

## CURRICULUM VITAE

**Lianna Karin (Hatfield) Etchberger, Ph.D.**  
**Assistant Professor, Biology**  
**Utah State University**

Utah State University-Uintah Basin  
1680 West Highway 40  
Vernal, Utah 84078  
(435) 722-1783  
lianna.etchberger@usu.edu

635 South 350 West  
Vernal, Utah 84078

## EDUCATION

- Ph.D. State University of New York, Stony Brook 1992 Molecular Microbiology  
Dissertation Title: Genetic Analysis of the  
Adenovirus Type 5 Inverted Terminal  
Repeat
- B.S. University of California at Los Angeles 1984 Microbiology

## PROFESSIONAL EXPERIENCE

### Academic Experience

- 2003 - present Associate Professor in Biology. Utah State University, Uintah Basin Regional Campus, Vernal, Utah.
- 1998 - present Principal Investigator. Plague (*Yersinia pestis*) transmission in wild animal populations, Cooperative Agreement between the Utah State University and the U.S.D.I. Bureau of Land Management, Vernal, Utah.
- 1995 - 2003 Adjunct Lecturer in Biology. Utah State University-Uintah Basin, Vernal, Utah.
- 1992 - 1995 Post Doctoral Research Associate, Molecular genetics of RNA stability. Department of Molecular and Cellular Biology, University of Arizona, Tucson, Arizona. Mentor, Dr. Roy Parker
- 1993 Undergraduate Honors Discussion Section Leader. Course title: Molecular and Cellular Biology, University of Arizona, Tucson, Arizona.
- 1986-1987 Graduate Teaching Assistant. Laboratory courses in Microbiology for Medical Students, State University of New York at Stony Brook, Stony Brook, New York.
- 1981 Undergraduate Researcher. Protein interactions with Adenovirus gene products, Department of Microbiology, University of California at Los Angeles, Los Angeles, California. Mentor, Dr. Arnold Berk

## **Fellowship Received**

Cancer Biology Training Grant, Department of Radiation Oncology, University of Arizona, #NCI T32 CA09213, October 1994 to August 1995  
Research Project Title – Genetic Analysis of mRNA Turnover in Yeast

## **TEACHING**

### **Academic Credit Courses Taught at Utah State University**

1995 - present	BIOL 1010	Biology and the Citizen
	BIOL 1610	Biology I
	BIOL 3060	Principles of Genetics
	BIOL 3065	Genetic Laboratory
	BIOL 3300	General Microbiology
	BIOL 5210	Cell Biology
	BIOL 5330	Virology
	BIOL 5800	Undergraduate Research
	CHEM 1010	Introduction to Chemistry
	EDUC 5560	Special Topics
	PE 1620	Hiking

### **Undergraduate Advising**

1995 – present Pre-Allied Health students, approximately 10 students annually  
Biology students, approximately 5 students annually

### **Student Mentoring**

#### Graduate Student

1995-1999 Jones, Colleen, Brigham Young University Master's student in Zoology. Genetic Variation of Colorado Cutthroat Trout (*Oncorhynchus clarki pleuriticus*) Populations of the Sheep Creek Drainage in the Uinta Mountains near Vernal, Utah.

#### Undergraduate Students

2009-2010	Carrie Young, Shayla Brinkerhoff
2008-2009	Heidi Paulson, Carrie Young
2007-2008	Matt Jenne, Heidi Paulson
2006	Amy Lamb
1999	Mike Slater, Travis Lemon

### **Teaching Awards and Honors**

2009-2010	American Microbiology Association Biology Scholar, Biology Education Research
2008-2010	Teaching Coach, USU Teaching Academy for New Assistant Professors
2008-2009	National Academies Education Mentor in the Life Sciences
2007-2008	National Academies Education Fellow in the Life Sciences
2006	Undergraduate Research Mentor of the Year in Extension, Utah State University
2005	Teacher of the Year, Utah State University - Uintah Basin

### **Teaching Presentations and Workshops Given**

- Etchberger, L., Etchberger, R., Exton, V., Garner, D., Law, D., Mueller, R., Tollefson, D. (February 5, 2010). Lead panel discussion "Evaluating Evidence for Excellence in Teaching." RCDE Faculty Teaching and Research Workshop, Vernal, Utah
- Etchberger, L. (October 23, 2009). "Starting at the End: The Role of Measureable Learning Objectives in Teaching." USU Regional Campuses and Distance Education Teaching Academy Workshop, broadcast from Vernal, Utah.
- Etchberger, L., Podgorski, G. (August 14, 2008). "Lecture Less to Teach More?" USU Biology Department Retreat, Wellsville, Utah
- Etchberger, L., Podgorski, G. (June 14, 2008). "Learning Workshop" USU Campuses Cooperative Biology Teaching Workshop, Logan, Utah
- Etchberger, L., Podgorski, G. (March 27, 2008). "Scientific Teaching: Backward Design Moves Learning Forward" RCDEA Annual Conference Utah State University, USU Salt Lake City Center, Utah
- Etchberger, L., Jeon, T. K., Legler, N., & Durtschi, S. (February 21, 2008). "The Role of 'Properties' and 'Functions' in Creating Learning Objects" Plenary presentation, *ID+SCORM*, BYU, Provo, Utah
- Etchberger, L., Podgorski, G. (January 29- February 19, 2008). "Entering Mentoring Workshop" USU, Logan, Utah

### **Teaching Workshops and Conferences Attended**

- American Microbiology Association, Scholarship of Teaching and Learning Institute (July 15-18, 2009) Biology Scholars
- National Academies Summer Institute on Undergraduate Biology Education Mid-term Meeting (February 23-24, 2009), Howard Hughes Medical Institute Headquarters, Chevy Chase, Maryland
- National Academies Summer Institute on Undergraduate Biology Education (June 24-29, 2008), University of Wisconsin-Madison (Invited Facilitator)
- Utah Conference on Undergraduate Education (February 29, 2008), Utah Valley State College, Orem, Utah (Facilitator)
- National Academies Summer Institute on Undergraduate Biology Education Mid-term Meeting (January 22-23, 2008), Howard Hughes Medical Institute Headquarters, Chevy Chase, Maryland
- Regional Campuses and Distance Education Association Annual Conference (August 8-9, 2007). Utah State University, Logan
- National Academies Summer Institute on Undergraduate Biology Education (June 24-29, 2007). University of Wisconsin, Madison
- Regional Campuses and Distance Education Association Spring Faculty Workshop (March 23, 2007). Utah State University, Uintah Basin Regional Campus
- Extension and Continuing Education Association Annual Conference (August 9-11, 2006). Utah State University, Uintah Basin
- Chautauqua Course: Calibrated Peer Review Workshop (June 19-21, 2006). University of California, Los Angeles
- Extension and Continuing Education Association Spring Faculty Workshop: Declining by Degrees, Panel Discussion (March 3, 2006). Utah State University, Uintah Basin
- Extension and Continuing Education Association Spring Faculty Workshop: Tools for Skillful Teaching (April 15, 2005). Utah State University, Uintah Basin
- Southern Utah Great Teaching Summit (Feb 15-17, 2001). Kanab, Utah

## RESEARCH AND SCHOLARSHIP

### Peer-Reviewed Publications

#### Journal Articles

Sackett, L., Martin, A., Maxwell, P., Mazella, N., Douglas, L. and Etchberger, L. "Characterization of 18 microsatellite loci for prairie dogs (genus *Cynomys*)." *Molecular Ecology Resources*, submitted May, 2009.

Beelman, C. A., Stevens, A., Caponigro, G., LaGrandeur, T. E., Hatfield, L., Fortner, D. M. and Parker, R. (1996). "An Essential Component of The Decapping Enzyme Required for Normal Rates of mRNA Turnover." *Nature* **382**: 642-646.

Hatfield, L., Beelman, C. A., Stevens, A. and Parker, R. (1996). "Mutations in *Trans*-acting Factors Affecting mRNA Decapping in *Saccharomyces cerevisiae*." *Molecular and Cellular Biology* **16**(10): 5830-8.

Hatfield, L. and Hearing, P. (1993). "The NFIII/OCT-1 Binding Site Stimulates Adenovirus DNA Replication *in Vivo* and Is Functionally Redundant with Adjacent Sequences." *Journal of Virology* **76**(7): 3931-9.

Hatfield, L. and Hearing, P. (1993). "Redundant Elements in the Adenovirus Type 5 Inverted Terminal Repeat Promote Bidirectional Transcription *in Vitro* and Are Important for Virus Growth *in Vivo*." *Virology* **184**: 265-276.

Hauser, C. A., Sharp, J. A., Hatfield, L. and Hatfield, G. W. (1985). "Pausing of RNA Polymerase during *in Vitro* Transcription through the *ilvB* and *ilvGEDA* Attenuator Regions of *Escherichia coli* K12." *The Journal of Biological Chemistry* **260**(3): 1765-1770.

#### Manuscript in Preparation

Etchberger, L., Bibles, B., "Flea (*Siphonaptera*) and Small Mammal Relationships in a White-Tailed Prairie Dog (*Cynomys leucurus*) Colony." In preparation for submission to *Journal of Wildlife Diseases*.

#### Proceedings

Etchberger, L., Bibles, B. (2008). "Factors that Influence the Numbers of Fleas Collected from White-Tailed Prairie Dog Burrows." In press: Abstracts from the "Symposium on the Ecology of Plague and its Effects on Wildlife" in *Vector-Borne and Zoonotic Diseases*

Etchberger, L. K., Stroh, W. E., Bibles, B. D., Dzialak, M. R., Etchberger, R. C. (2006). "Fleas and Small Mammal Hosts Within and Adjacent to a Coyote Basin White-Tailed Prairie Dog Colony in Northeastern Utah." *Proceedings, Symposium on the Status of the Black-Footed Ferret and its Habitat*, Fort Collins, Colorado, January 28-29, 2004. U.S.G.S. Scientific Investigations Report 2005-5293.

Etchberger, L., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C., Lamb, A. (2006). "Possible Plague Vectors in a White-Tailed Prairie Dog Ecosystem." *Journal of The Utah Academy of Sciences, Arts and Letters*. **83**: 33.

Hatfield-Etchberger, L., Stroh, B., Bibles, B. and Etchberger, R. (2002). "Investigating Epizootic Plague Transmission: Comparison of Flea/Host Relationships Within an Established Prairie Dog Colony to Adjacent Habitat." *Proceedings, Landscape Ecology of Plague in the American Southwest, September 19-20, 2000*. Fort Collins, Colorado. U.S. Geological Survey and Technology Report **2002-0001**:8.

### **Non-Peer Reviewed Abstracts**

Gurney, T., Elbel, R., Sookvong, P., LeMon, R., Todd, J., Hatfield Etchberger, L. (2005) "Variation of DNA Sequences in the Deer Mouse Flea in Utah and Nevada." Abstract in *Journal of The Utah Academy of Sciences, Arts and Letters*. **82**: 250.

Gurney, T. Jr., Elbel, R. E., Sookvong, P., LeMon, R., Todd, J., Etchberger, L. H. (2002). "Variation of DNA Sequences in the Deer Mouse Flea in Utah and Nevada." *Proceedings, International Conference on Diseases in Nature Communicable to Man* **57**:25.

Hatfield-Etchberger, L., Stroh, B., Etchberger, R., Lemon, T. and Slater, M. (Presented by Steven V. Romney) (1999). "Investigating Epizootic Plague Transmission: Comparison of Flea/Host Relationships within and Established Prairie Dog Colony to Adjacent Habitat." *Proceedings of the 54<sup>th</sup> Annual Conference, International Northwest Conference on Diseases in Nature Communicable to Man*. Logan, Utah.

### **Reports to Funding Agency**

Etchberger, L. (2004). "Survey of *Yersinia pestis* Associated with Fleas and Small Mammals in the Coyote Basin of Northeastern Utah." Final Report to Bureau of Land Management, Vernal Field Office.

Etchberger, L. (2004). "Revised: Field Protocols for the Efficient Monitoring of Small Mammals and Their Associated Fleas Species." Protocol developed for Bureau of Land Management, Vernal Field Office.

### **Scholarly Presentations**

#### **Invited**

Etchberger, L. (November 13, 2007). "Investigating plague transmission in a white-tailed prairie dog colony." *Utah State University Biology Department Seminar*, Logan, Utah

Hatfield Etchberger, L., Beelman, C. (May 12, 2005). "Selenium bioavailability and plague transmission: two undergraduate research projects at the USU – Uintah Basin campus." *Utah State University Center for Integrated BioSystems Seminar*, Logan, Utah

Etchberger, L., C. Beelman, R. Etchberger, M. Dzialak. (August, 2004). "Undergraduate Biology Research at the Uintah Basin Campus." *Biology Department Retreat*, Paradise, Utah (oral)

Etchberger, L. (May 7, 2004). "Plague in Utah's Wildlife." *Friday Soup Talks*, U.S.D.A. Forest Service, Ashley National Forest, Vernal, Utah

Etchberger, L. (November, 2003). "Fleas and Small Mammal Hosts in a Prairie Dog Colony: Investigating Plague Transmission in the Wild." *USU - Uintah Basin Science Group Presentations of Research*, U.S.D.I. Bureau of Land Management, Vernal Field Office, Vernal, Utah (oral)

Hatfield-Etchberger, L. (November 12, 1998). "Plague and Black-Footed Ferrets." *Uintah Mountain Club monthly meeting*, Vernal, Utah

### **Professional**

Young, C., Etchberger, L. (February 26, 2010). "Determination of White-tailed Prairie Dog (*Cynomys lecurus*) Population Structure Using Microsatellite Markers." *Utah Conference on Undergraduate Research*, Southern Utah University, Cedar City, Utah

Etchberger, L. (May 22, 2010). "Does exposure to Bloom's levels of Understanding help students develop higher order thinking skills?" *17th Annual ASM Conference for Undergraduate Educators*, Town & Country Resort and Convention Center, San Diego, California (poster)- abstract accepted March 1, 2010

Etchberger, L., Bibles, B. (April, 2008). "Fleas, ferrets, rodents and plague: Investigating plague transmission to prairie dog populations in black-footed ferret habitat of Coyote Basin, Utah" *Eighth Annual Uintah Basin Research Conference*, Utah State University Uintah Basin, Vernal, Utah (poster)

Jenne, M., Etchberger, L., Bibles, B. (April, 2008). "Do black-tailed prairie dog microsatellite markers also function for population genetics studies of white-tailed prairie dogs?" *Eighth Annual Uintah Basin Research Conference*, Utah State University Uintah Basin, Vernal, Utah (poster)

Etchberger, L., Jeon, T. K., Legler, N., & Durtschi, S. (February, 2008). Plenary presentation "The Role of 'Properties' and 'Functions' in Creating Learning Objects." *ID+SCORM*, Provo, Utah (oral)

Etchberger, L. K., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C., Lamb, A. (April, 2007). "Distribution of small mammal hosts and their fleas in black-footed ferret habitat of Coyote Basin, Utah." *Seventh Annual Uintah Basin Research Conference*, Utah State University - Uintah Basin Regional Campus, Roosevelt, Utah (poster)

Etchberger, L. K., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C., Lamb, A. (August, 2006). "Small mammal host and flea distributions in a white-tailed prairie dog ecosystem." *International and Southwest Conferences on Diseases in Nature Transmissible to Man*. San Antonio, Texas (poster)

Etchberger, L., Lamb, A., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C. (April, 2006). "Flea vector and small mammal host species occurring more frequently outside white-tailed prairie dog habitat: Implications for plague." *Sixth Annual Uintah Basin Research Conference*, Vernal, Utah (poster)

Etchberger, L., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C., Lamb, A. (April, 2006). "Possible plague vectors in a white-tailed prairie dog ecosystem." *Utah Academy of Sciences, Letters and Arts Annual Conference*, Ephraim, Utah (oral)

Lamb, A., Etchberger, L. K., Dzialak, M. R., Stroh, W. E., Bibles, B. D., Etchberger, R. C., (April, 2006). "Fleas and Small Mammal Host Species Occurring More Frequently Outside White-Tailed Prairie Dog Habitat." *Utah State University Student Showcase*, Logan Utah (poster)

Etchberger, L. K., Stroh, W. E., Bibles, B. D., Dzialak, M. R., Etchberger, R. C. (January, 2004). "Fleas and Small Mammal Hosts Within and Adjacent to a Coyote Basin White-Tailed

Prairie Dog Colony in Northeastern Utah." *Symposium on the Status of the Black-Footed Ferret and its Habitat*, Fort Collins, Colorado (poster)

Hatfield Etchberger, L. (April, 2005). "Possible Plague Vectors in the White-Tailed Prairie Dog Colony of Coyote Basin, Utah." *Fifth Annual Uintah Basin Research Conference*, Utah State University - Uintah Basin, Vernal, Utah (poster)

Etchberger, L., Stroh, B., Bibles, B. and Etchberger, R. (April, 2004). "Fleas and Small Mammal Hosts in a Prairie Dog Colony: Investigating Plague Transmission in the Wild." *Fourth Annual Uintah Basin Research Conference*, Utah State University - Uintah Basin, Vernal, Utah (poster)

Hatfield-Etchberger, L., Stroh, B., Bibles, B. and Etchberger, R. (April, 2003). "Fleas and Their Small Mammal Hosts In and Adjacent to a Prairie Dog Colony in Coyote Basin, Utah." *Third Annual Uintah Basin Research Conference*, Vernal, Utah (poster)

Gurney, T., Elbel, R., Sookvong, P., LeMon, R., Todd, J., Hatfield Etchberger, L. (April, 2003). "Variation of DNA Sequences in the Deer Mouse Flea in Utah and Nevada." *Utah Academy of Sciences, Arts and Letters 2003 Annual Conference*, Ogden, Utah (oral)

Gurney, T., Elbel, B., Sookvong, P., LeMon, R., Todd, J. and Etchberger, L. (October, 2002). "Variation of DNA Sequences in the Deer Mouse Flea in Utah and Nevada." *Rocky Mountain Branch of The American Society of Microbiology Meeting*, Greeley, Colorado (oral)

Hatfield-Etchberger, L., Stroh, B., Bibles, B. and Etchberger, R. (April, 2002). "Investigating Plague Transmission in the Wild: Comparison of Fleas and their Small Mammal Hosts in Coyote Basin." *Second Annual Uintah Basin Research Conference*, Vernal, Utah (oral)

Hatfield-Etchberger, L., Stroh, B., Bibles, B. and Etchberger, R. (April, 2001). "Investigating Plague Transmission in the Wild." *First Annual Uintah Basin Research Conference*, Vernal, Utah (oral)

Hatfield-Etchberger, L., Stroh, B., Etchberger, R., Lemon, T. and Slater, M. (March 2000). "Comparison of Fleas and their Small Mammal Hosts in Coyote Basin." *Utah Chapter of The Wildlife Society Annual Meeting*, Vernal, Utah (oral)

## Grants

\$110,000	Etchberger, L., Principle Investigator. U.S.D.I. Bureau of Land Management (2005-2010). Survey of Fleas and Their Small Mammal Hosts in Association with <i>Yersinia pestis</i> in Northeastern Utah. Challenge Cost Share (\$55,000 from BLM, \$55,000 from USU, Uintah Basin Regional Campus)
\$ 8,000	Etchberger, L. and Bibles, B., Co-Principle Investigators. USU ADVANCE Program Collaborative Seed Grant (2007-2008 academic year). Development of Genetic Markers in White-Tailed Prairie Dogs for Use in Analyzing Population Dynamics.
\$ 4,500	Etchberger, L., Principle Investigator. U.S.D.A. Forest Service (2004-2005). Genetic Analysis of <i>Oreohelix</i> Species in the Ashley National Forest.
\$100,000	Etchberger, L., Principle Investigator. U.S.D.I. Bureau of Land Management (2000-2005). Fleas and Small Mammal Hosts. Challenge Cost Share (\$50,000 from BLM, \$50,000 from USU, Uintah Basin Regional Campus)
\$ 14,000	Etchberger, L., Principle Investigator. U.S.D.I. Bureau of Land Management (1999-2000). Fleas and Small Mammal Hosts. Challenge Cost Share (\$7,000 from BLM, \$7,000 from USU, Uintah Basin Regional Campus)

\$ 20,000 Etchberger, L., Principle Investigator. U.S.D.I. Bureau of Land Management (1998-1999). Pilot Study of Fleas and Small Mammal Hosts. Challenge Cost Share (\$10,000 from BLM, \$10,000 from USU, Uintah Basin Regional Campus)

### **Research Awards**

2006 Best Paper Award in the Biological Sciences Division, Utah Academy of Letters, Arts and Sciences Annual Conference.

### **Professional Memberships**

- Regional Campuses and Distance Education Association (RCDEA; formerly Extension/Continuing Education Association, ECEA)
- American Society for Microbiology (ASM)
- Association for Biology Laboratory Educators (ABLE)
- Association of College and University Biology Educators (ACUBE)
- Utah Academy of Sciences, Arts and Letters (UASAL)

## **SERVICE**

### **Professional Service**

2009 – present Member, Journal of Microbiology and Biology Education Editorial Board

### **University Service**

2009 – present Member, Promotion Committee for Jessica Habashi, Dept. of Biology

2009 – present Member, Promotion and Tenure Committee for Steven H. Mitton, Dept. of History

2009 – present Faculty Representative and Management Team Member, USU Uintah Basin Regional Campus

2009 – present Member, Planning Committee – Uintah Basin Research Conference

2008 - present Member representing Regional Campuses, Undergraduate Research Advisory Board. Utah State University

2005 - present Member, Ad Hoc Committee on Building Design - Bingham Entrepreneurship and Energy Research Center.

2004 - present Supervisor - Laboratory Coordinator. Utah State University - Uintah Basin.

2004 - present Member, Ad Hoc Planning and Implementation Committee - Biology Student Retention.

2003- present Member, Planning Committee - Uintah Basin Research Conference.

2008 - 2009 Chair, Planning Committee - Uintah Basin Research Conference.

2008 Moderator- Utah Conference on Undergraduate Research (February 29). Utah Valley State College, Orem.

2008 Member representing Regional Campuses, Utah Conference on Undergraduate Research.

2006-2007 Past President, Regional Campuses and Distance Education Association (formerly Extension and Continuing Education Association,). Regional Campuses and Distance Education, Utah State University.

- 2007 Member, Planning Committee - RCDEA Spring Faculty Teaching Workshop. Continuing Education, Utah State University.
- 2007 Chair, Awards Committee- Regional Campuses and Distance Education. Continuing Education, Utah State University.
- 2005-2006 President, Extension Continuing Education Association. Continuing Education, Utah State University.
- 2006 Chair, Planning Committee - ECEA Spring Faculty Workshop: Advancing Teaching, Learning and Retention for Our Students. Continuing Education, Utah State University
- 2006 Member, Awards Committee- Extension Continuing Education Association. Continuing Education, Utah State University
- 2004-2005 President Elect, Extension Continuing Education Association. Continuing Education, Utah State University
- 2005 Chair, Planning Committee – Faculty Teaching Workshop: Tools for Skillful Teaching. Continuing Education, Utah State University
- 2005 Chair, Awards Committee - Extension Continuing Education Association. Continuing Education, Utah State University
- 2004-2005 Member, Ad Hoc Development Committee - Continuing Education Faculty Website. Continuing Education, Utah State University
- 2003-2005 Representative - Science Group Faculty.
- 2004-2005 Chair, Search Committee - Assistant Professor of Chemistry.
- 2004 Chair, Search Committee - Laboratory Coordinator.
- 2004 Member, Search Committee - Post Doctoral position - Natural Resources.
- 2004 Panelist, USU-Uintah Basin Science Group Info-Social for Biology Students.
- 2003 Member, Search Committee, Assistant Professor - Biology.
- 2002 Invited guest seminar speaker, “The Ecology of Plague” in Undergraduate Seminar, FW4950, Spring semester.
- 2000 Invited guest lecturer, “Molecular Biology and Biotechnology” in Integrated Science, USU 1310, Fall semester.
- 1998 Invited guest lecturer, “Molecular Biology and Biotechnology” in Integrated Science, USU 1310, Fall semester.
- 1997 Member, Review Panel for review of internet program, “The Natural History of Genes”, now a part of the “Genetic Science Learning Center”  
<<http://gslc.genetics.utah.edu>> jointly sponsored by the University of Utah School of Medicine, the Eccles Institute of Human Genetics and the Utah Museum of Natural History. Salt Lake City, Utah.

### **Community Service**

- 2010 Guided Boys Scout group activities and tour of science labs (March 2)
- 2009 Member, Management Committee for Vernal City General Plan Update
- 2008 - 2009 Principle Coordinator, Bioregional Plan Development for Uintah Basin
- 2008 Participant, Career Day for Third Graders (April 22). Discovery Elementary School, Uintah School District, Vernal, Utah.
- 2007-2008 Volunteer, Mrs. Neilson’s Third Grade Class. Discovery Elementary School, Uintah School District, Vernal, Utah.

- 2007 Terry Smith Memorial Scholarship- Brainstormed with friends of Terry Smith to establish a memorial scholarship for a life sciences student at the Uintah Basin Regional Campus. Uintah Basin, Utah
- 2006-2007 Volunteer, Mrs. Searle's Second Grade Class. Discovery Elementary School, Uintah School District, Vernal, Utah.
- 2006 Biology student scholarships- Worked with Uintah Basin Regional Campus administration to annually secure five full tuition, renewable scholarships based upon academic performance. Uintah Basin, Utah
- 2005-2006 Volunteer, Mrs. McCurdy's First Grade Class. Maeser Elementary School, Uintah School District, Vernal, Utah.
- 2005 Volunteer, trail building on U.S. Department of the Interior, Bureau of Land Management lands. Received training from International Mountain Biking Association, Trail Crew Trail Building Workshop. Vernal, Utah.
- 2004 – 2005 Volunteer, Mrs. Lewis' Kindergarten Class. Maeser Elementary School, Uintah School District, Vernal, Utah.
- 2003 Reader of a children's book, Reading Radio program, KVEL. Vernal, Utah.
- 2000 Member, Vernal City Planning Commission. Vernal, Utah.
- 2000 Guide, Girl Scout troop field trip to observe release of endangered black-footed ferrets into the wild. Coyote Basin, Utah.
- 2000 Invited Expert, answered molecular biology questions in Tom Elder's spring semester Advanced Placement Biology class. Uintah High School, Vernal, Utah.
- 2000 Career Shadowed by Vernal Middle School student Breanne Loosle. Vernal, Utah.

Prepared February 2010