

CURRICULUM VITAE
MICHAEL DAVID RESNIK

Born: March 20, 1938, New Haven, Connecticut

Education:

Yale University, New Haven, Connecticut, B.A. as a Scholar of the House in Mathematics and Philosophy, 1960

Harvard University, Cambridge, Massachusetts, M.A. in Philosophy, 1962; Ph.D. in Philosophy, 1964

Academic Experience:

University Distinguished Professor, The University of North Carolina at Chapel Hill, 1988-

Professor, The University of North Carolina at Chapel Hill, 1975-1988

Member, Social Science Research Institute, The University of North Carolina at Chapel Hill, 1985-present; Fellow of the UNC Institute of Arts and Humanities, 1988-

Visiting Fellow, Center for The Study of Science in Society, Virginia Polytechnic Institute and State University, Blacksburg, Virginia, Spring, 1984

Chairman, The University of North Carolina at Chapel Hill, 1975-1983

Associate Professor, The University of North Carolina at Chapel Hill, 1967-1975

Visiting Assistant Professor, Washington University, St. Louis, Missouri, 1966-1967

Assistant Professor, The University of Hawaii, Honolulu, 1964-1967; Member, Social Science Research Institute, 1966-1967

Memberships:

American Philosophical Association

Association for Symbolic Logic

Philosophy of Science Association

Grants:

Co-principal investigator with C. Y. Cheng on N.S.F. Grant G.S. 835, "Classical Chinese Logic and Scientific Methodology", 1965-1966
Director, National Endowment for the Humanities Summer Seminar for College Teachers, "Frege and the Philosophy of Mathematics", 1980
Participant in a Sloan Foundation grant to the University of North Carolina Public Policy Analysis Program, 1979-1981
Director, National Endowment for the Humanities Summer Seminar for College Teachers, "Frege and the Philosophy of Mathematics", 1984
Director, National Endowment for the Humanities Summer Seminar for College Teachers, "Frege and the Philosophy of Mathematics", 1988
Director, National Endowment for the Humanities Summer Seminar for College Teachers, "Frege and the Philosophy of Mathematics", 1992

Professional Activities:

Research Mathematician, U. S. A. F. Cambridge Research Laboratories, Bedford, Massachusetts, 1961-1963

Taught a farrier course during the summer of 1973

Member of the Program Committee for the Annual Meeting of the Association for Symbolic Logic, December, 1973

Secretary-Treasurer, North Carolina Philosophical Society, 1977-1979;
President, 1980-1981

Special consultant to the Dean of the College of Arts and Sciences of the University of Virginia, Fall, 1980

Philosophy of mathematics advisor to the American Philosophical Society Program Committee, 1993-1997

Tenure or promotion evaluator for: Case Western Reserve University, Hebrew University of Jerusalem, University of Illinois, University of Michigan, University of Minnesota-Duluth, University of Vermont, Kent State University, University of Virginia, Vanderbilt University, Rutgers University, State University of New York at Albany, State University of New York at Binghamton, Ohio State University, Tufts University, University of Tennessee, University of Massachusetts, University of Minnesota at Morris, University of Utah, University of West Virginia, University of California at Berkeley, University of Vermont, Indiana University, University of New Mexico.

Chaired: sessions at the American Philosophical Association Eastern Division Meetings, December, 1974; Eastern Division Meetings, December, 1981; Western Division Meetings, April, 1978, Pacific Division Meetings, April 1995, Philosophy of Science Association Meetings, October 1984, APA Pacific Division Meetings, March 1996.

Commentator on Timothy McCarthy's "On a Theory of Logical Constancy", American Philosophical Association Meetings, December, 1977; on Stewart Shapiro's "Reflections on Mathematical Practice", APA, December, 1985; on Susan Vineberg's "Justification and the Pragmatic Indispensability Argument" Central Division APA, May 1999.

Organized a conference on the Philosophy of Mathematics, sponsored by UNC-Chapel Hill and UNC-Greensboro and held at UNC-Greensboro in March, 1979

Awarded Kenan Leave, UNC-Chapel Hill, Spring, 1981; West House Leave fall

1988.

Referee for Journal of Philosophical Logic, Notre Dame Journal of Formal Logic, NOUS, Philosophy of Science, Archiv fur Geschichte der Philosophie, British Journal for the Philosophy of Science, Philosophy Research Archives, The University of Minnesota Press, The Canadian Journal of Philosophy, Ethics, Cambridge University Press, The National Endowment for the Humanities, The National Science Foundation, Cornell University Press, Oxford University Press, Synthese, Philosophy and Phenomenological Research, Erkenntnis and MIT Press, The Journal of Symbolic Logic, Erkenntnis.

Referee and member, editorial board of History and Philosophy of Logic, Philosophia Mathematica

Papers Presented:

1. "On Skolem's Paradox", read to the Pacific Division, American Philosophical Association, San Francisco, 1965.
2. "A Unified Theory of Types", read to the American Mathematical Society, Honolulu, 1966.
3. "A Set Theoretic Approach to the Theory of Types", read to the Association for Symbolic Logic, Houston, 1967.
4. "The Frege-Hilbert Controversy", read to The University of North Carolina Philosophy of Science Colloquium, 1969.
5. "The Frege-Hilbert Controversy", read to the Association for Symbolic Logic, Cleveland, Ohio, 1969.
6. "On the Philosophical Significance of Consistency Proofs", read to the Department of Philosophy of University of North Carolina-Chapel Hill, 1970.
7. "On the Philosophical Significance of Consistency Proofs", read to the Department of Philosophy of the University of Western Ontario, 1970.
8. "A Note on the Null Set Axiom" (with Anthony Coyne), read to the Association for Symbolic Logic, Atlanta, Georgia, 1973.
9. "Mathematical Knowledge", read to the North Carolina Philosophical Society, 1974.
10. "Mathematical Knowledge and Pattern Cognition", read to the Department of Philosophy, University of North Carolina at Chapel Hill, 1975.
11. "A Remark on Frege's Class Theory", read to the Association for Symbolic Logic, 1976.
12. "Constructive Philosophies of Mathematics", read to the Department of Philosophy of Virginia Polytechnic Institute and State University, Blacksburg, Virginia, 1976.
13. "Can the Totality of the Natural Numbers Be Constructed?", read to the North Carolina Philosophical Society, 1977.
14. "Diagnosis -- A Philosophical Analysis", read to the Department of Philosophy of Davidson College, Davidson, North Carolina, 1978.
15. "Diagnosis -- A Philosophical Analysis", read to the Department of Philosophy of University of North Carolina at Chapel Hill, 1978.
16. "Diagnosis -- A Philosophical Analysis", read to the Clinical Scholars Program of the University of North Carolina School of Medicine, 1978.
17. "Frege's Conception of Sets as Logical Objects", read to the Association for Symbolic Logic, San Diego, California, 1979.
18. "Towards Understanding Reference to Mathematical Objects", read to the University of North Carolina at Chapel Hill and the University of North Carolina at Greensboro Conference on the Philosophy of Mathematics, 1979.
19. "Diagnostic Reasoning", read to the Department of Philosophy of the University of South Carolina, Columbia, South Carolina, 1980.
20. "How Not to Derive Utilitarianism from Axioms of Rationality", read to Davidson College, Davidson, North Carolina, 1980.

21. "How Not to Derive Utilitarianism from Axioms of Rationality", read to Department of Philosophy of Washington University, St. Louis, Missouri, 1981.
22. "How Not to Derive Utilitarianism from Axioms of Rationality", read to Randolph-Macon Women's College, Lynchburg, Virginia, 1981.
23. "How Not to Derive Utilitarianism from Axioms of Rationality", read to The North Carolina Philosophical Society as the Presidential Address, 1981.
24. "Mathematics as the Science of Patterns", read to the Buffalo Logic Colloquium, SUNY-Buffalo, 1981.
25. "Mathematics as the Science of Patterns", read to the Department of Philosophy of the University of California at San Diego, 1981.
26. "Philosophers' Models of Rational Thought -- Normative or Descriptive?", Invited Address to the Southern Society for Philosophy and Psychology, Louisville, Kentucky, 1981.
27. "Mathematics as the Science of Patterns: Epistemology", Invited Symposium Paper read to the Western Division, American Philosophical Association, Columbus, Ohio, April, 1982.
28. "Decisions, Decisions, Decisions, . . .", read to the Department of Philosophy of University of North Carolina at Chapel Hill, September, 1982.
29. "Decisions, Decisions, Decisions, . . .", read to the Pacific Division, American Philosophical Association, Berkeley, California, March, 1983.
30. "Frege's Proof of Referentiality: What's Right with it?" read to the Seventh International Congress of Logic, Methodology and Philosophy of Science, Salzburg, Austria, July 1983.
31. "Frege's Proof of Referentiality: What's Right with it?" read to the faculty of the University of Amsterdam, July 1983.
32. "Philosophers' Models of Rationality: Normative or Descriptive?" (revised version of 26) read to the Duke University Philosophy Colloquium, November 1983.
33. "Philosophers' Models of Rationality: Normative or Descriptive?" (revised version of 26) read to Davidson College, November 1983.
34. "The Problem of the Interpersonal Comparison of Utilities" talk given to the Horace Williams Philosophy Club (a group of non-philosophers) in Charlotte, November 1983.
35. "Philosophers' Models of Rationality: Normative or Descriptive?" (revised version of 26) read to the Center for the Study of Science in Society at Virginia Polytechnic and State University, January 1984.
36. Talk on Hartry Field's philosophy of mathematics presented to the V P I Philosophy Department, January 1984.
37. Talk on axiomatic welfare economics given to the V P I Economics Department, March 1984.
38. "The Many Heads of Hartry Field" read to the Philosophy Department of the University of Virginia, March 1984.
39. "How Nominalist is Hartry Field's Nominalism?" read to the Logic Colloquium, The University of California at Berkeley, April, 1984.
40. "How Nominalist is Hartry Field's Nominalism?" read to the Philosophy Department of the University of Chicago, April 1984.
41. "Notes on Rationality and Constancy" Talk to the Davidson College Philosophy Club, October 1984.
42. "The Structuralist View of Mathematics" Paper read to the Philosophy Department of the University of West Virginia, April 1985.
43. "Explanation, Independence and Realism in Mathematics" Paper read to the Philosophy Department of the University of North Carolina at Chapel Hill, September 1985.
44. "You Can't Trust an Ideal Theory to Tell the Truth" Paper read to the Philosophy Department of the University of North Carolina at Chapel Hill, January 1986.

45. "You Can't Trust an Ideal Theory to Tell the Truth" read to a group of Scottish Philosophers meetings at Neil Tennant's home in Stirling, Scotland, June 1986.
46. "You Can't Trust an Ideal Theory to Tell the Truth" read to the Philosophy Faculty Seminar of the University of Warwick, June 1986.
47. "How Can Mathematical Beliefs be about Anything?" Paper read at an invited symposium on the philosophy of mathematics. Pacific Division Meeting of the American Philosophical Association, March 1987.
48. "Applying Mathematics and the Indispensability Argument" Proceedings of SSMT-90, San Sebastian Spain, September, 1990
49. "Between Mathematics and Physics" Philosophy of Science Association, October 1990.
50. "On Positing Mathematical Objects", University of Munich Frege Conference, Munich, June 1991.
51. "What is Structuralism?" Ninth International Congress of Logic, Methodology and Philosophy of Science, Uppsala, Sweden August 1991.
52. "Ought there to be one logic?" talk to the University of Wyoming, Laramie, 1991
53. "On positing mathematical objects" and "Interpersonal comparisons of utility" Two talks at the University of Wyoming, Laramie. 1992
54. "On interpersonal comparisons of utility" talk at the U S Air Force Academy, Colorado Springs, 1992
55. "On positing mathematical objects" talk at Appalachian State University, April 1993
56. "Thinking about rationality" talk at Northern Arizona University, Flagstaff, May 1993
57. "Mathematical Holism" University of Munich Philosophy of Mathematics Conference, Munich, June 1993
58. "Remarks on second-order logic" talk to philosophers at University of Cambridge, England, July 1993.
59. "On Understanding Mathematical Proofs" The University of Nancy Poincare Conference, May 1994.
60. "Remarks on Mathematical Progress" Pennsylvania State University Conference on Mathematical Progress, April 1995
61. "Extending the Same-Size Theorem", at Logica 1996, The Czech Republic, June 1996.
62. "Remarks on Mathematical Progress", Davidson College, November 1997
63. "Remarks on Mathematical Progress", Tulane University, February 1998
64. "What Makes My Philosophy of Mathematics Tick", Talk to the Duke University Undergraduate Philosophy Club, April 1998
65. "What Makes My Philosophy of Mathematics Tick", A "Food for Thought" talk sponsored by the UNC Honors Program, October 1998.
66. "From the logic of science to ????" Talk to the UNC Cognitive Science Group, October 1998.
67. "The Empirical Character of Mathematics", opening remarks in a discussion of my *Mathematics as a Science of Patterns* at a meeting of L.O.G.I.C. at VA Tech in Blacksburg, December 1998.
68. "Against Logical Realism", UC-Berkeley Philosophy Department, March 1999.
69. "The Renaissance of Second-order Logic in the Philosophy of Mathematics", invited address to the Annual Meeting of the Association for Symbolic Logic, San Diego, March 1999.
70. "Structuralism and the Independence of Mathematics", APA Symposium on Philosophy of Mathematics, Boston, December 1999.
71. "Revising Logic", APA Symposium on Philosophy of Mathematics, Seattle, March 2002.
72. "With Friends Like Jody Azzouni Who Needs Enemies?", APA Author Meets Critics Session, December 2005.

Publications:

Dissertation: Frege's Methodology: A Critical Study, Harvard University, 1964, 274 pp.

Books:

1. Elementary Logic, New York: McGraw-Hill Book Company, 1970, 457 pp.
2. Frege and the Philosophy of Mathematics, Ithaca, New York: Cornell University Press, 1980, 244 pp.
3. Choices, Minneapolis: University of Minnesota Press, 1987, 221 + xiii pp.
4. Reasoning in Medicine (with Daniel Albert, M.D., and Ronald Munson). Baltimore, Maryland: The John Hopkins University Press, 1988, 263 + xii pp.
5. Mathematics as a Science of Patterns. Oxford, UK: Clarendon Press, 1997.
6. Mathematics as a Science of Patterns, paperback edition. Oxford University Press, December 1999.

Edited:

1. The Philosophy of Mathematics issue of NOUS, (NOUS Vol.15, November 1981), pp 451-573.
2. Mathematical Objects and Mathematical Knowledge (an anthology). In The International Research Library of Philosophy series, Dartmouth Publishing Company, 1996.

Translated book:

Elecciones (Spanish Translation of Choices by Stella Villarmea and Blanca Rodriguez), Barcelona: Editoria Gedisa, 1998.

Articles:

1. "'Existence' is a Predicate," Graduate Review of Philosophy, Vol. III, (1961).
2. The Formalization of the Foundations of Geometry within the System of Symbolic Logic R, AFCRL Report 704 (1961), pp. 1-115.
3. Completeness Theorems for the Subordinate Proof Formulations of the Proposition and Predicate Calculi, AFCRL Report 951 (1961).
4. "A Decision Procedure for Positive Implication," Notre Dame Journal of Formal Logic, Vol. III, No. 3 (1962), pp. 179-186.
5. "Some Observations Related to Frege's Way Out," Logique et Analyse, Vol. 7 (1964).
6. (With C. Y. Cheng), "Ontic Commitment and the Empty Universe," Journal of Philosophy, Vol. LXII, No. 14 (1965), pp. 359-363.
7. "Frege's Theory of Incomplete Entities," Philosophy of Science, Vol. 32, 4 (1965), pp. 329-341.
8. "On Skolem's Paradox," Journal of Philosophy, Vol. LXIII, No. 15 (1966), pp. 425-438.
9. "A Note on Natural Deduction," Notre Dame Journal of Formal Logic, Vol. VII (1966), pp. 206-208.
10. "The Role of the Context Principle in Frege's Philosophy," Philosophy and Phenomenological Research, Vol. XXVII (1967).
11. "Logic and Scientific Methodology in the Writings of Menciuis," International Philosophical Quarterly, Vol. VII, No. 2 (1968), pp. 212-230.
12. "Professor Goddard and the Simple Theory of Types," Mind, Vol. LXXVII, N.S. No. 308 (1968), pp. 565-568.
13. "A Set Theoretic Approach to the Simple Theory of Types, Theoria, Vol. XXXV (1969), pp. 239-258.
14. "More on Skolem's Paradox, NOUS, Vol. 3, No. 2 (1969), pp. 185-186.
15. "A Note on Interpreting Theories," NOUS, Vol. 8, No. 3 (1974), pp. 289-294.

16. "On the Philosophical Significance of Consistency Proofs," *Journal of Philosophical Logic*, Vol. 3 (1974), pp. 137-147.
17. "The Frege-Hilbert Controversy," *Philosophy and Phenomenological Research*, Vol. XXXIV, No. 3 (1974), pp. 386-403.
18. "Die Frege-Hilbert Kontroverse," translation of 17 by M. Schirn in *Studien zu Frege*, edited by Max Schirn, Friedrich Frommann Verlag, Stuttgart (1975), Vol. 43, pp. 193-213.
19. "Frege's Context Principle Revisited" in *Studien zu Frege*, Vol. 44, pp. 35-49.
20. "Mathematical Knowledge and Pattern Cognition," *Canadian Journal of Philosophy*, Vol. 5, No. 1 (1975), pp. 25-39.
21. "Frege as Idealist and Then Realist," *Inquiry*, Vol. 22, No. 3 (1979), pp. 350-357.
22. "Frege and Analytic Philosophy: Facts and Speculations," *Midwest Studies in Philosophy*, Vol. VI, Minneapolis: University of Minnesota Press, 1981, pp. 83-103.
23. "Mathematics as a Science of Patterns: Ontology and Reference," *NOUS*, Vol. 15 (1981), pp. 529-566.
24. "Mathematics as a Science of Patterns: Epistemology," *NOUS*, Vol. 16, (1982), pp. 95-105.
25. Essay Review of J. Webb's *Mechanism, Mentalism and Metamathematics in History and Philosophy of Logic*, Vol. 3 (1982), pp. 85-89.
26. "A Restriction on a Theorem of Harsanyi's," *Theory and Decision*, Vol. XV (1983), pp. 309-320.
27. "How Nominalist is Hartry Field's Nominalism?," *Philosophical Studies* 47 (1985), pp. 163-181.
28. "Logic: Normative or Descriptive? The Ethics of Belief or a Branch of Psychology?," *Philosophy of Science* 52 (1985), pp. 221-238.
29. "Logic and Ontology: Remarks on Hartry Field's Anti-platonism," *History and Philosophy of Logic* 6 (1985), pp. 191-209.
30. "Frege's Proof of Referentiality," in *Frege Synthesized* (L. Haaparanta and J. Hintikka, Eds.) Dordrecht: D. Reidel, 1986.
31. "Impartial Welfarism and the Concept of a Person," *Erkenntnis* 25 (1986), pp. 47-60.
32. (With S. C. Hale) "Science Nominalized?," *Philosophy of Science*, Vol. 54 (1987), pp. 277-280.
33. (With D. Kushner) "Explanation, Independence and Realism in Mathematics," *British Journal for the Philosophy of Science*, Vol. 38 (1987), pp. 141-158.
34. "You Can't Trust An Ideal Theory To Tell The Truth," *Philosophical Studies*, Vol. 52 (1987), pp. 151-166.
35. "Second-Order Logic Still Wild," *The Journal of Philosophy*, Vol. LXXXV, No. 2 (February, 1988), pp. 75-87.
36. "Mathematics from the Structural Point of View," *Revue Internationale de Philosophie*, Vol. 42 (1988), pp. 400-424 (special issue on the philosophy of mathematics).
37. "Second-Order Logic Still Wild," *The Journal of Philosophy* (1988), pp. 75-87.
38. "Beliefs About Mathematical Objects," in *Physicalism in Mathematics*, edited by Andrew Irvine, Kluwer, 1989, pp. 41-71.
39. "A Naturalized Epistemology for a Platonist Mathematical Ontology," *Philosophica* (1989) (special issue on recent issues in the philosophy of mathematics), 7-29.
40. "Computation and Mathematical Empiricism," *Philosophical Topics*, Vol. 17 (1989), pp. 129-144 (issue on the philosophy of mathematics).
41. "Immanent Truth," *Mind*, Vol. 99 (1990), pp. 405-424.

42. "Between Mathematics and Physics," *Philosophy of Science Association* 1990, 2, (1990), pp. 369-378.
43. "Applying Mathematics and the Indispensability Argument," in *The Space of Mathematics*, edited by J.Echeverria, A.Ibarra, and T.Morman. Berlin & New York: Walter de Gruyter, 1992, pp.115-131.
44. "Proof as a Source of Truth," in *Proof and Knowledge in Mathematics*, edited by Michael Detlefsen. London & New York: Routledge, 1992, pp.6-32.
45. "A Structuralists Involvement with Modality" (Critical Notice of Geoffrey Hellman's *Mathematics without Numbers*), *Mind* 101, (1992), pp.107-122.
46. "What is Structuralism?" in *Logic and Philosophy of Science in Uppsala*, edited by D.Prawitz and D.Westerstahl. Dordrecht: Kluwer Academic Publishers, 1994, pp.355-364.
47. "Numbers as Structures and as Positions in Structures" in *Language, Mind and Art*, edited by Dale Jamieson. Dordrecht: Kluwer Academic Publishers, 1994, pp.55-67.
48. "There Ought to Be But One Logic," in *Logic and Reality*, edited by Jack Copeland. Oxford & New York: Oxford University Press, 1996.
49. "On Positing Mathematical Objects" in *Frege: Importance and Legacy*. Edited by M.Schirn. Berlin: Walter de Gruyter, 1996.
50. "Scientific vs. Mathematical Realism: The Indispensability Argument", *Philosophia Mathematica*, Third series, vol.3 (1995)
51. "On Understanding Mathematical Proofs" in *Henri Poincare, Science et Philosophie*, Berlin: Academic Verlag Albert Blanchard, 1996.
52. "Structural Relativity" *Philosophia Mathematica*, Third series, vol.4 (1996).
53. "Quine, The Argument from Proxy Functions and Structuralism" *Philosophical Topics*, vol. 24, 1996.
54. "Holistic Mathematics" in *Philosophy of Mathematics Today*, edited by M. Schirn, Oxford University Press, 1998.
55. "Remarks on Mathematical Progress" forthcoming in a volume resulting from a conference on the growth of mathematical knowledge, edited by Emily Grosholz and Hebert Breger. Kluwer, 2000 pp.353-362.
56. "Parsons on intuition and obviousness" forthcoming in essays honoring Charles Parsons, Cambridge University Press. 2000, pp. 219-231.
57. "Critical Study of *A Subject with No Object* by John Burgess and Gideon Rosen", *Nous* forthcoming. THIS HAS BEEN PUBLISHED
58. "Against Logical Realism", *History and Philosophy of Logic, History and Philosophy of Logic*, 20 (1999): 181-194.
59. Critical Study of George Boolos's, *Logic, Logic, Logic*, *Philosophia Mathematica*, 7, Third Series, October 1999: 328-336.
60. (with Nicoletta Orlandi) 'Holistic Realism: A Response to Katz on Holism and Intuition,' *The Philosophical Forum*, XXXIV, 301-15.
61. "Structuralism and the Independence of Mathematics" *The Harvard Review of Philosophy* XII, Spring 2004.
62. "Revising Logic", G.Priest, J.C.Beall, B. Armour-Garb, *The Law of Non-Contradiction; New Philosophical Essays*, Oxford: Oxford University Press. 2005.
63. "Quine and the Web of Belief", *The Oxford Handbook of Philosophy of Logic and Mathematics*, Steward Shapiro, editor. New York: Oxford University Press. 2005.

Papers Reprinted or Translated.

1. "The Frege-Hilbert Controversy," (number 17 above) translated as "Die Frege-Hilbert Kontroverse," by M. Schirn in *Studien zu Frege*, edited by Max Schirn, Friedrich Frommann Verlag, Stuttgart (1975), Vol. 43, pp. 193-213.

2. "On the Philosophical Significance of Consistency Proofs," (number 16 above) reprinted in *Godel's Theorem in Focus* edited by S.G.Shanker. New York & London: Routledge, 1989, pp.115-130.
3. "The Role of the Context Principle in Frege's Philosophy," (number 10 above) reprinted in *The Philosophy of Frege*, vol.III edited by Hans Sluga. Hamden, Ct.: Garland Publishing Co, 1993.
4. "Frege's Context Principle Revisited" (number 19 above) reprinted in *The Philosophy of Frege*, vol.III
5. "Frege as Idealist and Then Realist," (number 21) reprinted in *The Philosophy of Frege*, vol.III.
6. "Frege and Analytic Philosophy: Facts and Speculations," (number 22) reprinted in *The Philosophy of Frege*, vol.I.
7. "The Frege-Hilbert Controversy" (number 17) reprinted in *The Philosophy of Frege*, vol.II.
8. "A Naturalized Epistemology for a Platonist Mathematical Ontology," (number 39) reprinted in *Math Worlds* edited by S.Restivo, J.P.van Bendegen, R.Fischer. Albany: State University of New York Press, 1993.
9. "Proof as a Source of Truth" reprinted in *New Directions in the Philosophy of Mathematics*, second edition edited by T.Tymoczko, Princeton University Press, 1998.
10. "Mathematics as a Science of Patterns: Ontology and Reference," (number 23) reprinted in *Mathematical Objects and Mathematical Knowledge* edited by M.D.Resnik
11. "A Naturalized Epistemology for a Platonist Mathematical Ontology," (number 39)reprinted in *Mathematical Objects and Mathematical Knowledge* edited by M.D.Resnik
12. "Second-Order Logic Still Wild," (number 37) reprinted in *Mathematical Objects and Mathematical Knowledge* edited by M.D.Resnik.
13. Same paper reprinted in a collection edited by Stewart Shapiro.

Abstracts:

1. "A Unified Theory of Types," *Notices of the American Mathematical Society*, Vol. 13, No. 3 (1966).
2. "A Set Theoretic Approach to The Simple Theory of Types," *Journal of Symbolic Logic*, Vol. 32, No. 3 (1967).
3. "The Frege-Hilbert Controversy Concerning Implicit Definitions," *Journal of Symbolic Logic*, Vol. 35, No. 1 (1970), p. 187.
4. (With Anthony Coyne) "A Note on the Null Set Axiom," *The Journal of Symbolic Logic*, Vol. 39, No. 3 (1974), p. 402.
5. "A Remark on Frege's Class Theory," *Journal of Symbolic Logic*, Vol. 42, No. 1 (1977) p. 151.
6. "Frege's Conception of Sets as Logical Objects," *Journal of Symbolic Logic*.
7. "Frege's Proof of Referentiality: What's Right with it?", *Proceedings of the Seventh International Congress of Logic, Methodology and Philosophy of Science*, Salzburg, 1983, pp. 177-180.

In addition I have contributed a number of abstracts to *The Philosopher's Index* and *The Review of Metaphysics* which summarize publications of mine appearing elsewhere.

Reviews:

1. C. Hempel, *Aspects of Scientific Explanation in Philosophy and Phenomenological Research*, Vol. XXVII, No. 1 (1966).
2. *The Proceedings of the Delhi Philosophical Colloquium in Philosophy East-West* (1967).
3. *The Treasury of Mathematics in Philosophy East-West* (1967).
4. R. Sternfeld, *Frege's Logical Theory in Philosophy of Science*, Vol. 34, No. 2 (1967), pp. 296-298.

5. J. D. B. Walker, *A Study of Frege in Philosophy of Science*, Vol. 34, No. 3 (1967).
6. J. C. Thiel, *Sinn und Bedeutung in der Logik Gottlob Frege in Philosophy and Phenomenological Research*, Vol. XXVIII, No. 2 (1967), pp. 303-304.
7. J. van Heijenoort, *From Frege to Godel in Philosophy of Science*, Vol. 35 (1968), p. 72.
8. G. Frege, *Kleine Schriften in Philosophy of Science*, Vol. 35, No. 4 (1968), pp. 424-425.
9. H. Khatchadourian, "Frege on Concepts" (*Theoria*, 22) in *Journal of Symbolic Logic*, Vol. 35, No. 1 (1970), p. 132.
10. H. Steiner, "Frege und die Grundlagen die Geometrie" and Frege's "On the Foundations of Geometry" in *Journal of Symbolic Logic*, Vol. 36, No. 1 (1971), p. 155.
11. (With Edward Galligan) *Review of I. Angelelli's Studies on Gottlob Frege and Traditional Philosophy in Philosophy of Science*, Vol. 38, No. 2 (1971), pp. 316-319.
12. C. Parsons, "Mathematics, Foundations of" (*Encyclopedia of Philosophy*) in *Philosophy of Science*, Vol. 38, No. 4 (1971), p. 614.
13. M. Przelecki, *The Logic of Empirical Theories in Philosophy of Science*, Vol. 39, (1972), pp. 421-423.
14. G. Frege, *On the Foundations of Geometry and Formal Theories of Arithmetic*, E. H. W. Kluge, translator and editor, in *Philosophical Review*, Vol. LXXXII, No. 2 (1973), pp. 266-269.
15. B. Birjukov, *Two Soviet Studies on Frege*, I. Angelelli, translator, in *Journal of Symbolic Logic*, Vol. 39, No. 2 (1974), p. 355.
16. Twelve short reviews in *Zentralblatt fur Mathematik* appearing from about 1968 to about 1974.
17. (With Daniel Albert, M.D.) E. A. Murphy, *The Logic of Medicine*, in *Philosophy of Science*, Vol. 45, No. 3 (1978), pp. 488-490.
18. (With Daniel Albert, M.D.) A different review of Murphy's book, *The New England Journal of Medicine* (1978), p. 1370.
19. (With Daniel Albert, M.D.) G. Rabey, *Analytic Medicine*, Vol. I in *The New Physician*.
20. D. Bostock, *Logic and Arithmetic*, I, II in *Journal of Symbolic Logic*, Vol. 47, No. 3 (1982), pp. 708-713.
21. Hans Sluga, *Gottlob Frege*. London, England and Boston, Massachusetts: Routledge and Kegan Paul, 1980, in *The Philosophical Review*, Vol. 92, No. 1 (January, 1983), pp. 122-125.
22. Hartry H. Field, *Science Without Numbers*, Princeton, New Jersey: Princeton University Press, 1980, xii + 130 pp., *NOUS*, (September, 1983), pp. 514-519.
23. C. Wright, *Frege's Conception of Numbers as Objects in The Journal of Philosophy*, Vol. 81 (1984), pp. 778-783.
24. P. Kitcher, *The Nature of Mathematical Knowledge*, *NOUS*, Vol. 22 (1986), pp. 617-622.
25. M. Katz, *Templates and Patterns*, *Canadian Philosophical Reviews*, Vol. VII, No. 3 (March, 1987), pp. 112-114.
26. R. Tieszen, *Mathematical Intuition: Phenomenology and Mathematics*, *Review of Metaphysics* (1990), pp. 442-444.
27. I. Levi, *Hard Choices*, *Mind* 100 (1991), pp. 297-300
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