

Jamestown S. D. #3

(Louisburg STP)

Grant County

May 17, 1979

### Louisburg Creek

Louisburg Creek is a moderate-gradient spring and seepage fed stream that joins Kieler Creek to form the headwaters of the Menominee River. The Q<sub>7</sub>10 of Louisburg Creek above the proposed discharge site at NE $\frac{1}{4}$  NW $\frac{1}{4}$ , Sec. 12, T1N, R2W, is .18 cfs.

The substrate of the stream is mostly rock-rubble along with a small amount of gravel. The stream is buffered by mostly pasture and several farms are adjacent to the stream. Cattle have had a significant impact on the water quality of the stream by contributing to pasture and bank erosion. Also construction of new housing sites at Louisburg has contributed to non point source runoff. The combination of these factors have led to heavy siltation of the stream in its upper reaches.

At Louisburg Road filamentous algae is beginning to grow profusely due to heavy nutrient loadings. Macrophytes are limited to patches of water cress. The benthic community at this site contains an abundance of isopods, black fly larvae, chironomids and a small number of beetles, caddisflies and mayflies.

Downstream from this section flow begins to increase and the benthic community is more balanced. Both caddisflies and mayflies are more abundant and fresh water shrimp were in good numbers. The pools begin to lengthen and deepen and a better riffle to pool ratio is evident. Beds of water cress are more abundant along with some Potamogeton spp. and filamentous algae.

By the time the stream reaches Spring Valley Road flow has significantly increased. The benthic community is diversified and of good quality. Large, long beds of water cress dominate the macrophyte community and very little filamentous algae is present.

The Menominee River contains an excellent population of smallmouth bass and Louisburg Creek has the potential to be a good bass or trout fishery. Water temperatures are good and numerous pools are present. Presently forage fish are abundant throughout the stream reach.

### Recommendations

From the juncture of a tributary in the NE $\frac{1}{4}$  NW $\frac{1}{4}$ , Sec. 12, T1N, R2W with Louisburg Creek and for the downstream remainder of Louisburg Creek, the classification should be continuous fish and aquatic life.

The above recommendations represent a concurrence of opinion of the stream classification team who are as follows:

Dave Lewandowski, District Engineer  
Tom Bainbridge, District Biologist  
Gene Van Dyck, Area Fish Manager  
Roger Schlessner, Environmental Specialist

Respectfully submitted,



Roger Schlessner  
Water Quality Specialist



Jamestown Sanitary District #2  
Grant County

October 15, 1976

Jamestown Sanitary District discharges into a small diffused surface water ditch which is generally dry except during runoff. The plant has a low discharge rate at this time. This ditch enters the Menominee River approximately  $\frac{1}{4}$  mile from the plant.

Menominee River

Surface area = 9.64 acres, Length = 5.3 miles, Gradient = 19 ft./mile.

A seepage and spring fed stream beginning at the junction of Kieler and Louisburg Creeks and flowing south to enter Illinois two miles southwest of Sinsinawa. This stream is subject to frequent and severe floods. Bank erosion is quite heavy throughout the stream. Flooding could be greatly lessened with the construction of more water and soil control structures within the watershed. Large pools and boulders provide excellent habitat for the good smallmouth bass population. The abundant forage fish population includes white suckers, common shiners, redbelly dace, creek chubs, stone-rollers, brook stickleback and fantailed darters. Muskrats, mink, beaver, and migratory waterfowl inhabit the stream. Upland game species include deer, raccoon, squirrels, and ruffed grouse.


Recommendations

From the Jamestown #2 plant outfall to the Menominee River the classification should be diffused marginal surface waters. From this point and for the remainder of the Menominee River the classification should be continuous fish and aquatic life.

The above recommendations represent a concurrence of opinion of the stream classification team who are as follows:

Dennis Iverson, District Engineer  
Gene Van Dyck, Area Fish Manager  
Tom Bainbridge, District Biologist  
Roger Schlessler, Natural Resources Technician

Respectfully submitted,

  
Tom Bainbridge  
Stream Classification Coordinator

TB:cb

