1.0 INTRODUCTION

1.1 Project Need and Description

The Delaware Department of Transportation (DelDOT) has proposed impacts to jurisdictional wetlands as part of the Bridge 918 on State Route (S.R.) 30 at Reynolds Pond Improvement project in Broadkiln Hundred, Sussex County, Delaware (Figure 1). In addition, DelDOT has impacted wetlands on prior project(s), and mitigation is required for past and proposed loss of wetlands. DelDOT has proposed a 1.07 ha (2.65 ac) area near Bridge 918 to create new wetlands to mitigate the losses. The new wetlands will be created by excavating and diking adjacent to the existing wetlands of Sowbridge Creek. The proposed wetland mitigation area measures approximately 220.0 m (721.8 ft) east-west by 35.0-55.0 m (114.8-180.5 ft) north-south, and is located on the southern edge of the Sowbridge Branch wetlands, approximately 304.8 m (1,000.0 ft) east of S.R. 30.

Federal funding is anticipated by DelDOT for this project. By identifying and assessing the archaeological resources which may be affected by the proposed wetland mitigation project, DelDOT assures compliance with federal legislation, including Section 106 of the National Historic Preservation Act of 1966, as amended in 1980 and 1992; the Federal-Aid Highway Act of 1966, as amended; the National Environmental Policy Act of 1969; and the Code of Federal Regulations: Advisory Council on Historic Preservation CFR 800. The *Guidelines for Architectural and Archaeological Surveys in Delaware* (Delaware State Historic Preservation Office [SHPO] 1993) were followed in preparing the project research design, methodology, and this report.

1.2 Definition of Areas of Potential Effects (APEs)

The Bridge 918 project has two APEs for archaeology (Photographs 1 and 2). The first is a wetland mitigation area, located approximately 304.8 m (1,000.0 ft) east of S.R. 30 and 61.0 m (200.0 ft) south of Sowbridge Branch (Figure 1; Photograph 1). The 1.07 ha (2.65 ac) APE includes all areas of potential excavation. The wetland mitigation APE includes gently sloping sideslopes and ridge noses overlooking the wetlands of Sowbridge Branch. The tree line serves as the northern limit of the APE, and represents the southern extent of the wetlands.

During a field view in Spring 2005, representatives from DelDOT and Skelly and Loy, Inc. determined that the entire proposed wetland mitigation area had a moderate to high

Photograph 1. Wetland mitigation area, facing west-northwest.

Photograph 2. Bridge replacement area, facing west-northwest.

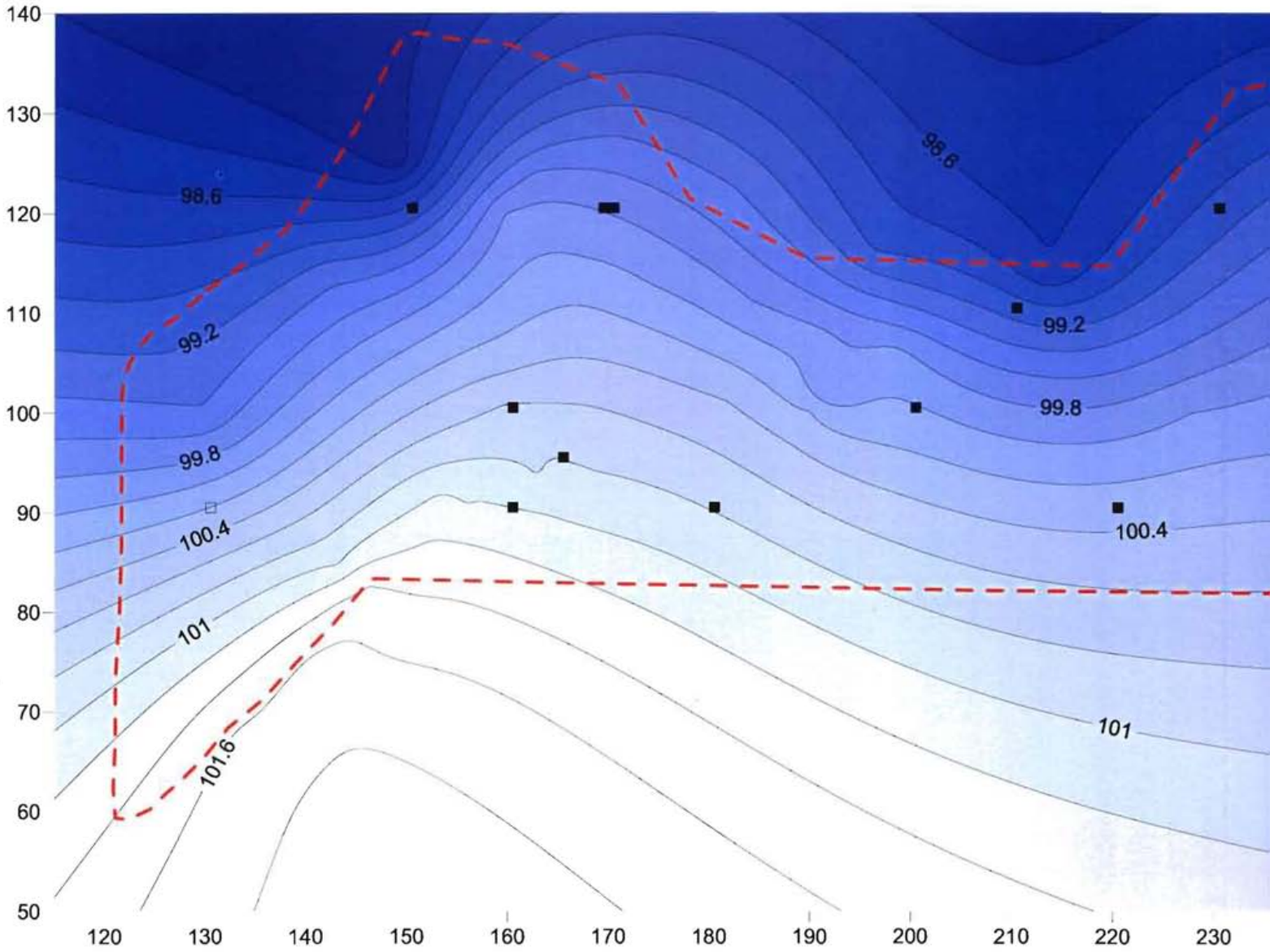
potential for pre-contact sites. This determination was based on the presence of well-drained soils in proximity to wetland resources. The Area of Potential Effects (APE) was defined as the area of proposed pond and dike excavations, plus a 6.1 m (20.0 ft) wide buffer to allow machine access to the work areas.

The second APE is 18.3 m (60.0 ft) by 45.7 m (150.0 ft) area centered on the existing bridge (see Photograph 2). This APE is the area that will be impacted by the proposed removal of the existing bridge and a remnant mill flume, by the installation of a new coffer dam and flume, and by the replacement of the bridge. Archaeological excavations of this APE will be conducted once construction begins, and the methods and results will be presented in a separate report. The historical research reported here was undertaken to help determine the likelihood that earlier mill remains are present beneath the existing flume.

1.3 Summary of Methods and Findings

This report includes the methods and results of the Phase I survey of the wetland mitigation APE (Figure 2). At the onset of fieldwork, the area was in sod and planted barley. An intensive Phase I archaeological study was conducted in April and May 2005, to determine if any archaeological sites were present and to evaluate, as feasible, the eligibility of any discovered sites for listing in the National Register of Historic Places (NRHP). The fieldwork included the plowing of most of the APE, surface collection with transit mapping of all finds, and the excavation of 21 1.0 x 1.0 m (3.3 x 3.3 ft) test units.

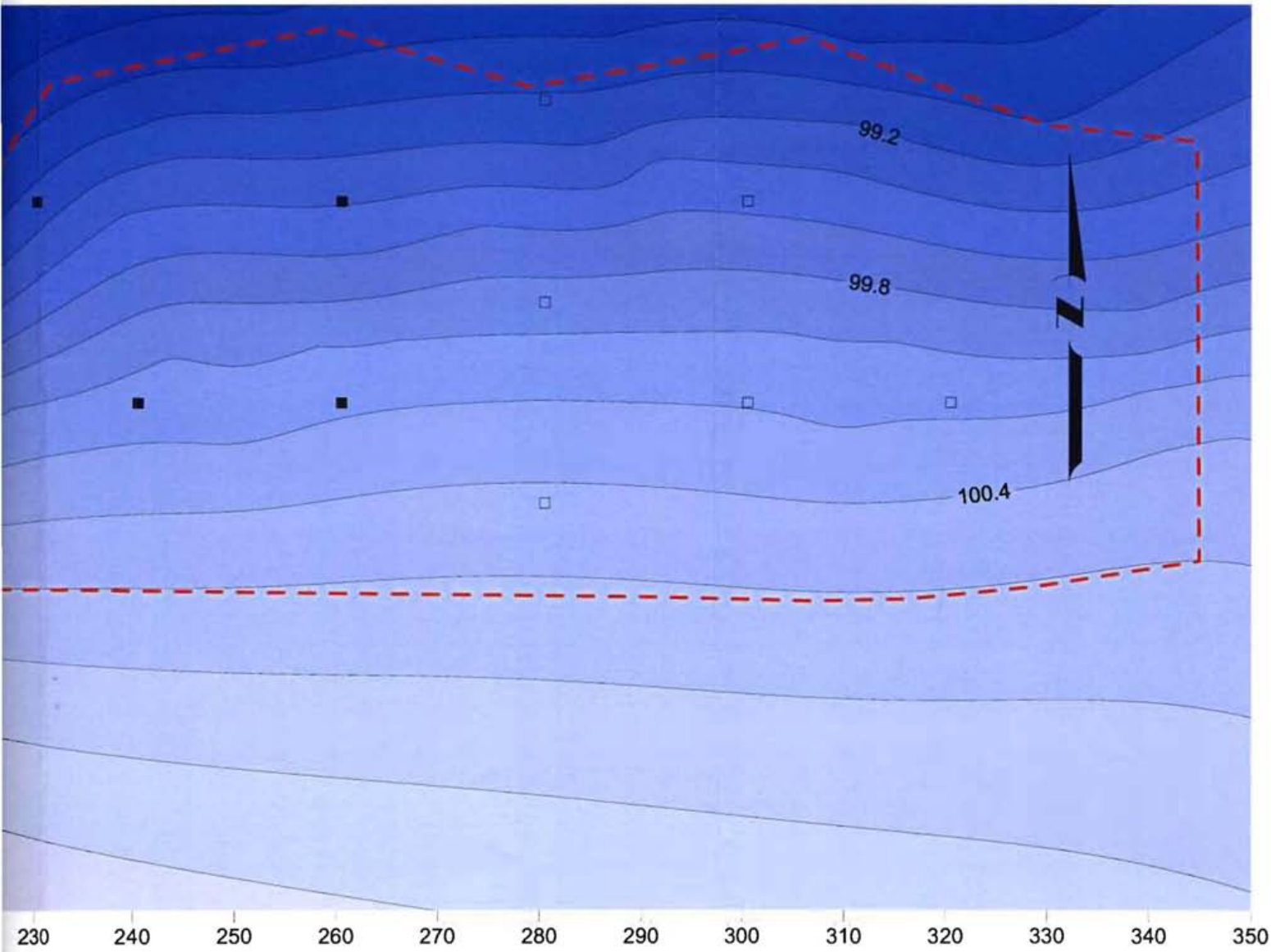
The survey documented the presence of a site (7S-C-97) with multiple pre-contact components. Two steatite-tempered sherds suggest an Early Woodland component, and numerous Mockley-like and Wolfe Creek-like sherds indicate a Middle Woodland occupation. Cultural material was limited to the plowzone and the upper portions of the underlying BA or E horizons. No cultural features were discovered. It is recommended that additional investigations be completed to provide a recommendation of eligible or not eligible for listing in the NRHP.



Positive 1m x 1m unit

Negative 1m x 1m unit

Area of Potential Effects



DELAWARE DEPARTMENT OF TRANSPORTATION

BRIDGE 918 ON S.R. 30
AT REYNOLDS POND
SUSSEX COUNTY

PLAN VIEW

FIGURE - 2

SKELLY AND LOY, INC.
CONSULTANTS IN
ENVIRONMENT - ENERGY
ENGINEERING - PLANNING