

CURRICULUM VITAE

Roger L. Vallejo

Computational Biologist & Geneticist
U.S. Department of Agriculture, ARS
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EDUCATION

1997	National Institutes of Health, NIAAA, Bethesda, MD	Fellow	Population & Statistical Genetics
1993	North Carolina State University, Raleigh, NC	Ph.D.	Plant Breeding & Genetics
1983	Universidad Nacional Agraria La Molina, Lima, Peru	M.S.	Plant Breeding & Statistics
1981	Universidad Nacional Agraria La Molina, Lima, Peru	B.S.	Agronomy

ACADEMIC AND PROFESSIONAL APPOINTMENTS

2005-	U.S. Department of Agriculture, ARS, NCCCWA	Computational Biologist & Geneticist
2000-2004	Penn State University, State College, PA	Assist. Prof. Genomics & Bioinformatics
1997-2000	National Institutes of Health, NIAAA, Bethesda, MD	Senior Res. Fellow Statistical Genetics
1995-1997	U.S. Department of Agriculture, ARS, ADOL	Research Geneticist
1993-1994	University of Florida, IFAS, GCREC, Bradenton, FL	Postdoctoral Fellow
1990-1993	North Carolina State University, Raleigh, NC	Research Assistant
1983-1990	International Potato Center, Lima, Peru	Associate Geneticist

HONORS AND AWARDS

2010 Award for Outstanding Performance, USDA-ARS, NCCCWA
2010 Service Award for Reviews, ADSA Board of Directors and Editors, *Journal of Dairy Science*
2009 Award for Outstanding Performance, USDA-ARS, NCCCWA
2008 Service award for statistical genetics & functional genomics data analysis, USDA-ARS, NCCCWA
2007 Award for Outstanding Performance, USDA-ARS, NCCCWA
2006 Service award for statistical genetics & functional genomics data analysis, USDA-ARS, NCCCWA
2005 Service award for statistical genetics & functional genomics data analysis, USDA-ARS, NCCCWA
1996 Award for Outstanding Research QTL mapping for Marek's disease, USDA-ARS, ADOL, East Lansing, MI
1993 Excellence in Doctoral Research, North Carolina State University, Raleigh, NC
1991 Honor Society *Pi Alpha Xi*, *Iota* Chapter, North Carolina State University, Raleigh, NC
1980 First Class Honors, B.S. Agronomy, Universidad Nacional Agraria, Lima, Peru

RESEARCH INTERESTS

- Design and implementation of genome-enabled selection and marker/gene-assisted selection
- Design and implementation of genome-wide association studies (GWAS) for complex traits
- Design and implementation of genome-wide QTL scans for complex traits in rainbow trout
- Bayesian methods of complex segregation analysis of complex traits in rainbow trout
- Genetic diversity, divergence, population structure, admixture, phylogenomics and LD extent-distribution in rainbow trout
- Transcriptome profiling using microarray and RNA-seq data and statistical analysis of gene expression data

RESEARCH EXPERIENCE

- Statistical genetics & functional genomics data analysis for a rainbow trout molecular breeding program. National Center for Cool & Cold Water Aquaculture, ARS, USDA. Kearneysville, WV, 2005- to present.
- Genetic basis of susceptibility to clinical mastitis in dairy cattle. Genomics & Bioinformatics Laboratory, Dept. Dairy & Animal Science, Pennsylvania State University, University Park, PA, 2000-2004.
- Genetic basis of vulnerability to alcoholism and related psychiatric disorders in human populations, Section on Population Genetics & Linkage, Laboratory of Neurogenetics, NIAAA, NIH, Bethesda, MD, 1997-2000.
- Genetic mapping of QTL affecting susceptibility to Marek's disease in chickens, Avian Disease & Oncology Laboratory, ARS,

USDA, East Lansing, MI, 1995-1997.

SCIENTIFIC AND ACADEMIC ACTIVITIES

- Associate Editor: *BMC Genetics; Genetics Selection Evolution*
- Editorial Board Member: *Frontiers in Genetics; Journal of Dairy Science*
- Ad Hoc Reviewer: *Genetics; Animal Genetics; Journal of Animal Breeding & Genetics; Journal of Animal Science; Marine Biotechnology; Israeli Journal of Aquaculture*
- Grant Panel Reviewer: USDA-NRICGP; USDA-NIFA-AFRI
- Ad hoc Grant Reviewer: NSF; Israel Science Foundation; US-Israel Binational Agric. Res. & Develop.
- Adjunct Professor, Universidad Nacional Agraria La Molina, Depart. of Aquaculture & Fisheries, Lima, Peru (2009-)
- Faculty Member Penn State University (2000-2004): Center for Genome Studies; Inter-College Graduate Degree Program in Genetics; Graduate Degree Program in Animal Science

PEER REVIEWED PUBLICATIONS

- Vallejo, RL, Y Palti, S Liu, DP Marancik and GD Wiens. 2014. Validation of linked QTL for bacterial cold water disease resistance and spleen size on rainbow trout chromosome Omy19. *Aquaculture* 432: 139-143
- Vallejo, RL, Y Palti, S Liu, JP Evenhuis, G Gao, CE Rexroad III and GD Wiens. 2014. Detection of QTL in Rainbow Trout Affecting Survival When Challenged with *Flavobacterium psychrophilum*. *Marine Biotechnology* 16: 349-360
- Palti, Y, G Gao, MR Miller, RL Vallejo, PA Wheeler, E Quillet, J Yao, GH Thorgaard, M Salem and CE Rexroad III. 2014. A resource of single-nucleotide polymorphisms for rainbow trout generated by restriction-site associated DNA sequencing of doubled haploids. *Molec Ecology Resources* 14: 588-596
- Rexroad III, CE, RL Vallejo, S Liu, Y Palti and GM Weber. 2013. Quantitative Trait Loci Affecting Response to Crowding Stress in an F2 Generation of Rainbow Trout Produced Through Phenotypic Selection. *Marine Biotechnology* 15: 613-627
- Wiens, GD, RL Vallejo, TD Leeds, Y Palti, S Hadidi, S Liu, JP Evenhuis, TJ Welch and CE Rexroad III. 2013. Assessment of Genetic Correlation between Bacterial Cold Water Disease Resistance and Spleen Index in a Domesticated Population of Rainbow Trout: Identification of QTL on Chromosome Omy19. *PLoS ONE* 8(10): e75749
- Wolters, WR, GS Burr, Y Palti and RL Vallejo. 2013. Phenotypic and Genetic Variation in Two North American Arctic Charr, *Salvelinus alpinus*, Stocks Cultured in a Recirculating Aquaculture System. *J World Aquaculture Society* 44: 473-485
- Rexroad III, CE, RL Vallejo, S Liu, Y Palti and GM Weber. 2012. QTL affecting stress response to crowding in a rainbow trout broodstock population. *BMC Genetics* 13: 97
- Salem, M, RL Vallejo, TD Leeds, Y Palti, S Liu, A Sabbagh, CE Rexroad III and J Yao. 2012. RNA-Seq Identifies SNP Markers for Growth Traits in Rainbow Trout. *PLoS ONE* 7(5): e36264
- Overturf, K, RL Vallejo, Y Palti, FT Barrows, JE Parsons. 2012. Microarray analysis of differential utilization of plant-based diets by rainbow trout. *Aquacult. Int.* 20: 213-232
- Palti, Y, C Genet, MC Luo, A Charlet, G Gao, Y Hu, C Castaño-Sánchez, K Tabet-Canale, F Krieg, J Yao, RL Vallejo and CE Rexroad III. 2011. A first generation integrated map of the rainbow trout genome. *BMC Genomics* 12: 180
- Vallejo, RL, GD Wiens, CE Rexroad III, TJ Welch, JP Evenhuis, TD Leeds, LLG Janss, and Y Palti. 2010. Evidence of major genes affecting resistance to bacterial cold water disease in rainbow trout using Bayesian methods of segregation analysis. *J. Animal Sci.* 88: 3814-3832
- Wiens, GD and RL Vallejo. 2010. Temporal and pathogen-load dependent changes in rainbow trout (*Oncorhynchus mykiss*) immune response traits following challenge with biotype 2 *Yersinia ruckeri*. *Fish & Shellfish Immunology* 29: 639-647
- Leeds, TD, JT Silverstein, GM Weber, RL Vallejo, Y Palti, CE Rexroad III, J Evenhuis, S Hadidi, TJ Welch, and GD Wiens. 2010. Response to selection for bacterial cold water disease resistance in rainbow trout. *J. Animal Sci.* 88: 1936-1946
- Vallejo, RL, CE Rexroad III, JT Silverstein, LLG Janss and GM Weber. 2009. Evidence of major genes affecting stress response in rainbow trout using Bayesian methods of complex segregation analysis. *J. Animal Sci.* 87: 3490-3505
- Rexroad III, CE and RL Vallejo. 2009. Estimates of Linkage Disequilibrium and Effective Population Size in Rainbow Trout. *BMC Genetics* 10: 83
- Sanchez, CC, TPL Smith, RT Wiedmann, RL Vallejo, M Salem, J Yao and CE Rexroad III. 2009. Single Nucleotide Polymorphism discovery in Rainbow Trout by deep sequencing of a reduced representation library. *BMC Genomics* 10: 559
- Palti, Y, MC Luo, Y Hu, C Genet, FM You, RL Vallejo, GH Thorgaard, PA Wheeler and CE Rexroad III. 2009. A first generation BAC-based physical map of the rainbow trout genome. *BMC Genomics* 10: 462
- Rexroad III, C E, Y Palti, SA Gahr and RL Vallejo. 2008. A second generation genetic map for rainbow trout (*Oncorhynchus mykiss*). *BMC Genetics* 9: 74
- Weber, GM, RL Vallejo, SE Lankford, JT Silverstein, and TJ Welch. 2008. Cortisol Response to a Crowding Stress: Heritability and Association with Disease Resistance to *Yersinia ruckeri* in Rainbow Trout. *North Amer. J. of Aquaculture* 70: 425-433

- Silverstein, JT, **RL Vallejo**, Y Palti, TD Leeds, CE Rexroad III, TJ Welch, GD Wiens and V Ducrocq. 2008. Rainbow trout resistance to bacterial cold-water disease is moderately heritable and is not adversely correlated with growth. *J. Animal Sci.* 87: 860-867
- Gahr, SA, **RL Vallejo**, GM Weber, BS Shepherd, JT Silverstein and CE Rexroad III, 2008. Effects of short-term growth hormone treatment on liver and muscle transcriptomes in rainbow trout (*Oncorhynchus mykiss*). *Physiol Genomics* 32: 380-392
- Johnson, NA, **RL Vallejo**, JT Silverstein, TJ Welch, GD Wiens, EM Hallerman and Y Palti, 2008. Suggestive Association of Major Histocompatibility IB Genetic Markers with Resistance to Bacterial Cold Water Disease in Rainbow Trout (*Oncorhynchus mykiss*). *Marine Biotechnology* 10: 429-437
- Johnson, NA, CE Rexroad III, EM Hallerman, **RL Vallejo** and Y Palti, 2007. Development and evaluation of a new microsatellite multiplex system for parental allocation and management of rainbow trout (*Oncorhynchus mykiss*) broodstocks. *Aquaculture* 266: 53-62
- Rexroad III CE, **RL Vallejo**, I Coulibaly, C Couch, A Garber, M Westerman and C Sullivan, 2006. Identification and characterization of microsatellites for striped bass from repeat-enriched libraries. *Conservation Genetics* 7: 971-982
- Silverstein, JT, GM Weber, CE Rexroad III and **RL Vallejo**, 2006. Genetics and Genomics-Integration of Molecular Genetics into a Breeding Program for Rainbow Trout. *Israeli J. of Aquaculture* 58: 231-237
- Rexroad III, CE, Y Palti, **RL Vallejo** and J Silverstein, 2006. Integration of molecular genetic information into the NCCCWA selective breeding program for rainbow trout. *Israeli J. of Aquaculture* 58: 323-327
- Palti, Y, MF Rodriguez, **RL Vallejo** and CE Rexroad III, 2006. Mapping of Toll-like receptor genes in rainbow trout. *Animal Genetics* 37: 597-598
- Coulibaly, I, RG Danzmann, Y Palti, **RL Vallejo**, SA Gahr, J Yao and CE Rexroad III, 2006. Mapping of genes in a region associated with upper temperature tolerance in rainbow trout. *Animal Genetics* 37: 598-599
- Radel, M, **RL Vallejo**, N Iwata, JC Long, R Aragon, M Virkkunen, and D Goldman, 2005. Haplotype-Based Localization of an Alcohol Dependence Gene to the 5q34 γ -Aminobutyric Acid Type A Gene Cluster. *Archives Gen. Psychiatry* 62: 47-55
- Vallejo, RL**, YL Li, GW Rogers and MS Ashwell, 2003. Genetic diversity and background linkage disequilibrium in the North American Holstein cattle population. *J. Dairy Sci.* 86:4137-4147
- Vallejo, RL**, LD Bacon, HC Liu, RL Witter, MAM Groenen, J Hillel and HH Cheng, 1998. Genetic mapping of quantitative trait loci affecting susceptibility to Marek's disease virus induced tumors in F₂ intercross chickens. *Genetics* 148: 349-360
- Xu, SZ, N Yonash, **RL Vallejo** and HH Cheng, 1998. Mapping quantitative trait loci for binary traits using a heterogeneous residual variance model: An application to Marek's disease susceptibility in chickens. *Genetica* 104: 171-178
- Vallejo, RL**, GT Pharr, HC Liu, HH Cheng, RL Witter and LD Bacon, 1997. Non-association between *Rfp-Y* major histocompatibility complex-like genes and susceptibility to Marek's disease virus-induced tumors in 6₃ x 7₂ F₂ intercross chickens. *Animal Genetics* 28: 331-337
- Pharr, GT, **RL Vallejo** and LD Bacon, 1997. Identification of *Rfp-Y* (*Mhc*-like) haplotypes in chickens of Cornell lines N and P. *J. Heredity* 88: 504-512
- Cheng, HH, I Levin, **RL Vallejo**, H Khatib, JB Dodgson, LB Crittenden and J Hillel, 1995. Development of a genetic map of the chicken with markers of high utility. *Poultry Sci.* 74: 1855-1874
- Smith, EJ, HH Cheng and **RL Vallejo**, 1995. Mapping functional chicken genes: an alternative approach. *Poultry Sci.* 75: 642-647
- Vallejo, RL**, WW Collins and JB Young, 1995. Inheritance of Resistance to Potato Virus Y and Potato Virus X in Hybrid *Solanum phureja-S. stenotomum* Diploid Potatoes. *J. Heredity* 86: 89-93
- Vallejo, RL**, WW Collins and RD Schiavone, 1994. Genetics and Incorporation of Glandular Trichomes and Polyphenol Oxidase Activity into an Advanced *Solanum phureja-S. stenotomum* Diploid Potato Population. *J. Amer. Soc. Hort. Sci.* 119: 824-828
- Vallejo, RL**, WW Collins and RH Moll, 1994. Inheritance of A and B Glandular Trichome Density and Polyphenol Oxidase Activity in Diploid Potatoes. *J. Amer. Soc. Hort. Sci.* 119: 829-832
- Vallejo, RL**, WW Collins, RD Schiavone, SA Lommel and JB Young, 1994. Extreme Resistance to Infection by Potato Virus Y and Potato Virus X in an Advanced Hybrid *Solanum phureja-S. stenotomum* Diploid Potato Population. *Amer. J. of Potato Research* 71: 617-628
- Vallejo, RL** and HA Mendoza, 1992. Plot Technique Studies on Sweet Potato Yield Trials. *J. Amer. Soc. Hort. Sci.* 117: 508-511
- Vallejo, RL**, and S Helfgott, 1985. Determination de periodo critico de competencia de malezas en el cultivo del frijol typo Caraota (*Phaseolus vulgaris* L.) C.V. Porrillo Sintetico. *Anales Cientificos UNALM* 24: 165-175

PUBLISHED ABSTRACTS

- Vallejo, RL**, CE Rexroad III, S Liu and Y Palti. 2010. Genetic management of broodstock populations with DNA markers In rainbow trout. The 9th World Congress on Genetics Applied to Livestock Production, August 1-6, 2010, Leipzig, Proceedings: <http://www.kongressband.de/wcgalp2010/assets/html/0928.htm>
- Vallejo RL**. 2003. Power to detect loci linked to common diseases of dairy cattle using identical-by-descent based methods of half-sib pair linkage analysis. *J Anim Sci* 81:160 (Suppl 1)
- Radel M, **Vallejo RL**, Aragon R, Long JC, Virkkunen M, Goldman D, 2001. Analysis of GABA_A receptor subunit genes in alcohol

- dependence and obsessive-compulsive disorder. *Am J Hum Genet* 69(4): 576 (Suppl)
- Iwata N, **Vallejo RL**, Virkkunen M, Long JC, Suizuki T, Ozaki N, Goldman D. 2001. Evidence for linkage of genetic variants at the serotonin 2B receptor gene (HTR2B) with Finnish alcoholics. *Biol Psychiatry* 49: 563 (Suppl S)
- Radel M, **Vallejo RL**, Iwata N, Aragon R, Naukkarinen H, Virkkunen M, Long JC, D Goldman, 2000. Linkage and association analyses of sequence variants of the GABRA6, GABRB2 and GABRG2 gene cluster and alcohol dependence in a Finnish sample. *Am J Hum Genet* 67(4): 223 (Suppl 2)
- Vallejo RL**, Brooks J, Lappalainen J, Hoopes D, High TB, Wilhelm LA, Virkkunen M, Linnoila M, Goldman D, JC Long, 1999. Multi-point linkage of antisocial alcoholism to 5-HT1B receptor gene on chromosome 6 in two populations. *Alcohol Clin Exp Res* 23: 58A (Suppl).
- Bergen AW, Wilhelm LA, **Vallejo RL**, Kim S, McKeane D, Robin R, Goldman D, Long JC. 1999. Association between alcohol dependence and 5-locus haplotypes on chromosome 11p15.5 in an American Indian population. *Am J Hum Genet* 65(4): 69 (Suppl)
- Vallejo RL**, Wilhelm LA, Hoopes D, High TB, Virkkunen M, Linnoila M, Goldman D, Long JC, 1998. Genome-wide search for genes affecting vulnerability to alcohol dependence in Finnish pedigrees. *Am J Hum Genet* 63: 236 (Suppl).
- Vallejo RL**, Long JC, Hoopes D, Virkkunen M, Goldman D, Linnoila M, 1998. Autosomal genome scan for loci linked to alcohol dependence and related psychiatric disorders in Finnish pedigrees. *Alcohol Clin Exp Res* 22: 97A (Suppl).
- Goldman D, Lappalainen J, **Vallejo RL**, Robin RW, Virkkunen M, Linnoila M, Long JC. 1998. Linkage of the 5HT1B serotonin receptor to antisocial alcoholism in Finns and Southwestern Indians. *Am J Med Genet* 81(6): 479
- Bacon LD, Cheng HH, **Vallejo RL**, Witter RL. 1996. Use of Recombinant Congenic Chicken Strains to Define Non-MHC Genes Influencing Marek's Disease Susceptibility. *Current Research on Marek's Disease*, Proceedings of 5th Internat. Sympos. on Marek's Disease, pp 63-68, East Lansing, MI. Edited by Silva RF, Cheng HH, Coussens PM, Lee LF, Velicer LF. Americ. Assoc. Avian Pathologists, Inc
- Mendoza HA, Golmirzaie AM, **Vallejo RL**, Espinoza JA, Serquen F. 1991. Breeding Potatoes for Warm Tropics. Proceedings of the workshop on *Production, Post-Harvest Technology and Utilization of the Potato in the Warm Tropics*, pp. 12-21. Edited by Govinden N, Julien MHR, Hunt GLT, Autrey LJC

PROFESSIONAL PRESENTATIONS

- Poster titled "Validation of Linkage Between BCWD Resistance And Spleen Size QTL On Omy19 In Rainbow Trout: Pleiotropy Versus Linkage" by **RL Vallejo**, Y Palti, S Liu, DP Marancik, TJ Welch, TD Leeds, JP Evenhuis, CE Rexroad III, GD Wiens. Plant & Animal Genome XXII, January 11-15, 2014, San Diego, CA, USA
- Poster titled "Mapping QTL for Spleen Size and BCWD Resistance in Rainbow Trout" by **RL Vallejo**, Y Palti, S Liu, TJ Welch, TD Leeds, JP Evenhuis, CE Rexroad III, GD Wiens. Plant & Animal Genome XXI, January 12-16, 2013, San Diego, CA, USA
- Poster titled "Mapping of QTL for bacterial cold water disease resistance in rainbow trout" by Y Palti, **RL Vallejo**, TJ Welch, TD Leeds, JP Evenhuis, G Gao, S Liu, CE Rexroad III, GD Wiens. International Symposium on Genetics in Aquaculture, June 24-29, 2012, Auburn, AL, USA
- Poster titled "Quantitative trait loci analyses and RNA-seq identify genes affecting stress response in rainbow trout" by CE Rexroad III, S Liu, G Gao, Y Palti, GM Weber, **RL Vallejo**. 1st International Conference on Integrative Salmonid Biology, June 17-20, 2012, Oslo, Norway
- Poster titled "Mapping of QTL for bacterial cold water disease resistance in rainbow trout" by Y Palti, **RL Vallejo**, TJ Welch, TD Leeds, JP Evenhuis, S Liu, CE Rexroad III, GD Wiens. Plant & Animal Genome XX, January 14-18, 2012, San Diego, CA, USA
- Invited Seminar titled "Segregation analysis and detection of QTL for stress response in rainbow trout" by **RL Vallejo**. Section on Statistical Genetics, Department of Biostatistics, School of Public Health, Univ. of Alabama, June 24, 2011, Birmingham, AL, USA, <http://www.soph.uab.edu/ssg/ssgseminars/2011>
- Poster titled "Detection of quantitative trait loci affecting response to crowding stress in rainbow trout" by **RL Vallejo**, CE Rexroad III, S Liu, Y Palti, GM Weber. Gordon Research Conferences: Quantitative Genetics & Genomics, February 20-25, 2011, Galveston, TX, USA
- Poster titled "Detection of QTL for spleen size and disease resistance in rainbow trout" by Y Palti, **RL Vallejo**, TJ Welch, TD Leeds, JP Evenhuis, S Liu, CE Rexroad III, GD Wiens. Plant & Animal Genome XIX, January 15-19, 2011, San Diego, CA, USA
- Poster titled "Genomic analysis of the rainbow trout response to crowding" by CE Rexroad, **RL Vallejo**, S Liu, C Sanchez, J Yao, Y Palti, GM Weber. Plant & Animal Genome XIX, January 15-19, 2011, San Diego, CA, USA
- Presentation titled "Genetic management of rainbow trout populations with DNA markers" by **RL Vallejo**, CE Rexroad III, S Liu, Y Palti. The 9th World Congress on Genetics Applied to Livestock Production, August 1-6, 2010, Leipzig, Germany
- Invited Presentation titled "Evidence of major genes affecting bacterial cold water disease resistance in rainbow trout using Bayesian methods of complex segregation analysis" by **RL Vallejo**, GD Wiens, TJ Welch, LLG Janss, CE Rexroad III, Y Palti.

- Plant & Animal Genome XVIII, January 9-13, 2010, San Diego, CA, USA
- Poster titled "A first generation integrated physical and genetic map of the rainbow trout genome" by Y Palti, MC Luo, C Genet, Y Hu, FM Yuo, **RL Vallejo**, CE Rexroad III. Plant & Animal Genome XVIII, January 9-13, 2010, San Diego, CA, USA
- Invited seminar titled "Rainbow trout genetic improvement and genomic selection in aquaculture" at Graduate Program in Aquaculture, National Agricultural University La Molina, July 13, 2009, Lima, Peru
- Poster titled "Evidence of major genes for resistance to bacterial cold-water disease in rainbow trout using mixed inheritance multiple-threshold model and Bayesian segregation analysis" by **RL Vallejo**, GD Wiens, TJ Welch, LLG Janss, CE Rexroad III and Y Palti. Gordon Research Conferences: Quantitative Genetics & Genomics, February 22-27, 2009, Galveston, TX, USA
- Presentation titled "Characterizing the genetic diversity of rainbow trout in support of broodstock development" by CE Rexroad III, Y Palti and **RL Vallejo**. Plant & Animal Genome XVII, January 10-14, 2009, San Diego, CA, USA
- Poster titled "A first generation BAC physical map of the rainbow trout genome" by Y Palti, MC Luo, Y Hu, C Genet, **RL Vallejo** and CE Rexroad III. Plant & Animal Genome XVII, January 10-14, 2009, San Diego, CA, USA
- Poster titled "Characterization of linkage disequilibrium in a rainbow trout broodstock population" by CE Rexroad III and **RL Vallejo**. Plant & Animal Genome XVI, January 12-16, 2008, San Diego, CA, USA
- Poster titled "Progress toward an immunogenetic map for rainbow trout" by Y. Palti, M.R. Fincham, G.D. Wiens, **R.L. Vallejo**, C.E. Rexroad III. Plant & Animal Genome XVI, January 12-16, 2008, San Diego, CA, USA
- Presentation titled "Complex segregation analysis of plasma cortisol in NCCCWA rainbow trout" by **RL Vallejo**. Fish Breeder's Round Table, June 11-13, 2007, Aalesund, Norway
- Poster titled "Associations of markers linked to major histocompatibility (mh) regions and to other immune response genes with disease resistance in rainbow trout" by Y Palti, NA Johnson, MR Fincham, CE Rexroad III, KE Hovatter, TJ Welch, GD Wiens, JT Silverstein, and **RL Vallejo**. Plant & Animal Genome XIV Conference, January 13-17, 2007, San Diego, CA, USA
- Poster titled "Effects of recombinant bovine somatotropin (rbst) on the liver and muscle transcriptomes of high growth rate rainbow trout (*Oncorhynchus mykiss*)" by SA Gahr, GM Weber, BS Shepherd, JT Silverstein, **RL Vallejo**, I Coulibaly and CE Rexroad III. Plant & Animal Genome XIV Conference, January 14-18, 2006, San Diego, CA, USA
- Poster titled "The NCCCWA genetic map for rainbow trout" by CE Rexroad III, RG Danzmann, Y Palti, and **RL Vallejo**. Plant & Animal Genome XIV Conference, January 14-18, 2006, San Diego, CA, USA
- Lecture titled "Multipoint linkage of antisocial alcoholism to 5HT1B receptor gene on chromosome 6 in two populations" by **RL Vallejo**. Presentations by Laboratory of Neurogenetics Staff (NIAAA/NIH) at 22nd Annual Scientific Meeting of the Research Society on Alcoholism, June 26-July 1, 1999, Santa Barbara, CA, USA
- Platform presentation titled "Genome-wide Search for Genes Affecting Vulnerability to Alcohol Dependence in Finnish Pedigrees" by **RL Vallejo**. Presentations by Laboratory of Neurogenetics Staff (NIAAA/NIH) at The 48th Annual Meeting of The American Society of Human Genetics, October 27-31, 1998, Denver, CO, USA
- Poster titled "Autosomal Genome Scan for Loci Linked to Alcohol Abuse and Related Psychiatric Disorders in Finnish Pedigrees" by **RL Vallejo**. Presentations by Laboratory of Neurogenetics Staff (NIAAA/NIH) at The Annual Meeting of The Research Society on Alcoholism, June 20-25, 1998, Hilton Head, SC, USA

TEACHING ACTIVITIES (Penn State University)

GENET/STAT/ANSC 597F *Statistical Genomics: QTL Mapping in Natural Populations*, 2002-2003

ANSC 322 *Principles of Animal Breeding*, 2002

Guest Lecturer, Honors ANSC 001 *Animal Science*, 2001-2002

Guest Lecturer, ANSC 297B *Introduction to Animal Biotechnology*, 2001-2003

CONGRESS AND WORKSHOPS

- *Statistical methods for Genome-Enabled Selection*, May 6-10, 2012, Iowa State University, Ames, IA, USA
- Gordon Research Conferences: Quantitative Genetics & Genomics, February 20-25, 2011, Galveston, TX, USA
- The 9th World Congress on Genetics Applied to Livestock Production, August 1-6, 2010, Leipzig, Germany
- Plant & Animal Genome XVIII, January 9-13, 2010, San Diego, CA, USA
- Gordon Research Conferences: Quantitative Genetics & Genomics, February 22-27, 2009, Galveston, TX, USA
- Plant & Animal Genome XVII, January 10-14, 2009, San Diego, CA, USA
- Plant & Animal Genome XVI, January 12-16, 2008, San Diego, CA, USA
- NRI Animal Genome Annual Investigator Meeting, January 11, 2008, San Diego, CA, USA
- Fish Breeder's Round Table, June 11-13, 2007, Aalesund, Norway
- Plant & Animal Genome XV, January 13-17, 2007, San Diego, CA, USA
- *C++ Programming I*, UC Berkeley Extension Online, February 21-August 22, 2006, Berkeley, CA, USA

- 3rd Symposium Biostatistics: Statistical Genetics & Genomics, Nov. 21-22, 2005, Univ. Washington, Seattle, WA, USA
- *Analysis of Population Genetic Data*, November 19-20, 2005, Dep. Biostatistics, Univ. Washington, Seattle, WA, USA
- *Design and Analysis of Microarrays*, November 19-20, 2005, Dep. Biostatistics, Univ. Washington, Seattle, WA, USA
- *PHP for Web Development: Hands-On*, October 31-November 1, 2005, Learning Tree International, Reston, VA, USA
- *JavaScript for Web Development: Hands-On*, August 9-12, 2005, Learning Tree International, Rockville, MD, USA
- Rainbow Trout Res. Cooperators Meeting, May10-12, 2005, NCCCWA, USDA-ARS, Morgantown, WV, USA
- BAC Fingerprinting Data Analysis, Dr. MC Luo Laboratory, April 6-8, 2005, Univ. California Davis, CA, USA
- *Systems Analysis & Design: An Overview*, January 10-April 15, 2005, UC Berkeley Extension Online, CA, USA
- The 53rd Annual Amer. Soc. Hum. Genet. Meeting, November 4-8, 2003, Los Angeles, CA, USA
- *From genome to disease: Symposium of high throughput biology*, July 23-24, 2003, NHLBI, NIH, Bethesda, MD, USA
- Meeting of Amer. Dairy Sci. Assoc. & Amer. Soc. of Animal Sci., June 22-26, 2003, Phoenix, AZ, USA
- Plant & Animal Genome XI, January 11-15, 2003, San Diego, CA, USA
- Meeting of Amer. Dairy Sci. Assoc. & Amer. Soc. of Animal Sci., July 24-28, 2001, Indianapolis, IN, USA
- *Genetics Computer Group Sequence Analysis*, January 7-9, 1999, CIT, NIH, Bethesda, MD, USA
- Scientific Meeting of Res. Soc. on Alcoholism, June 26-July 1, 1999, Santa Barbara, CA, USA
- The 48th Annual Amer. Soc. Hum. Genet. Meeting, October 27-31, 1998, Denver, CO, USA
- Scientific Meeting of Res. Soc. on Alcoholism, June 20-25, 1998, Hilton Head Island, SC, USA
- *C Language Fundamentals*, April 20-24, 1998, CIT, NIH, Bethesda, MD, USA
- *Getting Started with C Language*, March 30-April 2, 1998, CIT, NIH, Bethesda, MD, USA
- *Genetic architecture of complex traits*, December 10-11, 1997, NIGMS, NIH, Bethesda, MD, USA
- The 47th Annual Amer. Soc. Hum. Genet. Meeting, October 28-November 1, 1997, Baltimore, MD, USA
- The 6th Annual Meeting of Internat. Genet. Epidemiology Soc., October 27-28, 1997, Baltimore, MD, USA
- Gordon Res. Conference, *Quantitative Genetics and Biotechnology*, February 9-14, 1997, Ventura, CA, USA
- Plant & Animal Genome V, January 12-16, 1997, San Diego, CA, USA
- The 25th Internat. Congress on Animal Genetics, July 20-25, 1996, Tours, France
- *Computational Genomics*, November 1-6, 1995, Cold Spring Harbor, NY, USA
- *Biotechnology's role in genetic improvement of farm animals*, May 14-17, 1995, USDA-ARS, Beltsville, MD, USA

MEMBERSHIP IN PROFESSIONAL SOCIETIES

International Society of Animal Genetics, 2006 -
 American Association for the Advancement of Science, 1997 -
 Genetics Society of America, 1995 -

MENTORS

Graduate Advisor (PhD): Wanda W. Collins, North Carolina State University, Raleigh, NC, USA
 Postdoctoral Advisor: Hans H. Cheng, USDA, ARS, East Lansing, MI, USA
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