

Revaz Solomonia

personal information

Contact Details

Full name: Revaz Solomonia	Email address:
Gender: Male	revaz_solomonia@iliauni.edu.ge
Citizenship: საქართველო (Georgia)	Country: საქართველო (Georgia) City: Tbilisi

Languages

Language	Writing	Reading	Speaking
Russian	B2	B2	B2
English	B2	B2	B2
ქართული (Georgian)	C2	C2	C2

Education

Academic degree

Academic Degree: Doctoral/PhD, Ed.D or other equivalent

Education

Academic Degree	Name of the Institution	Country	Major discipline	Start year	End year
Doctoral/PhD, Ed.D or other equivalent	Institute of Molecular Biology, Moscow	Russian Federation		1978	1981
Bachelor/BS, BA, BE or other equivalent	Iv. Javakhishvili Tbilisi State University		Biology	1973	1978

Projects

Ongoing projects

Project title	Position	Project head	Start Date	Donor
Recognition memory of visual imprinting in chicks: single nuclei transcriptome and circular RNA studies	Principal Investigator	Revaz Solomonia	09.03.2023	Sh.Rustaveli National Science Foundation, FR-22-8692

Completed projects

Project title	Position	Project head	Start Date	End Date	Donor
Molecular Mechanisms of Memory in imprinting	Manager of the Project	Revaz Solomonia	09.12.2016	08.12.2019	Sh.Rustaveli National Science Foundation (217592)

Project title	Position	Project head	Start Date	End Date	Donor
Centre for pathogen research and education	Manager	Revaz Solomonia	15.10.2014	15.10.2016	Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation and Sh.Rustaveli National science Foundation
Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation	Manager from the Ilia State University	Shota Tsanava	01.05.2014	01.05.2016	Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation, GG-23
Atypical Y. pestisstrains isolated from natural foci in Georgia: from proteome to virulence and gene expression”	Manager	Revaz Solomonia	06.01.2014	31.12.2014	Defense Threat Reduction Agency (Threat Agent Detection and Response Activity Project N6).
„Epidemiology and Ecology of Tularemia in Georgia”	Manager from the Ilia State University	Gvantsa Chanturia	30.11.2013	30.11.2016	Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation, GG-19
“ Molecular Mechanism of Recognition Memory”	Manager	Revaz Solomonia	15.04.2013	15.04.2016	Sh.Rustaveli Science Foundation (RN 01/31)
„Ecology, Genetic Clustering and Virulence of major bacterial and viral pathogens inthe Republic of Georgia“	Manager from the I.Beritashvili Institute of Physiology	Lela Bakaniidze	30.09.2009	30.09.2012	Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation (RN- G E B 2 - 1 9 6 4 - T B - 0 9)
Gene Expression and Recognition memory	Manager	Revaz Solomonia	20.01.2008	20.01.2011	Georgian National Science Foundation (RN-235)
Ca2+/calmodulin dependent protein kinase II signaling, learning and memory	Sub-Manager from Tbilisi, Georgia	Gabriel Horn	10.05.2006	10.05.2008	Royal Society UK, University of Cambridge (RN 2005R4/-JP)
Ecology, Genetic Clustering and Virulence of Yersinia pestisStrains Isolated from Natural Foci of Plague in Georgia	Manager from the I.Beritashvili Institute of Physiology	Lela Bakaniidze	01.06.2005	01.06.2008	Defense Threat Reduction Agency and U.S. Civilian Research and Development Foundation - RN (GEB2-1953-TB-05)
“High-Resolution lateral imaging of Neurological Activity using novel sensitive microbiosensors	Sub-Manager from Tbilisi, Georgia	Wolfgang Schumann	15.07.2002	15.07.2005	INTAS (RN 2001-2065)
“Isolation and characterization of compounds with antiepileptic activity from Aquilegia Vulgaris – the plant widely used in oriental folk medicine”	Manager	Revaz Solomonia	30.12.2001	30.11.2004	International Science and Technology Center (ISTC), (RN G-420)
“ Ca2+/calmodulin dependent protein kinase II and recognition memory in chicks”	Sub-Manager from Tbilisi, Georgia	Gabriel Horn	15.06.2001	15.06.2003	Royal Society UK, University of Cambridge (RN gt/FSU/JP)
Gene expression and long-term memory	Travel Fellowship, Department of Biochemistry, Cambridge University	Antony Jakson	23.02.1999	23.08.1999	Wellcome Trust (RN - 056634/Z/99/Z)
“Fast-responding Microbiosensors for recognition memory brain research”	sub-manager from Georgia	Elisabed Csoregi	15.10.1997	15.10.2000	RN-96-1432
Tyrosine kinase signalling pathways, neural cell adhesion molecules and long-term memory”	sub-manager from Georgia	Gabriel Horn	30.09.1996	30.09.1997	Wellcome Trust collaborative Research Initiative grant (RN-047694/Z/96)
Neuronal Cell adhesion molecules and visual imprinting in chicks	Senior Fellow	Gabriel Horn	10.01.1994	10.01.1996	Wellcome Trust (RN - 0338892/2/93 and extension 038899)

Scientific Fields (2018-2020)

Main Field

Field: 1. Natural sciences

Scientific Fields (2021-2024)**Main Field**

Field: 2. Life Sciences

Sub-Field: 2.1 Molecular Biology, Biochemistry, Biophysics, Structural Biology

Additional Field (1)

Field: 4. Georgian Studies

Additional Field (2)

Field: 2. Life Sciences

Sub-Field: 2.5 Neuroscience and Disorders of the Nervous System

Employment History**Current place(s) of employment**

Workplace	Name of the work department	Position	Main responsibilities	Start Date
Iv.Beritashvili Center of Experimental Biomedicine	Biochemistry	Major Scientific Fellow	Scientific Research	17.12.2010
Ilia State University	Faculty of Natural Sciences and Medicine, Institute of Chemical Biology	Professor, Director of the Institute	Research and Teaching	30.09.2006

Work experience

Company/Institution	Name of the department	Position	Main responsibilities	Start Date	End Date
Iv. Javakhishvili Tbilisi State University	Faculty of Biology, Department of Biochemistry and Biotechnology	Head of Laboratory and Professor	Teaching and Research	02.01.2000	02.01.2006
I.Beritashvili Institute of Physiology	Biochemistry	Major Scientific Fellow	Scientific Research	01.01.1997	17.12.2010
I.Beritashvili Institute of Physiology	Biochemistry	Leader Scientific Fellow	Scientific Research	01.01.1993	01.01.1997
I.Beritashvili Institute of Physiology	Biochemistry	Senior Scientific Fellow	Scientific Research	01.01.1986	31.12.1992
I.Beritashvili Institute of Physiology	Biochemistry	junior scientific fellow	Research	01.01.1982	31.12.1986

Scientific Productivity**Article / Monograph / Manual**

Type	Authors	Publication title	Source title	Year
Article	Oganezovi N, Lagani V., Kikvidze M., Gamkrelidze G., Tsverava L., Lepsveridze E., Kelly K.M., Solomonia R	Long-term effects of myo-inositol on traumatic brain injury: epigenomic and transcriptomic studies. IBRO Neuroscience Reports, 30;16:291-299. doi: 10.1016/j.ibneur.2024.01.009.	IBRO Neuroscience Reports, 30;16:291-299. doi: 10.1016/j.ibneur.2024.01.009.	2024
Article	Chitadze, L., Meparishvili, M., Lagani, V., Khuchua, Z., McCabe B.J Solomonia R.	Src-NADH dehydrogenase subunit 2 complex and recognition memory of imprinting in domestic chicks	PLoS One . 2024 Jan 29;19(1):e0297166. doi: 10.1371/journal.pone.0297166. eCollection 2024	2024

Type	Authors	Publication title	Source title	Year
Article	Chitadze L., Tevdoradze E., Kiguradze T., McCabe B.J. Solomonia R.	Filial imprinting in domestic chicks; cytoplasmic polyadenylation element binding protein 3, predispositions and learning	Neuroreport, 34(3):144-149	2023
Article	. Kandashvili M, Gamkrelidze G, Tsverava L, Lordkipanidze T, Lepsveridze E, Lagani V, Burjanadze M, Dashniani M, Kokaia M, Solomonia R	Myo-Inositol Limits Kainic Acid-Induced Epileptogenesis in Rats.	.Int J Mol Sci., 23(3):1198. doi: 10.3390/ijms23031198	2022
Article	Burjanadze M.A., Dashniani, M.G., Solomonia, R.O., Beselia, G.V., Tsverava, L., Lagani, V., Chkhikvishvili, N.C., Naneishvili, T.L., Kruashvili, L.B., Chighladze M.R	Age-related changes in medial septal cholinergic and GABAergic projection neurons and hippocampal neurotransmitter receptors: relationship with memory impairment.		2022
Article	Tsverava L., Chitadze N., Chanturia G., Kekelidze M., Dzneladze D., Imnadze P., Gamkrelidze A., Lagani V., Khuchua Z., Solomonia R.	Antibody profiling reveals gender differences in response to SARS-COVID-2 infection	ეიბს ალერჯი ენდ იმუნოლოგი	2022
Article	Beselia G.V. Chkhikvishvili N.C. Burjanadze M.A. Solomonia R.O., Meparishvili M., Nozadze B., Asanidze S., Nemsitsveridze A., Dashniani M.G	Modulation of prefrontal cortex function by basal forebrain cholinergic and GABAergic neurons at the behavioral and molecular level.	Neuroreport.	2021
Article	Meparishvili M, Chitadze L, Lagani V, McCabe B and Solomonia R	Src and Memory: A Study of Filial Imprinting and Predispositions in the Domestic Chick.	Frontiers in Physiology	2021
Article	.Golubiani G, Lagani V, Solomonia R, Müller M	Metabolomic Fingerprint of MeCP2-Deficient Mouse Cortex: Evidence for a Pronounced Multi-Faceted Metabolic Component in Rett Syndrome.	Cells	2021
Article	Davitashvili E, Burjanadze G, Koshordze M, Koshordze N, Tseretsvadze T, Mitskevich N, Tsintsadze O, Karazanashvili G, Solomonia R	Galactose specific lectins from prostate tissue with different pathologies: biochemical and cellular studies.	Molecular Biology Reports	2021
Article	Chitadze L, Margvelani G, Meparishvili M, Tsverava L, Mikautadze E, Kikvidze M, Lagani V, McCabe BJ, Solomonia R.	Chicken cognin interactome and the memory of filial imprinting	Neuroreport.	2020
Article	Dashniani MG, Chighladze MR, Solomonia RO, Burjanadze MA, Kandashvili M, Chkhikvishvili NC, Beselia GV, Kruashvili LB.	Memantine treatment prevents okadaic acid induced neurotoxicity at the systemic and molecular levels	Neuroreport.	2020
Article	Dashniani MG, Burjanadze MA, Chkhikvishvili NC, Solomonia RO, Kandashvili M, Naneishvili TL, Beselia GV, Kruashvili LB, Chighladze MR	Modulation of spatial memory and expression of hippocampal neurotransmitter receptors by selective lesion of medial septal cholinergic and GABAergic neurons.	Experimental Brain Research	2020

Type	Authors	Publication title	Source title	Year
Article	Adebayo OL, Dewenter I, Rinne L, Golubiani G, Solomonia R, Müller M.	Intensified mitochondrial hydrogen peroxide release occurs in all brain regions, affects male as well as female Rett mice, and constitutes a life-long burden.	Archives of Biochemistry and Biophysics	2020
Article	Gamkrelidze GN, Nanobashvili ZI, Bilanishvili IG, Lordkipanidze T, Kandashvili M, Kokaia M, Solomonia RO	Concentration and time-dependent effects of myo-inositol on evoked epileptic afterdischarge in the hippocampus <i>in vivo</i>	Neuroreport.	2019
Article	Tsverava L., Kandashvili M., Margvelani G., Lortkipanidze T., Gamkrelidze G., Lepsveridze E., Kokaia M. Solomonia R	Long-Term Effects of Myoinositol on Behavioural Seizures and Biochemical Changes Evoked by Kainic Acid Induced Epileptogenesis.	BioMed Research International	2019
Article	Margvelani, G. Meparishvili M, Tevdoradze E McCabe BJ, Solomonia R.	Mitochondrial fusion and fission proteins and the recognition memory of imprinting in domestic chicks.	Neuroreport, 2018, 29,128-133.	2018
Article	Margvelani G, Meparishvili M, Kiguradze T, McCabe BJ, Solomonia R.	Micro-RNAs, their target proteins, predispositions and the memory of filial imprinting	Scientific Reports	2018
Article	Chlikadze N, Solomonia R, Shukakidze A, Arabuli M, Mitagvaria N	Some physiological processes in ischemic penumbra of the brain.	Georgian Medical News	2018
Article	Tsverava L., Lordkipanidze T. Lepsveridze E., Nozadze M. Kikvidze M. Solomonia R	Myoinositol Attenuates the Cell Loss and Biochemical Changes Induced by Kainic Acid Status Epilepticus,	BioMed Research International, vol. 2016, Article ID 2794096, 2016. doi:10.1155/2016/2794096.	2016
Article	Solomonia R. and McCabe B.J. .	Molecular mechanisms of memory in imprinting	Neuroscience Biobehavioural Reviews, 2015, 50, 56-69.	2015
Article	Nozadze M, Zhgenti E, Meparishvili M, Tsverava L, Kiguradze T, Chanturia G, Babuadze G, Kekelidze M, Bakanidze L, Shutkova T, Imnadze P, Francesconi SC, Obiso R and Solomonia R	Comparative proteomic studies of Yersinia pestis strains isolated from natural foci in the Republic of Georgia.	Front. Public Health 3:239. doi: 10.3389/fpubh.2015.00239	2015
Article	Meparishvili M, Nozadze M, Margvelani G, McCabe BJ and Solomonia RO	A Proteomic Study of Memory After Imprinting in the Domestic Chick.	Front. Behav. Neurosci, 2015 . 9:319. doi: 10.3389/fnbeh.2015.00319	2015
Article	Solomonia, R., Gogichaishvili, N., Nozadze M., Lepsveridze E., Dzneladze D., Kiguradze T.	Myo-Inositol Treatment and GABA-A Receptor Subunit Change After Kainate-Induced Status Epilepticus.	Cellular and Molecular Neurobiology, 2013, 33, 119-127	2013
Article	Solomonia RO, Meparishvili M, Mikautadze E, Kunelauri N, Apkhazava D, McCabe BJ.	AMPA receptor phosphorylation and recognition memory: learning-related, time-dependent changes in the chick brain following filial imprinting.	Exp Brain Res. (2013) 226(2):297-308	2013
Article	Kotaria N, Kiladze M, Zhvania MG, Japaridze NJ, Bikashvili T, Solomonia RO, Bolkvadze T.	The protective effect of Myo-Inositol on hippocampal cell loss and structural alterations in neurons and synapses triggered by kainic acid-induced status epilepticus.	Cell Mol Neurobiol. 2013 33(5):659-71	2013
Chapter in book	Solomonia, R., Lepsveridze, E., Kiguradze, T. And Nozadze, M. (2013)	Inositol and Epilepsy	In "Inositol: Synthesis, Functions and Clinical Implications" Eds: H.Rocha and M.Cardoso. NOVA Publishers,pp.105-128, . (https://www.novapublishers.com/catalog/product_info.php?products_id=39509)	2013

Type	Authors	Publication title	Source title	Year
Article	Azmaiparashvili E, Berishvili E, Kakabadze Z, Pilishvili O, Mikautadze E, Solomonia R, Jangavadze M, Kordzaia D.	Ductular reaction at the early terms of common bile duct ligation in the rats.	Acta Biol Hung, 63,321-332	2012
Article	Solomonia R., Mikautadze E., Nozadze M., Kuchiashvili N., Lepsveridze E., Kiguradze T.	Myo-Inositol Treatment Prevents Biochemical Changes Triggered by Kainate-Induced Status Epilepticus".	Neuroscience Letter 468 (2010): 277-281	2011
Article	Nozadze M., Mikautadze E., Lepsveridze E., Mikeladze E., Kuchiashvili N., Kiguradze T., Kikvidze M., &Solomonia R.	Anticonvulsant Activities of myo-Inositol and scyllo-Inositol on Pentylenetetrazol Induced Seizures".	Seizure:European Journal of Epilepsy 20 (2011): 173-176	2011
Article	Kharlamov EA., Lepsveridze E., Meparishvili M., Solomonia RO., Lu B., Miller ER, Kelly KM., Mtchedlishvili Z	Alterations of GABA(A) and Glutamate Receptor Subunits and Heat Shock Protein in Rat Hippocampus Following Traumatic Brain Injury and in Posttraumatic Epilepsy".	Epilepsy Research. 95(2011):20-34	2011
Article	Solomonia RO., Kunelauri N., Mikautadze E., Apkhazava D., McCabe BJ., Horn G.	Mitochondrial Proteins, learning and Memory:Biochemical Specialization of a Memory System"	Neuroscience 2011 194,112-123	2011
Article	Davitashvili E., Kvitsinadze N., Megrelishvili I., Karazanashvili G., Solomonia R., Aleksidze N.	Influence of Beta-Galactose-Specific Mitochondrial Lectins From Prostate Hyperplastic Tissue on Mitochondrial Properties	"The Scandinavian Journal of Clinical & Laboratory Investigation70, (2010): 33-39	2010
Article	Solomonia R., Apkhazava D., Nozadze M., Jackson A.P., McCabe B.J., Horn G.	Different Forms of MARCKS Protein Are Involved in MemoryFormation in the Learning Process of Imprinting"	Exp Brain Res.188(2008): 323–330	2008
Article	Zhvania M.G., Bolqvadze T., Solomonia R.O., Kuchiashvili N, Japaridze N.J.	Effect of Acoustic Stimulation on GABAergic Neurons in Limbic Structures of Krushinskii-Molodkina Rats"	Bull ExpBiol Med. 145 (2008):398-400	2008
Article	Solomonia R.,NozadzeM., KuchiashviliN., BolkvadzeT., KiladzeM., ZhvaniaM., Kiguradze T., V. Pkhakadze.	Study of Effects of myo-Inositol on Pentylenetetrazol and Kainic Acid Induced Convulsions in Rats	Bulletin of Experimental Biology and Medicine 143 (2007): 58-60.	2007
Article	Koshoridze N., Menabde K., Surguladze N., Vardiashvili T., Solomoniia R., Aleksidze N.	The Influence of Endogenous Lectins on the Activity of the HCO3- ATP-ase of the Brain"	Ukrainian Biochemical Journal 79 (2007): 13-18	2007
Article	Zhvaniia M.G., Solomoniia R.O., Bikashvili T.Z., Kotariia N.T., ChkhikvishviliTs.G, Kiladze M.T., Nozadze M.B., Dzhaparidze N.D.	The Influence of myo-inositol on the Ultrastructure of Hippocampal CA1 Area in Kainate Treated Rats	Tsitologiia.49, no.11 (2007): 939-43	2007
Article	Solomonia R., Kotorashvili A.,Kiguradze T., McCabe B.J., Horn G.	Ca2+/calmodulin Protein Kinase II and Memory: Learning-Related Changes in a Localized Region of the Domestic Chick Brain".	J Physiol.569, (2005): 643–653	2005
Article	Zhvaniya M.G., Bolkvadze T.A., Dzhaparidze N.D., Solomoniya R.O., Kuchiashvili N	Effect of Kindling on GABAergic Neurons of the Hippocampus and Pyriform Cortex".	Bulletin of Experimental Biology and Medicine 140 (2005): 57-59	2005
Article	Bolokadze N., Lobjanidze N., Momtselidze N., Solomonia R., Shakarishvili R., Mchedlishvili G	"Blood Rheological Properties and Lipid Peroxidation in Cerebral and Systematic Circulation of Neurocritical Patients	Clinical Hemorheology and Microcirculation 30, no. 2 (2004): 99-105	2004

Type	Authors	Publication title	Source title	Year
Article	Bolokadze N., Varasahvili M., Salia N., Momtselidze N., Solomonia R., Mchedlishvili G	Lipid Peroxidation in the Erythrocytes Under Condition of Their Increased Aggregation”	Clin Hemorheol Microcirc. 30, . 3-4 (2004): 453-455.	2004
Article	Solomonia R., Kuchiashvili N., Berulava A., Pkhakadze V., Trapaidze N., Zhvania M., Abesadze I., Kojima H., Dalakishvili N	Purification and Identification of Components of the Aquilegia Vulgaris Extract Fraction Exhibiting Anti-Epileptic Activity	Journal of Biological Physics and Chemistry 4, (2004): 185-192.	2004
Article	Solomonia R. Morgan K., Kotorashvili A., McCabe B.J., Jackson A.P., Horn G.	Analysis of Differential Gene Expression Supports a Role for Amyloid Precursor Protein and a Protein Kinase C Substrate (MARKCS) in Long-term Memory	Eur. J. Neurosci. 17 (2003): 1073-1081	2003
Article	Mikeladze E., Schulte A., Mosbach A., Blochl E., Csoregi E., Solomonia R., Schuhmann W	Redox Hydrogel-Based Bienzyme Microelectrode for Amperometric Monitoring of L-glutamate	Electroanalysis 14 (2002): 393-399.	2002
Article	Solomonia R.O., Kiguradze T. McCabe B.J., Horn G.	“Neural Cell Adhesion Molecules, Calcium/Calmodulin-Dependent Protein Kinase II and Long- term Memory in Domestic Chicks”	Neuroreport 14 no. 11 (2000): 31139-3143	2000
Article	Solomonia R.O., McCabe B.J. and Horn G.	Neural Cell Adhesion Molecules, Learning and Memory in the Domestic Chicks”.	Behavioural Neurosciences 112 (1998): 646-655	1998
Article	Harvey R.J., McCabe B.J., Solomonia R.O., Horn G., Darlison M.G	Expression of the GABA _A Receptor g4-subunit Gene: Anatomical Distribution of the Corresponding mRNA in the Domestic Chick Forebrain and the Effect of Imprinting Training”.	Eur. Journal of Neuroscience 10 (1998): 3024-3028	1998
Article	Solomonia R.O., McCabe B.J., Jackson A.P., Horn G.	Clathrin Proteins and Recognition Memory”.	Neuroscience 80 (1997): 59-67	1997
Article	Van der Zee E.A., Bolhuis J.J., Solomonia R.O. , Horn G., Luiten P.G.M	“Differential Distribution of Protein Kinase C (PKC alpha-beta and PKC gamma) Isoenzyme Immunoreactivity in the Chick Brain	Brain Research 676, (1995): 41-52	1995
Article	Solomonia R.O., Machaidze G.G., Mikeladze D.G	On Some Biochemical Changes of the Chick Brain Membranes After Visual Imprinting”.	Biological Membranes (In Russian, USSR), 8, (1991): 1186-1187.	1991
Article	Maderspach K., Solomonia R.O	Glial and Neuronal Opioid Receptors: Apparent Positive Cooperativity Observed in Intact Cultured Cells	Brain Research 441 (1988): 41-47	1988
Article	Solomonia R.O. Mikeladze D.G	Synaptosomal Glycoprotein Synthesis in Chicken Brain After Imprinting	”. Neurochemistry (in Russian, USSR), 5, (1986): 293-297.	1986
Article	Solomoniya R.O., Nesterova M.V., Severin, E.S.	Study of Certain Physico-Chemical Properties of Cyclic – Nucleotide Independent Protein Kinase from the Myxomycete Physarum Polycephalum	Biochemistry (Russian), 47, (1982): 1552-1556	1982
Article	Solomoniya R.O., Nesterova M.V., Severin, E.S.	Cyclic Nucleotides in the Regulation of Cellular Division”	Advances in Biological Chemistry (In Russian, USSR), v XXII, (1982): 63-75	1982
Article	Solomoniya R.O., Nesterova M.V., Kostyuk D.G., Severin E.S.	Purification and Some Physico-chemical Properties of Cyclic-Nucleotide Independent Protein Kinase From the Myxomycete Physarum Polycephalum	Biochemistry International, v3, 149-155	1981

Scholarships and awards

Scholarships/awards name	Issuer	Year of Issue
Federation of European Biochemical Societies (FEBS) National Lecturer	FEBS	2017

Participation in scientific events

Scientific event name	Title of the presentation	Event venue	Year
28th Meeting of Turkish Biochemical Society	Molecular Mechanisms of recognition memory of imprinting - Plenary Lecture	Turkey, Erzerum	2017

Productivity index

#	Citation index	h-index
Google scholar	965.00	19.00