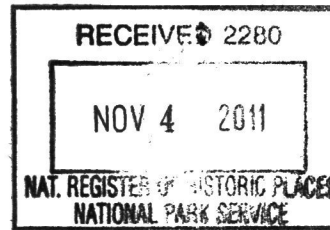


United States Department of the Interior  
National Park Service

National Register of Historic Places  
Registration Form



OMB No. 10024-0018

931

1. Name of Property

historic name Winfield Toll Bridge

other names/site number Ross Booth Memorial Bridge

2. Location

street & number West Virginia Route 34, Milepost 21.34

☐ not for publication

city or town Winfield

☐ vicinity

state West Virginia code WV county Putnam code 079 zip code 25213

3. State/Federal Agency Certification

As the designated authority under the National Historic Preservation Act, as amended, I hereby certify that this ☒ nomination ☐  
request for determination of eligibility meets the documentation standards for registering properties in the National Register of Historic  
Places and meets the procedural and professional requirements set for in 36 CFR Part 60. In my opinion, the property ☒ meets ☐  
does not meet the National Register criteria. I recommend that this property be considered significant  
☐ nationally ☒ statewide ☒ locally. (See continuation sheet for additional comments.)

Susan M. Pierce DSHPO, 10/25/11  
Signature of certifying official/Title Date

West Virginia State Historic Preservation Office  
State or Federal agency and bureau

In my opinion, the property ☐ meets ☐ does not meet the National Register criteria. (☐ See Continuation sheet for additional comments.)

\_\_\_\_\_  
Signature of certifying official/Title Date

\_\_\_\_\_  
State or Federal agency and bureau

4. National Park Service Certification

I hereby certify that the property is:

- ☒ entered in the National Register.  
☐ See continuation sheet  
☐ determined eligible for the  
National Register.  
☐ See continuation sheet  
☐ determined not eligible for the  
National Register.  
☐ removed from the National  
Register.  
☐ other, (explain:) \_\_\_\_\_

Edson H. Beall  
Signature of the Keeper

Date of Action

12.15.11

Winfield Toll Bridge  
Name of Property

Putnam County, West Virginia  
County and State

## 5. Classification

Ownership of Property	Category of Property	Number of Resources within Property	
<input type="checkbox"/> private	<input type="checkbox"/> building(s)	Contributing	Noncontributing
<input type="checkbox"/> public-local	<input type="checkbox"/> district		
<input checked="" type="checkbox"/> public-State	<input type="checkbox"/> site		
<input type="checkbox"/> public-Federal	<input checked="" type="checkbox"/> structure		
	<input type="checkbox"/> object		
			buildings
			sites
		1	structures
			objects
		1	Total
Name of related multiple property listing		Number of Contributing resources previously listed in the National Register	

## 6. Function or Use

Historic Functions	Current Functions
TRANSPORTATION/road-related (vehicular)	TRANSPORTATION/road-related (vehicular)

## 7. Description

Architectural Classification	Materials
Other: three-span cantilever Warren through-truss	foundation CONCRETE
	walls
	roof
	other METAL: steel

Narrative Description  
See Continuation Sheets



United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 7 Page 1

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### LOCATION and SETTING

The Winfield Toll Bridge is located over the Kanawha River in the town of Winfield, which is the Putnam County seat. The Kanawha River is a major navigable waterway and is lined on both sides with agricultural land and rolling hills. Winfield is a small town with a population of approximately 2000. The intersection of WV 34 and US Highway 35, which has been upgraded to a four-lane highway in this vicinity, is just south of the bridge, making this an active commercial area, with strip malls, convenience stores and fast food restaurants located near the bridge.

### DESCRIPTION

The structure which spans the Kanawha River was built in 1955 by John F. Beasley Construction Company and renovated in 2010 by Orders Construction Company. The structure consists of a three-span cantilever through-truss flanked to the south by four 76'-0" long continuous composite wide flange beam spans with the majority of Span Five being a new composite plate girder span 77'-5" long which is spliced to the continuous wide flange beams on the forward side of Pier Four. These plate girders are also coped up at their north end and run continuous over Pier Five and are framed (bolted to) the floorbeam at panel point one of the through-truss span. The north end of the truss is flanked by two new composite continuous plate girder spans 58'-2" and 33'-9" in length. The cantilever through-truss consists of two anchor spans each 245'-0" in length and the main span 462'-0" in length between pier centerlines. The main span is comprised of two 128'-4" cantilever arms and a 205'-4" suspended span. Truss members are made up of built-up or rolled steel sections. All truss connections are riveted except for the hangers and false chord members, which are pinned, with the exception of any new retro-fitted areas which are bolted. The truss floor system consists of four longitudinal steel stringers that frame into transverse steel floorbeams at each lower panel point of the truss except at panel points L0 and L38 where the four new plate girders of Spans Five and Nine run continuous over Piers Five and Eight and framed (bolted to) the floorbeams at panel points One and Thirty-seven of the through-truss span.

The structure is supported by reinforced concrete stub abutments and reinforced concrete rigid frame piers. The abutments and approach span piers are founded on steel piling, while the piers supporting the truss spans are founded on shale and gray sandstone. The approach span piers are double column open type frame piers, while the truss span piers have partial height concrete web walls.

Winfield Toll Bridge  
Name of Property

Putnam County, West Virginia  
County and State

## 8. Statement of Significance

### Applicable National Register Criteria

### Levels of Significance (local, state, national)

Local, State

☒ **A** Property is associated with events that have made a significant contribution to the broad patterns of our history.

### Areas of Significance

ENGINEERING

TRANSPORTATION

☐ **B** Property is associated with the lives of persons significant in our past.

☒ **C** Property embodies the distinctive characteristics of a type, period, or method of construction or represents the work of a master, or possesses high artistic values, or represents a significant and distinguishable entity whose components lack individual distinction.

### Period of Significance

1955-1961

☐ **D** Property has yielded, or is likely to yield, information important in prehistory or history.

### Criteria Considerations

### Significant Dates

1955

Property is:

☐ **A** owned by a religious institution or used for religious purposes.

### Significant Person

N/A

☐ **B** removed from its original location.

☐ **C** birthplace or grave of a historical figure of outstanding importance.

### Cultural Affiliation

N/A

☐ **D** a cemetery.

☐ **E** a reconstructed building, object, or structure.

☐ **F** a commemorative property

☐ **G** less than 50 years of age or achieved significance within the past 50 years.

### Architect/Builder

Harrington and Cortelyou, Inc.; John F. Beasley Construction Co.; Vincennes Steel Company

### Narrative Statement of Significance:

See Continuation sheets

## 9. Major Bibliographical References

### Bibliography

#### Previous documentation on file (NPS):

- ☐ preliminary determination of individual listing (36 CFR 67) has been requested
- ☐ previously listed in the National Register
- ☐ Previously determined eligible by the National Register
- ☐ designated a National Historic Landmark
- ☐ recorded by Historic American Buildings Survey # \_\_\_\_\_
- ☐ recorded by Historic American Engineering \_\_\_\_\_

#### Primary location of additional data:

- ☒ State Historic Preservation Office
- ☒ Other State Agency
- ☐ Federal Agency
- ☐ Local Government
- ☐ University
- ☐ Other

Name of repository:

West Virginia Division of Highways

Record # 40-34-21.34

United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 8 Page 2

### STATEMENT of SIGNIFICANCE

The Winfield Toll Bridge is locally significant under *Criterion A: Transportation* for providing a major new transportation link across the Kanawha River between Winfield and Red House. Prior to the construction of the bridge, the only way to cross the Kanawha River between Nitro and Point Pleasant, a distance of approximately 45 miles, was by ferry. The bridge represents evolving transportation modes from river navigation to automobile and served as a badly-needed direct connection between Winfield, the county seat and economic center of the area, and surrounding small towns. Winfield Toll Bridge is also eligible on a state level under *Criterion C: Engineering* for its method of construction and structure type. The continuous cantilever truss design was developed in the early twentieth century and allowed bridges to span greater distances, particularly over the Kanawha and Ohio rivers. Winfield Toll Bridge is one of seven cantilever through-trusses in West Virginia, and is exemplary in the use of this uncommon technology to provide better access to local residents. The period of significance ranges from the bridge's opening in 1955 through 1961, which is the National Register's 50-year cutoff and represents the bridge's continual significance as a transportation link.

### HISTORY

#### *Historical Context and Background*

The history of the town of Winfield is intertwined with that of the Kanawha River and the waterway's boons and challenges to transportation. The Kanawha River links the Ohio River to the state capitol of Charleston and in the early development of the nation's transportation system, provided a water link between the Ohio River and the James River and Kanawha Turnpike at Charleston. Keel boats and other small vessels navigated the river prior to 1820; several difficult rapids, including the notorious Red House Shoals, prevented larger boats from making the journey. The first attempt at navigating the Kanawha from the Ohio to Charleston was made by the steamboat *Robert Thompson* in 1819, but the boat had to turn back at Red House Shoals. However, the *Albert Donnally* succeeded in making the trip the following year, and thus began a new era of river traffic and economic development for the area. Winfield quickly developed into a steamboat port, since it was very accessible and accommodating for the boat industry.

Putnam County was formed on March 11, 1848 from parts of Kanawha, Cabell, and Mason counties (Wintz:33). After the formation of the county, ten justices were appointed. The justices met at the house of Talleyrand P. Brown, which was located near Red House Shoals, and established the county seat of Winfield, named after General Winfield Scott, a Mexican War hero and one time Whig presidential candidate ("Coming In..."). The land for the courthouse was given by Charles Brown, who operated the ferry across the river. Winfield became a strategic control point during the Civil War due to the location of the steamboat channel off the town's riverbank. The town was officially incorporated on February 21, 1868.

United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 8 Page 3

In the mid 1920s the town began to decline. People were now using automobiles for transportation, and since the main road through town was still not paved, travel was difficult. In 1928, adding to the adversity, a fire destroyed a block of the town including the bank, newspaper office, and the post office. Concurrent with the national economic depression, in 1931 the bank failed and many people lost their savings (Wintz:185). This led to the economic decline of Winfield; however, the town took a better turn when Winfield locks and dam were constructed from 1934-1936. This was a significant time period for Winfield. Due to a jump in economic growth resulting from the locks and dam, people began migrating to the area and small businesses began to set up shop again.

### SIGNIFICANCE

#### *Transportation Significance*

In December 1957, the Winfield Toll Bridge was opened to traffic, which ended the 138-year era of the ferryboat that transported people and goods over the Kanawha River for access between WV Rt. 34 and WV Rt. 35 ("New Putnam..."). According to "The Charleston Gazette", dated July 9<sup>th</sup>, 1953, the bridge location was to be between Bridge and Waters Street and connect with Route 17 between the Fire Station and the Fountain. On the Red House side, the approaches were to be located over and beyond the New York Central Tracks (Winfield Bridge). Several hundred people showed up for the bridge dedication ceremony on November 30, 1957. Winfield Mayor Harold Bright cut the ribbon in the dedication ceremony and praised the current Governor Underwood and previous Governors Marland and Patterson for their hard work for making the new bridge a reality. After working approximately 40 years toward this goal, the citizens of Putnam County were excited to see it become a reality. Construction of the bridge occurred under the 1927 Oldfield Act; only a handful of bridges were constructed under this act. The act provided federal aid to be used to construct toll bridges owned and operated by states or their political subsidiaries. In the case of the Winfield toll bridge, this funding paid for half of the cost of the bridge, and the state paid the remaining amount ("Dedication Honors..."). The expectation was that the state would get the other half back in tolls once the bridge was paid off and became free. Tolls were 20 cents for one automobile and its occupants (Ibid). The building of Winfield Toll Bridge, in part, helped the development of town.

Since that time, Winfield has continued to grow. The construction of the Winfield Toll Bridge in 1955 made access easier and more business introduced itself to the area, resulting in sub-divisions and population growth. In addition, Winfield Road (WV 17) was renamed US Route 35 sometime between 1958 and 1989 and more recently US 35 was changed to WV 817, due to the construction of an four-lane upgraded US 35. Putnam County and the surrounding area is now part of the Huntington-Charleston metropolitan area and includes housing, businesses, and services to support the population.

The Winfield Toll Bridge was renamed in honor of Ross Booth in June of 2006. Mr. Booth worked as a carpenter on the bridge and also helped with the construction of many bridges located in the western section of I-64. It was on one of those bridges that Mr. Booth was injured, thus ending his career as a carpenter.

United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 8 Page 4

### *Engineering Significance*

Winfield Toll Bridge is a cantilever through truss. This type of bridge uses spans that cantilever out a distance over the piers; the weight of the fully supported end spans hold up the center cantilevered portions that meet in the middle from both sides. This technology was developed in the 1870s for railroads, but only came into more frequent use for highways after World War I. As of 2011, there are seven cantilever through-trusses in West Virginia. The oldest extant is the Dick Henderson Bridge over the Kanawha River between Nitro and St. Albans, built in 1934. The other cantilever through-trusses were built primarily in the 1950s. The West Virginia Statewide Historic Bridge Survey currently being conducted (as of 2011) by the West Virginia Division of Highways considers both a main span of greater than 200' and the cantilever design to be significant unusual design elements based on the historic context prepared for the survey. Under these criteria, Winfield Toll Bridge has statewide significance for its engineering design. Indeed, the use of cantilever through-trusses for highway bridges indicates major large-scale projects over substantial waterways such as the Kanawha and Ohio Rivers. These projects were no small feat, as indicated by their relative rarity. Providing crossings over these large rivers was essential for economic development, interstate commerce and regional travel, and Winfield Toll Bridge was part of the continued improvement of regional transportation links.

The Winfield Toll Bridge was designed by Harrington and Cortelyou, Inc. It was constructed in 1955 by the John F. Beasley Construction Company and the Vincennes Steel Corporation fabricated the steel. Harrington and Cortelyou was founded in 1928 in Kansas City, Missouri by John Lyle Harrington, a mechanical engineer and Frank M. Cortelyou, Sr. Beginning in 1895, Harrington worked with John Alexander Low Waddell, one of the country's most prolific bridge designers at the turn of the century and became business partners with Waddell in 1907. The pair became known for designing vertical lift bridges. After the partnership ceased in 1914, Harrington formed the firm of Harrington, Howard and Ash before finally partnering with longtime colleague Cortelyou in 1928. The firm continued to specialize in moveable bridges and designed over 40. Harrington died in 1942, but the firm continued under the leadership of Cortelyou, who retired in 1968 and died in 1976. The firm was acquired in 2010 by Burns and McDonnell.

The John F. Beasley Construction Company was founded in Dallas in 1947. Little additional information could be found regarding this company. The Vincennes Steel Corporation began in Vincennes, Indiana in 1898 as the Vincennes Bridge Company. It was established by three school teachers, Frank L. Oliphant, John T. Oliphant and Jacob L. Riddle. For the first several decades of its existence, the company specialized in the design and construction of metal through- and pony trusses, primarily for counties and towns in the Midwest. The company was able to expand into the Southeast due to its competitive pricing. The growth of state highway transportation systems in the 1920s also benefitted the company's growth and it was one of the few bridge companies that continued to provide design, fabrication and construction services in the post World War I era. It was reorganized in 1932 as the Vincennes Steel Corporation and continued to grow into the



United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 8 Page 5

1950s, participating in the construction of a great many bridges, large and small, in several states. The company was acquired in 1956 by Industrial Enterprises, Inc.

### *Integrity*

The Winfield Toll Bridge was renovated by the West Virginia Division of Highways in 2010. At that time, as a result of the environmental review process, it was determined eligible for the National Register of Historic Places. Care was taken to preserve the significant historic characteristics of the bridge, in particular its truss configuration. A replacement pedestrian railing was selected that resembled the original. The following work was completed as part of the renovation project.

- Replaced selected stringers (longitudinal floor system)
- Replaced selected floor beams (transverse floor system beams)
- Replaced selected bearings
- Deck replacement
- Cleaning and painting of the existing truss to resemble the original paint color
- Sidewalk was added with new pedestrian railing
- Installed a redundant hanger system for the suspended middle span of the bridge
- Substructure work on the abutments and piers

These and other general repairs and isolated replacement of parts are a common part of a structure's life, and allow the bridge to continue functioning in its intended purpose, and thus do not compromise the structure's integrity. The overall design of the truss and its continued structural function as a cantilever truss remain intact and are the essential aspects of integrity that convey the bridge's significance under Criterion C. Its location and setting are the same, as well as its scale in relation to its surroundings, and thus it still conveys its significance as a transportation link under Criterion A.

### SUMMARY

Winfield Toll Bridge is eligible at the local level under Criterion A for providing a major new transportation link across the Kanawha River between the Putnam county seat of Winfield and the surrounding area. Prior to its construction, the river could only be crossed by ferry for a distance of over 40 miles. Furthermore, as one of seven cantilever through-trusses in West Virginia, Winfield Toll Bridge is eligible at the state level as a significant example of this innovative engineering technique in the state. This type of structure was constructed for large-scale projects requiring long spans. Its period of significance is 1955 to 1961.

United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 9 Page 6

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United States Department of the Interior  
National Park Service

## National Register of Historic Places Continuation Sheet

Section number 9 Page 7

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Winfield Toll Bridge  
Name of Property

Putnam County, West Virginia  
County and State

## 10. Geographical Data

Acreage of Property <1 acre

### UTM References

1 17 421710 4265559  
Zone Easting Northing  
2

3  
Zone Easting Northing  
4

☐ See continuation sheet

### Verbal Boundary Description

See Continuation Sheets

### Boundary Justification

See Continuation Sheets

## 11. Form Prepared By

name/title Courtney Fint  
organization West Virginia Division of Highways date June 8, 2011  
street & number Bldg. 5 Room 450, 1900 Kanawha Blvd. East telephone 304-558-7421  
city or town Charleston state WV zip code 25305

## Additional Documentation

Submit the following items with the completed form:

### Continuation Sheets

#### Maps

- A USGS map (7.5 or 15 minute series) indicating the property's location
- A Sketch map for historic districts and properties having large acreage or numerous resources.

#### Photographs

- Representative black and white photographs of the property.
- CD with electronic images if digital photographs.

#### Floorplans for individual listings

#### Additional items

(Check with the SHPO or FPO for any additional items.)

## Property Owner

name West Virginia Division of Highways (attn: Gregory Bailey)  
street & number Building 5 State Capitol Complex, 1900 Kanawha Blvd. East telephone 304-558-2885  
city or town Charleston state WV zip code 25305

**Paperwork Reduction Act Statement:** This information is being collected for applications to the National Register of Historic Places to nominate properties for listing or determine eligibility for listing, to list properties, and to amend existing listing. Response to this request is required to obtain a benefit in accordance with the National Historic Preservation Act, as amended (16 U.S.C. 470 *et seq.*)

**Estimated Burden Statement:** Public reporting burden for this form is estimated to average 18.1 hours per response including time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding this burden estimate or any aspect of this form to the Chief, Administrative Services Division, National Park Service, P. O. Box 37127, Washington, DC 20013-7127; and the Office of Management and Budget, Paperwork Reductions Projects (1024-0018), Washington, DC 20303.

Winfield Toll Bridge

Name of Property

Putnam County, West Virginia

County and State

**United States Department of the Interior**

National Park Service

# **National Register of Historic Places**

## **Continuation Sheet**

Section number 10 Page 8

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### **VERBAL BOUNDARY DESCRIPTION**

The boundary for Winfield Toll Bridge extends along the material edges of the bridge between the end joints of the outer spans a distance of 1427' in length and a width of approximately 35'.

### **BOUNDARY JUSTIFICATION**

The boundary encloses the superstructure, piers and abutments of the Winfield Toll Bridge.

Winfield Toll Bridge

Name of Property

Putnam County, West Virginia

County and State

**United States Department of the Interior**

National Park Service

# National Register of Historic Places

## Continuation Sheet

Section number      Photos      Page      9

---

Name of Property: Winfield Toll Bridge

City or Vicinity: Winfield

County: Putnam County

State: WV

Name of Photographer: Sondra Mullins

Date of Photographs: January 2011

Location of Original Digital Files: Building 5, Room 450, 1900 Kanawha Blvd. E, Charleston, WV 25305

Photo 1 of 3

WV\_PutnamCounty\_WinfieldTollBridge\_0001

Overall view of truss from Winfield shore, downstream side.

Photo 2 of 3

WV\_PutnamCounty\_WinfieldTollBridge\_0002

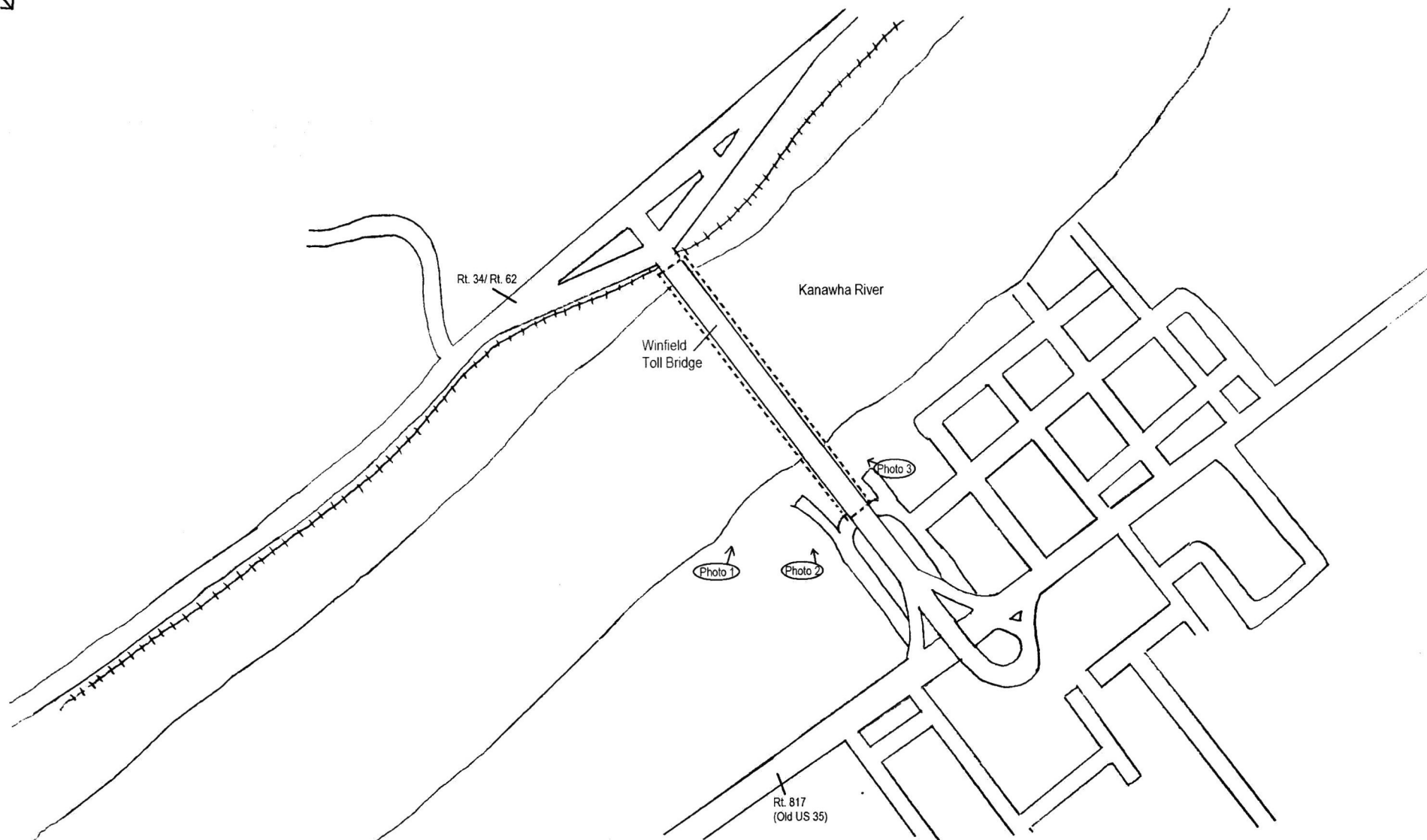
View of abutments, railing and approach from Winfield shore, downstream side.

Photo 3 of 3

WV\_PutnamCounty\_WinfieldTollBridge\_0003

Oblique view of truss from Winfield shore, upstream side.

Winfield Toll Bridge  
Winfield, Putnam County, West Virginia  
----- National Register boundary  
Photo 1 Photo vantage points



UNITED STATES DEPARTMENT OF THE INTERIOR  
NATIONAL PARK SERVICE

NATIONAL REGISTER OF HISTORIC PLACES  
EVALUATION/RETURN SHEET

REQUESTED ACTION: NOMINATION

PROPERTY Winfield Toll Bridge  
NAME:

MULTIPLE  
NAME:

STATE & COUNTY: WEST VIRGINIA, Putnam

DATE RECEIVED: 11/04/11 DATE OF PENDING LIST: 11/29/11  
DATE OF 16TH DAY: 12/14/11 DATE OF 45TH DAY: 12/20/11  
DATE OF WEEKLY LIST:

REFERENCE NUMBER: 11000931

REASONS FOR REVIEW:

APPEAL: N DATA PROBLEM: N LANDSCAPE: N LESS THAN 50 YEARS: N  
OTHER: N PDIL: N PERIOD: N PROGRAM UNAPPROVED: N  
REQUEST: N SAMPLE: N SLR DRAFT: N NATIONAL: N

COMMENT WAIVER: N

☒ ACCEPT ☐ RETURN ☐ REJECT 12.15.11 DATE

ABSTRACT/SUMMARY COMMENTS:

**Entered in  
The National Register  
of  
Historic Places**

RECOM./CRITERIA \_\_\_\_\_

REVIEWER \_\_\_\_\_ DISCIPLINE \_\_\_\_\_

TELEPHONE \_\_\_\_\_ DATE \_\_\_\_\_

DOCUMENTATION see attached comments Y/N see attached SLR Y/N

If a nomination is returned to the nominating authority, the nomination is no longer under consideration by the NPS.



WV - Putnam County - Winfield Toll Bridge - 0001





WV\_ Putnam County\_ Winfield Toll Bridge\_ 0002

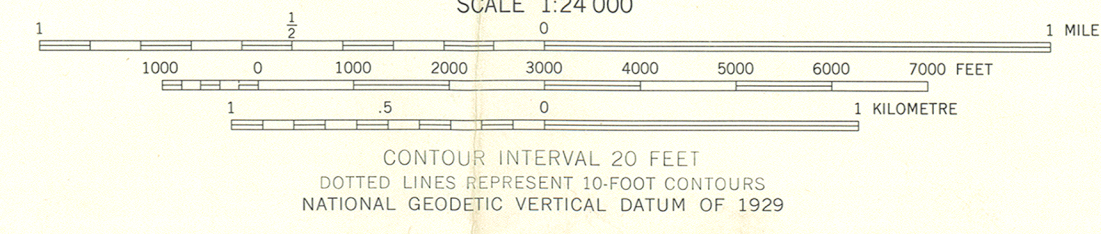
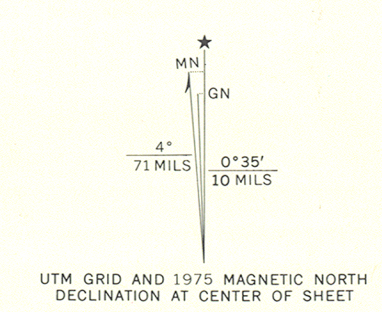


WV- Putnam County- Winfield Toll Bridge \_0003

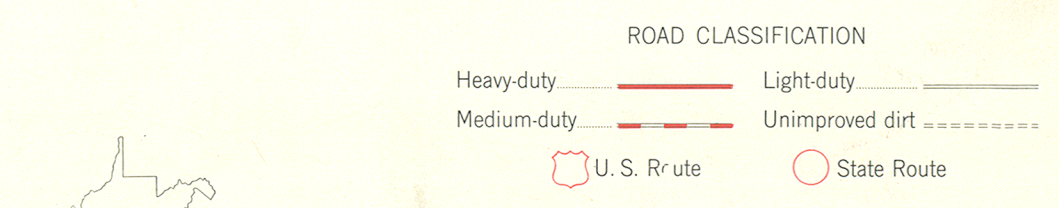




Mapped, edited, and published by the Geological Survey  
Control by USGS, USC&GS, and USCE  
Topography from aerial photographs by photogrammetric methods  
Aerial photographs taken 1956-1957. Field check 1958  
Polyconic projection. 1927 North American datum  
10,000-foot grid based on West Virginia coordinate system,  
south zone  
1000-metre Universal Transverse Mercator grid ticks,  
zone 17, shown in blue  
Fine red dashed lines indicate selected fence and field lines  
visible on aerial photographs. This information is unchecked  
Unlabeled wells are gas wells  
Unchecked elevations are shown in brown  
Revisions shown in purple compiled from aerial photographs  
taken 1975. This information not field checked



THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS  
FOR SALE BY U.S. GEOLOGICAL SURVEY, RESTON, VIRGINIA 22092  
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

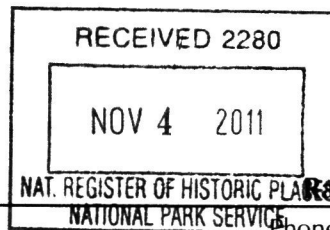


WINFIELD, W. VA.  
SW 1/4 WINFIELD 15' QUADRANGLE  
N 3830-W 8152.5/7.5  
1958  
PHOTOREVISED 1975  
AMS 4661 III SW-SERIES V854

WINFIELD  
TOLL BRIDGE  
UTM REFERENCE  
ZONE 17  
E: 421710  
N: 4265559

490





**The Culture Center**  
1900 Kanawha Blvd., E.  
Charleston, WV 25305-0300

**Randall Reid-Smith, Commissioner**  
Phone 304.558.0220 • www.wvculture.org  
Fax 304.558.2779 • TDD 304.558.3562  
EEO/AA Employer

October 24, 2011

Ms. Carol Shull  
Interim Keeper, National Register of Historic Places  
National Park Service 2280  
National Register of Historic Places  
1201 "I" (eye) Street, NW  
Washington D.C. 20005

Dear Ms. Shull:

For your review, we are submitting the following National Register of Historic Places registration forms:

*Capon Lake Whipple Truss Bridge, Hampshire County*  
*Winfield Toll Bridge, Putnam County*

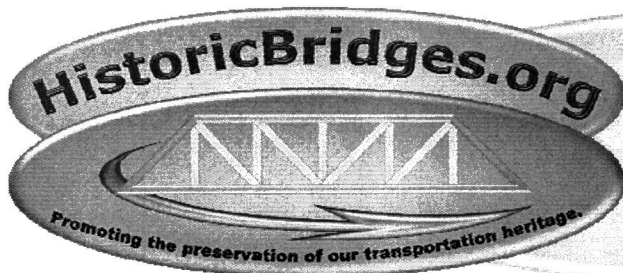
The enclosed nominations have been approved by the West Virginia Archives and History Commission in accordance with 36 CFR, Part 60. Should you have any questions please contact National Register Coordinator, Erin Riebe, at 304.558.0240.

Sincerely,

A handwritten signature in black ink that reads "Susan M. Pierce". The signature is fluid and cursive.

Susan M. Pierce  
Deputy State Historic Preservation Officer

enclosures



**Nathan Holth**  
5371 Walker Road  
North Street, MI 48049

269-290-2593  
nathan@historicbridges.org

**December 1, 2011**

Paul Loether  
National Register Chief  
National Register of Historic Places,  
National Park Service,  
1849 C St. NW., MS 2280, Washington, DC 20240

Subject: Winfield Toll Bridge (11000931) and South Branch Bridge (11000929) National Register Nominations

Dear Mr. Loether:

My intent is for this letter to be submitted as my comments regarding the proposed listing of the following two bridges in West Virginia:

1. Winfield Toll Bridge, WV 34 mi. 21.34, Winfield, 11000931. Located in Putnam County.
2. South Branch Bridge, WV 259 N. of jct. Cty. Rd. 16, Capon Lake, 11000929. Located in Hampshire County.

While it bears acknowledgement that I am a private citizen not affiliated with any organization or agency, and neither an engineer or certified bridge inspector, I do want to comment that I have visited and closely looked at over 2100 old and historic bridges in North America, and I have worked with, watched, and learned from many professionals in the historic bridge world including engineers, craftsmen/fabricators, and historians. I have become familiar with a rather wide variety of aspects of historic bridges and their preservation as I have worked to develop one of the largest historic bridge websites on the internet, [www.historicbridges.org](http://www.historicbridges.org).

I strongly support the proposal to list both of the above listed bridges in the National Register of Historic Places.

The Winfield Toll Bridge appears to be an example of a significant and increasingly rare bridge type. Generally reserved for long-span river crossings, riveted cantilever truss bridges like the Winfield Toll Bridge are among the largest and most iconic of bridges in the United States. Due to construction costs, the number of bridges that cross a large river is generally smaller than the number of bridges that cross small rivers. Since cantilever bridges are typically crossings for large rivers, the total number of existing cantilever truss bridges is relatively small. To make matters worse, Riveted cantilever truss bridges have in recent years faced an alarming rate of demolition. Constructed in 1955, the Winfield Toll Bridge is a later example of a riveted cantilever truss bridge. Bridges of this type were first built in the late 19<sup>th</sup> Century and became increasingly popular in the first few decades of the 20<sup>th</sup> Century. Nearly all of the 19<sup>th</sup> Century examples were replaced years ago, and today it is the bridges from the 1920s through the 1940s that are being replaced at a rapid rate today nationwide.

Earlier significant riveted cantilever truss bridges in and along West Virginia's borders have been or are to be replaced in the immediate future. These include:

- Kanawha River on Center Street in St. Albans, Built 1934, Demolition/Replacement Planned
- Pomeroy-Mason Bridge, Ohio River, Built 1928, Demolished/Replaced 2007
- Bellaire Bridge, Benwood, WV, Built 1926, Demolition/Replacement Planned

The loss of these bridges leaves the Winfield Toll Bridge as one of the oldest of the very small number of surviving highway cantilever truss bridges in West Virginia. Because of the loss of the aforementioned earlier examples, the 1955 Winfield Toll Bridge has, in my opinion, gained historic and technological significance as a representative example of a complex and noteworthy bridge type. Like most cantilever truss bridges, the Winfield Toll Bridge's size and complex truss configuration make the bridge an example of a significant engineering achievement. It also makes use of historical construction and fabrication techniques, particularly the use of rivets to compose built-up beams. The bridge appears to retain good historic integrity with no major alterations apparent. It is my opinion that this bridge should be listed in the National Register of Historic Places.

The South Branch Bridge is an extremely old and rare example of a pin-connected Whipple (Double-Intersection Pratt) through truss that also has several unusual and distinctive construction details. The bridge's trusses are listed as being originally built in 1874, and I found a source that suggested the bridge may have been moved to its current location in 1938. The potential relocation of this bridge, particularly so many decades ago, in my opinion does not disqualify the bridge for listing in the National Register of Historic Places. Pin-connected truss bridges were noted for the ease in which they could be disassembled and relocated, a unique trait not shared by most other bridge types. It was common many decades ago, when they became insufficient for their original location, to relocate and reuse pin-connected truss bridges at other locations where the bridge could still be useful. This is part of their history.

Nationwide, only a very small number of metal truss bridges date to before 1880. The South Branch Bridge's 1874 construction date thus places it among the oldest surviving metal truss bridges in the county. In addition, bridges built before 1880 were built in a period of experimentation and development of the metal truss bridge in the United States that tapered off by the early 1880s as builders gravitated toward more reliable standardized designs. During this period of experimentation, different builders experimented with a variety of creative and unusual designs, from the overall truss design down to specific construction details. The South Branch Bridge displays some of these unusual construction details. The composition of the built-up top chord and end post follows an unusual design. The use of "threaded rod with nut" connections on the top chord are also non-standard truss details. At the same time, the bridge displays some of the details that would continue to be seen in the more standardized trusses of the 1880s. These details include the use of traditional pin connections on the bottom chord, as well as the overall Whipple truss configuration.

As a result, the South Branch Bridge is historically and technologically significant because it documents the period of transition from experimentation to standardization of metal truss bridge construction in the United States. In addition, the bridge's Whipple truss configuration, generally reserved for spans in excess of 140 feet, (the Single Intersection Pratt truss was usually used for shorter spans) is today a rare truss configuration both nationwide and in West Virginia.

I would be happy to discuss my comments further if there are any questions or concerns.

Sincerely,

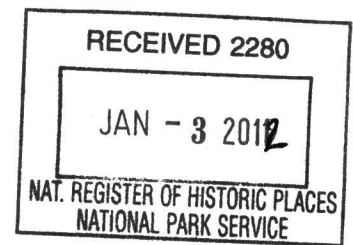


Nathan Holth

Author/Webmaster, [HistoricBridges.org](http://HistoricBridges.org)



The Rotary Club of Putnam County  
P O Box 654  
Scott Depot, WV 25560-0654



December 20, 2011

National Register of Historic Places  
National Park Service  
1849 C St NW, MS 2280  
Washington, DC 20240

This letter is written in support of the Winfield Bridge in West Virginia being included on the National Register of Historic Places.

Our Rotary Club is a County Club and provides service opportunities for business and professional people for all across the county. We also support activities that reflect the pride of our communities and its citizens. We provide a thesaurus for each sixth grader (approximately 800 per year) and offer scholarships to local high school students. We are proud of our County's rich history and are eager to support its preservation.

The Winfield Bridge, known as the Ross Booth Memorial Bridge is a major lifeline for our Counties communities of Hurricane, Winfield, Poca, Eleanor and Buffalo. The Kanawha River splits the County and without the bridge the economic development on both sides of the river would suffer. The bridge makes access easier to the County Seat of Winfield for those on the north side of the river. It also provides access for those on the south side of the river to get access to the County Park located in Eleanor, West Virginia.

Our Board discussed the Winfield Bridge and we strongly support it being included on the National Register of Historic Places.

Thanks you for your consideration and we look forward to celebrating the Winfield Bridge, known as the Ross Booth Memorial Bridge being added to the National Register of Historic Places.

A handwritten signature in cursive script, reading "Bob Keely".

Bob Keely  
Rotary Club of Putnam County  
President 2011-2012

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