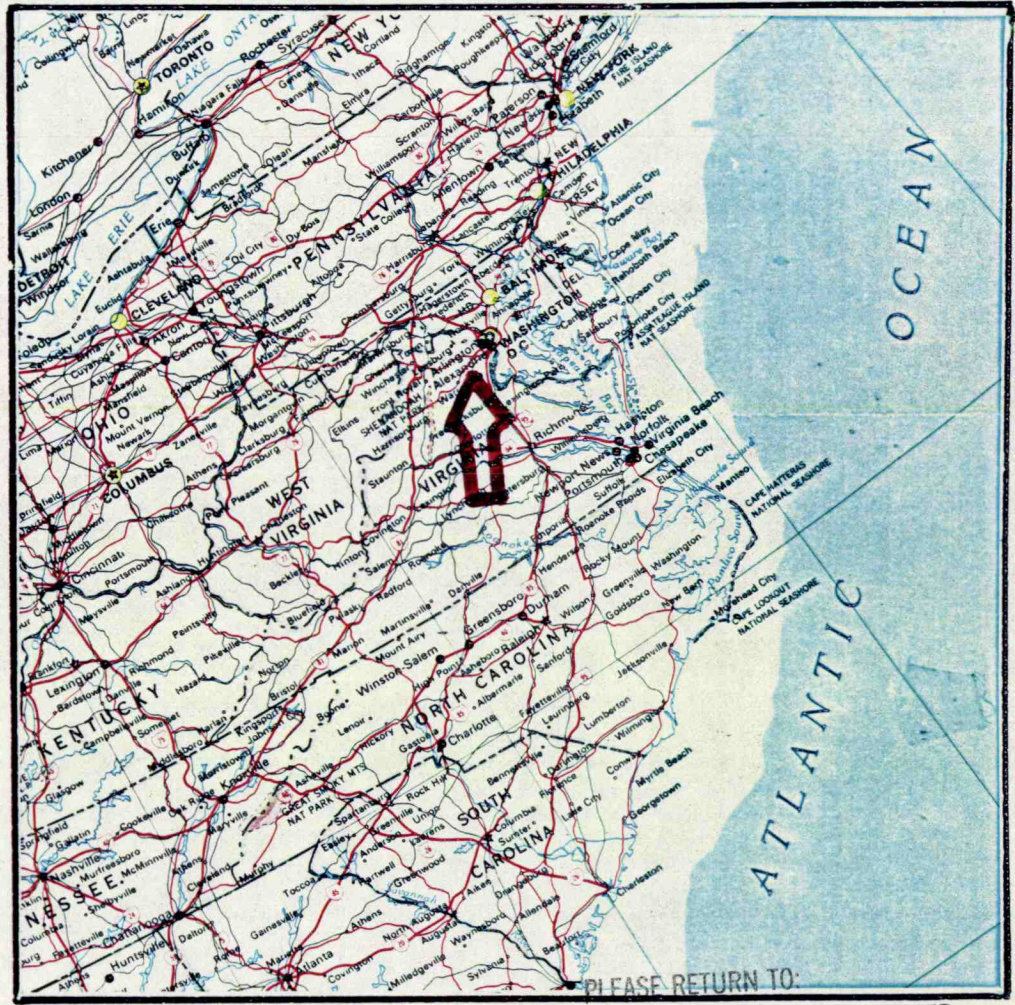
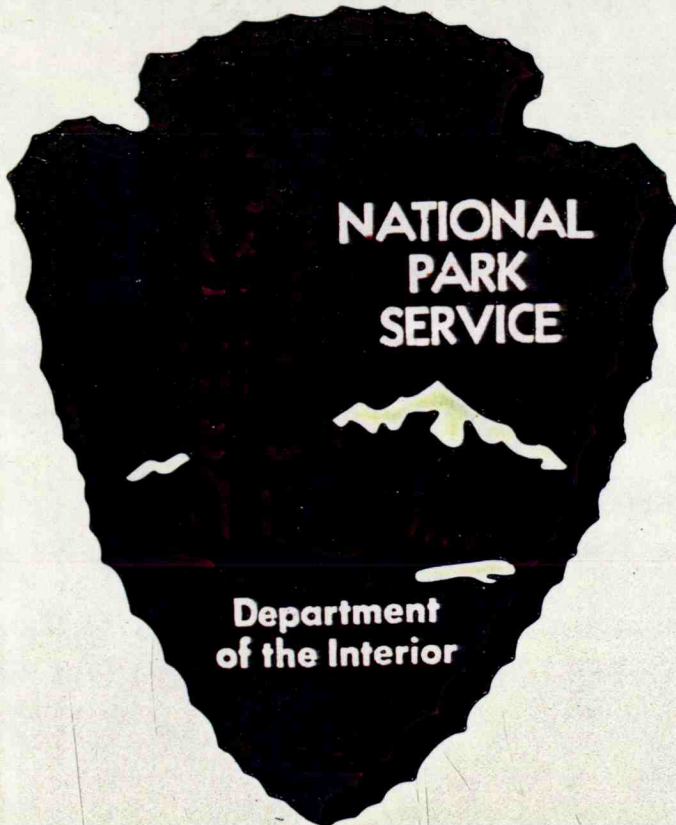


ROAD INVENTORY AND NEEDS STUDY for MANASSAS NATIONAL BATTLEFIELD PARK



REPORT PREPARED BY:
REGION 15



FEDERAL HIGHWAY ADMINISTRATION
ARLINGTON VIRGINIA

PLEASE RETURN TO:
TECHNICAL INFORMATION CENTER
DENVER SERVICE CENTER
NATIONAL PARK SERVICE

INTRODUCTION

and

EXPLANATION OF ROAD INSPECTION/ INVENTORY PROGRAM (RIP) DATA

INTRODUCTION

In July 1976, the National Park Service (NPS) and the Federal Highway Administration (FHWA) entered into an agreement establishing the Road Inspection/Inventory Program (RIP). Under the agreement, FHWA (through the Office of Federal Highway Projects in FHWA Region 8, and the Design Division in FHWA Region 15) is inspecting, inventorying maintenance items (culverts, signs, guardrail, etc.), and photologging the entire NPS roads system.

USES

The RIP provides a planning tool which identifies deficiencies, establishes priorities, and provides preliminary cost estimates for needed construction work. The need is based upon comparisons of existing conditions and standard parameters established by the NPS with FHWA consultation. The type of construction is divided into the following three broad categories of capital improvements: (1) reconstruction, (2) widening, and (3) paving (overlays). Construction cost estimates are provided where the Adjusted Overall Sufficiency Rating (Adjusted OSR), the Component Sufficiency Rating (CSR) for Structure, or the Adjusted CSR for Safety or Service is less than 65 (the rating system is explained below). Additional cost estimates are provided for a miscellaneous capital improvement category and for preventive maintenance costs. Preventive maintenance costs are for sections of roadway with a CSR for structure between 65 and 85.

RIP reports can be used to identify unsafe sections of roadway and to determine necessary corrective measures. This can be accomplished through the analysis of accident spot maps or summarized accident reports, inspection of 35mm photologs, and review of roadway ratings for the CSR for safety.

The maintenance planning budget section of RIP reports can be used as the first stage in the development of a maintenance management program.

One of the primary uses of this report is for NPS personnel to justify and/or schedule capital improvement work. It is essential that sufficiency and priority ratings be completely understood. This introduction provides the basics for this understanding; however, it should be supplemented with training and study to insure the appropriate level of understanding for proper use of his data.

CONTENTS

Each complete report contains the following sections listed in sequential order:

- Title Sheet
- Introduction and Explanation of Road Inspection/Inventory (RIP) Data
- Abbreviations and Codes Used in Road Inventory Reports
- Attachment A - Guideline for Sufficiency Ratings
- Attachment B - Inventory Items Codes
- Route Index - A Numerical List of All the Routes in the Park
- Area Map and/or Vicinity Map
- Accident Spot Map or Accident Summary Sheet
- Sufficiency Rating Sheets, Backlog of Needs, and Cost Summary
- Priority Listing (Combined)
- Priority Listing (Structure)
- Priority Listing (Safety)
- Priority Listing (Service)
- Narrative Report
- Maintenance Features Inventory
- Strip Map
- Maintenance Planning Budget

A Photolog Index is provided in each report but the actual photolog films are stored separately from the reports. Additional copies of the film are available from NPS regional offices.

TITLE SHEET, INTRODUCTION, AREA MAPS, ACCIDENT SPOT MAP

All are self-explanatory and no further explanation is required.

EXPLANATION OF SUFFICIENCY RATINGS, AND BASIC INFORMATION PROVIDED ON SUFFICIENCY RATING SHEETS

Sufficiency Ratings - The sufficiency rating system is a means to determine roadway deficiencies by rating several basic roadway elements against uniform, nationwide standards. The following provides a list of the basic elements that are examined and rated to determine the three Component Sufficiency Ratings (CSR) for a roadway.

<u>Pavement Structure Component</u>	<u>Roadway Safety Component</u>	<u>Roadway Service Component</u>
1. Surface Condition	1. Surface Width	1. Surface Width
2. Drainage Condition	2. Shoulder Width	2. Shoulder Width
3. Foundation Condition	3. Alinement	3. Alinement
4. Shoulder Condition	4. Stopping Sight Distance	4. Gradient
	5. Horizontal Clearance	5. Roughness
		6. Passing Sight Distance
		7. Surface Condition
		8. Vertical Clearance

Most basic elements are rated on a scale of 5 to 1 based on visual observations and measured geometric parameters. Surface Width and Horizontal Clearance are rated 5, 3, or 1, while Shoulder Width and Vertical Clearance are rated 5 or 2. A rating of five means the element meets or exceeds standards; a rating of 1 or 2 means an unacceptable condition. See Attachment A, Guidelines for Sufficiency Ratings, for details. The ratings are then assigned values of 100 to 0 (5 = 100, 1 = 0) and are averaged for each component to arrive at a CSR for Structure, for Safety, or for Service. Since somewhat lower geometric standards are usually allowed in rolling or mountainous topography, the Safety and Service CSR's are then adjusted for rolling or mountainous terrain. Adjustments are made by dividing the component rating by .90 for mountainous terrain or by .95 for rolling terrain. Since topography does not affect the structural acceptability of a pavement, no adjustment is made to the Structural Component Rating.

The Structural CSR, Adjusted Safety CSR, and Adjusted Service CSR can be used individually to evaluate structural condition, roadway safety, and level of service provided by the roadway. The Overall Sufficiency Rating (OSR) is an average of all element ratings and is also adjusted for terrain. Adjusted OSR provides an overall (combined) rating for a roadway section. Geometric standards used in RIP reports are in Table 1.

Roadway Sections with Adjusted OSR, Structure CSR, or Adjusted CSR for Safety or Service of Less Than 65 - Roadway sections with an Adjusted OSR, Structure CSR, or Adjusted Safety or Service CSR of less than 65 are considered to be in need of construction (Capital Improvement) and constitute a backlog of needs. The type of work needed is based on the RIP inspection team leaders judgment and categorized into either reconstruction, widening, paving, or miscellaneous. The miscellaneous category provides for needed construction for isolated specialized conditions. At the bottom of each Sufficiency Rating Sheet, the type of work needed for each code and section is identified (to the right of "Improvement Costs") as "R," "W," "P," or "M" for reconstruction, widening, pavement, and miscellaneous, respectively. Definitions for these work categories are as follows:

TABLE 1
RIP RATING STANDARDS

Description	Parkways and		Minor Roads	Special Purpose* Roads	Interpretive* Roads	Administrative* Roads	One-Way* Roads	City* Streets
	Major Recreation Area Roads	Major Roads						
Surface Width (metres)	24' (7.3)	22' (6.9)	20' (6.1)	20' (6.1)	14' (4.3)	-	12' (3.7)	-
Shoulder Width (metres)	4' (1.3)	3' (0.9)	2' (.6)	2' (0.6)	-	-	2' (0.6)	-
Maximum Degree	11°	25°	25°	25°	-	-	-	-
Maximum Grade	7%	7%	9%	9%	-	-	-	-
PSD (metres)	1750' (533)	1100' (335)	1100' (335)	-	-	-	-	-
SSD (metres)	300' (91)	200' (61)	200' (61)	-	-	-	-	-
H Clearance (metres)	TW+6' (TW+1.5)	TW+4' (TW+1.2)	TW+4' (TW+1.2)	-	-	-	-	-
Clearance (metres)	14' (4.3)	14' (4.3)	14' (4.3)	-	-	-	-	-
Rt. Nos.	1-9	10-99	100-199	200-299	300-399	400-499	500-599	600-699

NOTE: Roads are to be classed by the Park Superintendent or someone designated to act on his behalf.
All roads will be rated according to these standards with exception noted in the report narrative.
*Where no NPS standards are given, ratings are based upon subjective judgments by considering road structural condition, functional classification, amount of use, and local Park objectives.

Reconstruction (R) - Total reconstruction of pavement, shoulders, base, subbase, and drainage; possibly some grade and alinement improvements; widening if necessary to meet standards.

Widening (W) - Additional pavement and shoulder width; pavement overlay or surface recycling; extension of culverts; possibly minor alinement and grade improvements.

Paving (P) - Pavement and shoulder overlay including leveling (can include shoulder stabilization); or pavement overlay or surface recycling and pull up shoulders.

Miscellaneous (M) - Usually work on short sections of roadway to correct major landslide problems, extensive stream erosion, retaining wall problems, etc. (This type of miscellaneous work needed will be explained in the narrative section of each RIP report.)

The definitions purposely reflect work which requires minimal grade and alinement corrections due to FHWA's knowledge of NPS environmental/esthetic considerations in developing projects.

Construction costs are based on averages for the types of work identified above which FHWA performed for the NPS during 1976-1977. Basically, costs are averaged for jobs east, and jobs west, of a line beginning at the Canadian border between North Dakota and Minnesota, and extending to the Gulf of Mexico between Texas and Louisiana. Average costs for the NPS National Capital Parks (NCP) region were determined separately due to the special types of construction problems encountered and resulting higher costs. The regional estimated costs used in this report are given in Table 2. The cost of miscellaneous work is estimated based on the type of work needed using current costs.

Construction costs are broken down, as applicable, into grade and drain, paving and base, incidental and engineering, and shown at the bottom of each Sufficiency Rating Sheet. Costs are intended only to provide an indication of the magnitude of funding required to complete needed work; i.e., a "class 3" estimate.

Preventive Maintenance Costs - Where the Structure CSR for a roadway section is between 65 and 85, preventive maintenance work is considered to be needed. The total estimated cost for preventive maintenance work is shown on the "Cost Summary, Backlog of Needs" sheet and on the Priority Listing (Structure) section of each report. Preventive maintenance costs for individual roadway sections are not shown on the sufficiency rating sheet.

Bridges - Each bridge is identified as a separate roadway section. Bridge costs are taken directly from Bridge Inspection Program (BIP) reports and are the total of estimated cyclic rehabilitation costs, plus construction costs. Each bridge is identified in RIP reports by the number assigned during its BIP inspection. Its priority for corrective work is also indicated and is taken directly from its BIP report. Priorities range from A to D. An "A" priority means a bridge is critically deficient and should be replaced as soon as possible. A priority of "D" denotes that a bridge is structurally sound, capable of carrying legal loads, and has the lowest priority for work. If a bridge has not been inspected at the time the RIP report is prepared, a section length is shown but no further information is provided. Bridge priorities are not included in the development of the priority ratings shown in the "Priority Listing" sections of RIP reports.

COST SUMMARY, BACKLOG OF NEEDS SHEET

A sheet titled "Cost Summary, Backlog of Needs" is provided at the beginning of the Sufficiency Rating Section of each RIP report. The sheet shows the total estimated cost of performing work for sections identified by (1) Adjusted OSR less than 65, (2) Structure CSR less than 65, (3) Adjusted Safety CSR less than 65, and (4) Adjusted Service CSR less than 65. The sheet also shows the total cost of preventive maintenance needs; i.e., sections with Structure CSR 65 to 85. A Total Ultimate Needs figure is also provided and is the total of all construction or miscellaneous costs identified for each roadway section (including bridges) on any Sufficiency Rating Sheet plus the total estimated cost of preventive maintenance needs.

TABLE 2
COST ESTIMATES

NPS Region	Type Construction	Cost Per Mile (1976-1977 Base)			
		Grade & Drain	Paving & Base	Incidental	Engineering
National Capitol	Reconstruction	285,000	165,000	312,000	85,000
	Widening	165,000	312,000	312,000	40,000
	Paving		60,000	165,000	40,000
Northeast, Southeast, Midwest, Mid-Atlantic	Reconstruction	285,000	165,000	115,000	85,000
	Widening	28,000	56,000	56,000	20,000
	Paving		50,000	10,000	10,000

NOTE: Reconstruction (Improvement Code R) consists of rebuilding entire pavement structure and total revision of the roadway drainage structures. Possibly some grade and alinement changes will be made to correct deficiencies.

Widening (Improvement Code W) consists of adding width to pavement base and shoulders, extending existing drainage structures, providing new surface on entire roadway, and possibly minor alinement and grade improvements.

Paving (Improvement Code P) consists of minor wedge and leveling, bringing up shoulders, and a new pavement surface (can include recycled materials).

EXPLANATION OF PRIORITY RATINGS

Priority ratings are a function of traffic volume and roadway condition and provide a basis for judging relative need. The higher a rating, the greater the need for corrective work. Priority ratings are based on a ratio of Average Daily Traffic (ADT) to (1) Adjusted OSR, (2) Structure CSR, (3) Adjusted Safety CSR, or (4) Adjusted Service CSR. Ratings are separated and reported under sections of RIP reports as Priority Listing, Combined; Priority Listing, Structure; etc. (See "Introduction," above.) Only sections where the Adjusted OSR, Structure CSR, or Adjusted CSR for Safety or Service is less than 65 will be given in listings.

In the right column of each priority listing sheet, costs are shown for performing corrective work on sections identified as being deficient; i.e., with an Adjusted OSR, Structure CSR, or Adjusted Safety or Service CSR less than 65. The costs are the same as those identified at the bottom of Sufficiency Rating Sheets. The summation of all sections identified as deficient is shown at the end of each individual priority rating listing as "Capital Improvement Costs (Structure CSR 65)," "Capital Improvement Costs (Adjusted OSR 65)," "Capital Improvement Costs (Adjusted Safety CSR 65)," or "Capital Improvements Costs (Adjusted Service CSR 65)."

USE OF PRIORITY RATINGS IN ESTABLISHING WORK

To determine work needed, where to spend available funds, or to establish future budget submissions, both priority ratings and sufficiency ratings should be considered.

First, priority ratings should be considered in order to determine sections of roadway with the highest needs. Then, individual elements for the CSR's should be evaluated to determine what type of deficiencies exist. Next, considering deficiencies, traffic volume, environmental considerations, route continuity, probable project lengths, etc., decisions can be made as to sections to be corrected,

types of work to be performed, and the extent of work to be funded. Of course, available money and planned future funding must also be considered in budget submissions. As stated earlier, cost estimates provided in RIP reports are "class 3" estimates which provide an indication of the magnitude of funding required to complete needed work. To program funds, an independent estimate should be made by the NPS based on the actual nature of work decided upon and project length. For broad budget proposal submissions, it would be reasonable to use costs shown in RIP reports; however, they should be adjusted for inflation from the 1976-1977 base.

An example of how priority and sufficiency ratings may be used is as follows:

The RIP report for a National Park has identified a particular section of roadway as having the highest priority for improvement based on OSR. The route also has a high priority based on structure CSR. The section is on a main route into the park and carries high traffic volumes. The sufficiency ratings for the particular section are as follows:

Length (Miles)	6.16
Terrain	Rolling
Structure:	
Surface Condition	2
Drainage Condition	3
Foundation Condition	4
Shoulder Condition	3
Structure CSR	50

Safety:

Surface Width	3
Shoulder Width	2
Alinement	3
Stopping Sight Distance	3
Horizontal Clearance	5
Adjusted Safety CSR	57.9

Service:

Surface Width	3
Shoulder Width	2
Alinement	3
Gradient	3
Roughness	3
Passing Sight Distance	3
Surface Condition	2
Vertical Clearance	5
Adjusted Service CSR	52.6
Overall Sufficiency Rating (OSR)	51.5
Adjusted OSR	54.2

Analysis of the individual sufficiency rating elements indicates that the foundation condition is good, with a rating of 4. The roadway surface is not sufficient, however, with a rating of 2 for surface condition, 3 for surface drainage, and 3 for roughness. The roadway also has less than standard surface and shoulder widths with ratings of 3. Alinement, stopping sight distance, passing sight distance, and gradient are all below standard with each having a rating of 3.

The RIP report has "W" (widening) entered as the suggested method of improvement. Widening as defined in this introduction/explanation would not correct all deficiencies; i.e., would not bring all rating elements up to 5 (OSR to 100); however, it would correct all structural deficiencies. The NPS should consider other options that are not specifically given in the RIP report. These options may include: (1) total reconstruction to bring the roadway completely up to standard, (2) reconstruction correction for width, but with only selected grade and alinement corrections, (3) pavement overlay with no corrections for substandard widths, grades, or alinement, (4) preventive maintenance work consisting of leveling and surface treatment. Sufficiency ratings for the various improvement options would be approximately (depending on the amount of grade and alinement work performed) as follows:

*New Rating if Construction
Options are Selected

	<u>Initial</u>	<u>"W"</u>	<u>Options</u>			
			<u>1</u>	<u>2</u>	<u>3</u>	<u>4</u>
Structure:						
Surface Condition	2	5	5	5	5	4
Drainage Condition	3	5	5	5	5	4
Foundation Condition	4	4	5	4	4	4
Shoulder Condition	3	5	5	5	3	3
Structure CSR	50	93.8	100	93.8	81.3	68.8
Safety:						
Surface Width	3	5	5	5	3	3
Shoulder Width	2	5	5	5	2	2
Alinement	3	3	5	4	3	3
Stopping Sight Distance	3	4	5	4	3	3
Horizontal Clearance	5	5	5	5	5	5
Adjusted Safety CSR	57.9	89.5	100	94.8	57.9	57.9
Service:						
Surface Width	3	5	5	5	3	3
Shoulder Width	2	5	5	5	2	2
Alinement	3	3	5	4	3	3
Gradient	3	4	5	4	3	3
Roughness	3	5	5	5	5	4
Passing Sight Distance	3	3	5	4	3	3
Surface Condition	2	5	5	5	5	4
Vertical Clearance	5	5	5	5	5	5
Adjusted Service CSR	52.6	88.8	100	95.4	69.1	62.5
OSR	51.5	86.8	100	89.7	66.2	66.3
Adjusted OSR	54.2	91.3	100	94.4	69.7	63.5

The optimum corrective action must be selected considering all factors, both objective and subjective. The selection process for the given example may be as follows.

Because of environment/esthetic considerations, the NPS immediately decides not to consider Option 1. Option 2 is considered, but because the foundation is in good condition, the NPS can see no reason to completely reconstruct the base and surface at the present time. Option 3 would correct the surface condition, roughness, and surface drainage problems but would not correct any substandard widths, grades, or alignment; therefore the NPS rejects this option. "W" seems to be the best solution. It would not bring the roadway completely up to standard, but this option strikes a "happy medium." However, upon assessing available funding for the estimated cost of the "W" option, the NPS decides on Option 4 as a temporary measure and at the same time prepares a budget justification (to be submitted through normal administrative procedures and channels) to widen the road and to make selected grade and alignment corrections; i.e., to upgrade the road to the "W" option. Considering the budget process, it will probably require 2 to 3 years for the widening work to begin, so the NPS anticipates that the foundation condition will fall to a 3 rating, and includes surface and base recycling in the proposed project. Costs shown in the RIP report are used, but are adjusted for inflation and for the recycling.

* Not given in RIP reports

NARRATIVE

The narrative section of RIP reports provides a general assessment of roadway items (pavement, shoulders, signing, etc.) and makes recommendations, as appropriate, regarding their routine and preventive maintenance needs. Also, miscellaneous work (code "M") denoted in the sufficiency rating section of RIP reports is explained and any special explanations needed for "R," "W," or "P" construction recommendations for some sections are provided in the narrative.

MAINTENANCE FEATURES INVENTORY

The maintenance features inventory section of RIP reports lists each individual maintenance feature (signs, shoulders, pavement, mowing, culverts, etc.) by route, in the sequence that they occur along each route. The location of each maintenance feature is identified by milepost. A summary is also provided which lists the total number or extent of each type of maintenance item; e.g., number of signs, equivalent mile of roadway (20' width), ditch miles, etc., by Route and by Park.

STRIP MAPS

Strip maps are simple "straight line" maps of each major park route which show the milepost or kilometer post location of 12 major maintenance features identified at the bottom of each strip map.

MAINTENANCE PLANNING BUDGET

(This section should be prepared by Al Miller).

Abbreviation and Codes Used in Road Inventory Reports

ADT - Average Daily Traffic for High Six Months

CSR - Component Sufficiency Rating

FHWA - Federal Highway Administration

H. Clear - Horizontal Clearance on Roadway

Improvement Codes - R = Reconstruction
W = Widening
P = Paving
M = Miscellaneous

LE 160 - National Park Service computer-generated
Law Enforcement Report entitled "Traffic
Accidents by Location and Causes"

LE 180 - National Park Service computer-generated
Law enforcement Report entitled "Traffic
Accidents by Degree and Type"

LE 190 National Park Service computer-generated
Law Enforcement Report entitled "Accidents
by Location"

NPS - National Park Service

OSR - Overall Sufficiency Rating

PSD - Sight Distance Required for Passing a
Vehicle

RIP - Road Inventory Program

SSD - Sight Distance Required to Stop a
Vehicle

Terrain Codes - F = Flat
R = Rolling
M = Mountainous
B = Bridge
U = Underpass
T = Tunnel

ATTACHMENT A

GUIDELINE FOR SUFFICIENCY RATING

Rating Scale*

- 5 - Average 0%
- 4 - Average less than 10%
- 3 - Average 10-25%
- 2 - Average 25-50%
- 1 - Average greater than 50%

* To be used for: Surface condition; Drainage condition;
Shoulder condition; Foundation condition

Surface Condition

Use the General Rating Scale based upon the average percentages of the following items:

Flexible Pavements

- a. Bleeding
Percentage = $\frac{\text{Surface Area Exhibiting Asphalt Bleeding}}{\text{Total Pavement Area of Section}} \times 100$
- b. Patching
Percentage = $\frac{\text{Surface Area Containing Patches}}{\text{Total Pavement Area of Section}} \times 100$
- c. Raveling
Percentage = $\frac{\text{Length of Pavement with Edge Raveling}}{\text{Total Length of Section}} \times 100$
- d. Studded Tire Grooves
Percentage = $\frac{\text{Length of Pavement with Studded Tire Grooves}}{\text{Total Length of Section}} \times 100$

Average Percentage = $\frac{a+b+c+d}{4}$

Rigid Pavements

- a. Patches
Percentage = $\frac{\text{Surface Area Containing Patches}}{\text{Total Pavement Area of Section}} \times 100$
- b. Polishing Aggregate
Percentage = $\frac{\text{Length of Pavement with Polishing Aggregate}}{\text{Total Length of Section}} \times 100$
- c. Studded Tire Groove
Percentage = $\frac{\text{Length of Pavement with Studded Tire Grooves}}{\text{Total Length of Section}} \times 100$

Average Percentage = $\frac{a+b+c}{3}$

Drainage Conditions

Use the General Rating Scale based upon the average percentages of the following items:

- a. Pavement Drainage
Percentage = $\frac{\text{Length of Pavement with Inadequate Surface Drainage}}{\text{Total Length of Section}} \times 100$
- b. Shoulder Drainage
Percentage = $\frac{\text{Length of Shoulder with Inadequate Drainage}}{\text{Twice Total Length of Section}} \times 100$
- c. Side Ditch Drainage
Percentage = $\frac{\text{Length of Side Ditch with Inadequate Drainage}}{\text{Total Length of Side Ditches}} \times 100$

Average Percentage = $\frac{a+b+c}{3}$

Shoulder Condition

Use the General Rating Scale based upon the average percentages of the following items:

- a. Shoulder Rutting
 Percentage = $\frac{\text{Area of Shoulder Exhibiting Rutting}}{\text{Total Area of Shoulder in Section}} \times 100$
- b. Low Shoulder
 Percentage = $\frac{\text{Length of Pavement with Low Shoulders}}{\text{Total Length of Section in Section}} \times 100$
- c. Shoulder Distress
 Percentage = $\frac{\text{Area of Shoulder Exhibiting Raveling, Cracking or Erosion}}{\text{Total Area of Shoulder in Section}} \times 100$

Foundation Condition

Use the General Rating Scale based on the average percentages of the following items:

Flexible Pavements

- a. Alligator Cracking
 Percentage = $\frac{\text{Area of Pavement with Alligator Cracking}}{\text{Total Pavement Area of Section}} \times 100$
- b. Rutting
 Percentage = $\frac{\text{Length of Pavement with Rutting}}{\text{Total Length of Section}} \times 100$

- c. Transverse Cracking
 Percentage = $\frac{\text{Area of Pavement with Transverse Cracking (Spacing less than 15 ft.)}}{\text{Total Pavement Area of Section}} \times 100$

$$\text{Average Percentage} = \frac{a+b+c}{3}$$

Rigid Pavements

- a. Joint Faulting
 Percentage = $\frac{\text{Number of Joints Faulted } \geq 1/8"}{\text{Total Number of Joints in Section}} \times 100$
- b. Joint Cracking
 Percentage = $\frac{\text{Number of Joints Cracked and/or Raveled}}{\text{Total Number of Joints in Section}} \times 100$
- c. Pumping
 Percentage = $\frac{\text{Number of Joints Exhibiting Subgrade Pumping}}{\text{Total Number of Joints in Section}} \times 100$
- d. Cracking
 Percentage = $\frac{\text{Number of Slab with Mid-span Cracking}}{\text{Total Number of Slabs in Section}} \times 100$
- $$\text{Average Percentage} = \frac{a+b+c+d}{4}$$

Roughness:

- 5 - Smooth Ride. No discernible roughness.
- 4 - Good Ride. Slight roughness allowed.
- 3 - Fair Ride. Occasional distortion and/or roughness
- 2 - Poor Ride. Frequent distortion and roughness.
- 1 - Very Poor Ride. Speed must be reduced to be safely used.

Surface Width:

- 5 - Meets or exceeds standards.
- 3 - 1 to 2 feet less than standard.
- 1 - 2 feet less than standard.

Alinement:

- 5 - No substandard curves.
- 4 - One or two substandard curves per mile.
- 3 - Three or four substandard curves per mile.
- 2 - Five or six substandard curves per mile.
- 1 - More than six substandard curves per mile.

Stopping Sight Distance:

- 5 - No restricted locations.
- 4 - One location per mile.
- 3 - Two or three locations per mile.
- 2 - Four or five locations per mile.
- 1 - More than five locations per mile.

Gradient:

- 5 - Maximum grade not greatly exceeded.
- 4 - Maximum grade exceeded over 10 percent of section.
- 3 - Maximum grade exceeded over 20 percent of section.
- 2 - Maximum grade exceeded over 30 percent of section.
- 1 - Maximum grade exceeded over 40 percent of section.

Passing Sight Distance (PSD):

- 5 - Unlimited PSD.
- 4 - Standard PSD restricted on 10 percent of section.
- 3 - Standard PSD restricted on 20 percent of section.
- 2 - Standard PSD restricted on 30 percent of section.
- 1 - Standard PSD restricted on more than 35 percent of section.

Shoulder Width:

- 5 - Meets or exceeds standards.
- 2 - Does not meet standards.

Horizontal Clearance:

- 5 - Meets or exceeds standards.
- 3 - 1 to 2 feet below standards.
- 1 - More than 2 feet below standards.

Vertical Clearance:

- 5 - Meets or exceeds standards.
- 2 - Does not meet standard.

ATTACHMENT B

14

INVENTORY ITEMS CODES

<u>CODE</u>	<u>ITEM</u>	<u>CODE</u>	<u>ITEM</u>	<u>CODE</u>	<u>ITEM</u>
020	BEACON	235	DITCH (UNPAVED)	670	ROADWAY (BITUMINOUS)
050	BRIDGE (ROAD)	260	DOWNDRAIN	673	ROADWAY (CONCRETE)
053	BRIDGE (RR)	280	DROP INLET	676	ROADWAY (DIRT)
056	BRIDGE (STREAM)	310	FENCE (WIRE)	679	ROADWAY (GRAVEL)
059	BRIDGE (TRAIL)	311	FENCE (WOOD)	700	SIGN
110	CAMPSITE, TYPE A	350	GUARDRAIL (CONCRETE)	710	SHOULDERS (BITUMINOUS)
113	CAMPSITE, TYPE B	351	GUARDRAIL (WOOD)	713	SHOULDERS (CONCRETE)
116	CAMPSITE, TYPE C	353	GUARDRAIL (STEEL)	715	SHOULDERS (GRASS)
119	CAMPSITE, TYPE D	380	INTERSECTION	719	SHOULDERS (DIRT)
120	CATTLEGUARD	381	PRIVATE ENTRANCE	750	TRAFFIC SIGNAL
180	CULVERT	420	LITTER BARREL	790	TURNOUT (BITUMINOUS)
190	CURB & GUTTER (CONCRETE)	450	LUMINAIRE	793	TURNOUT (CONCRETE)
191	CURB & GUTTER (BITUMINOUS)	460	MEDIAN	796	TURNOUT (DIRT)
195	CURB (CONCRETE)	480	MOWING AREA	799	TURNOUT (GRAVEL)
196	CURB (BITUMINOUS)	481	VISTA CLEARING AREA	860	UNDERPASS
210	DELINEATOR	520	PARKING AREA (BITUMINOUS)	880	UTILITIES
230	DITCH (BITUMINOUS)	523	PARKING AREA (CONCRETE)	900	WALL (BARRIER)
231	DITCH (STONE)	526	PARKING AREA (DIRT)	905	WALL (RETAINING)
233	DITCH (CONCRETE)	529	PARKING AREA (GRAVEL)	990	GATE

ROUTE INDEX

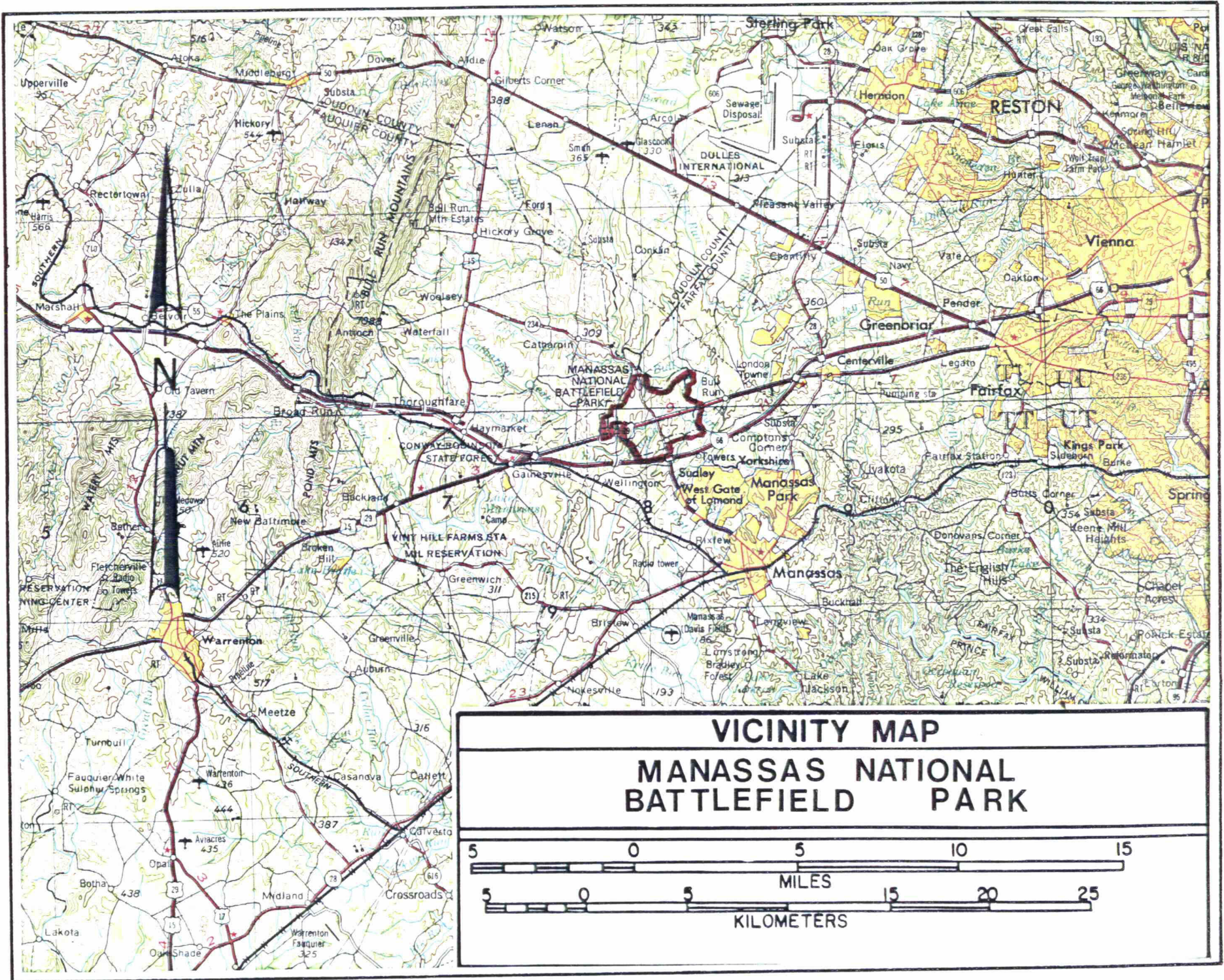
PARK MANASSAS NATIONAL BATTLEFIELD PARK		PARK CODE 384C	REGION ACP	PAGE 1 OF 3	
NPS RTE NUMBER	DESCRIPTION	TERMINAL POINTS	LENGTH MI	PHOTOLOG ROLL AC.	REMARKS
10	VISITOR CENTER ACCESS	FROM: STATE ROUTE 234 TO: END OF LCCF	0.277 (0.446 KM.)	308	
11	SOUTH CHINN RIDGE ROAD	FROM: VA RT 234 TO: INTERSECTION RTES 128 13	0.563 (0.906 KM.)	308	
12	NORTH CHINN RIDGE ROAD	FROM: VA RT 234 TO: RTE 11; SOUTH CHINN RIDGE	0.650 (1.046 KM.)	308	
13	CHINN RIDGE ROAD	FROM: RTES 11 & 12 ; CHINN RIDGE RD TO: END OF LCCF	0.912 (1.467 KM.)	308	
14	NEW YORK AVENUE	FROM: U.S. RTE 29-211 TO: END OF LCCF	0.338 (0.544 KM.)	308	
100	PICNIC AREA ACCESS	FROM: STATE ROUTE 234 TO: PARKING AREA	0.132 (0.212 KM.)	308	
200	STONE HOUSE PARKING	FROM: U.S. RT 29-211 TO: STATE ROUTE 234	0.026 (0.042 KM.)	308	
201	STONE BRIDGE PARKING	FROM: U.S. RT 29-211 TO: U.S. RT 29-211	0.042 (0.068 KM.)	308	CHIP & SEAL SURFACE
202	THE WINERY PARKING	FROM: U.S. RT 29-211 TO: U.S. RT 29-211	0.030 (0.048 KM.)	308	
203	GROVERTON CEMETARY	FROM: U.S. RT 29-211 TO: PARKING AREA	0.041 (0.066 KM.)	308	
204	DEEP CUT PARKING AREA	FROM: FEATHERBED LANE TO: PARKING LOT	0.019 (0.031 KM.)		NOT PHOTOLOGGED

ROUTE INDEX

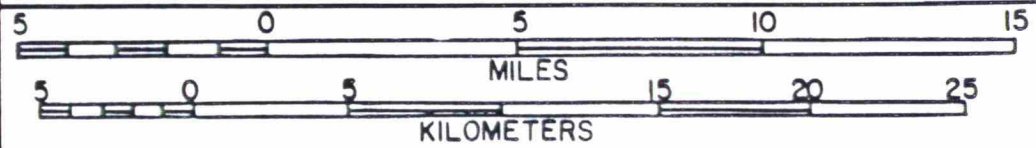
PARK	MANASSAS NATIONAL BATTLEFIELD PARK	PARK CODE	384C	REGION	NCP	PAGE	2 OF	3
NPS RTE NUMBER	DESCRIPTION	TERMINAL POINTS		LENGTH MI	PHOTOLOG ROLL AC.	REMARKS		
205	SUDLEY CHURCH PARKING AREA	FROM:	STATE ROUTE 234	0.018	308			
		TO:	PARKING AREA	(0.029 KM.)				
300	BATTERY HEIGHTS PARKING AREA	FROM:	U.S. RT 29-211	0.064	308			
		TO:	PARKING AREA	(0.103 KM.)				
400	MAINTENANCE AREA ACCESS	FROM:	STATE ROUTE 234	0.163	308			
		TO:	MAINTENANCE AREA	(0.262 KM.)				
401	CR FIRE RD	FROM:	RTE 13 & CHINN RIDGE RD	0.380				NOT PHOTOLOGGED
		TO:	PARK BOUNDARY	(0.611 KM.)				CF INVENTORED
								INACCESSIBLE
402	HENRY HOUSE ACCESS	FROM:	STATE ROUTE 234	0.127	308			
		TO:	HOUSE	(0.204 KM.)				
403	ROBINSON HOUSE ACCESS	FROM:	U.S. RT 29-211	0.112	308			
		TO:	HOUSE	(0.180 KM.)				
404	ROCK RD	FROM:	U.S. RT 29-211	0.843	308			
		TO:	END OF PASSABLE ROAD	(1.356 KM.)				
405	MULLIKIN DRIVEWAY & QUARTERS 10 ACCESS	FROM:	U.S. RT 29-211	1.222	308			
		TO:	QUARTERS 10	(1.966 KM.)				
406	QUARTERS 6,7,8 DRIVEWAY	FROM:	U.S. RT 29-211	0.420	308			
		TO:	QUARTERS 6,7,8	(0.676 KM.)				
407	QUARTERS 5 ACCESS	FROM:	U.S. RT 29-211	0.154	308			
		TO:	END OF LCOF	(0.248 KM.)				

ROUTE INDEX

PARK MANASSAS NATIONAL BATTLEFIELD PARK		PARK CODE	384C	REGION	NCP	PAGE	3 OF	3
NPS RTE NUMBER	DESCRIPTION	TERMINAL PDINTS		LENGTH MI	PHOTOLOGG ROLL NO.	REMARKS		
408	QUARTERS 1 ACCESS	FROM: U.S. 29-211	TO: RTE 14 ; NEW YORK AVENUE	0.098 (0.158 KM.)	308			
409	QUARTERS 3 DRIVEWAY	FROM: RTE 14 ; NEW YORK AVENUE	TO: DEAD END	0.087 (0.140 KM.)	308	MILEAGE INCCRRECT ON PHOTOLOG		
410	PETERS HOUSE DR	FROM: FEATHERBED LANE	TO: PETER'S PROPERTY	0.315 (0.507 KM.)		ABANDONED-NOT PHOTOLOGGED		
411	QUARTERS 4 DRIVEWAY	FROM: FEATHERBED LANE	TO: QUARTERS 4	0.055 (0.088 KM.)		NOT PHOTOLOGGED		
412	QUARTERS 9 ACCESS	FROM: STATE ROUTE 234	TO: QUARTERS	0.101 (0.163 KM.)	308	NOT PHOTOLOGGED		

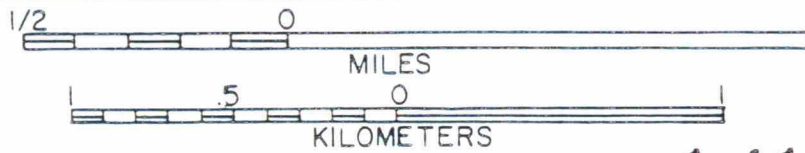


VICINITY MAP
MANASSAS NATIONAL
BATTLEFIELD **PARK**

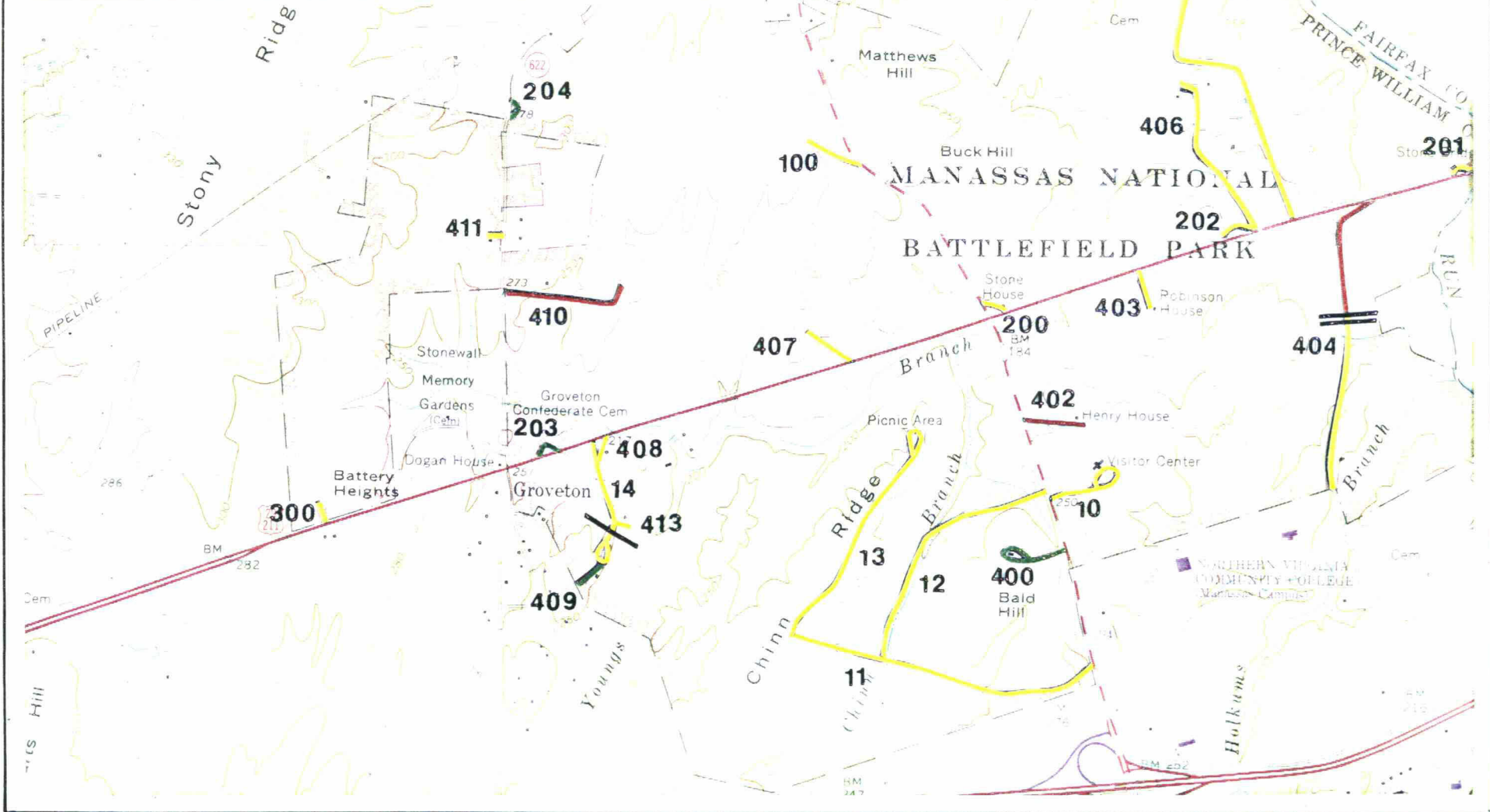


AREA MAP MANASSAS NATIONAL BATTLEFIELD PARK

CSR* > 85 **CSR* 65-85** **CSR* < 65**



*STRUCTURE CSR 1 of 1



ACCIDENT SPOT MAP

ACCIDENT SPOT MAP

LOCATION OF ACCIDENTS

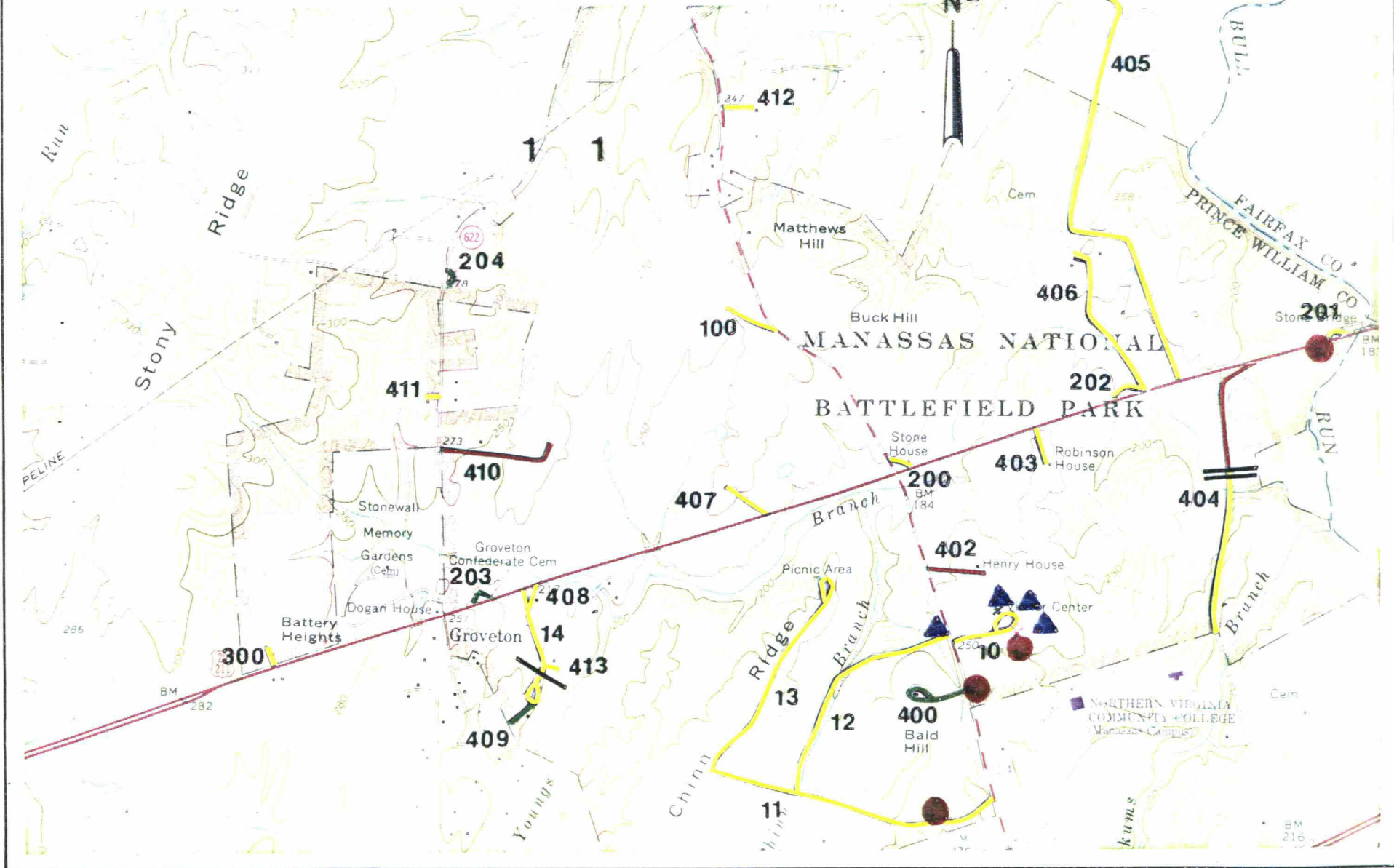


From 1978 thru 1980



From 1981 thru 1983

page 1 of 1



NOVEMBER 1983

**U.S. DEPARTMENT OF INTERIOR
NATIONAL PARK SERVICE**

TRAFFIC ACCIDENTS BY LOCATION AND CAUSES

PARK: Manassas National Battlefield Park
STATE: Virginia

REPORT: LE 160
PERIOD: 1-1-78 TO 12-31-80

NAME OF LOCATION	CAUSE OF ACCIDENT*																			TOTAL
	01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	
Visitor Center Access (Rte 10)										1										1
South Chin Ridge Road (Rte 11)		1																		1
Stone Bridge Parking Access (Rte 201)										1										1
Maintenance Area Access (Rte 400)										1										1
PARK TOTAL		1								3										4

* SEE ACCIDENT CODE SHEET

U.S. DEPARTMENT OF INTERIOR
NATIONAL PARK SERVICE

TRAFFIC ACCIDENTS BY LOCATION AND CAUSES

PARK: Manassas National Battlefield Park
STATE: Virginia

REPORT: LE 160
PERIOD: 1-1-81 TO 12-31-83

NAME OF LOCATION	CAUSE OF ACCIDENT*																			TOTAL
	01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	
Visitor Center Access (Rte 10)		1								2										3
North Chin Ridge Road (Rte 12)										1										1
PARK TOTAL		1								3										4

* SEE ACCIDENT CODE SHEET

Following is a list of "Cause of Accident" codes needed to interpret LE 160 computer printouts:

Code Description

- 01 - Following too close
- 02 - Full time and attention
- 03 - Emergency control
- 04 - Changing lanes without caution
- 05 - Improper turn
- 06 - Right-of-way violation
- 07 - Wrong side and overtaking
- 08 - Signal lights
- 09 - Stop signs
- 10 - Improper backing and parking
- 11 - Driving while intoxicated
- 12 - Intentional signal
- 13 - Reckless driving
- 14 - Speed
- 15 - Mechanical failure
- 16 - Road defect
- 17 - Physical failure (human)
- 18 - Weather
- 19 - Other

COST SUMMARY
BACKLOG OF NEEDS

TOTAL IMPROVEMENT COST OF SECTIONS WITH ADJ. CSR < 65	214000
TOTAL IMPROVEMENT COST OF SECTIONS WITH CSR STRUCTURE < 65	314000
TOTAL IMPROVEMENT COST OF SECTIONS WITH ADJ. CSR SAFETY < 65	435000
TOTAL IMPROVEMENT COST OF SECTIONS WITH ADJ. CSR SERVICE < 65	214000
TOTAL COST OF PREVENTIVE MAINTENANCE NEEDS (CSR STRUCTURE 65- 85)	5000

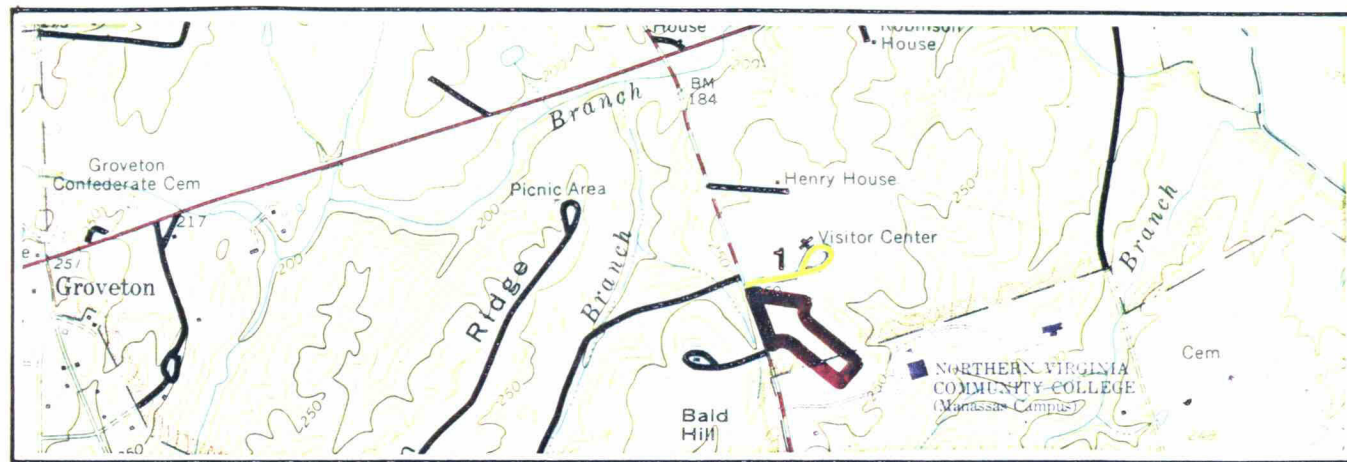
ULTIMATE NEEDS* 568000

*SUMMATION OF ALL IMPROVEMENT COSTS SHOWN ON SUFFICIENCY SHEETS FOR INDIVIDUAL SECTIONS PLUS COST OF PREVENTIVE MAINTENANCE NEEDS

MANASSAS NATIONAL
PATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

FARK CODE: 3990
ROUTE NUMBER: 10
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: VISITOR CENTER ACCESS
FROM VA RT 234 TO
END OF LOOP
ADT: 337
FUNCTIONAL CLASS: MAJOR PARK
LENGTH: 0.277 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ↪ Beginning of Route

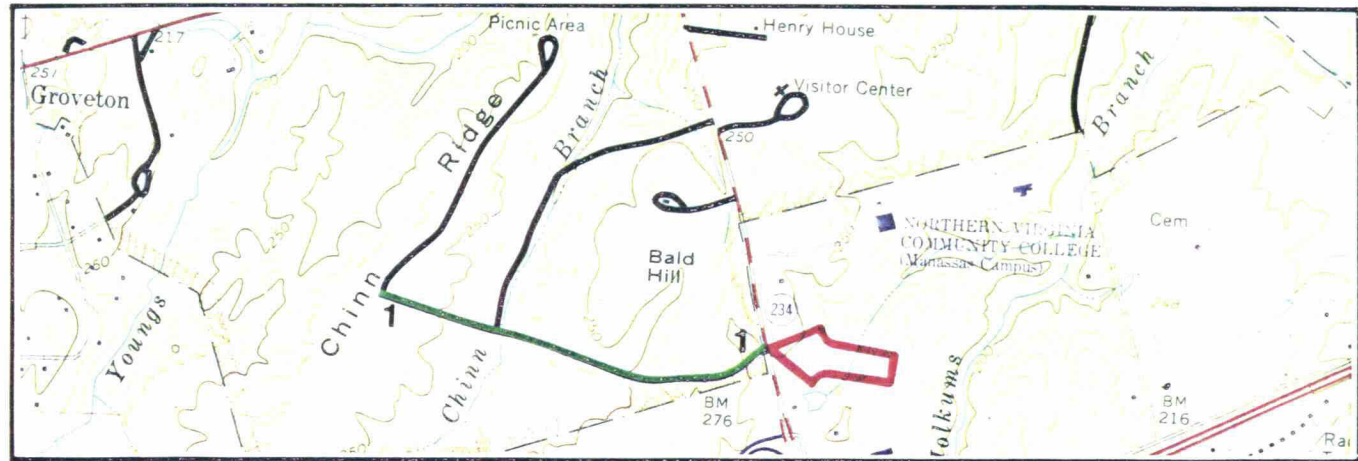
SECTION:	1								
LENGTH: (MILES)	0.277								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	4								
SHOULDER CONDITION	4								
*STRUCTURE CSR	81.2								
SAFETY:									
SURFACE WIDTH	3								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	94.7								
SERVICE:									
SURFACE WIDTH	3								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	98.6								
OVERALL SUFFICIENCY RATING	89.6								
ADJUSTED OSR	94.3								
PRIORITY RATING	357.3								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

PARK CODE: 1840
ROUTE NUMBER: 11
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: SOUTH CHINN RIDGE RD
FROM VA RT 234 TO
RTE 12 & RTE 13
ADT: 337
FUNCTIONAL CLASS: MAJOR PARK
LENGTH: 0.563 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- Beginning of Route

SECTION:	1								
LENGTH: (MILES)	0.563								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	100.0								
SAFETY:									
SURFACE WIDTH	1								
SHOULDER WIDTH	5								
ALIGNMENT	4								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	1								
*ADJUSTED SAFETY CSR	57.8								
SERVICE:									
SURFACE WIDTH	1								
SHOULDER WIDTH	5								
ALIGNMENT	4								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	88.7								
OVERALL SUFFICIENCY RATING	79.3								
ADJUSTED OSR	83.4								
PRIORITY RATING	404.0								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	16								
PAVING AND BASE	32								
INCIDENTAL	32								
ENGINEERING	11								
BRIDGES	0								
TOTAL COSTS:	91								
TOTAL COSTS:	91								

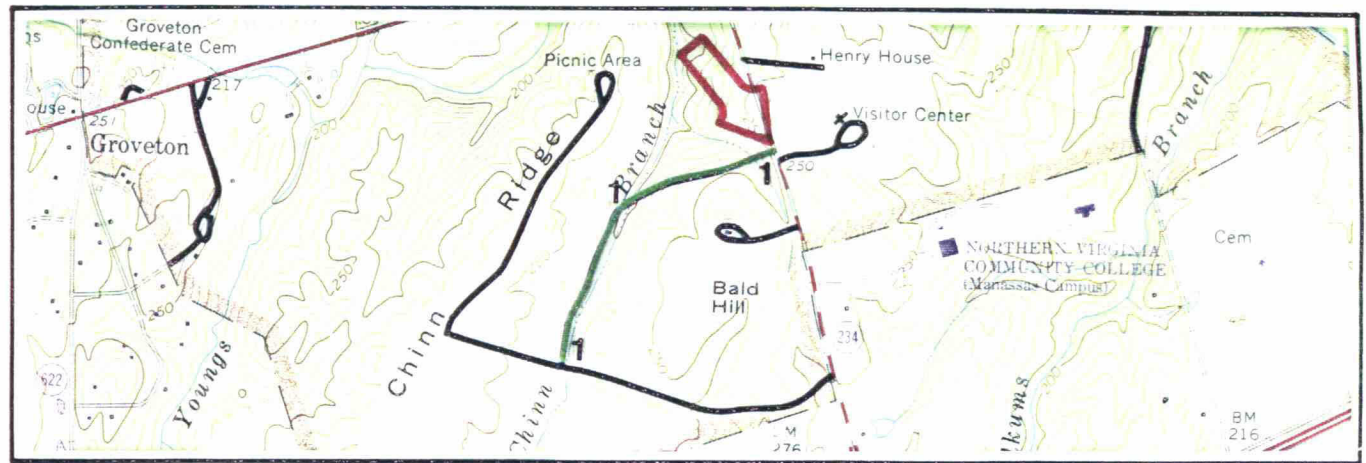
*CSR-COMPONENT SUFFICIENCY RATING

TOTAL IMPROVEMENT
COSTS (\$-S):
GRADE AND DRAIN 16
PAVING AND BASE 32
INCIDENTAL 32
ENGINEERING 11
BRIDGES 0
TOTAL COSTS: 91

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

FARK CODE: 3880
ROUTE NUMBER: 12
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: NORTH CHINN RIDGE RD
FROM VA RT 234 TO
RTE 11
NOT: 337
FUNCTIONAL CLASS: MAJOR PARK
LENGTH: 0.650 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1								
LENGTH: (MILES)	0.650								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	1								
SHOULDER WIDTH	5								
ALIGNMENT	1								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	63.1								
SERVICE:									
SURFACE WIDTH	1								
SHOULDER WIDTH	5								
ALIGNMENT	1								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	78.9								
OVERALL SUFFICIENCY RATING	74.9								
ADJUSTED OSR	78.8								
PRIORITY RATING	427.1								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	18								
PAVING AND BASE	36								
INCIDENTAL	36								
ENGINEERING	13								
BRIDGES	0								
TOTAL COSTS:	103								

*CSR-COMPONENT SUFFICIENCY RATING

TOTAL IMPROVEMENT
COSTS (M-\$):
GRADE AND DRAIN 18
PAVING AND BASE 36
INCIDENTAL 36
ENGINEERING 13
BRIDGES 0
TOTAL COSTS: 103

PANASSAS NATIONAL BATTLEFIELD PARK

NATIONAL CAPITAL PARKS

DATE: 1/22/80

PARK CODE: 3840

ROUTE NUMBER: 13

CONGRESSIONAL DISTRICT: 8

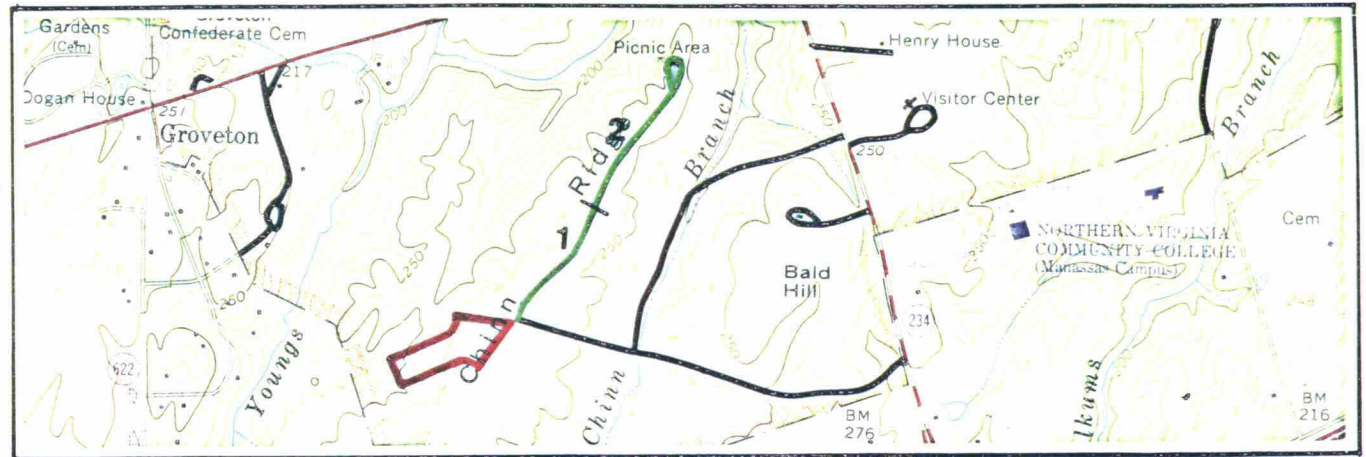
STATE: VIRGINIA

REMARKS: CHINN RIDGE RD
FRM RTES 11 & 12
TO END OF LOOP

ADT: 215

FUNCTIONAL CLASS: MAJOR PARK

LENGTH: 0.912 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- Beginning of Route

SECTION:	1	2							
LENGTH (PILES)	0.783	0.129							
TERRAIN:	R	R							
STRUCTURE:									
SURFACE CONDITION	5	5							
DRAINAGE CONDITION	5	5							
FOUNDATION CONDITION	5	5							
SHOULDER CONDITION	5	5							
*STRUCTURE CSR	100.0	100.0							
SAFETY:									
SURFACE WIDTH	1	1							
SHOULDER WIDTH	5	5							
ALIGNMENT	4	5							
STOPPING SIGHT DISTANCE	5	5							
HORIZONTAL CLEARANCE	5	5							
*ADJUSTED SAFETY CSR	78.9	84.2							
SERVICE:									
SURFACE WIDTH	1	1							
SHOULDER WIDTH	5	5							
ALIGNMENT	4	5							
GRADIENT	4	5							
ROUGHNESS	5	5							
PASSING SIGHT DISTANCE	5	5							
SURFACE CONDITION	5	5							
VERTICAL CLEARANCE	5	5							
*ADJUSTED SERVICE CSR	85.4	92.1							
OVERALL SUFFICIENCY RATING	83.7	88.2							
ADJUSTED CSR	88.1	92.8							
PRIORITY RATING	244.0	231.6							
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

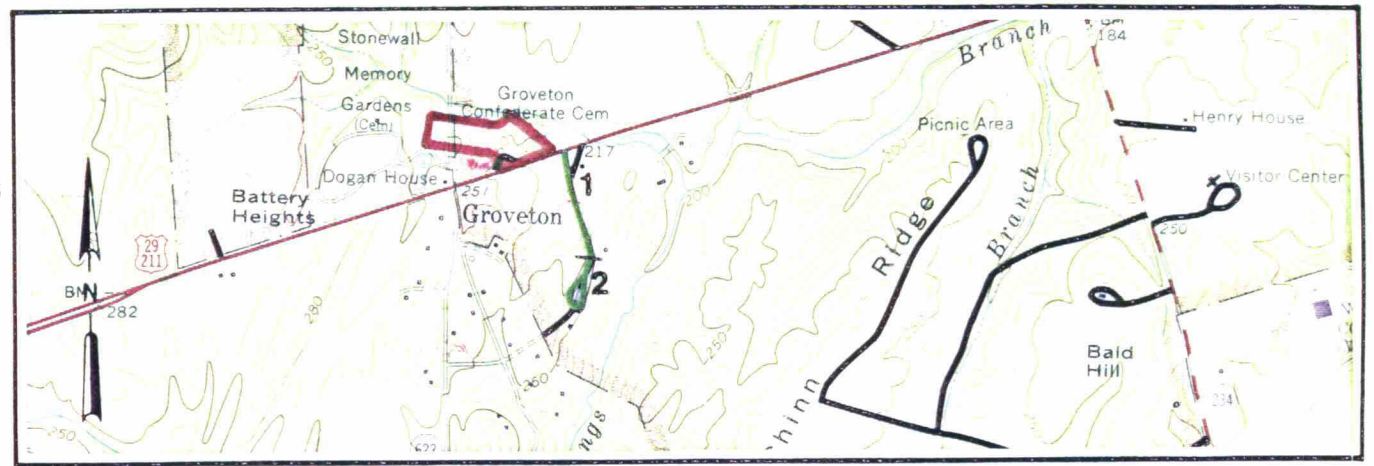
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

FARK CODE: 3840
ROUTE NUMBER: 14
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: NEW YORK AVENUE
FROM US 29-211 TO
END OF LOOP

ADT: 57
FUNCTIONAL CLASS: MAJOR PARK
LENGTH: 0.338 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1	2							
LENGTH: (MILES)	0.248	0.090							
TERRAIN:	R	R							
STRUCTURE:									
SURFACE CONDITION	5	5							
DRAINAGE CONDITION	5	5							
FOUNDATION CONDITION	5	5							
SHOULDER CONDITION	5	5							
*STRUCTURE CSR	100.0	100.0							
SAFETY:									
SURFACE WIDTH	1	1							
SHOULDER WIDTH	2	2							
ALIGNMENT	5	5							
STOPPING SIGHT DISTANCE	5	5							
HORIZONTAL CLEARANCE	1	1							
*ADJUSTED SAFETY CSR	47.3	47.3							
SERVICE:									
SURFACE WIDTH	1	1							
SHOULDER WIDTH	2	2							
ALIGNMENT	5	5							
GRADIENT	4	5							
ROUGHNESS	5	5							
PASSING SIGHT DISTANCE	5	5							
SURFACE CONDITION	5	5							
VERTICAL CLEARANCE	5	5							
*ADJUSTED SERVICE CSR	78.9	82.2							
OVERALL SUFFICIENCY RATING	72.0	73.5							
ADJUSTED OSR	75.7	77.3							
PRIORITY RATING	75.2	73.7							
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE R COSTS:									
GRADE AND DRAIN	10	7							
PAVING AND BASE	19	14							
INCIDENTAL	19	14							
ENGINEERING	7	5							
BRIDGES	0	0							
TOTAL COSTS:	55	40							

*CSR-COMPONENT SUFFICIENCY RATING

TOTAL IMPROVEMENT COSTS (M-\$):
 GRADE AND DRAIN 10
 PAVING AND BASE 19
 INCIDENTAL 19
 ENGINEERING 7
 BRIDGES 0
 TOTAL COSTS: 55

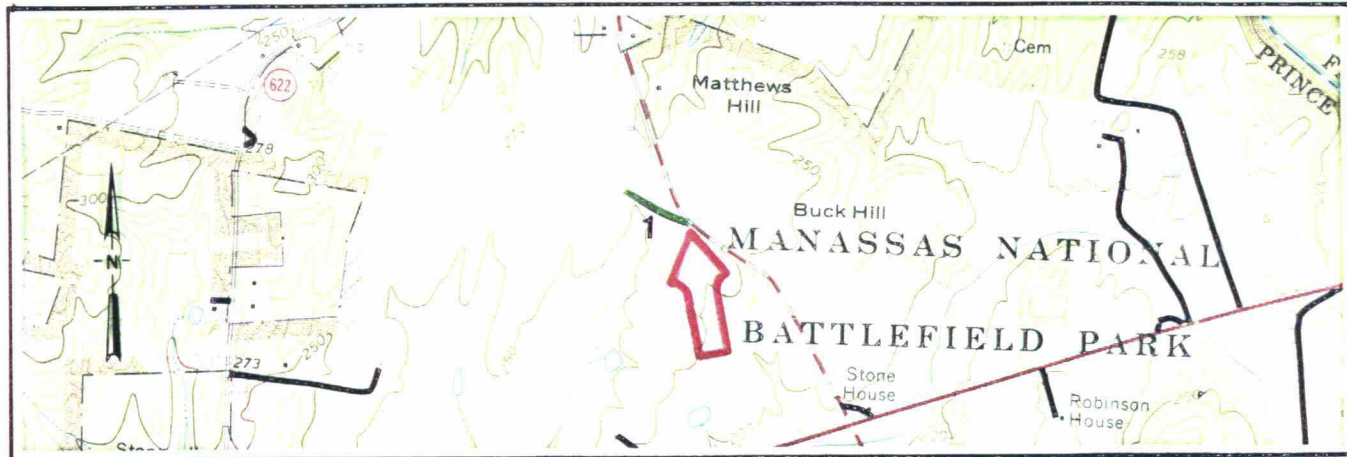
MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 100
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA

REMARKS: PICNIC AREA
FROM VA RT 234 TO
PARKING AREA

ADT: 37
FUNCTIONAL CLASS: MINOR PARK
LENGTH: 0.132 MILES



RATING COLOR CODE

— CSR Structures =>85

— CSR Structures = 65-85

— CSR Structures =<65

— Other Park Roads

➔ Beginning of Route

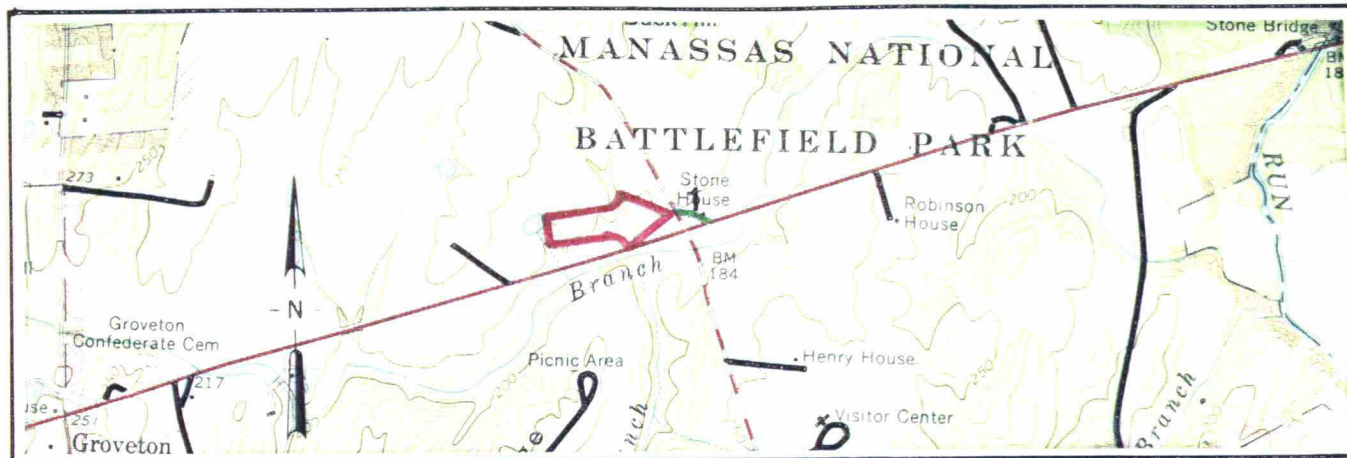
SECTION:	1								
LENGTH (MILES)	0.132								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	1								
SHOULDER WIDTH	2								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	68.4								
SERVICE:									
SURFACE WIDTH	1								
SHOULDER WIDTH	2								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	4								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	78.9								
OVERALL SUFFICIENCY RATING	76.4								
ADJUSTED CSR	80.4								
PRIORITY RATING	46.0								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3880
ROUTE NUMBER: 200
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: STONE HOUSE PARKING
FROM US RT 29-211
VA RT 234
ADT: 112
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.026 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	J								
LENGTH (MILES)	0.026								
TERRAIN:	F								
STRUCTURE:									
SURFACE CONDITION	4								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	97.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	100.0								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	4								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	96.8								
OVERALL SUFFICIENCY RATING	97.0								
ADJUSTED CSR	97.0								
PRIORITY RATING	115.8								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

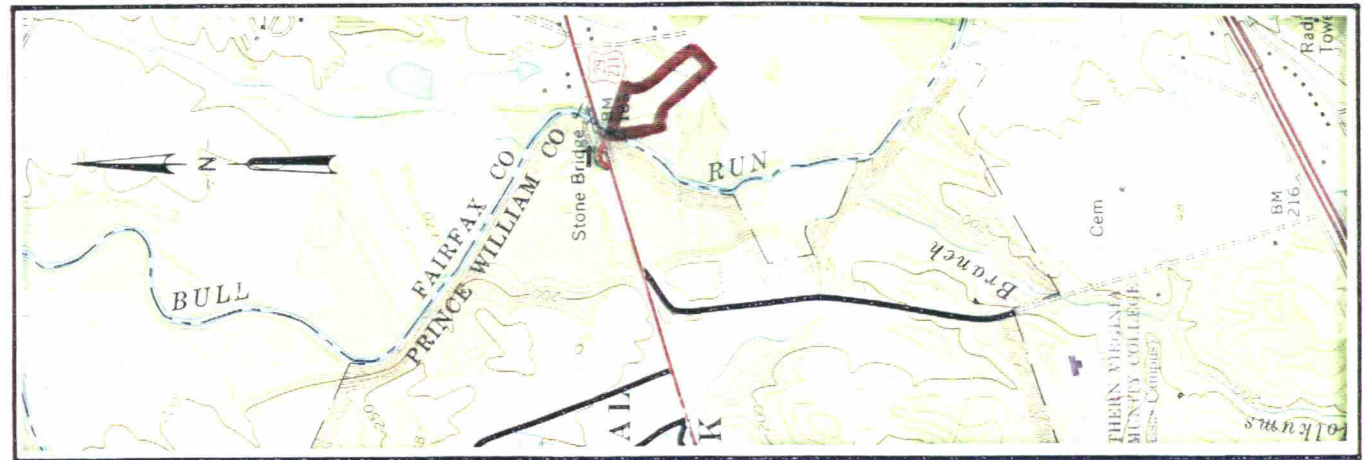
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

PARK CODE: 3840
ROUTE NUMBER: 201
CONGRESSIONAL DISTRICT: 8
STATE: VJRGJNJ
REMARKS: STONE BRIDGE PARKING
FROM US RT 29-211
TO US RT 29-211

ADT: 150
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.042 MILES



- RATING COLOR CODE**
- CSR Structures = >85
 - CSR Structures = 65-85
 - CSR Structures = <65
 - Other Park Roads
 - ➔ Beginning of Route

SECTION:	1									
LENGTH: (MILES)	0.042									
TERRAIN:	F									
STRUCTURE:										
SURFACE CONDITION	4									
DRAINAGE CONDITION	3									
FOUNDATION CONDITION	3									
SHOULDER CONDITION	3									
*STRUCTURE CSR	56.2									
SAFETY:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
STOPPING SIGHT DISTANCE	5									
HORIZONTAL CLEARANCE	5									
*ADJUSTED SAFETY CSR	100.0									
SERVICE:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
GRADIENT	5									
ROUGHNESS	4									
PASSING SIGHT DISTANCE	5									
SURFACE CONDITION	4									
VERTICAL CLEARANCE	5									
*ADJUSTED SERVICE CSR	97.7									
OVERALL SUFFICIENCY RATING	86.7									
ADJUSTED CSR	86.7									
PRIORITY RATING	173.0									
BRIDGE NUMBER										
BRIDGE LENGTH (FEET)										
IMPROVEMENT CODE & COSTS:	P									
GRADE AND DRAIN	0									
PAVING AND BASE	2									
INCIDENTAL	1									
ENGINEERING	1									
BRIDGES	0									
TOTAL COSTS:	4									

*CSR-COMPONENT SUFFICIENCY RATING

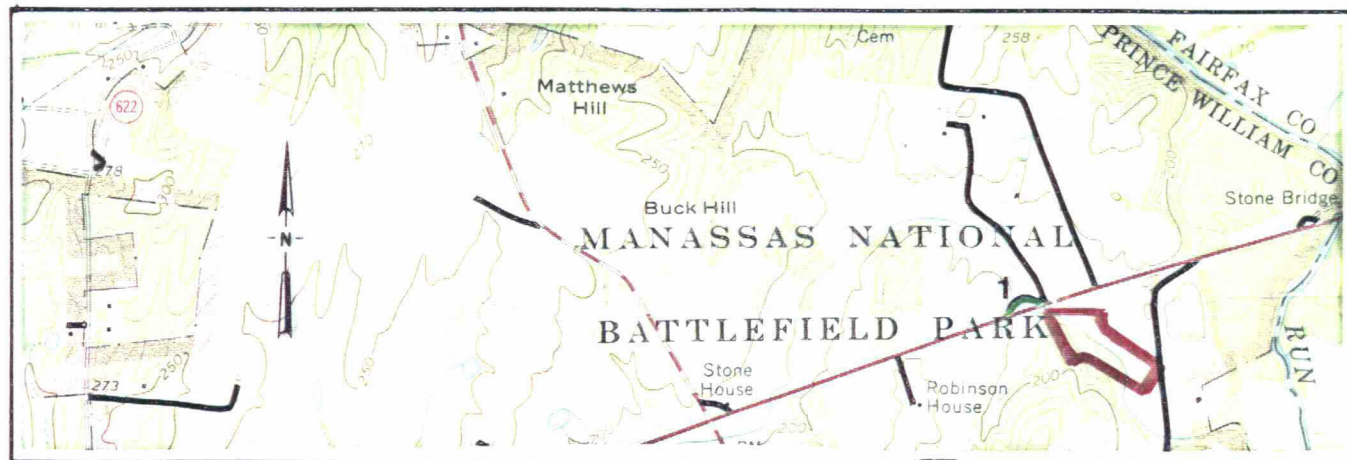
TOTAL IMPROVEMENT
COSTS (M-S):
GRADE AND DRAIN 0
PAVING AND BASE 2
INCIDENTAL 1
ENGINEERING 1
BRIDGES 0
TOTAL COSTS: 4

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 202
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: WINERY PARKING
FROM US RT 29-211
TO US RT 29-211

ADT: 112
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.030 MILES



SECTION: -----	1								
LENGTH: (MILES) -----	0.030								
TERRAIN: -----	F								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	100.0								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	100.0								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADE	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	100.0								
OVERALL SUFFICIENCY RATING	99.9								
ADJUSTED CSR	99.9								
PRIORITY RATING	112.1								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

RATING COLOR CODE

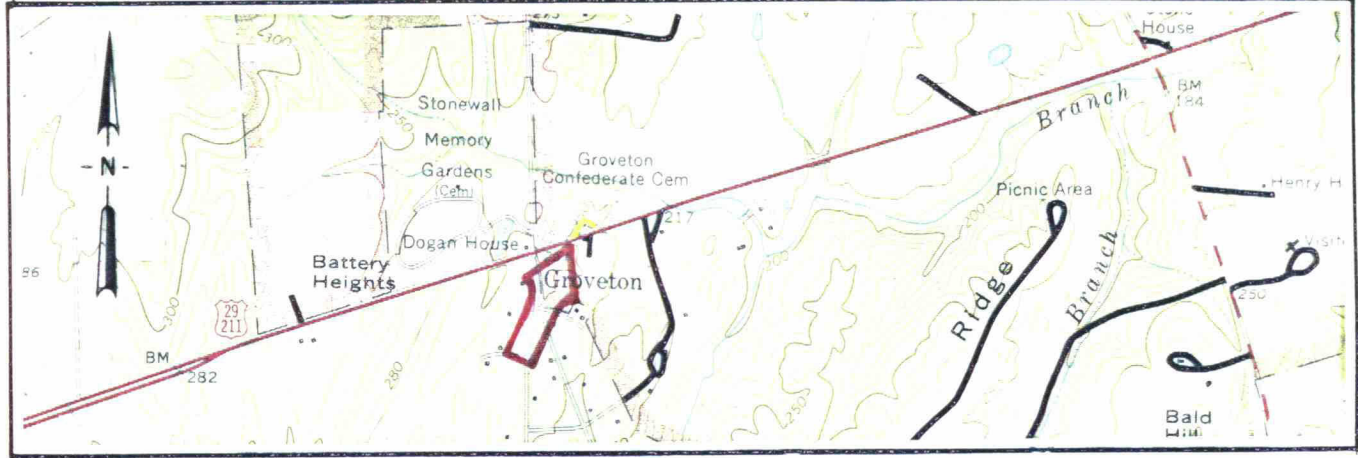
- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- Beginning of Route

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 203
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: GROVETON CEMETARY
FROM US RT 29-211 TO
PARKING AREA
ADT: 150
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.041 MILES



SECTION:	1								
LENGTH: (MILES)	0.041								
TERRAIN:	F								
STRUCTURE:									
SURFACE CONDITION	3								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	3								
SHOULDER CONDITION	5								
*STRUCTURE CSR	68.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	100.0								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	3								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	93.7								
OVERALL SUFFICIENCY RATING	89.6								
ADJUSTED CSR	89.6								
PRIORITY RATING	167.4								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

RATING COLOR CODE

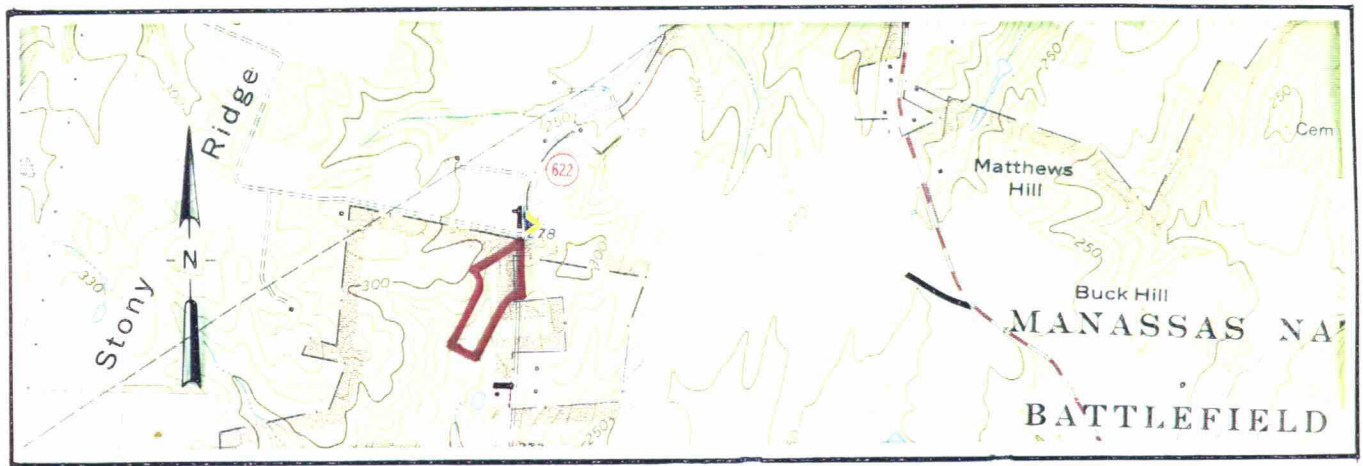
- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ↪ Beginning of Route

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 204
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: DEEP CUT PARKING AREA
FROM FEATHERPED LA TO
PARKING AREA
ADT: 112
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.019 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1									
LENGTH: (MILES)	0.019									
TERRAIN:	F									
STRUCTURE:										
SURFACE CONDITION	4									
DRAINAGE CONDITION	3									
FOUNDATION CONDITION	4									
SHOULDER CONDITION	4									
*STRUCTURE CSR	68.7									
SAFETY:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
STOPPING SIGHT DISTANCE	5									
HORIZONTAL CLEARANCE	5									
*ADJUSTED SAFETY CSR	100.0									
SERVICE:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
GRADIENT	5									
ROUGHNESS	4									
PASSING SIGHT DISTANCE	5									
SURFACE CONDITION	4									
VERTICAL CLEARANCE	5									
*ADJUSTED SERVICE CSR	93.7									
OVERALL SUFFICIENCY RATING	89.6									
ADJUSTED OSR	89.6									
PRIORITY RATING	125.0									
BRIDGE NUMBER										
BRIDGE LENGTH (FEET)										

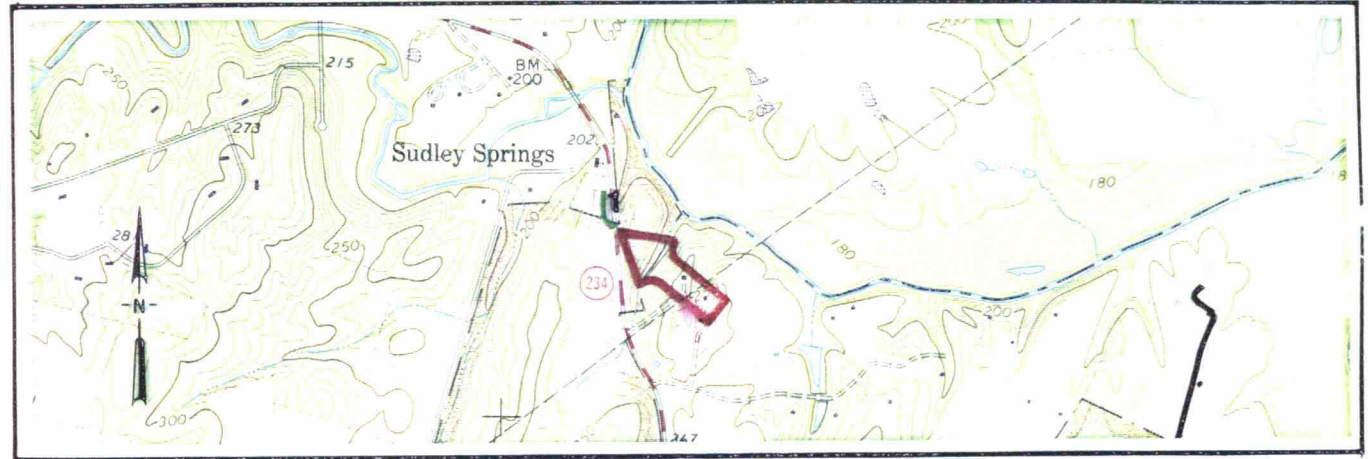
*CSR-COMPONENT SUFFICIENCY RATING

PANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 205
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: SUDLEY CHURCH PARKING
FROM VA RT 234 TO
PARKING AREA

ADT: 112
FUNCTIONAL CLASS: SPECIAL PURPOSE
LENGTH: 0.018 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

SECTION:										
LENGTH (MILES)	0.018									
TERRAIN:	F									
STRUCTURE:										
SURFACE CONDITION	5									
DRAINAGE CONDITION	5									
FOUNDATION CONDITION	5									
SHOULDER CONDITION	5									
*STRUCTURE CSR	100.0									
SAFETY:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
STOPPING SIGHT DISTANCE	5									
HORIZONTAL CLEARANCE	5									
*ADJUSTED SAFETY CSR	100.0									
SERVICE:										
SURFACE WIDTH	5									
SHOULDER WIDTH	5									
ALIGNMENT	5									
GRADIENT	5									
ROUGHNESS	5									
PASSING SIGHT DISTANCE	5									
SURFACE CONDITION	5									
VERTICAL CLEARANCE	5									
*ADJUSTED SERVICE CSR	100.0									
OVERALL SUFFICIENCY RATING	99.9									
ADJUSTED CSR	99.9									
PRIORITY RATING	112.1									
BRIDGE NUMBER										
BRIDGE LENGTH (FEET)										

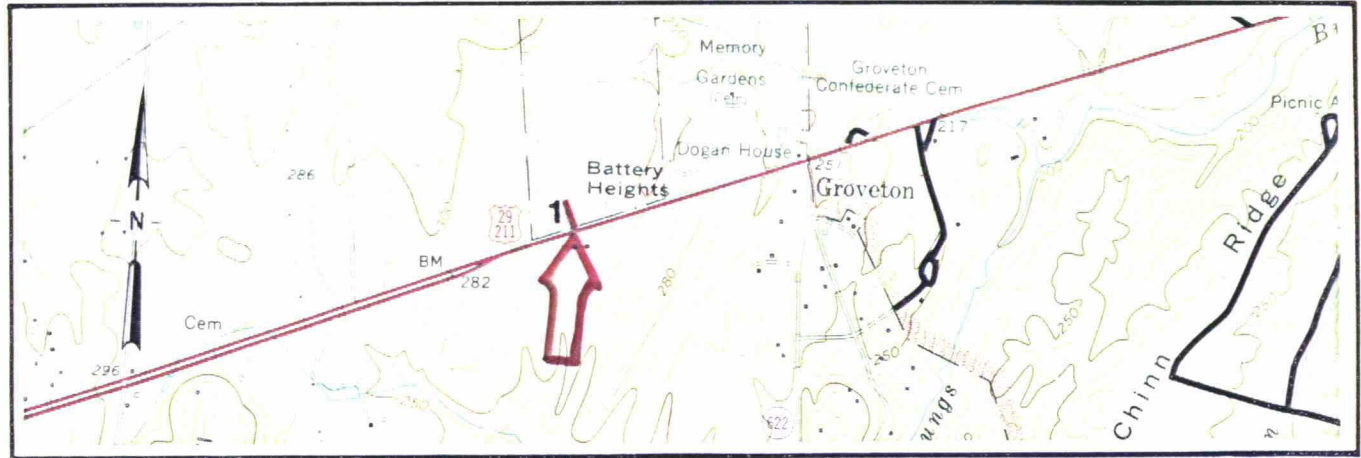
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 300
CONGRESSIONAL DISTRICT: P
STATE: VIRGINIA
REMARKS: BATTERY HEIGHTS
FROM US RT 29-211 TO
END OF PARKING AREA

ADT: 75
FUNCTIONAL CLASS: INTERPRETIVE
LENGTH: 0.064 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ⇨ Beginning of Route

TOTAL IMPROVEMENT COSTS (\$-S):	
GRADE AND DRAIN	2
PAVING AND BASE	4
INCIDENTAL	4
ENGINEERING	1
BRIDGES	0
TOTAL COSTS:	11

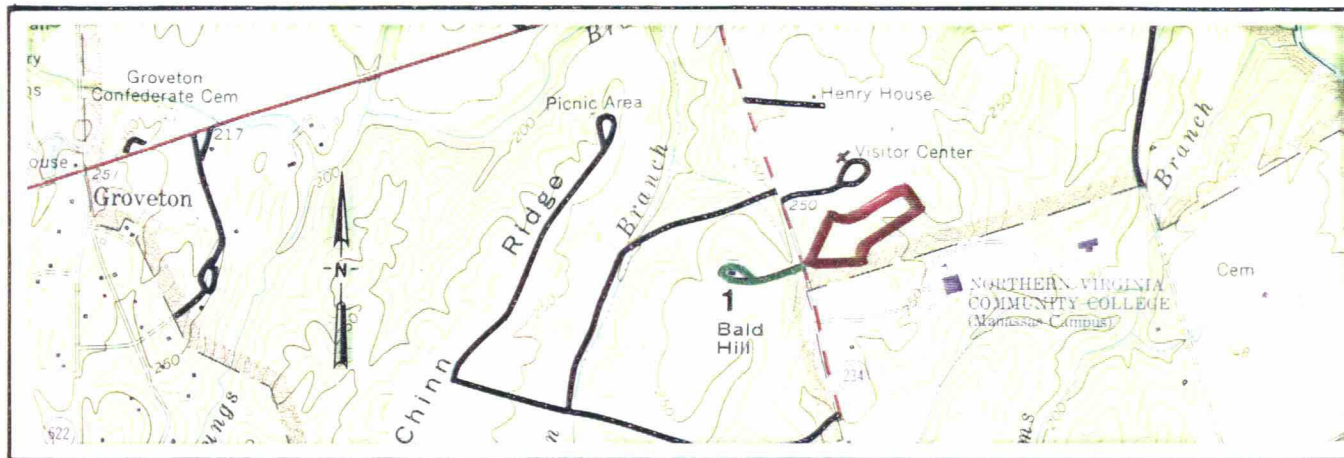
SECTION:	1								
LENGTH: (MILES)	0.064								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	4								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	4								
SHOULDER CONDITION	2								
*STRUCTURE CSR	62.5								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	4								
HORIZONTAL CLEARANCE	3								
*ADJUSTED SAFETY CSR	73.6								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	5								
GRADE	5								
ROUGHNESS	3								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	4								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	85.4								
OVERALL EFFICIENCY RATING	73.5								
ADJUSTED CSR	77.3								
PRIORITY RATING	57.0								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	2								
PAVING AND BASE	4								
INCIDENTAL	4								
ENGINEERING	1								
BRIDGES	0								
TOTAL COSTS:	11								

*CSR-COMPONENT SUFFICIENCY RATING

PANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

PARK CODE: 3840
ROUTE NUMBER: 400
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: MAINT. AREA ACCESS
FROM VA RT 234 TO
MAINTENANCE AREA
ADT: 30
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.163 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

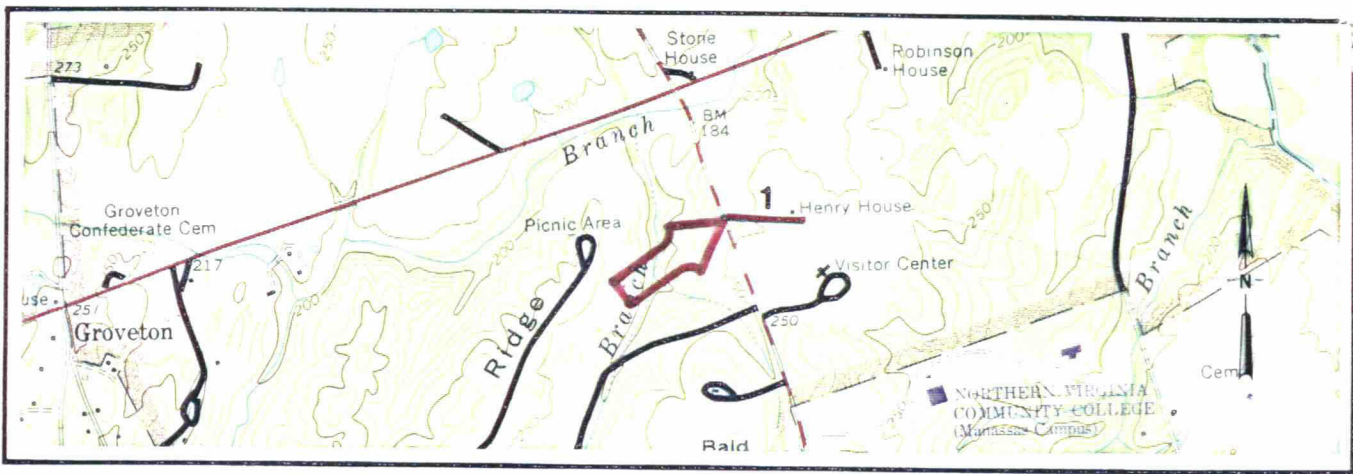
SECTION:	1								
LENGTH (MILES)	0.163								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	4								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	89.4								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	95.3								
OVERALL SUFFICIENCY RATING	89.6								
ADJUSTED CSR	94.3								
PRIORITY RATING	31.8								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/22/80

PARK CODE: 3880
ROUTE NUMBER: 402
CONGRESSIONAL DISTRICT: E
STATE: VIRGINIA
REMARKS: HENRY HOUSE ACCESS
FROM VA RT 234 TO
HENRY HOUSE
ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.127 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ➔ Beginning of Route

SECTION: _____	J								
LENGTH (MILES) _____	0.127								
TERRAIN: _____	R								
STRUCTURE:									
SURFACE CONDITION	3								
DRAINAGE CONDITION	2								
FOUNDATION CONDITION	3								
SHOULDER CONDITION	2								
*STRUCTURE CSR	37.5								
SAFETY:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	3								
*ADJUSTED SAFETY CSR	68.4								
SERVICE:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	5								
GRADIENT	4								
ROUGHNESS	3								
PASSING SIGHT DISTANCE	2								
SURFACE CONDITION	3								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	62.4								
OVERALL SUFFICIENCY RATING	55.8								
ADJUSTED CSR	58.7								
PRIORITY RATING	127.7								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE R COSTS:	4								
GRADE AND DRAIN	4								
PAVING AND BASE	7								
INCIDENTAL	7								
ENGINEERING	3								
BRIDGES	0								
TOTAL COSTS: 21	21								

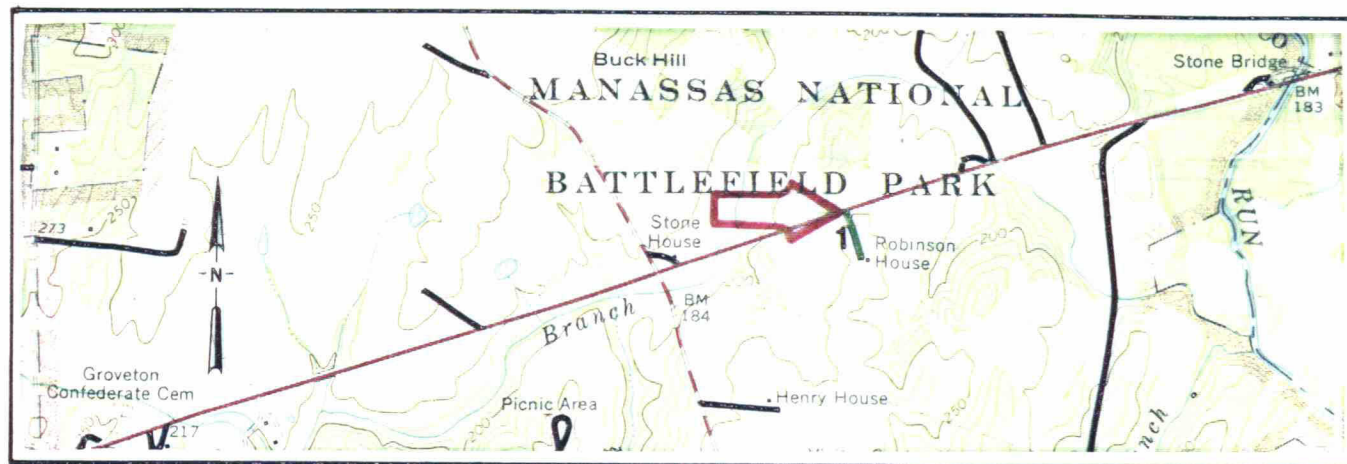
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 403
CONGRESSIONAL DISTRICT: R
STATE: VIRGINIA
REMARKS: ROBINSON HOUSE ACCESS
FROM US RT 29-211 TO
ROBINSON HOUSE

AD1: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.112 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

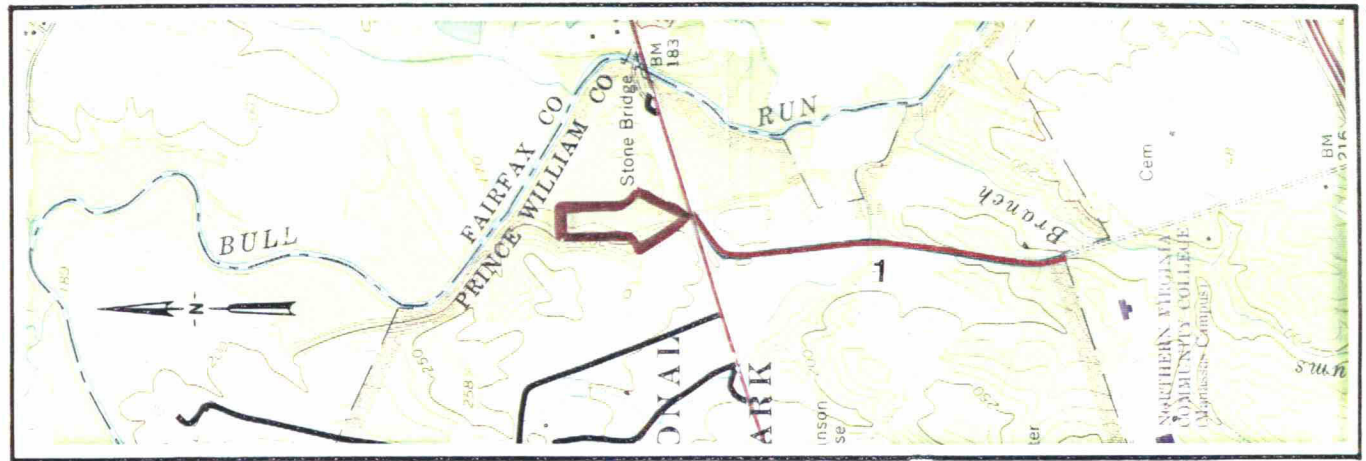
SECTION:	1								
LENGTH: (MILES)	0.112								
TERRAIN:	F								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	4								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	100.0								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	100.0								
OVERALL SUFFICIENCY RATING	98.4								
ADJUSTED CSR	98.4								
PRIORITY RATING	76.2								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 1840
ROUTE NUMBER: 408
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: ROCK RD
FROM US RT 29-211 TO
END OF PASSABLE ROAD
ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.843 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1								
LENGTH: (MILES)	0.843								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	3								
DRAINAGE CONDITION	2								
FOUNDATION CONDITION	3								
SHOULDER CONDITION	2								
*STRUCTURE CSR	37.5								
SAFETY:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	3								
STOPPING SIGHT DISTANCE	3								
HORIZONTAL CLEARANCE	3								
*ADJUSTED SAFETY CSR	47.3								
SERVICE:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	3								
GRADIENT	3								
ROUGHNESS	2								
PASSING SIGHT DISTANCE	3								
SURFACE CONDITION	3								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	52.6								
OVERALL SUFFICIENCY RATING	45.5								
ADJUSTED CSR	47.8								
PRIORITY RATING	156.9								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT COSTS (M-\$):									
GRADE AND DRAIN	24								
PAVING AND BASE	47								
INCIDENTAL	47								
ENGINEERING	17								
BRIDGES	0								
TOTAL COSTS:	135								
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	24								
PAVING AND BASE	47								
INCIDENTAL	47								
ENGINEERING	17								
BRIDGES	0								
TOTAL COSTS:	135								

*CSR-COMPONENT SUFFICIENCY RATING

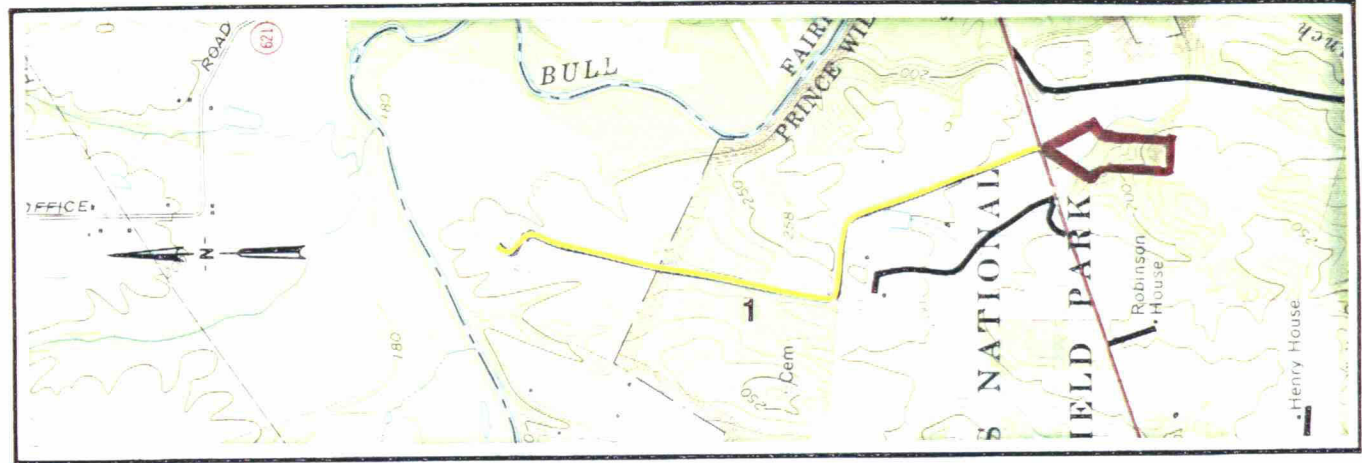
TOTAL IMPROVEMENT
COSTS (M-\$):
GRADE AND DRAIN 24
PAVING AND BASE 47
INCIDENTAL 47
ENGINEERING 17
BRIDGES 0
TOTAL COSTS: 135

IMPROVEMENT CODE & COSTS:
GRADE AND DRAIN 24
PAVING AND BASE 47
INCIDENTAL 47
ENGINEERING 17
BRIDGES 0
TOTAL COSTS: 135

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 405
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: MULLIKIN DRIVEWAY
FROM US RT 29-211 TO
QUARTERS 10
ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 1.222 MILES



- RATING COLOR CODE
- CSR Structures => 85
 - CSR Structures = 65-85
 - CSR Structures =< 65
 - Other Park Roads
 - Beginning of Route

SECTION:	1										
LENGTH: (MILES)	1.222										
TERRAIN:	F										
STRUCTURE:											
SURFACE CONDITION	3										
DRAINAGE CONDITION	3										
FOUNDATION CONDITION	4										
SHOULDER CONDITION	4										
*STRUCTURE CSR	62.5										
SAFETY:											
SURFACE WIDTH	5										
SHOULDER WIDTH	5										
ALIGNMENT	4										
STOPPING SIGHT DISTANCE	5										
HORIZONTAL CLEARANCE	3										
*ADJUSTED SAFETY CSR	85.0										
SERVICE:											
SURFACE WIDTH	5										
SHOULDER WIDTH	5										
ALIGNMENT	4										
EFFICIENT	5										
ROUGHNESS	3										
PASSING SIGHT DISTANCE	4										
SURFACE CONDITION	3										
VERTICAL CLEARANCE	2										
*ADJUSTED SERVICE CSR	71.8										
OVERALL SUFFICIENCY RATING	73.5										
ADJUSTED CSR	73.5										
PRIORITY RATING	102.0										
BRIDGE NUMBER											
BRIDGE LENGTH (FEET)											
IMPROVEMENT CODE & COSTS:	P										
GRADE AND DRAIN	0										
PAVING AND BASE	61										
INCIDENTAL	12										
ENGINEERING	12										
BRIDGES	0										
TOTAL COSTS:	85										
TOTAL COSTS:	85										

*CSR-COMPONENT SUFFICIENCY RATINGS

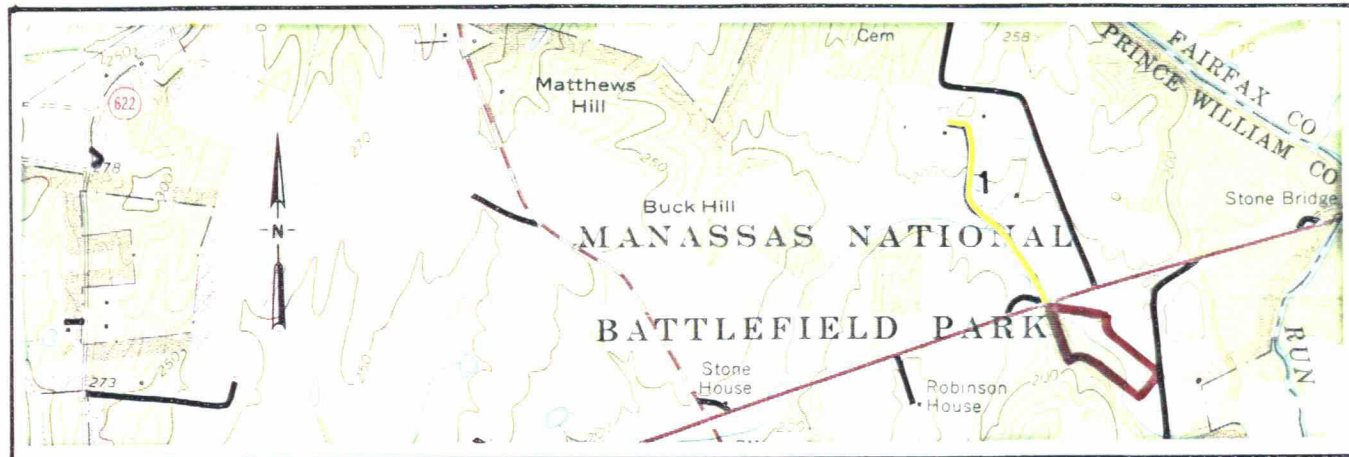
TOTAL IMPROVEMENT COSTS (M-\$):
 GRADE AND DRAIN 0
 PAVING AND BASE 61
 INCIDENTAL 12
 ENGINEERING 12
 BRIDGES 0
 TOTAL COSTS: 85

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 406
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: QUARTERS 6,7,8, DRIVE
FROM US RT 29-211 TO
QUARTERS 6,7,8

ACT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.420 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

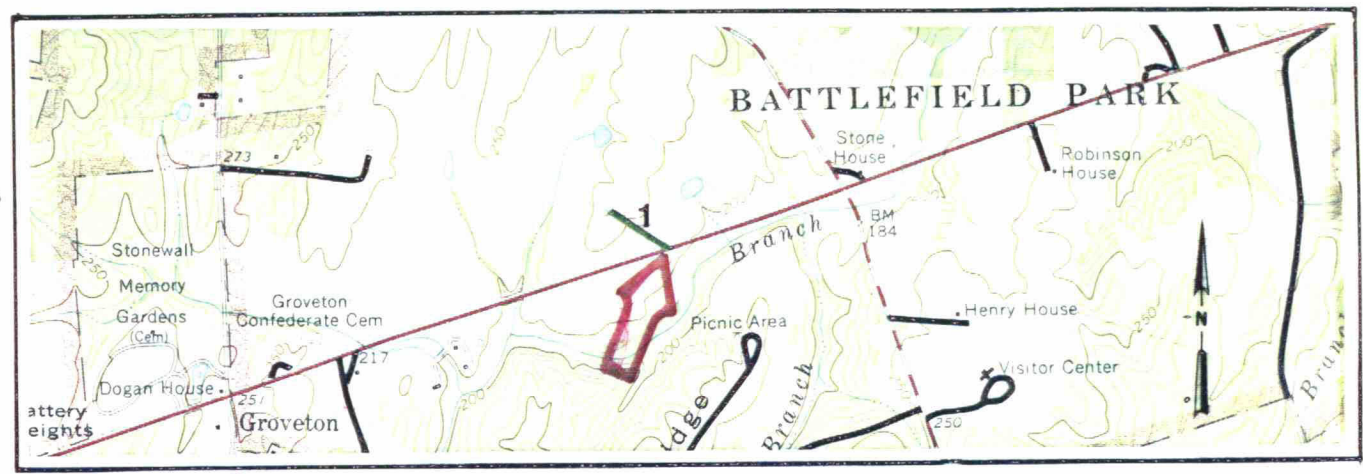
SECTION:	1								
LENGTH (MILES)	0.420								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	4								
DRAINAGE CONDITION	3								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	3								
*STRUCTURE CSR	68.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	4								
STOPPING SIGHT DISTANCE	4								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	78.9								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	2								
ALIGNMENT	4								
GRADIENT	4								
ROUGHNESS	4								
PASSING SIGHT DISTANCE	3								
SURFACE CONDITION	4								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	75.5								
OVERALL SUFFICIENCY RATING	72.0								
ADJUSTED CSR	75.7								
PRIORITY RATING	99.0								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 407
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: QUARTERS 5 ACCESS
FROM US RT 29-211 TO
END OF LOOP
ADT: 10
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.154 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- Beginning of Route

SECTION:	1								
LENGTH: (MILES)	0.154								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	4								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	105.2								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	4								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	4								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	98.6								
OVERALL SUFFICIENCY RATING	95.5								
ADJUSTED CSR	100.5								
PRIORITY RATING	5.5								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

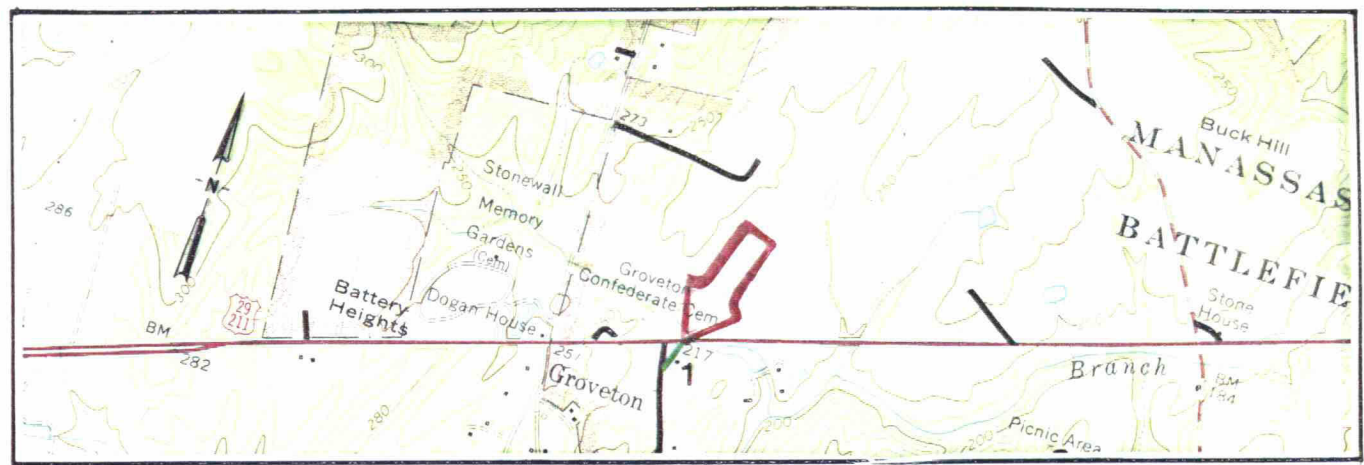
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 408
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: QUARTERS 1 DRIVEWAY
FROM US RT 29-211 TO
RTE 14

ADT: 8
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.098 MILES



- RATING COLOR CODE
- CSR Structures => 85
 - CSR Structures = 65-85
 - CSR Structures = < 65
 - Other Park Roads
 - ➔ Beginning of Route

SECTION:	1								
LENGTH (PILES)	C.C.P.								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	4								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	93.7								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	105.2								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	4								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	4								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	98.6								
OVERALL SUFFICIENCY RATING	95.5								
ADJUSTED CSR	100.5								
PRIORITY RATING	7.9								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

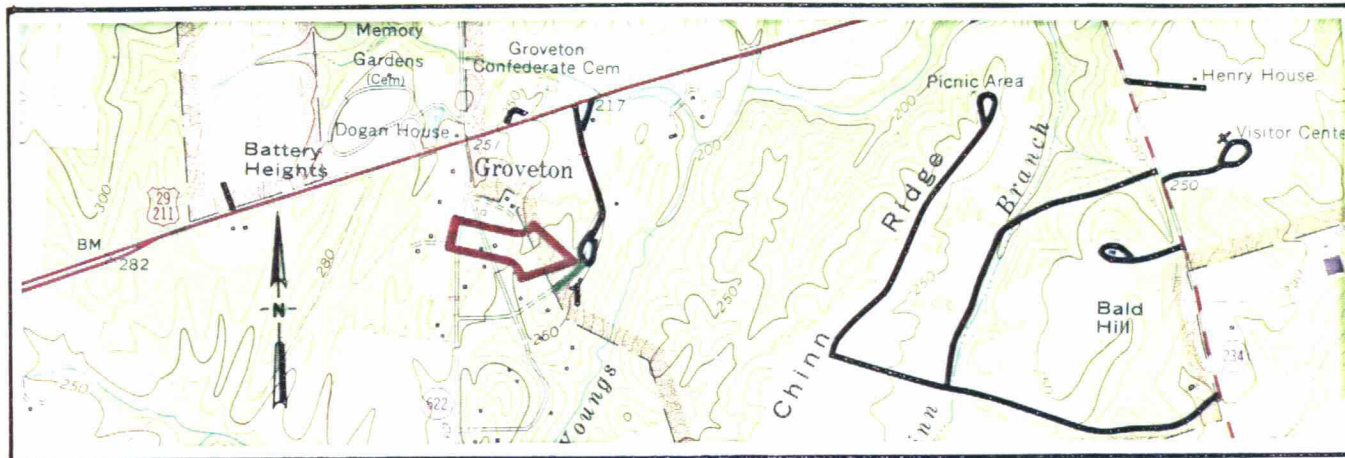
*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 409
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: QUARTERS 3 CRIVIEWAY
FROM RTE 14 TO
DEAD END

ADT: 8
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.087 MILES



RATING COLOR CODE

- CSR Structures = >85
- CSR Structures = 65-85
- CSR Structures = <65
- Other Park Roads
- ➔ Beginning of Route

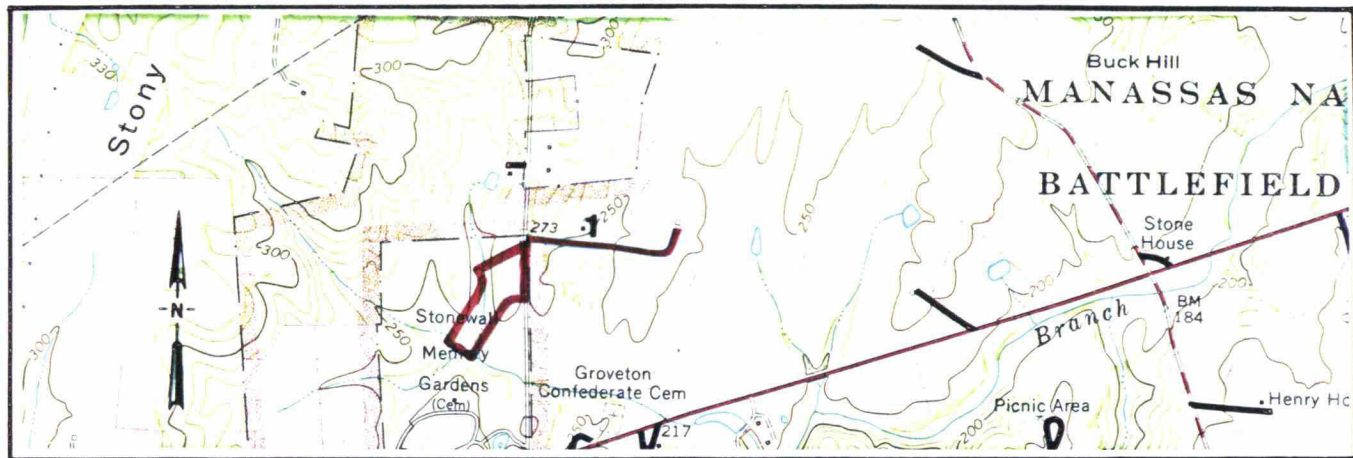
SECTION:	1								
LENGTH: (MILES)	0.087								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	100.0								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	105.2								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADE	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	105.2								
OVERALL SUFFICIENCY RATING	99.9								
ADJUSTED OSR	105.1								
PRIORITY RATING	7.6								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

PANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 410
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: PETERS HOUSE DR
FRCP FEATHERHEAD LA TO
PETERS PROPERTY
ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.315 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1								
LENGTH: (MILES)	0.315								
TERRAIN:	R								
STRUCTURE:									
SURFACE CONDITION	3								
DRAINAGE CONDITION	2								
FOUNDATION CONDITION	2								
SHOULDER CONDITION	1								
*STRUCTURE CSR	25.0								
SAFETY:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	2								
STOPPING SIGHT DISTANCE	3								
HORIZONTAL CLEARANCE	3								
*ADJUSTED SAFETY CSR	42.1								
SERVICE:									
SURFACE WIDTH	3								
SHOULDER WIDTH	2								
ALIGNMENT	2								
GRADIENT	3								
ROUGHNESS	3								
PASSING SIGHT DISTANCE	2								
SURFACE CONDITION	3								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	49.2								
OVERALL SUFFICIENCY RATING	39.6								
ADJUSTED CSR	41.6								
PRIORITY RATING	180.2								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	9								
PAVING AND BASE	18								
INCIDENTAL ENGINEERING	18								
BRIDGES	0								
TOTAL COSTS:	51								
IMPROVEMENT CODE & COSTS:									
GRADE AND DRAIN	9								
PAVING AND BASE	18								
INCIDENTAL ENGINEERING	18								
BRIDGES	0								
TOTAL COSTS:	51								

*CSR - COMPONENT SUFFICIENCY RATING

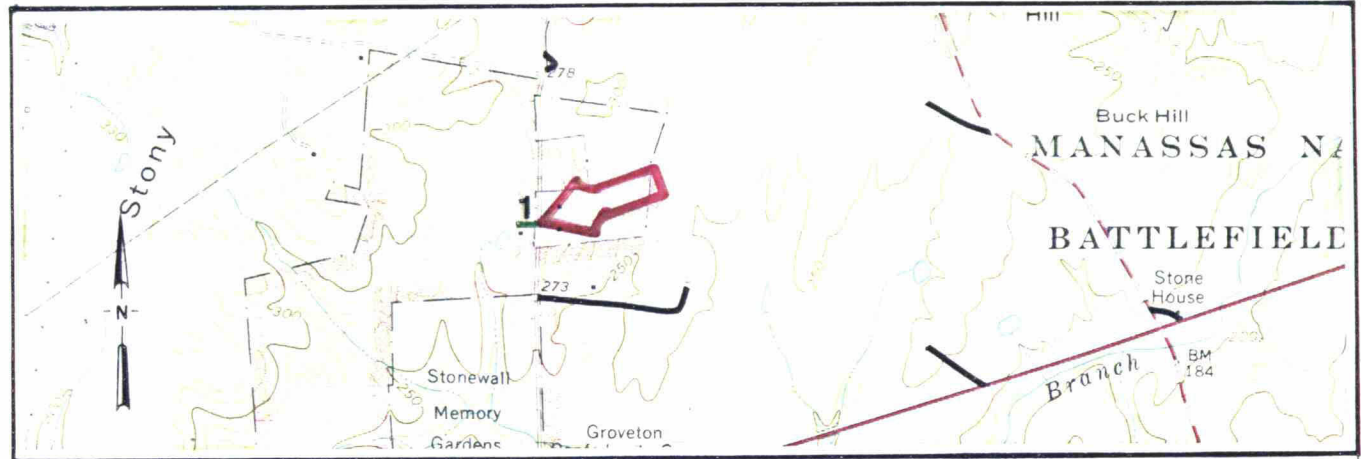
TOTAL IMPROVEMENT COSTS (M-S):
GRADE AND DRAIN 9
PAVING AND BASE 18
INCIDENTAL ENGINEERING 18
BRIDGES 0
TOTAL COSTS: 51

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 411
CONGRESSIONAL DISTRICT: P
STATE: VIRGINIA
REMARKS: QUARTERS 4 DRIVEWAY
FROM FEATHERED LA TO
QUARTERS 4

ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.055 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ↪ Beginning of Route

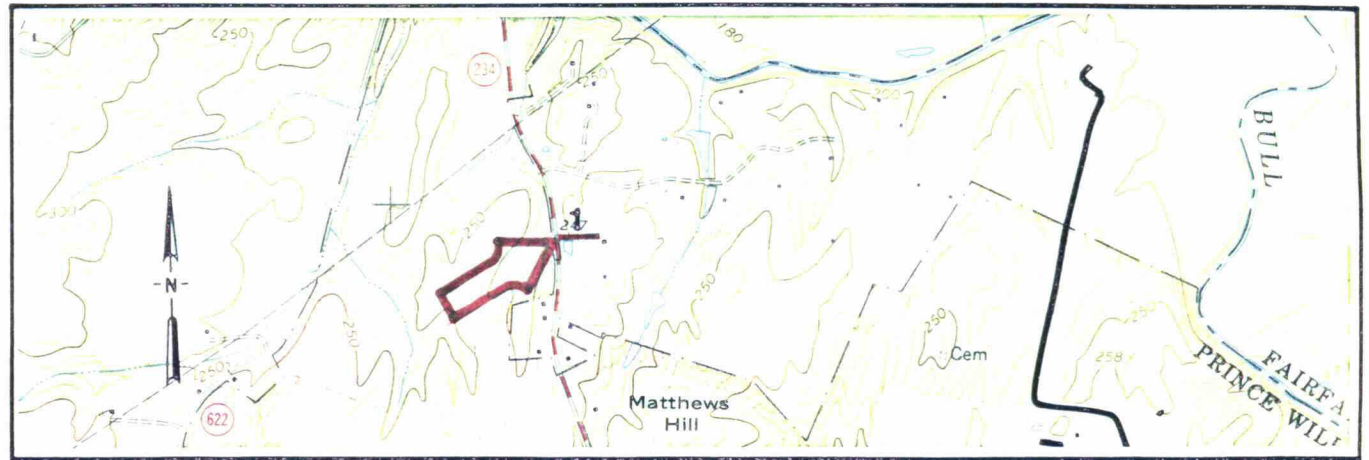
SECTION:	1								
LENGTH: (MILES)	0.055								
TERRAIN:	F								
STRUCTURE:									
SURFACE CONDITION	5								
DRAINAGE CONDITION	5								
FOUNDATION CONDITION	5								
SHOULDER CONDITION	5								
*STRUCTURE CSR	100.0								
SAFETY:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
STOPPING SIGHT DISTANCE	5								
HORIZONTAL CLEARANCE	5								
*ADJUSTED SAFETY CSR	100.0								
SERVICE:									
SURFACE WIDTH	5								
SHOULDER WIDTH	5								
ALIGNMENT	5								
GRADIENT	5								
ROUGHNESS	5								
PASSING SIGHT DISTANCE	5								
SURFACE CONDITION	5								
VERTICAL CLEARANCE	5								
*ADJUSTED SERVICE CSR	100.0								
OVERALL SUFFICIENCY RATING	99.9								
ADJUSTED CSR	99.9								
PRIORITY RATING	75.0								
BRIDGE NUMBER									
BRIDGE LENGTH (FEET)									

*CSR-COMPONENT SUFFICIENCY RATING

MANASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL CAPITAL PARKS
DATE: 1/23/80

PARK CODE: 3840
ROUTE NUMBER: 412
CONGRESSIONAL DISTRICT: 8
STATE: VIRGINIA
REMARKS: QUARTERS 9 ACCESS
FROM VA RT 234 TO
QUARTERS
ADT: 75
FUNCTIONAL CLASS: ADMIN
LENGTH: 0.101 MILES



RATING COLOR CODE

- CSR Structures =>85
- CSR Structures = 65-85
- CSR Structures =<65
- Other Park Roads
- ➔ Beginning of Route

SECTION:	1									
LENGTH (MILES)	0.101									
TERRAIN:	R									
STRUCTURE:										
SURFACE CONDITION	3									
DRAINAGE CONDITION	3									
FOUNDATION CONDITION	4									
SHOULDER CONDITION	2									
*STRUCTURE CSR	50.0									
SAFETY:										
SURFACE WIDTH	3									
SHOULDER WIDTH	2									
ALIGNMENT	5									
STOPPING SIGHT DISTANCE	4									
HORIZONTAL CLEARANCE	5									
*ADJUSTED SAFETY CSR	73.6									
SERVICE:										
SURFACE WIDTH	3									
SHOULDER WIDTH	2									
ALIGNMENT	5									
GRADIENT	4									
ROUGHNESS	2									
PASSING SIGHT DISTANCE	4									
SURFACE CONDITION	3									
VERTICAL CLEARANCE	2									
*ADJUSTED SERVICE CSR	55.8									
OVERALL SUFFICIENCY RATING	57.3									
ADJUSTED CSR	60.3									
PRIORITY RATING	124.3									
BRIDGE NUMBER										
BRIDGE LENGTH (FEET)										
IMPROVEMENT CODE & COSTS:	P									
GRACE AND DRAIN	C									
PAVING AND BASE	5									
INCIDENTAL ENGINEERING	1									
BRIDGES	C									
TOTAL COSTS:	7									

TOTAL IMPROVEMENT COSTS (M-\$):
 GRACE AND DRAIN 0
 PAVING AND BASE 5
 INCIDENTAL ENGINEERING 1
 BRIDGES 0
 TOTAL COSTS: 7

*CSR-COMPONENT SUFFICIENCY RATING

NATIONAL PARK SERVICE
ROAD INVENTORY

PRIORITY LISTING OF BACKLOG NEEDS
BY PARK

DATE: JAN 17, 1981

CSR INCLUDED FOR: STRUCTURE, SAFETY, AND SERVICE

PARK CODE	PARK NAME	ROUTE NO.	REMARKS	FUNCTIONAL CLASS	SECT. NO.	LENGTH KM(MI)	PRIORITY RATING	TOTAL COSTS (M-\$)
3840	MANASSAS NATIONAL PATTERFIELD PARK	410	PETERS HOUSE DR FROM FEATHERHEAD LA TO PETERS PROPERTY	ADMIN	1	0.506 (0.315)	180.2	51
3840	MANASSAS NATIONAL PATTERFIELD PARK	404	ROCK RD FROM US RT 29-211 TO END OF PASSABLE ROAD	ADMIN	1	1.356 (0.843)	156.9	135
3840	MANASSAS NATIONAL PATTERFIELD PARK	402	HENRY HOUSE ACCESS FROM VA RT 234 TO HENRY HOUSE	ADMIN	1	0.204 (0.127)	127.7	21
3840	MANASSAS NATIONAL PATTERFIELD PARK	412	QUARTERS 9 ACCESS FROM VA RT 234 TO QUARTERS	ADMIN	1	0.162 (0.101)	124.3	7
BACKLOG CAPITAL IMPROVEMENT (ADJUSTED CSR< 65)						2.23 (1.39)		214

PRIORITY LISTING
STRUCTURE

SUMMARY REPORT OF THE PAVEMENT CONDITION RATINGS OF ALL CLASSES OF ROADS
IN 3840-MANASSAS NATIONAL
BATTLEFIELD PARK

RTE NO.	SEC NO.	CSR STRUCT COND.	SEC LENGTH MILES	IMP CODE	CURRENT COST M-\$	ADT	ADT PERIOD	FUNCT CLASS	BEGIN M.P.	INSP. DATE	ST. CD.	NO. ACCID.	LANE CODE	SURF TYPE CODE	SAFTY CSR	SERVICE CSR	STRUCT NO.	STRUCT TYPE	BR. STRUCT COND.
10	001	75.0 XX	0.275			225	9 MO	P2P	0.000	11/83	VA	1	2	A	94.7	95.4			
11	001	81.3 XX	0.563			90	9 MO	P2P	0.000	11/83	VA	1	2	A	78.9	85.5			
12	001	75.0 XX	0.650			90	9 MO	P2P	0.000	11/83	VA	1	2	A	84.2	82.2			
13	001	81.3 XX	0.783			150	9 MO	P2P	0.000	11/83	VA	0	2	A	89.5	85.5			
13	002	81.3 XX	0.129			85	9 MO	P2P	0.783	11/83	VA	0	1	A	89.5	85.5			
14	001	81.3 XX	0.248			40	9 MO	P2P	0.000	11/83	VA	0	2	A	94.7	85.5			
14	002	81.3 XX	0.090			20	9 MO	P2P	0.248	11/83	VA	0	7	A	94.7	88.8			
100	001	81.3 XX	0.140			153	9 MO	P3U	0.000	11/83	VA	0	7	G	78.9	82.2			
200	001	81.3 XX	0.026			85	9 MO	P3U	0.000	11/83	VA	0	2	G	90.0	96.9			
201	001	68.8 XX	0.039			80	9 MO	P3P	0.000	11/83	VA	1	2	T	100.0	93.8			
202	001	81.3 XX	0.026			15	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	96.9			
203	001	87.5	0.034			15	9 MO	P3P	0.000	11/83	VA	0	7	T	100.0	96.9			
204	001	87.5	0.019			10	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	93.8			
205	001	93.8	0.018			10	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	90.6			
300	001	81.3 XX	0.054			15	9 MO	P3P	0.000	11/83	VA	0	7	T	63.2	75.6			
400	001	93.8	0.163			50	1 YR	S4P	0.000	11/83	VA	1	2	A	89.5	95.4			
402	001	62.5 XXXX	0.127	M	14	10	1 YR	S5U	0.000	11/83	VA	0	7	D	68.4	65.8			
403	001	68.8 XX	0.112			10	1 YR	S5U	0.000	11/83	VA	0	7	D	100.0	81.3			
404	001A	62.5 XXXX	0.379	M	42	12	1 YR	S5U	0.000	11/83	VA	0	7	D	47.4	59.2			
404	001B	75.0 XX	0.004			8	1 YR	S5U	0.379	11/83	VA	0	7	G	75.0	78.1			
404	001C	68.8 XX	0.473			8	1 YR	S5U	0.383	11/83	VA	0	7	D	78.9	82.2			
405	001	81.3 XX	1.230			10	1 YR	S4U	0.000	11/83	VA	0	7	G	65.0	81.3			
406	001	68.8 XX	0.415			18	1 YR	S4U	0.000	11/83	VA	0	7	G	68.4	65.8			
407	001	81.3 XX	0.154			10	1 YR	S4U	0.000	11/83	VA	0	7	G	89.5	92.1			
408	001	81.3 XX	0.093			10	1 YR	S4U	0.000	11/83	VA	0	7	G	105.3	95.4			
409	001	87.5	0.085			10	1 YR	S4P	0.000	11/83	VA	0	7	A	105.3	98.7			
410	001	37.5 XXXX	0.315	M	35	10	1 YR	S5U	0.000	11/83	VA	0	7	D	52.6	62.5			
411	001	68.8 XX	0.055			10	1 YR	S4U	0.000	11/83	VA	0	7	G	100.0	93.8			
412	001	68.8 XX	0.111			10	1 YR	S4P	0.000	11/83	VA	0	7	A	73.7	78.9			
413	001	75.0 XX	0.015			10	1 YR	S4P	0.000	11/83	VA	0	7	A	100.0	96.9			
414	001	75.0 XX	0.031			5	1 YR	S5U	0.000	11/83	VA	0	7	D	63.2	85.5			
TOTAL			6.856			91													

XX - HEAVY MAINTENANCE WORK INDICATED
XXXX - RESURFACE, REHABILITATION, OR RECONSTRUCTION INDICATED

SUMMARY REPORT OF THE PAVEMENT CONDITION RATINGS OF PRIMARY CLASS ROADS
IN 3840-MANASSAS NATIONAL
BATTLEFIELD PARK

RTE NO.	SEC NO.	CSR STRUCT COND.	SEC LENGTH MILES	IMP CODE	CURRENT COST M-\$	ADT	ADT PERIOD	FUNCT CLASS	BEGIN M.P.	INSP. DATE	ST. CD.	NO. ACCID.	LANE CODE	SURF TYPE CODE	SAFTY CSR	SERVICE CSR	STRUCT NO.	STRUCT TYPE	BR. STRUCT COND.
10	001	75.0 XX	0.275			225	9 MO	P2P	0.000	11/83	VA	1	2	A	94.7	95.4			
11	001	81.3 XX	0.563			90	9 MO	P2P	0.000	11/83	VA	1	2	A	78.9	85.5			
12	001	75.0 XX	0.650			90	9 MO	P2P	0.000	11/83	VA	1	2	A	84.2	82.2			
13	001	81.3 XX	0.783			150	9 MO	P2P	0.000	11/83	VA	0	2	A	89.5	85.5			
13	002	81.3 XX	0.129			85	9 MO	P2P	0.783	11/83	VA	0	1	A	89.5	85.5			
14	001	81.3 XX	0.248			40	9 MO	P2P	0.000	11/83	VA	0	2	A	94.7	85.5			
14	002	81.3 XX	0.090			20	9 MO	P2P	0.248	11/83	VA	0	7	A	94.7	88.8			
100	001	81.3 XX	0.140			153	9 MO	P3U	0.000	11/83	VA	0	7	G	78.9	82.2			
200	001	81.3 XX	0.026			85	9 MO	P3U	0.000	11/83	VA	0	2	G	90.0	96.9			
201	001	68.8 XX	0.039			80	9 MO	P3P	0.000	11/83	VA	1	2	T	100.0	93.8			
202	001	81.3 XX	0.026			15	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	96.9			
203	001	87.5	0.034			15	9 MO	P3P	0.000	11/83	VA	0	7	T	100.0	96.9			
204	001	87.5	0.019			10	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	93.8			
205	001	93.8	0.018			10	9 MO	P3P	0.000	11/83	VA	0	2	T	100.0	90.6			
300	001	81.3 XX	0.054			15	9 MO	P3P	0.000	11/83	VA	0	7	T	63.2	75.6			
TOTAL			3.094																

XX - HEAVY MAINTENANCE WORK INDICATED

XXXX - RESURFACE, REHABILITATION, OR RECONSTRUCTION INDICATED

8/10/84

SUMMARY REPORT OF THE PAVEMENT CONDITION RATINGS OF SECONDARY CLASS ROADS
IN 3840-MANASSAS NATIONAL
BATTLEFIELD PARK

PAGE 1

RTE NO.	SEC NO.	CSR STRUCT COND.	SEC LENGTH MILES	IMP CODE	CURRENT COST M-\$	ADT	ADT PERIOD	FUNCT CLASS	BEGIN M.P.	INSP. DATE	ST. CD.	NO. ACCID.	LANE CODE	SURF TYPE CODE	SAFTY CSR	SERVICE CSR	STRUCT NO.	STRUCT TYPE	BR. STRUCT COND.
400	001	93.8	0.163			50	1 YR	S4P	0.000	11/83	VA	1	2	A	89.5	95.4			
402	001	62.5	0.127	M	14	10	1 YR	S5U	0.000	11/83	VA	0	7	D	68.4	65.8			
403	001	68.8	0.112			10	1 YR	S5U	0.000	11/83	VA	0	7	D	100.0	81.3			
404	001A	62.5	0.379	M	42	12	1 YR	S5U	0.000	11/83	VA	0	7	D	47.4	59.2			
404	001B	75.0	0.004			8	1 YR	S5U	0.379	11/83	VA	0	7	G	75.0	78.1			
404	001C	68.8	0.473			8	1 YR	S5U	0.383	11/83	VA	0	7	D	78.9	82.2			
405	001	81.3	1.230			10	1 YR	S4U	0.000	11/83	VA	0	7	G	65.0	81.3			
406	001	68.8	0.415			18	1 YR	S4U	0.000	11/83	VA	0	7	G	68.4	65.8			
407	001	81.3	0.154			10	1 YR	S4U	0.000	11/83	VA	0	7	G	89.5	92.1			
408	001	81.3	0.093			10	1 YR	S4U	0.000	11/83	VA	0	7	G	105.3	95.4			
409	001	87.5	0.085			10	1 YR	S4P	0.000	11/83	VA	0	7	A	105.3	98.7			
410	001	37.5	0.315	M	35	10	1 YR	S5U	0.000	11/83	VA	0	7	D	52.6	62.5			
411	001	68.8	0.055			10	1 YR	S4U	0.000	11/83	VA	0	7	G	100.0	93.8			
412	001	68.8	0.111			10	1 YR	S4P	0.000	11/83	VA	0	7	A	73.7	78.9			
413	001	75.0	0.015			10	1 YR	S4P	0.000	11/83	VA	0	7	A	100.0	96.9			
414	001	75.0	0.031			5	1 YR	S5U	0.000	11/83	VA	0	7	D	63.2	85.5			
TOTAL			3.762		91														

XX - HEAVY MAINTENANCE WORK INDICATED

XXXX - RESURFACE, REHABILITATION, OR RECONSTRUCTION INDICATED

NATIONAL PARK SERVICE
ROAD INVENTORY

PRIORITY LISTING OF PACKLOG NEEDS
BY PARK

DATE: JAN 17, 1981

STRUCTURE CSR

PARK CODE	PARK NAME	ROUTE NO.	REMARKS	FUNCTIONAL CLASS	SECT. NO.	LENGTH (MP/MI)	PRIORITY RATING	TOTAL COSTS (M-\$)
3840	MANASSAS NATIONAL PATTERFIELD PARK	410	PETERS HOUSE CR FROM FEATHERHEAD LA TO PETERS PROPERTY	ADMIN	1	0.504 (0.315)	300.0	51
3840	MANASSAS NATIONAL PATTERFIELD PARK	201	STONE BRIDGE PARKING FROM US RT 29-211 TO US RT 29-211	SPECIAL PURPOSE	1	0.067 (0.042)	266.9	4
3840	MANASSAS NATIONAL PATTERFIELD PARK	402	HENRY HOUSE ACCESS FROM VA RT 234 TO HENRY HOUSE	ADMIN	1	0.204 (0.127)	200.0	21
3840	MANASSAS NATIONAL PATTERFIELD PARK	404	FOCK RD FROM US RT 29-211 TO END OF PASSABLE ROAD	ADMIN	1	1.356 (0.843)	200.0	135
3840	MANASSAS NATIONAL PATTERFIELD PARK	412	QUARTERS 9 ACCESS FROM VA RT 234 TO QUARTERS	ADMIN	1	0.162 (0.101)	150.0	7
3840	MANASSAS NATIONAL PATTERFIELD PARK	300	BATTERY HEIGHTS FROM US RT 29-211 TO END OF PARKING AREA	INTERPRETIVE	1	0.102 (0.064)	120.0	11
3840	MANASSAS NATIONAL PATTERFIELD PARK	405	MULLIKIN DRIVEWAY FROM US RT 29-211 TO QUARTERS 10	ADMIN	1	1.965 (1.222)	120.0	85
PACKLOG CAPITAL IMPROVEMENT (STRUCTURE CSR 65)						4.36 (2.71)		314
PACKLOG OF PREVENTIVE MAINTENANCE NEEDS (STRUCTURE CSR 65- 85)						1.21 (0.76)		5

PRIORITY LISTING
SAFETY

NATIONAL PARK SERVICE
ROAD INVENTORY
PRIORITY LISTING OF BACKLOG NEEDS
BY PARK

DATE: JAN 27, 1981

		SAFETY CSR							
PARK CODE	PARK NAME	ROUTE NO.	REMARKS	FUNCTIONAL CLASS	SECT. NO.	LENGTH KM (MI)	PRIORITY RATING	TOTAL COSTS (M-\$)	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	11	SOUTH CHINN RIDGE RD FROM VA RT 234 TO RTE 12 & RTE 13	MAJOR PARK	1	0.905 (0.563)	583.0	91	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	12	NORTH CHINN RIDGE RD FROM VA RT 234 TO RTE 11 & RTE 13	MAJOR PARK	1	1.045 (0.650)	534.0	103	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	410	PETERS HOUSE DR FROM FEATHERHEAD LA TO PETERS PROPERTY	ADMIN	1	0.506 (0.315)	178.1	51	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	404	RCK R FROM US RT 29-211 TO END OF PASSABLE ROAD	ADMIN	1	1.356 (0.843)	158.5	135	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	14	NEW YORK AVENUE FROM US 29-211 TO END OF LOOP	MAJOR PARK	1	0.355 (0.248)	120.5	40	
3840	MANASSAS NATIONAL BATTLEFIELD PARK	14	NEW YORK AVENUE FROM US 29-211 TO END OF LOOP	MAJOR PARK	2	0.144 (0.090)	120.5	15	
BACKLOG CAPITAL IMPROVEMENT (SAFETY ADJ. CSRC 65)						4.35 (2.71)		435	

✓ PRIORITY LISTING
SERVICE

NATIONAL PARK SERVICE
ROAD INVENTORY

PRIORITY LISTING OF BACKLOG NEEDS
BY PARK

DATE: JAN 16, 1981

SERVICE CSR

PARK CODE	PARK NAME	ROUTE NO.	REMARKS	FUNCTIONAL CLASS	SEC1. NO.	LENGTH KM (MI)	PRIORITY RATING	TOTAL COSTS (M-\$)
3880	MANASSAS NATIONAL PATTERFIELD PARK	410	PETERS HOUSE DR FROM FEATHERHEAD LA TO PETERS PROPERTY	ADMIN	1	0.506 (0.315)	152.4	51
3880	MANASSAS NATIONAL PATTERFIELD PARK	404	ROCK RD FROM US RT 29-211 TO END OF PASSABLE ROAD	ADMIN	1	1.356 (0.843)	142.5	135
3880	MANASSAS NATIONAL PATTERFIELD PARK	412	QUARTERS 9 ACCESS FROM VA RT 234 TO QUARTERS	ADMIN	1	0.162 (0.101)	134.4	7
3880	MANASSAS NATIONAL PATTERFIELD PARK	402	HENRY HOUSE ACCESS FROM VA RT 234 TO HENRY HOUSE	ADMIN	1	0.204 (0.127)	120.1	21
BACKLOG CAPITAL IMPROVEMENT (SERVICE ADJ. CSRC 65)						2.23 (1.39)		214

NARRATIVE REPORT
MANASSAS NATIONAL BATTLEFIELD PARK
Inspected On: November 8, 1983

Shoulders

Shoulders are low on Routes 11, 12, 13, and 400 due to a recent pavement overlay. Shoulders are high on Routes 100, 201, 300, 410, 411, and 414 allowing ponding to occur on the roadway surface. Shoulder rutting occurs at the intersection of Route 10 with State Route 234.

Recommendations:

Low and rutted shoulders should be brought up to grade with a stabilized mixture of aggregate and topsoil which will allow turf reestablishment. High shoulders should be cut back and have turf reestablished.

Ditches

The ditches along most of the Park roads are in good condition. With no ditches located along Routes 404 and 410, storm runoff uses the roadway as a drainage channel resulting in severe ponding and wheelpath rutting.

Recommendations:

In cut sections such as along Routes 404 and 410, ditches should be provided. All ditches should be cleaned and inspected on a periodic basis.



Low Shoulder on Rte. 13



Ditch along Rte. 10 in Need of Cleaning

Signs

Some non-standard signs are used in the Park and many signs are mounted too low. Regulatory and advisory signs are not found on many routes and several intersections are not controlled by signs.

Recommendations:

All signs in the Park should meet the Manual on Uniform Traffic Control Devices (MUTCD) standards for coloring, wording, and dimensions. When replacing signs, an attempt should be made to replace all non-standard signs. Signs should be mounted at a minimum height of 5 feet from the ground in accordance with the MUTCD standard. All signs should be mounted to yield when impacted by a vehicle. Intersections and routes in the Park should be studied for the addition of regulatory and advisory signs where they are needed.

Culverts and Catch Basins

Most of the culverts in the Park are in good condition. The culvert on Route 12 at milepost 0.35 has collapsed causing a depression in the roadway. The culvert at the entrance of Route 407 is in poor condition. An unsuccessful attempt has been made to construct headwalls and wingwalls at both ends of the Route 406 culvert at milepost 0.17. A culvert is needed on Route 404 at milepost 0.38.

Recommendations:

The Route 12 culvert should be replaced. The Route 407 culvert end section should be replaced.



Low Mounted Sign on Rte. 10



Culvert Outlet at MP 0.17 on Rte. 406

Permanent headwalls and wingwalls should be constructed for the Route 406 culvert. All culverts and catch basins should be inspected and/or cleaned on a periodic basis and after major storms.

Fences

All the wood and wire fences in the Park are in good condition.

Recommendations:

None

Striping

There is no striping on any of the primary paved routes in the Park. There is white centerline striping at the entrance of Route 400.

Recommendations:

For increased safety, all paved primary routes should be striped according to MUTCD standards. For better parking utilization and increased safety, the parking areas on Routes 201, 202, 203, 204, 300 should be striped according to MUTCD standards.

Vegetation

Curb joints and pavement cracks are vegetated on Route 14. Trees and vegetation encroach the roadway and shoulder on Routes 404, 412, and 414.



White Centerline Striping at Entrance to Rte. 400



Heavy Vegetation on Rte. 414

Recommendations:

Vegetation growing in joints and cracks should be removed and joints properly sealed to prevent further deterioration. Trees and encroaching vegetation should be cut back and eliminated to allow safe vehicle use of the roadway.

PAVEMENTS

Joints

Portland cement roadways are not used in the Park.

Texture and Cracks

There is transverse cracking on the Route 10 roadway and block cracking in the parking area. Routes 12, 13, and 409 are raveled. There is some rutting on Routes 13 and 400. Route 13 is also experiencing some pavement bleeding. There is longitudinal cracking along the centerline of Route 14 and between the roadway and turnout.

Edge

There is edge raveling on Route 12 due to vehicles pulling off the roadway. There is also some edge cracking along Route 409.

Recommendations:

Pavement cracking requires additional maintenance to prolong adequate pavement performance. All cracking should be sealed to prevent water infiltration and additional deterioration. Minor cracks may be sealed by cleaning and filling with hot bitumen. Major cracking requires patching, surface treatment or bituminous overlay.



Raveling on Rte. 13



Edge Cracking along Rte 12

Guardrails

Guardrails are not used in the Park.

Recommendations:

None

Delineators

Delineators should be placed at significant drop-offs near culvert inlets and outlets located adjacent to the roadway, such as those located on Routes 205, 407, 408, and 413. The Route 12 gate needs delineation.

Recommendations:

Reflectors or object markers should be installed near roadside hazards such as a significant drop-off near a culvert inlet or outlet. Gates should have reflective delineation. In the MUTCD, red and white barricade panels are specified to warn and alert drivers of a permanent or semi-permanent closure of a road.

Curbs

Most of the curbs in the Park are in good condition. There is some cracking in the Route 13 and 14 curbs. There are no curb stops in any of the unpaved parking areas.

Recommendations:

All curbing in the Park should be maintained on a periodic basis. All cracks and joints should be cleaned and sealed to prevent deterioration. Curb stops in unpaved parking areas would assist in delineating parking area slots.



No Delineation of Culvert at Rte. 407 Intersection with U.S. 29



Curb along Rte. 13 Turnout

Sidewalks

The bituminous sidewalk on Route 14 is in good condition.

Recommendations:

All sidewalks in the Park should be maintained on a periodic basis. All cracks and joints should be cleaned and sealed to prevent deterioration.

Retaining Walls

There are no retaining walls in the Park.

Recommendations:

None

Encroachments

Trees and other vegetation encroach upon Routes 404, 412, and 414.

Recommendations:

Encroaching trees and other vegetation should be removed along all Park roads in order to improve traffic safety.

Turnouts

The gravel turnouts on Route 400 are in good condition.

Recommendations:

All turnouts should be maintained in the same manner as the adjacent roadway.



Bituminous Sidewalk along Rte. 14



Trees and Other Vegetation Encroaching upon Rte. 404

GENERAL COMMENTS

Traffic counters should be used on all of the Park routes so that accurate traffic data can be obtained. The guidelines for traffic data collection mailed with the update questionnaire should be used to develop a data collection plan.

Unpaved Roads

Wheelpaths are rutted on Routes 402, 403, 404, 410, and 414 due to poor drainage. Ditches are required along Routes 404 and 410 to channel drainage away from the roadway.

Paved Roads

There is edge cracking on Route 12 due to vehicles pulling off the roadway. There is transverse cracking on the Route 10 roadway and block cracking in the parking area. Routes 12, 13, and 409 are raveled. There is some rutting on Routes 13 and 400. Route 13 is also experiencing some pavement bleeding. There is longitudinal cracking along the centerline of Route 14 and between the roadway and turnout. There is also some edge cracking along Route 409.

Recommendations:

Unpaved roads should be maintained by periodically regrading with aggregate added to the surface in order to reduce rutting. Ditches should be provided along sections of roadway where drainage ponding occurs. Minor cracks may be sealed by cleaning and filling with hot bitumen.



Poor Drainage on Rte. 410 at MP 0.12



Sealed Cracks on Rte. 10

MAINTENANCE
FEATURES
INVENTORY

DATE: 01/29/81

MAMASSAS NATIONAL
BATTLEFIELD PARK

NATIONAL PARK SERVICE
ROAD INVENTORY

PARK SUMMARY

NATIONAL CAPITAL PARKS

PARK CODE: 3840

DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
180	CULVERT	41		
195	CURB (CONCRETE)		.22 KILOMETERS	.14 MILES
210	CELINEAR CR	19		
230	DITCH (BITUMINOUS)		.81 KILOMETERS	.50 MILES
235	DITCH (UNPAVED)		5.92 KILOMETERS	3.68 MILES
280	DROP INLET	1		
310	FENCE (WIRE)		.47 KILOMETERS	.41 MILES
311	FENCE (WOOD)		1.92 KILOMETERS	1.19 MILES
380	INTERSECTION	46		
381	PRIVATE ENTRANCE	107		
420	LITTER BARREL	25		
520	PARKING AREA (BITUMINOUS)		1,280.00 SQ. METERS	1,530.88 SQ. YDS.
529	PARKING AREA (GRAVEL)		3,421.00 SQ. METERS	4,091.52 SQ. YDS.
670	ROADWAY (BITUMINOUS)		27,100.40 SQ. METERS	32,412.08 SQ. YDS.
679	ROADWAY (GRAVEL)		20,076.50 SQ. METERS	24,011.50 SQ. YDS.
700	SIGN	73		
715	SHOULDER (GRASS)		7,312.90 SQ. METERS	8,746.23 SQ. YDS.
790	TURNOUT (BITUMINOUS)		1,754.70 SQ. METERS	2,098.62 SQ. YDS.
799	TURNOUT (GRAVEL)		1,091.60 SQ. METERS	2,262.34 SQ. YDS.
880	UTILITIES	25		
990	EASE	13		

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=BOTH R=RIGHT A=ACROSS
3840	10	VIRGINIA	08	ACF	337	VISITOR CENTER ACCESS FROM VA RT 234 TO END OF LOOP	01/22/80	.27	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS BEG END	MILES BEG END	LCC	WIDTH	TOTAL CR REST OF REPAIRS
380	INTERSECTION	.00	.00	A		VA RT 234
670	ROADWAY (BITUMINOUS)	.00 .43	.00 .27	A	7.00	
180	CULVERT	.00	.00	A		
280	DROP INLET	.00	.00	L		
700	SIGN	.00	.00	L		R1-1
		.00	.00	L		STOP
700	SIGN	.00	.00	L		NON-STD
		.00	.00	L		PICNIC AREA 1MILE
715	SHOULDERS (GRASS)	.01	.01	R		
990	GATE	.01	.01	A		
700	SIGN	.01	.01	R		I1-1
		.01	.01	R		MANASSAS NATIONAL BATTLEFIELD PARK
700	SIGN	.04	.03	R		R2-1
		.04	.03	R		SPEED LIMIT 15
230	DITCH (BITUMINOUS)	.04 .17	.03 .11	R		
700	SIGN	.17	.11	R		I1-1
		.17	.11	R		FARM CLOSED AT DAWN
380	INTERSECTION	.19	.12	L		END OF LOOP
380	INTERSECTION	.19	.12	L		PARKING AREA ENTRANCE
700	SIGN	.20	.13	L		I1-1
		.20	.13	L		VISITOR CENTER PARKING
210	DELINEATOR	.24	.15	R		
790	TURNOUT (BITUMINOUS)	.24 .28	.15 .18	R	6.50	
420	LITTER BARREL	.24	.15	L		
420	LITTER BARREL	.27	.17	L		
210	DELINEATOR	.28	.18	R		
210	DELINEATOR	.32	.20	L		
380	INTERSECTION	.32	.20	L		PARKING AREA EXIT
520	PARKING AREA (BITUMINOUS)	.32	.20	L		20YD X 70YD = 1400 SQ YDS
420	LITTER BARREL	.37	.23	R		
700	SIGN	.38	.24	R		I1-1
		.38	.24	R		NATIONAL PARK SERVICE EMBLEM SIGN
380	INTERSECTION	.43	.27	A		RTE 10

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAC INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	10	180	CULVERT	1		
CONGRESSIONAL DISTRICT:	08	210	DELINEATOR	5		
STATE:	VIRGINIA	230	DITCH (BITUMINOUS)		.13 KILOMETERS	.08 MILES
AVERAGE DAILY TRAFFIC:	337	280	CRCP INLET	1		
FUNCTIONAL CLASS:	PARKWAY OR MAJOR	380	INTERSECTION	5		
		420	LITTER BARREL	3		
LENGTH:	.27 MILES	520	PARKING AREA (BITUMINOUS)		1,280.00 SQ. METERS	1,530.88 SQ. YDS.
		670	PCADWAY (BITUMINOUS)		2,752.00 SQ. METERS	3,291.39 SQ. YDS.
REMARKS:	VISITOR CENTER ACCESS	700	SIGN	7		
	FROM VA RT 234	790	TURNOUT (BITUMINOUS)		227.60 SQ. METERS	284.17 SQ. YDS.
	TO END OF LOOP	990	GATE	1		

NATIONAL PARK SERVICE
RCAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	11	VIRGINIA	08	NCP	337	SOUTH CHINN RIDGE RD FROM VA RT 234 TO RTES 12&13	01/22/80	.56	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEF	END	BEF	END			
380	INTERSECTION	.00		.00		A		VA RT 234
311	FENCE (WOOD)	.00	.03	.00	.02	R		
715	SHOULDERS (GRASS)	.00	.89	.00	.55	B	1.50	
670	ROADWAY (BITUMINOUS)	.00	.90	.00	.56	A	6.50	
700	SIGN	.00		.00		L		R1-1
		.00		.00		L		STCP
700	SIGN	.00		.00		R		D2-1, D2-1
		.00		.00		R		VISITOR CENTER 1/2 MILE
		.00		.00		R		PICNIC AREA 1 1/2 MILE
700	SIGN	.03		.02		R		I1-1
		.03		.02		R		PARK CLOSED AT DARK
990	GATE	.03		.02		A		
235	DITCH (UNPAVED)	.03	.69	.02	.43	L		
180	CULVERT	.03		.02		A		
700	SIGN	.08		.05		R		I1-1
		.08		.05		R		SPEED CHECKED BY RADAR
700	SIGN	.14		.09		R		R2-1
		.14		.09		R		SPEED LIMIT 25
700	SIGN	.16		.10		R		RS-044X
		.16		.10		R		NO PICNIC SYMBOL
700	SIGN	.22		.14		R		I1-1
		.22		.14		R		PARK IN DESIGNATED AREAS ONLY
235	DITCH (UNPAVED)	.32	.49	.20	.30	R		
235	DITCH (UNPAVED)	.54		.34		R		
311	FENCE (WOOD)	.54	.89	.34	.55	R		
180	CULVERT	.54		.34		A		
180	CULVERT	.72		.45		A		
180	CULVERT	.83		.52		A		
210	DELINEATOR	.88		.55		B		
230	DITCH (BITUMINOUS)	.88	.88	.55	.55	L		
180	CULVERT	.88		.55		A		
380	INTERSECTION	.88		.55		A		RTE 13
380	INTERSECTION	.88		.55		R		RTE 12

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
RCAE INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	11	180	CULVERT	5		
CONGRESSIONAL DISTRICT:	08	210	CELINEATOR	2		
STATE:	VIRGINIA	235	DITCH (UNPAVED)		.28 KILOMETERS	.17 MILES
AVERAGE DAILY TRAFFIC:	337	311	FENCE (WOOD)		.40 KILOMETERS	.25 MILES
FUNCTIONAL CLASS:	PARKWAY OR MAJOR	380	INTERSECTION	3		
		470	PC/DWAY (BITUM)ACLS)		5.346.00 SQ. METERS	6.393.82 SQ. YDS.
LENGTH:	.56 MILES	700	SIGN	8		
REMARKS:	SOUTH CHINN RIDGE RD	715	SP-CULVERS (GRASS)		1.205.40 SQ. METERS	1.441.90 SQ. YDS.
	FRM VA RT 234	990	GATE	1		
	TO RTES 12813					

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	AJT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=RIGHT A=ACROSS
3840	12	VIRGINIA	08	ACF	337	ACRTH CHINA RIDGE RD FROM VA RT 234 TO RTE 11 & RTE 12	1/22/80	.65	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		EE	EAC	EE	EAC			
380	INTERSECTION	.00		.00		A		VA RT 234
670	ROADWAY (BITUMINOUS)	.00	1.04	.00	.65	A	6.00	
715	SHOULDERS (GRASS)	.00	1.04	.00	.65	B	2.00	
210	DELINTEATER	.00		.00		P		
700	SIGN	.00		.00		L		R1-1
		.00		.00		L		STCP
700	SIGN	.00		.00		R		I1-1
		.00		.00		F		FARM CLOSED AT DARK
990	GATE	.01		.01		A		
235	DITCH (UNPAVED)	.01	.31	.01	.24	L		
700	SIGN	.04		.03		R		I1-1
		.04		.03		R		SPEED CHECKED BY RADAR
180	CULVERT	.06		.04		A		
700	SIGN	.12		.08		R		R2-1
		.12		.08		R		SPEED LIMIT 25
700	SIGN	.17		.11		R		RS-044X
		.17		.11		R		NO PICNIC SYMBOL
700	SIGN	.25		.16		R		I1-1
		.25		.16		R		PARK IN DESIGNATED AREAS ONLY
230	DITCH (BITUMINOUS)	.38	.45	.24	.28	L		
180	CULVERT	.45		.28		A		
180	CULVERT	.45		.28		A		
180	CULVERT	.45		.28		A		
235	DITCH (UNPAVED)	.46	.45	.29	.31	R		
311	FENCE (WOOD)	.46	.49	.29	.31	R		
180	CULVERT	.49		.31		A		
235	DITCH (UNPAVED)	.49	1.01	.31	.63	R		
180	CULVERT	.57		.36		A		
180	CULVERT	.74		.46		A		
180	CULVERT	.82		.51		A		
180	CULVERT	.85		.53		A		
180	CULVERT	.56		.60		A		
180	CULVERT	1.01		.63		A		
210	DELINTEATER	1.02		.64		P		
700	SIGN	1.02		.64		R		R1-1
		1.02		.64		F		STCP
380	INTERSECTION	1.04		.65		L		RTE 11
380	INTERSECTION	1.04		.65		R		RTE 12

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORY

MANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	12	180	CULVERT	11		
CONGRESSIONAL DISTRICT:	CP	210	CELINEATOR	4		
STATE:	VIRGINIA	230	DITCH (BITUMINOUS)		.07 KILOMETERS	.04 MILES
AVERAGE DAILY TRAFFIC:	337	235	DITCH (UNPAVED)		.92 KILOMETERS	.57 MILES
FUNCTIONAL CLASS:	PARKWAY OR MAJOR	311	FENCE (WOOD)		.03 KILOMETERS	.02 MILES
		380	INTERSECTION	3		
LENGTH:	.65 MILES	670	ROADWAY (BITUMINOUS)		5+699.20 SQ. METERS	6+816.24 SQ. YDS.
		700	SIEN	7		
REMARKS:	NORTH CHINN RIDGE RD	715	SHOULDERS (GRASS)		1+892.80 SQ. METERS	2+263.79 SQ. YDS.
	FRM VA RT 234	990	GATE	1		
	TO RTE 11 & RTE 12					

NATIONAL PARK SERVICE
RCAC INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	13	VIRGINIA	08	NCP	215	CHINN RIDGE ROAD FROM R1E5 11 & 12 TO END OF LOOP	01/22/80	.91	
PARK NAME									
MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEF	END	BEF	END			
380	INTERSECTION	.00		.00		A		RTE 11
380	INTERSECTION	.00		.00		R		RTE 12
230	DITCH (BITUMINOUS)	.00	.24	.00	.15	L		
670	ROADWAY (BITUMINOUS)	.00	1.25	.00	.78	A	6.00	
715	SHOULDERS (GRASS)	.00	1.46	.00	.91	B	1.50	
230	DITCH (BITUMINOUS)	.00	.24	.00	.15	R		
790	TURNOUT (BITUMINOUS)	.03	.06	.02	.04	L	3.00	
700	SIGN	.03		.02		L		NON-STC
		.03		.02		L		15 MINUTE PARKING
700	SIGN	.03		.02		L		11-1
		.03		.02		L		INFORMATION
311	FENCE (WOOD)	.20	.30	.15	.24	L		
180	CULVERT	.27		.17		A		
195	CURB (CONCRETE)	.28	.33	.18	.21	L		
700	SIGN	.28		.18		R		W1-1R
		.28		.18		R		CURVE SYMBOL -F
700	SIGN	.28		.18		L		NON-STC
		.28		.18		L		15 MINUTE PARKING
790	TURNOUT (BITUMINOUS)	.28	.32	.18	.20	L	8.00	
700	SIGN	.32		.20		L		NON-STC
		.32		.20		L		15 MINUTE PARKING
420	LITTER BARREL	.33		.21		L		
700	SIGN	.35		.22		L		R8-3
		.35		.22		L		NO PARKING
380	INTERSECTION	.35		.22		L		RTE 401
700	SIGN	.35		.22		L		R8-3
		.35		.22		L		NO PARKING
235	DITCH (UNPAVED)	.38	.57	.24	.36	R		
180	CULVERT	.46		.29		A		
235	DITCH (UNPAVED)	.46	.86	.29	.54	L		
700	SIGN	.46		.29		L		W1-1L
		.46		.29		L		CURVE SYMBOL-L
180	CULVERT	.65		.41		A		
790	TURNOUT (BITUMINOUS)	.80	.82	.50	.52	R	3.00	
210	DELINEATOR	.82	.83	.51	.52	R		DELINEATORS 5
700	SIGN	.83		.52		R		NON-STC
		.83		.52		R		15 MINUTE PARKING
235	DITCH (UNPAVED)	1.19	1.25	.74	.78	R		
700	SIGN	1.23		.77		R		RS-044X
		1.23		.77		R		NO PICNIC SYMBOL
380	INTERSECTION	1.25		.78		L		END OF LOOP
670	ROADWAY (BITUMINOUS)	1.25	1.46	.78	.51	A	4.70	
700	SIGN	1.25		.78		L		R4-7A

DATA	DATA CODE	DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL CR	REST OF	REMARKS
CODE			BEG	END	BEG	END		(YARDS)			
			1.25		.78		L				KEEP RIGHT
790		TURNOUT (BITUMINOUS)	1.27	1.31	.79	.82	L	4.00			
195		CURB (CONCRETE)	1.28	1.33	.80	.83	R				
700		SIGN	1.28		.80		R				11-1
			1.28		.80		R				INFORMATION
790		TURNOUT (BITUMINOUS)	1.28	1.31	.80	.82	R	8.00			
700		SIGN	1.28		.80		R				NON-STD
			1.28		.80		R				15 MINUTE PARKING
420		LITTER BARREL	1.30		.81		R				
700		SIGN	1.31		.82		R				NON-STD
			1.31		.82		R				15 MINUTE PARKING
700		SIGN	1.33		.83		R				11-1
			1.33		.83		R				INFORMATION
311		FENCE (WOOD)	1.33	1.34	.83	.87	R				
235		DITCH (UNPAVED)	1.33	1.41	.83	.88	L				
195		CURB (CONCRETE)	1.36	1.39	.85	.87	R				
790		TURNOUT (BITUMINOUS)	1.36	1.39	.85	.87	R	4.00			
700		SIGN	1.36		.85		R				NON-STD
			1.36		.85		R				15 MINUTE PARKING
700		SIGN	1.38		.86		R				NON-STD
			1.38		.86		R				15 MINUTE PARKING
420		LITTER BARREL	1.39		.87		R				
700		SIGN	1.39		.87		R				NON-STD
			1.39		.87		R				15 MINUTE PARKING
380		INTERSECTION	1.46		.91		A				RTE 13

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
ROAD INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	13	180	CULVERT	3		
CONGRESSIONAL DISTRICT:	CB	195	CURB (CONCRETE)		.13 KILOMETERS	.08 MILES
STATE:	VIRGINIA	210	DELINEATOR	1		
AVERAGE DAILY TRAFFIC:	215	230	DITCH (BITUMINOUS)		.48 KILOMETERS	.30 MILES
FUNCTIONAL CLASS:	PARKWAY OR MAJOR	235	DITCH (UNPAVED)		.73 KILOMETERS	.45 MILES
		311	FENCE (WOOD)		.20 KILOMETERS	.12 MILES
LENGTH:	.91 MILES	380	INTERSECTION	5		
REMARKS:	CHINN RIDGE ROAD	420	LITTER BARREL	3		
	FRCP RTES 11 & 12	670	ROADWAY (BITUMINOUS)		7,750.90 SQ. METERS	9,270.08 SQ. YDS.
	TO END OF LOOP	700	SIGN	18		
		715	SHOULDERS (GRASS)		2,000.20 SQ. METERS	2,392.24 SQ. YDS.
		790	TURNOUT (BITUMINOUS)		931.60 SQ. METERS	1,114.19 SQ. YDS.

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=BOTH R=RIGHT A=ACROSS
3840	14	VIRGINIA	08	ACF	57	NEW YORK AVENUE FROM US 29-211 TO END OF LOOP	1/23/80	.32	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		LS ROUTES 29 & 211
670	ROADWAY (BITUMINOUS)	.00	.39	.00	.24	A	6.00	
180	CULVERT	.00		.00		A		
235	DITCH (UNPAVED)	.00		.00		L		
990	GATE	.00		.00		A		
700	SIGN	.00		.00		L		R1-1
		.00		.00		L		STCP
700	SIGN	.03		.02		R		I1-1
		.03		.02		F		PARK CLOSURE AT PARK
195	CURB (CONCRETE)	.03	.08	.02	.05	R		
790	TURNOUT (BITUMINOUS)	.03	.06	.02	.04	F	7.30	
235	DITCH (UNPAVED)	.08	.25	.05	.16	R		
380	INTERSECTION	.11		.07		L		RT 408
700	SIGN	.12		.08		L		I1-1
		.12		.08		L		INFORMATION
180	CULVERT	.22		.14		A		
230	DITCH (BITUMINOUS)	.22	.32	.14	.20	L		
381	PRIVATE ENTRANCE	.32		.20		L	5.00	PRIVATE DRIVE 22YDS X 5YDS = 110SQ YDS
670	ROADWAY (BITUMINOUS)	.38	.53	.24	.33	A	4.00	
380	INTERSECTION	.40		.25		L		END OF LOOP
235	DITCH (UNPAVED)	.40	.48	.25	.30	L		
380	INTERSECTION	.46		.29		R		RTE 409
195	CURB (CONCRETE)	.49	.53	.31	.33	F		
790	TURNOUT (BITUMINOUS)	.49	.53	.31	.33	R	8.30	
700	SIGN	.49		.31		F		I1-1
		.49		.31		R		30 MINUTE PARKING
700	SIGN	.51		.32		F		I1-1
		.51		.32		R		INFORMATION
420	LITTER BARREL	.51		.32		F		
700	SIGN	.53		.33		R		I1-1
		.53		.33		F		30 MINUTE PARKING
380	INTERSECTION	.54		.34		A		RTE 14

DATE: 01/29/81

NATIONAL PARK SERVICE
ROAD INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	14	180	CULVERT	2		
CONGRESSIONAL DISTRICT:	08	195	CURB (CONCRETE)		.09 KILOMETERS	.06 MILES
STATE:	VIRGINIA	230	DITCH (BITUMINOUS)		.10 KILOMETERS	.06 MILES
AVERAGE DAILY TRAFFIC:	57	235	DITCH (UNPAVED)		.25 KILOMETERS	.16 MILES
FUNCTIONAL CLASS:	PARKWAY OR MAJOR	380	INTERSECTION	5		
		381	PRIVATE ENTRANCE	101		
LENGTH:	.33 MILES	420	LITTER BARREL	1		
		470	ROADWAY (BITUMINOUS)		2,629.90 SQ. METERS	3,145.36 SQ. YDS.
REMARKS:	NEW YORK AVENUE	700	SIGN	6		
	FROM US 29-211	790	TURNOUT (BITUMINOUS)		503.30 SQ. METERS	601.95 SQ. YDS.
	TO END OF LOOP	990	GATE	1		

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT P=PORT R=RIGHT A=ACROSS
3840	100	VIRGINIA	08	ACF	37	PICNIC AREA FROM VA RT 234 TO PARKING AREA	1/23/81	.13	
PARK NAME									
MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST CR REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		VA RT 234
420	LITTER BARREL	.00		.00		L		5 TOTAL
529	PARKING AREA (GRAVEL)	.00		.00		L		84YDS X 33YDS= 2772SQ YDS
679	ROADWAY (GRAVEL)	.00	.20	.00	.13	A	4.30	
700	SIGN	.01		.01		F		11-1
		.01		.01		R		PARK CLOSES AT DARK
		.01		.01		R		DRIVING VEHICLES ON FIELDS PROHIBITED
180	CULVERT	.14		.09		A		
210	DELINEATOR	.14		.09		P		
311	FENCE (WOOD)	.14	.20	.09	.13	B		
799	TURNOUT (GRAVEL)	.17	.20	.11	.13	L	13.00	
420	LITTER BARREL	.17		.11		L		
420	LITTER BARREL	.19		.12		L		
420	LITTER BARREL	.19		.12		L		

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
ROAD INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE: 3840		180	CULVERT	1		
ROUTE NUMBER: 100		210	CELINEATER	2		
CONGRESSIONAL DISTRICT: 08		311	FENCE (WOOD)		.12 KILOMETERS	.07 MILES
STATE: VIRGINIA		380	INTERSECTION	1		
AVERAGE DAILY TRAFFIC: 37		420	LITTER BARREL	8		
FUNCTIONAL CLASS: MINOR PARK		529	PAVING AREA (GRAVEL)		2,535.00 SQ. METERS	3,031.86 SQ. YDS.
LENGTH: .13 MILES		679	ROADWAY (GRAVEL)		786.00 SQ. METERS	940.06 SQ. YDS.
REMARKS: PICNIC AREA		700	SIEN	1		
FROM VA RT 234		799	TURNOUT (GRAVEL)		356.40 SQ. METERS	426.25 SQ. YDS.
TO PARKING AREA						

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	200	VIRGINIA	08	NCP	112	STONE HOUSE PARKING FROM US ROUTE 29-211 TO VA RT 234	01/23/80	.02	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL	JR	REST OF REMARKS
		PEE	ENC	PEE	ENC					
380	INTERSECTION	.00		.00		A				US ROUTE 29-211
235	DITCH (UNPAVED)	.00	.03	.00	.02	L				
799	TURNOUT (GRAVEL)	.00	.03	.00	.02	R	10.00			
311	FENCE (WOOD)	.00	.03	.00	.02	F				
679	ROADWAY (GRAVEL)	.00	.03	.00	.02	A	6.00			
880	UTILITIES	.00		.00		L				TELEPHONE POLE
420	LITTER BARREL	.03		.02		R				
700	SIGN	.03		.02		F				I1-1
		.03		.02		R				PARK CLOSED AT DARK
420	LITTER BARREL	.03		.02		F				
700	SIGN	.03		.02		R				I1-1
		.03		.02		F				CNE HOUR PARKING
180	CULVERT	.03		.02		A				
380	INTERSECTION	.03		.02		A				VA RT 234

DATE: 01/29/81

MANASSAS NATIONAL
PATTLEFIELD PARKNATIONAL PARK SERVICE
RCAE INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	200	180	CULVERT	1		
CONGRESSJCNAL DISTRICT:	08	235	DITCH (UNPAVED)		.03 KILOMETERS	.02 MILES
STATE:	VIRGINIA	311	FENCE (WOOD)		.03 KILOMETERS	.02 MILES
AVERAGE DAILY TRAFFIC:	112	380	INTERSECTION	2		
FUNCTIONAL CLASS:	SPECIAL PURPOSE	420	LITTER BARREL	2		
		679	ROADWAY (GRAVEL)		164.40 SQ. METERS	196.62 SQ. YDS.
LENGTH:	.02 MILES	700	SIGN	2		
REMARKS:	STONE HOUSE PARKING FROM US ROUTE 29-211 TO VA RT 234	799	TURNOUT (GRAVEL)		274.20 SQ. METERS	327.94 SQ. YDS.
		880	UTILITIES	1		

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADJ	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	201	VIRGINIA	0P	ACF	150	STONE BRIDGE PARKING FROM US RT 29-211 TO US RT 29-211	01/22/80	.04	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REMARKS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
670	ROADWAY (BITUMINOUS)	.00	.05	.00	.04	A	5.00	
799	TURNOUT (GRAVEL)	.00	.04	.00	.03	L	4.00	PARKING
799	TURNOUT (GRAVEL)	.00	.04	.00	.03	R	7.00	PARKING
990	GATE	.01		.01		F		WALKING PATH
420	LITTER BARREL	.03		.02		R		
700	SIGN	.04		.03		R		NOA STD
		.04		.03		R		HISTORICAL
380	INTERSECTION	.06		.04		A		US ROUTE 29-211

INFORMATION

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORY

MANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	201	380	INTERSECTION	2		
CONGRESSIONAL DISTRICT:	CR	420	LITTER BARREL	1		
STATE:	VIRGINIA	670	ROADWAY (BITUMINOUS)		274.20 SQ. METERS	327.94 SQ. YDS.
AVERAGE DAILY TRAFFIC:	150	700	SIGN	1		
FUNCTIONAL CLASS:	SPECIAL PURPOSE	799	TURNOUT (GRAVEL)		402.00 SQ. METERS	480.79 SQ. YDS.
		990	GATE	1		
LENGTH:	.04 MILES					
REMARKS:	STONE BRIDGE PARKING FROM US RT 29-211 TO US RT 29-211					

NATIONAL PARK SERVICE
RCAC INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	202	VIRGINIA	08	NCP	112	WINERY PARKING FROM US RT 29-211 TO US RT 29-211	1/23/80	.03	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		PEE	END	EEE	END			
380	INTERSECTION	.00		.00		A		U.S. ROUTE 29-211
210	DELINEATOR	.00		.00		L		6 TOTAL
679	ROADWAY (GRAVEL)	.00	.04	.00	.03	A	7.00	
180	CULVERT	.00		.00		A		
230	DITCH (BITUMINOUS)	.00	.03	.00	.02	R		
311	FENCE (WOOD)	.00	.03	.00	.02	R		
799	TURNOUT (GRAVEL)	.00	.03	.00	.02	L	6.00	
420	LITTER BARREL	.01		.01		L		
700	SIGN	.01		.01		L		I1-1, I1-1
		.01		.01		L		PARK CLOSURES AT PARK
		.01		.01		L		VISITOR CENTER PARKING
180	CULVERT	.03		.02		A		
380	INTERSECTION	.04		.03		A		US ROUTE 29-211

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
RCAI INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	202	180	CULVERT	2		
CONGRESSIONAL DISTRICT:	08	210	CELINEATOR	5		
STATE:	VIRGINIA	230	DITCH (BITUMINOUS)		.03 KILOMETERS	.02 MILES
AVERAGE DAILY TRAFFIC:	112	311	FENCE (WOOD)		.02 KILOMETERS	.02 MILES
FUNCTIONAL CLASS:	SPECIAL PURPOSE	380	INTERSECTION	2		
		420	LITTER BARREL	1		
LENGTH:	.03 MILES	679	ROADWAY (GRAVEL)		256.00 SQ. METERS	306.18 SQ. YDS.
		700	SIEN	2		
REMARKS:	WINERY PARKING FROM US RT 29-211 TO US RT 29-211	799	TURNOUT (GRAVEL)		164.40 SQ. METERS	196.62 SQ. YDS.

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADJ	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT P=BOTH R=RIGHT A=ACROSS
3840	203	VIRGINIA	08	ACF	150	ROBERTSON CEMETERY FROM US RT 29-211 TO PARKING AREA	1/23/80	.04	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		LS ROUTE 29-211
670	ROADWAY (BITUMINOUS)	.00	.05	.00	.04	A	4.67	
420	LITTER BARREL	.00		.00		F		
529	PARKING AREA (GRAVEL)	.03	.04	.02	.03	R		17YDS X 57YDS =969 SQ YDS.
700	SIGN	.03		.02		F		11-1
		.03		.02		R		PARK CLOSES AT DARK

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	203	380	INTERSECTION	1		
CONGRESSIONAL DISTRICT:	08	420	LITTER BARREL	1		
STATE:	VIRGINIA	529	PARKING AREA (GRAVEL)		886.00 SQ. METERS	1,059.66 SQ. YDS.
AVERAGE DAILY TRAFFIC:	150	670	PCADWAY (PIT/PILES)		256.20 SQ. METERS	306.42 SQ. YDS.
FUNCTIONAL CLASS:	SPECIAL PURPOSE	700	SIGN	1		
LENGTH: .04 MILES						
REMARKS: GROVERTON CEMETERY FROM US RT 29-211 TO PARKING AREA						

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

FOLTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	204	VIRGINIA	00	ACF	112	DEEP CUT PARKING AREA FROM FEATHERBED LANE TO PARKING AREA	1/23/80	.01	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		FEATHERBED LANE
700	SIGN	.00		.00		A		I1-1
		.00		.00		A		PARK CLOSURE AT PARK
420	LITTER BARREL	.00		.00		L		
700	SIGN	.00		.00		L		I1-1
		.00		.00		L		INFORMATION
679	ROADWAY (GRAVEL)	.00	.01	.00	.01	A	15.00	PARKING AREA IS ROAD

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
PATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	204	380	INTERSECTION	1		
CONGRESSIONAL DISTRICT:	CB	42C	LITTER BARREL	1		
STATE:	VIRGINIA	679	ROADWAY (GRAVEL)		137.10 SQ. METERS	163.97 SQ. YDS.
AVERAGE DAILY TRAFFIC:	112	700	SIEN	2		
FUNCTIONAL CLASS:	SPECIAL PURPOSE					

LENGTH: .01 MILES

REMARKS: DEEP CUT PARKING AREA
FROM FEATHERBED LANE
TO PARKING AREA

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ACT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	205	VIRGINIA	08	NCP	112	SUDLEY CHURCH PARKING FROM VA RT 234 TO PARKING AREA	1/23/80	.01	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		VA RT 234
420	LITTER BARREL	.00		.00		A		
700	SIGN	.00		.00		A		I1-1
		.00		.00		A		INFORMATION
679	ROADWAY (GRAVEL)	.00	.01	.00	.01	A	4.00	
180	CULVERT	.00		.00		A		
799	TURNOUT (GRAVEL)	.01	.01	.01	.01	L	6.00	

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAI INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	205	180	CULVERT	1		
CONGRESSIONAL DISTRICT:	08	380	INTERSECTION	1		
STATE:	VIRGINIA	420	LITTER BARREL	1		
AVERAGE DAILY TRAFFIC:	112	679	ROADWAY (RAVEL)		26.50 SQ. METERS	43.65 SQ. YDS.
FUNCTIONAL CLASS:	SPECIAL PURPOSE	700	SIGN	1		
LENGTH: .01 MILES						
REMARKS: SUNLEY CHURCH PARKING FROM VA RT 234 TO PARKING AREA						

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

RCLTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADJ	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=BOTH R=RIGHT A=ACROSS
3840	300	VIRGINIA	08	NCF	75	BATTERY HEIGHTS FROM US RT 29-211 TO END OF PARKING AREA	1/23/80	.06	
PARK NAME									
MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		US RCLTE 29-211
679	ROADWAY (GRAVEL)	.00	.07	.00	.06	A	4.00	
311	FENCE (WOOD)	.00	.05	.00	.06	R		
700	SIGN	.04		.03		R		I1-1
		.04		.03		R		FARM CLOSSES AT PARK
799	TURNOUT (GRAVEL)	.08	.07	.05	.06	R	7.00	
420	LITTER BARREL	.09		.06		R		

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAC INVENTORYMANASSAS NATIONAL
PATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	311	FENCE (WOOD)		.18 KILOMETERS	.11 MILES
ROUTE NUMBER:	300	380	INTERSECTION	1		
CONGRESSIONAL DISTRICT:	08	420	LITTER BARREL	1		
STATE:	VIRGINIA	679	ROADWAY (GRAVEL)		328.50 SQ. METERS	392.89 SQ. YDS.
AVERAGE DAILY TRAFFIC:	75	700	SIEN	1		
FUNCTIONAL CLASS:	INTERPRETIVE	799	TURNOUT (GRAVEL)		64.00 SQ. METERS	76.54 SQ. YDS.
LENGTH:	.06 MILES					

REMARKS: BATTERY HEIGHTS
FROM US RT 29-211
TO END OF PARKING AREA

NATIONAL PARK SERVICE
RCAC INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	COAG DIST	REGION	ACT	ROUTE NAME	INVT DATE	RCLTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	400	VIRGINIA	08	NCP	30	MAINT. AREA ACCESS FROM VA RT 234 TO MAINTENANCE AREA	01/23/80	.16	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEK	ENC	BEK	ENC			
380	INTERSECTION	.00		.00		A		VA RT 234
670	ROADWAY (BITUMINOUS)	.00	.25	.00	.16	A	6.00	
180	CULVERT	.00		.00		A		
311	FENCE (WOOD)	.00	.01	.00	.01	P		
700	SIGN	.00		.00		R		I1-1
		.00		.00		F		AUTHORIZED VEHICLES ONLY
990	GATE	.01		.01		A		
235	DITCH (UNPAVED)	.01	.14	.01	.09	L		
180	CULVERT	.03		.02		A		
700	SIGN	.06		.04		L		NOA-STD
		.06		.04		L		STOP FASTEN SEAT BELT
180	CULVERT	.06		.05		A		
799	TURNOUT (GRAVEL)	.14	.17	.09	.11	L	17.00	
790	TURNOUT (BITUMINOUS)	.16	.17	.10	.11	R	9.00	
676	ROADWAY (DIRT)	.17		.11		L		100YDS X 4YDS = 400 SQ YDS
990	GATE	.19		.12		A		
310	FENCE (WIRE)	.19	.25	.12	.16	B		
520	PARKING AREA (BITUMINOUS)	.20		.13		R		21YDS X 70YDS = 1470SQ YDS
420	LITTER BARREL	.22		.14		R		4

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
ROAD INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	400	18C	CULVERT	3		
CONGRESSIONAL DISTRICT:	08	235	DITCH (UNPAVED)		.13 KILOMETERS	.08 MILES
STATE:	VIRGINIA	310	FENCE (WIRE)		.12 KILOMETERS	.07 MILES
AVERAGE DAILY TRAFFIC:	30	311	FENCE (WOOD)		.02 KILOMETERS	.01 MILES
FUNCTIONAL CLASS:	ADMINISTRATIVE	38C	INTERSECTION	1		
		420	LITTER BARREL	1		
LENGTH:	.16 MILES	670	FOGWAY (PITUPINCL)		1.370.00 SQ. METERS	1.638.52 SQ. YDS.
		700	SIGN	2		
REMARKS:	MAINT. AREA ACCESS	790	TURNOUT (BITUMINOUS)		82.20 SQ. METERS	98.31 SQ. YDS.
	FRM VA RT 234	799	TURNOUT (GRAVEL)		466.20 SQ. METERS	557.58 SQ. YDS.
	TO MAINTENANCE AREA	990	GATE	2		

NATIONAL PARK SERVICE
RCAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	RCLTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	402	VIRGINIA	08	NCP	75	HENRY HOUSE ACCESS FROM VA RT 234 TO HENRY HOUSE	1/23/80	.12	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		VA RT 234
670	ROADWAY (GRAVEL)	.00	.19	.00	.12	A	3.00	
180	CULVERT	.00		.00		A		
700	SIGN	.00		.00		L		11-1
		.00		.00		L		03 NOT ENTER
311	FENCE (WOOD)	.00	.01	.00	.01	P		
235	DITCH (UNPAVED)	.00	.03	.00	.02	R		
990	GATE	.01		.01		A		

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	1		
ROUTE NUMBER:	402	235	DITCH (UNPAVED)		.03 KILOMETERS	.02 MILES
CONGRESSIONAL DISTRICT:	08	311	FENCE (WOOD)		.02 KILOMETERS	.01 MILES
STATE:	VIRGINIA	380	INTERSECTION	1		
AVERAGE DAILY TRAFFIC:	75	679	ROADWAY (GRAVEL)		520.60 SQ. METERS	622.64 SQ. YDS.
FUNCTIONAL CLASS:	ADMINISTRATIVE	700	SIEN	1		
LENGTH:	.12 MILES	990	GATE	1		

REMARKS: HENRY HOUSE ACCESS
FROM VA RT 234
TO HENRY HOUSE

NATIONAL PARK SERVICE
RCAC INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ACT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	403	VIRGINIA	08	RCF	75	ROBINSON HOUSE ACCESS FROM US RT 29-211 TO ROBINSON HOUSE	1/23/80	.11	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
679	ROADWAY (GRAVEL)	.00	.17	.00	.11	A	2.50	
311	FENCE (WOOD)	.01	.14	.01	.09	L		
311	FENCE (WOOD)	.01	.17	.01	.11	R		ROBINSON HOUSE
700	SIGN	.01		.01		A		
		.01		.01		A		NO PARKING (ON GATE)
990	GATE	.01		.01		A		
715	SHOULDERS (GRASS)	.01	.17	.01	.11	B	2.50	
700	SIGN	.11		.07		R		I1-1
		.11		.07		R		INFORMATION
700	SIGN	.16		.10		L		I1-1
		.16		.10		L		INFORMATION

DATE: 01/29/81

NATIONAL PARK SERVICE
ROAD INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	403	311	FENCE (WOOD)		.29 KILOMETERS	.18 MILES
CONGRESSIONAL DISTRICT:	CB	38C	INTERSECTION	1		
STATE:	VIRGINIA	679	ROADWAY (GRAVEL)		387.60 SQ. METERS	463.57 SQ. YDS.
AVERAGE DAILY TRAFFIC:	75	700	SIGN	3		
FUNCTIONAL CLASS:	ADMINISTRATIVE	715	SHOULDERS (GRASS)		364.80 SQ. METERS	436.30 SQ. YDS.
		590	GATE	1		
LENGTH:	.11 MILES					
REMARKS:	ROBINSON HOUSE ACCESS FROM US RT 29-211 TO ROBINSON HOUSE					

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGICA	ACT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	404	VIRGINIA	08	NCP	75	ROCK RD FROM US R1 29-211 TO END OF PASSABLE ROAD	1/23/80	.84	
PARK NAME									
MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEK	END	BEK	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
679	ROADWAY (GRAVEL)	.00	1.35	.00	.84	A	3.00	
715	SHOULDERS (GRASS)	.00	1.35	.00	.84	B	1.50	
700	SIGN	.01		.01		L		RR-3
		.01		.01		L		NO PARKING
700	SIGN	.01		.01		R		RR-3
		.01		.01		R		NO PARKING
990	GATE	.01		.01		A		
381	PRIVATE ENTRANCE	.75		.47		L		

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3P40					
ROUTE NUMBER:	404	380	INTERSECTION	1		
CONGRESSIONAL DISTRICT:	CP	381	PRIVATE ENTRANCE	1		
STATE:	VIRGINIA	679	ROADWAY (GRAVEL)		3,699.00 SQ. METERS	4,424.00 SQ. YDS.
AVERAGE DAILY TRAFFIC:	75	700	SIGN	2		
FUNCTIONAL CLASS:	ADMINISTRATIVE	715	SHOULDERS (GRASS)		1,849.50 SQ. METERS	2,212.00 SQ. YDS.
		990	GATE	1		
LENGTH:	.84 MILES					

REMARKS: ROCK RD
FRCP US RT 29-211 TO
END OF PASSABLE ROAD

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	AJT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=RIGHT A=ACROSS
3800	405	VIRGINIA	08	ACF	75	MILLIKIN CRIVELAY FROM US RT 29-211 TO QUARTERS IC	01/23/80	1.22	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST CF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
679	ROADWAY (GRAVEL)	.00	1.95	.00	1.22	A	4.00	
880	UTILITIES	.00	1.96	.00	1.22	F		18 UTILITY POLES
180	CULVERT	.00		.00		A		
235	DITCH (UNPAVED)	.00	.57	.00	.36	F		
990	GATE	.00		.00		A		
311	FENCE (WOOD)	.00	.06	.00	.04	L		
700	SIGN	.01		.01		L		I1-1 PRIVATE RESIDENCE
		.01		.01		L		
310	FENCE (WIRE)	.06	.61	.04	.38	L		
180	CULVERT	.53		.33		A		
310	FENCE (WIRE)	.69		.43		L		
235	DITCH (UNPAVED)	.69	.77	.43	.48	F		
381	PRIVATE ENTRANCE	.78		.49		L		
700	SIGN	.90		.56		L		RS-064-1 NO HORSES SYMBOL
		.90		.56		L		
235	DITCH (UNPAVED)	.91	1.60	.57	1.00	F		
235	DITCH (UNPAVED)	1.15	1.48	.72	.92	L		
700	SIGN	1.48		.92		L		I1-1 PRIVATE RESIDENCE : NO TRESPASING
		1.48		.92		L		
310	FENCE (WIRE)	1.48	1.89	.92	1.18	L		
799	TURNOUT (GRAVEL)	1.91	1.94	1.19	1.21	L	6.00	

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	2		
ROUTE NUMBER:	405	235	DITCH (UNPAVED)		1.67 KILOMETERS	1.04 MILES
CONGRESSIONAL DISTRICT:	CB	310	FENCE (WIRE)		.55 KILOMETERS	.34 MILES
STATE:	VIRGINIA	311	FENCE (WOOD)		.66 KILOMETERS	.41 MILES
AVERAGE DAILY TRAFFIC:	75	380	INTERSECTION	1		
FUNCTIONAL CLASS:	ADMINISTRATIVE	381	PRIVATE ENTRANCE	1		
LENGTH:	1.22 MILES	679	ROADWAY (GRAVEL)		7,154.00 SQ. METERS	8,556.18 SQ. YDS.
		700	SIGN	3		
REMARKS:	MULLIKIN DRIVEWAY	799	TURNOUT (GRAVEL)		164.40 SQ. METERS	196.62 SQ. YDS.
	FRM US RT 29-211	880	UTILITIES	16		
	TO QUARTERS 10	990	GATE	1		

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ACT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	406	VIRGINIA	08	NCP	75	QUARTERS 6.7.8 DRIVE FROM US R1 29-211 TO QUARTERS 6.7 & 8	1/23/80	.42	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEK	ENC	EEK	EMK			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
890	UTILITIES	.00		.00		P		TELEPHONE POLES - 5
679	ROADWAY (GRAVEL)	.00	.67	.00	.42	A	6.00	
235	DITCH (UNPAVED)	.00	.67	.00	.42	B		
180	CULVERT	.24		.15		A		
180	CULVERT	.27		.17		A		
180	CULVERT	.32		.20		A		
311	FENCE (WOOD)	.40	.67	.25	.42	L		
700	SIGN	.41		.26		R		I1-1
		.41		.26		R		PRIVATE RESIDENCE NO TRESPASSING
381	PRIVATE ENTRANCE	.67		.42		B		

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	3		
ROUTE NUMBER:	406	235	DITCH (UNPAVED)		1.34 KILOMETERS	.83 MILES
CONGRESSIONAL DISTRICT:	CB	311	FENCE (WOOD)		.27 KILOMETERS	.17 MILES
STATE:	VIRGINIA	380	INTERSECTION	1		
AVERAGE DAILY TRAFFIC:	75	381	PRIVATE ENTRANCE	2		
FUNCTIONAL CLASS:	ADMINISTRATIVE	679	FOOTWAY (GRAVEL)		3.671.60 SQ. METERS	4.391.23 SQ. YDS.
LENGTH:	.42 MILES	700	SIGN	1		
		880	UTILITIES	5		

REMARKS: QUARTERS 6708 DRIVE
FROM US RT 29-211
TO QUARTERS 6788

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

FOLTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	407	VIRGINIA	08	NCF	10	QUARTERS FIVE ACCESS FROM US RT 29-211 TO END OF LOOP	1/23/80	.15	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
679	ROADWAY (GRAVEL)	.00	.20	.00	.15	A	3.70	
880	UTILITIES	.00		.00		L		TELEPHONE POLES 3 TOTAL
180	CULVERT	.00		.00		A		
235	DITCH (UNPAVED)	.00	.16	.00	.10	B		
700	SIGN	.01		.01		R		I1-1
380	INTERSECTION	.01		.01		R		PRIVATE RESIDENCE
799	TURNOUT (GRAVEL)	.19	.15	.12	.12	L	11.00	END OF LOOP

DATE: 01/29/81

NATIONAL PARK SERVICE
ROAD INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	1		
ROUTE NUMBER:	407	235	DITCH (UNPAVED)		.32 KILOMETERS	.20 MILES
CONGRESSIONAL DISTRICT:	08	380	INTERSECTION	2		
STATE:	VIRGINIA	479	FOADWAY (GRAVEL)		811.20 SQ. METERS	970.20 SQ. YDS.
AVERAGE DAILY TRAFFIC:	10	700	SIGN	1		
FUNCTIONAL CLASS:	ADMINISTRATIVE	880	UTILITIES	3		
LENGTH:	.15 MILES					

REMARKS: QUARTERS FIVE ACCESS
FRCH US RT 29-211
TO END OF LOOP

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	408	VIRGINIA	08	NCP	378	QUARTERS 1 DRIVEWAY FROM LE R1 29-211 TO RTE 14	1/23/80	.09	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL OR REST OF REMARKS
		BEE	END	BEE	END			
380	INTERSECTION	.00		.00		A		US ROUTE 29-211
679	ROADWAY (GRAVEL)	.00	.14	.00	.03	A	4.00	
100	CULVERT	.00		.00		A		
799	TURNOUT (GRAVEL)	.04	.04	.03	.03	L	7.00	
700	SIGN	.12		.08		L		I1-1
		.12		.08		L		PRIVATE RESIDENCE
380	INTERSECTION	.14		.09		A		RTE 14

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		[ATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	1		
ROUTE NUMBER:	408	38C	INTERSECTION	2		
CONGRESSIONAL DISTRICT:	08	679	ROADWAY (GRAVEL)		511.00 SQ. METERS	611.16 SQ. YDS.
STATE:	VIRGINIA	7CC	SIGN	1		
AVERAGE DAILY TRAFFIC:	378					
FUNCTIONAL CLASS:	ADMINISTRATIVE					
LENGTH:	.09 MILES					
REMARKS:	QUARTERS 1 DRIVEWAY FRM US RT 29-211 TO RTE 14					

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADJ	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	409	VIRGINIA	08	ACF	378	QUARTERS 3 DRIVEWAY FROM RTE 14 TO DEAD END	1/23/80	.08	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST CR REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		RTE 14
670	ROADWAY (BITUMINOUS)	.00	.12	.00	.08	A	4.00	
700	SIGN	.01		.01		R		11-1
		.01		.01		R		PRIVATE RESIDENCE
381	PRIVATE ENTRANCE	.11		.07		L		

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAC INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL FARMS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	409	380	INTERSECTION	1		
CONGRESSIONAL DISTRICT:	08	381	PRIVATE ENTRANCE	1		
STATE:	VIRGINIA	670	ROADWAY (BITUMINOUS)		438.00 SQ. METERS	523.85 SQ. YDS.
AVERAGE DAILY TRAFFIC:	378	700	SIGN	1		
FUNCTIONAL CLASS:	ADMINISTRATIVE					
LENGTH:	.08 MILES					
REMARKS:	QUARTERS 3 DRIVEWAY FROM RTE 14 TO DEAD END					

1

NATIONAL PARK SERVICE
RCAC INVENTORY

01/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGICA	ADT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	410	VIRGINIA	08	NCP	75	PETERS HOUSE DR FROM FEATHERBED LANE TO PETER'S PROPERTY	1/23/80	.31	
PARK NAME MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LOC	WIDTH	TOTAL DR REST OF REMARKS
		BEK	END	BEK	END			
380	INTERSECTION	.00		.00		A		FEATHERBED LA
679	ROADWAY (GRAVEL)	.00	.49	.00	.31	A	3.00	
990	GATE	.00		.00		A		
990	GATE	.12		.08		A		
180	CULVERT	.17		.11		A		

DATE: 01/29/81

NATIONAL PARK SERVICE
ROAD INVENTORY

MANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	410	180	CULVERT	1		
CONGRESSIONAL DISTRICT:	CB	390	INTERSECTION	1		
STATE:	VIRGINIA	679	ROADWAY (GRAVEL)		1,342.60 SQ. METERS	1,605.75 SQ. YDS.
AVERAGE DAILY TRAFFIC:	75	590	EASE	2		
FUNCTIONAL CLASS:	ADMINISTRATIVE					
LENGTH:	.31 MILES					
REMARKS:	PETERS HOUSE DR FROM FEATHERBED LAKE TO PETER'S PROPERTY					

NATIONAL PARK SERVICE
ROAD INVENTORY

01/29/81

FOLTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ADJ	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT B=BOTH R=RIGHT A=ACROSS
3840	411	VIRGINIA	08	NCF	75	QUARTERS 4 DRIVEWAY FROM FEATHERBED LA TO QUARTERS	1/23/80	.05	

PARK NAME
MANASSAS NATIONAL
BATTLEFIELD PARK

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		FEATHERBED LANE
679	ROADWAY (GRAVEL)	.00	.08	.00	.05	A	3.70	
180	CULVERT	.00		.00		A		
420	LITTER BARREL	.06	.06	.04	.04	R		2

DATE: 01/29/81

NATIONAL PARK SERVICE
RCAE INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840					
ROUTE NUMBER:	411	180	CULVERT	1		
CONGRESSIONAL DISTRICT:	08	380	INTERSECTION	1		
STATE:	VIRGINIA	420	LITTER BARREL	1		
AVERAGE DAILY TRAFFIC:	75	679	RCAEWAY (RAVEL)		270.40 SQ. METERS	323.40 SQ. YDS.
FUNCTIONAL CLASS:	ADMINISTRATIVE					
LENGTH:	.05 MILES					
REMARKS:	QUARTERS 4 DRIVEWAY FRM FEATHERBED LA TO QUARTERS					

NATIONAL PARK SERVICE
ROAD INVENTORY

CJ/29/81

ROUTE FILE DATA

PARK CODE	ROUTE NO	STATE	CONG DIST	REGION	ACT	ROUTE NAME	INVT DATE	ROUTE LENGTH	LOC = LOCATION CODE L=LEFT R=RIGHT R=RIGHT A=ACROSS
304C	412	VIRGINIA	08	ACF	75	QUARTERS S ACCESS FROM VA RT 234 TO QUARTERS	1/23/80	.10	
PARK NAME									
MANASSAS NATIONAL BATTLEFIELD PARK									

DATA CODE	DATA CODE DESCRIPTION	KILOMETERS		MILES		LCC	WIDTH	TOTAL CR REST OF REPAIRS
		BEG	END	BEG	END			
380	INTERSECTION	.00		.00		A		VA RT 234
235	DITCH (UNPAVED)	.00	.11	.00	.07	B		
670	ROADWAY (BITUMINOUS)	.00	.16	.00	.10	A	4.00	
311	FENCE (WOOD)	.00	.16	.00	.10	L		
180	CULVERT	.00		.00		A		
311	FENCE (WOOD)	.00	.11	.00	.07	R		
700	SIGN	.04		.03		R		NON STD PRIVATE
381	PRIVATE ENTRANCE	.11		.07		R		40YDS X 4CYCS=166050YCS

DATE: 01/29/81

MANASSAS NATIONAL
BATTLEFIELD PARKNATIONAL PARK SERVICE
ROAD INVENTORY

ROUTE SUMMARY

NATIONAL CAPITAL PARKS		DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (METRIC)	LENGTH/AREA (ENGLISH)
PARK CODE:	3840	180	CULVERT	1		
ROUTE NUMBER:	412	235	DITCH (UNPAVED)		.22 KILOMETERS	.14 MILES
CONGRESSIONAL DISTRICT:	CB	311	FENCE (WOOD)		.27 KILOMETERS	.17 MILES
STATE:	VIRGINIA	380	INTERSECTION	1		
AVERAGE DAILY TRAFFIC:	75	381	PRIVATE ENTRANCE	1		
FUNCTIONAL CLASS:	ADMINISTRATIVE	670	ROADWAY (BITUMINOUS)		584.00 SQ. METERS	698.46 SQ. YDS.
LENGTH:	.10 MILES	700	SIEN	1		

REMARKS: QUARTERS 9 ACCESS
FROM VA RT 234
TO QUARTERS

DATE: 01/29/81

NATIONAL PARK SERVICE
ROAD INVENTORYMANASSAS NATIONAL
BATTLEFIELD PARK

PARK SUMMARY

NATIONAL CAPITAL PARKS

PARK CODE: 3840
LENGTH: 6.71 MILES3.11 CM
3.07 EM BITUMIN
EM DIRT
2.59 EM GRAVEL
3.59 SM

DATA CODE	DATA CODE DESCRIPTION	COUNT	LENGTH/AREA (ENGLISH)
180	CULVERT	41	
195	CURB (CONCRETE)		721.78 LINEAR FEET
210	DELINEATOR	19	
230	DITCH (BITUMINOUS)		.50 DITCH MILES
235	DITCH (UNPAVED)		3.68 DITCH MILES
280	DRCP INLET	1	
310	FENCE (WIRED)		.42 FENCE MILES
311	FENCE (WOOD)		1.15 FENCE MILES
380	INTERSECTION	46	
381	PRIVATE ENTRANCE	107	
420	LITTER BARREL	25	
520	PARKING AREA (BITUMINOUS)		.13 EQUIV. MI.
529	PARKING AREA (GRAVEL)		.35 EQUIV. MI.
670	ROADWAY (BITUMINOUS)		2.76 EQUIV. MI.
679	ROADWAY (GRAVEL)		2.05 EQUIV. MI.
700	SIGN	73	
715	SHOULDERS (GRASS)		3.59 SHOULDER MI
790	TURNOUT (BITUMINOUS)		.18 EQUIV. MI.
799	TURNOUT (GRAVEL)		.19 EQUIV. MI.
880	UTILITIES	25	
990	GATE	13	

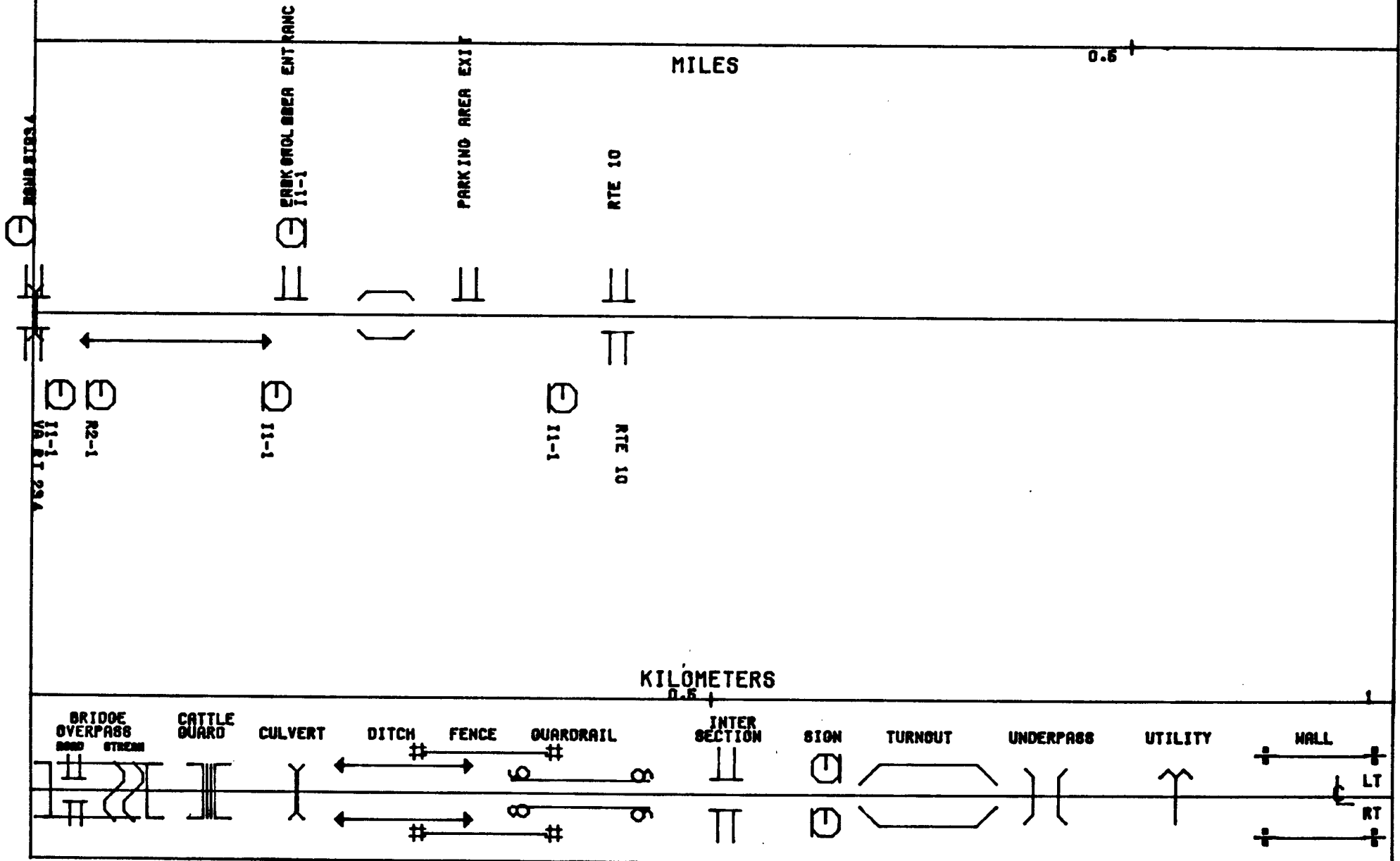
PARK 3640 MANASSAS NATIONAL
 BATTLEFIELD PARK
 ROUTE 10 VISITOR CENTER ACCESS
 FROM VA RT 234
 TO END OF LOOP

UNITED STATES DEPARTMENT OF THE INTERIOR
 NATIONAL PARK SERVICE

INV. DATE 0122
 SCALE 1 KILOMETERS
 PAGE 1

LENGTH 0.27 MILES

MAINTENANCE STRIP MAP



PARK 5840 MANASSAS NATIONAL
BATTLEFIELD PARK
ROUTE 11 SOUTH CHINN RIDGE RD
FROM VA RT 234
TO RTES 12413

UNITED STATES DEPARTMENT OF THE INTERIOR
NATIONAL PARK SERVICE

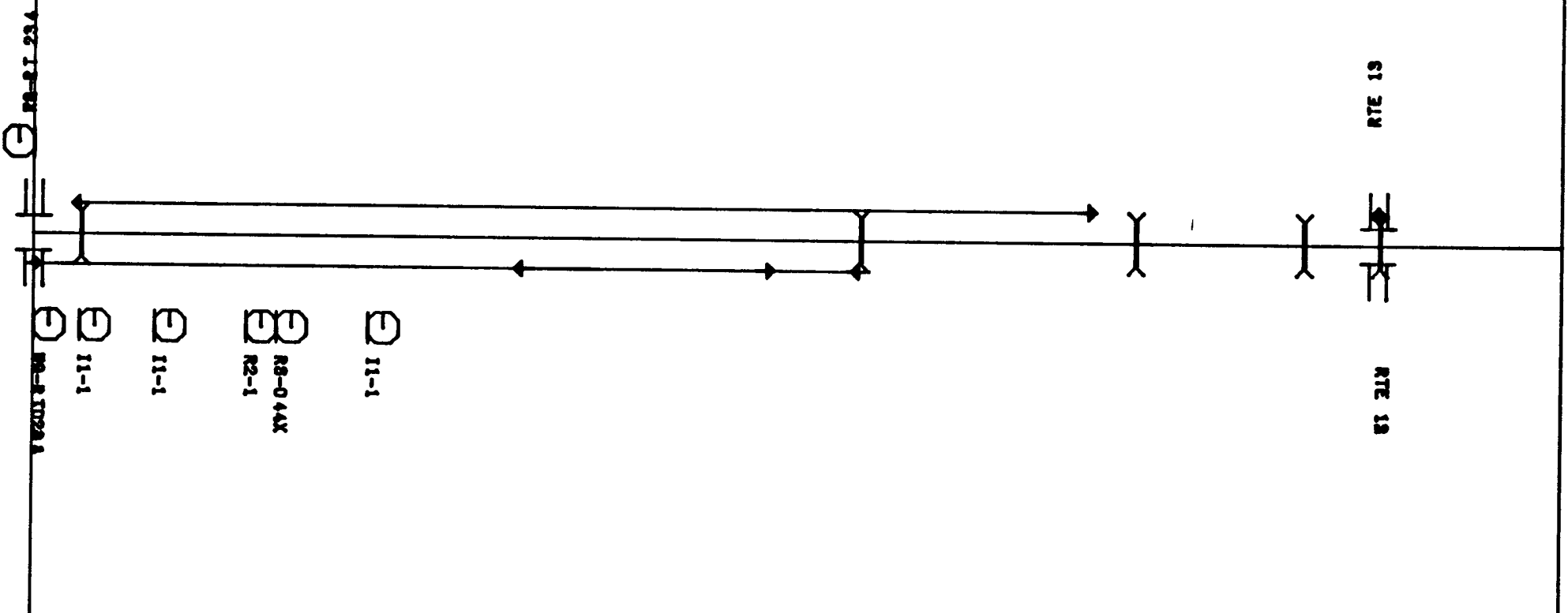
INV. DATE 0122
SCALE 1 KILOMETERS
PAGE 1

LENGTH 0.58 MILES

MAINTENANCE STRIP MAP

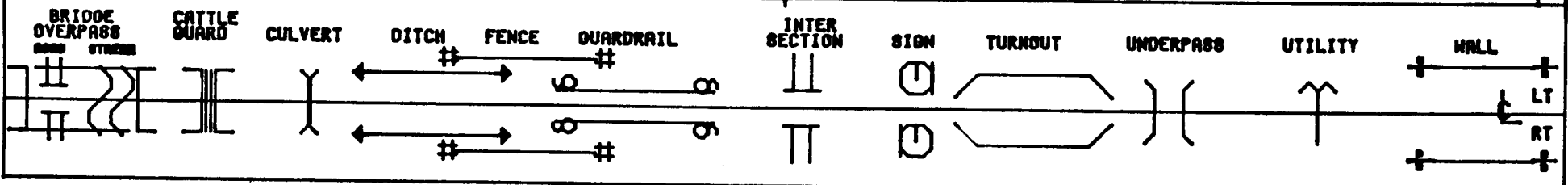
MILES

0.5



KILOMETERS

0.5



PARK 3640 MANASSAS NATIONAL BATTLEFIELD PARK
ROUTE 12 NORTH CHINN RIDGE RD FROM VA RT 294 TO RTE 11 & RTE 12

UNITED STATES DEPARTMENT OF THE INTERIOR
NATIONAL PARK SERVICE

INV. DATE 122
SCALE 1 KILOMETERS
PAGE 1

LENGTH 0.65 MILES

MAINTENANCE STRIP MAP

MILES

0.5

KILDMETERS

0.5

VA RT 294
VA RT 294

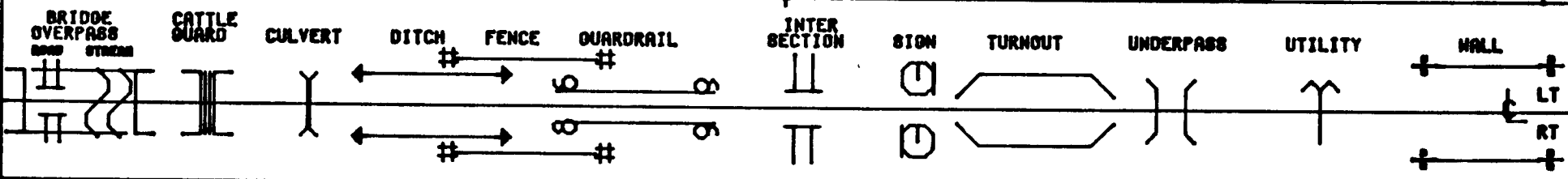


11-1

R2-1

R6-044X

11-1



PARK MANASSAS NATIONAL
5640 BATTLEFIELD PARK
ROUTE CHINN RIDGE ROAD
13 FROM RITES 11 & 12
TO END OF LOOP

UNITED STATES DEPARTMENT OF THE INTERIOR
NATIONAL PARK SERVICE

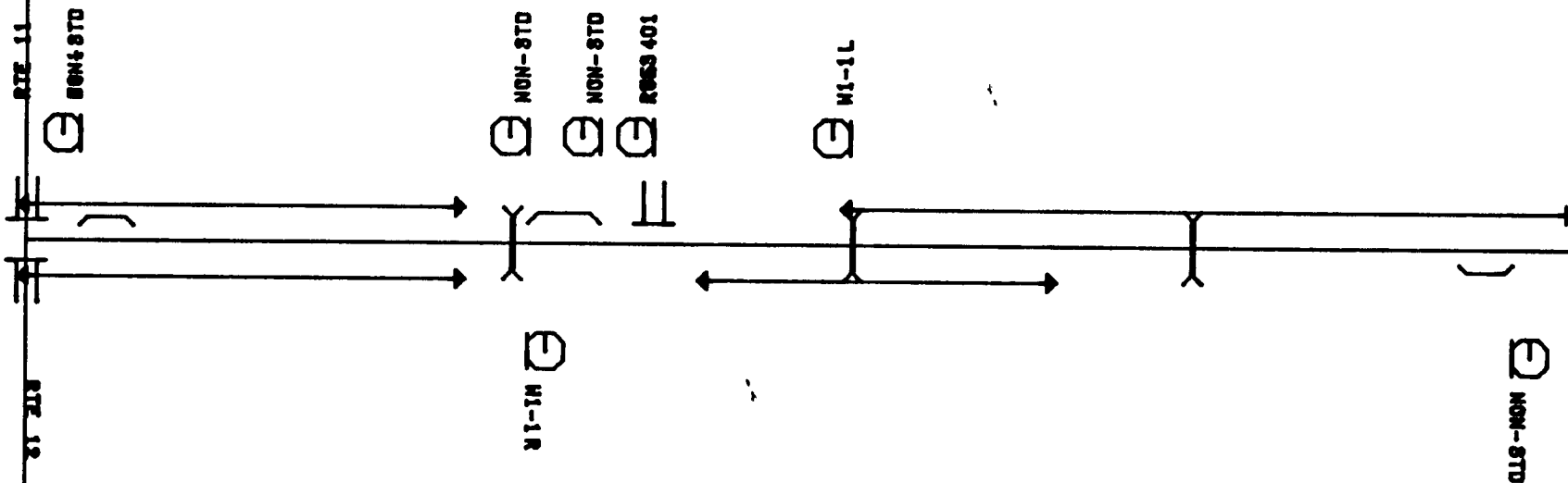
INV. DATE 0122
SCALE 1 KILOMETERS
PAGE 1

LENGTH 0.91 MILES

MAINTENANCE STRIP MAP

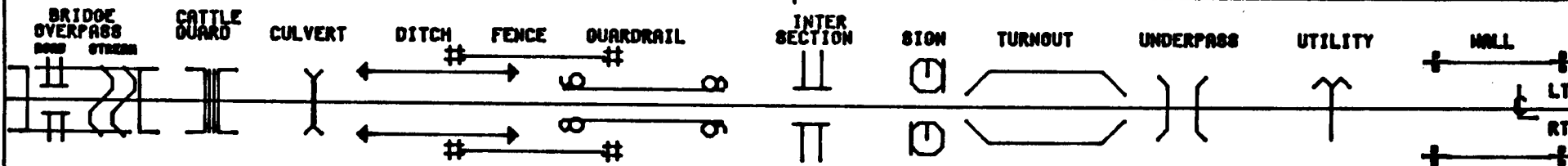
MILES

0.5



KILOMETERS

0.5



PARK 9840 MASSACHUSETTS NATIONAL BATTLEFIELD PARK
ROUTE 19 CHINN BIDGE ROAD FROM RTE 11 & 12 TO END OF LOOP

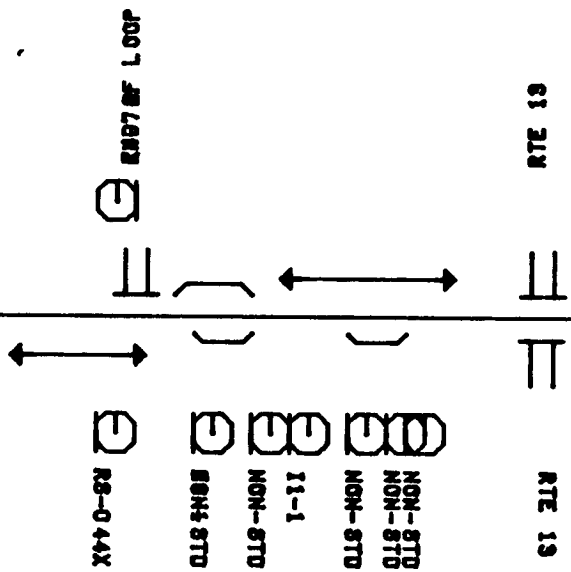
UNITED STATES DEPARTMENT OF THE INTERIOR
NATIONAL PARK SERVICE

INV. DATE 0122
SCALE 1 KILOMETERS
PAGE 2

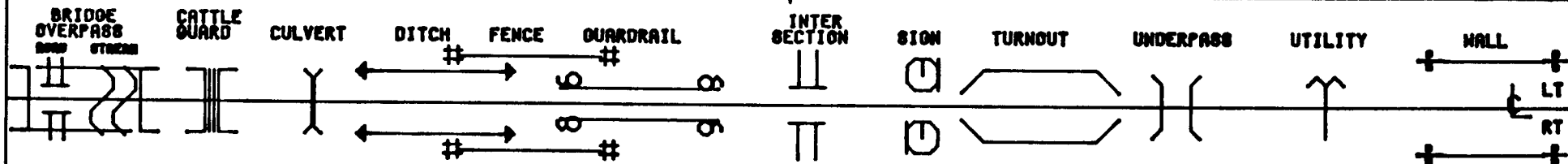
LENGTH 0.91 MILES

MAINTENANCE STRIP MAP

MILES



KILOMETERS



PARK 9640 MAHOSSAS NATIONAL
BATTLEFIELD PARK
ROUTE 14 NEW YORK AVENUE
FROM US 29-211
TO END OF LOOP

UNITED STATES DEPARTMENT OF THE INTERIOR
NATIONAL PARK SERVICE

INV. DATE 123
SCALE 1 KILOMETERS
PAGE 1

LENGTH 0.33 MILES

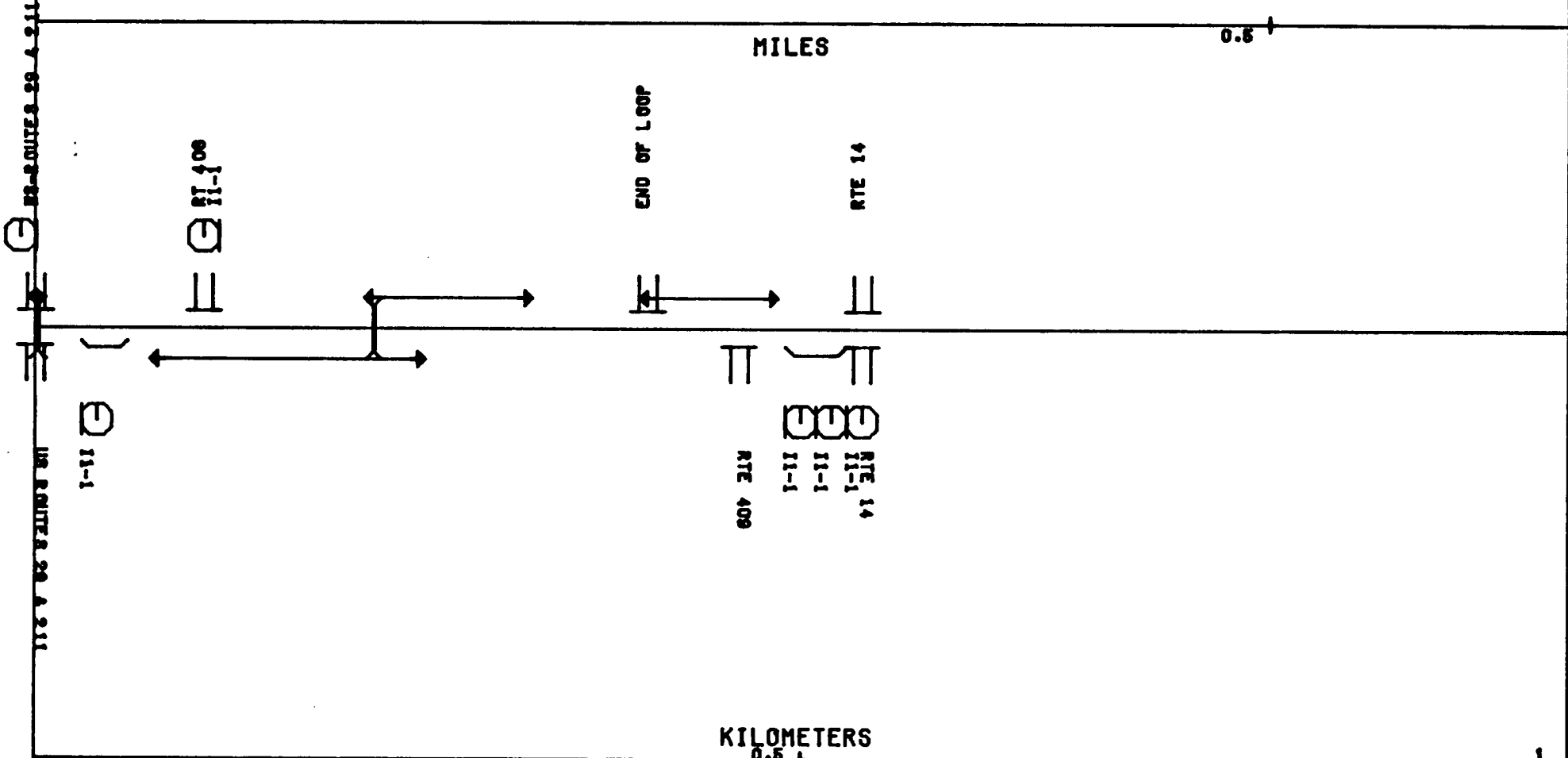
MAINTENANCE STRIP MAP

MILES

0.5

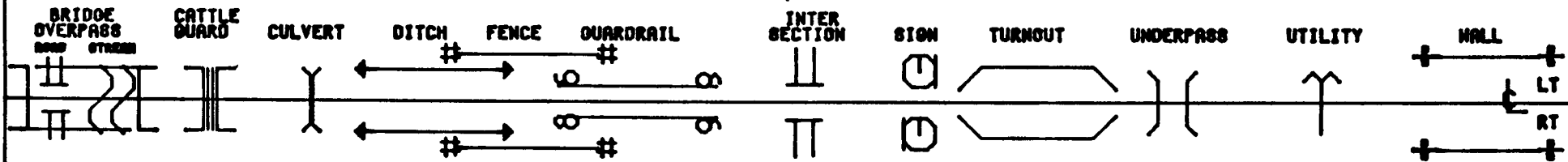
END OF LOOP

RTE 14



KILOMETERS

0.5



MAINTENANCE
PLANNING BUDGET