Maryland Historical Trust

Maryland Inventory of Historic Properties number: SM-516

Name: 18013/TURNER RD. OVER PERSIMMON CREEK

The bridge referenced herein was inventoried by the Maryland State Highway Administration as part of the Historic Bridge Inventory, and SHA provided the Trust with eligibility determinations in February 2001. The Trust accepted the Historic Bridge Inventory on April 3, 2001. The bridge received the following determination of eligibility.

MARYLAND HISTORICAL TRUST

Eligibility Recommended ___X____ Eligibility Not Recommended _____

Criteria: ____A ____B ____C ____D Considerations: ___A ___B ___C ___D ___E ___F ___G ___None

Comments:_____

_____

_____

Reviewer, OPS:_Anne E. Bruder_____ Date:__3 April 2001____

Reviewer, NR Program:__Peter E. Kurtze_____ Date:__3 April 2001____

MARYLAND INVENTORY OF HISTORIC BRIDGES
HISTORIC BRIDGE INVENTORY
MARYLAND STATE HIGHWAY ADMINISTRATION/
MARYLAND HISTORICAL TRUST

MHT No. SM-516

SHA Bridge No. 18013 Bridge name Turner Road over Persimmon Creek

LOCATION:
Street/Road name and number [facility carried] MD 6 (Turner Road)

City/town Cremona Vicinity X

County St. Mary's

This bridge projects over: Road ____ Railway ____ Water X Land ____

Ownership: State X County ____ Municipal ____ Other ____

HISTORIC STATUS:
Is the bridge located within a designated historic district? Yes ____ No X
National Register-listed district ____ National Register-determined-eligible district ____
Locally-designated district ____ Other ____

Name of district ____

BRIDGE TYPE:
Timber Bridge ____:
Beam Bridge ____ Truss -Covered ____ Trestle ____ Timber-And-Concrete ____

Stone Arch Bridge ____

Metal Truss Bridge ____

Movable Bridge ____:
Swing ____ Bascule Single Leaf ____ Bascule Multiple Leaf ____
Vertical Lift ____ Retractile ____ Pontoon ____

Metal Girder ____:
Rolled Girder ____ Rolled Girder Concrete Encased ____
Plate Girder ____ Plate Girder Concrete Encased ____

Metal Suspension ____

Metal Arch ____

Metal Cantilever ____

Concrete X:
Concrete Arch ____ Concrete Slab X Concrete Beam ____ Rigid Frame ____
Other ____ Type Name ____

DESCRIPTION:

Setting: Urban _____ **Small town** _____ **Rural** ____X_____

Describe Setting:

Bridge No. 18013 carries MD 6 over Persimmon Creek in St. Mary's County. MD 6 runs north-south, while Persimmon Creek flows west to east. The area around the bridge is partially developed with forested land to the north and residential lots to the south.

Describe Superstructure and Substructure:

Bridge No. 18013 over Persimmon Creek in St. Mary's County is a standard single span concrete slab bridge built in 1930. The clear span length is 20', the total bridge length is 23', and the bridge carries a clear roadway width of 27'. The superstructure, consisting of the slab, the roadway and the parapets, is in good condition. The concrete underdeck has a full-length longitudinal crack with efflorescence at the centerline, as well as general map cracking. The bituminous concrete surface has full-width transverse cracks at the approaches. The open parapets use a pieced railing design with an 11 open space to 1 expansion joint ratio with elevated end blocks. Overall the parapets have a weathered appearance, as seen in the exposure of aggregate material. W-beam guardrails were added to the roadway at an unknown date and attach to the parapets at the end blocks. The bridge is not currently posted.

The substructure consists of concrete abutments and wingwalls with molded chamfering. The abutments are 31' long with fine map cracking and minor scouring at the waterline. Rip rap protection was recommended for the abutments in 1995. The wingwalls are 10' long and flared at an approximate 60 degree angle to the roadway centerline. The wing faces have fine map cracking.

Discuss Major Alterations:

The only alteration has been the addition of w-beam guardrails to the roadway at an unknown date. These attach to the parapets at the end blocks.

HISTORY:

WHEN was the bridge built: 1930

This date is: Actual _____X_____ **Estimated** _____

Source of date: Plaque _____ **Design plans** _____ **County bridge files/inspection form** X_____

Other (specify) _____

WHY was the bridge built?

By 1930, Maryland's primary and secondary roads and bridges had become inadequate to the huge freight trucks and volume of passenger cars in use.

WHO was the designer?

State Roads Commission

WHO was the builder?

State Roads Commission

WHY was the bridge altered?

The bridge was altered in an effort to extend the life of the bridge.

Was this bridge built as part of an organized bridge-building campaign?

Yes, post World War I improvements to primary and secondary roads.

SURVEYOR/HISTORIAN ANALYSIS:

This bridge may have National Register significance for its association with:
A - Events _____ B- Person _____
C- Engineering/architectural character _____

Was the bridge constructed in response to significant events in Maryland or local history?
Reinforced concrete slab bridges are a twentieth century structure type, easily adapted to the need for expedient engineering solutions. Reinforced concrete technology developed rapidly in the early twentieth century with early recognition of the potential for standardized design. The first U.S. attempt to standardize concrete design specifications came in 1903-1904 with the formation of the Joint Committee on Concrete and Reinforced Concrete of the American Society of Civil Engineers.

Maryland's roads and bridge improvement programs mirrored economic cycles. The first road improvement of the State Roads Commission was a 7 year program, starting with the Commissions establishment in 1908 and ending in 1915. Due to World War I, the period from 1916-1920 was one of relative inactivity; only roads of first priority were built. Truck traffic resulting from war related factories and military installations generated new, heavy traffic unanticipated by the builders of the early road system. From 1920-1929, numerous highway improvements occurred in response to the increase in Maryland motor vehicles from 103,000 in 1920 to 320,000 in 1929, with emphasis on the secondary system of feeder roads which moved traffic from the primary roads built before World War I. After World War I, Maryland's bridge system also was appraised as too narrow and structurally inadequate for the increasing traffic , with plans for an expanded bridge program to be handled by the Bridge Division, set up in 1920. In 1920 under Chapter 508 of the Acts of 1920 the State issued a bond of $3,000,000.00 for road construction; the primary purpose of these monies was to meet the state obligations involving the construction of rural post roads. The secondary purpose of these monies was to fund (with an equal sum from the counties) the building of lateral roads. the number of hard surfaced roads on the state system grew from 2000 in 1920 to 3200 in 1930. By 1930, Maryland's primary system had been inadequate to the huge freight trucks and volume of passenger cars in use, with major improvements occurring in the 1930's. Most improvements to local roads waited until the years after World War II.

In 1930, the roadway width for all standard plan bridges was increased to 27 feet in order to accommodate the increasing demands of automobile and truck traffic (State Roads Commission 1930). The range of span lengths remained the same, but there were some changes designed to increase the load bearing capacities. The reinforcing bars increased in thickness. Visually, the 1930 design can be distinguished from its predecessors by the pierced concrete railing that was introduced at this time.

When the bridge was built and/or given a major alteration, did it have a significant impact on the growth and development of the area?
Although built following the post World War I construction phase, this bridge did not greatly effect the area surrounding it. The structure did not increase settlement or industry.

Is the bridge located in an area which may be eligible for historic designation and would the bridge add to or detract from the historic/visual character of the potential district?
No, this bridge is not located in an area which is eligible for historic designation.

Is the bridge a significant example of its type?
No, this structure is not a significant example of its type. This is not a significant application of a standard bridge plan.

Does the bridge retain integrity of important elements described in Context Addendum?
Yes, this bridge retains the integrity of its character defining elements.

Is the bridge a significant example of the work of a manufacturer, designer, and/or engineer and why?
No, this bridge is not a significant example of the work of the State Roads Commission.

Should the bridge be given further study before an evaluation of its significance is made?
No, this structure should not be given further study. Although it reflects the state's post war construction needs of an expanded secondary roads system, the bridge does not demonstrate any additional distinction or significance.

BIBLIOGRAPHY:

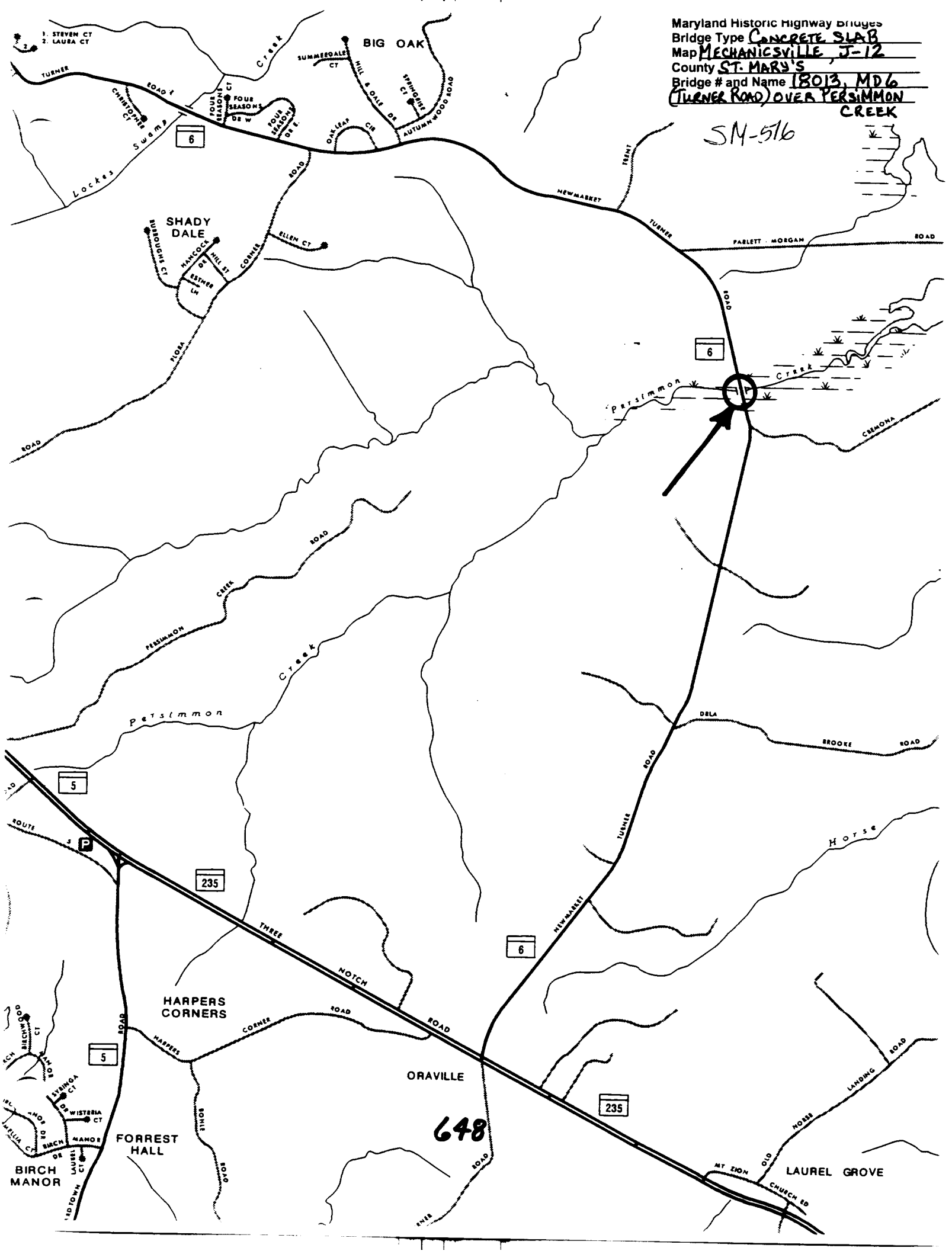
County inspection/bridge files _____ **SHA inspection/bridge files** X
Other (list):

SURVEYOR:

Date bridge recorded 8/11/95
Name of surveyor Timothy J. Tamburrino
Organization/Address P.A.C. Spero & Company,40 W. Chesapeake Avenue,Suite 412,Baltimore, Maryland 21204
Phone number 410-296-1635 **FAX number** 410-296-1670

Maryland Historic Highway Bridges
Bridge Type CONCRETE SLAB
Map MECHANICSVILLE, J-12
County ST. MARY'S
Bridge # and Name 18013, MD6 (TURNER ROAD) OVER PERSIMMON CREEK

SM-516



SM-516

1 OF 4

ST MARYS COUNTY

D. BHAUMIK

2-1-95

MARYLAND SHPO

MD 6 OVER PERSIMMON CREEK

LOOKING NORTH ON MD 6

(BRIDGE 16013)

SM-516

2 OF 4

ST MARYS COUNTY
D. BHAUMIK
2-1-95
MARYLAND SHPO
MD 6 OVER PERSIMMON CREEK
LOOKING EAST (UPSTREAM FACE)
(BRIDGE 15013)

3 OF 4

SM-516

ST MARYS COUNTY

D. BHAUMIK

2-1-95

MARYLAND SHPO

MD 6 OVER PERSIMMON CREEK

LOOKING SOUTH ON MD 6

(BRIDGE 1303)

SM-516

ST MARYS COUNTY

D. BHAUMIK

2-1-95

MARYLAND SHPO

MD 6 OVER PERSIMMON CREEK

LOOKING WEST (DOWNSTREAM FACE)

(BRIDGE 13013)