

### III PURPOSE & SCOPE

The purpose of this report is to provide an inventory of acid mine drainage (AMD) problems in the Pucketa Creek Drainage Basin which is part of the Allegheny River Basin. Information regarding the location, physical characteristics and quantity and quality of point sources is requisite to the development of a program to reduce or eliminate the harmful water quality effects of mine drainage.

The objectives of this report are to:

1. Describe the significance and impact of water quality impairment by coal mine drainage in the Pucketa Creek Drainage Basin.
2. Inventory of the sources of coal mine drainage in terms of salient characteristics and quality and quantity of discharge.
3. Identify the principal pollution sources in the basin.
4. Determine the nature of abandoned mining activity and prepare preliminary recommendations for abatement with first cut cost estimates.

Abating pollution from inactive mines is a task; the cost and success of which are difficult to predict with reasonable accuracy.

A preliminary and relatively short term survey, such as reported herein, results in limited qualitative conclusions. The chemical loadings of mine drainage parameters measured in the mine discharges and the pollutional effects of these loadings measured in the receiving streams are representative of the time of survey. These loading figures do not reflect permanent or established conditions and will exhibit widely varying rates during different hydrologic conditions. The significance of the acquired data is that it provides a preliminary basis for further studies. The recommendations leading to an action program of mine drainage pollution abatement stated in this report are based upon this data.