Rush-Vermillion 07040001

Watershed Summary Information

Accounting Unit Name: Upper Mississippi-Black-Root

State(s): MN WI

Political Boundaries: Goodhue, Pierce, Pepin, Dakota, St Croix, Buffalo, Wabasha

Major Waterways: Mississippi R
Rush R
Timbelle R
Hay Cr
Vermillion R

Number of Stations in Watershed: Tier1 - 13
Tier2 - 1
Tier3 - .

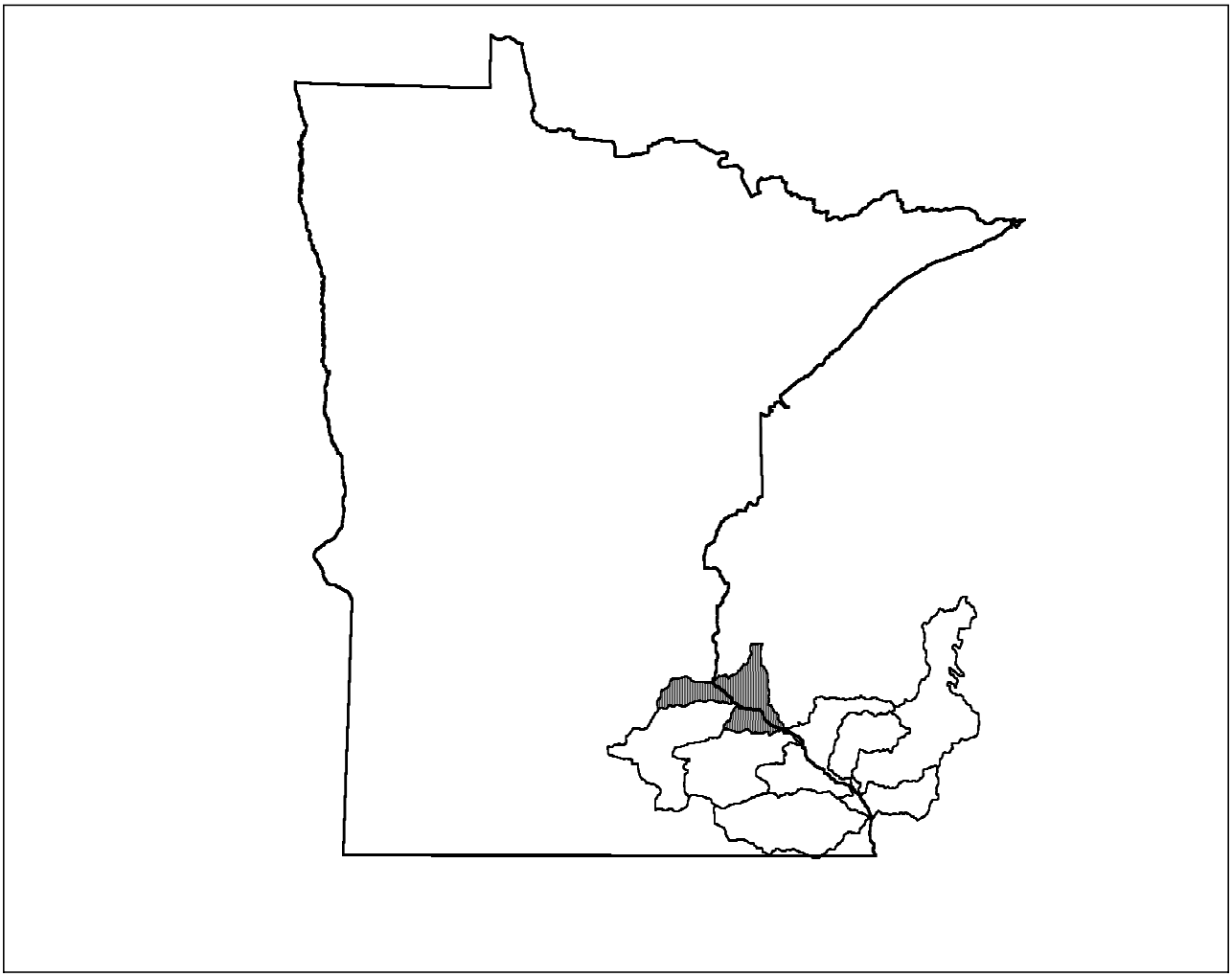

Figure 115. Watershed Location Map

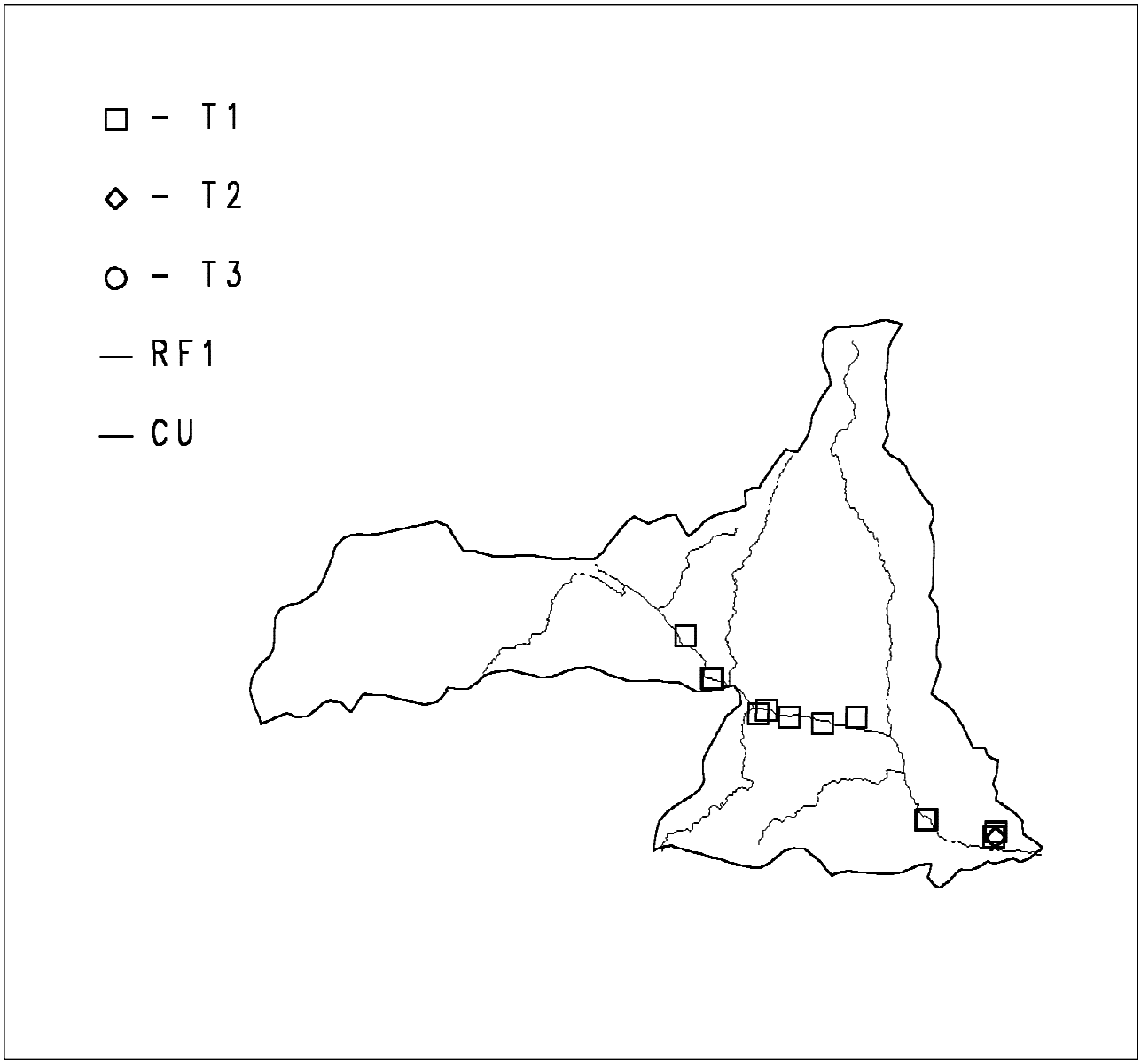

Figure 116. Major Waterways and Location of Sampling Stations

Data Source(s) Used in Evaluation

Source: **STORET** Agency: **11BIOACC**
Monitoring Program: **USEPA National Bioaccumulation Study**
Num. of Stations: 1 Date Range: 1987

Source: **STORET** Agency: **11FWS**
Monitoring Program: **US Fish & Wildlife Service Data - USEPA Hq Backdata Study**
Num. of Stations: 1 Date Range: 1980-86

Source: **STORET** Agency: **21MINN**
Monitoring Program: **Minn Poll Control Agency Stream Data**
Num. of Stations: 6 Date Range: 1980-90

Source: **STORET** Agency: **21MINNW**
Monitoring Program: **Wildlife Contaminent Data Minn Poll Control Agency**
Num. of Stations: 1 Date Range: 1990

Source: **STORET** Agency: **21WIS**
Monitoring Program: **Wisconsin DNR Div Env Protection Water And Sediment Data**
Num. of Stations: 2 Date Range: 1980-92

Source: **STORET** Agency: **21WITIS**
Monitoring Program: **Tissue Data Wisconsin Dept of Nat Res Div of Environ Protection**
Num. of Stations: 3 Date Range: 1980-90

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
Polychlorinated biphenyls	13	13	13	.	.	.	13	.
Dieldrin	8	3	.	3	.	.	.	3
Lead	5	3	.	3	.	2	.	1
Copper	5	2	.	2	.	2	.	.
Mercury	10	2	.	2	.	2	.	.
Dioxins	2	1	1	.	.	.	1	.
Aldrin	6	1	.	1	.	.	.	1
Arsenic	4	1	.	1	.	.	.	1
Cadmium	5	1	.	1	.	1	.	.
Chromium	4	1	.	1	.	1	.	.
DDT	7	1	.	1	.	.	.	1
Toxaphene	1	1	.	1	.	.	.	1

Sediment Chemistry Data: Chemical Summary

Sediment Parameter	Total Observations			Detected Observations		
	Num.	Mean (ppb)	Median (ppb)	Num.	Max (ppb)	Min (ppb)
Cadmium	4	987.50	1055.00	4	1140.00	700.00
Chromium	6	45000.00	46500.00	6	62000.00	26000.00
Copper	15	29500.00	25000.00	15	60000.00	19100.00
Lead	15	29300.00	24000.00	15	53000.00	14000.00
Mercury	12	207.50	215.00	12	300.00	130.00

Tissue Residue Data: Chemical Summary

Tissue Parameter	Total Observations			Detected Observations		
	Num.	Mean (ppb)	Median (ppb)	Num.	Max (ppb)	Min (ppb)
Aldrin	19	1.06	0.00	3	10.00	0.14
Arsenic	22	1476.31	0.00	7	18000.00	50.00
Biphenyl	1	0.00	0.00	0	.	.
BHC	47	2.81	0.00	15	10.00	0.04
Cadmium	26	15.08	6.50	14	52.16	6.00
Chlordane	99	2.43	0.00	28	10.00	0.09
Chlorpyrifos/Dursban	1	0.00	0.00	0	.	.
Chromium	15	33.33	0.00	1	500.00	500.00
Copper	22	1585.97	1600.00	22	2400.00	590.40
Dicofol/Kelthane	1	0.00	0.00	0	.	.
Dieldrin	27	5.97	0.00	11	54.00	0.02
Dioxins	4	0.00	0.00	2	0.01	0.00
DCPA/Dacthal	6	10.00	10.00	6	10.00	10.00
DDT	118	33.58	0.00	43	630.00	0.23
Endrin	24	2.50	0.00	7	10.00	0.02
Heptachlor	7	8.57	10.00	6	10.00	10.00
Heptachlor epoxide	4	5.45	5.90	3	10.00	1.80
Hexachlorobenzene	24	2.68	0.00	11	10.00	0.01
Hexachlorobutadiene	1	0.00	0.00	0	.	.
Isopropalin	1	0.00	0.00	0	.	.
Lead	21	107.88	0.00	6	1370.00	60.00
Mercury	44	97.90	90.00	41	290.00	20.00
Methoxychlor	14	0.00	0.00	0	.	.
Mirex/Dechlorane	7	8.57	10.00	6	10.00	10.00
Pentachlorobenzene	1	0.00	0.00	0	.	.
Pentachloronitrobenzene/Quin	1	0.00	0.00	0	.	.
Pentachlorophenol	4	0.00	0.00	0	.	.
Polychlorinated biphenyls	246	2711.06	580.00	208	60000.00	0.13
Selenium	6	441.27	415.00	6	656.00	270.00
Tetrachlorobenzene, 1,2,4,5-	1	0.00	0.00	0	.	.
Toxaphene	6	93.33	100.00	6	100.00	60.00
Trichlorobenzene, 1,2,4-	1	0.00	0.00	0	.	.
Trichlorophenol, 2,4,5-	1	0.00	0.00	0	.	.
Trichlorophenol, 2,4,6-	1	0.00	0.00	0	.	.
Trifluralin/Treflan	1	0.00	0.00	0	.	.
Zinc	6	61120.00	71830.00	6	94460.00	14040.00