

Watershed Summary Information

Accounting Unit Name:	Lower Mississippi-Memphis
State(s):	TN KY MO AR MS
Political Boundaries:	Shelby, Lauderdale, Crittenden, Mississippi, Mississippi, Fulton, Tipton, Lake, New Madrid, Ballard, Obion, Carlisle, Dyer, Pemiscot, Hickman, De Soto
Major Waterways:	Mississippi R
Number of Stations in Watershed:	Tier1 - 14 Tier2 - 3 Tier3 - 3

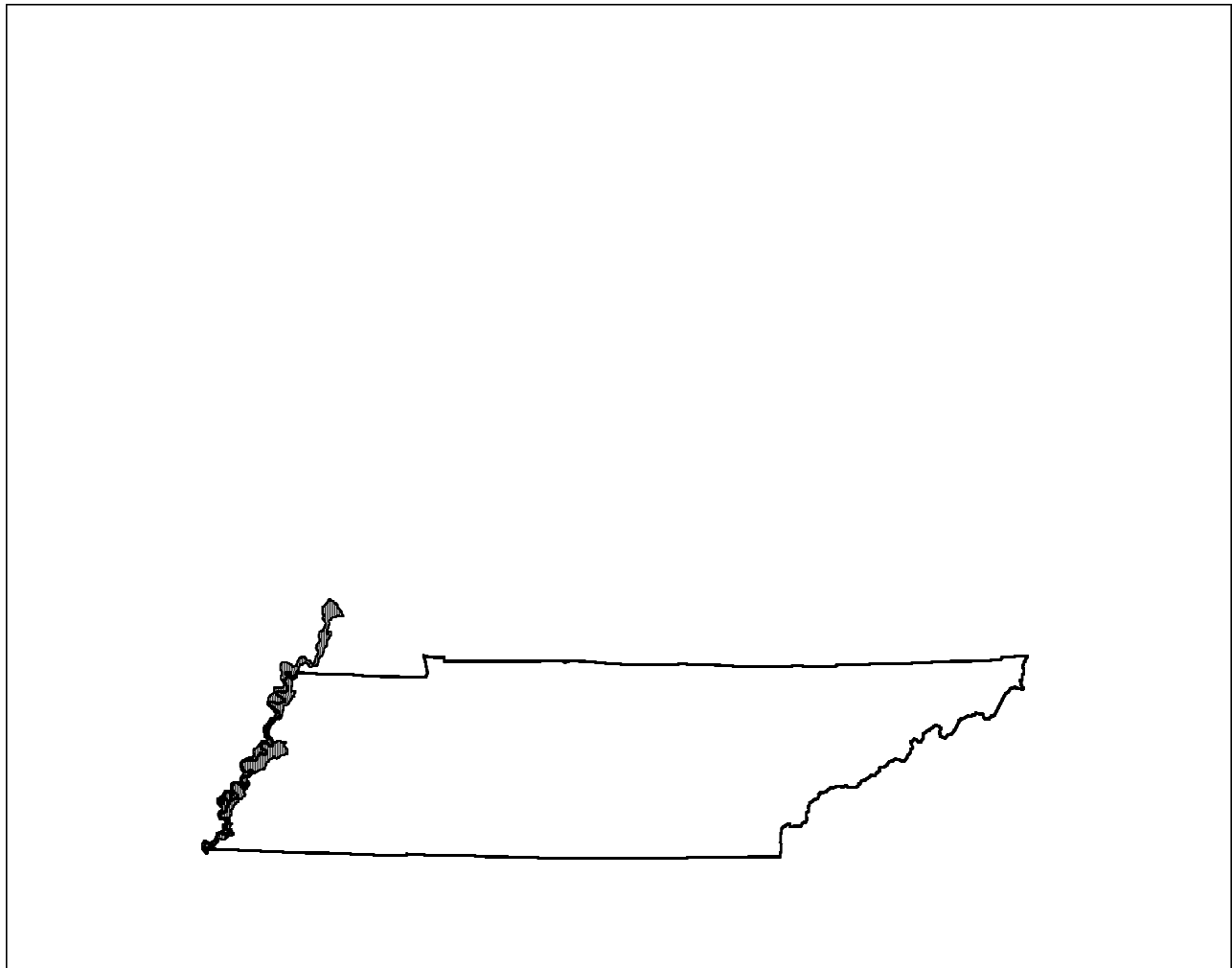


Figure 141. Watershed Location Map

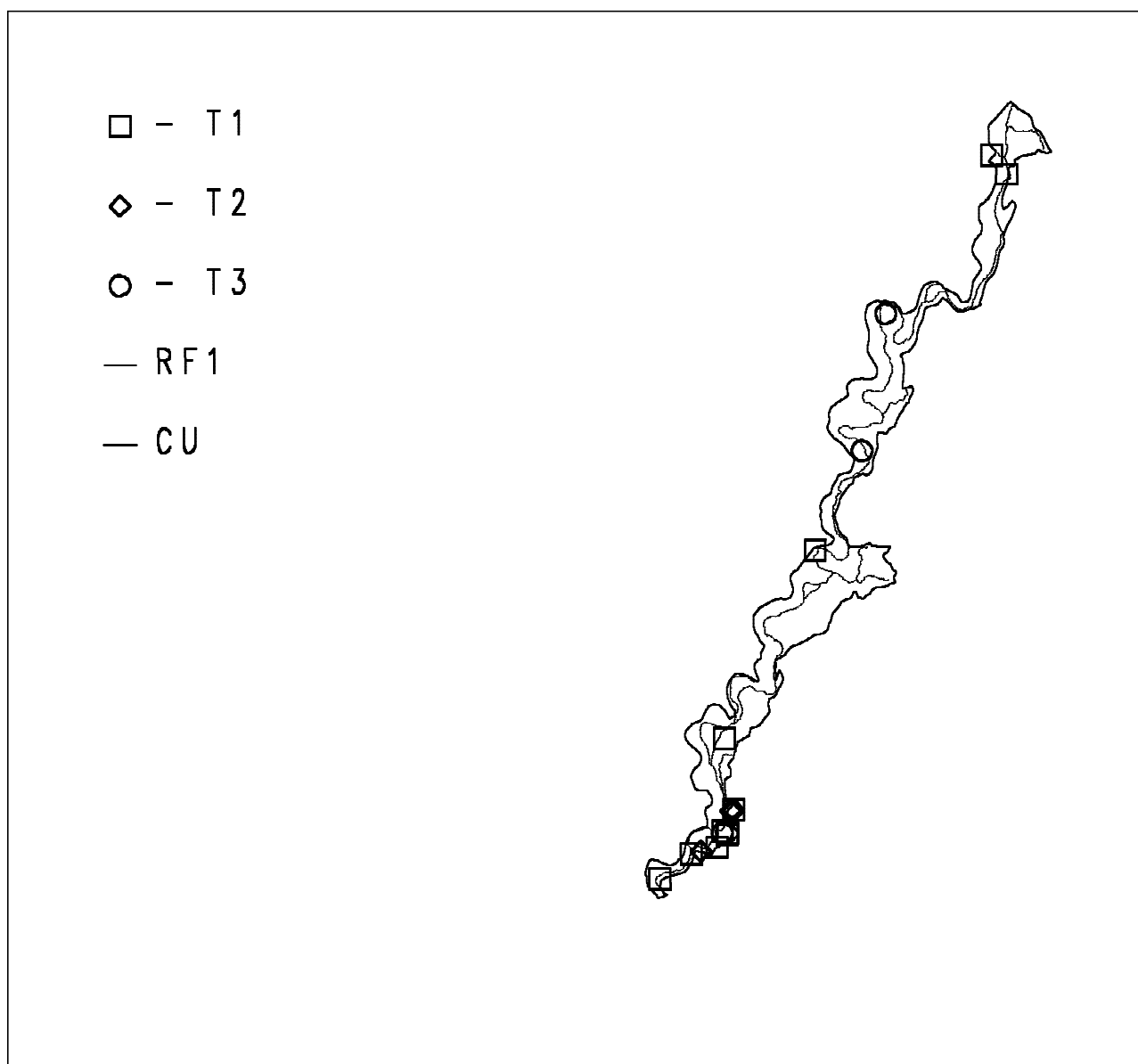


Figure 142. Major Waterways and Location of Sampling Stations

Data Source(s) Used in Evaluation

Source: **ODES** Agency: **KY**
 Monitoring Program: **Kentucky**
 Num. of Stations: 1 Date Range: 1988

Source: **ODES** Agency: **TN**
 Monitoring Program: **Tennessee**
 Num. of Stations: 2 Date Range: 1981-89

Source: **STORET** Agency: **11BIOACC**
 Monitoring Program: **USEPA National Bioaccumulation Study**
 Num. of Stations: 2 Date Range: 1988-89

Source: **STORET** Agency: **11FWS**
Monitoring Program: **US Fish & Wildlife Service Data - USEPA Hq Backdata Study**
Num. of Stations: 1 Date Range: 1981-84

Source: **STORET** Agency: **1114PEST**
Monitoring Program: **USEPA SE Environ Water Lab Data**
Num. of Stations: 1 Date Range: 1980

Source: **STORET** Agency: **1116APCC**
Monitoring Program: **Arkansas Dept of Con & Ecol. Pollution Control And Ecology Data**
Num. of Stations: 1 Date Range: 1980-82

Source: **STORET** Agency: **1117MBR**
Monitoring Program: **USEPA Region 7 Data**
Num. of Stations: 2 Date Range: 1984-88

Source: **STORET** Agency: **112WRD**
Monitoring Program: **US Geological Survey Data**
Num. of Stations: 1 Date Range: 1981-82

Source: **STORET** Agency: **21ILFISH**
Monitoring Program: **USEPA Region 5 Data**
Num. of Stations: 1 Date Range: 1981-92

Source: **STORET** Agency: **21TNWQ**
Monitoring Program: **Tennessee Dept of Public Health Water, Sediment & Tissue Data**
Num. of Stations: 8 Date Range: 1980-82

Chemicals Responsible for Sampling Station Classification as Tier 1 or Tier 2

Classifying Parameter	Number of Stations							
	All Parameters				Aquatic Life		Human Health	
	Total	T.1&2	Tier1	Tier2	Tier1	Tier2	Tier1	Tier2
Dieldrin	17	15	.	15	.	.	.	15
Polychlorinated biphenyls	16	14	12	2	.	2	12	2
Chlordane	17	12	.	12	.	.	.	12
Aldrin	9	6	.	6	.	.	.	6
DDT	14	5	.	5	.	.	.	5
Dioxins	6	4	4	.	.	.	4	.
BHC	14	4	.	4	.	.	.	4
Heptachlor epoxide	7	4	.	4	.	.	.	4
Heptachlor	9	3	.	3	.	.	.	3
Arsenic	6	2	.	2	.	.	.	2
Cadmium	6	2	.	2	.	2	.	.
Chromium	4	1	1	.	1	.	.	.
Mercury	11	1	1	.	1	.	.	.
Copper	6	1	.	1	.	1	.	.
Lead	6	1	.	1	.	1	.	.
Nickel	1	1	.	1	.	1	.	.
Toxaphene	4	1	.	1	.	.	.	1

Classifying Parameter	Number of Stations							
	All Parameters				Aquatic Life		Human Health	
	Total	T.1&2	Tier1	Tier2	Tier1	Tier2	Tier1	Tier2
Zinc	3	1	.	1	.	1	.	.

Sediment Chemistry Data: Chemical Summary

Sediment Parameter	Total Observations			Detected Observations		
	Num.	Mean (ppb)	Median (ppb)	Num.	Max (ppb)	Min (ppb)
Acenaphthene	1	0.00	0.00	0	.	.
Acenaphthylene	1	0.00	0.00	0	.	.
Acrylonitrile	1	0.00	0.00	0	.	.
Aldrin	3	0.00	0.00	0	.	.
Anthracene	1	0.00	0.00	0	.	.
Antimony	1	0.00	0.00	0	.	.
Arsenic	3	1320.00	1800.00	2	2160.00	1800.00
Benzene	1	0.00	0.00	0	.	.
Benzo(a)anthracene	1	0.00	0.00	0	.	.
Benzo(a)pyrene	1	0.00	0.00	0	.	.
Benzo(b)fluoranthene	1	0.00	0.00	0	.	.
Benzo(ghi)perylene	1	0.00	0.00	0	.	.
Benzo(k)fluoranthene	1	0.00	0.00	0	.	.
Bis(2-ethylhexyl)phthalate	1	0.00	0.00	0	.	.
Bromophenyl phenyl ether, 4-	1	0.00	0.00	0	.	.
Butyl benzyl phthalate	1	0.00	0.00	0	.	.
BHC	6	0.00	0.00	0	.	.
Cadmium	3	1666.67	700.00	3	4000.00	300.00
Chlordane	4	0.00	0.00	0	.	.
Chlorobenzene	1	0.00	0.00	0	.	.
Chromium	3	96000.00	6200.00	3	278000.0	3800.00
Chrysene	1	0.00	0.00	0	.	.
Copper	3	17066.67	7900.00	3	37000.00	6300.00
Di-n-butyl phthalate	1	0.00	0.00	0	.	.
Di-n-octyl phthalate	1	0.00	0.00	0	.	.
Dibenzo(a,h)anthracene	1	0.00	0.00	0	.	.
Dibromochloromethane	1	0.00	0.00	0	.	.
Dichlorobenzene, 1,2-	1	0.00	0.00	0	.	.
Dichlorobenzene, 1,3-	1	0.00	0.00	0	.	.
Dichlorobenzene, 1,4-	1	0.00	0.00	0	.	.
Dichloroethane 1,1-	1	0.00	0.00	0	.	.
Dichloroethane 1,2-	1	0.00	0.00	0	.	.
Dichloroethene, trans-1,2-	1	0.00	0.00	0	.	.
Dichloromethane	1	0.00	0.00	0	.	.
Dichloropropane, 1,2-	1	0.00	0.00	0	.	.
Dieldrin	3	0.00	0.00	0	.	.
Diethyl phthalate	1	0.00	0.00	0	.	.

Sediment Parameter	Total Observations			Detected Observations		
	Num.	Mean (ppb)	Median (ppb)	Num.	Max (ppb)	Min (ppb)
Dimethyl phthalate	1	0.00	0.00	0	.	.
Dimethylphenol, 2,4-	1	0.00	0.00	0	.	.
DDT	11	0.20	0.00	3	1.06	0.32
Endosulfan mixed isomers	2	0.00	0.00	0	.	.
Endosulfan, alpha-	1	0.00	0.00	0	.	.
Endosulfan, beta-	1	0.00	0.00	0	.	.
Endrin	3	0.00	0.00	0	.	.
Ethylbenzene	1	0.00	0.00	0	.	.
Fluoranthene	1	0.00	0.00	0	.	.
Fluorene	1	0.00	0.00	0	.	.
Heptachlor	3	0.00	0.00	0	.	.
Heptachlor epoxide	3	0.00	0.00	0	.	.
Hexachlorobenzene	1	0.00	0.00	0	.	.
Hexachlorobutadiene	1	0.00	0.00	0	.	.
Hexachloroethane	1	0.00	0.00	0	.	.
Indeno(1,2,3-cd)pyrene	1	0.00	0.00	0	.	.
Isophorone	1	0.00	0.00	0	.	.
Lead	3	77066.67	13400.00	3	210000.0	7800.00
Mercury	2	540.00	540.00	2	980.00	100.00
Methoxychlor	2	0.00	0.00	0	.	.
Mirex/Dechlorane	2	0.00	0.00	0	.	.
Naphthalene	1	0.00	0.00	0	.	.
Nickel	1	33000.00	33000.00	1	33000.00	33000.00
Nitrosodiphenylamine, N-	1	0.00	0.00	0	.	.
Pentachlorophenol	1	0.00	0.00	0	.	.
Phenanthrene	1	0.00	0.00	0	.	.
Phenol	1	0.00	0.00	0	.	.
Polychlorinated biphenyls	10	20.80	0.00	3	180.00	2.00
Pyrene	1	0.00	0.00	0	.	.
Silver	1	0.00	0.00	0	.	.
Tetrachloroethane, 1,1,2,2-	1	0.00	0.00	0	.	.
Tetrachloroethene	1	0.00	0.00	0	.	.
Tetrachloromethane	1	0.00	0.00	0	.	.
Toluene	1	0.00	0.00	0	.	.
Toxaphene	3	0.00	0.00	0	.	.
Tribromomethane/Bromoform	1	0.00	0.00	0	.	.
Trichlorobenzene, 1,2,4-	1	0.00	0.00	0	.	.
Trichloroethane, 1,1,1-	1	0.00	0.00	0	.	.
Trichloroethane, 1,1,2-	1	0.00	0.00	0	.	.
Trichloroethene	1	0.00	0.00	0	.	.
Trichlorofluoromethane	1	0.00	0.00	0	.	.
Trichloromethane/Chloroform	1	0.00	0.00	0	.	.
Zinc	1	174000.0	174000.0	1	174000.0	174000.0

Tissue Residue Data: Chemical Summary

Tissue Parameter	Total Observations			Detected Observations		
	Num.	Mean (ppb)	Median (ppb)	Num.	Max (ppb)	Min (ppb)
Aldrin	38	29.26	20.00	26	90.00	4.00
Arsenic	20	35.00	0.00	8	120.00	50.00
Biphenyl	6	0.00	0.00	0	.	.
BHC	93	97.13	4.00	48	4520.00	3.00
Cadmium	22	10.91	0.00	8	50.00	10.00
Chlordane	176	672.93	86.80	148	8400.00	4.00
Chlorpyrifos/Dursban	6	15.56	21.70	6	22.30	2.67
Chromium	14	44.29	40.00	14	80.00	30.00
Copper	22	509.09	540.00	22	850.00	220.00
Dicofol/Kelthane	4	1.41	1.41	2	2.83	2.83
Dieldrin	100	156.74	60.00	99	6900.00	7.00
Dioxins	18	0.01	0.00	15	0.02	0.00
DCPA/Dacthal	5	10.00	10.00	5	10.00	10.00
DDT	211	10663.21	70.00	175	626000.0	7.00
Endosulfan mixed isomers	3	72.00	72.00	3	90.00	54.00
Endrin	71	168.43	100.00	57	1200.00	3.22
Heptachlor	27	14.81	0.00	12	80.00	3.00
Heptachlor epoxide	26	8.03	0.03	18	40.00	0.01
Hexachlorobenzene	26	7.73	2.61	14	30.00	2.61
Hexachlorobutadiene	3	0.00	0.00	0	.	.
Isopropalin	3	0.00	0.00	0	.	.
Lead	22	117.27	0.00	10	400.00	50.00
Mercury	34	117.35	90.00	34	330.00	50.00
Methoxychlor	24	0.38	0.00	2	4.55	4.55
Mirex/Dechlorane	23	2.65	0.00	9	10.00	2.01
Pentachlorobenzene	6	0.00	0.00	0	.	.
Pentachloronitrobenzene/Quin	3	0.00	0.00	0	.	.
Polychlorinated biphenyls	129	398.73	200.00	69	7129.00	100.00
Selenium	8	5102.50	375.00	8	38000.00	340.00
Tetrachlorobenzene, 1,2,4,5-	4	0.00	0.00	0	.	.
Toxaphene	16	156.25	0.00	4	1100.00	200.00
Trichlorobenzene, 1,2,4-	4	3.29	3.29	2	6.57	6.57
Trifluralin/Treflan	3	13.42	13.40	3	21.80	5.07
Zinc	8	35407.50	29820.00	8	66920.00	15070.00