

CURRICULUM VITAE

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Postes: 09-2009 – present: Researcher (CR1) IRD – UMR 7618 BIOEMCO, posted in Hanoi.

07/2007-09/2009 : Researcher (CR1) IRD – Montpellier, UMR 5119 ECOLAG.

06/2003-07/2007 : Researcher (CR2) IRD, Nouméa, Nouvelle-Calédonie.

01/2002-05/2003 : Postdoctoral researcher (EU project «EUROTROPH) with J-P Gattuso, LOV, UMR 7093, Villefranche sur Mer.

01/2000-01/2002 – Postdoctoral researcher (Poste Rouge CNRS) with J-P Gattuso, LOV, UMR 7093, Villefranche sur Mer.

Degree: Ph.D. (2000) Marine, Estuarine and Environmental Science Program, University of Maryland, College Park, Maryland, USA. **Title:** Biological production of colored dissolved organic matter.

HDR (2012). University of Paris VI. **Title:** Biological sources and sinks of dissolved organic matter.

Qualified (2013) for the grade of “Professeur des Universités”, section 67.

Research themes

The central theme of my research is the study of the interactions between heterotrophic bacteria and colored (CDOM) and non-colored dissolved organic matter (DOM). I also look at how anthropogenic inputs such as increasing inorganic and organic waste alters the transfer of carbon between autotrophic and heterotrophic compartments in aquatic systems. I have experience of working with a wide range of techniques (cultures, mesocosms, *in situ*) and in a wide range of situations (on ship, in the field, in the laboratory) and countries (Vietnam, Laos, New Caledonia, Fiji, USA, and across Europe). In recent years my work has focussed on the impact of organic and inorganic contamination on bacterial and phytoplankton diversity and activity and how these contaminants induce shifts in the trophic status of tropical waters. I also am interested in how agricultural practices impact tropical freshwater ecosystems and how environmental pathogens disseminate and proliferate in aquatic ecosystems, notably in South East Asia.

Teaching, mentoring and capacity building

Direction and co-direction of Masters and PhD students.

Capacity building and technical courses for scientists from developing countries.

Development and teaching of courses on introductory aquatic ecology (USTH, Hanoi), limnological processes (Paris VI) and aquatic microbial ecology (University of the South Pacific, Suva, Fidji)

Participation in Masters and Thesis defence committees.

Publications: H-index = 16. Total: 36 articles, 2 book chapters.

Aquatic Microbial Ecology, Biogeosciences, Biogeochemistry, Deep Sea Research II, Ecological Applications, Estuaries, Estuarine and Coastal Shelf Science, Ecological Modelling, FEMS Microbiology Ecology, FEMS Microbiology Letters, Global Biogeochemical Cycles, International Journal of Remote Sensing, Journal of Plankton Research, Journal of Applied Phycology, Limnology and Oceanography, Limnology and Oceanography Methods, Marine Chemistry, Marine Ecology Progress Series, Marine Pollution Bulletin, Microbial Ecology, Nature and 2 chapters in “Managing European Coasts: Past, Present and Future. Eds. J. Vermaat, L. Bouwer, K. Turner and W. Salomons. Springer, Amsterdam.

Reviewer for scientific journals >100 since 2003

Limnology & Oceanography, Marine Chemistry, Marine Ecology Progress Series, Estuaries/Estuaries and Coasts, Aquatic Sciences, Aquatic Microbial Ecology, FEMS Microbiology Ecology, Microbial Ecology, Progress in Oceanography, Hydrobiologia, Global Change Biology, Biogeosciences, Journal of Environmental

Management, Deep Sea Research 1 et 2, Hydrobiologia, Ocean Dynamics, Knowledge and Management of Aquatic Ecosystems, Marine Pollution Bulletin, Oceanologia, Nature Scientific Reports, Environmental Science and Pollution Research, Continental Shelf Research, Journal of Geophysical Research – Biogeosciences, Environmental Monitoring and Assessment, Chinese Journal of Oceanography, Tropical Ecology. Book reviews (Marine biogeochemistry of marine dissolved organic matter, Eds: Hansell and Carlson; Aquatic Ecosystems: Interactivity of dissolved organic matter » Eds. Findlay and Sinsabaugh). Book Chapter (Chromophoric DOM in the Open Ocean. Norman B Nelson and David A Siegel. in Marine Biogeochemistry of Marine Dissolved Organic Matter)

Associate editor for “Tropical Ecology” (www.tropecol.com), an international journal that provides a publication opportunity for researchers in developing countries in the tropical belt.

Evaluation of international and national research programs

Research projects: Region Languedoc-Roussillon, NSF (USA), NOAA (USA), ANR, EC2CO, NWO/VIDI (Pays Bas), IFREMER, BBSRC (UK), UNESCO/Prix L’Oréal France Women and Science, IFS/IRD Workshop, Thesis grant selection committee, French Embassy Hanoi (2012, 2013),

Expertise: Evaluation of a series of indicators for the “Foundation pour la recherche sur la biodiversité (FRB; Nov. 2012).

Administration

Member of the scientific commission (CSS3) of the IRD (2007-2011) and representative for the CR class to the Permanent Delegation for the CSS3.

Member of the Direction Committee for the IEES-Paris

Animator of the transversal theme “Risks in Southern Countries” of the IEES-Paris

Memberships of professional societies

Ecological society of America (ESA).

British Ecological Society (BES)

Some Recent Publications (H-index = 16)

Duong TT, Le TPQ, Dao T-S, Pflugmacher S, Rochelle-Newall E, Hoang T, Vu TN, Ho CT, Dang DK Seasonal variation of cyanobacteria and microcystins in the Nui Coc Reservoir, Northern Vietnam (2012). Journal of Applied Phycology. 10.1007/s10811-012-9919-9.

Navarro P, Amouroux D, Thanh ND, Rochelle-Newall E, Ouillon S, Arfi R, Van TC, Mari X, Torrétón J-P (2012) Fate and tidal transport of butyltin and mercury compounds in the waters of the tropical Bach Dang Estuary (Haiphong, Vietnam). Marine Pollution Bulletin, 64:1789-1798.

Rochelle-Newall EJ, Chu VT, Pringault O, Amouroux D, Arfi R, Bettarel Y, Bouvier T, Bouvier C, Got P, Nguyen TMH, Mari X, Navarro P, Duong TN, Cao TTT, Pham TT, Ouillon S, Torrétón JP (2011) Phytoplankton diversity and productivity in a highly turbid, tropical coastal system (Bach Dang Estuary, Vietnam). Marine Pollution Bulletin 62:2317–2329

Rochelle-Newall EJ, Delesalle B, Mari X, Rouchon C, Torreton JP, Pringault O (2008) Zinc induces shifts in microbial carbon flux in tropical coastal environments. Aquatic Microbial Ecology 52:57-68*

Trinh DA, Meysman F, Rochelle-Newall E, Bonnet M-P (2012) Quantification of sediment water interactions in a polluted tropical river through biogeochemical modeling. Global Biogeochemical Cycles, GBC, 26: 3010