

Table S1. Concentrations of Na⁺ and Cl⁻ in killifish plasma, freshwater and seawater, and associated activity coefficients used in simulations with the Nernst and Goldman-Hodgkin-Katz (GHK) equations

	Plasma	Freshwater	Seawater
[Na ⁺] (mmol l ⁻¹) ¹	140	1.06	485
Na ⁺ activity coefficient ²	0.760	1.000	0.683
[Cl ⁻] (mmol l ⁻¹) ¹	130	1.21	569
[Cl ⁻] activity coefficient ²	0.764	1.000	0.678

¹Scott et al. (2006); Scott et al. (2008).

²Robinson and Stokes (1959); Potts and Hedges (1991).