

## DEPARTMENT OF NATURAL RESOURCES

## MISSOURI CLEAN WATER COMMISSION

## CONSTRUCTION PERMIT

The Missouri Clean Water Commission hereby issues a permit to: **Herculeanum Sewer Company / One Parkwood Court, Herculeanum, Missouri 63048.**

for the construction of (describe facilities): **1690 linear feet of 8" P.V.C. pipe, 1318 linear feet of 10" P.V.C. pipe, and all the necessary appurtenances to make the sewers complete and usable to serve a portion of the Herculeanum Properties Inc. development at the intersection of Highway I-55 and McNitt Street in Herculeanum, Missouri. Discharge will be into sewers currently under construction by the Herculeanum Sewer Company with treatment to be provided at the Herculeanum Sewer District Treatment Plant.**

*Late-Filed  
Applicant*

Exhibit No. 5Date 4/24/79 Case No. SA-78-240Reporter Stratner*Rec'd 4-24-79.**als.*Permit Conditions: **None**

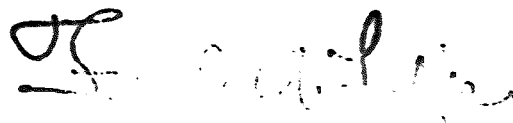
Construction of such proposed facilities shall be in accordance with the provisions of the Missouri Clean Water Law as located in Chapter 204 RSMo, Supplement 1973 and regulations promulgated thereunder, or this permit may be revoked by the Missouri Clean Water Commission.

As the Department of Natural Resources does not examine structural features of design or the efficiency of mechanical equipment, the issuance of this permit does not include approval of these features.

A representative of the Department may inspect the work covered by this permit periodically during construction. Issuance of an operating permit by the Commission will be contingent on the work substantially adhering to the approved plans and specifications.

December 26, 1978

Date



Director, Department of Natural Resources

WJH:BM  
Dec 478

\$25. filing fee received

This is NOT a National Pollution Discharge Elimination System (NPDES) Permit.

22-2638 Company's Late  
Exhibit No. 5

DEPARTMENT OF NATURAL RESOURCES

MISSOURI CLEAN WATER COMMISSION

CONSTRUCTION PERMIT

The Missouri Clean Water Commission hereby issues a permit to: Herculaneum Sewer Co.,  
X Herculaneum Properties Inc., -P.O. Box 173- High Ridge, MO 63049

41.37  
54.4

for the construction of (describe facilities): A lift station equipped with two Toran Model 4513 submersible pumps, each having a capacity of 320 GPM at a TDH of 43 feet, 3034 lineal feet of 6 inch PVC force main, approximately 360 lineal feet of 8 inch force main (creek crossing), 846 lineal feet of 10 inch DIP, 362 lineal feet of 10 inch PVC, 1348 lineal feet of 12 inch PVC, 233 lineal feet of 12 inch DIP and all the necessary appurtenances to make the lift station, force main and gravity sewers complete and usable to serve the Herculaneum Sewer Company service area and surrounding developments in the vicinity of Hwy I-55 and the Herculaneum Spur in Herculaneum, Missouri. The lift station is designed to handle an average daily flow of 134,900 gals (94 GPM) based on 314 existing and proposed residential lots and 58 commercial lots. The lift station will be located adjacent to Lake of the Hills at the end of Meadow Lane and will discharge into existing Herculaneum Sewer District sewers on Brown Road immediately south of Joachim Avenue, with treatment to be provided at the Herculaneum Sewer District treatment plant. (MO-0027111).

Permit Conditions: See attached sheet.

Construction of such proposed facilities shall be in accordance with the provisions of the Missouri Clean Water Law as located in Chapter 204 RSMo, Supplement 1973 and regulations promulgated thereunder, or this permit may be revoked by the Missouri Clean Water Commission.

As the Department of Natural Resources does not examine structural features of design or the efficiency of mechanical equipment, the issuance of this permit does not include approval of these features.

A representative of the Department may inspect the work covered by this permit periodically during construction. Issuance of an operating permit by the Commission will be contingent on the work substantially adhering to the approved plans and specifications.

December 15, 1978

Date

  
Director, Department of Natural Resources

WJF:224  
Rev. 4-78

This is NOT a National Pollution Discharge Elimination System (NPDES) Permit.  
\$25.00 filing fee received

PERMIT CONDITIONS:

1. These facilities will be owned, operated and maintained by the Merculaneum Sewer Company until such time as it becomes legally possible for the Merculaneum Sewer District to annex the service area. At that time arrangements are to be completed for transferring the facilities to the sewer district.
2. The portion of the force main crossing beneath Joachim Creek has been oversized for current needs in order to meet future needs as projected in the Draft Wastewater Facilities Plan prepared for the Merculaneum-Devely area in May, 1978.
3. The design TDH of the lift station pumps is based upon the assumption that only the first 2352 feet of 6 inch force main will act as a true "force" main. It is anticipated that the remaining length of force main will essentially act as a gravity conduit.
4. It is anticipated that dips in the portion of the force main considered to be acting as a gravity conduit will require periodic flushing to prevent accumulation of solids. Clean-outs have been provided for this purpose and are to be used on regular basis.
5. Under peak flow conditions (235 GPM) at ultimate design loading a storage capacity of approximately 1.2 hrs. is available in the gravity sewers preceding the lift station in the event of a lift station failure. This is not considered adequate at ultimate design loading unless (as a minimum) combined with a telemetered alarm system capable of summoning help 24 hrs. a day. The rate of connections to the system is expected to be slow for several years and the ultimate loading may never be reached.

It is felt that adequate storage capacity is available for the early years of operation. The need for additional storage capacity and/or additional alarm capabilities will be evaluated from time to time based on operating history. The DENR may require the installation of such additional apparatus at any time they are deemed necessary to ensure protection of the waters of the state.

6. Each pump circuit shall be equipped with a runningtime meter as a minimum means of measuring flows through the lift station. The use of more accurate flow measuring devices is encouraged.

BZ/lb