

Frank A P C Gobas

List of Publications by Year in descending order

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109
papers

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71004

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109
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#	ARTICLE	IF	CITATIONS
1	A food web bioaccumulation model for the accumulation of per- and polyfluoroalkyl substances (PFAS) in fish: how important is renal elimination?. <i>Environmental Sciences: Processes and Impacts</i> , 2022, 24, 1152-1164.	1.7	11
2	Treatment of naphthenic acids in oil sands process-affected waters with a surface flow treatment wetland: mass removal, half-life, and toxicity-reduction. <i>Environmental Research</i> , 2022, 213, 113755.	3.7	8
3	Normalizing the Biomagnification Factor. <i>Environmental Toxicology and Chemistry</i> , 2021, 40, 1204-1211.	2.2	8
4	Strategic resources for assessing PFAS ecological risks at AFFF sites. <i>Integrated Environmental Assessment and Management</i> , 2021, 17, 746-752.	1.6	10
5	Deconvoluting Thermodynamics from Biology in the Aquatic Food Web Model. <i>Environmental Toxicology and Chemistry</i> , 2021, 40, 2145-2155.	2.2	5
6	Fugacity-Based Trophic Magnification Factors Characterize Bioaccumulation of Cyclic Methyl Siloxanes within an Urban Terrestrial Avian Food Web: Importance of Organism Body Temperature and Composition. <i>Environmental Science & Technology</i> , 2021, 55, 13932-13941.	4.6	11
7	Bioaccumulation of dodecamethylcyclohexasiloxane (D6) in fish. <i>Chemosphere</i> , 2021, 281, 130948.	4.2	8
8	A Toxicokinetic Framework and Analysis Tool for Interpreting Organisation for Economic Co-operation and Development Guideline 305 Dietary Bioaccumulation Tests. <i>Environmental Toxicology and Chemistry</i> , 2020, 39, 171-188.	2.2	21
9	Dietary Bioaccumulation and Biotransformation of Hydrophobic Organic Sunscreen Agents in Rainbow Trout. <i>Environmental Toxicology and Chemistry</i> , 2020, 39, 574-586.	2.2	13
10	Hepatic Clearance Binding Terms of Hydrophobic Organic Chemicals in Rainbow Trout: Application of a Streamlined Sorbent-Phase Dosing Method. <i>Environmental Science and Technology Letters</i> , 2020, 7, 672-676.	3.9	10
11	Treatment of Polycyclic Aromatic Hydrocarbons in Oil Sands Process-Affected Water with a Surface Flow Treatment Wetland. <i>Environments - MDPI</i> , 2020, 7, 64.	1.5	9
12	In vitro-in vivo extrapolation of hepatic and gastrointestinal biotransformation rates of hydrophobic chemicals in rainbow trout. <i>Aquatic Toxicology</i> , 2020, 228, 105629.	1.9	11
13	Trophic magnification of legacy persistent organic pollutants in an urban terrestrial food web. <i>Science of the Total Environment</i> , 2020, 714, 136746.	3.9	37
14	Concentration dependence of in vitro biotransformation rates of hydrophobic organic sunscreen agents in rainbow trout S9 fractions: Implications for bioaccumulation assessment. <i>Environmental Toxicology and Chemistry</i> , 2019, 38, 548-560.	2.2	29
15	Growth-Correcting the Bioconcentration Factor and Biomagnification Factor in Bioaccumulation Assessments. <i>Environmental Toxicology and Chemistry</i> , 2019, 38, 2065-2072.	2.2	13
16	Response to Comment on: "Estimating the Bioconcentration Factors of Hydrophobic Organic Chemicals from Biotransformation Rates Using Rainbow Trout Hepatocytes". <i>Archives of Environmental Contamination and Toxicology</i> , 2019, 76, 154-156.	2.1	0
17	Development and evaluation of a mechanistic model to assess the fate and removal efficiency of hydrophobic organic contaminants in horizontal subsurface flow treatment wetlands. <i>Water Research</i> , 2019, 151, 183-192.	5.3	17
18	Estimating the Bioconcentration Factors of Hydrophobic Organic Compounds from Biotransformation Rates Using Rainbow Trout Hepatocytes. <i>Archives of Environmental Contamination and Toxicology</i> , 2018, 75, 295-305.	2.1	13

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19	AGRO-2014: A time dependent model for assessing the fate and food-web bioaccumulation of organic pesticides in farm ponds: Model testing and performance analysis. <i>Science of the Total Environment</i> , 2018, 639, 1324-1333.	3.9	13
20	A chemical activity approach to exposure and risk assessment of chemicals. <i>Environmental Toxicology and Chemistry</i> , 2018, 37, 1235-1251.	2.2	40
21	In vitro to in vivo extrapolation of biotransformation rates for assessing bioaccumulation of hydrophobic organic chemicals in mammals. <i>Environmental Toxicology and Chemistry</i> , 2017, 36, 1934-1946.	2.2	17
22	Chemical activity ⁴¹ -based environmental risk analysis of the plasticizer di ⁴² -ethylhexyl phthalate and its main metabolite mono ⁴³ -ethylhexyl phthalate. <i>Environmental Toxicology and Chemistry</i> , 2017, 36, 1483-1492.	2.2	19
23	Deriving bioconcentration factors and somatic biotransformation rates from dietary bioaccumulation and depuration tests. <i>Environmental Toxicology and Chemistry</i> , 2016, 35, 2968-2976.	2.2	13
24	Review of existing terrestrial bioaccumulation models and terrestrial bioaccumulation modeling needs for organic chemicals. <i>Integrated Environmental Assessment and Management</i> , 2016, 12, 123-134.	1.6	50
25	In Vivo Biotransformation Rates of Organic Chemicals in Fish: Relationship with Bioconcentration and Biomagnification Factors. <i>Environmental Science & Technology</i> , 2016, 50, 13299-13308.	4.6	32
26	Evaluating the roles of biotransformation, spatial concentration differences, organism home range, and field sampling design on trophic magnification factors. <i>Science of the Total Environment</i> , 2016, 551-552, 438-451.	3.9	43
27	Food Web Bioaccumulation Model for Resident Killer Whales from the Northeastern Pacific Ocean as a Tool for the Derivation of PBDE-Sediment Quality Guidelines. <i>Archives of Environmental Contamination and Toxicology</i> , 2016, 70, 155-168.	2.1	26
28	Characterization of ecological risks from environmental releases of decamethylcyclopentasiloxane (D5). <i>Environmental Toxicology and Chemistry</i> , 2015, 34, 2715-2722.	2.2	21
29	Bioaccumulation of decamethylpentacyclosiloxane (D5): A review. <i>Environmental Toxicology and Chemistry</i> , 2015, 34, 2703-2714.	2.2	29
30	Fugacity and activity analysis of the bioaccumulation and environmental risks of decamethylcyclopentasiloxane (D5). <i>Environmental Toxicology and Chemistry</i> , 2015, 34, 2723-2731.	2.2	32
31	Somatic and gastrointestinal in vivo biotransformation rates of hydrophobic chemicals in fish. <i>Environmental Toxicology and Chemistry</i> , 2015, 34, 2282-2294.	2.2	27
32	Concentration dependence of biotransformation in fish liver S9: Optimizing substrate concentrations to estimate hepatic clearance for bioaccumulation assessment. <i>Environmental Toxicology and Chemistry</i> , 2015, 34, 2782-2790.	2.2	23
33	Comment on "Unexpected Occurrence of Volatile Dimethylsiloxanes in Antarctic Soils, Vegetation, Phytoplankton, and Krill". <i>Environmental Science & Technology</i> , 2015, 49, 7507-7509.	4.6	11
34	Toward ecosystem ⁴⁴ -based sediment quality guidelines for polychlorinated biphenyls (PCBs). <i>Integrated Environmental Assessment and Management</i> , 2015, 11, 689-700.	1.6	8
35	Passive sampling methods for contaminated sediments: Practical guidance for selection, calibration, and implementation. <i>Integrated Environmental Assessment and Management</i> , 2014, 10, 210-223.	1.6	122
36	In vitro biotransformation rates in fish liver S9: Effect of dosing techniques. <i>Environmental Toxicology and Chemistry</i> , 2014, 33, 1885-1893.	2.2	25

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37	Organic Contaminants and Fish. <i>Fish Physiology</i> , 2013, 33, 1-52.	0.2	21
38	Biodegradation of <i>N</i> -Ethyl Perfluorooctane Sulfonamido Ethanol (EtFOSE) and EtFOSE-Based Phosphate Diester (SAMPAP Diester) in Marine Sediments. <i>Environmental Science & Technology</i> , 2013, 47, 1381-1389.	4.6	120
39	Mathematical relationships between metrics of chemical bioaccumulation in fish. <i>Environmental Toxicology and Chemistry</i> , 2013, 32, 1459-1466.	2.2	57
40	Habitat-Based PCB Environmental Quality Criteria for the Protection of Endangered Killer Whales (<i>Orcinus orca</i>). <i>Environmental Science & Technology</i> , 2012, 46, 12655-12663.	4.6	42
41	Measuring In Vitro Biotransformation Rates of Super Hydrophobic Chemicals in Rat Liver S9 Fractions Using Thin-Film Sorbent-Phase Dosing. <i>Environmental Science & Technology</i> , 2012, 46, 410-418.	4.6	21
42	Relationship between biodegradation and sorption of phthalate esters and their metabolites in natural sediments. <i>Environmental Toxicology and Chemistry</i> , 2012, 31, 1730-1737.	2.2	34
43	An interlaboratory comparison study for the determination of dialkyl phthalate esters in environmental and biological samples. <i>Environmental Toxicology and Chemistry</i> , 2012, 31, 1948-1956.	2.2	13
44	PBDE flame retardants and PCBs in migrating Steller sea lions (<i>Eumetopias jubatus</i>) in the Strait of Georgia, British Columbia, Canada. <i>Chemosphere</i> , 2012, 88, 855-864.	4.2	21
45	Use of trophic magnification factors and related measures to characterize bioaccumulation potential of chemicals. <i>Integrated Environmental Assessment and Management</i> , 2012, 8, 85-97.	1.6	87
46	Trophic magnification factors: Considerations of ecology, ecosystems, and study design. <i>Integrated Environmental Assessment and Management</i> , 2012, 8, 64-84.	1.6	365
47	DDT in endangered Galapagos sea lions (<i>Zalophus wollebaeki</i>). <i>Marine Pollution Bulletin</i> , 2011, 62, 660-671.	2.3	30
48	DDT Strikes Back: Galapagos Sea Lions Face Increasing Health Risks. <i>Ambio</i> , 2011, 40, 425-430.	2.8	19
49	Food web bioaccumulation model for polychlorinated biphenyls in San Francisco Bay, California, USA. <i>Environmental Toxicology and Chemistry</i> , 2010, 29, 1385-1395.	2.2	61
50	Response of a Macrotidal Estuary to Changes in Anthropogenic Mercury Loading between 1850 and 2000. <i>Environmental Science & Technology</i> , 2010, 44, 1698-1704.	4.6	63
51	Assessing exposure of sediment biota to organic contaminants by thin-film solid phase extraction. <i>Environmental Toxicology and Chemistry</i> , 2009, 28, 247-253.	2.2	33
52	POLYCHLORINATED BIPHENYLS AND POLYBROMINATED DIPHENYL ETHERS IN GALAPAGOS SEA LIONS (ZALOPHUS WOLLEBAEKI). <i>Environmental Toxicology and Chemistry</i> , 2009, 28, 2271.	2.2	29
53	Revisiting Bioaccumulation Criteria for POPs and PBT Assessments. <i>Integrated Environmental Assessment and Management</i> , 2009, 5, 624-637.	1.6	322
54	Introduction to Special Series: Science-Based Guidance and Framework for the Evaluation and Identification of PBTs and POPs. <i>Integrated Environmental Assessment and Management</i> , 2009, 5, 535.	1.6	20

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55	Perfluoroalkyl Contaminants in an Arctic Marine Food Web: Trophic Magnification and Wildlife Exposure. <i>Environmental Science & Technology</i> , 2009, 43, 4037-4043.	4.6	405
56	Ultra-Trace Determination of Phthalate Ester Metabolites in Seawater, Sediments, and Biota from an Urbanized Marine Inlet by LC/ESI-MS/MS. <i>Environmental Science & Technology</i> , 2009, 43, 6262-6268.	4.6	119
57	Response to Comment on "Perfluoroalkyl Contaminants in an Arctic Marine Food Web: Trophic Magnification and Wildlife Exposure", <i>Environmental Science & Technology</i> , 2009, 43, 6110-6111.	4.6	4
58	A fugacity approach for assessing the bioaccumulation of hydrophobic organic compounds from estuarine sediment. <i>Environmental Toxicology and Chemistry</i> , 2008, 27, 1047-1054.	2.2	21
59	Bioaccumulation behaviour of polybrominated diphenyl ethers (PBDEs) in a Canadian Arctic marine food web. <i>Science of the Total Environment</i> , 2008, 401, 60-72.	3.9	207
60	The uptake and metabolism of benzo[a]pyrene from a sample food substrate in an in vitro model of digestion. <i>Food and Chemical Toxicology</i> , 2008, 46, 610-618.	1.8	24
61	Biodegradation of mono-alkyl phthalate esters in natural sediments. <i>Chemosphere</i> , 2008, 71, 2011-2016.	4.2	32
62	Assessment of Human Health Risks of Consumption of Cadmium Contaminated Cultured Oysters. <i>Human and Ecological Risk Assessment (HERA)</i> , 2007, 13, 370-382.	1.7	31
63	Food Web-Specific Biomagnification of Persistent Organic Pollutants. <i>Science</i> , 2007, 317, 236-239.	6.0	823
64	BENZO[a]PYRENE BIOAVAILABILITY FROM PRISTINE SOIL AND CONTAMINATED SEDIMENT ASSESSED USING TWO IN VITRO MODELS. <i>Environmental Toxicology and Chemistry</i> , 2007, 26, 387.	2.2	30
65	CHARACTERIZATION OF POLYCYCLIC AROMATIC HYDROCARBON BIOAVAILABILITY IN ESTUARINE SEDIMENTS USING THIN-FILM EXTRACTION. <i>Environmental Toxicology and Chemistry</i> , 2007, 26, 829.	2.2	33
66	The sorptive capacity of animal protein. <i>Environmental Toxicology and Chemistry</i> , 2007, 26, 1803-1808.	2.2	121
67	A Terrestrial Food-Chain Bioaccumulation Model for POPs. <i>Environmental Science & Technology</i> , 2007, 41, 4019-4025.	4.6	98
68	A Bioenergetic Biomagnification Model for the Animal Kingdom. <i>Environmental Science & Technology</i> , 2006, 40, 1581-1587.	4.6	62
69	Sorption of Phthalate Esters and PCBs in a Marine Ecosystem. <i>Environmental Science & Technology</i> , 2006, 40, 3481-3488.	4.6	168
70	A review of bioconcentration factor (BCF) and bioaccumulation factor (BAF) assessments for organic chemicals in aquatic organisms. <i>Environmental Reviews</i> , 2006, 14, 257-297.	2.1	1,013
71	Modelling the diagenetic fate of persistent organic pollutants in organically enriched sediments. <i>Ecological Modelling</i> , 2004, 179, 405-416.	1.2	33
72	A FOOD WEB BIOACCUMULATION MODEL FOR ORGANIC CHEMICALS IN AQUATIC ECOSYSTEMS. <i>Environmental Toxicology and Chemistry</i> , 2004, 23, 2343.	2.2	437

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73	INTESTINAL ABSORPTION AND BIOMAGNIFICATION OF ORGANIC CONTAMINANTS IN FISH, WILDLIFE, AND HUMANS. <i>Environmental Toxicology and Chemistry</i> , 2004, 23, 2324.	2.2	193
74	Distribution of Phthalate Esters in a Marine Aquatic Food Web: A Comparison to Polychlorinated Biphenyls. <i>Environmental Science & Technology</i> , 2004, 38, 2011-2020.	4.6	201
75	Determination of polycyclic aromatic hydrocarbons in dungeness crabs (<i>Cancer magister</i>) near an aluminum smelter in Kitimat Arm, British Columbia, Canada. <i>Environmental Toxicology and Chemistry</i> , 2003, 22, 50-58.	2.2	24
76	Screening pyrene metabolites in the hemolymph of dungeness crabs (<i>Cancer magister</i>) with synchronous fluorescence spectrometry: Method development and application. <i>Environmental Toxicology and Chemistry</i> , 2003, 22, 59-66.	2.2	15
77	Determination of Phthalate Ester Congeners and Mixtures by LC/ESI-MS in Sediments and Biota of an Urbanized Marine Inlet. <i>Environmental Science & Technology</i> , 2003, 37, 2100-2108.	4.6	116
78	Sediment-Water Distribution of Organic Contaminants in Aquatic Ecosystems: The Role of Organic Carbon Mineralization. <i>Environmental Science & Technology</i> , 2003, 37, 735-741.	4.6	95
79	An Arctic Terrestrial Food-Chain Bioaccumulation Model for Persistent Organic Pollutants. <i>Environmental Science & Technology</i> , 2003, 37, 2966-2974.	4.6	118
80	Thin-Film Solid-Phase Extraction To Measure Fugacities of Organic Chemicals with Low Volatility in Biological Samples. <i>Environmental Science & Technology</i> , 2001, 35, 1425-1431.	4.6	111
81	Bioaccumulation of Persistent Organic Pollutants in Lichen-Caribou-Wolf Food Chains of Canada's Central and Western Arctic. <i>Environmental Science & Technology</i> , 2001, 35, 325-334.	4.6	151
82	Role of chemical and ecological factors in trophic transfer of organic chemicals in aquatic food webs. <i>Environmental Toxicology and Chemistry</i> , 1999, 18, 1250-1257.	2.2	99
83	An investigation of the application of the Canadian water quality guidelines. <i>Environmental Toxicology and Chemistry</i> , 1999, 18, 1323-1328.	2.2	7
84	Mechanism of Biomagnification in Fish under Laboratory and Field Conditions. <i>Environmental Science & Technology</i> , 1999, 33, 133-141.	4.6	263
85	Maternal Transfer and in Ovo Exposure of Organochlorines in Oviparous Organisms: A Model and Field Verification. <i>Environmental Science & Technology</i> , 1999, 33, 416-420.	4.6	173
86	Role of chemical and ecological factors in trophic transfer of organic chemicals in aquatic food webs. , 1999, 18, 1250.		6
87	Projected Changes to the Trophodynamics of PCBs in the Western Lake Erie Ecosystem Attributed to the Presence of Zebra Mussels (<i>Dreissena polymorpha</i>). <i>Environmental Science & Technology</i> , 1998, 32, 3862-3867.	4.6	41
88	Development and Field Validation of a Multimedia Exposure Assessment Model for Waste Load Allocation in Aquatic Ecosystems: Application to 2,3,7,8-Tetrachlorodibenzo-p-dioxin and 2,3,7,8-Tetrachlorodibenzofuran in the Fraser River Watershed. <i>Environmental Science & Technology</i> , 1998, 32, 2442-2449.	4.6	42
89	Development and Verification of a Benthic/Pelagic Food Web Bioaccumulation Model for PCB Congeners in Western Lake Erie. <i>Environmental Science & Technology</i> , 1997, 31, 3267-3273.	4.6	106
90	A pharmacokinetic analysis of interspecies extrapolation in dioxin risk assessment. <i>Chemosphere</i> , 1997, 35, 427-452.	4.2	21

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91	Development and Verification of a Bioaccumulation Model for Organic Contaminants in Benthic Invertebrates. <i>Environmental Science & Technology</i> , 1996, 30, 3377-3384.	4.6	129
92	Time Response of the Lake Ontario Ecosystem to Virtual Elimination of PCBs. <i>Environmental Science & Technology</i> , 1995, 29, 2038-2046.	4.6	73
93	A Rate Constant Model of Chemical Dynamics in a Lake Ecosystem: PCBs in Lake Ontario. <i>Journal of Great Lakes Research</i> , 1994, 20, 625-642.	0.8	55
94	Intestinal absorption and biomagnification of organochlorines. <i>Environmental Toxicology and Chemistry</i> , 1993, 12, 567-576.	2.2	149
95	Gastrointestinal magnification: the mechanism of biomagnification and food chain accumulation of organic chemicals. <i>Environmental Science & Technology</i> , 1993, 27, 2855-2863.	4.6	195
96	A model for predicting the bioaccumulation of hydrophobic organic chemicals in aquatic food-webs: application to Lake Ontario. <i>Ecological Modelling</i> , 1993, 69, 1-17.	1.2	297
97	Intestinal absorption and biomagnification of organochlorines. , 1993, 12, 567.		9
98	Measuring bioconcentration factors and rate constants of chemicals in aquatic organisms under conditions of variable water concentrations and short exposure time. <i>Chemosphere</i> , 1992, 25, 1961-1971.	4.2	41
99	Bioconcentration of chlorinated aromatic hydrocarbons in aquatic macrophytes. <i>Environmental Science & Technology</i> , 1991, 25, 924-929.	4.6	100
100	Model of organic chemical uptake and clearance by fish from food and water. <i>Environmental Science & Technology</i> , 1990, 24, 1203-1213.	4.6	161
101	Bioconcentration of polybrominated benzenes and biphenyls and related superhydrophobic chemicals in fish: Role of bioavailability and elimination into the feces. <i>Environmental Toxicology and Chemistry</i> , 1989, 8, 231-245.	2.2	142
102	Bioconcentration of polybrominated benzenes and biphenyls and related superhydrophobic chemicals in fish: Role of bioavailability and elimination into the feces. , 1989, 8, 231.		12
103	A Novel Method for Measuring Membrane-Water Partition Coefficients of Hydrophobic Organic Chemicals: Comparison with 1-Octanol's Water Partitioning. <i>Journal of Pharmaceutical Sciences</i> , 1988, 77, 265-272.	1.6	205
104	Dynamics of dietary bioaccumulation and faecal elimination of hydrophobic organic chemicals in fish. <i>Chemosphere</i> , 1988, 17, 943-962.	4.2	200
105	Lake Sediments as Historic Records of Atmospheric Contamination by Organic Chemicals. <i>Advances in Chemistry Series</i> , 1987, , 57-77.	0.6	4
106	Dynamics of hydrophobic organic chemical bioconcentration in fish. <i>Environmental Toxicology and Chemistry</i> , 1987, 6, 495-504.	2.2	165
107	Dynamics of hydrophobic organic chemical bioconcentration in fish. , 1987, 6, 495.		6
108	Bioconcentration of hydrophobic chemicals in fish: Relationship with membrane permeation. <i>Environmental Toxicology and Chemistry</i> , 1986, 5, 637-646.	2.2	177

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109	Bioconcentration of hydrophobic chemicals in fish: Relationship with membrane permeation. , 1986, 5, 637.		7