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CURRENT POSITION

2008– Tenure Track Investigator and Acting Chief, Section on Neuronal Structure, Laboratory for Integrative Neuroscience, NIAAA, NIH, Bethesda, MD

EDUCATION

1997 Ph.D. awarded by School of Sciences, University of Buenos Aires, Argentinia.

1996 Neurobiology Course, Marine Biological Laboratories, Woods Hole, MA.

1992 B.S./Masters degree in Biology, School of Science, University of Buenos Aires, Argentinia.

PREVIOUS POSITIONS

2002–07 Postdoctoral Fellow at the laboratory of Bernado L. Sabatini. Havard Medical School, Department of Neurobiology, Boston, MA.

Project: "Regulation of dendritic spine formation, growth and maturation."

1998–2001 Postdoctoral Fellow at the laboratory of John T. Williams. Vollum Institute, Oregon Health and Sciences University, Portland, OR.

Projects: "Role of electrotonic coupling on the activity of noradrenergic neurons from the locus coerulus."
"Desensitization and internalization of μ-opioid receptors."

1992–98 Graduate Reseach Fellow at the laboratory of Dr. Osvaldo D. Uchitel. School of Medicine, University of Buenos Aires, Argentinia.

Thesis: "Pharmacological properties and modulation of voltage-dependent calcium channels of central nervous system synaptic terminals."

1990–92 Undergraduate Research Fellow at the laboratory of Osvaldo D. Uchitel. School of Medicine, University of Buenos Aires, Argentinia.

Masters thesis: "Modulation of presynaptic currents at the neuromuscular junction: action of calcium channel agonist, antagonist, and immunoglobulins from LEMS patient."

AWARDS AND FELLOWSHIPS

2010 Young Investigator Poster Award, Winter Conference on Brain Research.

2006 *Goldenson* Research Fellowship, Havard Medical School.

2002–04 Training Grant Fellowship, NIH.

1999–2000 *Tartar* Research Fellow, Oregon Health and Sciences University.

1996 *Phillip H. Presley* travel award to Woods Hole Laboratories.

1992–96 National fellowship from the Council of Scientific and Technological Research (CONICET), Argentina.

1992 Diploma of Honor, University of Buenos Aires.

1991 National fellowship for undergraduate research from University of Buenos Aires.

PUBLICATIONS

1. Dobi, G.K. Seabold, C.H. Christensen, R. Bock, **V.A. Alvarez.** (2011). Cocaine-Induced Plasticity in the Nucleus Accumbens Is Cell Specific and Develops without Prolonged Withdrawal. J. Neurosci. 31:1895-904.

2. P.F. Kramer, C.H. Christensen, L.A. Hazelwood, A. Dobi, R. Bock, D.R. Sibley, Y. Mateo, **V.A. Alvarez.** (2011). Dopamine D2 receptor overexpression alters behavior and phsiology in Drd2-EGPFP mice. J. Neurosci. 31:126-32.
   Faculty of 1000 "Recommended" list (http://f1000.com/8639957).

3. M. Feyder, R.M. Karlsson, P. Mathur, M. Lyman, R. Bock, R. Momenan, J. Munasinghe, M.L. Scattoni, J. Ihne, M. Camp, C. Graybeal, D. Strathdee, **V.A. Alvarez**, P. Kirsch, M. Rietschel, S. Cichon, H. Walter, A. Meyer-Lichtenberg, S.G. Grant and A. Holmes. (2010). Association of mouse Dlg4 (PSD-95) gene deletion and human DLG4 gene variation with phenotypes relevant to autism spectrum disorders and Williams' syndrome. Am. J. Psychiatry 167:1508-17.

4. G. K. Seabold, J. B. Daunais, A. Rau, K. A. Grant, **V. A. Alvarez** (2010). DiOLISTIC Labeling of Neurons from Rodent and Non-human Primate Brain Slices. J. Vis. Exp (41) pii:2081.

5. J. L. Brigman, T. Wright, G. Talani, S. Prasad-Mulcare, S. Jinde, G. K. Seabold, P. Mathur, M. I. Davis, R. Bock, R. M. Gustin, R. J. Colbran, **V. A. Alvarez**, K. Nakazawa, E. Delpire, D. M. Lovinger and A. Holmes (2010). Loss of GluN2B-containing NMDA receptors in CA1 hippocampus and cortex impairs long-term depression, reduces dendritic spine density and disrupts learning. J. Neurosci. 30: 4590–600.

6. **V. A. Alvarez**, D.A. Ridenour and B.L. Sabatini (2007). Distinct Structural and Ionotropic Roles of NMDA Receptors in Controlling Spine and Synapse Stability. J. Neurosci. 27: 7365–76.

7. **V. A. Alvarez** and B. L. Sabatini (2007). Anatomical and physiological plasticity of dendritic spines. Annu. Rev. Neurosci. 30: 79–97.

8. **V. A. Alvarez**, D.A. Ridenour and B.L. Sabatini (2006). Retraction of synapses and dendritic spines induced by off-target effects of RNA interference. J. Neurosci. 26: 7820–5.
   Selected by TWIJ. J. Neurosci. 2006 26 : i. Faculty of 1000 "Must Read" list (http://www.f1000biology.com/article/id/1033579/evaluation).

9. S. F. Tavazoie*, **V. A. Alvarez***, D. A. Ridenour, D. J. Kwiatkowski, B. L. Sabatini (2005). Regulation of neuronal morphology and function by the tumor suppressors Tsc1 and Tsc2. Nat. Neurosci. 8: 1727–34. *, equal contribution.
   Faculty of 1000 "Recommended" list (http://www.f1000biology.com/article/id/1029224/evaluation).

10. **V. A. Alvarez**, C. Chow, E. J. Van Bockstaele and J. T. Williams (2002). Frequency-dependent synchronization of locus coeruleus neurons: role of electrotonic coupling. Proc. Natl. Acad. Sci. U. S. A. 99: 4032–6.
    Faculty of 1000 "Recommended" list (http://www.f1000biology.com/article/id/1005310/evaluation).

11. **V. A. Alvarez***, S. Arttamangkul*, J. Whistler, M. van Zastrow, D. Grandy and J. T. Williams (2002). μ-Opioid receptors: activation of potassium conductance, desensitization and internalization. J. Neurosci. 22: 5769–76. *, equal contribution.

12. **V. A. Alvarez**, S. Arttamangkul, and J. T. Williams (2001). A RAVE about Opioid Withdrawal. Neuron 32: 761–3. New and Views.

13. **V. A. Alvarez** Maubecin, F. Garcia-Hernandez, J. T. Williams and E. Van Bockstaele (2000). Functional coupling between neurons and glia. J. Neurosci. 20: 4091–8.

14. S. Arttamangkul*, **V. A. Alvarez** Maubecin*, G. Thomas, J. T. Williams and D. K. Grandy (2000). Binding and internalization of novel fluorescent opioid peptides in living cells. Mol. Pharmacol. 58: 1570–80. *, equal contribution.

15. **V. A. Alvarez** Maubecin and J. T. Williams (1999). Developmental changes that regulate the activity of locus coeruleus neurons. Tokai Journal of Experimental Clinical Medicine 24: 41–51. Review.

16. **V. A. Alvarez** Maubecin, V. Sanchez, M. Rosato Siri, B. D. Cherksey, M. Sugimori, R. R. Llinas and O. D. Uchitel (1995). Pharmacological characterization of the voltage-dependent Ca2+ channels present in synaptosomes from rat and chicken central nervous system. J. Neurochem. 64: 2544–51.

17. O. D. Uchitel, F. S. Scornik, D. A. Protti, C. Fumberg, **V. A. Alvarez** and S. H. Appel (1992). Long term neuromuscular dysfunction produced by passive transfer of amyotrophic lateral sclerosis (ALS) immunoglobulins. Neurology 42: 2175–80.

Book Chapters

V. A. Alvarez, G. M. Shankar, B. L. Bloodgood, D. J. Selkoe and B. L. Sabatini (2007). Chapter 7: Multiple levels of synaptic regulation by NMDA-type glutamate receptor in normal and disease states. In "Synaptic Plasticity and the Mechanism of Alzheimer's Disease" Editors: Selkoe, Triller and Christen. Publisher: Springer.

INVITED TALKS

1/2010	Bowles Center for Alcohol Studies, UNC, Chapel Hill, North Carolina
9/2009	IRSN- Argentinean Society for Neuroscience. Cordoba, Argentina
5/2009	Department of Behavioral Neuroscience, OHSU, Portland, Oregon
3/2009	Synapse : postsynaptic mechanisms of plasticity. Warrenton, Virginia
6/2008	NIEHS, North Carolina
8/2007	Tuberous Sclerosis Alliance Meeting, Annapolis, Maryland
4/2007	Gallo Institute, USCF. San Francisco, California
5/2007	NIAAA-NIH, Bethesda, Maryland
3/2007	Department of Neurobiology, The University of Texas at Austin, Texas
3/2007	Department of Cell Biology and Neuroscience, University of California. Riverside, CA
2/2007	Department of Neurobiology, University of Pittsburgh, Pittsburgh, Pennsylvania
2/2007	Department of Biology, Washington University, St. Louise, MO
1/2007	Department of Biology, University of Pennsylvania. Philadelphia, Pennsylvania
12/2006	Gladstone Institute, UCSF. San Francisco, California
12/2006	Brudnick Neuropsychiatric Research Institute, U. Mass, Worcester, MA
12/2006	American Epilepsy Society, San Diego, California
7/2003	Vollum Institute, Oregon Health Sciences University, Portland, Oregon