

Neil Epstein
Curriculum Vitae
May 2005

Personal:

Office: University of Kansas Department of Mathematics
405 Snow Hall, 1460 Jayhawk Blvd, Lawrence, KS 66045
e-mail: epstein@math.ku.edu
Web: <http://www.math.ku.edu/~epstein>

Education:

2003-2005 Ph.D. University of Kansas, Mathematics
Advisor: Craig C. Huneke
Closure operations in commutative algebra: tight closure, phantom depth, and $$ -spread*
2000-2003 University of Chicago (towards Ph.D.)
1998-2000 M.S. University of Chicago, Mathematics
Advisor: M. Pavaman Murthy
1994-1998 B.A. Swarthmore College, Mathematics and Linguistics – high honors

Positions:

2005 Graduate Teaching Assistant, University of Kansas
2004 Graduate Research Assistant, University of Kansas
2003 Lecturer in Mathematics, University of Kansas
2000-2002 Instructor in Mathematics (teaching assistant), University of Chicago
1999-2000 College Fellow, University of Chicago

Affiliations and awards:

NSF Mathematical Sciences Postdoctoral Research Fellowship: Summer 2005 – Spring 2009
Supplemental Scholarship: Spring 2005
U.G. Mitchell Graduate Scholarship: Summer 2004
American Mathematical Society: Member

Publications:

A tight closure analogue of analytic spread,
to appear in Math. Proc. Cambridge Philos. Soc., circa July, 2005.
<http://www.math.ku.edu/~epstein/sspreadpaper.pdf>
Phantom depth and flat base change,
to appear in Proc. Amer. Math. Soc.
<http://www.math.ku.edu/~epstein/pdepthBCprocams-final.pdf>
Phantom depth and stable phantom exactness,
to appear in Trans. Amer. Math. Soc.
<http://www.math.ku.edu/~epstein/pdtams-final.pdf>
Reductions and special parts of closures, in preparation.
A length characterization of $$ -spread,* joint work with Adela Vraciu, in preparation.

Talks:

- University of Arkansas (Fayetteville, AR)
30th Annual Spring Lecture Series in the Mathematical Sciences, April 15, 2005
Special parts of closures, and analogues of analytic spread
- Annual joint meetings of the AMS-MAA (Atlanta, GA)
Special session on Commutative Algebra, January 5, 2005
A tight closure analogue of analytic spread and a “special” Briançon-Skoda theorem
- University of Nebraska (Lincoln, NE)
Algebra seminar, October 28, 2004
A tight closure analogue of analytic spread
- Fall Southeastern sectional meeting of the AMS (Nashville, TN)
Special session on Local and Homological Algebra, October 16, 2004
Phantom depth and stable phantom exactness
- Spring Eastern sectional meeting of the AMS (Lawrenceville, NJ)
Special session on Commutative Algebra and Algebraic Geometry, April 18, 2004
A tight closure analogue of analytic spread
- University of Kansas (Lawrence, KS)
Algebra seminar, April, 2004
A tight closure analogue of analytic spread
- University of Kansas (Lawrence, KS)
Algebra seminar, July, 2003
Phantom depth
- University of Missouri (Columbia, MO)
Algebra seminar, May 5, 2003
Perfect closures, f -sequences of ideals, and the set $\bigcup_e \text{Ass } R/(I^{[p^e]})^$.*

Other conferences and workshops attended:

- University of Nebraska (Lincoln, NE): May 7-9, 2005
Nebraska Commutative Algebra Conference: WiegandFest
- KUMUNU 6 (Lawrence, KS): Oct. 30, 2004
(annual joint conference of KU, MU, and NU on commutative algebra)
- University of Utah (Salt Lake City, UT), VIGRE mini-course: June 7-18, 2004
Classical Problems in Commutative Algebra
- Purdue University (Lafayette, IN): May 17-21, 2004
Midwest Commutative Algebra and Geometry Conference in honor of Joseph Lipman
- Joint AMS-SMM International Meeting (Houston, TX): May 13-16, 2004
- KUMUNU 5 (Lawrence, KS): Sept. 13, 2003
- Joint Summer Research Conference (Snowbird, UT): July 20-24, 2003
Commutative Algebra: Presentations by Young Researchers
- MSRI (Berkeley, CA), Special Year in Commutative Algebra: Feb. 3-7, 2003
Interactions with Homological Algebra and Representation Theory
- MSRI (Berkeley, CA), Special Year in Commutative Algebra: Dec. 2-6, 2002
Local and Birational Theory
- Fields Institute (Toronto, ON), ICRA X, August 1-10, 2002
International Conference on Representations of Algebras and Related Topics
- University of Michigan (Ann Arbor, MI), AMS spring sectional, March 1-3, 2002
- University of Kansas (Lawrence, KS), AMS spring sectional, March 30-31, 2001

Teaching:

2004-2005 Graduate Teaching Assistant, University of Kansas
Math 122 (Calculus II), Spring semester, 2005.

2003-2004 Lecturer, University of Kansas
Math 115 (Calculus I), Fall semester, 2003.

2000-2002 Instructor, University of Chicago
Math 19600 (Mathematical Methods for the Social Sciences II), Spring quarter 2002.
Math 15200 (Calculus II), Winter quarter 2002.
Math 15100 (Calculus I), Fall quarter 2001.
Math 152 (Calculus II), Winter quarter 2001.
Math 151 (Calculus I), Fall quarter 2000.

1999-2000 College Fellow (student teacher), University of Chicago
Math 204 (Real Analysis II), Spring quarter 2000.
Math 203 (Real Analysis I), Winter quarter 2000.
Math 205 (Real Analysis III), Fall quarter 1999.

References:

Craig Huneke	thesis advisor	University of Kansas
Dan Katz		University of Kansas
Bangere Purnaprajna		University of Kansas
Adela Vraciu	collaborator	University of South Carolina
Diane Herrmann	teaching ref	University of Chicago