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Abstract

We have developed a prototype model that can estimate the concentration of hazardous substance coplanar polychlorinated biphenyls (co-PCBs) in marine organisms and used it to estimate the concentration that target species of a basic and specific food chain had accumulated in Tokyo Bay. This model based on three models: a 3D-hydrodynamic model (Horiguchi et al, 2001), an ecological model (Taguchi et al, 1999) and a chemical fate model (Kobayashi, 2004). The model could reproduce, both temporally and spatially, the actual concentrations of co-PCBs found in fish, of Tokyo Bay.