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| Stressor | Relevance | Mechanism | Literature | Findings | Study Conc. | Solvent | Legislative Limit/Field Dose |
| Antibiotics | | | | | | | |
| Chloramphenicol | Common and long-used antibiotic (bacteriostatic) | Inhibits protein chain elongation via peptidyl transferase | (Backhaus and Grimme, 1999; Kümmerer, 2009) | Toxic to *V. fischeri* over chronic (24h) exposures | EC90 – 0.129 mg.l-1  EC50 – 0.064 mg.l-1  EC90 – 0.019 mg.l-1 | Stock solution? | Up to **60 ng.l-1** in surface water |
| Amoxycillin | Common antibiotic | Beta-lactam inhibition? | (Costanzo, Murby and Bates, 2005) | No evidence of resistance in sewerage or stream bacteria | Significant drop in mean denitrification rates (33%) by bacteria @ 1mg.l-1 |  | No testing/evaluation of new pharmaceuticals is required if predicted environmental concentration will be **<0.01 µg.l-1** |
| Pesticides | | | | | | | |
| Atrazine (Triazine) | Second most commonly used herbicide | Photosystem inhibition, endocrine disruptor? | (Palma *et al.*, 2008) | Inhibition of luminescence in *V. fischeri* in 30 minutes | EC50 – 69.4 mg.l-1  Another source: 39.9 mg.l-1 | Synthetic freshwater | 0. 1 ug.l-1 |
| Metaldehyde | Most common molluscicide, main cause of PCVs in UK | Inhibits metabolism/ damages CNS in molluscs, humans | (Thomas *et al.*, 2017)  The only paper on bacteria and metaldehyde out there! | Metaldehyde is not normally broken down by water processing or aquatic bacteria  But Acinetobacter E1 (soil) can use it as a food source! | 0-1000 μM  (not that it’s directly comparable) | Mineral medium | 0. 1 ug.l-1  Present at 3-8% in commercial formulations, adjuvants unknown |
| Heavy Metals | | | | | | | |
| Copper | Major anthropogenic pollutant, and essential nutrient | Oxidative stress | (Mighanetara *et al.*, 2009; Wang *et al.*, 2009) | Inhibition of luminescence in *V. fischeri* in 60 minutes | EC50 - 146.88 ug.l-1@ 30 minutes | 2% saline | <0.010 mg.l-1 (Sunningdale Tap Water)  2 mg.l-1 (varies with hardness) |
| Cadmium | Major anthropogenic pollutant | Oxidative stress | (Mighanetara *et al.*, 2009; Wang *et al.*, 2009) | Inhibition of luminescence in *V. fischeri* in 60 minutes | EC50 - 9.96 mg.l-1@ 30 minutes | 2% saline | 5 ug.l-1 (tap water) |
| (Poly)aromatic Hydrocarbons | | | | | | | |
| Benzo[a]pyrene (PAH) | Highly toxic PAH produced by incomplete combustion | Membrane damage, DNA damage | (Juhasz and Naidu, 2000) | Many bacteria can degrade Benzo[a]pyrene | various | various | 0.1 ug.l-1 (tap water) |
| Benzene (Solvent, AH) | AH petrol additive, used as stock in many synthesis pipelines | Mutagenesis | (Hartnik *et al.*, 2007; Haritash and Kaushik, 2009) | Inhibition of luminescence in *V. fischeri* in 15 minutes  Many aquatic bacteria are known to degrade benzene | EC50 102.78 mg.l-1 | DMSO | 1 ug.l-1 (tap water) |