

## Curriculum vitae

Name: Annemarie Pauline van Wezel  
Adress: Standerdmolen 1  
4133 ET Vianen  
Birth date: 3 February 1968  
Nationality: Dutch  
Marital status: Married, three children (1996, 1998, 1998)

Prof. Dr Annemarie van Wezel (1968, MSc Biology, PhD environmental chemistry and toxicology) has long-term experience as scientist in toxicology and chemistry, risk assessment and environmental policy evaluation. She managed various large interdisciplinary research programs, such as 'Environmental risks of nanochemicals' (€7.5million) in the FES funded NanonextNL, and 'Shalegas and Water' (€1.8 million) funded by NWO. She is well-experienced in successfully managing and building research groups up to ca. 60 people. She published 66 peer-reviewed papers, h-index 27. She is a member of the Dutch Health Council and the Dutch Board on authorization of plant protection products and biocides CTGB. She served as chief science officer and professor on Water quality and health at KWR Watercycle Research Institute and Copernicus Institute of Utrecht University. From January 2019, she holds the chair Environmental Ecology and is Scientific Director IBED (Institute for Biodiversity and Ecosystem Dynamics) at the University of Amsterdam.

## Education:

2010-2011: Cranfield General Management Program  
2005-2006: 'Master class in strategic management', Netherlands School of Public Administration (NSOB), The Hague  
2001-2003: Master 'Management in Service Organizations', Utrecht University School of Governance (USG)  
1991-1994: Postgraduate Education in Toxicology, WUR  
1986-1991: Biology, Utrecht University  
1980-1986: Atheneum B, Koning Willem II, Tilburg

## Work experience:

2019-current: IBED (Institute for Biodiversity and Ecosystem Dynamics) at the University of Amsterdam, Scientific Director, chair Environmental Ecology.  
2007-2018: KWR Watercycle Research Institute (KWR), Nieuwegein.  
Since July 2013 principal scientist and professor on Water quality and health at KWR and at Utrecht University, Copernicus Institute of Sustainable Development. KWR's Chief Science Officer since May 2018. Board member KWR, Manager Water Quality and Health (2010-2013), 56 employees in 4 teams. Created turnover increase, scientific development, broadening on the scope and internationalization of the teams. Team leader Chemical Water Quality and Health, KWR Watercycle Research Institute (2007-2010).  
2002-2007: Policy researcher at the Planning bureau for Environment and Nature (MNP, now Netherlands Environmental Assessment Agency PBL), Bilthoven. Team leader Sustainable Rural Areas (2002-2004), projectleader integrated MNP projects (2004-2007, Environmental Balance, Environmental Outlook, Evaluation election programs, Evaluation governmental agreement).  
1997-2001: Researcher at the National Institute for Public Health and the Environment (RIVM), Centre for Substances and Risks, Bilthoven. Environmental quality standards for substances, Risks in relation to soil quality. Member of various interdepartmental working groups.  
1994-1997: Projectleader ecotoxicology at the National Institute for Coast and Sea (RIKZ, nowadays Deltares), The Hague.

1991-1994: PhD student at the RITOX (now Institute of Risk Assessment Sciences), Utrecht University. Thesis 'Residue-based effects of narcotic chemicals in fish and lipid bilayers' (September 1995).

#### **Work-related additional functions:**

2018: Member SAPEA Microplastics Working Group  
2017-2018: Advisory member Scientific Committee on Health, Environmental and Emerging Risks (SCHEER), working group on oil and gas  
2017-current: Member Stichting International Water Conferences  
2016-current: Member Dutch Health Council, Member Committee Signals Health and Environment  
2016-2017: Member Scientific Advisory Council KIBO (Knowledge and Innovation Program for soil and subsoil)  
2014-current: Member of the Dutch Board on Authorization of Plant Protection Products and Biocides (CTGB)  
2014-2018 : Chair (by picket) of Crisis Expert Team for environment and drinking water (CETmd)  
2014-current: Member board Postdoctoral Education on Toxicology  
2014-current: Member Editorial Board 'Reviews of Environmental Contamination and Toxicology' (Springer)  
2013-current: Several NWO Jury memberships (STW open innovation program, STW Water technology call, Veni-committee STW) and call preparation committee memberships (License to Operate call ALW, Topsector Water Call NWO/ALW, Topsector Water Call CEC STW)  
2007-2016: Member (since 2012 vice-chair) of the Soil Protection Technical Committee (TCB)  
2008-2011: Member-elect Europe Council of the Society of Environmental Toxicology and Chemistry (SETAC)  
2015: Member audit committee work field 'drinking water' RIVM  
2015: Member 'Future for Water Utility Drenthe' chaired by ms. Margreet de Boer  
2004-2008: Vice-chair of Provincial committee for water and the environment, province of Utrecht.  
2003-2008: Chair redaction of 'Bodem', published by Kluwer.  
General: Organization of various sessions/workshops at international symposia (SETAC, IWA)

#### **Media**

Selection interviews in newspapers, radio and television;

- Radio 1: in reactie op 'Drinkwater raakt op' (Oct 3 2012)
- National Geographic: Behind the Science – Drugsriolen (2013)
- BNR Duurzaam: Modernisering milieubeleid (March 24 2014)
- Reporter radio; Medicijnen in het water, hoe halen we ze eruit? (October 5, 2014)
- Waterspiegel; Risico's schaliegaswinning (September 2015)
- Impact (STW magazine); Plastic soep in de sloot (Oktober 2015)
- Reporter radio; Code droogte (November 29, 2015)
- C2W; Vissen naar minuscuul plastic (November 27, 2015)
- RTV Utrecht, Westbroek! Plastic (March 2016)
- Radio 1: Wederom tonnen drugsafval gevonden in Nederlands rioolwater (May 31, 2016)
- Een vandaag; Drugsgebruik Oudewater zorgwekkend (June 15, 2016)
- NOS Journaal & Radio 1 & NOS on-line; Risico's van Industriële lozingen (nav GenX) (April 14, 2017)
- AD; Chemie heeft vrij spel (April 22, 2017)
- RTL Nieuws; Veilige drinkwaterproductie (April 21, 2017)
- Trouw; Is plastic de oplossing in de strijd tegen microplastic uit de wasmachine? (May 16, 2017)
- Bionieuws; Schoon water blijft hardnekkig ideaal (August 26, 2017)
- RTL Nieuws; Additionele technologie bij Chemours (September 5, 2017)
- H2O; GenX is geen incident (September 2017)
- AD; De strijd om schoon drinkwater (Oktober 21, 2017)
- H2O; Spotlight op industriewater (Mei 2018)

- NRC; Drugsproductie overdreven? Sterker: omzet is zelfs hoger (September 2018)
- Trouw; Uw wasmachine spoelt niet alleen vuil door het riool, ook microplastic gaat zo naar de zee (Januari 2019)

### Grants (2008 onwards)

2008-2012:	Joint Research Programme Dutch drinking water sector, program Chemical water quality (~1,3 Meuro/yr)
2011-2016:	program director program Environmental risks NanonextNL FES (7,5 Meuro)
2013-2018:	SOLUTIONS, FP7, WP leader 'Innovative toxicant management', member coordination committee (total 12 mEuro)
2015-2020:	leader KWR/ALW program 'Shale gas & water' (1,8 mEuro)
2015-2020:	co-leader STW program TRAMP Technologies for risk assessment for microplastics (0,95 mEuro)
2017-2021:	co-leader TTW program EMERCHE; Effect-directed Monitoring tools to assess Ecological and human health Risks of CHEMicals of Emerging concern in the water cycle (0,68 mEuro)
2018-2022:	co-leader ALW program RUST; Re-USE of Treated effluent for agriculture (0,7 mEuro)
2018-2021:	partner ITN Ecorisk (3,6 mEuro)

### Supervision of PhD students as promotor

2014-current:	Astrid Fischer (TUD), TAPES project ( <a href="http://www.tapes-interreg.eu/">http://www.tapes-interreg.eu/</a> )
2015-current:	Ann-Helene Faber (UU), Shale gas & water project
2015-current:	Svenja Mintenig (UU), TRAMP project
2016-current:	Merel Kooi (WUR), TRAMP project
2018-current:	Valentin de Gussem (UU), EMERCHE project
2018-current:	Dominique Narain (UU), RUST project

Currently there are open vacancies for 2 PhD students (UU), Ecorisk project

Supervision of PhD students, not as promotor, for Silvana Ciarelli, Erwin Roex, Theo Traas

### Supervision of Master students

Sophie Punte, Dieuwke de Vries, Stefan Kostense, Gerard Cornelissen, Chiel Jonker, Mathilde Zorn, Caroline Moermond, Veronique Morinière, Inez Caris, Lieke Coppens, Floris van den Hurk, Joost de Munk, Mark Annevelink, Alejandra Corrales Duque, Ian van Zaanen, Isabella de Bok, Maarten Erich, Rossella Messina, Silas Pape, Stijn Kuipers

### Contribution to courses

In various UU Masters (Water Science and Management, Sustainable Development, One Health, Toxicology and Environmental Health); contributions to courses Drinking water and sanitation, Perspectives on Sustainable Development, Environmental Health, Water Governance and law.

### PhD committees

Ilona Velzeboer	Implications of nanoparticles in the aquatic environment (WUR 2014)
Isabel O'Connor	Modelling the oral uptake of chemicals: the role of plastic, passive diffusion and transport proteins (RUN 2014)
Yi Chen	Sorption behavior and acute toxicity of cationic surfactants in the aquatic environment (UU 2014)
Petra Booij	Toxic pressure of chemical stressors in the Dutch estuarine en coastal waters affecting pelagic microalgae (VU 2014)
Anastasia Georgantzopoulou	Effects of Ag Nanoparticles (Ag NPs) on model aquatic organisms (WUR 2015)
Denise Montagne	Modeling personal exposure to traffic related air pollutants (UU 2015)
Andrii Butovskyi	Micropollutant Removal in Source Separated Sanitation (WUR 2015)
Bram Martijn	Impact of the water matrix on the effect and the side effect of MP UV/H2O2 treatment for removal of organic micropollutants in drinking water production (WUR 2015)

Colette Bos	Articulation: how societal goals matter in nanotechnology (UU 2016)
Aleksandra Jedynska	Spatial variations and development of land use regression models of PAH, EC/OC, levoglucosan and oxidative potential of PM2.5 in European study areas (UU 2016)
Rik Oldenkamp	Uncertainty and variability in environmental risk assessment of human pharmaceuticals (RUN 2016)
Pita Spruijt	Expert views on scientific policy advice on complex environmental health issues (UU 2016)
Lisette de Hoop	Evaluating chemical exposure and effect models for aquatic species with a focus on crude oil constituents (RUN 2016)
Sunday Makama	An in vitro – in vivo integrated approach for hazard and risk assessment of silver nanoparticles for soil organisms (WUR 2016)
Andrea Carboni	Fullerene Nanoparticles in Soil: Analysis, Occurrence and Fate (UvA 2016)
Arjen Markus	Release, transport and fate of engineered nanoparticles in the aquatic environment (UvA 2016)
Joris Meesters	Environmental exposure modeling of nanoparticles (RUN 2017)
Ellen Besseling	Micro- and nanoplastic in the aquatic environment - from rivers to whales (WUR 2018)
Julia Tavitie	Wastewater treatment plants as pathways of microlitter to aquatic environment (Aalto University 2018)
Maria Hoppe	Oligomers in polyester-type food contact polymers: Identification and migration studies (UvA 2018)
Chimere Ohajinwa	Environmental and health impacts of informal e-waste recycling (UL 2018)
Jort Hammer	Linking molecular interactions to environmental properties of surfactants (UU 2019)

#### **BAC committee**

'Integrated Environmental Modeling', Faculty Management, Science & Technology, Open University

'Global Ecohydrology and Sustainability' Copernicus Institute, Utrecht University

Director NIOO, KNAW

#### **Publications in peer-reviewed international journals** (H-factor 26, Scopus)

- Belfroid, A., Van Wezel, A., Sikkenk, M., Van Gestel, K., Seinen, W., Hermens, J. (1993) The toxicokinetic behavior of chlorobenzenes in earthworms (*Eisenia andrei*): Experiments in water. *Ecotox. Environ. Saf.* 25: 154-165.
- Van Wezel, A.P., Opperhuizen, A. (1995) Narcosis due to environmental pollutants in aquatic organisms: residue-based toxicity, mechanisms and membrane burdens. *Crit. Rev. Toxicol. CRC* 25: 255-279.
- Van Wezel, A.P., Punte, S.S., Opperhuizen, A. (1995) Lethal body burdens of polar narcotics: chlorophenols. *Environ. Tox. Chem.* 14: 1579-1585.
- Van Wezel, A.P., Sijm, D.T.H.M., Seinen, W., Opperhuizen, A. (1995) Use of lethal body burden to indicate species differences in susceptibility to narcotic toxicants. *Chemosphere* 31: 3201-3209.
- Van Wezel, A.P., Opperhuizen, A. (1995) Thermodynamics of a series of chlorobenzenes to fish storage lipids, in comparison to partitioning to phospholipids. *Chemosphere* 31: 3605-3615.
- Van Wezel, A.P., De Vries, D.A.M., Kostense, S., Sijm, D.T.H.M., Opperhuizen, A. (1995) Intraspecies variation in lethal body burdens of narcotic compounds. *Aquat. Toxicol.* 33: 325-342.
- Van Wezel, A.P., Cornelissen, G., Van Miltenburg, J.K., Opperhuizen, A. (1996) Membrane burdens of chlorinated benzenes lower the main phase transition temperature in dipalmitoyl-phosphatidylcholine vesicles: Implications for toxicity by narcotic chemicals. *Environ. Toxicol. Chem.* 15:203-212.
- Van Wezel, A.P., De Vries, D.A.M., Sijm, D.T.H.M., Opperhuizen, A. (1996) Use of the lethal body burden in the evaluation of mixture toxicity. *Ecotox. Environ. Saf.* 35:236-241.
- Van Wezel, A.P., Schmitz, M.G.J., Tielens, A.G.M. (1997) Acetylcholinesterase and ATPase activities in erythrocyte ghosts are not affected by 1,2,4-trichlorobenzene: Implications for toxicity by narcotic chemicals. *Environ. Toxicol. Chem.* 16:2347-2352.
- De Maagd, P.G.-J., Van de Klundert, I.C.M., Van Wezel, A.P., Opperhuizen, A., Sijm, D.T.H.M. (1997) Lipid content and time-to-death-dependent lethal body burdens of naphthalene and 1,2,4-trichlorobenzene in fathead minnow (*Pimephales promelas*). *Ecotoxicol. Environ. Saf.* 38:232-237.

- Van Wezel, A.P., Jonker, M.T.O. (1998) Use of the lethal body burden in the risk quantification of field sediments; influence of temperature and salinity. *Aquat. Toxicol.* 42:287-300.
- Van Wezel, A.P. (1998) Chemical and biological aspects of ecotoxicological risk assessment of ionizable and neutral organic compounds in fresh and marine waters: a review. *Environ. Rev.* 6:123-137.
- Ciarelli, S., Van Straalen, N.M., Klap, V.A., Van Wezel, A.P. (1999) Effects of sediment bioturbation by the estuarine amphipod *Corophium volutator* on fluoranthene resuspension and transfer into the mussel (*Mytilus edulis*). *Environ. Toxicol. Chem.* 18:318-328.
- Sanderson, J.T., Commandeur, J.N.M., Van Wezel, A., Vermeulen, N.P.E. (1999) Bioassays for the detection of chemicals that can form bioactivation-dependent reactive free radicals. *Environ. Toxicol. Chem.* 18:1236-1243.
- Roex, E.W.M., Van Gestel, C.A.M., Van Wezel, A.P., Van Straalen, N.M. (2000) Ratios between acute aquatic toxicity and effects on population growth rates in relation to toxicant mode of action. *Environ. Toxicol. Chem.* 19:685-693.
- Van Wezel, A.P., Traas, T., Van der Weiden, M., Crommentuijn, G.H., Sijm, D.T.H.M. (2000) Environmental quality standards for polychlorinated biphenyl's in the Netherlands; derivation with probabilistic food chain modeling. *Environ. Tox. Chem.* 19:2140-2153.
- Van Wezel, A.P., Van Vlaardingen, P., Posthumus, R., Crommentuijn, G.H., Sijm, D. (2000) Environmental risk limits for two phthalates, with special emphasis on endocrine disruptive properties. *Ecotoxicol. Environ. Saf.* 46:305-321.
- Moermond, C.T.A., Tjink, J., Van Wezel, A.P., Koelmans, A.A. (2001) Distribution, speciation, and bioavailability of lanthanides in the Rhine-Meuse estuary, The Netherlands. *Environ. Toxicol. Chem.* 20:1916-1926.
- Sijm, D.T.H.M., Van Wezel, A.P., Crommentuijn, T. (2002) Environmental risk limits in the Netherlands. In: Postuma, L., Suter II, G.W., Traas, T.P. (eds.) *Species sensitivity distributions in ecotoxicology*. Lewis Publishers.
- Van Wezel, A.P., Jager, T. (2002) Comparison of two screening level risk assessment approaches for six disinfectants and pharmaceuticals. *Chemosphere* 47:1113-1128.
- Van Wezel, A.P., Van Vlaardingen, P. (2004) Environmental risk limits for antifouling substances. *Aquat. Toxicol.* 66:427-444.
- Traas, T.P.; Van Wezel, A.P.; Hermens, J.L.M.; Zorn, M.; Van Hattum, A.G.M.; Van Leeuwen, C.J. (2004) Environmental quality criteria for organic chemicals predicted from internal effect concentrations and a food web model. *Environ. Toxicol. Chem.* 23:2518-2527.
- Mulder, C.; Van Wezel, A.P.; Van Wijnen, H.J. (2005) Embedding soil quality in the planning and management of land use. *Int. J. Biodiv. Sci. Man.* 1:77-84
- Mulder, C.; Van Wijnen, H.J.; Van Wezel, A.P. (2005) Numerical abundance and biodiversity of below-ground taxocenes along a pH gradient across the Netherlands. *J. Biogeogr.* 32:1775-1790
- Van Wezel, A.P.; Kruitwagen, S.; Maas, R. (2006) Policy profile: How Dutch environmental policy contributes to meet European environmental standards; Dutch Environmental Balance. *Europ. Environ.* 16:45-52
- Van Wezel, A.P.; Franken, R.O.G.; Drissen, E.; Versluijs, K.C.W.; Van den Berg, R. (2008) Societal cost-benefit analysis for soil remediation in the Netherlands. *IEAM*, 4:61-74.
- Van Wezel, A.P.; Puijker, L.; Vink, C; Versteegh, A.; De Voogt, P. (2009) Odour and flavour thresholds of gasoline additives (MTBE, ETBE and TAME) and their occurrence in Dutch drinking water collection areas. *Chemosphere*, 76:672-676.
- Schriks, M.; Heringa, M.B.; Van der Kooi, M.; De Voogt, P.; Van Wezel, A.P. (2010) Toxicological relevance of emerging contaminants for drinking water quality. *Water Res.* 44:461-476.
- Van Wezel, A.P.; Mons, M.; Van Delft, W. (2010) New methods to monitor emerging chemicals in the drinking water production chain. *J. Environ. Monit.* 12:80-89.
- Ter Laak, T.L.; Van der Aa, M.; Houtman, C.J.; Stoks, P.G.; Van Wezel, A.P. (2010) Relating environmental concentrations of pharmaceuticals to consumption: A mass balance approach for the river Rhine. *Environ. Int.* 36:403-409.
- Schriks, M.; Van Leerdam, J.A.; Van der Linden, S.C.; Van der Burg, B.; Van Wezel, A.P.; De Voogt, P. (2010) High-Resolution Mass Spectrometric Identification and Quantification of Glucocorticoid Compounds in Various Wastewaters in The Netherlands. *Environ. Sci. Technol.*, 44:4766-4774.

- Schriks, M.; Heringa, M.B.; de Voogt P.; Van Wezel, A.P. (2011) Response to Mario Schirmer, Marion Martienssen and Kristin Schirmer's comments regarding "Toxicological relevance of emerging contaminants for drinking water quality" by Schriks et al. *Wat. Res.* 45: 1515-1517.
- Van Wezel, A.P.; Morinière, V.; Emke, E.; Ter Laak, T.; Hogenboom, A.C. (2011) Quantifying summed fullerene nC(60) and related transformation products in water using LC LTQ Orbitrap MS and application to environmental samples. *Environ. Int.* 37:1063-1067
- Woutersen, M.; Belkin, S.; Brouwer, B.; Van Wezel, A.P.; Heringa, M.B. (2011) Are luminescent bacteria suitable for online detection and monitoring of toxic compounds in drinking water and its sources? *Anal. Bioanal. Chem.* 400:915-29.
- McCarty, L.S.; Landrum, P.F.; Luoma, S.N.; Meador, J.P.; Merten, A.A.; Shephard, B.K.; Van Wezel, A.P. (2011) Advancing environmental toxicology through chemical dosimetry: External exposures versus tissue residues. *Int. Env. Ass. Man.* 7:7-27.
- Van Leeuwen, C.J., Frijns, J., van Wezel, A., van de Ven, F.H.M. (2012) City Blueprints: 24 Indicators to Assess the Sustainability of the Urban Water Cycle. *Wat. Res. Man.* 26:2177-2197.
- Ter Laak, T.L., Puijker, L.M., Van Leerdam, J.A., Raat, K.J., Kolkman, A., De Voogt, P., Van Wezel, A.P. (2012) Broad target chemical screening approach used as tool for rapid assessment of groundwater quality. *Sci. Tot. Environ.* 427-428:308-313.
- Punt, A., Brand, W., Murk, A.J., Van Wezel, A.P., Schriks, M., Heringa, M.B. (2013) Effect of combining in vitro estrogenicity data with kinetic characteristics of estrogenic compounds on the in vivo predictive value. *Toxicol in Vitro* 27:44-51.
- Brand, W., De Jongh, C.M., Van der Linden, S.C., Mennes, W., Puijker, L.M., Van Leeuwen, C.J., Van Wezel, A.P., Schriks, M., Heringa, M.B. (2013) Trigger values for investigation of hormonal activity in drinking water and its sources using CALUX bioassays. *Environ. Int.* 55: 109–118.
- Van de Vossenbergh, J. Tervahauta, H., Maquelin, K., Blokker-Koopmans, C.H.W., Uytewaal-Aarts, M., Dick Van der Kooij, D., Van Wezel, A.P., Van der Gaag, B. (2013) Identification of bacteria in drinking water with Raman spectroscopy. *Anal. Methods* 5: 2679-2687.
- Kolkman, A., Emke, E., Bäuerlein, P.S., Carboni, A., Truc Tran, D., Ter Laak, T.L., Van Wezel, A.P., De Voogt, P. (2013) Analysis of (functionalized) fullerenes in water samples by liquid chromatography coupled to high-resolution mass spectrometry. *Anal. Chem.* 2013:5867–5874. (ACS selected paper)
- Kettler, K., Veltman, K., Van de Meent, D., Van Wezel, A., Hendriks, A.J. (2014) Cellular uptake of nanoparticles. *Environ. Toxicol. Chem.* 33:481–492
- Brack W, Altenburger R, Schüürmann G, ; Martin Krauss; Jos van Gils; Jaroslav Slodbodnik; John Munthe; Bernd Manfred Gawlik; Annemarie van Wezel; Merijn Schriks; Juliane Hollender; Knut Erik Tollefsen; Ovanes Mekenyan; Saby Dimitrov; Dirk Bunke; Ian Cousins; Leo Posthuma; Paul J van den Brink; Miren López de Alda; Damià Barceló; Michael Faust; Andreas Kortenkamp; Mark Scrimshaw; Svetlana Ignatova; Guy Engelen; Gudrun Massmann; Gregory Lemkine; Ivana Teodorovic; Karl-Heinz Walz; Valeria Dulio; Michiel T.O. Jonker; Felix Jäger; Kevin Chipman; Francesco Falciani; Igor Liska; David Rooke; Xiaowei Zhang; Henner Hollert; Branislav Vrana; Klara Hilscherova; Kees Kramer; Steffen Neumann; Ruth Hammerbacher; Thomas Backhaus; Juliane Mack; Helmut Segner; Beate Escher; Gisela de Aragão Umbuzeiro (2015) SOLUTIONS for present and future emerging pollutants in land and water resources management. *Sci. Tot. Environ.* 503-504:22-31.
- Kolkman A, Martijn BJ, Vughs D, Baken KA, Van Wezel AP (2015) Tracing nitrogenous disinfection by-products after medium pressure UV water treatment by stable isotope labeling and high resolution mass spectrometry. *Environ. Sci. Technol.* 49:4458-4465.
- Coppens LJC, Van Gils J, Ter Laak T, Raterman B, Van Wezel A. (2015) Towards spatially smart abatement of human pharmaceuticals in surface waters: defining impact of sewage treatment plants on susceptible functions. *Wat. Res.* 81: 356–365
- Sjerps RMA, Vughs D, Van Leerdam JA, Ter Laak TL, Van Wezel AP (2016) Data-driven prioritization of chemicals for various water types using suspect screening LC-HRMS. *Wat. Res.* 93:254-264.

- Van Wezel AP, Caris I, Kools S (2016) Release of primary microplastics from consumer products to wastewater in the Netherlands. *Environ Tox Chem*, 35:1627-1631.
- Bäuerlein PS, Emke E, Tromp P, Hofman JAMH, Carboni A, Schooneman F, De Voogt P, Van Wezel AP (2017) Is there evidence for man-made nanoparticles in the Dutch environment? *Sci. Tot. Environ.* 576:273–283.
- Brack W, Dulio V, Ågerstrand M, Allan I, Altenburger R, Brinkmann M, Bunke D, Burgess RM, Cousins I, Escher BI, Hernández FJ, Hewitt ML, Hilscherová K, Hollender J, Hollert H, Kase R, Klauer B, Lindim C, López Herráez D, Miège C, Munthe J, O'Toole S, Posthuma L, Rüdell H, Schäfer RB, Sengl M, Smedes F, Van de Meent D, Van den Brink PJ, Van Gils J, Van Wezel AP, Vethaak AD, Vermeirssen E, Von der Ohe PC, Vrana B (2017) Towards the review of the Water Framework Directive: Recommendations for more efficient assessment and management of chemical contamination in European surface water resources. *Sci. Tot. Environ.* 576:720–737.
- Fischer A, Ter Laak T, Bronders J, Desmet N, Christoffels E, Van Wezel A, Van der Hoek JP (2017) Decision support for water quality management of contaminants of emerging concern. *J. Environ. Man.* 193:360-372.
- Munthe J, Brorström-Lundén E, Rahmberg M, Posthuma L, Altenburger R, Brack W, Bunke D, Engelen G, Gawlik BM, Van Gils J, López Herráez D, Rydberg T, Slobodnik J, Van Wezel A (2017) An expanded conceptual framework for solution-focused management of chemical pollution in European waters. *Environ. Sci. Europe* 29:13.
- Butkovskiy A, Bruning H, Kools SAE, Rijnaarts HHM, Van Wezel AP (2017) Organic pollutants in shale gas flowback and produced waters: identification, potential ecological impact and implications for treatment strategies. *Environ. Sci. Tech.* 51:4740–4754.
- Van Wezel AP, Ter Laak TL, Fischer A, Bäuerlein PS, Munthe J, Posthuma L (2017) Operationalising solutions-focused risk assessment; mitigation options for chemicals of emerging concern in surface waters. *RSC Environ. Sci. Water Res. Tech.* 3, 403 – 414.
- Koelmans A, Besseling E, Foekema E, Kooi M, Mintenig S, Ossendorp B, Redondo Hasselerharm P, Verschoor A, Van Wezel A, Scheffer M (2017) Risks of Plastic Debris: Unravelling fact, opinion, perception and belief. *Env Sci Tech* 51:11513-11519.
- Kooi M, Besseling E, Kroeze C, Van Wezel AP, Koelmans AA (2018) Modelling the fate and transport of plastic debris in freshwaters: Review and guidance. Springer. In: *Freshwater microplastics: Emerging environmental contaminants?*, Wagner, M., Lambert, S. Eds. Springer. 58:125-152
- Van Wezel AP, Van Lente H, Van de Sandt JJM, Bouwmeester H, Vandeberg RLJ, Sips AJAM. (2018) Risk analysis and technology assessment in support of technology development; putting RRI in practice in a case study for nanotechnology. *Integr. Environ. Ass. Man.* 14:9-16
- Butkovskiy A, Faber AH, Wang Y, Grolle K, Hofman-Caris C, Bruning H, Van Wezel A, Rijnaarts H (2018) Removal of organic contaminants from shale gas flowback water. *Water Res.* 138:47–55.
- Baken KA, Sjerps RMA, Schriks M, Van Wezel AP (2018) Toxicological relevance and Threshold of Toxicological Concern (TTC) for drinking water relevant contaminants of emerging concern. *Environ Int* 118:293-303.
- Van Wezel AP, Van den Hurk F, Sjerps RMA, Meijers EM, Roex EWM, Ter Laak TL (2018) Impact of industrial waste water treatment plants on Dutch surface waters and drinking water sources. *Sci Tot Environ* 640-641:1489-1499.
- Louisse J, Dingemans MML, Baken KA, Van Wezel AP, Schriks M (2018) Exploration of ToxCast/Tox21 bioassays as candidate bioanalytical tools for measuring groups of chemicals in water. *Chemosphere* 209:373–380.
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