

# Short CV - Manuel Gesto Rodríguez

#### **Degrees**

- PhD, University of Vigo, Spain (2008).
- MSc (Spanish DEA), University of Vigo, Spain (2004).

#### **Positions**

- Researcher, DTU Aqua, Technical University of Denmark (2015-present).
- Postdoc, University of Vigo, Spain (2011-2014).
- Postdoc, University of Waterloo, Canada (2011).
- Postdoc, University of Vigo, Spain (2010-2011).
- Postdoc, CIIMAR, University of Porto, Portugal (2008-2010).

#### Research area

Fish stress physiology and fish welfare, mainly regarding the physiological and neuroendocrine responses to different factors including both aquaculture (handling, poor water quality, stock density, etc.) and environmental (pollutants) stressors.

#### Distinctions and awards

- Graduate student scholarship, University of Vigo, Spain (2003-2004).
- PhD student scholarship, University of Vigo and Xunta de Galicia, Spain (2004-2007).
- Postdoctoral fellowship, Xunta de Galicia, Spain (2008-2009).
- Postdoctoral fellowship, Fundação para a Ciência e a Tecnologia, Portugal (2009-2010).

#### Review, 2011-present

Referee for several international journals: Journal of Neuroendocrinology, Physiology and Behavior, Aquatic Toxicology, Tissue and Cell, Comparative Biochemistry and Physiology Part C, Journal of Fish Biology, Fisheries Science and Fish Physiology and Biochemistry.

Peer reviewed publications: 29. Books and book chapters: 2. International conferences: 9.

## Educational tasks, 2011-present

Contributor to several courses in Spain: Animal Physiology (2005, 2011, 2012); Aquatic Animal Physiology (2006), Human Physiology (2013); Methods in Animal Physiology Research (2012). Responsible of DTU Course 25326 Fish Physiology in Aquaculture (2015-present).

### Grants, 2011-present

- EU Animal Health and Welfare (ANIHWA) ERA-Net: Welfare, health and individuality in farmed fish WIN-FISH (2015-2018, Coordinator, took over in 2015).
- Danish Ministry of Food, Agriculture and Fisheries: New possibilities for growth and robustness in organic aquaculture (ROBUSTFISH) (2014-2017, PI, took over in 2015).

### Research collaboration with stakeholders, 2011-present

ROBUSTFISH project referred to above involves stakeholder participation (Danish Aquaculture Association, organic fish farmers, Aller Aqua, Danforel).

### Five selected publications

Gesto M, Álvarez R, Conde-Sieira M, Otero-Rodiño C, Usandizaga S, Soengas JL, Míguez JM, López-Patiño MA. (2016). A simple melatonin treatment protocol attenuates the response to acute stress in the sole *Solea senegalensis*. Aquaculture, 452, 272-282. 10.1016/j.aquaculture.2015.11.006.

Gesto M, Hernández J, López-Patiño MA, Soengas JL, Míguez JM. (2015). Is gill cortisol concentration a good acute stress indicator in fish? A study in rainbow trout and zebrafish. Comparative Biochemistry and Physiology A, 168, 65-69. 10.1016/j.cbpa.2015.06.020.

Gesto M, López-Patiño MA, Hernández J, Soengas JL, Míguez JM. (2015). Gradation of the stress response in rainbow trout exposed to stressors of different severity: the role of brain serotonergic and dopaminergic systems. Journal of Neuroendocrinology, 27, 131-141. 10.1111/jne.12248.

Gesto M, Soengas JL, Rodríguez-Illamola A, Míguez JM. (2014). Arginine vasotocin treatment induces a stress response and exerts a potent anorexigenic effect in rainbow trout, *Oncorhynchus mykiss*. Journal of Neuroendocrinology, 26, 89-99. 10.1111/jne.12126.

Gesto M, López-Patiño MA, Hernández J, Soengas JL, Míguez JM. (2013). The response of brain serotonergic and dopaminergic systems to an acute stressor in rainbow trout: a time-course study. Journal of Experimental Biology, 216, 4435-4442. 10.1242/jeb.091751.