



## Achilleas Gravanis Professor of Pharmacology

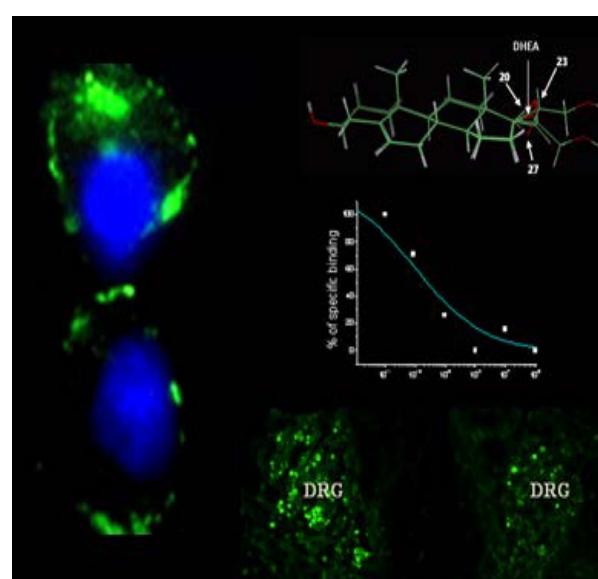
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### Professional History

- 2010: Collaborating Researcher, Foundation of Research & Technology Hellas (IESL-FORTH)
- 2002-2008: Director, Laboratory of Clinical Pharmacology, University Hospital of Heraklion
- 2001-: Professor of Pharmacology, Faculty of Medicine University of Crete
- 2000-2001: Chairman, Dept of Basic Sciences, Faculty of Medicine University of Crete
- 1995-1996: Chairman, Dept of Basic Sciences, Faculty of Medicine University of Crete
- 1991-2001: Associate Professor of Pharmacology, Faculty of Medicine University of Crete
- 1987-1991: Assistant Professor of Pharmacology, Faculty of Medicine University of Crete
- 1983-1986: Research Associate, Mount Sinai School of Medicine, New York, U.S.A
- 1980-1983: PhD in Pharmacology, University Pierre et Marie Curie, Paris, France
- 1976-1980: Diploma of Pharmacy, School of Pharmacy, University of Athens, Greece

### Research Interests

Brain hormonal micro-environment and neurotrophins during development and aging. Molecular mechanisms in neurodegeneration and neurogenesis: development of synthetic small molecules with neuroprotective and neurogenic properties. Bioengineering of 3D scaffolds for neuronal cell cultures: development of



neuroimplants and neurobiosensors.

### **Representative Publications**

1. Gravanis A, Calogeropoulou T, Panoutsakopoulou V, Thermos K, Neophytou C, Charalampopoulos I. Neurosteroids and Microneurotrophins Signal Through NGF Receptors to Induce Prosurvival Signaling in Neuronal Cells. *Sci Signal.* 2012 Oct 16;5(246):pt8. doi: 10.1126/scisignal.2003387.
2. Lazaridis I.\*, Charalampopoulos I\*, Alexaki VI, Avlonitis N, Pediaditakis I, Efstathopoulos P, Calogeropoulou T, Castanas E, Gravanis A. Neurosteroid Dehydroepiandrosterone interacts with Nerve Growth Factor (NGF) receptors, preventing neuronal apoptosis. *PloS Biol.* Vol 9(4), April 2011, (\*equal contributors)
3. Charalampopoulos I, Margioris A, Gravanis A. (2008). Neurosteroid dehydroepiandrosterone exerts anti-apoptotic effects by membrane-mediated, integrated genomic and non-genomic pro-survival signaling pathways. *J Neurochem,* 107:1457-1469
4. Toubouraki D, Christopoulos T, Ioannou P, Gravanis A. (2009) Visual Genotyping of Single Nucleotide Polymorphisms of Drug Metabolizing Enzymes by Tetra-Primer PCR Coupled with a Dry-Reagent Disposable Biosensor. *Pharmacogenomics,* 10:495-504
5. Toubouraki D, Christopoulos T, Ioannou P, Gravanis A. (2008) Dry-reagent disposable biosensor for visual genotyping of single nucleotide polymorphisms by oligonucleotide ligation: Application to pharmacogenetic analysis. *Hum Mut,* 29:1071-1078
6. Charalampopoulos I, Remboutsika E. Margioris A, Gravanis A. (2008) Neurosteroids as endogenous modulators of neurogenesis and neuronal survival. *Trends Endocrinol Metab* 19:300-307
7. Charalampopoulos I, Alexaki IV, Lasaridis I, Dermitzaki E, Avlonitis N, Tsatsanis C, Calogeropoulou T, Margioris A, Castanas E, Gravanis A. (2006). G-protein-associated membrane binding sites mediate the neuroprotective effect of Dehydroepiandrosterone. *FASEB J,* 20:577-579
8. Charalampopoulos I, Dermitzaki E, Vardouli L, Tsatsanis C, Stournaras C, Margioris A, Gravanis A. (2005) Dehydroepiandrosterone Sulfate and Allopregnanolone Directly Stimulate Catecholamine Production via Induction of Tyrosine Hydroxylase and Secretion by Affecting Actin Polymerization. *Endocrinology.* 146:3309-3318.

9. Charalampopoulos I, Tsatsanis C, Dermitzaki E, Alexaki I, Castanas E, Margioris AN, Gravanis A. (2004). Dehydroepiandrosterone and allopregnanolone protect sympathoadrenal cells against apoptosis, via Bcl-2 antiapoptotic proteins. Proc Natl Acad Sci USA, 101:8209-8214
10. Chatzaki E, Charalampopoulos I, Leontidis C, Mouzas I, Tsardi M, Tsatsanis C, Margioris A, Gravanis A. (2003). Urocortin (Ucn) expression in human gastric mucosa: relationship to inflammatory activity. J Clin Endocrinol Metab 88:478-483
11. Chatzaki E, Margioris A, Gravanis A. (2002). Expression and regulation of Corticotropin-Releasing Hormone Binding Protein (CRH-BP) in rat adrenal cells. J Neurochem, 80:81-90
12. Makrigiannakis A, Zoumakis E, Kalantaridou S, Coutifaris, Margioris A, C, K. Rice, #Gravanis A./ #Chrousos G . (2001). Corticotropin-releasing Hormone (CRH) Promotes Blastocyst Implantation and Early Maternal Tolerance. Nature Immunol, 2:1018-1024 (# share senior authorship)