Kairos, 12*, 7-25.

Bickhard, M. H. (2015). The Social-Interactive Ontology of Language. *Ecological Psychology, 27*(3), 265-277. DOI: 10.1080/10407413.2015.1068656

Bickhard, M. H. (2015). Toward a Model of Functional Brain Processes I: Central Nervous System Functional Micro-architecture. *Axiomathes, 25*(3), 217-238. DOI 10.1007/s10516-015-9275-x

Bickhard, M. H. (2015). Toward a Model of Functional Brain Processes II: Central Nervous System Functional Macro-architecture. *Axiomathes, 25*(4), 377-407. DOI 10.1007/s10516-015-9276-9

Allen, J. W. P., Bickhard, M. H. (2015). Stepping Back: Reflections on a Pedagogical Demonstration of Reflective Abstraction. *Human Development, 58*, 245-252.

Bickhard, M. H. (2016). Inter- and En- Activism: Some thoughts and comparisons. *New Ideas in Psychology, 41*, 23-32.

Bickhard, M. H. (2016). Probabilities over What? *Human Development, 59*, 34-36. DOI: 10.1159/000447026

Allen, J. W. P., Bickhard, M. H. (2016). Emergence, Action, and Representation. *IEEE, CIS, CDS Newsletter: The Newsletter of the Technical Committee on Cognitive and Developmental Systems, 13*(1), 15-16.

Bickhard, M. H. (2017). How to Operationalize a Person. *New Ideas in Psychology, 44*, 2-6.

Posters

Allen, Jedediah WP, Bickhard, M. H. (2011). Anticipation as an Alternative Perspective for Understanding Imitation Activity. 15 Jan 11 *2011 CEU Budapest Conference on Cognitive Development*.

Workshops and Symposia

Personality, Psychopathology, and Psychotherapy: Some new orientations. February 26 & 27, 1983, Invited workshop at the International Conference on Psychotherapy, Bogota, Colombia.

Personality, Psychopathology, and Psychotherapy. August 14, 15, 16, 1985, Invited workshop at the University of the Andes, Bogota, Colombia.

Interactivism and Developmental Psychology. Organizer and Chair of a symposium at the Jean Piaget Society Meetings, May 30, 1986, Philadelphia.

The Age 4 Transition. Organizer, Chair, and Discussant of a symposium at the Society for Research in Child Development meetings, April 18, 1991, Seattle.

Foundational Questions in Linguistics. Focal presentation in a specially organized symposium of the same name with commentary from Petr Sgall, Victor Yngve, Richard Janney, and E. Itkonen and my responses. Organized by Jacob Mey and Richard Janney of the *Journal of Pragmatics*. International Congress of Linguists, Quebec, Canada, August 11, 1992.

Creativity and Cognition: Questions of Epistemology. Two day workshop on parts of my model. Instituto Superior de Psicologia Aplicada, Lisbon, Portugal, December 15 & 16, 1994.

Interactivism: Dynamics, Function, Representation, Rationality. Invited by Professor Cliff Hooker, Department of Philosophy, University of Newcastle. Newcastle, NSW, Australia. June 19, 1995 - July 12, 1995.

The Emergence of Representation in Autonomous Embodied Agents. *1996 AAAI Fall Symposium on Embodied Cognition and Action*. Chair: Maja Mataric. Nov 9-11, MIT, Cambridge, MA.

The Dynamics of Representation. *Workshop on Dynamical Models of Mind, Fourth Australasian Cognitive Science Society Meetings*, University of Newcastle, Newcastle, Australia, September 25, 1997.

An Interactive Model of Language. *Symposium on Interaction, Communication, and Meaning: The Pragmatic Dimension of Language, Jean Piaget Society Meetings*, Chicago, Illinois, June 13, 1998.

The Dynamical Birth of Representation. *BISCA 2000 Bolzano International Schools in Cognitive Analysis*. Faculty member. Bolzano, Italy, September 18-22, 2000.

Organized *Interactivist Summer Institute 2001*. Lehigh University, Bethlehem, Pennsylvania, 23-27 July 2001.

Getting beyond Genes, Neurons, and Individual Minds. University of Minnesota, Minneapolis, April 18-20, 2003. Organizer: Evelyn Fox Keller.

Organized *Interactivist Summer Institute 2003*. Copenhagen, Denmark, 22-26 July 2003.

Organized *Interactivist Summer Institute 2005*. Clemson, South Carolina, 19-23 September, 2005.

Perception Action Workshop University of Connecticut 21 April 06

Kazimierz Naturalizing Epistemology Workshop Kazimierz, Poland 1-5 September 06

Emergence: A Sampler. Invited AAAI FSS-6 on *Interaction and Emergent Phenomena in Societies of Agents* Arlington, Virginia 13 October 2006

The Dynamic Nature of Representation. Web conference focusing on this paper for two weeks beginning 27 November 2006. Sponsored by http://www.interdisciplines.org/adaptation

Invited opening talk. Representation and Motivation: Two Aspects of One Underlying Interactive System. Neural Information Processing Systems (NIPS) workshop on *Grounding Perception, Knowledge, and Cognition in Sensori-Motor Experience*. 8 December 2006, Whistler, Canada.

Invited opening talk. Interactive Cognition. Workshop on *Embodying Cognition: Towards an Integrative Approach*. 14-16 December 2006, Palma de Mallorca, Spain.

Symposium on Philosophical Issues in Self-Organization. *Center for the Ecological Study of Perception and Action*, October 20-21, 2007, University of Connecticut.

Society and Creative Rationality. Keynote talk. Celebration of 40th anniversary. December 5, 2008 University of Guanajuato, Mexico

EUCogII Workshop "Challenges for Artificial Cognitive Systems II", 20-22 January 2012, Oxford

40th Oberlin Colloquium in Philosophy, Philosophy of mind, May 4-6, 2012

Papers

Problems in system theoretic empirical research. Presented at the *American Sociological Association Meetings*, September 1971, Denver, Colorado. Mark H. Bickhard, J. R. Murray.

Simultaneous equation models for organizational behavior. Presented at the Spring Meeting of the *Psychometric Society*, March 1972, Princeton, New Jersey. Mark H. Bickhard, J. R. Murray.

The child's development of the concept of family. Paper presented at the meeting of the *Society for Research in Child Development*, March 1977, New Orleans. Nancy Moore, Mark H. Bickhard, Robert Cooper.

Social interest: A pragmatist interpretation. Annual Conference of the *North American Society of Adlerian Psychology*, May 1978, Washington, D. C.

On models of knowledge and communication. Invited paper at a conference sponsored by the Center for Psychosocial Studies, September 1978, Chicago.

Knowing levels and developmental stages: An alternative conception, applied to formal operations. Annual symposium of the *Jean Piaget Society*, June 2-4, 1983, Philadelphia. Robert L. Campbell, Mark H. Bickhard

Competence and performance: An inappropriate defense of structural stages. Annual symposium of the *Jean Piaget Society*, May 31 - June 2, 1984, Philadelphia. Robert L. Campbell, Mark H. Bickhard

The social nature of the functional nature of language. Invited paper in the session on Language, Understanding, and Hermeneutics at the *Gordon Research Conference on the Foundations of Cybernetics* New Hampton, N.H. August 27 - 31, 1984.

A deconstruction of Fodor's anticonstructivism. Annual symposium of the *Jean Piaget Society* June 8, 1985, Philadelphia. Robert L. Campbell, Mark H. Bickhard

Interactivism and Genetic Epistemology. *Symposium on Interactivism and Developmental Psychology, Jean Piaget Society*, May 30, 1986, Philadelphia, Mark H. Bickhard, Robert L. Campbell.

Knowing Levels and the Development of Natural Kind Categories. *Symposium on Interactivism and Developmental Psychology, Jean Piaget Society*, May 30, 1986, Philadelphia, Robert L. Campbell, Mark H. Bickhard.

Problems in Assumptions Underlying the Piagetian Model of the Logical Time Concept. *Symposium on Interactivism and Developmental Psychology, Jean Piaget Society*, May 30, 1986, Philadelphia, D. Michael Richie, Mark H. Bickhard.

The Organizational Effects of Repetitive Experience. *Symposium on Interactivism and Developmental Psychology, Jean Piaget Society*, May 30, 1986, Philadelphia, Robert G. Cooper, Mark H. Bickhard.

Knowing Levels: The Interactive Approach to Stages. *Symposium on Post-Piagetian Stage Theory, Society for Research in Child Development*, April 23, 1987, Baltimore, Robert L. Campbell, Mark H. Bickhard.

Piaget's Rejection of Variation and Selection Constructivism. *Jean Piaget Society*, May 29, 1987, Philadelphia.

Knowing Levels and Postformal Stages. *Third Beyond Formal Operations Symposium*, June 25, 1987, Harvard University. Robert L. Campbell, Mark H. Bickhard

Contributions to a Model of Developmental Processes and Constraints. *Third Beyond Formal Operations Symposium*, June 25, 1987, Harvard University.

Rationality and Necessity. Conference on *Epistemological Foundations of Mathematical Experience*, University of Georgia, Athens, Georgia, February 26, 1988.

Types of Constraints on Development: An Interactivist Approach. *Jean Piaget Society Meetings*, Philadelphia, June 2, 1988. Robert L. Campbell, Mark H. Bickhard

Reflection and Rationality. *Jean Piaget Society Meetings*, Philadelphia, June 3, 1988.

Scaffolding and Self Scaffolding: Central Aspects of Development. *Jean Piaget Society Meetings*, Philadelphia, June 1, 1989.

Ontological Psychology: A Manifesto and Outline of Issues. *Jean Piaget Society Meetings*, Philadelphia, May 31, 1990.

Topologies of Learning and Development: An Unsolved Problem. *Jean Piaget Society Meetings*, Philadelphia, June 2, 1990.

The Argument Concerning Domain Specific versus Domain General Processes of Development. *Jean Piaget Society Meetings*, Philadelphia, May 30, 1991.

The Emergent Constitution of Persons and Relationships. *Jean Piaget Society Meetings*, Montreal, May 29, 1992.

A Model of Rationality - Implications for Expertise. Third International Conference on *Human and Machine Cognition: Expertise in Context*. Seaside, Florida, May 15, 1993.

Two Cognitive Aspects of Expertise: Rationality and Generalization. Invited plenary paper. *FLAIRS94*, Pensacola, Florida, May 7, 1994.

Interactive Representation and Autonomous Agents. Conference on *The Role of Dynamics and Representation in Adaptive Behaviour and Cognition*. Invited plenary paper. University of the Basque Country, San Sebastian, Spain, December 9, 1994.

Interaction and Representation. *Australian Association for the History, Philosophy, and Social Studies of Science*. University of New South Wales, Sydney, Australia. July 10, 1995.

How to Fill Empty Symbols. *Fourth Australasian Cognitive Science Society Meetings*, University of Newcastle, Newcastle, Australia, September 28, 1997.

Representation in Natural and Artificial Agents. *Semiosis, Evolution, and Energy*. University of Toronto, Toronto, Canada, October 18, 1997.

Intrinsic Constraints on Language. *The Ways of Worldmaking: The Reality of Constructivism II*, Heidelberg, April 30 - May 3, 1998.

An Interactive Model of Language. *Symposium on Interaction, Communication, and Meaning: The Pragmatic Dimension of Language* at the *Jean Piaget Society* meetings, Chicago, June 11-13, 1998.

Genuine Representations in Artificial Systems. Track on Foundations at the *11th Australian Joint Conference on Artificial Intelligence AI '98*, Griffith University, Brisbane, Australia, July 13-17, 1998.

Whither Representation? *Cognitive Science Society*, Madison, Aug 1-4, 1998.

A Process Model of the Emergence of Representation. *Third International Conference on Emergence: Emergence, Complexity, Hierarchy, Organisation III (ECHO III)* under the auspices of the *International Society for the Study of Emergence*, Helsinki, August 3-7, 1998.

Interaction and Representation. *From Animals to Animats: The Fifth International Conference of the Society for Adaptive Behavior*, University of Zurich, August 17-21, 1998.

The Biological Emergence of Representation. *Emergence and Reduction: The 29th Annual Symposium of the Jean Piaget Society*. Invited paper. Mexico City, June 2-5, 1999.

Function and Representation: The naturalistic emergence of normative phenomena. *Australasian Association of Philosophy*. Invited paper. Melbourne, Australia, July 4-9, 1999.

The Ontological Emergence of Representation in Autonomous Agents. Invited paper. *International Society for the History, Philosophy, and Social Sciences of Biology*. Oaxaca, Mexico, July 7-11, 1999.

The Biological Foundations of Cognitive Science. Invited paper. *The 4th Annual Meeting of the Cognitive Science Society of Ireland*. Dublin, Ireland, August 16-20, 1999.

The Dynamic Emergence of Representation. Invited paper. *Representation in Mind*. University of Sydney, Sydney, Australia, June 27-29, 2000.

Function, Anticipation, Representation. Invited paper. *CASYS 2000: Fourth International Conference on Computing Anticipatory Systems*. Liege, Belgium, August 7-12, 2000.

From Metaphysics to Rational Agents. *Interactivist Summer Institute 2001*. July 23, 2001. Lehigh University, Bethlehem, Pennsylvania.

The Interactivist Model and Analytic Philosophy. *Interactivist Summer Institute 2001*. July 25, 2001. Lehigh University, Bethlehem, Pennsylvania.

Interactivism, Neuroethology, and the Explanation of Behavior. With Cliff Hooker, University of Newcastle, Australia. *Interactivist Summer Institute 2001*. July 26, 2001. Lehigh University, Bethlehem, Pennsylvania.

Comments on Sher on The Formal-Structural View of Logical Consequence. *Interactivist Summer Institute 2001*. July 26, 2001. Lehigh University, Bethlehem, Pennsylvania.

Cognition as Emergent from Autonomy. Invited paper. Conference organized on occasion of Bickhard, Hooker, Moreno visit. Conference on *The Ontology of Autonomy: Implications and Emergents*. Australia National University, Canberra, Australia, February 12, 2002.

An Integration of Motivation and Cognition. Invited plenary presentation at the *Development and Motivation Conference*, 16-18 April 2002, Bowness, The Lake District, England.

Process and Emergence: Normative Function and Representation. Processes - Analysis and Application of Dynamic Categories. An Interdisciplinary Workshop on *Non-Reductive Theories of Processes*. June 5 - 8, 2002 Sandbjerg Castle, Sønderborg, Denmark Sponsored by the University of Aarhus, Denmark June 7, 2002. Invited plenary talk.

Cognitive Representation and Action. *Digital Interaction and Constructivism Seminar*. The IT University of Copenhagen, Monday 10 June 2002 Conference organized on the occasion of my visit.

Transcending Hume: Fact and Norm in Development. *Jean Piaget Society*, Chicago, June 7, 2003.

Interactivism: From Parmenides to Persons. *Interactivist Summer Institute 2003*. Copenhagen, Denmark, 22 July 2003.

Two New Principles of Interactivist Architecture: Microgenesis and Themes. *Interactivist Summer Institute 2003*. Copenhagen, Denmark, 26 July 2003.

Frontiers of Interactivism. *Interactivist Summer Institute 2003*. Copenhagen, Denmark, 26 July 2003.

Developmental Normativity and Normative Development. *Facts, Norms, and Development*. 16th Advanced Course, Fondation Archives Jean Piaget, University of Geneva, Geneva, Switzerland. 25 September 2003.

The Dynamic Emergence of Representation. Invited Symposium: Dynamical Systems and the Mind. *Pacific Division American Philosophical Association Meetings*, Pasadena, California. 27 March 2004.

Adéquation: Relations of inorganic, organic, and epistemic development. Invited. *Jean Piaget Society*, Toronto, 3-5 June 2004.

Piagetian Theory in Artificial Intelligence and Robotics Practice. Invited. *Jean Piaget Society*, Toronto, 3-5 June 2004.

Notes on the Negative Side of Rationality: Critical Principles. *Cognitive Science Society* meetings, Chicago, 5-7 August 2004.

Learning, Representation, and Novelty. Invited. *Performance Metrics for Intelligent Systems Workshop*. *National Institute of Standards and Technology*. Gaithersburg, Maryland, 26 August 2004.

Negative Knowledge and Rational Creativity. Invited. *Performance Metrics for Intelligent Systems Workshop*. *National Institute of Standards and Technology*. Gaithersburg, Maryland, 26 August 2004.

Substance Aporia and Their Dissolutions. Invited. *Dynamic Ontology*. Trento, Italy, 8-11 September 2004.

Creativity and Rationality: Interrelationships and Implications for Education. Invited Plenary Speaker *Creativity and Education*. Taipei, Taiwan 20 May 2005.

Are You Social? The Ontological and Developmental Emergence of the Person. Invited plenary presentation. *Jean Piaget Society* Meetings, Vancouver, 2 June 2005.

Functional Scaffolding and Self-scaffolding. Invited. Session on Scaffolding. *Jean Piaget Society*, Vancouver, 3 June 2005.

From Parmenides to Persons. *Interactivist Summer Institute 05*, Clemson, South Carolina, 19 September 2005.

Jerry Fodor and Interactivism. With Susan Schneider. *Interactivist Summer Institute 05*, Clemson, South Carolina, 20 September 2005.

Frontiers of Interactivism. *Interactivist Summer Institute 05*, Clemson, South Carolina, 22 September 2005.

The Brain Doesn't Work That Way. *Interactivist Summer Institute 05*, Clemson, South Carolina, 22 September 2005.

Anticipation and Representation. Invited plenary presentation. *From Reactive to Anticipatory Cognitive Embodied Systems*. AAAI 2005 Fall Symposium, Arlington, Virginia, 3 November 2005.

Process, Representation, Consciousness. *Eastern Pennsylvania Philosophical Association* Susquehanna University Selinsgrove, PA 1 April 06

Resolving Some Perplexities About Consciousness and Cognition. *European Computing and Philosophy Conference*, Norwegian University of Science and Technology, Trondheim, Norway, June 22, 2006

Toward a Naturalism of Intentionality and Consciousness. Invited *Kazimierz Naturalizing Epistemology Workshop* Kazimierz, Poland 2 September 06

Emergence: A Sampler. Invited AAAI FSS-6 on *Interaction and Emergent Phenomena in Societies of Agents* Arlington, Virginia 13 October 2006

The Dynamic Nature of Representation. Web conference focusing on this paper for two weeks beginning 27 November 2006. Sponsored by http://www.interdisciplines.org/adaptation

Invited opening talk. Representation and Motivation: Two Aspects of One Underlying Interactive System. Neural Information Processing Systems (NIPS) workshop on *Grounding Perception, Knowledge, and Cognition in Sensori-Motor Experience*. 8 December 2006, Whistler, Canada.

Invited opening talk. Interactive Cognition. Workshop on *Embodying Cognition: Towards an Integrative Approach*. 14-16 December 2006, Palma de Mallorca, Spain.

Language as a Tool System. *MIT Media Labs*, May 3, 2007.

The Brain Doesn't Work That Way. *MIT Media Labs*, May 3, 2007.

From Parmenides to Persons. *Interactivist Summer Institute*, May 26, 2007, The American University in Paris.

On the Perversities of Bad Metaphysics. *Interactivist Summer Institute*, May 27, 2007, The American University in Paris.

With Richard Campbell: Physicalism, Emergence, and Downward Causation. *Interactivist Summer Institute*, May 27, 2007, The American University in Paris.

The Brain Doesn't Work That Way. *Interactivist Summer Institute*, May 28, 2007, The American University in Paris.

The Evolutionary Exploitation of Microgenesis. *Interactivist Summer Institute*, May 28, 2007, The American University in Paris.

Frontiers of Interactivism. *Interactivist Summer Institute*, May 29, 2007, The American University in Paris.

Normative Regularities Without Rules. Session on Norms and Neurons, *Jean Piaget Society* meetings, May 31, 2007, Amsterdam.

The Brain Doesn't Work That Way. Session on Theory. *Jean Piaget Society* meetings, June 1, 2007, Amsterdam.

The Emergence of Normativity. Workshop on Emergence, *Parmenides Foundation*, June 6-9, 2007, Wildbad Kreuth, Germany.

The Brain Doesn't Work That Way. *Konrad Lorenz Institute*, June 12, 2007, Altenberg, Austria.

The Brain Doesn't Work That Way. *Parmenides Foundation*, August 10, 2007, Munich, Germany.

Issues in Process Metaphysics. Symposium on Philosophical Issues in Self-Organization. *Center for the Ecological Study of Perception and Action*, October 20-21, 2007, University of Connecticut.

The Emergence of the Social Level of Reality. September 28, 2007 Conference on Levels of Reality. *Mitteleuropa Foundation*. (September 27-29, 2007). Bolzano, Italy.

Representation, Cognition, Language. October 5, 2007. *Faculty of Humanities, Cognition, Communication, Culture Symposium Series*, Aarhus University, Aarhus, Denmark.

From Agency to Social Agency. March 28-29, 2008. Franklin and Marshall, Conference on *Human Action and the Natural World*, Lancaster, Pennsylvania.

Darwinian Explanations. February 20, 2008. *Darwin's Birthday Celebration*. Lehigh University, Bethlehem, Pennsylvania.

The Microgenetic Dynamics of Cortical Attractor Landscapes. May 22-23, 2008. Workshop on "*Dynamics in and of Attractor Landscapes*", Parmenides Foundation, Isola d'Elba, Italy.

The Emergence of Normativity. July 30, 2008. Workshop on *Emergence: Nature's Mode of Creativity – The Human Dimension*, IRAS (Institute on Religion in an Age of Science), Star Island, New Hampshire.

Cortical Dynamics and Cognitive Dynamics. November 13, 2008 *Laboratoire Adaptation Perceptivo-Motice et Apprentissagae*, University of Toulouse Toulouse France.

Cognition and Evolutionary Epistemology December 4, 2008 University of Guanajuato, Mexico.

Bickhard, M. H. Is Cognition Necessarily Embodied? *Jean Piaget Society*, Park City, Utah, June 4, 2009.

Bickhard, M. H. Some Principles of Dynamics and Development. *Jean Piaget Society*, Park City, Utah, June 4, 2009.

Bickhard, M. H. Parmenides to Persons. *Interactivist Summer Institute*, Vancouver, June 9, 2009.

Bickhard, M. H. Some Issues in Metaethics. *Interactivist Summer Institute*, Vancouver, June 10, 2009.

Campbell, R., Christopher, J. C., Bickhard, M. H. Developmental Psychology of the Whole Person: Transcending False Alternatives. *Interactivist Summer Institute*, Vancouver, June 10, 2009.

Bickhard, M. H, Carpendale, J., Martin, J., Racine, T., Sugarman, J. Panel Discussion: Early Social Development. *Interactivist Summer Institute*, Vancouver, June 12, 2009.

Bickhard, M. H, Müller, U. Panel Discussion: Executive Function. *Interactivist Summer Institute*, Vancouver, June 12, 2009.

Bickhard, M. H. The Induction and Control of Central Nervous System Attractor Landscapes: The Emergence of Representational Normativity in the Brain. *Interactivist Summer Institute*, Vancouver, June 12, 2009.

Bickhard, M. H. Frontiers of Interactivism. *Interactivist Summer Institute*, Vancouver, June 12, 2009.

Bickhard, M. H. The Metaphysics of Personhood. *American Psychological Association Division 24 winter meetings*, Miami, Florida, February 27, 2010.

Bickhard, M. H. Toward an Ontological Psychology. *American Psychological Association Division 24 winter meetings*, Miami, Florida, February 27, 2010.

Bickhard, M. H. Language as an Interaction System. *Penn Linguistics Colloquium 34*, University of Pennsylvania, Philadelphia, March 19, 2010.

Bickhard, M. H. (2011). Rationality is Broader Than Logic. *International Society for Theoretical Psychology*, June 27 — July 1, Thessaloniki, Greece.

Bickhard, M. H. (2011; July 29). Parmenides to Persons. *Interactivist Summer Institute*, July 29 — August 1, 2011, Syros, Greece.

Bickhard, M. H. (2011; July 30). Interactivism and Central Nervous System Dynamics. *Interactivist Summer Institute*, July 29 — August 1, 2011, Syros, Greece.

Bickhard, M. H. (2011; August 1). Iatrogenics in the Philosophy of Mind. *Interactivist Summer Institute*, July 29 — August 1, 2011, Syros, Greece.

Bickhard, M. H. (2011; August 1). Ethics and Metaethics from an Interactivist Perspective. *Interactivist Summer Institute*, July 29 — August 1, 2011, Syros, Greece.

Bickhard, M.H. (2011; 3 Oct). What could cognition be ... if not computation, or connectionism, or dynamic systems? *Philosophy and Theory of Artificial Intelligence*. Anatolia College, Thessaloniki, Greece.

Bickhard, M. H. (2012; 28 Feb). Emergent Mind: The Emergence of Mentality in Interactive Process Ontologies. *Foundations of Enactive Cognitive Science*. Cumberland Lodge, Great Park, Windsor, UK 28 Feb 12

Bickhard, M. H. (2012). The Metaphysics of Emergence. *Conference on Emergence and Non-Fundamentalist Metaphysics*, Faculty of Sciences of the University of Lisbon, May 16, 2012.

Bickhard, M. H. Development and Central Nervous System Dynamics. *Jean Piaget Society*, Toronto, May 31, 2012

Bickhard, M. H. Representation, Language, and the Brain. *Institut für Neuroinformatik, Theory of Cognitive Systems*, University of Bochum, Bochum, Germany, October 18, 2012.

Bickhard, M. H. Cognition and the Brain. *Interacting Minds Group*, Aarhus University, Aarhus, Denmark, October 30, 2012.

Bickhard, M. H. Representation: An Interactivist Model. Workshop: *Representation: Functionalist, structuralist, and interactivist accounts*. Aarhus University, Aarhus, Denmark, November 2, 2012.

Bickhard, M. H. (2013). An Emergentist Argument Against Contemporary Reductionist Neuropsychology. *The Metaphysics of Free Will: Empowerment, Agency, and Freedom*. UMB (Norwegian University of Life Sciences), Ås, Norway, April 18, 2013.

Bickhard, M. H. Towards a model of central nervous system macro-functional processing. *Jean Piaget Society*. Jun 7, 2013 Chicago.

Bickhard, M. H. Parmenides to Persons. *Interactivist Summer Institute* Aug 1, 2013, University of South Florida, St. Petersburg, FL

Bickhard, M. H. Interactivism and Central Nervous System Dynamics. *Interactivist Summer Institute* Aug 1, 2013, University of South Florida, St. Petersburg, FL

Bickhard, M. H. Introducing Interactivism. *Interactivist Summer Institute* Aug 2, 2013, University of South Florida, St. Petersburg, FL

Bickhard, M. H. The Anticipative Brain: Two Approaches. *Interactivist Summer Institute* Aug 3, 2013, University of South Florida, St. Petersburg, FL

Bickhard, M. H. Iatrogenics in the Philosophy of Mind. *Interactivist Summer Institute* Aug 4, 2013, University of South Florida, St. Petersburg, FL

Bickhard, M. H. (2013). The Predictive Brain: A Critique. *Philosophy and Theory of Artificial Intelligence*. 21 Sep 13 Oxford, UK

Bickhard, M. H. (2014). (Inter-)Action as a Framework for Understanding Piaget. May 29, 2014, *Jean Piaget Society*, San Francisco, CA

Bickhard, M. H. (2014). How do you Operationalize a Person? *Jean Piaget Society*, May 30, 2014, San Francisco, CA

Bickhard, M. H. (2014). The Social-Interactive Ontology of Language. *Finding Common Ground: Social, Ecological, and Cognitive Perspectives on Language Use*, June 12, 2014, University of Connecticut, Storrs, CT

Bickhard, M. H. (2014). Functional Dynamics of the Central Nervous System. *The Thirteenth Annual Summer Interdisciplinary Conference (ASIC 2014)*, June 23, 2014, Moab, Utah.

Bickhard, M. H. (2014). Robot Sociality: Genuine or Simulated? *Robo-Philosophy*, Aarhus University, August 20, 2014, Aarhus, Denmark.

Bickhard, M. H. (2014). Dissolving Dichotomies: Naturalism vs Anti-Naturaliasm; Empiricism vs Rationalism *Philosophy Unbound*, Lehigh University, 24 Oct 14

Bickhard, M. H. (2014). Perceiving and Apperceiving. *AAAI Fall Symposium: Modeling Changing Perspectives: Re-conceptualizing sensory-motor experiences*. Arlington, Virginia, November 14, 2014.

Bickhard, M. H. (2015). Representation and/or Anticipation. *First International Conference on Anticipation*. 7 Nov 15 University of Trento.

Bickhard, M. H. (2015). Representing as an Agentive Activity, Not a Structure. Invited plenary talk. *Situating Cognition: Agency, Affect, and Extension*. The Institute of Philosophy, University of Warsaw.

Bickhard, M. H. (2015). The Dynamics of Reflection. *Jean Piaget Society*, Toronto, 4 Jun 15.

Bickhard, M. H. (2015). What is Theory? And Why Should you Care? *Jean Piaget Society*, Toronto, 4 Jun 15.

Bickhard, M. H. (2015). Epistemology as Evolutionary Epistemology. *Conference in honor of Donald Campbell*. Lehigh University. 10 Sep 15.

Bickhard, M. H. (2015). Parmenides to Persons. *Interactivist Summer Institute 2015*. Ankara, Turkey. 20 Jun 15.

Bickhard, M. H. (2015). Interactivism and Central Nervous System Dynamics. *Interactivist Summer Institute 2015*. Ankara, Turkey. 20 Jun 15.

Bickhard, M. H. (2015). Inter- and En- Activism. *Interactivist Summer Institute 2015*. Ankara, Turkey. 21 Jun 15.

Bickhard, M. H. (2015). The Anticipative Brain: Two Approaches. *Interactivist Summer Institute 2015*. Ankara, Turkey. 22 Jun 15.

Bickhard, M. H. (2015). Panel discussion on Enactivism. *Interactivist Summer Institute 2015*. Ankara, Turkey. 23 Jun 15.

Bickhard, M. H. (2015). An Interactivist Perspective on Ethics. *Interactivist Summer Institute 2015*. Ankara, Turkey. 23 Jun 15.

Bickhard, M. H. (2016). Cognition and the Brain. *Konrad Lorenz Institute*, Klosterneuburg, Austria, May 30, 2016.

Bickhard, M. H. (2016). The Interactivist Model. *Boğaziçi University, Department of Philosophy*, Istanbul, June 1, 2016.

Bickhard, M. H. (2016). Interactivism and Enactivism: Some Thoughts and Comparisons. *Boğaziçi University, Department of Philosophy*, Istanbul, June 1, 2016.

Bickhard, M. H. (2016). Emergent Mental Phenomena. *Minds, Selves and 21st Century Technology*, Lisbon, June 24, 2016.

Bickhard, M. H. (2016). Inter- and En- Activism: Emergence and Correlation. *The Biological Foundations of Enactivism*, Cancun, Mexico, July 4, 2016.

Bickhard, M. H. (2016). Cognition and the Brain. *Artificial Life*, Cancun, Mexico, July 6, 2016.

Working Conferences

Invited member at the Working Conference on the Social Foundations of Language and Thought, sponsored by the Center for Psychosocial Studies, September 1978, Chicago.

Invited member at the pre-conference study groups on: Psychotherapeutic Practice; The Social Impact of Psychotherapy; Research in Psychotherapy; Training in Psychotherapy at the International Conference on Psychotherapy, February 20, 21, & 22, 1983, Bogota, Colombia.

Invited presenter at the Gordon Research Conference on the Foundations of Cybernetics, the session on Language, Understanding, and Hermeneutics. New Hampton, N.H. August 27 - 31, 1984.

Session chair at the Gordon Research Conference on Cybernetics and Cognition, the session on Language and Communication, Wolfeboro, N.H. June 9 - 13, 1986.

Representational Content in Humans and Machines. Plenary Paper. The Second International Workshop on Human and Machine Cognition: Android Epistemology. May 9-11, 1991, Pensacola, Florida.

AAAI Fall 91 Symposium - Knowledge and Action at Social and Organizational Levels. Asilomar, Pacific Grove, California November 14 - 17, 1991.

World Mirroring versus World Making: There's Gotta be a Better Way. Plenary paper. Conference on Alternative Epistemologies in Education. Athens, Georgia, Feb 20-23, 1992.

Levels of Representationality. Plenary paper. Conference on The Science of Cognition. Santa Fe, New Mexico, June 15-18, 1992.

Emergence. Conference on *Downward Causation*. Chair: Peter Boegh Andersen. Aarhus University, Denmark. 23, 24 May 1997.

Process, Representation, Consciousness. Working conference on *Process and Cognition*. Verona, Italy, 12-13 September, 2004.

Workshop on *The Whole Person*. Greenville, South Carolina, 17-18 September, 2005.

Invited speakers symposium, *Philosophy and Theory of Artificial Intelligence*, Anatolia College, Thessaloniki, Greece, October 5, 2011.

Invited Talks

"A Model of Cognitive Development." Department of Psychology, Yale University, 1974.

"A Model of Psychosocial Processes." Department of Psychology, Yale University, 1975.

"Structural Analyses." National Opinion Research Center, University of Chicago, 1975.

"A Mathematical Model of Psychological Processes." Department of Psychology, University of Virginia at Charlottesville, 1976.

"Language as an Action System." Committee on Cognition and Communication, University of Chicago, 1977.

"Communication Structures." The Center for Psychosocial Studies, Chicago, May 1977.

"Functional Models of Psychological Processes." The Center for Psychosocial Studies, Chicago, September 1977.

"The Concept of Mind in Psychology." Rollins College, Winterpark, Florida, February 1978.

"Cognition, Convention, and Communication." Rollins College, Winterpark, Florida, February 1978.

"An Adlerian Metapsychology." California School of Professional Psychology, Los Angeles, March 1978.

Panel member "The Historical Development of Adler's Theory." Annual Conference of the North American Society of Adlerian Psychology, Las Vegas, May 1979.

"Thinking About Cognition." Human Experimental Group, Psychology Department, The University of Texas at Austin, January 1980.

"A Model of Language and Language Acquisition." Language Acquisition Group, The University of Texas at Austin, September 1981.

"An Incoherence in the Assumption of Encoding as the Foundation for Epistemology." Annual meeting of the American Society for Cybernetics, Washington, D. C., October 1981.

Panel member "Language and Self Reference." Annual meeting of the American Society for Cybernetics, Washington, D. C., October 1981.

Panel member "The Relationship between Theory and Practice." International Conference on Psychotherapy, Bogota, Colombia, February 24, 1983.

Panel member "Social and Ideological Aspects of the Practice of Psychotherapy." International Conference on Psychotherapy, Bogota, Columbia, February 25, 1983.

"Cognitive Representation in the Brain: Cognition." Clinical Neuroscience Conference on Cognitive & Linguistic Neuroscience, University of Texas Health Science Center at San Antonio, January 10, 1985.

"Cognitive Representation in the Brain: Perception." Clinical Neuroscience Conference on Cognitive & Linguistic Neuroscience, University of Texas Health Science Center at San Antonio, February 7, 1985.

"Cognitive Representation in the Brain: Language." Clinical Neuroscience Conference on Cognitive & Linguistic Neuroscience, University of Texas Health Science Center at San Antonio, March 7, 1985.

"Cognitive Representation in the Brain: Psychopathology." Clinical Neuroscience Conference on Cognitive & Linguistic Neuroscience, University of Texas Health Science Center at San Antonio, April 11, 1985.

"Developmental Psychology." Invited lecture at the University of the Andes, Bogota, Colombia, August 20, 1985.

"The Nature of Psychopathology." Invited talk for the Psychiatric training group, military hospital, Bogota, Colombia, August 21, 1985.

"Development, Language, and the Mind." Invited lecture at the University of the Andes, Bogota, Colombia, August 22, 1985.

"An Interactivist Approach to Perception." Invited talk at the User Interface Institute, IBM Thomas J. Watson Research Institute, Yorktown Heights, NY, June 5, 1986.

"Interactivism and Developmental Psychology." Invited talk at Project Spectrum, Tufts University, Cambridge, Mass., June 6, 1986.

"Representation in the Mind: a Function, not a Thing." Invited talk for the Center for the Enhancement of Human Performance at the University of Texas Health Science Center, San Antonio, Texas, July 22, 1986.

"The Nature of Representation." Invited talk to the Common Sense Reasoning group, University of Texas Department of Computer Science, October 17, 1986.

"The Nature of Psychopathology." Invited talk at Ingleside Hospital, Rosemead, California October 8, 1987.

Conference on *Exploring Creativity* Sponsored by the Graduate School and the Graduate Student Association of the University of Texas Health Sciences Center at San Antonio, and the Mind Science Foundation of San Antonio: "Creativity: A Humanist's Viewpoint." Amy Freeman Lee; "Creativity: A Cognitive Viewpoint." Mark H. Bickhard; "Creativity: A Physicist's Viewpoint." Steven Weinberg. March 3, 1989

"Scaffolding and Self-Scaffolding." Developmental Group, Department of Psychology, University of Texas, February 7, 1990

"An Introduction to Ontological Psychology." Lehigh University, March 1, 1990.

"An Integration of Robotics and Artificial Intelligence." Department of Computer Science and Electrical Engineering. Lehigh University, October 3, 1990

The Age 4 Transition; Discussant. A symposium at the meetings of the Society for Research in Child Development. Seattle, Washington, April 18, 1991

Reformulating Dualistic Theories in Developmental Research; Discussant. A symposium at the meetings of the Society for Research in Child Development. Seattle, Washington, April 19, 1991

"A New Vision for Cognitive Science." Beckman Institute, University of Illinois, Champaign-Urbana, February, 1993.

"Scaffolding, Self-scaffolding, and Education." University of Illinois, Champaign-Urbana, February, 1993.

"Robots and Representations." Colorado State University, Ft. Collins, Colorado, March 4, 1994.

"Interaction and Representation." Albright College, Reading, Pennsylvania, March 16, 1994.

"Robots and Representation." Vassar College, Poughkeepsie, NY, October 3, 1994.

"Are We Emergent from Physics?" Newcastle Philosophy Club, University of Newcastle, Newcastle, Australia, September 23, 1997.

"Foundations of Cognitive Science." Centre Leo Apostel, Brussels, May 5, 1998.

"Master Class in Cognitive Science." SUNY Binghamton, Graduate Program in Philosophy and Computers & Cognitive Science, September 18, 1998.

"Steps Toward a Process Metaphysics of Persons: Representation." Colloquium. SUNY Binghamton, Graduate Program in Philosophy and Computers & Cognitive Science, September 18, 1998.

"The Emergence of Function in Far from Equilibrium Systems." Physics Department, Lehigh University, September 24, 1998.

"The Emergence of Representation in Autonomous Embodied Agents." NEC, Princeton, NJ, December 14, 1998.

"Dynamics and Representation." Institute for Human and Machine Cognition, University of West Florida, Pensacola, Florida, May 19, 2000.

"The Dynamic Emergence of Representation." Australian National University, Canberra, Australia, June 22, 2000.

"Motivation and Cognition." Australian National University, Canberra, Australia, June 23, 2000.

"An Interactive Model of Representation." Cognitive Science Program, Lund University, Sweden, July 24, 2000.

"Representation in Natural and Artificial Agents." SS. Cyril and Methodius University Cognitive Science Group. Skopje, Republic of Macedonia, September 23, 2000.

"How to Put the Cognition in Cognitive Science." Inaugural address for new Cognitive Science Program. Montclair State University, Montclair, New Jersey, October 11, 2000.

"The Dynamic Emergence of Representation." Five College Cognitive Science Program University of Massachusetts, Amherst, Massachusetts, November 9, 2000.

"Dynamic Biology: Process, Emergence, Normativity." Konrad Lorenz Institute, Altenberg, Austria. 23 June 2003.

"Dynamics and Representing: An Emergent from the Problem of Interaction Selection." University of Skövde, Skövde, Sweden, 12 August 2003.

"Learning, Development, and Scaffolding." University of Skövde, Skövde, Sweden, 13 August 2003.

"Social Reality and Language." University of Skövde, Skövde, Sweden, 14 August 2003.

"Primary Consciousness and Reflective Consciousness." University of Skövde, Skövde, Sweden, 25 August 2003.

 "An Integration of Motivation and Cognition." Simon Fraser University, Vancouver, Canada, 12 March 2004.

"A Career in Cognitive Science." Towson University, Towson, Maryland, 16 July 2004.

"Dissolving the Problems of Consciousness." Lehigh Philosophy Department, Bethlehem, Pennsylvania, 22 February 2005.

"Consciousness and Reflective Consciousness." Moravian College, Bethlehem, Pennsylvania, 23 March 2005.

"The Brain Doesn't Work That Way: From Microgenesis to Cognition." Franklin and Marshall College, Lancaster, Pennsylvania, 1 April 2005.

"The Brain Doesn't Work That Way: From Microgenesis to Cognition." Lehigh Cognitive Science talk, Psychology Brown Bag, Bethlehem, Pennsylvania, 14 April 2005.

 "Exploring Instructional Design from the Negative Side of Rationality: An Interactive Discussion between Cognitive Theorists and Instructional Designers." Roundtable Discussion, *Association for Educational Communications and Technology*, Orlando, Florida, 20 October 2005.

"The Dynamic Emergence of Representation." University of South Florida, Philosophy Department, Tampa, Florida, 21 October 2005.

"Biological Foundations of Cognitive Science" *Cognitive Science Club* Kutztown University, 9 December 2005

Process, Representation, Consciousness *Perception, Action Workshop* University of Connecticut, 21 April 2006

The Emergence of Representation and Consciousness: Natural and Artificial. The American University of Paris, 26 September 2006

Two hour telephone discussion of my work on emergence with John Symons' Philosophy class, University of Texas at El Paso, 13 November 2006.

Interactivism. October 2, 2007 Class discussion: Philosophy of Mind. Department of Philosophy, Aarhus University, Aarhus, Denmark.

Is Normativity Natural? October 3, 2007 Department of Philosophy, Aarhus University, Aarhus, Denmark.

The Microgenetic Dynamics of Cortical Attractor Landscapes. September 17, 2008 Cognitive Science, Lehigh University

Representation, Cognition, and Language December 9, 2008 Philosophy Club Kutztown University

Psychopathology 4 Feb 11 Franklin & Marshall

Philosophy of Mind 7 Apr 11 University of Pennsylvania

What could cognition be ... if not computation, or connectionism, or dynamic systems? *Boğaziçi University*, Istanbul, Philosophy Department, October 7, 2011

From Agency to Social Agency, Interactive Minds Group at the Center for Functionally Integrated Neuroscience, University of Aarhus, Denmark, 16 Dec 11

Psychopathology. Franklin & Marshall February 10, 2012.

The Central Nervous System as a Population of Endogenously Active Systems. Lehigh Department of Psychology February 16, 2012.

The Biological Foundations of Cognitive Science. University of Reading, UK. 29 Feb 12

Bickhard, M. H. Introducing Interactivism. *Department of Philosophy*, Aarhus University, Aarhus, Denmark, October 26, 2012.

Bickhard, M. H. Free Will and the Dynamics of Acting. *Philosophy*, UMB (Norwegian University of Life Sciences), Oslo, Norway, 6 Nov 12.

Psychopathology. Franklin & Marshall January 13, 2013.

Bickhard, M. H. Panel: Internalization: Does it exist, and if so, what is it? Jean Piaget Society Jun 7, 2013 Chicago.

Psychopathology. Franklin & Marshall February 6, 2014.

Bickhard, M. H. Interactivism, Enactivism, and the Emergence of Sociality: Implications of a Process View. *Center for Human Interactivity*, University of Southern Denmark, Odense, Denmark, August 25, 2014.

Psychopathology. Franklin & Marshall February 24, 2015.

Bickhard, M. H. Interactivism and Central Nervous System Dynamics. Institute of Cognitive and Brain Sciences. University of California, Berkeley, CA. 29 Jan 16

Why can brains do it, but not rocks? Lehigh University Philosophy Club, 15 Nov 16.

Why can brains do it, but not rocks? Kutztown University Philosophy Club, 9 Dec 16.