

US EPA ARCHIVE DOCUMENT

TABLE 7-6

GENERAL MOTORS CORPORATION
 NAO FLINT OPERATIONS SITE - FLINT, MICHIGAN
 RFI PHASE II REPORT

BAFS USED TO ESTIMATE CONCENTRATIONS
 OF COPCS IN EARTHWORMS

| CoPC | Nonlinear BAF | | Source |
|----------------------------------|---------------|--------|----------------------|
| | B 0 | B 1 | |
| Metals | | | |
| Manganese | -0.809 | 0.682 | Sample et al. (1998) |
| Selenium | -0.075 | 0.733 | Sample et al. (1998) |
| Zinc | 4.449 | 0.328 | Sample et al. (1998) |
| Polychlorinated Biphenyls | | | |
| Aroclor [®] 1248 | 0.1352 | 1.0347 | See Appendix H |
| Aroclor [®] 1254 | 0.1352 | 1.0347 | See Appendix H |
| Aroclor [®] 1260 | 0.1352 | 1.0347 | See Appendix H |
| Total PCBs | 0.1352 | 1.0347 | See Appendix H |

Notes:

Dry-weight nonlinear BAF has form: $\ln[biota] = B 0 + B 1 * \ln[soil]$

Dry-weight PCB nonlinear BAF has form: $6.25 (\log[biota]) = B 0 + B 1 * \log[soil]$

PCB BAF assumes an average earthworm moisture content of 84% (U.S. EPA 1993)

- BAF - bioaccumulation factor
- CoPC - chemical of potential concern
- PCB - polychlorinated biphenyl