

PAVEMENT HISTORICAL DATABASE (PHD)

FULL TRAINING



November 2023

Training Presentation

- ☐ 8:00 am **to** 9:50 am
- ☐ Presentation Slides

Break

- ☐ 09:50 am **to** 10:00 am

Demonstration

- ☐ 10:00 am **to** 12:00 pm
- ☐ Example PHD data entry

Certificate of Attendance

- ☐ This week

PURPOSE

- ☐ Introduce PHD and its importance
- ☐ Explain data preparation for PHD entries
- ☐ Explain PHD job creation and Data entry
- ☐ Summarize PHD reports and exports
- ☐ Answer Questions

OUTLINE

- 1 – Background
- 2 – PHD Purpose and Uses
- 3 – General Information
- 4 – PHD Interface & Operations
- 5 – FAQ / Business rules
- 6 – PHD Data Review & QA
- 7 – Data Export & reports
- 8 – Resources
- 9 – Appendix: Data Entry Process



BACKGROUND

WHAT IS PHD?

- ❑ Pavement Historical Database (PHD)
- ❑ MILogin application
- ❑ Centralized electronic data warehouse
- ❑ “As Built” pavement and material information on MDOT roadways
 - **All projects with pavement work** for mainline, ramps, shoulders, or curb & gutter (**≥ 0.1 mile**)
- ❑ Data can be searched, sorted, and exported

Job Details [208494 / 443 - One Course Asphalt Overlay] [Show] ▲							
Edit Job Details							
PR Segment List [Hide] ▼							
	#	PR Number	PR(v)	BMP	EMP	Route	Direction
<input checked="" type="radio"/>	1	1270204	22	5.519	6.569	M-26	2 Way
<input type="radio"/>	2	1270204	22	6.569	6.652	M-26	2 Way
<input type="radio"/>	3	1270204	22	6.652	6.696	M-26	2 Way

Lane Details [Lane #2.0]			
* Surface Type (pavement cross-section)	: HMA over existing HMA ▼		
* Width	: 12 ▼ ft		
* Lane Type	: Mainline ▼		
* Year [Paved/Placed]	: 2023 [yyyy]		
* Partial Width Paving?	: <input type="radio"/> Yes <input checked="" type="radio"/> No		
Lane Section [Lane # 2.0]			
#	Layer Name	Data Entry Status	■
3	HMA Top Course	Draft	<input type="checkbox"/>
2	HMA Level Course	Draft	<input type="checkbox"/>
1	Cold Milling	Draft	<input type="checkbox"/>

Pavement Attributes - HMA Top Course	
* Mix Type	: 5EML ▼
* Mix Design No (Case Sensitive)	: 23MD133
* Application Rate	: 165 ▼ #/syd
* Asphalt Binder	: PG 64-28 ▼
* Asphalt Binder Cert. Supplier	: BP, Bay City, MI ▼
* Asphalt % (Total)	:
* Asphalt Binder %Added (Virgin)	:
* AWI (Actual)	: 260
* Warm Mix?	: <input type="radio"/> Yes <input checked="" type="radio"/> No
* Shingles used in the mix?	: <input type="radio"/> Yes <input checked="" type="radio"/> No



Pavement Job

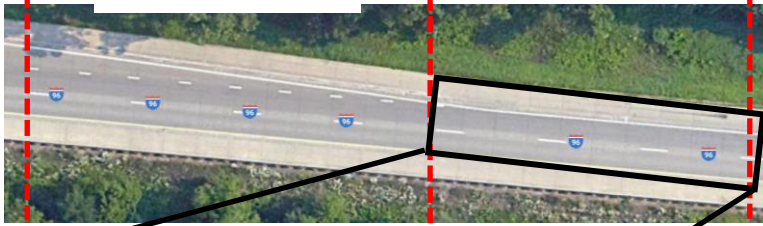
(Job ID, WTC, Fix Life, etc.)

Job Details

JobNet Job ID : 208494
Work Type Code : 443 - One Course Asphalt Overlay
Fix Life : 10 Year(s)
* Open to Traffic Date : 07/31/2023 [mm/dd/yyyy]

Segment 1

Segment 2



have

Segments

(i.e., PR from BMP to EMP)

PR Segment List [Hide] ▼							
	#	PR Number	PR(v)	BMP	EMP	Route	Direction
<input checked="" type="radio"/>	1	1270204	22	5.519	6.569	M-26	2 Way
<input type="radio"/>	2	1270204	22	6.569	6.652	M-26	2 Way
<input type="radio"/>	3	1270204	22	6.652	6.696	M-26	2 Way
<input type="radio"/>	4	1270204	22	6.696	7.669	M-26	2 Way



have

Lanes/Shoulder, Curb & Gutter, Median

Lane Details [Lane #2.0]

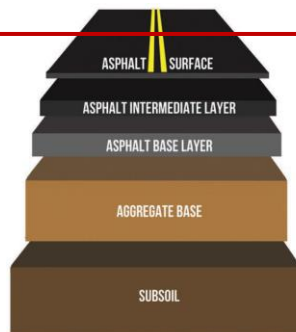
* Surface Type (pavement cross-section) : HMA over existing HMA ▼

* Width : 12 ▼ ft

* Lane Type : Mainline ▼

* Year [Paved/Placed] : 2023 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No



have

Layers

Lane Section [Lane # 2.0]	
#	Layer Name
2	HMA Top Course
1	Cold Milling

have

Attributes

Pavement Attributes - HMA Top Course

* Mix Type : 5EML ▼

* Mix Design No (Case Sensitive) : 23MD133

* Application Rate : 165 ▼ #/syd

* Asphalt Binder : PG 64-28 ▼

* Asphalt Binder Cert. Supplier : BP, Bay City, MI ▼



PHD PURPOSE AND USES

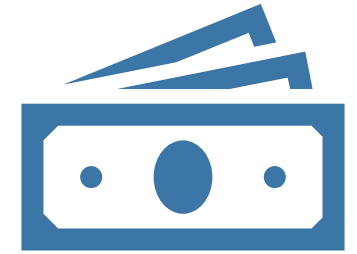
PHD PURPOSE AND USES

- ☐ Provides a robust database of MDOT public asset information

Location // Length // Geometry // Materials

- * ☐ HPMS Reporting (Highway Performance Monitoring System)
- * ☐ Pavement Management Process Plan (PaveMaPP)
- * ☐ Pavement Management Data Analysis

- ☐ Scoping, Estimating, Design, Maintenance, and Forensic Analysis
- ☐ Materials or Work Type Trend Analysis
- ☐ Sufficiency Data and Historical Research
- ☐ Permanent Database for the Michigan Trunkline Highway System



More Efficient



Faster



Smarter

PHD PURPOSE AND USES



□ Highway Performance Monitoring System (HPMS) reporting

- HPMS is the official federal government source of data on the extent, condition, performance, use, and operating characteristics of the nation's highways.
- A federal report **required annually** for apportioning Federal-aid highway funds.
- Includes pavement related data such as **surface type, total thickness, last overlay thickness, base type & thickness, year of last construction**, etc.
- PHD is a data source for the **HPMS report** for **State of Michigan**.

PHD PURPOSE AND USES

❑ Pavement Management Process Plan (PaveMaPP)

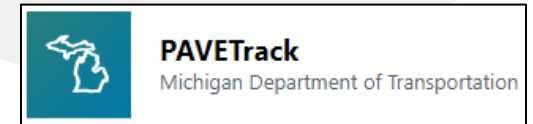
- PaveMaPP is the source of **pavement condition data** for the Michigan Trunkline Highway System, and the source of **Remaining Service Life (RSL)** estimates.
- PHD is PaveMaPP's source of **Pavement Surface Type coding**
- PHD is PaveMaPP's source of **non-let jobs' location, timing, work type, and Fix Life** attributes for use in RSL estimation/reporting.

PHD PURPOSE AND USES

☐ Pavement Management Data Analysis

▪ **MDOT Pavement Performance Monitoring process**

- Determine Fix Lives and Service Lives for each programmed job.
- The **(PAVETrack)** application monitors, analyzes, and reports on the historical performance of MDOT pavements.
- Part of the **MDOT's Life-Cycle Cost Analysis (LCCA) process**



- PHD is the primary source of all **new R&R** and **CPM project segments** that will be brought into PAVETrack to be monitored and included in future analyses.
- “As Built” pavement and material information, not what was initially designed or planned
- Most **Non-Let maintenance projects** can only be tracked in PHD

PHD PURPOSE AND USES

❑ Materials and Work Type Trend Analysis

- PHD can be used in researching individual state routes, specific pavement work type (reconstruction, overlays, pavement repairs, etc.), as well as performing materials trend analysis.

❑ Examples:

- Provide **lane miles of Crack Seal or Chip Seal** within certain years at a certain location (Region, TSC, or County).
- Track **paved lane and shoulder widths** for a particular Region, TSC, or County.
- Track the use of certain **asphalt binders (PG grade and source), emulsions, and/or aggregates** within a Region, TSC, or route.

PHD PURPOSE AND USES


- ❑ Permanent Database for the Michigan Trunkline Highway System
 - Due to the State of Michigan's **Data Retention & Disposal Schedules**, including MDOT's **Data Retention Cycle**, some construction-related data might be lost, or might not be easily accessible, after several years.
 - PHD is designed to **permanently** store “As Built” pavement typical section information and materials data.
 - The data can be quickly and easily searched, sorted, and exported.

GENERAL INFORMATION

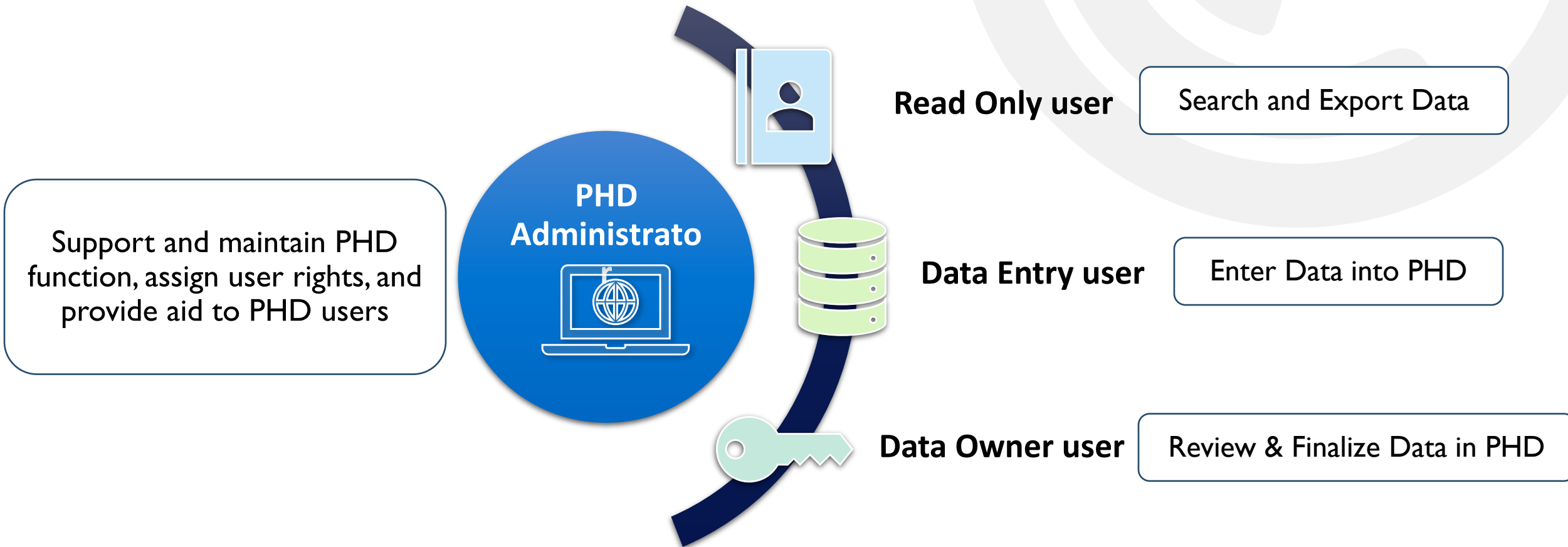
TIME ENTRY

Only for MDOT Personnel

- ☐ Charge time to the **job number** being entered or to **overhead**
- ☐ In SIGMA “Reporting” box, enter **5911200055** for time spent:
 - **Gathering data** for PHD data entry or review, **entering data**, and **QA of entered data**

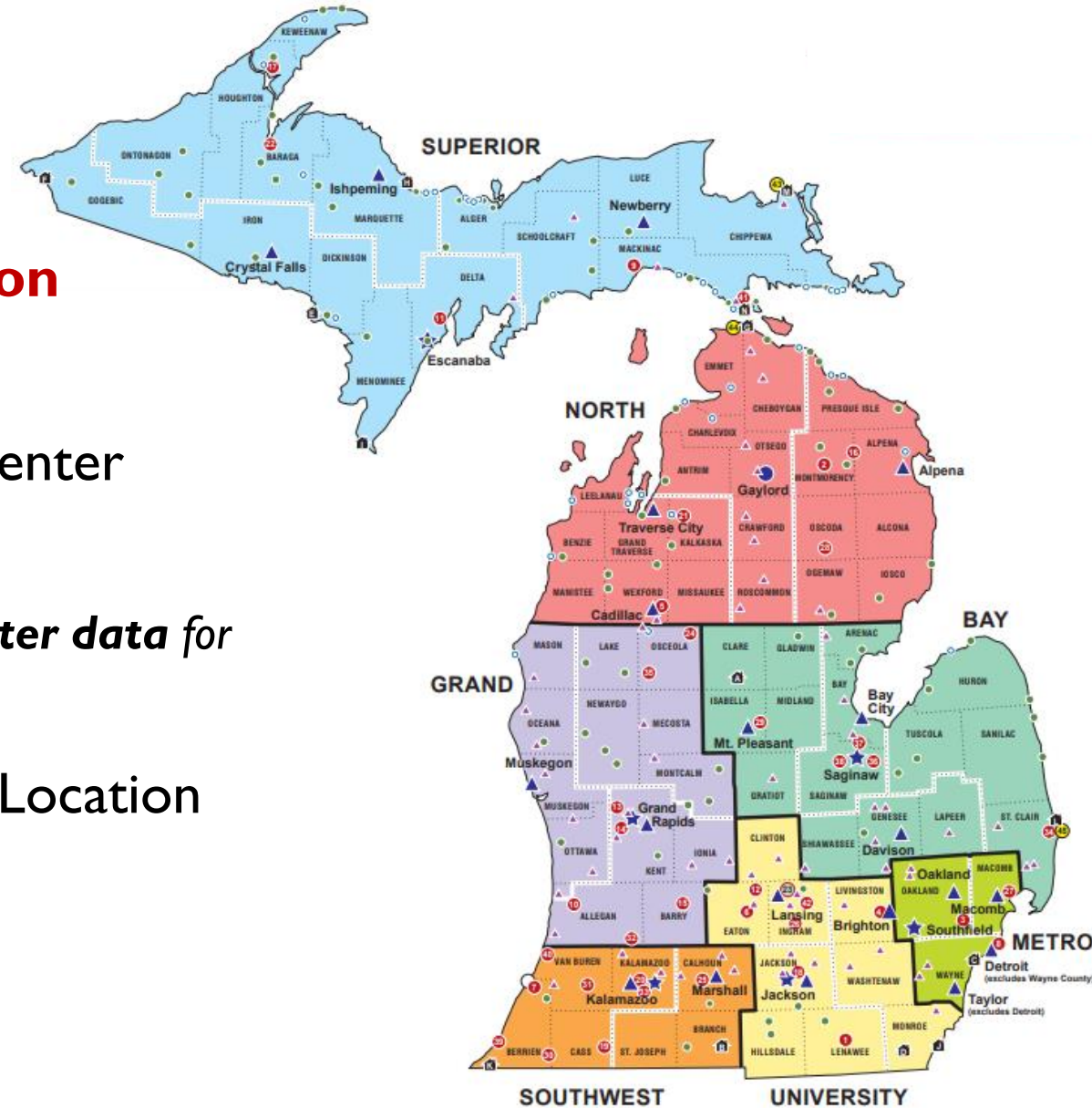
Event	Choose Accounting	Details	Sun 03/11	Mon 03/12	Tue 03/13	Wed 03/14	Th 03/15
<input checked="" type="checkbox"/>  REG1	Use LDPR with Entered Accounting <input type="checkbox"/>		<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<input checked="" type="checkbox"/> LDPR Profile: <input type="text"/>	Show LDPR Split						
Fund: <input type="text"/>	Sub Fund: <input type="text"/>	Dept: <input type="text"/>	Unit: <input type="text"/>	Sub Unit: <input type="text"/>			
Appropriation Unit: <input type="text"/>	Location: <input type="text"/>	Sub Location: <input type="text"/>	Activity: <input type="text"/>				
Sub Activity: <input type="text"/>	Function: <input type="text"/>	Sub Function: <input type="text"/>	Task: <input type="text"/>	Sub Task: <input type="text"/>			
<input checked="" type="checkbox"/> Task Order: <input type="text"/>	Program: <input type="text"/>	Phase: <input type="text"/>	Program Period: <input type="text"/>	Object: <input type="text"/>			
Sub Object: <input type="text"/>	Revenue Source: <input type="text"/>	Sub Revenue: <input type="text"/>	BSA: <input type="text"/>	Sub BSA: <input type="text"/>			
OBSA: <input type="text"/>	Sub OBSA: <input type="text"/>	Reporting: <input type="text"/>	Sub Reporting: <input type="text"/>	Major Program: <input type="text"/>			
Dept Object: <input type="text"/>	Dept Revenue: <input type="text"/>						

PHD USER ROLES (ACCESS LEVEL)



ASSIGNMENT LOCATION

- ☐ Job entry is bound by your **Assigned Region Location**
- ☐ Users with TSC assignment can reassign or enter segments anywhere within their Region
 - *Example: a user assigned to the Brighton TSC can **enter data** for a job that is within the University Region*
- ☐ Contact **PHD Admins** if your Assignment Location needs to be changed



PHD WORKFLOW

Data Collector

- Gather construction records and assemble information
- Segment job into unique segments (≥ 0.1 mi)

Data Entry User

- Review all collected information
- Enter data into PHD
- Check completed work
- Send PHD job to Data Owner for Review/QA

Data Owner User

- Review the job for errors/omissions
- Finalize if no errors/omissions (job is sent to PHD database)
- IF errors/omissions:
 - Make corrections, or
 - Send back to the Data Entry User for corrections, then resubmitted to Data Owner for Review and Finalization

Collect Data

Enter Data
into PHD

Review Data
in PHD

Finalize Data
in PHD

DATA ENTRY TIMELINE

Ideally

- **Collect:** during construction
- **Enter:** during construction & complete entry after job complete

- Due date is **January 31st, 2024** for projects completed in **2023**
 - Allows MDOT to meet annual federal reporting requirements (HPMS) & entry is completed before start of next construction season
- Exceptions – projects built over **multiple years**
 - Complete entry of multi-year projects when project is **finished**
 - Users are encouraged to **enter** the first-year data **(as Draft)**

WHAT IS ENTERED?

- ☐ All projects with **pavement work** on MDOT trunkline for mainline, ramps, shoulders, or curb & gutter (≥ 0.1 mile) is **required**

- **Let jobs:** programmed jobs in the JobNet application (Planning Database)



- **Non-let jobs:** Maintenance projects, Transportation Work Authorizations (TWA), Direct Forces Work, Warranty work, and Permits
 - **Pavement work:** HMA/Conc. layers, CPM, repair work (joint sealing, Detail 7's & 8's, etc.)

- ☐ Projects < 0.1 mile are **optional**

- ☐ No local road work

- ☐ “As Built” pavement and material information

JobNet Jobs Vs Non JobNet Jobs



- ❑ JobNet Jobs (formerly known as MAP jobs)
 - Programmed jobs in the JobNet database, with MDOT Job Number (JN)
 - Almost all **JobNet Jobs** are let through the MDOT bid letting system

- ❑ Non JobNet Jobs (formerly known as Non-MAP jobs)
 - Not programmed in the JobNet database (no MDOT Job Number)
 - Not let through the MDOT bid letting system
 - Include work performed by/through **maintenance-funded work, TWA, Direct Forces Work, Warranty Work, and Permits**

Non JobNet NAMING CONVENTIONS

Project Type	Definition	PHD Naming Convention
Maintenance	Maintenance-funded work not let through MDOT (not programmed in JobNet), performed by MDOT or another agency.	Use the prefix “ M ” followed by the job number . Example: M21550
TWA	Transportation Work Authorization funded projects. Usually for projects bid through the county/city.	Use the prefix “ TWA ” followed by the TWA number (the MDOT Region financial analyst can provide the number) Example: TWA226101
Warranty	Work performed under the terms of a project warranty.	Use the prefix “ W ” followed by the original 5 or 6 digit job number . Example: WV40542
Direct Forces Work	Work performed by MDOT employees (maintenance crew facility and/or a maintenance garage) or contract county forces.	Create a direct forces work reference number for PHD use only. Use the following conventions: DYYYYCNrouteBMP <ol style="list-style-type: none"> 1. The prefix “D” followed by four digits representing the year. 2. The two-digit county number. 3. The route name (with a hyphen as separator). Ex., “US-31” or “US-31BR”. 4. The PR beginning milepoint (including decimal point). Example: D2021 32M-I388.954
Historic	Projects let and constructed by MDOT prior to the implementation of MAP and/or JobNet databases.	Use either the project number from the title sheet of the historic plans or the records used for the data entry. Example: 53201
Permit	Work constructed by others under permit; i.e., widenings for commercial driveways or utilities work.	Use the prefix “ P ” followed by the last 10 digits of the permit number . The TSC permit agent will be able to provide this information. Example: P0003090010

JOB PREPARATION

- ❑ Before entering job data details in PHD, Data Entry users should obtain project construction records
- ❑ Below is a list of the **most common** construction records
 - **Project plans and proposal** (include project location, typical sections, work items, etc. – **“As Built” plans are preferable**)
 - **Contract modifications** to check for material changes made during construction.
 - **HMA Job Mix Formula (JMF)** (MDOT Form 1911) and **concrete JMF** (MDOT Form 1976).
 - Report Of Quality Assurance Testing (MDOT Form 1903B) and Weekly Summary Of Certified Concrete (MDOT Form 1155).
 - **Material Source List (MSL)** (Form 0501), and the Material Certifications/Certificate of Compliance/Certificate of Analysis.
 - **Testing orders** for surface seals and crack treatments.
 - **Inspector’s Daily Reports (IDRs)** (MDOT Form 1122B), Inspector’s Report of Concrete Placed (MDOT Form 1174R), and/or Aggregate Inspection Daily Report (MDOT Form 1900).

DATA HIERARCHY IN PHD



Segment 1

Segment 2



Pavement Job (i.e., Job ID, Work Type Code, etc.)



Segments (i.e., PR from MP to MP)



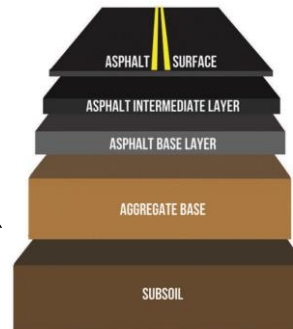
Lanes/Shoulder, Curb & Gutter, Median



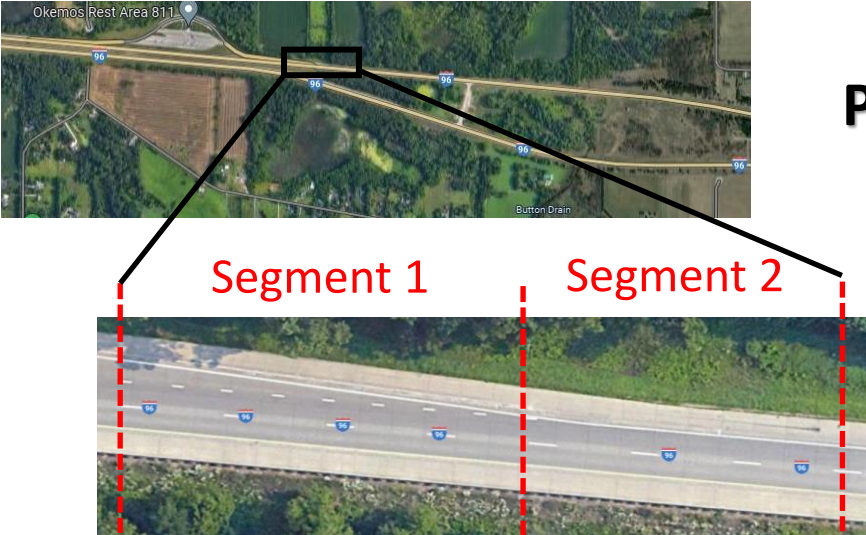
Layers



Attributes



DATA HIERARCHY IN PHD



Pavement Job (i.e., Job ID, Work Type Code, etc.)

Segments (i.e., PR from BMP to EMP) ←

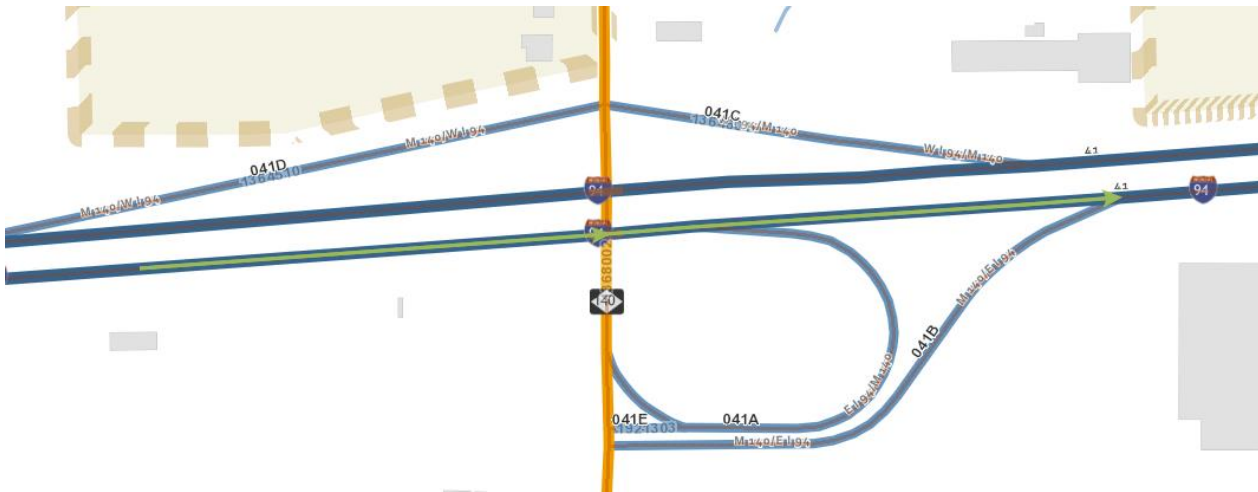
PR Segment List						[Hide] ▼			
	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	1590804	23	0	0.03	James Couzens Fwy		Active	Draft
<input type="radio"/>	2	1590804	23	0.03	0.331	James Couzens Fwy		Active	Draft
<input type="radio"/>	3	1590804	23	0.331	3.5	James Couzens Fwy		Active	Draft
<input type="radio"/>	4	1577510	23	0	0.085	M-10	WB	Active	Draft
<input type="radio"/>	5	1577510	23	0.085	3.414	M-10	WB	Active	Draft
<input type="radio"/>	6	1577510	23	3.414	3.726	M-10	WB	Active	Draft

SEGMENTS IN PHD

❑ Roadway locations are entered into PHD by their PR number and PR milepoints

- PR = Physical Reference
- Number = Unique roadway numerical name
- Milepoint = Linear location of that referencing system

❑ Use **MDOT PR Finder** for numbers and milepoints



by Route | **by Point** | by CSV

Network Layer: **PR-MP**

Route ID: 1362105

From Measure: 2.0150000

To Measure (optional): 2.4720000

Locate Clear

View Date: December 31, 2022

Version 23

PR-MP

PR: 1362105

From Measure: 2.0150000

To Measure: 2.4720000

Total Length: 0.4570000

Longitude (X):

Latitude (Y):

View Date: 12/31/2022, 12:00 AM

CS-MP

CS LRM Key: 1101701

From Measure: 6.3990828

To Measure: 6.6178475

Total Length: 0.2187647

Longitude (X):

Latitude (Y):

View Date: 12/31/2022, 12:00 AM

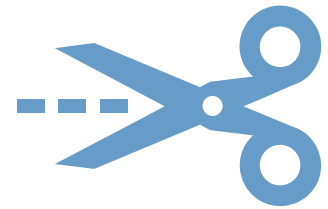
SEGMENTATION

❑ **New segments** or **sub segments** are required — changes ≥ 0.10 mile

❑ Changes in:

- PR number
- Lane(s) details (number of lanes or lane width)
- Pavement cross-section (layer or material changes)
- Shoulder, Curb & Gutter (new construction or change in existing)
- Years of construction (multi-year projects)
- Median details (only when significant - type or major width change)

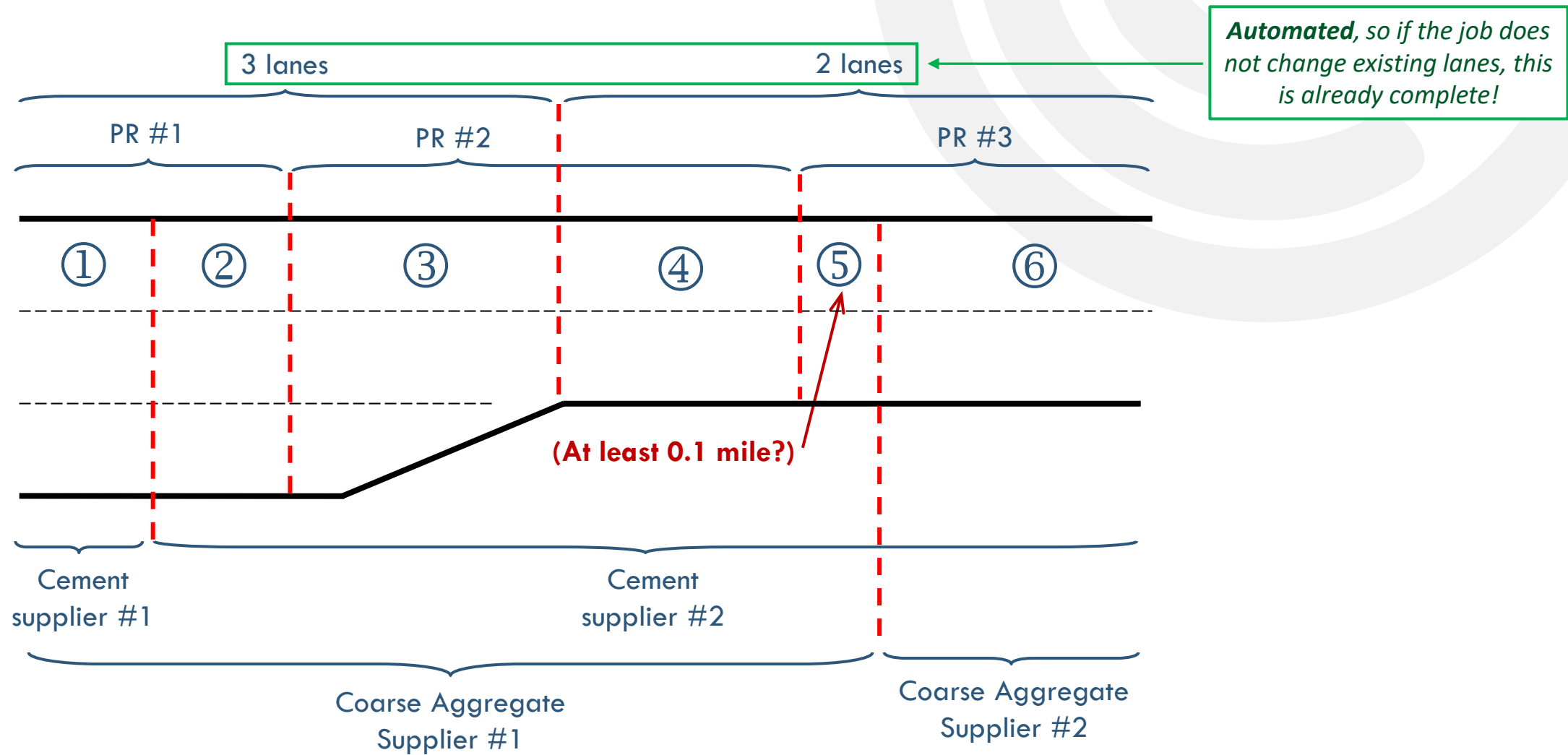
Primary reasons for segmentation in PHD
Usually automatically generated (imported from JobNet)



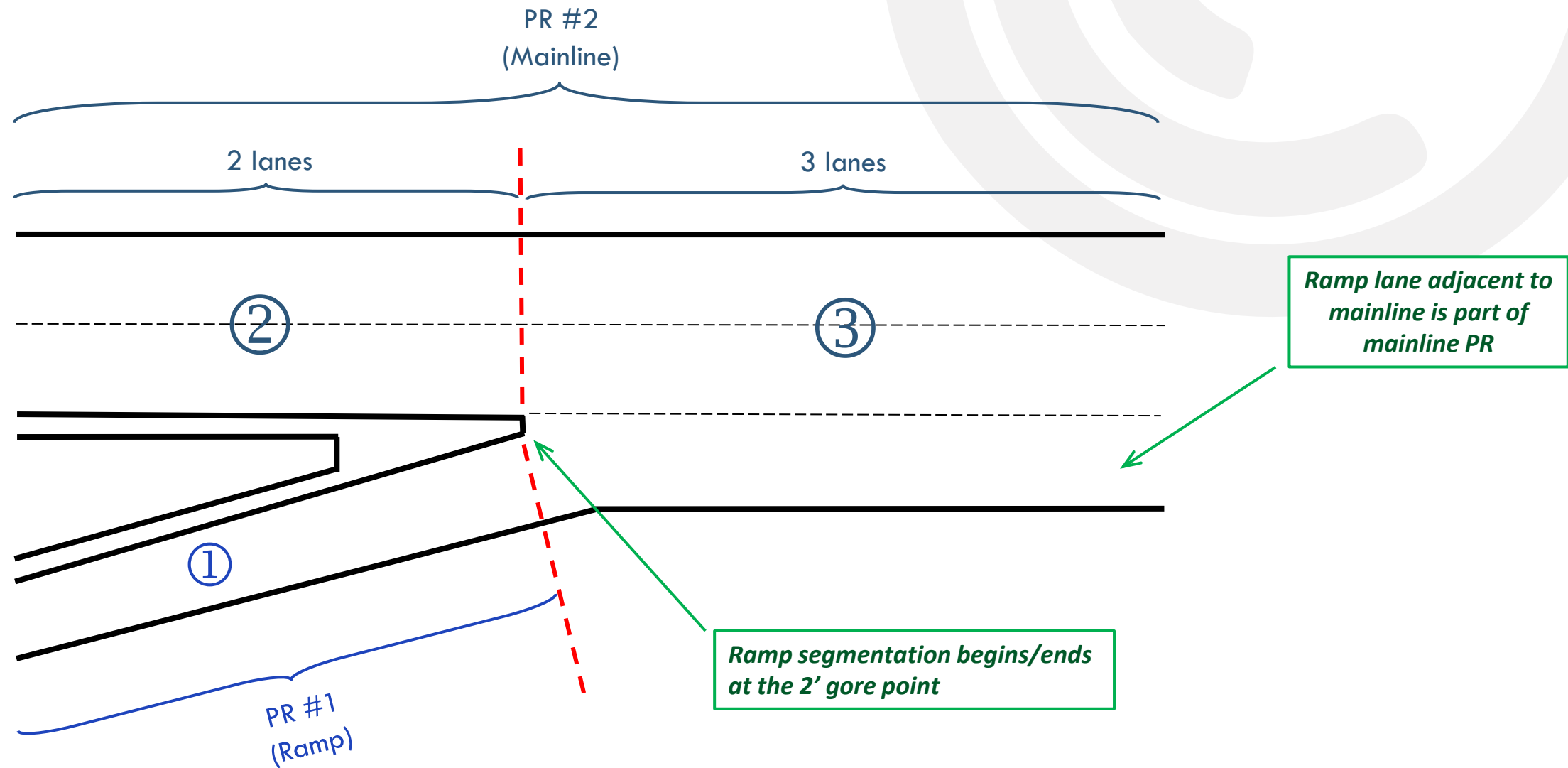
❑ Changes < 0.10 mile can be entered as a **new subsegment** or can be entered/combined with the **adjacent segment** at the user's discretion

- **Exception:** Segments involving additional lanes (turn lanes, for example)
 - Should be entered as new or subsegments

SEGMENTATION EXAMPLE (MAINLINE)



SEGMENTATION EXAMPLE (RAMP)



DATA HIERARCHY IN PHD



Pavement Job (i.e., Job ID, Work Type Code, etc.)



Segments (i.e., PR from MP to MP)



Lanes/Shoulder, Curb & Gutter, Median



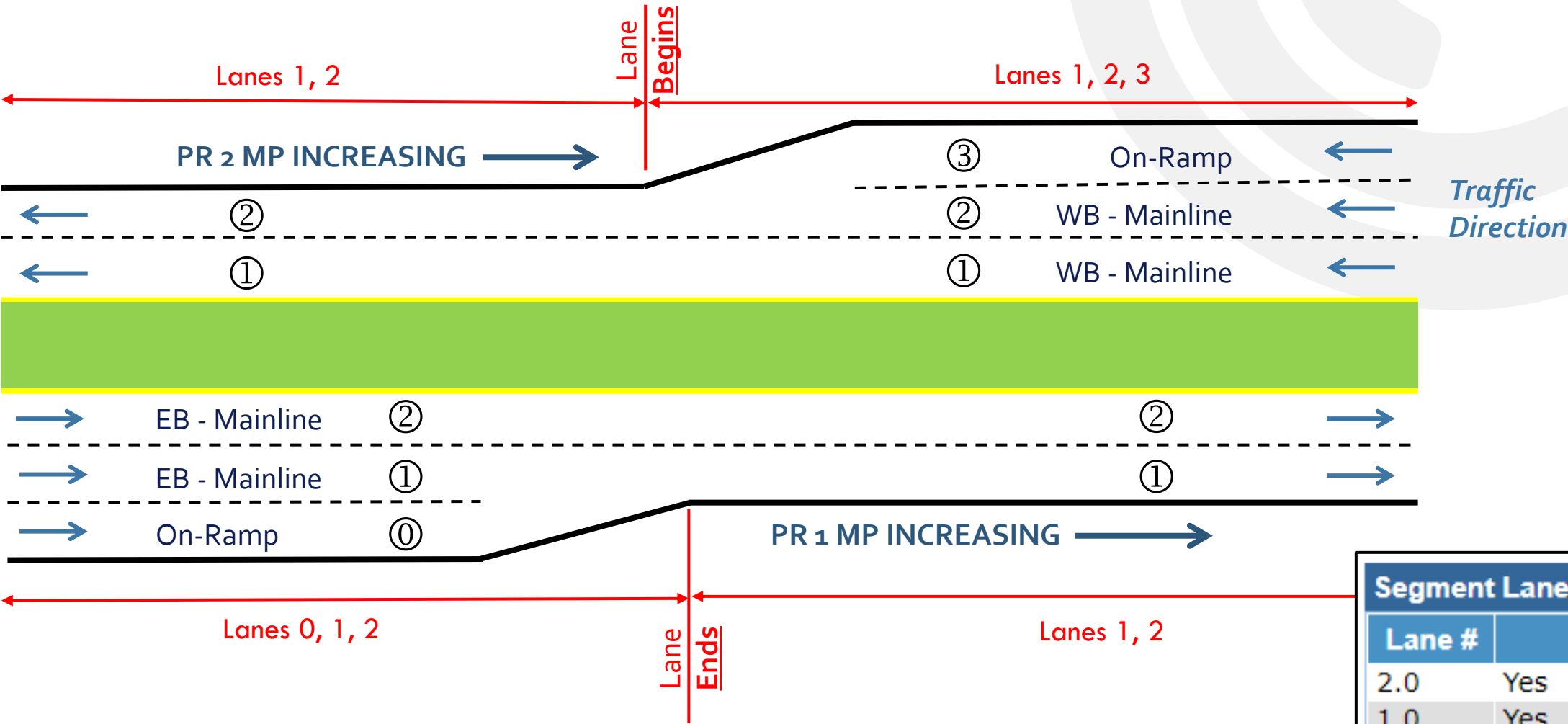
LANE NUMBERING

- ❑ Lanes are always numbered **right to left** facing toward increasing milepoints in the PR segment (no matter the traffic direction)
- ❑ Lane 1 is the **right-most through lane** of the PR segment
- ❑ Increasing lane numbers 2, 3, etc. are lanes **left** of Lane 1
 - *Examples: passing lane, center turn lane*
- ❑ Decreasing lane numbers 0, -1, and less are lanes **right** of Lane 1
 - *Examples: ramp lane, passing flare, right turn lane*
- ❑ The begin/end taper point is the start/end of the lane

***Important** because automated segmentation of lanes doesn't always identify numbering correctly*

LANE NUMBERING (EXAMPLE)

Divided Roadway



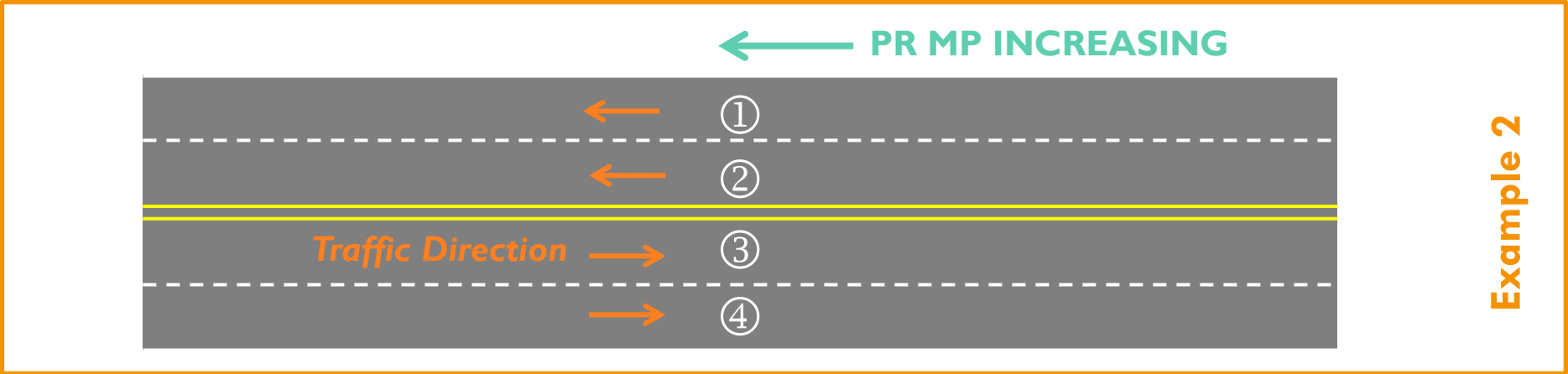
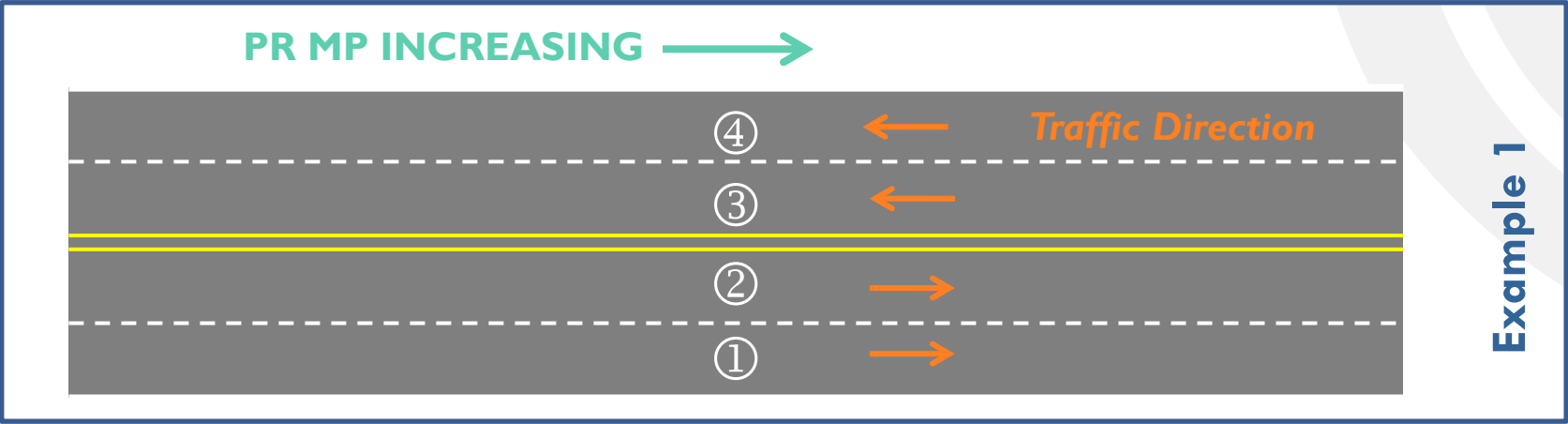
Segment Lane(s) Overview	
Lane #	Work Done
2.0	Yes
1.0	Yes
0.0	Yes
Lane Details	

Divided Roadway



LANE NUMBERING (EXAMPLE)

Undivided Roadway

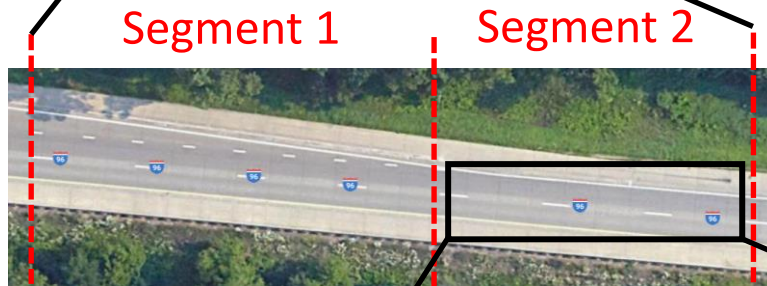


Segment Lane(s) Overview	
Lane #	Work Done
4.0	Yes
3.0	Yes
2.0	Yes
1.0	Yes
Lane Details	

DATA HIERARCHY IN PHD



Pavement Job (i.e., Job ID, Work Type Code, etc.)



Segments (i.e., PR from MP to MP)

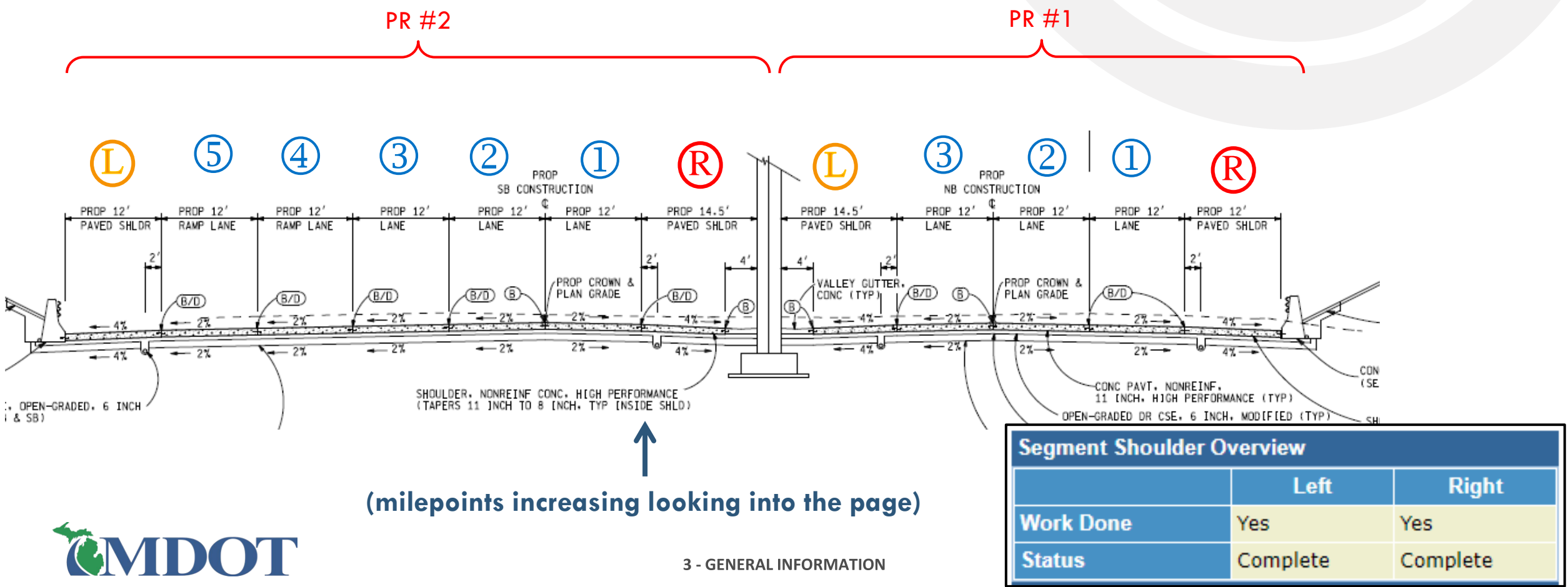


Lanes/Shoulder, Curb & Gutter, Median



SHOULDER, CURB & GUTTER DIRECTIONS

- ❑ The shoulder/C&G sides, **right** or **left**, are established by using the direction of increasing PR milepoints



DATA HIERARCHY IN PHD



Pavement Job (i.e., Job ID, Work Type Code, etc.)



Segments (i.e., PR from MP to MP)



Lanes/Shoulder, Curb & Gutter, Median



MEDIAN INFORMATION

❑ Median Types:

- Undivided
- Concrete Barrier
- Guardrail
- Cable Guardrail
- Raised Island with Curb
- Thick, impenetrable Vegetation
- Graded with ditch
- Flat (paved and unpaved)
- N/A (i.e., ramps)
- Other – *input a unique type in a text box*

Median Overview	
* Median Type :	Guardrail ▼
* Median Width :	12 ft

❑ Median Width:

- Average or predominant width including inner shoulders, measured between the inside edges of the leftmost through lanes in both directions, to nearest foot.
- Change if there is a new consistent width.



DATA HIERARCHY IN PHD



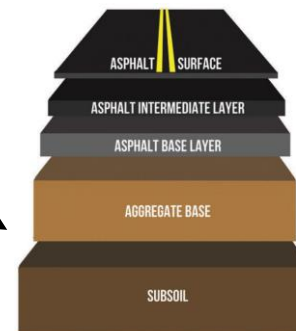
Pavement Job (i.e., Job ID, Work Type Code, etc.)



Segments (i.e., PR from MP to MP)



Lanes/Shoulder, Curb & Gutter, Median



Layers

have

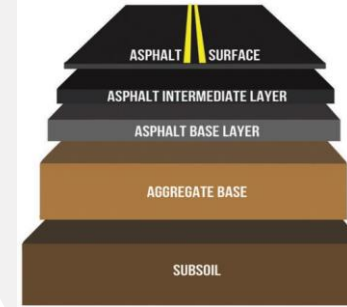
Attributes

LAYERS AND ATTRIBUTES

❑ A layer is a single thickness of a paved/placed **material** or **repair work**

- **Paved/placed material:** HMA layer(s), PCC pavement, chip seal, etc.
- **Repair work:** asphalt joint/crack repair, HMA cold milling, Overband Crackfill, concrete pavement repairs (Detail 7's & 8's), etc.

❑ A comprehensive list of all layers and their associated attributes is available in the **“PHD Data Spreadsheet”** and **“PHD Attribute Locations”** documents, on the MDOT PHD website.



Select a Layer [Job # - 124046 / PR # - 1590804/ MP :0 ... 0.03]

Layer : HMA Crack Treatment ▼

Consists of both crack sealing and crack filling. Crack sealing is attained by the Saw/Rout and Seal Method. Crack filling is attained by the Overband Crack Fill Method. The purpose of sealing and filling cracks is to reduce the amount of water and incompressibles entering the pavement structure.

Locate layer attributes using the following construction-related documents:

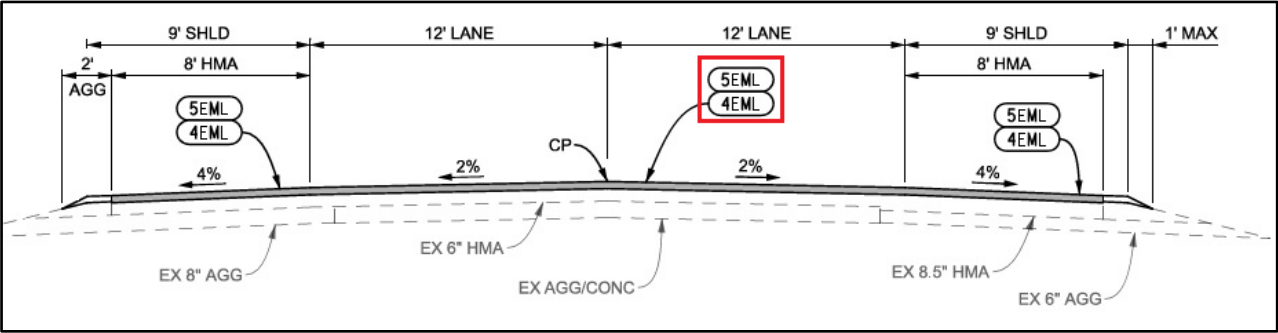
- For Cut and seal method, use on-site verification.
- For HMA Crack Seal Product/Supplier, use Material Cert/Cert of Compliance/Cert of Analysis, Special Provision (12SP-914B-01), or Material Source List (Form 0501).
- For Overband usage/Product, use Inspector's Daily Reports (IDRs) (Form 1122B), Material Cert/Cert of Compliance/Cert of Analysis, or Material Source List (Form 0501).

Pavement Attributes - HMA Crack Treatment

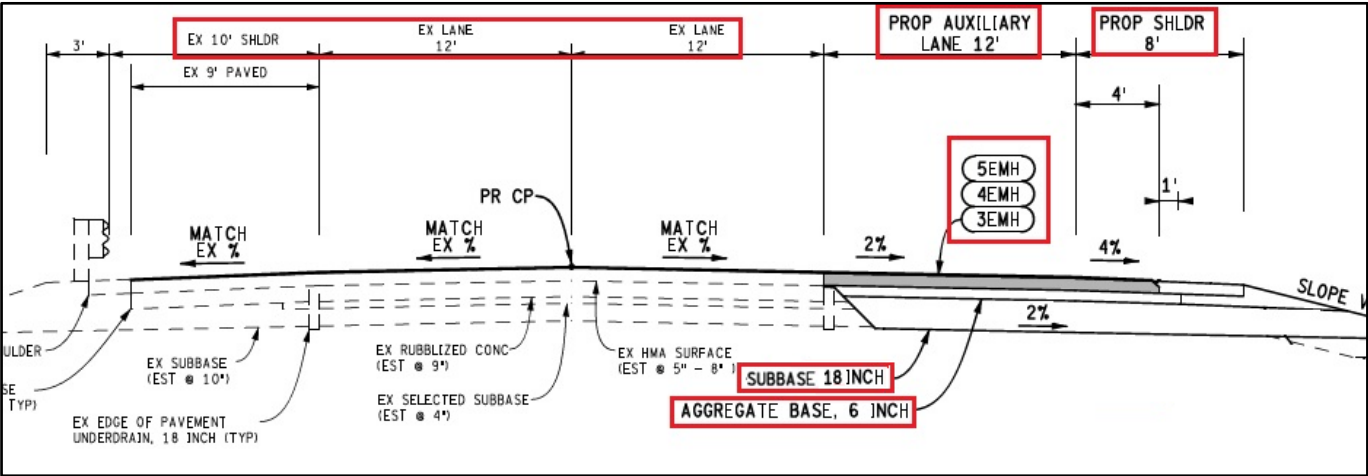
* Cut and Seal Method	:	Routed	▼
* HMA Crack Seal Manufacturer	:	Crafco, Inc.	▼
* HMA Crack Seal Product Name	:	Deery 101 ELT	▼
* Was Overband also used?	:	<input type="radio"/> Yes <input checked="" type="radio"/> No	

LAYERS

- ❑ Layers/work items should be entered in order of construction
- ❑ Only enter layers paved/placed in the current job
 - Existing layers or layers paved/placed in other jobs **should not** be entered with the current job



Lane Section [Lane # 1.0]	
#	Layer Name
3	HMA Top Course
2	HMA Level Course
1	Cold Milling



Segment Lane(s) Overview	
Lane #	Work Done
3.0	No
2.0	No
1.0	Yes

Segment Shoulder Overview		
	Left	Right
Work Done	No	Yes
Status		Complete

Lane Section [Lane # 1.0]	
#	Layer Name
5	HMA Top Course
4	HMA Level Course
3	HMA Base Course
2	Aggregate Base Course
1	Subbase

ALL LAYERS/REPAIR WORK ITEMS IN PHD

Agg. Base Course – Cement Stab.	Crack Relief Interlayer/DRM	HMA Separator Course **	Precast Concrete Pavement
Aggregate Base Course	Cracked and Seated Concrete	HMA Skip Patching New Layer	Roadway Embankment
Brick Pavers	Crushed and Shaped HMA	HMA Top Course **	Rubblized Concrete Pavement <u>New Attr.:</u> Rubblizing Equipment Type
Brick Seal	Diamond Grinding/Grooving	HMA Ultra-Thin Overlay **	Scrub Seal
Chip Seal	Dowel Bar Retrofit	HMA Wedge Course **	Subbase
Cold In Place Recycled Asphalt	FiberMat	Hot In Place Recycled Asphalt	Subgrade Stabilization
Cold Milling	Fog Seal	Joint/Crack Repair Mastic	Subgrade Undercut
Concrete Pav. Crack/Joint Sealing	Geotextile Fabric	Micro-surface <u>New Attr.:</u> Rut Fill Layer (Y/N)	Void Reducing Asphalt Membrane New Layer
Concrete Pav. Repairs (Detail 7's & 8's)	High Friction Surface	Overband Crackfill	** <u>New attributes:</u> Asphalt % (Total) Asphalt Binder %Added <u>Archived Layers:</u> Cobblestone Corduroy Micro-surface (Rut Fill Layer) Overband Crackfill PreTreatment Slurry Seal
Concrete Pav. Repairs (Full Depth)	HMA Base Course **	Pavement Jacking	
Concrete Pav. Repairs (Partial Depth)	HMA Crack Treatment	Paver Placed Surface Seal	
Concrete Penetrating Sealer	HMA Leveling Course **	PCC Pavement	

ATTRIBUTES

Select a Layer [Job # - 124046 / PR # - 1590804/ MP :0 ... 0.03]

Layer : HMA Top Course

Pavement Attributes - HMA Top Course

* Mix Type : 5EML

* Mix Design No (Case Sensitive) : 23MD262

* Application Rate : 165 #/syd

* Asphalt Binder : PG 64-28

* Asphalt Binder Cert. Supplier : Interstate Asphalt, Manistee Asphalt Term., Manistee, MI

* Asphalt % (Total) : 6.16 [Numeric Value]

* Asphalt Binder %Added (Virgin) : 5.12 [Numeric Value]

* AWI (Actual) : 282 [Numeric Value]

* Warm Mix? : ☒ Yes ☐ No

* Shingles used in the mix? : ☐ Yes ☒ No

If Warm Mix, Water Foaming? : ☒ Yes ☐ No

If Warm Mix, select Additive : - No Additive, Water Foaming Only -

Select New Aggregate

* Aggregate : Select an Aggregate

Source : -

Add Aggregate

Aggregate Summary

Aggregate	Source	
Sand	72-006	<input type="checkbox"/>
LWCD	60-018	<input type="checkbox"/>
H2	49-065	<input type="checkbox"/>
1/8- (Dust) C	72-027	<input type="checkbox"/>
3/8-1/8 C	72-027	<input type="checkbox"/>

Add Aggregates

Edit Aggregate

Remove Aggregate

Michigan Department of Transportation 1911 (03/14)

JOB MIX FORMULA (JMF)
HMA FIELD COMMUNICATION

Clear Form

This form 1911 applies only to the project listed below and is not transferable to other projects.

DISTRIBUTION: ORIGINAL - Project Engineer COPIES - Contractor, Testing Laboratory, Inspector, and TMI File 305

CONTROL SECTION 06071	JOB NO. 208813A	PROJECT ENGINEER Kirk Habowski - Bay City TSC	DATE EFFECTIVE 08/07/2023
CONTRACTOR Rieth-Riley Construction Co., Inc.	PLANT LOCATION Houghton Lake	PLANT NO. 390-21	
TYPE OF MIXTURE 5EML	MIX DESIGN NO. 23MD262	TESTING OPTION vacuum extraction	PLANT CERTIFICATION DATE 04/26/2023
CONTRACTOR'S QC PLAN TO PROJECT ENGINEER	<input type="checkbox"/> YES <input type="checkbox"/> NO		
STAND. SPEC. DATE 2020	MIX SP. PROV. DATE 2020 Std. Spec.	QC/QA SP. PROV. DATE 501R-03 9/17/21	VMA 15.77
Gmm 2.459	Gmb 2.385	Gb 1.030	Gse 2.705
Gsb 2.657	FINES/ASPHALT RATIO 1.05	COMPACTION TEMP. 284 - 293 F	MIXING TEMP. 304 - 316 F
MIX/AGG. GRADATION, %		MIX/AGG. PROPORTION, %	
ITEM	PERCENT	MATERIAL/PRODUCER	PIT NO.
ASPHALT, %	6.16	Sand	72-006
P 1-1/2" (37.5 mm)	100.00	LWCD	60-018
P 1" (25.0 mm)	100.00	H2	49-065
P 3/4" (19.0 mm)	100.00	1/8-(Dust) C	72-027
P 1/2" (12.5 mm)	100.00	3/8-1/8 C	72-027
P 3/8" (9.5 mm)	97.20		
P No. 4 (4.75 mm)	83.00		
P No. 8 (2.36 mm)	65.20		
P No. 16 (1.18 mm)	49.20		
P No. 30 (600 µm)	38.10		
P No. 50 (300 µm)	18.50	RECLAIMED	RAP (Yard 4.93% AC)
P No. 100 (150 µm)	8.00	FILLER	
P No. 200 (75 µm)	5.80	ASPHALT BINDER	GRADE PG 64-28
CRUSHED 1 FACE	92.9	AWI (Spec.)	260.0
CRUSHED 2 FACES		AWI (Actual)	282.0
		<input checked="" type="checkbox"/> QUALITY ASSURANCE TESTING	<input type="checkbox"/> REGULAR TESTING
BOND COAT	PRODUCER/LOCATION LTC 2 - Bit Mat Products (Bay City, MI)		CERTIFIED <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO
REMARKS: Warm Mix utilizing Water Foaming for bitumen Introduction but produced at regular mixing			

PHD INTERFACE & OPERATIONS

PHD ACCESS

- ❑ Use appropriate **MILogin** link to access PHD (or request access)
 - If you are having trouble accessing MILogin, make sure that you're using the correct link

MDOT Employees

<https://miloginworker.michigan.gov/uisecure/selfservice>

Consultants

<https://milogintp.michigan.gov>

PHD WELCOME SCREEN

Active Page

Displays the active main menu and submenu


Contact & Help

Administrator's contact info & User Manual


Assignment Location

TSC/Region, or Statewide jurisdiction

Username/ID



Department of
Transportation



[connectMDOT Home](#)

[PHD Home](#) | [PHD Contact](#) | [PHD Help](#)

[Sign Out](#)

Fawaz Kaseer

Pavement Historical Database

Assignment : Statewide

+ Post Constr. Data

+ Reports & Searches

+ Administration

:: PHD | Welcome

The Pavement Historical Database (PHD) is a centralized electronic data warehouse created for the collection and storage of pavement "As-Built" typical section information and materials data on Michigan's state routes. PHD collects information from the typical sections of the as-built plans and the project mix designs, and then combines it in a centralized electronic format using the project specific PR numbers and mile points from the MAP database as a linear referencing system. In addition to simply storing this data, PHD also functions as a research tool. The data can be quickly and easily searched through, sorted and exported. The historical records contained in PHD provide the basis for an improved pavement management system and have uses including pavement management data analysis, materials trend analysis, asset management, sufficiency, and scoping and estimating of proposed highway construction projects by region and TSC personnel as part of the annual Call for Projects process.

Role[s] :: Data Owner , System Administrator

Menu

Navigation between screens and work areas

Roles

Assigned access level: Data Entry, Data Owner, etc.



PHD DATA ENTRY PROCESS

❑ **Create** the job in PHD (by Data Entry or Data Owner user)

The screenshot shows the 'Post Constr. Data' menu on the left with 'Create' highlighted. On the right, the 'Enter Job Information' form is displayed. The 'JobNet Job ID' field is highlighted with a red box and contains the value '208759'. The 'IS JobNet Job' field has radio buttons for 'Yes' and 'No', with 'Yes' selected. The 'Next Step' and 'Cancel' buttons are at the bottom right.

❑ **Modify** the job
(start the data entry process)

The screenshot shows the 'Post Construction Data | Modify List' page. The 'Modify' button in the left sidebar is highlighted. The main area displays a table of jobs with the following data:

JobNet Job ID ▲	Non JobNet Job ID	Non JobNet Job Type	Work Type
109854	—	—	110—Non-Freeway Sign Replacement
124046	—	—	120—Intersection Improvements
208494	—	—	443—One Course Asphalt Overlay
208759	—	—	408—Milling & One Course Asphalt Overlay
208813	—	—	684—Milling and Two Course Asphalt Resurfacing

❑ **Finalize** the job
(by Data Entry user)

The screenshot shows the 'Project Comments' form with a text area for comments (max 250 characters). Below the text area are four buttons: 'Back', 'Finalize Job' (highlighted with a red box), 'Save Job as Draft', and 'Cancel'. A 'Project Summary' button is located at the bottom right.

❑ **Review & Finalize** the job
(by Data Owner user)

The screenshot shows the 'Post Construction Data | Modify List' page. The 'Review' button in the left sidebar is highlighted. The main area displays a table of jobs with the following data:

JobNet Job ID ▲	Non JobNet Job ID	Non JobNet Job Type	Work Type
109854	—	—	110—Non-Freeway Sign Replacement
124046	—	—	120—Intersection Improvements
208494	—	—	443—One Course Asphalt Overlay
208759	—	—	408—Milling & One Course Asphalt Overlay
208813	—	—	684—Milling and Two Course Asphalt Resurfacing

PHD DATA ENTRY PROCESS

- ❑ In the **Demonstration Section**, we will start & complete the PHD entry for one job
- ❑ The Appendix (slides **89 – 146**) summarizes the Data Entry Process
 - **Create Jobs**
 - **Modify Jobs**
 - **Segments**: create, modify, and delete segments, copy segment details, change segment MPs, etc.
 - **Segment Details**: create and modify Lanes, Shoulders, and Curb & Gutter
 - **Lane/Shoulder Details**: add layers and their attributes
 - **Median**: enter median information
 - **Other functions**:
 - Project and Segment Comment Boxes
 - View MAP function
 - Layers Library
 - Using copy functions (copy segment, copy lane, copy layers, etc.)
 - **Finalize Jobs**

PHD GENERAL CONVENTIONS

❑ RED = Error Message



This segment overlaps with the existing segment #3. [PR: 1562009/ 16.039 ... 16.235]

❑ GREEN = Successful save/update



Successfully created the segment.

❑ Red asterisk (*) = data is required

* = Required Fields

Enter Job Information

* Is JobNet Job : ☒ Yes ☐ No

* JobNet Job ID :

JobNet Job ID
109854
124046
—

❑ Column headers can be sorted by selecting the header name

❑ The % symbol is a “wildcard” used in search/filtering fields, for example:

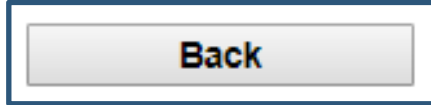
- 8% finds any number (word or phrase) beginning with an “8”

JobNet Job Details

JobNet Job Id :

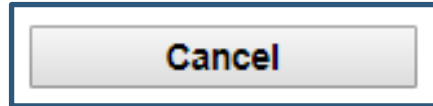
PHD GENERAL CONVENTIONS (CONT.)

☐ Back:



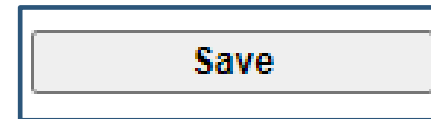
- Returns to the previous screen
- **WARNING:** Changes will still appear if the screen is reentered, but they are not saved. **Data will be lost if the project is exited without saving the changes**

☐ Cancel:

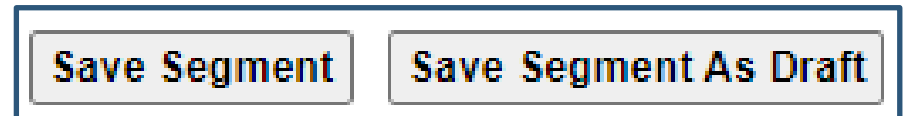


- Leaves the current job and takes the user to the initial submenu screen
- **WARNING:** Entered **data will be lost if it is not saved**

☐ Save:



- Saves all **entered data** or any **changes** made
- Saves the **completed** Job, Segment, Layer, Shoulder, etc. (as a **Draft** or **Complete**)



STATUS LEVELS

- ❑ There are TWO different status levels for *Segments, Lanes/Shoulder, Curb & Gutter, and Layers*

PR Segment List									Hide 1 ▼
	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	1590804	23	0	0.03	James Couzens Fwy		Active	Complete
<input type="radio"/>	2	1590804	23	0.03	0.331	James Couzens Fwy		Active	Complete
<input type="radio"/>	3	1590804	23	0.331	3.5	James Couzens Fwy		Active	Draft
<input type="radio"/>	4	1577510	23	0	0.085	M-10	WB	Active	Draft
<input type="radio"/>	5	1577510	23	0.085	3.414	M-10	WB	Active	Draft

- **Draft:** when some (not all) data have been entered
- **Complete:** when ALL data have been entered
- ❑ Users should save any incomplete data as a **“Draft”** to avoid losing entered data. This includes saving **Segments, Lanes, Shoulders, Layers**, etc.
- ❑ Users cannot save any **Segment, Lane, Shoulder, Layer** as **“Complete”** (and thus; cannot finalize a job) until all data have been entered.
- ❑ Users can always **edit** any entered data whether it's in a **“Draft”** or **“Complete”** status.
- ❑ Users can also save Segments/Lanes/Shoulders/Layers as **“Draft”** even if previously saved as **“Complete”**

SAVE JOB AS DRAFT OR FINALIZE JOB

❑ Save Job as Draft:

- **Data Entry user:** Saves and keeps the job in the Modify area
- **Data Owner user:** Saves and moves the job from the Review area back to the Data Owner's Modify area

❑ Finalize Job:

- **Data Entry user:** Saves and moves the job to the Data Owner's Review area
- **Data Owner user:** Finalizes and sends the job to the PHD database

Post Construction Data | Modify List

Search Filter [Show] ▲

⚠ Job [80912] has been saved as a Draft.

MAP Job ID ▲	Non MAP Job ID	Non MAP Job Type	Work Type
33333	—	—	310—New Routes
45824	—	—	169—Cncr Pv Rubb & Bit Resurf
80912	—	—	163—Concrete Reconstruction
83996	—	—	170—Major Rehabilitation
84072	—	—	163—Concrete Reconstruction

Page: 1 of 7

Post Construction Data | Road Segment List

Role[s] :: Data Owner

Job Details [80912 / 163 - Concrete Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	962706	16	10.505	10.789	I-69	E	Active	Complete
2	962706	16	10.789	11.123	I-69	E	Active	Complete
3	962706	16	11.123	11.554	I-69	E	Active	Complete
4	961905	16	4.465	4.499	M-19	N/S	Active	Complete
5	961905	16	4.499	4.719	M-19	N/S	Active	Complete

Change PR Segment Mile Point

#	PR Number	BMP
1	962706	10.505

Apply Milepoint Changes

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

miloginworkerqa.michigan.gov says:
Do you want to Save this job as a Draft?
☐ Prevent this page from creating additional dialogs.
OK Cancel

Segment Details

Quick Layer Overview

Change PR Segment Mile Point

#	PR Number	BMP
1	962706	10.505

Apply Milepoint Changes

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

miloginworkerqa.michigan.gov says:
Do you want to Finalize the job?
☐ Prevent this page from creating additional dialogs.
OK Cancel

Post Construction Data | Modify List

Search Filter [Show] ▲

⚠ Job [80912] has been finalized.

MAP Job ID ▲	Non MAP Job ID	Non MAP Job Type	Work Type
33333	—	—	310—New Routes
45824	—	—	169—Cncr Pv Rubb & Bit Resurf
83996	—	—	170—Major Rehabilitation
84072	—	—	163—Concrete Reconstruction
87379	—	—	405—Overband Crack Fill

Page: 1 of 7

Simplified CPM Jobs in PHD

- ❑ Jobs with WTC from 400 – 499 are **Capital Preventative Maintenance (CPM)** type jobs
 - Asphalt Crack Treatments, Sealing Concrete Joints, Overband Crackfill, etc.
 - Simplified data entry process
 - Requires segment layer information **only** (No entry of individual lanes and their details)
 - **Does not** allow entry of **shoulder details** (still requires shoulder layer(s)/work item(s))
 - **Does not** require **segmentation** based on lane or shoulder changes
 - **Does not** allow entry of **median information**
 - Simplified CPM format **should not** be used
 - Lanes have different paved or placed work
 - Projects with HMA paving

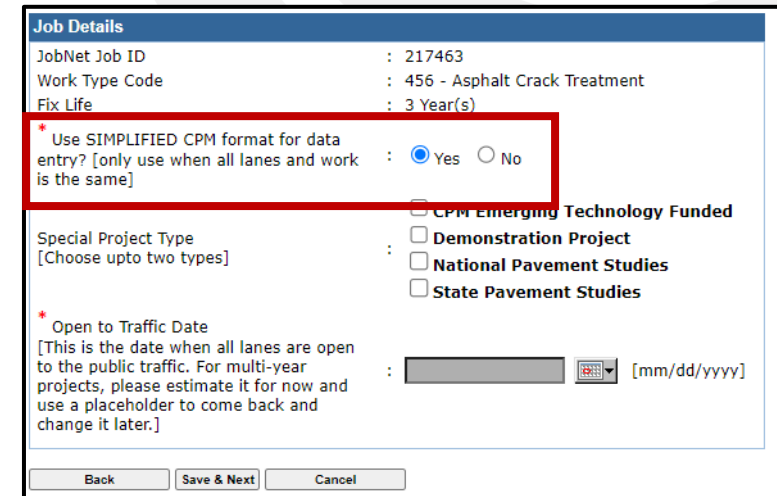
The screenshot displays the PHD software interface for Segment Details. The main panel is titled 'Segment Details [Job # - 217463 / PR # - 1497810 / MP : 0 ... 0.312]' and includes a '[Show] ▲' button. It is divided into several sections:

- Segment Shoulder Overview:** A table with columns for 'Left' and 'Right' under 'Work Done' and 'Status'.
- Segment Curb & Gutter Overview:** A table with columns for 'Left' and 'Right' under 'Work Done' and 'Status'.
- Shoulder, Curb & Gutter Details:** A section for 'Year [Paved/Placed]' with a dropdown menu and a '[yyyy]' format indicator.
- Segment Sections:** A table with columns for '#', 'Layer Name', 'Data Entry Status', and a checkbox. It includes 'Move Up', 'Move Down', and 'Remove' buttons.
- Select New Layer:** A dropdown menu for 'Layer' with a 'Select a Layer' prompt and an 'Add Layer' button.
- Select a Layer from the Layers Library:** A dropdown menu for 'Layer' with a 'Select a Layer' prompt and an 'Add Layer' button.
- Segment Comments:** A text area for comments, limited to 'max 250 characters'.

Simplified CPM Jobs in PHD

❑ The **Simplified CPM format** will remain once selected at job creation

- Cannot be changed later
- If selected in error – contact the PHD Administrator



The screenshot shows the 'Job Details' form in the PHD system. The 'JobNet Job ID' is 217463, 'Work Type Code' is 456 - Asphalt Crack Treatment, and 'Fix Life' is 3 Year(s). A red box highlights the question: '* Use SIMPLIFIED CPM format for data entry? [only use when all lanes and work is the same]'. The 'Yes' radio button is selected. Below this, there are checkboxes for 'CPM Emerging Technology Funded', 'Demonstration Project', 'National Pavement Studies', and 'State Pavement Studies'. At the bottom, there is a date field for 'Open to Traffic Date' with a calendar icon and a placeholder for the date in mm/dd/yyyy format. The form has 'Back', 'Save & Next', and 'Cancel' buttons at the bottom.

❑ Most other PHD screens, functions, and selections are similar to **Standard format jobs**

- See the Appendix (slides **89 – 146**) for more details

FAQ / BUSINESS RULES

JOB DATA ENTRY

❑ Projects with multiple job numbers - enter each job number separately

- **Example:** A project is let with a job number for intersection improvements and another job number for work outside the intersection

<u>CONTRACT ID</u>	<u>CONTROL SECTION</u>	<u>PROJECT</u>
34043-202595	IM	34043 202595A
	IM	41024 208782A

❑ Job numbers without pavement work are not entered

- **Examples:** Freeway lighting, landscaping, signing, etc.

JOB DATA ENTRY

❑ How do I enter **Multi-year construction**?

- Keep it in **Draft status** until the project is complete
- Add notes to the Comment Boxes

❑ Jobs with segments **outside your jurisdiction (location)** cannot be started/accessed

- Contact the **PHD Administrator**

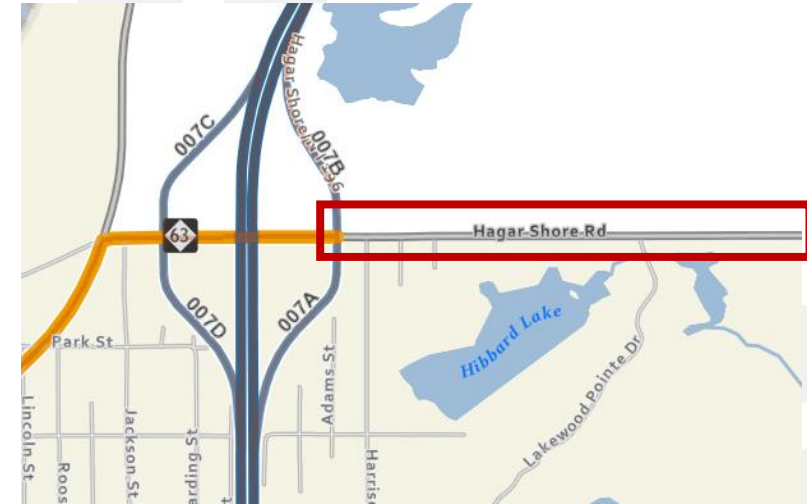
❑ How do I **edit a Finalized job** in the PHD database?

- Contact the **PHD Administrator** to **unlock** it and **reassign** it
- The Administrator will need to know the **Job ID**



SEGMENT DATA ENTRY

- ❑ Only enter **work done on MDOT trunkline**
 - **Local** roadways should **not** be entered into PHD



- ❑ PHD uses PR info and PR milepoints: might not match CS milepoints
 - Use **MDOT PR Finder** to collect numbers and milepoints
- ❑ Auto-populated PHD segments show incorrect milepoints (i.e., as-constructed differs from JobNet/MAP):
 - **Change milepoints** in PHD

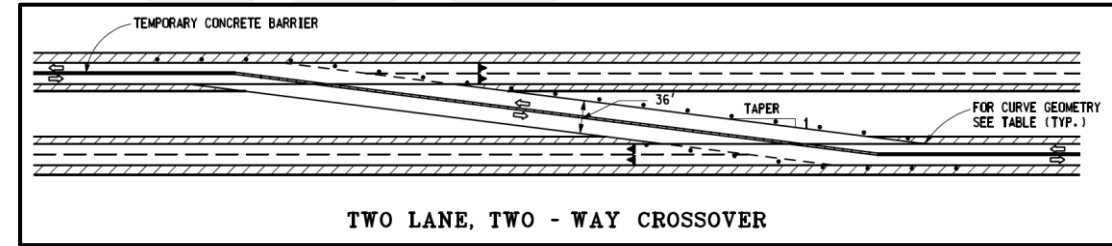
PR-MP	
PR:	1362105
From Measure:	2.0153710
To Measure:	2.4725684
Total Length:	0.4571974
Longitude (X):	
Latitude (Y):	
View Date:	10/24/2022, 10:49 PM

CS-MP	
CS:	11017
CS LRM Key:	1101701
CS Branch:	01
UNID:	
From Measure:	6.3994538
To Measure:	6.6178475
Total Length:	0.2183937
Longitude (X):	
Latitude (Y):	
View Date:	10/24/2022, 10:49 PM

SEGMENT DATA ENTRY

☐ Maintenance cross-overs are not entered

- Even if they have PR numbers



☐ Only work/materials assigned to **that Job/Segment**

- Do not enter existing layers
- Do not enter Lanes and/or Shoulders when **no work** has been done
- **Exceptions:**
 - Surface Type (consider entire underlying cross-section)
 - Enter Median Type and Width (predominant/average) even if no work was conducted on the median

☐ Ramps:

- PR begins or ends at 2' point
- Portions of ramp adjacent to mainline are entered with mainline to the 2' point

LANE, SHOULDER/CURB & GUTTER DATA ENTRY

☐ Surface Type (pavement cross-section)

- All existing layers underneath the top surface placed with the project should be considered
- Consider the examples below:

The entire asphalt pavement replaced in this job



surface type is (HMA Full Depth)

An HMA overlay in a lane with existing HMA
(without any existing concrete pavement)



surface type is (HMA over existing HMA)

An HMA overlay in a lane with existing
JPCP concrete pavement



surface type is (HMA over existing Jointed Conc)

Micro-Surface, Chip Seal, etc. (thickness $\geq 0.5''$)
Considered as a layer



surface type is (HMA over existing HMA/Conc)

Micro-Surface, Chip Seal, etc. (thickness $< 0.5''$)
Not considered as a layer *



Consider the existing layers only

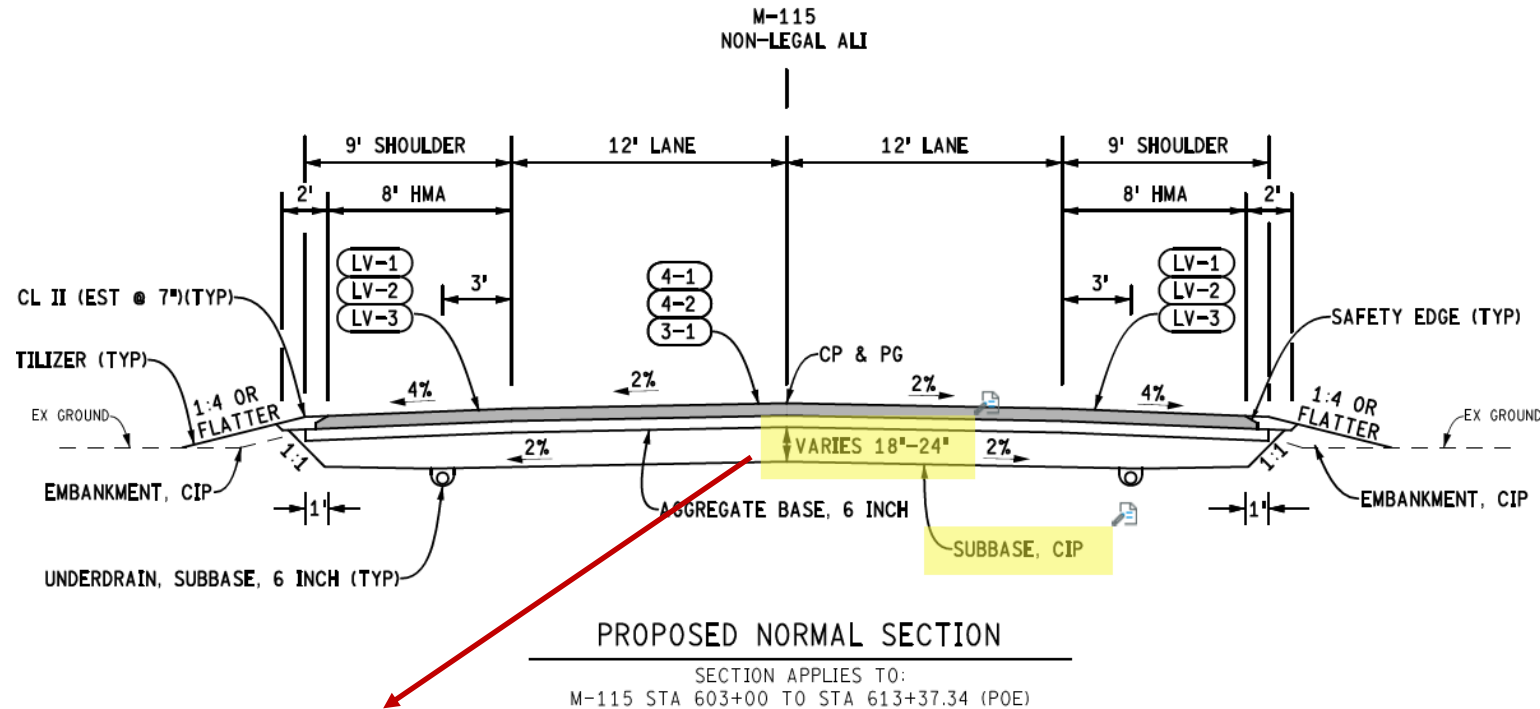
* when defining Surface Type - still need to be entered as a layer in PHD

LANE, SHOULDER/CURB & GUTTER DATA ENTRY

- ❑ Partial curb & gutter work – how much requires entry in PHD?
 - **More than 5%** of the total length of the curb & gutter is replaced –
 - Select ‘Yes’ for Curb & Gutter Work Done (no need to segment on those locations), and
 - Add **comment** that replacement is intermittent

LAYER DATA ENTRY

- ❑ Layer is variable thicknesses:
 - Use **average** or **predominant thicknesses**
 - Insert a **Segment Comment**



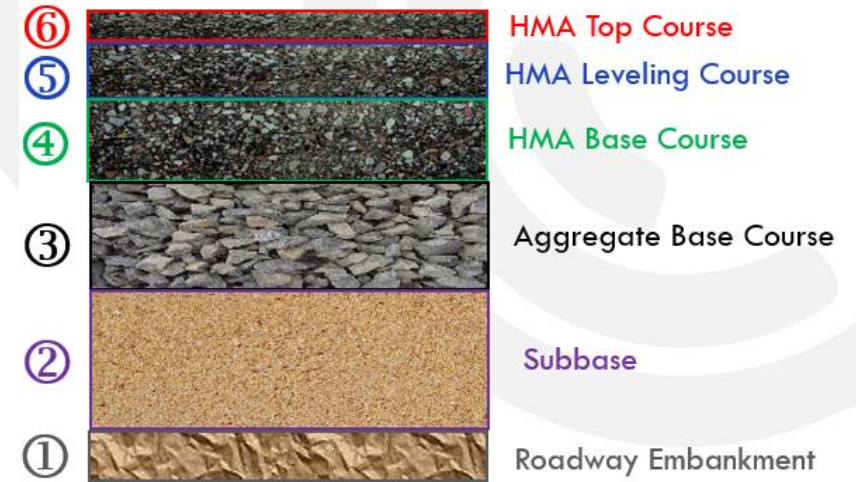
Segment
Comments
[max 250
characters]

Subbase has a variable depth of 18"-24" in this segment.

LAYER DATA ENTRY

☐ Layers order:

- Matches how pavement is constructed, **bottom to top**



☐ Can I enter shoulder chip seals, crack seals, etc.?

- Yes, these should be added as layers

LAYER AGGREGATES

- ❑ HMA aggregate types **not** in the drop-down list:
 - Select 'Other Aggregate'
 - Enter the aggregate name in the new text box

Select a Layer [Job # - 201195 / PR # - 1562406/ MP : 0

Layer : HMA Top Course ▾

Pavement Attributes HMA Top Course

- * AWI (Actual)
- * Application R
- * Asphalt Bind
- * Asphalt Bind
- * Mix Type
- * Mix Design M
- * Warm Mix?
- * Shingles use

25A
26A
29A
2MS
2NS
2SS
34G
34R
4AA
6A
6AA
6AAA
CLI
CLII
CLIIA
CLIIAA
CLIII
CLIIIA

Select New Aggregate

Other Aggregate
Unknown Aggregate

* Aggregate : Select an Aggregate ▾

Source : —

Add Aggregate



Select New Aggregate

* Aggregate : Other Aggregate ▾

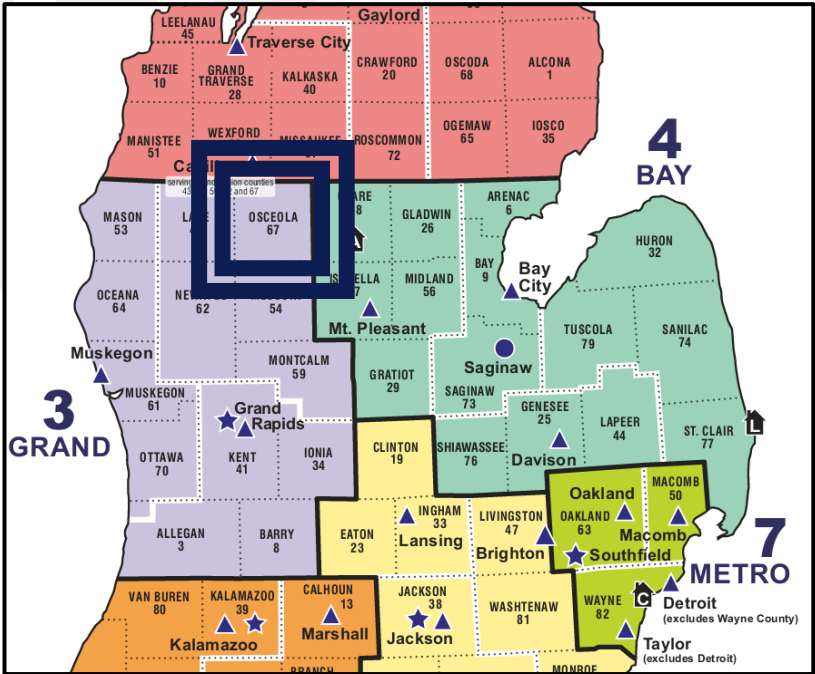
Other : Coarse Sand

Source : 52 — 009

Add Aggregate

LAYER AGGREGATES

- ❑ How to enter **BORROW** material aggregates:
 - Select the Aggregate from the list, or
 - Select 'Other Aggregate' (for non-standard)
 - Enter the material in the new text box
 - For source number:
 - 1st box (two digits): county of origin
 - 2nd box (three digits): '000'



Select New Aggregate

* Aggregate :

Source : -

Add Aggregate



ANALYSIS REPORT

SPEC.		PRODUCER	PROGRAM NO.
CLIAA		NIVER Pit	117357
ITS CUMULATIVE		TEST NO.	CONTROL SECTION
		2	67
			DATE
			11.10.04
ED	PASSING	Initial Weight of Sample	565 gm
		Weight After Washing	536 gm
		Loss By Washing (Clay & Silt)	0-5 29 gm 5.1 %

LAYER AGGREGATES

❑ How to enter **RECYCLE** aggregates (incl. crush conc.):

- Locate the associated county and pit number
- This is found in the **acceptance testing** of the recycled aggregates

❑ How to enter **DOCK** aggregates:

- Dock aggregate is not the agg name, source, or pit
- Dock aggs are those that were shipped in and stored at a dock
- Dock aggs come from the *prequalified aggregate list*, so they **do** have an actual name and source/pit number
- **The aggregate tickets should provide the actual name & number information**

GENERAL

❑ If entry for Layers, measurement units, suppliers, materials, or entry items are **missing** in PHD:

- Contact the **PHD Administrator**

*** = Required Fields**

Select a Layer[Job # - TEE / PR # - 405903/ MP :0 ... 0.461]

Layer : Conc Pavt Repairs (Full Depth) ▾

Pavement Attributes - Conc Pavt Repairs (Full Depth)

* Portland Cement Supplier	:	Select Portland Cement Supplier ▾
* Portland Cement Type	:	Aetna
* Thickness	:	Argos USA, LLC-Martinsburg, WV
* Reinforcement Steel Mesh?	:	Ash Grove - Joliette, Quebec, Canada
* Cement Content	:	Ash Grove - Mississauga, Ontario, Canada
* Concrete Grade	:	Blue Circle

Select New Aggregate

* Aggregate	:	Select an Aggregate ▾
Source	:	<input type="text"/> — <input type="text"/>

Add Aggregate

Back Complete Layer Restore Defaults Cancel

Save Layer As Draft Add to Quick Layers

Cannot see the **Cement Supplier** name for my job?

PHD DATA REVIEW & QA

DATA OWNER REVIEW

- ❑ Data Owners review **all** segments/lanes/layers in a job
- ❑ If Data Owner finds errors/omissions:
 - Data Owner makes changes & Finalize job
 - **OR** Data Owner reassigns the job back to Data Entry user



Role[s] :: Data Owner , System Administrator

Post Construction Data | Reassign List

Search Filter [Hide]

Job Type : ☐ JobNet Job ☐ Non JobNet Job ☒ Both

Work Type : Any

JobNet Job ID ▲	Non JobNet Job ID	Non JobNet Job Type	Work Type	Current User	Assign To
33799	—	—	160—Reconstruction	Hamlin Alison	-Select User-
37795	—	—	213—Interchange Redesign & Upgrading	Loree Jonathan	-Select User-
45790	—	—	164—Asphalt Reconstruction	Loehle William	-Select User-
45883	—	—	142—Resurf, Mill & Pulver	Budida Santa	-Select User-
			129—Add Turn	Inreep	

Update

COMMON ENTRY ERRORS TO LOOK FOR

- ❑ Incorrect project PR# and milepoints
- ❑ Segments input in the wrong direction
- ❑ Over/Under segmentation
- ❑ Omitted/Missing items:
 - Work items (example: ramps or pre-overlay work)
 - Lanes, Shoulder, Curb & Gutter / Layers / Attributes
 - Aggregates from a mix design
 - Warm mix designation (incorrect or missing)



COMMON ENTRY ERRORS TO LOOK FOR

☐ Layers:

- Layers in the wrong order (upside down)
- Extra/duplicated layers

☐ Lane Numbering:

- Lane 1 not a mainline lane
- Lane 0, -1, etc. being a mainline lane

☐ Incorrect Lane/Shoulder, Curb & Gutter:

- Surface Type
- Lane/shoulder Widths
- Lane Type

☐ Copying errors



CENTRAL OFFICE QA

- ❑ QA begins immediately following the **January 3rd** entry closing date
- ❑ Two Part evaluation process:



Part 1
Completeness



Part 2
Accuracy

CENTRAL OFFICE QA

❑ Part 1 – Completeness

- Are all pavement jobs **entered**?
 - Info compared from **JobNet Database** to **PHD Database**
 - Discrepancies e-mailed to verify if job(s) should be entered
 - **Data Entry user** enters missing job



❑ Part 2 – Accuracy

- Are jobs **entered correctly**?
 - Completed PHD projects are **sampled at random*** for each Region
 - Compare construction documents (**plans** & other **PWise resources**) to PHD
 - Possible errors are sent to the **Data Entry user** to verify/correct

** Accounts for approx. 15% of all entered jobs.
This is not a verification of all jobs.*



DATA EXPORT & REPORTS

PHD REPORTS AND SEARCHES


□ PHD Reports and Searches:

- * ■ Export Data – generates selectable data items (Excel)
 - Search Segment(s) – finds segments within finalized jobs
- * ■ Construction History Report – generates segment/job info (Excel or PDF)
- * ■ Material Information Report – finds segments per materials (PDF or Excel)
- * ■ Material Quantity Report – quantities of HMA and PCC per time period (PDF or Excel)
 - Network Inventory Report – lane-miles of rigid/flexible/comp lanes or shoulders (PDF or Excel)
 - Work Type Report – finds segments by work type code (PDF or Excel)
- * ■ MAP Reconciliation – finds jobs from JobNet (MAP) which are not entered into PHD (PDF)

– Reports & Searches

- » Export Data
- » Search Segment(s)
- » Construction History
- » Material Information
- » Material Quantity
- » Network Inventory
- » Work Type
- » MAP Reconciliation

EXPORT DATA

- ❑ Shows segment data entry for a geographic area (Statewide, Regions, TSCs, and Counties)
- ❑ Various Export Types: 
- ❑ Report per **segment information** (PR#, MPs, Route, etc.)
- ❑ Reports in **Excel** format



Export Type	Selectable Items (Column Headers)	
Job Details	<ul style="list-style-type: none"> • Non MAP Job Type • Special Project Type • National Pavement Study Number • State Pavement Study Number • Work Type Code 	<ul style="list-style-type: none"> • Work Type Code Description • Date (Open to Traffic) • Date Type • Fix Life • Project Comment
Lane: Layers & Details	<ul style="list-style-type: none"> • Year (Constructed) • Lane Number • Lane Surface Type • Lane Width 	<ul style="list-style-type: none"> • Lane Type • Layer Number • Layer Name • Attributes (Name & Value)
Lane: Aggregates	<ul style="list-style-type: none"> • Year (Constructed) • Lane Number • Lane Surface Type • Layer Number 	<ul style="list-style-type: none"> • Layer Name • Aggregate Name • Source/Pit Number
Shoulder: Layers & Details	<ul style="list-style-type: none"> • Side Indicator • Surface Type • Corrugations (Rumble Strip) • Parking Lane • Paved Width • Total Width 	<ul style="list-style-type: none"> • Paved Thickness • Paving Width • Layer Number • Layer Name • Attributes (Name & Value)
Shoulder: Aggregates	<ul style="list-style-type: none"> • Side Indicator • Surface Type • Layer Number 	<ul style="list-style-type: none"> • Layer Name • Aggregate Name • Source/Pit Number
Curb & Gutter: Details	<ul style="list-style-type: none"> • Side Indicator • Attributes (Name & Value) 	
Median: Details	<ul style="list-style-type: none"> • Median Type • Median Width 	

EXPORT DATA (EXAMPLES)

❑ Export Type – Job Details

	C	D	E		H	I	J	I	M	N	O	R	S	T	V
	PR							MAP Job	Non MAP	Non MAP		Work			
1	Number	PR BMP	PR EMP	Road Name	County	TSC	Region	ID	Job ID	Job Type	Special Project Type	Type Code	Work Type Description	Date (Open to Traffic)	Fix Life
49	535604	0.598	1.387	N I 75 BL	Crawford	Gaylord	North	204234				45	Asphalt Crack Treatment	7/24/2019	1
50	535604	1.387	1.472	N I 75 BL	Crawford	Gaylord	North	204234				45	Asphalt Crack Treatment	7/24/2019	1
51	535604	1.467	3.256	N I 75 BL	Crawford	Gaylord	North	131781				40	Milling & One Course Asphalt Ove	11/1/2018	10
52	535604	3.256	4.015	N I 75 BL	Crawford	Gaylord	North	131781				40	Milling & One Course Asphalt Ove	11/1/2018	10
53	535604	4.017	5.5	N I 75 BL	Crawford	Gaylord	North	200685				44	Single Course Chip Seal	6/13/2019	6
54	535604	5.5	5.58	N I 75 BL	Crawford	Gaylord	North	200685				44	Single Course Chip Seal	6/13/2019	6
55	1283009	0.283	1.96	S Burkett Rd	Missaukee	Traverse City	North		21-3123	TWA		15	Shoulder Rehabilitation	9/29/2021	14
56	1283009	0.3	2.138	S Burkett Rd	Missaukee	Traverse City	North	210772				45	Asphalt Crack Treatment	7/14/2021	3
57	1283009	1.96	1.997	S Burkett Rd	Missaukee	Traverse City	North		21-3123	TWA		15	Shoulder Rehabilitation	9/29/2021	14
58	1283009	1.997	2.018	S Burkett Rd	Missaukee	Traverse City	North		21-3123	TWA		15	Shoulder Rehabilitation	9/29/2021	14

❑ Export Type – Lane: Layer Details

	A	B	C	D	E	F	G	H	I	J	K	M	N	O
1	PR	PR	PR	Road	County	TSC	Region	MAP	Year	Lane	Lane Surface Type	Layer Name	Attribute	Value
	Number	BMP	EMP	Name				Job ID	(Constructed)	Number				
2	935207	25.359	26.023	W I 96	Livingston	Brighton	University	212727	2021	1	HMA over existing Jointed Conc	Overband CrackFill Stand Alone	Overband Crack Fill Product	WR Meadows 1190 (W.R. Meadows, Inc.)
6	935105	25.308	26.293	E I 96	Livingston	Brighton	University	212727	2021	1	HMA over existing Jointed Conc	Overband CrackFill Stand Alone	Overband Crack Fill Product	WR Meadows 1190 (W.R. Meadows, Inc.)
7	935105	26.501	26.695	E I 96	Livingston	Brighton	University	212727	2021	1	HMA over existing Jointed Conc	Overband CrackFill Stand Alone	Overband Crack Fill Product	WR Meadows 1190 (W.R. Meadows, Inc.)
8	935105	26.968	27.461	E I 96	Livingston	Brighton	University	212727	2021	1	HMA over existing Jointed Conc	Overband CrackFill Stand Alone	Overband Crack Fill Product	WR Meadows 1190 (W.R. Meadows, Inc.)
15	1551710	6.018	6.5	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Asphalt Binder	PG 58-28
16	1551710	6.018	6.5	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Asphalt Binder Certified Supplier	Husky Energy, Rhinelander, WI
17	1551710	6.018	6.5	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Mix Design No. (Case Sensitive)	21MD194
18	1551710	7.169	8.242	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Asphalt Binder	PG 58-28
19	1551710	7.169	8.242	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Asphalt Binder Certified Supplier	Husky Energy, Rhinelander, WI
20	1551710	7.169	8.242	US 2	Dickinson	Crystal Fal	Superior	208474	2021	1	HMA over existing Jointed Conc	HMA Top Course	Mix Design No. (Case Sensitive)	21MD194

CONSTRUCTION HISTORY REPORT

- ☐ Report shows all finalized data entry (jobs) on a specified PR segment
- ☐ Search by CS#, PR#, or Job #
- ☐ Report in **PDF & Excel format**

- Reports & Searches

- » Export Data
- » Search Segment(s)
- » **Construction History**
- » Material Information
- » Material Quantity
- » Network Inventory
- » Work Type
- » MAP Reconciliation



Construction History Report

Job Summary

Job Number	Work Type	Fix Life (Yrs)	Cost ^[1] / Lane Mile (\$)	Date	Lanes	Special Project Type	Pavement Study Number
108909	408 - Milling & One Course Asphalt Overlay	7		07/19/2013 ^[a]	0	N/A	N/A

^[1] - Construction Cost or A Phase CTD from MPINS / ^[a] - Open to Traffic Date / ^[b] - Let Date / ^[c] - A Phase start date / ^[d] - Sufficiency Year Imp / ^[e] -

AASHTOWare Project Open to Traffic Date / ^[f] - AP All Contract Work Completed Date

Segment Details

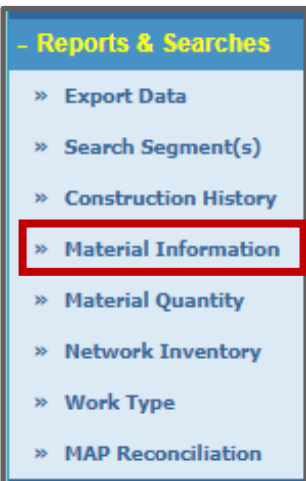
Region	TSC	County	Route	PR Number	PR BMP	PR EMP
Grand	Grand Rapids	Kent	M-57	410710	5.107	5.209

Lane [1.0], Lane Type [Mainline], Sectional Details [Surface Type:Flexible / Width: 12.00 ft / Partial Width Paving: No / Paving Width: N/A]

Year Constructed	Pavement	Attribute	Value	Aggregate	Pit / Source
2013	HMA Top Course	AWI (Actual)	264	Man Sand	41-117
		Application Rate	170 Pounds Per Square Yard	3/8 x 4	41-117
		Asphalt Binder	PG 58-28	2NS	41-117
		Asphalt Binder Certified Supplier	Michigan Paving & Materials Co., Monroe, MI	Reclaimed	41-000
		Mix Design No. (Case Sensitive)	13MD241	Gray Sand	93-031
		Mix Type - HMA Top Course	5E3		
		Shingles Used	N		
		Warm Mix	N		

MATERIAL INFORMATION REPORT

- ❑ Finds road segments that have specified **layers** or **layer attributes** for a geographic area
 - Geographic areas include Statewide, Regions, TSCs, and Counties
- ❑ Report in **PDF** or **Excel** format



Material Information Report									
Report Criteria [Region: Grand / TSC: Cadillac]									
Pavement	Attribute		Attribute Value						
HMA Top Course	Asphalt Binder		PG 70-28P						
Job Number	Route	County	PR Number	PR BMP	PR EMP	Date	RSL	Year RSL	Work Type
204067	M-66	Mecosta	526107	8.86	8.891	2020-06-19 00:00:00.0	-	-	408 - "Milling & One Course Asphalt Overlay"
204067	M-66	Mecosta	526107	8.86	8.891	2020-06-19 00:00:00.0	-	-	408 - "Milling & One Course Asphalt Overlay"
204067	M-66	Mecosta	526107	9.088	9.221	2020-06-19 00:00:00.0	-	-	408 - "Milling & One Course Asphalt Overlay"
204067	M-66	Mecosta	526107	8.966	9.088	2020-06-19 00:00:00.0	-	-	408 - "Milling & One Course Asphalt Overlay"
204067	M-66	Mecosta	526107	8.966	9.088	2020-06-19 00:00:00.0	-	-	408 - "Milling & One Course Asphalt Overlay"
204208	M-20	Mecosta	524902	3.214	3.401	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.154	3.214	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.154	3.214	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.401	3.496	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.401	3.496	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.154	3.214	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
204208	M-20	Mecosta	524902	3.154	3.214	2021-06-18 00:00:00.0	-	-	440 - "Single Course Chip Seal"
208279	M-82	Newaygo	712309	4.922	4.958	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"
208279	M-82	Newaygo	712309	4.922	4.958	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"
208279	M-82	Newaygo	712309	4.971	5.01	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"
208279	M-82	Newaygo	712309	4.849	4.922	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"
208279	M-82	Newaygo	712309	4.958	4.971	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"
208279	M-82	Newaygo	712309	4.958	4.971	2021-05-19 00:00:00.0	-	-	164 - "Asphalt Reconstruction"

MATERIAL QUANTITY REPORT

- ❑ **Compares** quantities of **HMA** and **PCC** placed during a specified time period in a geographic location
- ❑ Report in **PDF** or **Excel format**

- Reports & Searches	
»	Export Data
»	Search Segment(s)
»	Construction History
»	Material Information
»	Material Quantity
»	Network Inventory
»	Work Type
»	MAP Reconciliation

Material Quantity Report							
Report Criteria							
Region	TSC	From Year		To Year			
Metro	All TSCs	2017		2020			
Report Data							
Region	TSC	Lane Miles (miles)		Volume (cu. yds) / Tonnage (tons)		Area (sq. yds)	
		PCC	HMA	PCC	HMA	PCC	HMA
Metro	Detroit	27.33	74.92	190,820.39	530,680.44	65,329.29	49,037.00
Metro	Oakland	0.00	11.51	0.00	79,633.78	0.00	8,334.13
Metro	Taylor	0.03	0.95	315.96	6,607.18	105.32	545.09
Metro	Macomb	0.00	127.02	0.00	885,264.65	0.00	121,652.40
Metro Region Totals		27.36	214.40	191,136.34	1,502,186.06	65,434.61	179,568.62

RESOURCES

RESOURCES

ProjectWise (P Wise):

- <https://mdotjboss.state.mi.us/SpecProv/projectwisesupport.htm>
- Plans/proposal/addendum
- Pay Items/Tickets/Field Notes/Mix Designs

Construction Inquiry System:

- <https://mdotjboss.state.mi.us/CCI/home.htm>
- Summary of project items (pay items completed)

PR finder:

- <https://mdotgis.state.mi.us/portal/apps/webappviewer/index.html?id=c3aa2462a1e24e37a33184a33e5976aa>
- Find PR via CS, intersection, road name, interactive map

JobNet

- <https://miloginworker.michigan.gov/uisecure/selfservice>
- Find programmed MDOT jobs

PHD WEBSITE

Public:

- <https://www.michigan.gov/mdot/business/construction/pavement-operations/pavement-historical-database>

MDOT Internal:

- https://stateofmichigan.sharepoint.com/sites/mdot/Organizational/field_services/construction/phd/SitePages/Home.aspx


- Links to Resources
- Helpful Documents:
 - PHD User Guide
 - FAQ, Business Rules
 - Quick Reference Guide
 - PHD Attribute Locations
- Training Presentations
- Training/instructional videos

Training Videos

These training videos are designed to help those entering or utilizing PHD data. Each video is a separate topic that includes instructions and examples.

These videos are intended to support, but not replace annual training that typically occurs in November and January. View videos on the YouTube playlist or select from the list below.

[PHD Training Videos YouTube Playlist](#) >



1) PHD Access, Interface Appearance, and Creating a New Job

Watch on YouTube

Title	Description	Duration
1 - PHD Access, Interface Appearance, and Creating a New Job	How to request access, the different levels of accesses, platform interface, and creating jobs in PHD.	8 mins
2 - Standard Job Data Entry (Rehabilitation Job – Part 1): Segmentation and Data Entry Preparation	Project segmentation including creating new segments, editing existing segments, and deleting unnecessary segments. PHD job entry preparation and gathering and compiling project data.	9 mins
3 - Standard Job Data Entry (Rehabilitation Job – Part 2): Lanes, Layers, and Attributes	Lane inputs and the lane numbering guidelines. Layers and their attributes. Quick Layer and Copy Lane options to apply existing layers and their attributes to other lanes and/or shoulders to reduce the data entry time and effort.	13 mins

ADMINISTRATOR CONTACT



Fawaz Kaseer

- Phone: 517-599-1498
- E-mail: kaseerf@michigan.gov



Justin Schenkel

- Phone: 517-242-2788
- E-mail: schenkelj@michigan.gov

REGION PHD LIAISONS

**Region PHD Liaisons
can help too!**



Bay: Tyler Lemieux



Grand: Bill Loehle



Metro: Marji Zabel



North: Margaret Szajner



Southwest: Kyle Rudlaff



Superior: Alison Hamlin



University: Robert Green

PHD TRAINING EVALUATION

- ❑ Your feedback is greatly appreciated and will be used to assist us in evaluating and improving future training courses

<https://www.research.net/r/LB2WPL9>



FEEDBACK

QUESTIONS

Thank You!



QUESTIONS

APPENDIX DATA ENTRY PROCESS

CREATE NEW JOB SCREEN

(1) *Navigate to:*

Post Constr. Data ➔ *Create*

Fawaz Kaseer Pavement Historical Database Assignment : Statewide

Post Construction Data | Create New Role[s] :: Data Owner , System Administrator

* = Required Fields

Enter Job Information

* Is JobNet Job : ☒ Yes ☐ No

* JobNet Job ID :

Measurement System

☒ English ☐ Metric

Next Step Cancel

☐ For **JobNet jobs:**

- Job ID is the MDOT Job Number without the 'A', etc.

☐ For **Non JobNet jobs:**

- Job ID naming conventions can be found in the [PHD User Guide](#)
- Job Types: Maintenance, TWA, Warranty, Direct Forces Work, Historic, & Permit

(2) *Select:*

'Yes' for JobNet Job
'No' for Non JobNet Job

JOB DETAILS SCREEN

❑ JobNet job:

- *Auto Generated:* Work Type Code & Fix Life
- *User Entered:* Special Project Type, **Open to Traffic Date***

Job Details	
JobNet Job ID	: 201403
Work Type Code	: 164 - Asphalt Reconstruction
Fix Life	: 18 Year(s)
Special Project Type [Choose upto two types]	<input type="checkbox"/> CPM Emerging Technology Funded <input type="checkbox"/> Demonstration Project <input type="checkbox"/> National Pavement Studies <input type="checkbox"/> State Pavement Studies
* Open to Traffic Date [This is the date when all lanes are open to the public traffic. For multi-year projects, please estimate it for now and use a placeholder to come back and change it later.]	
:	<input type="text"/> <input type="button" value="Calendar"/> [mm/dd/yyyy]

❑ Non JobNet job:

- *User select:* **Work Type Code***, Special Project Type, **Job Type***, **Open to Traffic Date***, & Fix Life

Job Details	
Non JobNet Job ID	: M458785
* Non JobNet Job Type	: <input type="text" value="Select Non JobNet Job Type"/>
* Work Type Code	: <input type="text" value="None"/>
* Fix Life	: <input type="text" value="0"/> Year(s) Fix Life Guide
Special Project Type [Choose upto two types]	<input type="checkbox"/> CPM Emerging Technology Funded <input type="checkbox"/> Demonstration Project <input type="checkbox"/> National Pavement Studies <input type="checkbox"/> State Pavement Studies
* Open to Traffic Date [This is the date when all lanes are open to the public traffic. For multi-year projects, please estimate it for now and use a placeholder to come back and change it later.]	
:	<input type="text"/> <input type="button" value="Calendar"/> [mm/dd/yyyy]

SIMPLIFIED CPM (FOR MAP OR Non MAP JOBS)

- ❑ Job must be a **CPM (Capital Preventive Maintenance)** project with Work Type Code **WTC 400 - 499**
- ❑ Reduces the amount of data entry:
 - No entry of individual lanes
 - Only enter segment layer information
 - Does not require segment changes based on lane or shoulder changes
- ❑ **Note:** this can only be selected once and will remain in the selected format

The screenshot shows a 'Job Details' form with the following fields and values:

- JobNet Job ID: 217463
- Work Type Code: 456 - Asphalt Crack Treatment (highlighted with a green box and an arrow pointing to the text 'WTC 400-499' on the right)
- Fix Life: 3 Year(s)
- * Use SIMPLIFIED CPM format for data entry? [only use when all lanes and work is the same]: ☒ Yes ☐ No (highlighted with a green box and an arrow pointing to the text 'Simplified CPM Check Box' on the right)
- Special Project Type [Choose upto two types]:
 - ☐ CPM Emerging Technology Funded
 - ☐ Demonstration Project
 - ☐ National Pavement Studies
 - ☐ State Pavement Studies
- * Open to Traffic Date [This is the date when all lanes are open to the public traffic. For multi-year projects, please estimate it for now and use a placeholder to come back and change it later.]: [mm/dd/yyyy] (with a date picker icon)

Simplified CPM Check Box

Appears only if WTC is 400-499

SIMPLIFIED CPM (Cont.)

❑ **Cannot** use Simplified CPM format if the following applies to the job:

- Does not have **WTC 400 to 499**
- Lanes have different paved or placed work
- Has **HMA paving**, which includes these layers:
 - HMA Base Course
 - HMA Leveling Course
 - HMA Top Course
 - HMA Wedge Course
 - HMA Ultra-Thin Overlay
 - Crack Relief Interlayer/DRM
 - Paver Placed Surface Seal

ROAD SEGMENT LIST SCREEN

- ❑ This screen appears after creating a job
- ❑ If it is a **JobNet job**, then segments will be automatically populated
 - Likely still requires editing and adding segments
- ❑ If it is a **Non JobNet job**, then the segments need to be created

The screenshot shows the 'Road Segment List Screen' for a job titled '201403 / 164 - Asphalt Reconstruction'. The interface includes a 'Job Details' header, a 'PR Segment List' table, and several action buttons. Red arrows point to various elements with labels:

- Edit Job Details**: Points to the 'Edit Job Details' button at the top.
- Copy Segment Details**: Points to the 'Copy Segment Details' button.
- Create or Delete Segments**: Points to the 'Create Segment' and 'Delete Segment(s)' buttons.
- View Map**: Points to the 'View Map' button.
- Create Sub Segments**: Points to the 'Create PR Sub Segments' section, which includes a 'No. of Sub Segments' input field and a 'Create Sub Segments' button.
- Project Summary**: Points to the 'Project Summary' button at the bottom.
- Project Comment Box**: Points to the 'Project Comments' text area.
- Change Milepoints**: Points to the 'Change PR Segment Mile Points' section, which includes a table with columns for '#', 'PR Number', 'BMP', and 'EMP'.
- Layers Library**: Points to the 'Layers Library Overview' section.
- Edit Segment Details**: Points to the 'Segment Details' button.

#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	3090836	23	0	0.068	M-25	NB	Active	Draft
2	3090836	23	0.068	0.236	M-25	NB	Active	Draft
3	3090836	23	0.236	0.29	M-25	NB	Active	Draft

EDIT JOB DETAILS

- ❑ Returns to the Job Details screen
 - For corrections/changes or review
 - **Note:** *Simplified CPM* cannot be changed once job is created. Contact an Administrator if this needs to be changed.

Job Details

JobNet Job ID : 201403

Work Type Code : 164 - Asphalt Reconstruction

Fix Life : 18 Year(s)

☐ CPM Emerging Technology Funded

☐ Demonstration Project

☐ National Pavement Studies

☐ State Pavement Studies

Special Project Type : [Choose upto two types]

* Open to Traffic Date
[This is the date when all lanes are open to the public traffic. For multi-year projects, please estimate it for now and use a placeholder to come back and change it later.]

01/31/2023

[mm/dd/yyyy]

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	3090836	23	0	0.068	M-25	NB	Active	Draft
<input type="radio"/>	2	3090836	23	0.068	0.236	M-25	NB	Active	Draft
<input type="radio"/>	3	3090836	23	0.236	0.29	M-25	NB	Active	Draft

Segment Details

Copy Segment Details

Create Segment

Delete Segment(s)

View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	3090836	<input type="text" value="0"/>	<input type="text" value="0.068"/>

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [At least 2]

Create Sub Segments

Project Comments
[max 250 characters]

Back

Finalize Job

Save Job as Draft

Cancel

Project Summary

CHANGE PR SEGMENT MILEPOINTS

➤ Select the segment radio button (1)

➤ Change the BMP and/or EMP (2)

➤ Click 'Apply Milepoint Changes' (3)

❖ An *error* will occur if a milepoint is added that exceeds the PR length

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	3090836	23	0	0.068	M-25	NB	Active	Draft
<input type="radio"/>	2	3090836	23	0.068	0.236	M-25	NB	Active	Draft
<input type="radio"/>	3	3090836	23	0.236	0.29	M-25	NB	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment(s) View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	3090836	<input type="text" value="0"/>	<input type="text" value="0.068"/>

Create PR Sub Segments

No. of Sub Segments : [At least 2]

Create Sub Segments

Apply Milepoint Changes

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

CREATE PR SUBSEGMENTS

- Select the segment radio button (1)
- Enter the number of sub segments (2)
- Click 'Create Sub Segments' (3)
- Enter BMP & EMP for each new sub segment (4)
- Click 'Create Sub Segments' (5)
 - ❖ An error will occur if milepoints overlap or exceed the PR length

Create Sub Segments screen

Road Segment [Job # - 201403 / PR # - 3090836 / MP : 0 ... 0.587] [Show] ▲

PR Sub Segment Summary				
#	PR Number	BMP	EMP	
<input type="checkbox"/> 1	3090836	0	0.125	
<input type="checkbox"/> 2	3090836	0.125	0.369	
<input type="checkbox"/> 3	3090836	0.369	0.587	

Delete

Back Create Sub Segments (5)

Create Sub Segments

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼									
(1)	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	3090836	23	0	0.587	M-25	NB	Active	Draft
<input type="radio"/>	2	3090836	23	0.587	0.852	M-25	NB	Active	Draft
<input type="radio"/>	3	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment(s) View Map

Layers Library Overview

Change PR Segment Mile Points			
#	PR Number	BMP	EMP
1	3090836	0	0.587

Apply Milepoint Changes

Create PR Sub Segments	
No. of Sub Segments	<input type="text"/> [At least 2]
Create Sub Segments (3)	(2)

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

CREATE SEGMENT

- Click 'Create Segment' (1)
- Enter PR Number, BMP, & EMP (2)
- Click 'Create' or 'Create and Add One More' (3)
 - ❖ An error will occur if milepoints exceed the PR length or PR is located outside of user Location Assignment

Create PR Segment screen

* = Required Fields

(2)

Create PR Segment [Job # - 201403 1]

Latest PR Version	PR Number*	BMP*	EMP*
23	961905	4.123	4.499

(3)

Create Create and Add One More Back

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status	
<input checked="" type="radio"/>	1	3090836	23	0	0.125	M-25	NB	Active	Draft
<input type="radio"/>	2	3090836	23	0.125	0.369	M-25	NB	Active	Draft
<input type="radio"/>	3	3090836	23	0.369	0.587	M-25	NB	Active	Draft
<input type="radio"/>	4	3090836	23	0.587	0.852	M-25	NB	Active	Draft
<input type="radio"/>	5	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment(s) View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	3090836	0	0.125

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

CREATE SEGMENT

- ❑ If the project has a new ramp, roundabout, or alignment changes
- ❑ The user might not be able to enter/create the segment (with a new PR number or changed MPs)
- ❑ To enter such segment(s):
 - Select 'Future'
 - Enter PR Number, BMP, & EMP
 - Click 'Create'

*** = Required Fields**

Create PR Segment [Job # - 201403]

Latest PR Version	PR Number *	BMP *	EMP *
Future			
23			
Future			

Create Create and Add One More Back

DELETE SEGMENT

- Click 'Delete Segment(s)' (1)
- Check the segment(s) to delete (2)
- Click 'Confirm' (or Back to cancel) (3)

Delete PR Segment screen

Select segment(s) to delete.

PR Segment Details [Job # - 201403]

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input type="checkbox"/>	1	961905	23	4.123	4.465	M-19	2 Way	Active	Draft
<input checked="" type="checkbox"/>	2	961905	23	4.465	4.499	M-19	2 Way	Active	Draft
<input type="checkbox"/>	3	3090836	23	0	0.125	M-25	NB	Active	Draft
<input type="checkbox"/>	4	3090836	23	0.125	0.369	M-25	NB	Active	Draft
<input type="checkbox"/>	5	3090836	23	0.369	0.587	M-25	NB	Active	Draft
<input type="checkbox"/>	6	3090836	23	0.587	0.852	M-25	NB	Active	Draft
<input type="checkbox"/>	7	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Back Confirm

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	961905	23	4.123	4.465	M-19	2 Way	Active	Draft
<input type="radio"/>	2	961905	23	4.465	4.499	M-19	2 Way	Active	Draft
<input type="radio"/>	3	3090836	23	0	0.125	M-25	NB	Active	Draft
<input type="radio"/>	4	3090836	23	0.125	0.369	M-25	NB	Active	Draft
<input type="radio"/>	5	3090836	23	0.369	0.587	M-25	NB	Active	Draft
<input type="radio"/>	6	3090836	23	0.587	0.852	M-25	NB	Active	Draft
<input type="radio"/>	7	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment(s) View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	961905	4.123	4.465

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

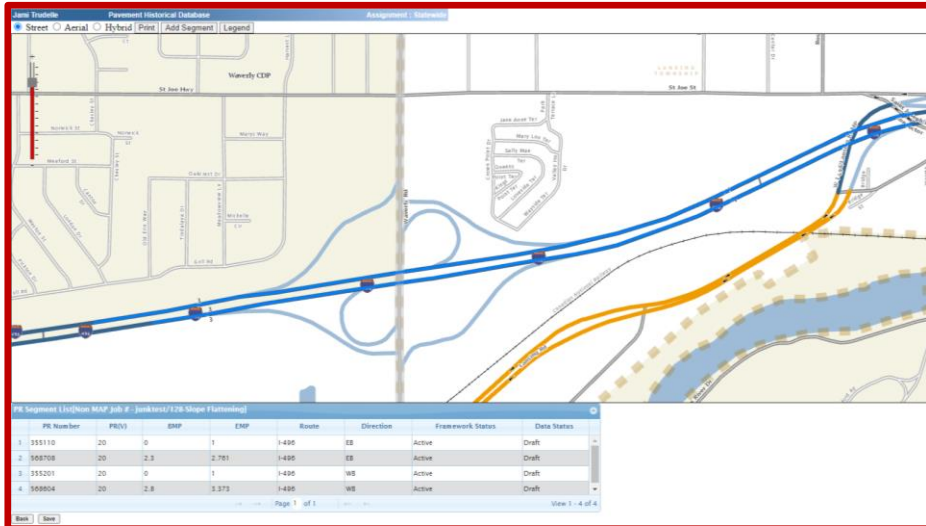
VIEW MAP

❑ This function shows all Road Segment List segments in a map

➤ Click 'View Map'

- The Map screen will appear
- Can add new segments, delete segments, change segment milepoints, view/print segments in map

Map screen



Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	961905	23	4.123	4.465	M-19	2 Way	Active	Draft
2	3090836	23	0	0.125	M-25	NB	Active	Draft
3	3090836	23	0.125	0.369	M-25	NB	Active	Draft
4	3090836	23	0.369	0.587	M-25	NB	Active	Draft
5	3090836	23	0.587	0.852	M-25	NB	Active	Draft
6	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	961905	4.123	4.465

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

VIEW MAP: MAP SCREEN

(1) Map View Type

(2) Map Tools

(3) Map

(4) PR Segment List

(5) Back & Save

(1) (2)

(3)

(4)

(5)

The screenshot displays the MDOT View Map interface. At the top, there is a navigation bar with the title 'Assignment : Statewide'. Below this, a toolbar contains radio buttons for 'Street', 'Aerial', and 'Hybrid' map views, along with buttons for 'Print', 'Add Segment', and 'Legend'. The main map area shows a road network with a highlighted segment in blue. Labels on the map include 'Cowhy Drain', 'South Branch', 'Reeves Rd', 'Exit 184', and '19'. A vertical scale bar is visible on the left side of the map. Below the map, there is a 'PR Segment List' table with columns for PR Number, PR(V), BMP, EMP, Route, Direction, Framework Status, and Data Status. The table contains four rows of data. At the bottom of the screen, there are 'Back' and 'Save' buttons.

	PR Number	PR(V)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	962706	16	10.505	10.789	I-69	E	Active	Draft
2	962706	16	10.789	11.123	I-69	E	Active	Draft
3	962706	16	11.123	11.554	I-69	E	Active	Draft
4	961905	16	4.465	4.499	M-19	N/S	Active	Draft

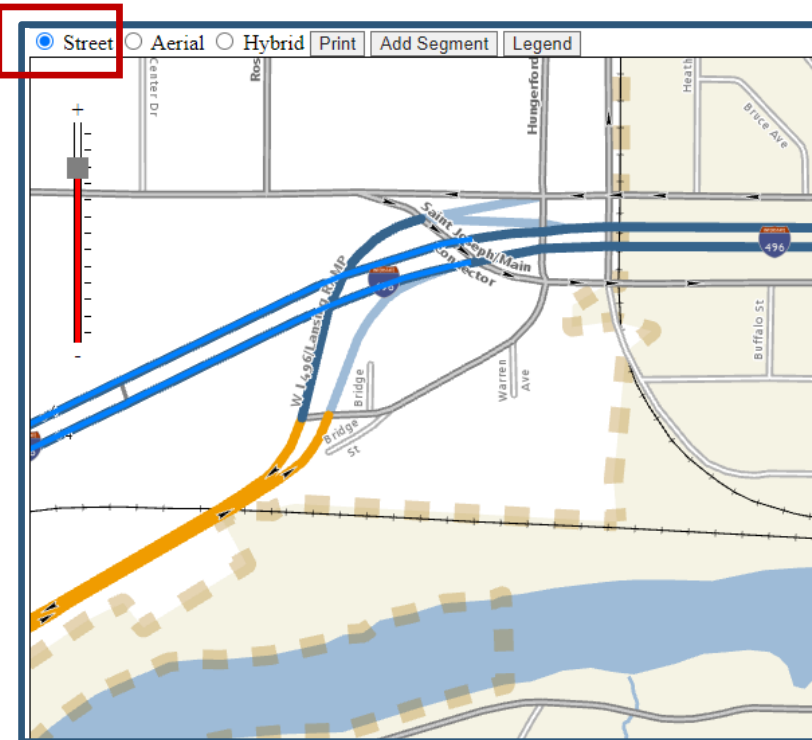
Page 1 of 1 View 1 - 5 of 5

VIEW MAP: MAP SCREEN

❑ Map View Types

- Select the view type radio button to change the map background image

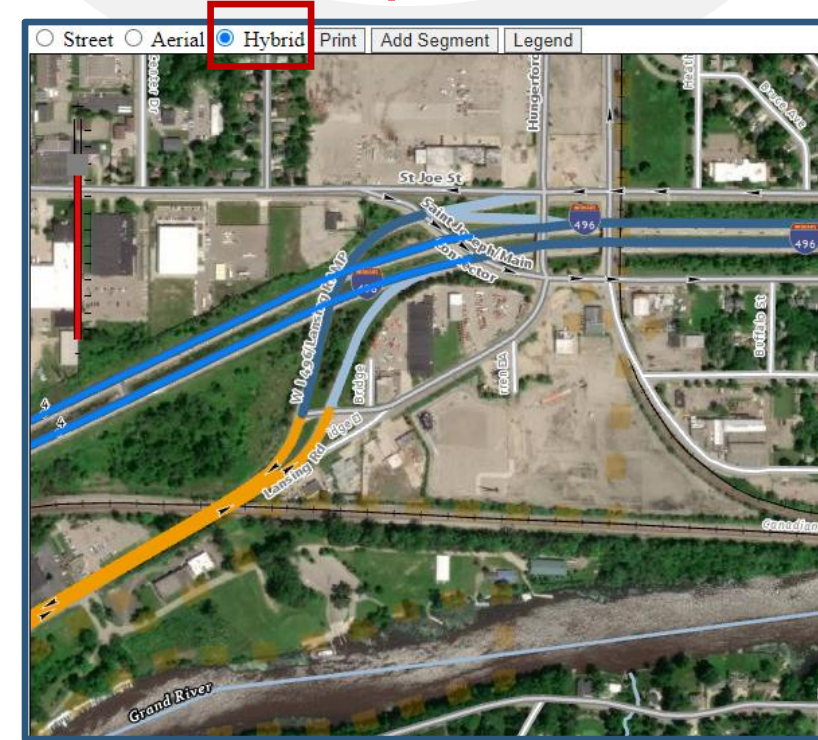
Street



Aerial



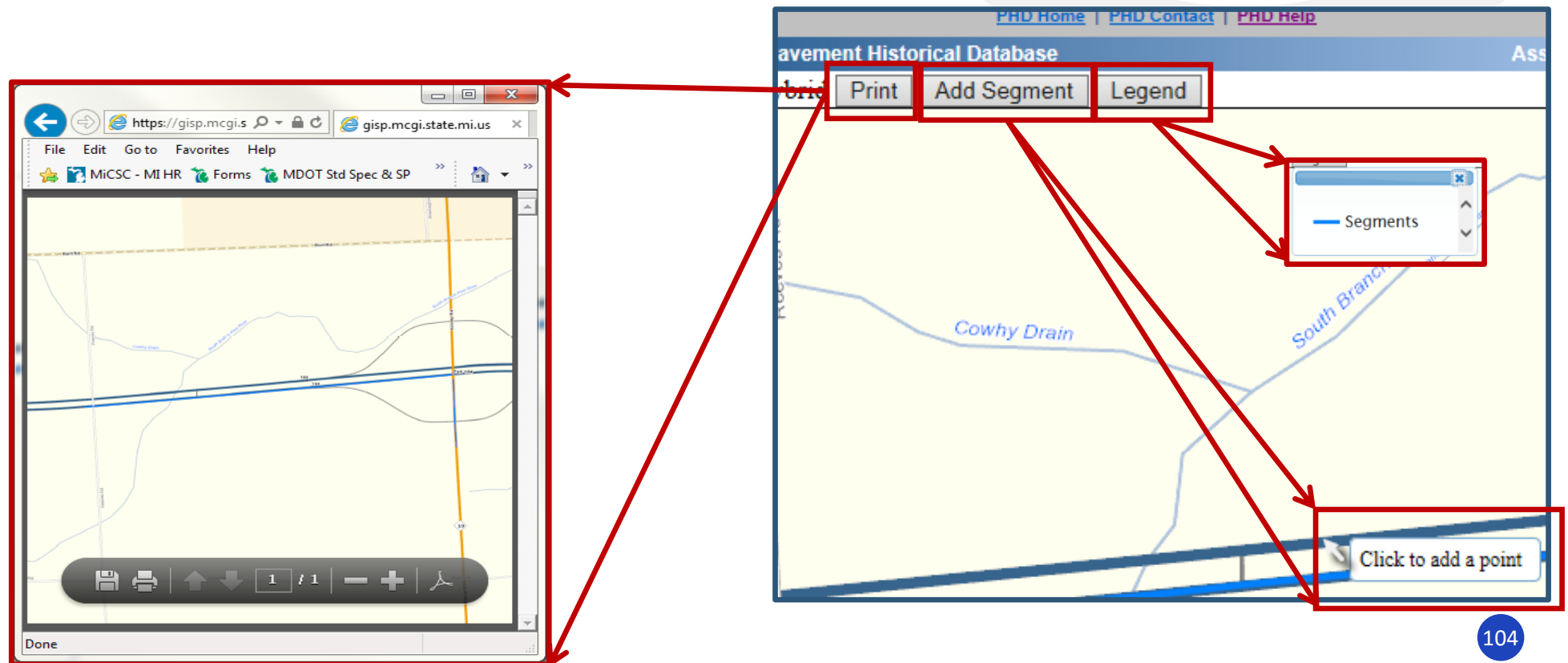
Hybrid



VIEW MAP: MAP SCREEN

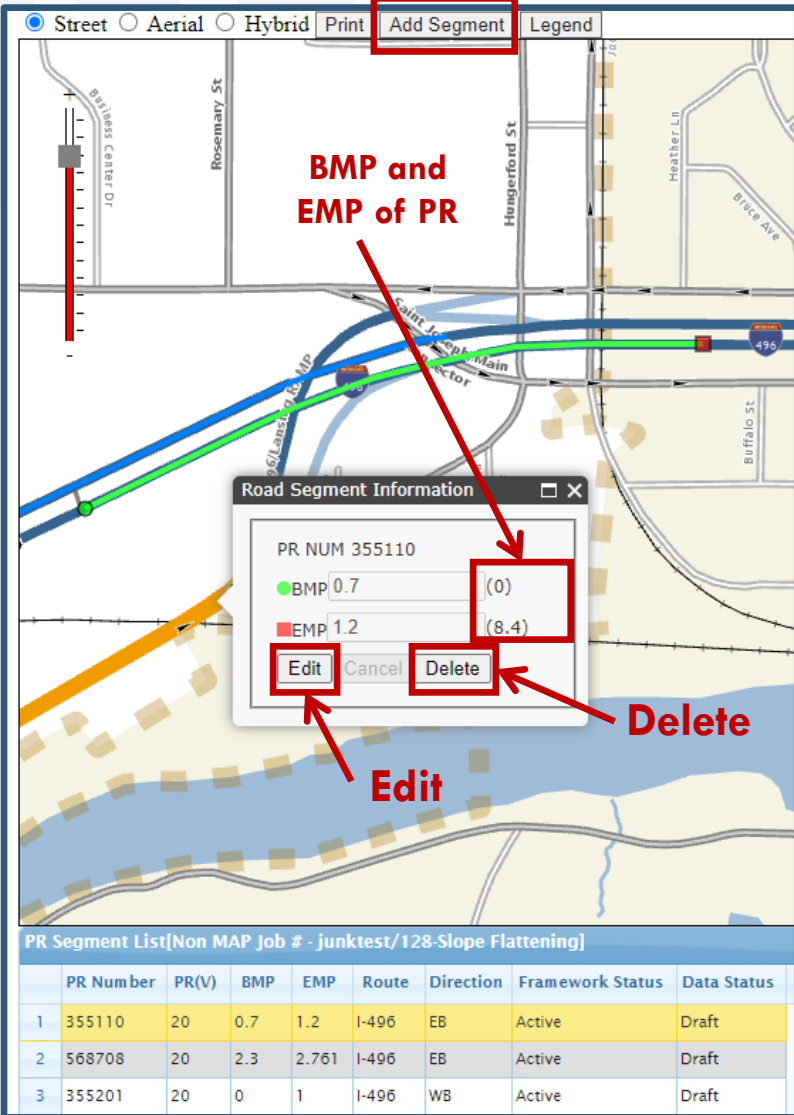
❑ Map Tools

- Click **Print** to show map image with the segments in a new PDF pop-up window
 - May take 20-30 seconds to load the first print. Following prints should be faster.
- Click **Add Segment** to add new segments to the PHD job
 - Select the location within the map to add segment. Repeat to add new segments.
- Click **Legend** to view the meanings of the different colors within the map



VIEW MAP: ADD SEGMENT

- ❑ Move the map view with click and drag
- ❑ Zoom the view with mouse wheel or click the + or – on the scale
- ❑ Add segments in map:
 - Click **'Add Segment'**,
 - Click on the segment in the map,
 - The **entire PR length** will turn blue and will **be added**
- ❑ View & edit milepoints:
 - Select a segment using the map or table,
 - The segment turns green and the Road Segment Information box appears,
 - Click **'Edit'** and change the BMP and/or EMP,
 - Click **'Save'** in the box to confirm or click **'Cancel'** in the box to undo
- ❑ Delete segments:
 - Select a segment in the map or table,
 - The Road Segment Information box will appear,
 - Click **'Delete'** in the box or click **'Cancel'** in the box to undo



Add Segment

BMP and EMP of PR

Edit

Delete

Road Segment Information

PR NUM 355110

BMP 0.7 (0)

EMP 1.2 (8.4)

Edit Cancel Delete

PR Segment List[Non MAP Job # - junktest/128-Slope Flattening]

	PR Number	PR(V)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	355110	20	0.7	1.2	I-496	EB	Active	Draft
2	568708	20	2.3	2.761	I-496	EB	Active	Draft
3	355201	20	0	1	I-496	WB	Active	Draft

VIEW MAP: SEGMENT LIST

❑ PR Segment List Table

- Shows the segments in the Road Segment List screen
 - ❖ **Exception:** If changes are made, this table will not match if clicking *Back* before clicking *Save*
- Click a column header to sort the table, (a triangle will identify the active sort)
- Click a segment row in the table to zoom to it and show the Road Segment Info box
- Hide the table by clicking the triangle in the upper right corner

Road Segment Information

PR NUM 355110

BMP 0.7 (0)

EMP 1.2 (8.4)

Edit Cancel Delete

PR Segment List[Non MAP Job # - junktest/128-Slope Flattening]

	PR Number	PR(V)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	355110	20	0.7	1.2	I-496	EB	Active	Draft
2	355201	20	0	1	I-496	WB	Active	Draft
3	568604	20	2.8	3.373	I-496	WB	Active	Draft
4	568708	20	2.3	2.761	I-496	EB	Active	Draft

VIEW MAP: MAP SCREEN

❑ Save & Back

- Click '**Save**' to save all added segments, deleted segments, and/or milepoint changes made in the map
 - **Note:** If there are any overlapping segments, a warning message will appear and **not allow the save**. Segments that **overlap must be manually changed**.
- Click '**Back**' to return to the Road Segment List screen
 - **Important:** Click **Save** before clicking **Back** to save changes
 - **Note:** To undo all changes, click Back and do not click Save

PR Segment List							
	PR Number	PR(V)	BMP	EMP	Route	Direction	
2	961905	16	4.499	4.719	M-19	N/S	Ac
3	962706	16	10.505	10.789	I-69	E	Ac
4	962706	16	10.789	11.123	I-69	E	Ac
5	962706	16	11.123	11.554	I-69	E	Ac

Page 1 of 1

Back Save

Post Construction Data | Road Segment List

Job Details [80912 / 163 - Concrete Reconstruction]

Edit Job Details

PR Segment List

#	PR Number	PR (V)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input type="radio"/> 1	962706	16	10.505	10.789	I-69	E	Active	Draft
<input type="radio"/> 2	962706	16	10.789	11.123	I-69	E	Active	Draft
<input type="radio"/> 3	962706	16	11.123	11.554	I-69	E	Active	Draft
<input type="radio"/> 4	961905	16	4.465	4.499	M-19	N/S	Active	Draft
<input checked="" type="radio"/> 5	961905	16	4.499	4.719	M-19	N/S	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment View Map

Quick Layer Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
5	961905	4.499	4.719

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

VIEW MAP: MAP SCREEN

❑ Additional Notes:

- Segments with **older framework will have warning message and may not be visible in map**
 - Older framework segments can exist if multi-year projects started in the previous year, or PHD jobs that were started early in the year, before new framework was available – *(old framework segments can still be used & saved).*
 - The map uses the most current framework version
- **If older framework segments are in the PHD job, warnings appear:**
 - At the top of the Road Segment List screen
 - In map screen if selected from the PR Segment List table and it cannot be viewed

Post Construction Data | Road Segment List Role[s] :: Data Owner

Job Details [80920 / 160 - Recnst Exist, No Widen] [Show] ▲

WARNING: This PHD job includes segment(s) with older framework that may not be visible and/or edited in the map screen.

Edit Job Details

PR Segment List [Hide] ▼

#	PR Number	PR (v)	BMP	EMP	Route	Direction	Framework Status	Data Status
---	-----------	--------	-----	-----	-------	-----------	------------------	-------------

Message from webpage

WARNING: This segment cannot be viewed in the map because it has an older PR version that is incompatible with the current version geometry data. To view this segment, return to the Road Segment List screen and re-add this segment; (make sure to also copy or re-add any details or attribute information before deletion of the original segment)

OK

EDIT SEGMENT DETAILS

- Select the segment radio button (1)
- Click 'Segment Details' (2)
 - The Segment Overview screen will appear

Job Details [201403 / 164 - Asphalt Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status	
(1)	<input checked="" type="radio"/>	1	961905	23	4.123	4.465	M-19	2-Way	Active	Draft
	<input type="radio"/>	2	3090836	23	0	0.125	M-25	NB	Active	Draft
	<input type="radio"/>	3	3090836	23	0.125	0.369	M-25	NB	Active	Draft
	<input type="radio"/>	4	3090836	23	0.369	0.587	M-25	NB	Active	Draft
	<input type="radio"/>	5	3090836	23	0.587	0.852	M-25	NB	Active	Draft
	<input type="radio"/>	6	3090836	23	0.852	1.292	M-25	NB	Active	Draft

(2)

Segment Details Copy Segment Details Create Segment Delete Segment(s) View Map

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	961905	4.123	4.465

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

Apply Milepoint Changes

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

Post Construction Data | Segment Overview Role[s] :: Data Owner , Data Entry , System Administrator

Segment Details [Job # - 200711 / PR # - 3130113 / MP : 0 ... 0.162] [Show] ▲

Segment Shoulder Overview

	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft

Segment Lane(s) Overview

Lane #	Work Done	Status
4.0	Yes	Draft
3.0	Yes	Draft
2.0	Yes	Draft
1.0	Yes	Draft

Lane Details

Segment Curb & Gutter Overview

	Left	Right
Work Done	No	No
Status		

Shoulder, Curb & Gutter Details

Median Overview

* Median Type : Undivided ▼

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

EDIT SEGMENT DETAILS: SEGMENT OVERVIEW SCREEN

- Entry of work on lanes, shoulder, and/or curb and gutter
- Data entered here is only for the current selected segment (not entire project)

The screenshot shows the 'Segment Overview' screen for Job # - 200711 / PR # - 3130113 / MP : 0 ... 0.162. The screen is divided into several sections:

- Segment Details [Job # - 200711 / PR # - 3130113 / MP : 0 ... 0.162]** [Show] ▲
- Segment Shoulder Overview**

	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft
- Segment Lane(s) Overview**

Lane #	Work Done	Status
4.0	Yes	Draft
3.0	Yes	Draft
2.0	Yes	Draft
1.0	Yes	Draft
- Segment Curb & Gutter Overview**

	Left	Right
Work Done	No	No
Status		
- Median Overview**

* Median Type : Undivided
- Segment Comments** [max 250 characters]

Annotations with red arrows point to the following elements:

- Edit Shoulder, Curb & Gutter Details** points to the 'Shoulder, Curb & Gutter Details' button.
- Median Overview Box** points to the 'Median Overview' section.
- Segment Comment Box** points to the 'Segment Comments' text area.
- Edit Lane Details** points to the 'Lane Details' button.
- Segment Summary** points to the 'Segment Summary' button.

Buttons at the bottom: Back, Save Segment, Save Segment As Draft, Cancel, Segment Summary.

SEGMENT OVERVIEW SCREEN

Pre-population of Segment Details Example: **JN I I 9085, I-475 Reconstruct**

❑ Segment Info for PR I 497903, MP 11.310 – 11.342

■ Pre-populated:

- **Lanes** = 4 lanes (1.0, 2.0, 3.0, 4.0)
- **Shoulders** = Left & Right Side
- **Median Type** = Concrete Barrier
- **Median Width** = 26'

■ Never Pre-populated:

- **Curb & Gutter**
 - Must Add and Modify manually

The screenshot displays the 'Segment Overview' screen for 'Post Construction Data'. The title bar shows 'Role[s] :: Data Owner'. The main content area is divided into several sections:

- Segment Details [PR # - 1497903 / MP : 11.31 ... 11.342]** [Show] ▲
- Segment Shoulder Overview**

	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft
- Segment Lane(s) Overview**

Lane #	Work Done	Status
4.0	Yes	Draft
3.0	Yes	Draft
2.0	Yes	Draft
1.0	Yes	Draft
- Segment Curb & Gutter Overview**

	Left	Right
Work Done	No	No
Status		
- Median Overview**
 - * Median Type : Concrete Barrier
 - * Median Width : 26 ft
- Segment Comments** [max 250 characters]

At the bottom, there are buttons for 'Back', 'Save Segment', 'Save Segment As Draft', and 'Cancel'. A 'Segment Summary' button is also present at the bottom right.

SEGMENT OVERVIEW SCREEN: SIMPLIFIED CPM

Simplified CPM

Post Construction Data | Segment Overview Role[s] :: Data Owner, System Administrator

Segment Details [PR # - 768604 / MP : 0 ... 1.293] [Show] ▲

Segment Shoulder Overview		
	Left	Right
Work Done	No	No
Status		

Segment Curb & Gutter Overview		
	Left	Right
Work Done	No	No
Status		

Segment Sections		
#	Layer Name	Data Entry Status

Move Up Move Down Remove

Select New Layer

Layer : Select a Layer

Add Layer

Shoulder, Curb & Gutter Details

* Year [Paved/Placed] : [] [yyyy]

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

Add/Edit
Segment Layers
(No Lane Details)

Edit Shoulder,
Curb & Gutter Details

Year the work was
Paved/Placed

Median Overview

Segment Comment

Segment Summary

- Simplified CPM
- Full Job
- Both

Standard Full Job Entry

Post Construction Data | Segment Overview Role[s] :: Data Owner, Data Entry, System Administrator

Segment Details [Job # - 200711 / PR # - 3130113 / MP : 0 ... 0.162] [Show] ▲

Segment Shoulder Overview		
	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft

Segment Lane(s) Overview		
Lane #	Work Done	Status
4.0	Yes	Draft
3.0	Yes	Draft
2.0	Yes	Draft
1.0	Yes	Draft

Segment Curb & Gutter Overview		
	Left	Right
Work Done	No	No
Status		

Lane Details

Shoulder, Curb & Gutter Details

Median Overview

* Median Type : Undivided

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

Edit Lane Details

SEGMENT OVERVIEW SCREEN: MEDIAN OVERVIEW

- Select *Median Type* from the drop-down list
- Enter *Median Width* (ft) in the box
 - If 'Other' is selected, enter a type that is not in the Median Type List
 - If 'Undivided' is selected, no Median Width

The diagram illustrates the data entry process for the Median Overview form. It shows a central form with a dropdown menu for Median Type and a text input for Median Width. Red boxes highlight different states: 1. A box for 'Undivided' with no width. 2. A box for 'Graded with ditch' with a width of 30 ft. 3. A box for 'Other' with a sub-type 'Mountainous' and no width. Arrows show the flow from the central form to these specific states. To the right, a larger screenshot of the Segment Overview screen shows the Median Overview form as part of a larger interface, including shoulder and lane overviews, and a segment comments section.

Median Overview

* Median Type :

* Median Width :

Median Overview

* Median Type :

* Median Width : ft

Median Overview

* Median Type :

* Other :

* Median Width :

Segment Overview

Segment Shoulder Overview		
	Left	Right
Work Done	No	No
Status		

Segment Lane(s) Overview		
Lane #	Work Done	Status
No Lanes Defined		

Segment Curb & Gutter Overview

	Left	Right
Work Done	No	No
Status		

Segment Comments
[max 250 characters]

Buttons: Back, Save Segment, Save Segment As Draft, Cancel

Segment Summary

SEGMENT OVERVIEW SCREEN: LANE DETAILS

- Click 'Lane Details'
 - The Lane Summary screen will appear

Post Construction Data | Segment Overview Role[s] :: Data Owner, Data Entry, System Administrator

Segment Details [Job # - 200711 / PR # - 3130113 / MP : 0 ... 0.162] [Show] ▲

Segment Shoulder Overview		
	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft

Segment Lane(s) Overview		
Lane #	Work Done	Status
4.0	Yes	Draft
3.0	Yes	Draft
2.0	Yes	Draft
1.0	Yes	Draft

Lane Details

Segment Curb & Gutter Overview		
	Left	Right
Work Done	No	No
Status		

Shoulder, Curb & Gutter Details

Median Overview	
* Median Type	: Select a Median
* Median Width	: 0.0 ft

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

Segment Details [Job # - 201403 / PR # - 961905 / MP : 4.123 ... 4.465] [Show] ▲

Segment Lanes

Select Lane : Lane #2.0 Work Done : ☒ Yes ☐ No

Add Left Lane Add Right Lane Copy Lane Remove Lane

NOTE: Lanes are always numbered right to left facing toward increasing milepoints of the PR segment:
- Lane 1 is the right-most travel lane of the PR segment.
- Increasing lane numbers 2, 3, and greater are lanes left of Lane 1.
- Decreasing lane numbers 0, -1, and less are lanes right of Lane 1.

Selected Lane 2.0

Lane Details [Lane #2.0]

* Surface Type (pavement cross-section) : HMA over existing Jointed Conc

* Width : 12 ft

* Lane Type : Select Lane Type

* Year [Paved/Placed] : 2023 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

Lane Section [Lane # 2.0]

#	Layer Name	Data Entry Status	
---	------------	-------------------	--

Move Up Move Down Remove

Select New Layer

Layer : Select a Layer

Add Layer

Select a Layer from the Layers Library

Layer : Select a Layer

Add Layer

* = Required Fields

Back Save Lane Save Lane As Draft Cancel

Copy Lane Layers to Shoulder(s)

EDIT LANE DETAILS

(1) Segment Details Info

(2) Segment Lanes

- Add a lane, remove a lane, copy lane details (from one to another)

(3) Selected Lane

(4) Lane Details

- Enter the details for the selected lane

(5) Lane Section

- Add and edit layers

(6) Back/Save/Cancel/Copy Lane Layers to Shoulder(s)



(1) Segment Details [Job # - 201403 / PR # - 961905 / MP : 4.123 ... 4.465] [Show] ▲

Segment Lanes

Select Lane : Lane #2.0 Work Done : ☒ Yes ☐ No

Add Left Lane Add Right Lane Copy Lane Remove Lane

(3) Selected Lane 2.0

(2) NOTE: Lanes are always numbered right to left facing toward increasing milepoints of the PR segment:
- Lane 1 is the right-most travel lane of the PR segment.
- Increasing lane numbers 2, 3, and greater are lanes left of Lane 1.
- Decreasing lane numbers 0, -1, and less are lanes right of Lane 1.

Lane Details [Lane #2.0]

* Surface Type (pavement cross-section) : HMA over existing Jointed Conc ▼

* Width : 12 ▼ ft

* Lane Type : Select Lane Type ▼

* Year [Paved/Placed] : 2023 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

(4)

Lane Section [Lane # 2.0]

#	Layer Name	Data Entry Status	
			<input type="checkbox"/>

Move Up Move Down Remove

Select New Layer

Layer : Select a Layer ▼

Add Layer

Select a Layer from the Layers Library

Layer : Select a Layer ▼

Add Layer

* = Required Fields

Back Save Lane Save Lane As Draft Cancel

Copy Lane Layers to Shoulder(s)

(5)

(6)

EDIT LANE DETAILS: LANE DETAILS PANE

- Select the *Surface Type* from the drop-down menu
- Select the lane *Width* from the drop-down menu
- Select the *Lane Type* (functional use) from the drop-down menu
- Enter the *Year* the work/material was *Paved or Placed*
- Select 'Yes' if this lane was **Partially Paved* in this job
* refers to final width of paved lane, not part-width construction

Lane Details [Lane #0.0]

* Surface Type : HMA full depth ▼

* Width : 12 ▼ ft

* Lane Type : Right Turn ▼

* Year [Paved/Placed] : 2018 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

Select Surf. Type

- HMA full depth
- HMA over existing HMA
- HMA over existing Jointed Conc
- HMA over existing CRCP
- HMA over existing Brick
- JPCP-Jointed Plain Concrete Pvmt
- JRCP-Jointed Reinforced Conc Pvmt
- CRCP-Continuously Reinf Conc Pvmt
- Unbonded Conc Overlay on Exist Conc
- Whitetting
- Brick
- Other

Select Lane Type

- Buffer Space
- Center Left Turn
- Left & Right Turn
- Left Turn
- Mainline
- Median Turnaround
- Merge
- Off-Ramp
- On-Ramp
- Passing Flare
- Passing Relief
- Right Turn
- Truck Climbing
- Weave

EDIT LANE DETAILS: PARTIAL WIDTH PAVING

- Click 'No': the **Width** entry will indicate the full width the lane was paved.
- Click 'Yes': the **Paving Width** entry will indicate the partial paving width.
- ❖ **Note:** *This does not refer to construction staging part-width paving. This refers to final width of lane paved, regardless of construction staging*

Lane Details [Lane #1.0]

* Surface Type : HMA full depth ▼

* Width : 12 ▼ ft

* Lane Type : Mainline ▼

* Year [Paved/Placed] : 2018 [yyyy]

* Partial Width Paving? : ☒ Yes ☐ No

* Paving Width : 3 ▼ ft

EDIT LANE DETAILS: EDIT LAYER DETAILS

- Select a layer from the Layer drop-down list (1)
- Click 'Add Layer' (repeat until all layers are added) (2)
- Click on the layer in the Lane Section box to begin editing (3)

Standard Full Job Entry

Segment Lanes

Select Lane : Lane #1.0 Work Done : ☒ Yes ☐ No

Add Left Lane Add Right Lane Copy Lane Details Remove Lane

NOTE: Lanes are always numbered right to left facing toward increasing milepoints of the PR segment:
- Lane 1 is the right-most travel lane of the PR segment.
- Increasing lane numbers 2, 3, and greater are lanes left of Lane 1.
- Decreasing lane numbers 0, -1, and less are lanes right of Lane 1.

Lane Details [Lane #1.0]

* Surface Type : HMA full depth
* Width : 12 ft
* Lane Type : Mainline
* Year [Paved/Placed] : 2014 [yyyy]
* Partial Width Paving? : ☐ Yes ☒ No

Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status

Move Up Move Down Remove

(1) Select New Layer
Layer : Select a Layer

(2) Add Layer

* = Required Fields

Back Save Lane Save Lane As Draft Cancel

Simplified CPM Job Entry

Segment Details [PR # - 768604 / MP : 0 ... 1.293]

Segment Shoulder Overview

	Left	Right
Work Done	No	No
Status		

Segment Curb & Gutter Overview

	Left	Right
Work Done	No	No
Status		

Shoulder, Curb & Gutter Details

* Year [Paved/Placed] : [yyyy]

Segment Sections

#	Layer Name	Data Entry Status

Move Up Move Down Remove

Select New Layer
Layer : Select a Layer

Add Layer

Segment Comments
[max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

EDIT LANE DETAILS: EDIT LAYER DETAILS

- Select the Layer in the *Select a Layer* drop-down (1)
- Enter details in the *Pavement Attributes* pane (2)
- Enter aggregate details (If applicable) (3)
 - Select the aggregate from the *Aggregate* list (standard MDOT gradations)
 - ❖ If *'Other Aggregate'* (non-standard gradation) selected - enter the other aggregate name in the text box
 - Enter the pit source number for *Source*
 - ❖ **Note:** "County Code" pit source numbers can be used
 - Click 'Add Aggregate' (4)
 - Repeat until all aggregates have been added

Select a Layer [Job # - 201403 / PR # - 961905/ MP :4.123 ... 4.465]

Layer : HMA Base Course (1)

The bottom layer of an asphalt structure (below leveling & top course layers).

Locate layer attributes using the following considerations:
- For Mix Type, Mix Design No., Asphalt Binder, use JMF (Form 1911), Report of Quality Assurance (IDRs) (Form 1122B).
- For Application Rate, use 'As Built' Plans & Proposal or Yield Calculations.
- For Aggregate Class and Source (pit number), use JMF (Form 1911).

** Drop-down menu to quickly change between setup layers

Pavement Attributes - HMA Base Course

* Mix Type : Select Mix Type - HMA Base Course

* Mix Design No (Case Sensitive) :

* Application Rate : Select Application Rate #/syd (2)

* Asphalt Binder : Select Asphalt Binder

* Asphalt Binder Cert. Supplier : Select Asphalt Binder Certified Supplier

* Asphalt % (Total) : [Numeric Value]

* Asphalt Binder %Added (Virgin) : [Numeric Value]

* Warm Mix? : Yes No

* Shingles used in the mix? : Yes No

Select New Aggregate (3)

* Aggregate : Select an Aggregate

Source : -

Add Aggregate (4)

Aggregate Summary

Aggregate	Source
Empty - Add Aggregates	

Add Aggregates Edit Aggregate Remove Aggregate

Back Complete Layer Restore Defaults Cancel

Save Layer As Draft Add to Layers Library

EDIT LANE DETAILS: EDIT LAYER DETAILS

- *Restore Defaults* button: **(1)**
 - To reset the layer and remove all data entry
- *Save Layer As Draft* button: **(2)**
 - Saves layer as **Draft** – use to save and add more data later
- *Complete Layer* button: **(3)**
 - Saves layer as **Complete** – use when all data is added & complete.
- *Add to Layers Library* button: **(4)**
 - To save the layer to the job's list of Layers Library

The screenshot shows the 'Edit Lane Details' window. At the top, a header bar reads 'Select a Layer [Job # - 201403 / PR # - 961905/ MP :4.123 ... 4.465]'. Below this, a 'Layer' dropdown is set to 'HMA Base Course'. A descriptive text box explains the layer's role in an asphalt structure and provides instructions on where to find attributes. The main section, 'Pavement Attributes - HMA Base Course', contains various input fields for Mix Type, Mix Design No., Application Rate, Asphalt Binder, and other specifications. At the bottom, there are four buttons: 'Back', 'Complete Layer', 'Restore Defaults', and 'Cancel'. Red annotations highlight these buttons: (1) points to 'Restore Defaults', (2) points to 'Save Layer As Draft' (labeled below 'Back'), (3) points to 'Complete Layer', and (4) points to 'Add to Layers Library' (labeled below 'Complete Layer').

Inset 1: Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status	
1	HMA Base Course	Complete	<input type="checkbox"/>

Buttons: Move Up, Move Down, Remove

Result in the Lane Summary Screen

Inset 2: Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status	
1	HMA Base Course	Draft	<input type="checkbox"/>

Buttons: Move Up, Move Down, Remove

Result in the Lane Summary Screen

Inset 3: Aggregate Summary

Aggregate
Empty - Add Aggregates

Buttons: Add Aggregates, Edit Aggregate

EDIT LANE DETAILS: EDIT LAYER DETAILS

➤ Add Aggregates (*from one to another layer*)

- After Saving a Layer as Complete – click ‘Add Aggregates’ (1)
- Check the aggregates to add (2)
- Check the layers to apply aggregates (3)
- Click ‘Add’ (4)
- **Note:** Any Complete layers will not appear in list to add to
- **Note:** Previously added aggregates will not be deleted

Post Construction Data | Add Aggregates Role[s] :: Data Owner, System Administrator

Add Aggregates

Lane Section 2.0 [Layer Name - 3 HMA Base Course]

Aggregate	Source	<input type="checkbox"/>
2SS	04-057	<input type="checkbox"/>
2NS	72-006	<input checked="" type="checkbox"/>
25A	72-006	<input type="checkbox"/>
WCD	72-005	<input checked="" type="checkbox"/>

(2)

Back Add (4)

Lane Draft Layers

#	Layer Name	<input type="checkbox"/>
5	HMA Top Course	<input checked="" type="checkbox"/>
4	HMA Level Course	<input checked="" type="checkbox"/>
2	Aggregate Base Course	<input type="checkbox"/>
1	Subbase	<input type="checkbox"/>

(3)

Post Construction Data | Layer Details Role[s] :: Data Owner, System Administrator

* = Required Fields

Select a Layer [Job # - JPS_TEST1234 / PR # - 3031548/ MP :0.9 ... 1]

Layer : HMA Base Course

Pavement Attributes - HMA Base Course

* Application Rate : 330 #/syd

* Asphalt Binder : PG 64-22

* Asphalt Binder Cert. Supplier : Ajax Asphalt Terminal, Detroit, MI

* Mix Type : 3E3

* Mix Design No (Case Sensitive) : 13MD296

* Warm Mix? : ☐ Yes ☒ No

* Shingles used in the mix? : ☐ Yes ☒ No

Select New Aggregate

* Aggregate : Select an Aggregate

Source : -

Add Aggregate

Aggregate Summary

Aggregate	Source	<input type="checkbox"/>
2SS	04-057	<input type="checkbox"/>
2NS	72-006	<input type="checkbox"/>
25A	72-006	<input type="checkbox"/>
WCD	72-005	<input type="checkbox"/>

(1)

Add Aggregates Edit Aggregate Remove Aggregate

Back Complete Layer Restore Defaults Cancel

Save Layer As Draft Add to Quick Layers

EDIT LANE DETAILS: LANE SECTION PANE

☐ Move a layer up or down in list:

- Select layer check box,
- Click 'Move Up' or 'Move Down'

☐ Remove a layer from the list:

- Select the layer check box,
- Click 'Remove'

Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status	<input type="checkbox"/>
5	HMA Top Course	Complete	<input type="checkbox"/>
4	HMA Level Course	Complete	<input type="checkbox"/>
3	HMA Base Course	Complete	<input type="checkbox"/>
2	Aggregate Base Course	Complete	<input type="checkbox"/>
1	Subbase	Complete	<input type="checkbox"/>

Move Up Move Down Remove

Lane Details [Lane #1.0]

* Surface Type :

* Width : ft

* Lane Type :

* Year [Paved/Placed] : [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status	<input type="checkbox"/>
5	HMA Top Course	Complete	<input type="checkbox"/>
4	HMA Level Course	Complete	<input type="checkbox"/>
3	Aggregate Base Course	Complete	<input type="checkbox"/>
2	HMA Base Course	Complete	<input type="checkbox"/>
1	Subbase	Complete	<input type="checkbox"/>

Move Up Move Down Remove

Select New Layer

Layer :

Add Layer

* = Required Fields

Back Save Lane Save Lane As Draft Cancel

Copy Lane Layers to Shoulder(s)

Lane Section [Lane # 1.0]

#	Layer Name	Data Entry Status	<input type="checkbox"/>
4	HMA Top Course	Complete	<input type="checkbox"/>
3	HMA Level Course	Complete	<input type="checkbox"/>
2	Aggregate Base Course	Complete	<input type="checkbox"/>
1	Subbase	Complete	<input type="checkbox"/>

Move Up Move Down Remove

EDIT LANE DETAILS: SAVING

- Click 'Save Lane As Draft':
 - Saves current lane as **Draft** – use to save and add more data/layers later
- Click 'Save Lane':
 - Saves current lane as **Complete** – use when all data/layers are added & complete

Segment Lane(s) Overview		
Lane #	Work Done	Status
1.0	Yes	Draft
Lane Details		

Result in the Segment Overview Screen

Segment Lane(s) Overview		
Lane #	Work Done	Status
1.0	Yes	Complete
Lane Details		

Result in the Segment Overview Screen

Lane Details [Lane #1.0]

* Surface Type : HMA full depth

* Width : 12 ft

* Lane Type : Mainline

* Year [Paved/Placed] : 2016 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

Lane Section [Lane #1.0]

#	Layer Name	Data Entry Status	
5	HMA Top Course	Complete	<input type="checkbox"/>
4	HMA Level Course	Complete	<input type="checkbox"/>
3	HMA Base Course	Complete	<input type="checkbox"/>
2	Aggregate Base Course	Complete	<input type="checkbox"/>
1	Subbase	Complete	<input type="checkbox"/>

Move Up Move Down Remove

Select New Layer

Layer :

Add Layer

* = Required Fields

Back Save Lane Save Lane As Draft Cancel

Copy Lane Layers to Shoulder(s)

EDIT LANE DETAILS: COPY LANE

- Click 'Copy Lane' (After Saving a lane as Complete) (1)
- Select the Completed Lane to copy from (2)
- Select the Draft Lane(s) to copy to (3)
- Options:
 - To overwrite to selected Lane(s) – click 'Copy' (4)
 - Else, uncheck a box to not overwrite everything– click 'Copy' (4)

The screenshot shows the 'Copy Lane' dialog box. A red box (1) highlights the 'Copy Lane' button. A red box (2) highlights the 'Completed Lanes [Copy From]' table, which contains one row: Lane Number 1.0, Status Complete. A red box (3) highlights the 'Incomplete Lanes [Copy To]' table, which contains two rows: Lane Number 3.0, Status Draft, and Lane Number 2.0, Status Draft. A red box (4) highlights the 'Copy' button at the bottom.

Completed Lanes [Copy From]	
Lane Number	Status
1.0	Complete

Incomplete Lanes [Copy To]	
Lane Number	Status
3.0	Draft
2.0	Draft

The screenshot shows the 'Lane Summary' form. A red box (1) highlights the 'Copy Lane' button. A red box (4) highlights the 'Copy' button at the bottom.

Segment Details [PR # - 961905 / MP : 4.465 ... 4.499]

Segment Lanes

Select Lane : Lane #1.0

Work Done : ☒ Yes ☐ No

Selected Lane: 1.0

NOTE: Lanes are always numbered right to left facing toward increasing milepoints of the PR segment:

- Lane 1 is the right-most travel lane of the PR segment.
- Increasing lane numbers 2, 3, and greater are lanes left of Lane 1.
- Decreasing lane numbers 0, -1, and less are lanes right of Lane 1.

Lane Details [Lane #1.0]

* Surface Type : HMA full depth

* Width : 12 ft

* Lane Type : Mainline

* Year [Paved/Placed] : 2018 [yyyy]

* Partial Width Paving? : ☐ Yes ☒ No

EDIT LANE DETAILS: COPY TO SHOULDER(S)

- Click 'Copy Lane Layers to Shoulder(s)' (1)
- Select the Shoulder side to apply the copy to: *Both, Left, Right, or Cancel* (2)
 - **Warning:** For the shoulder(s) copied to, all existing Layers will be **removed** and **replaced** with those shown in the active lane

Which Shoulder side to copy layer to?

WARNING: Selected side(s) existing shoulder layers will be removed and replaced with copied layers

Both Left Right Cancel

#	Layer Name	Status
5	HMA Top Course	Complete
4	HMA Level Course	Complete
3	HMA Base Course	Complete
2	Aggregate Base Course	Complete
1	Subbase	Complete

#	Layer Name	Data Entry Status
5	HMA Top Course	Draft
4	HMA Level Course	Draft
3	HMA Base Course	Draft
2	Aggregate Base Course	Draft
1	Subbase	Draft

EDIT SHOULDER, CURB & GUTTER DETAILS

- Click 'Shoulder, Curb & Gutter Details'
- The Shoulder, Curb & Gutter Details screen will appear

Post Construction Data | Shoulder, Curb & Gutter Details Role[s] :: Data Owner , System Administrator

* = Required Fields

Left Side Right Side

Shoulder Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☐ No

* Is Parking Lane : ☐ Yes ☐ No

* Partial Width Paving? : ☐ Yes ☐ No

* Paved Width : 8 Feet

* Total Width : 8 Feet

* Shoulder Surface Type (pavement cross-section) : HMA over exist Jointed Conc

Select New Layer

Layer : Select a Layer

Add Layer

Shoulder Sections

#	Layer Name	Data Entry Status	
---	------------	-------------------	--

Move Up Move Down Remove

Curb & Gutter Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☐ Yes ☒ No

Back Save Shoulder, Curb & Gutter Cancel

Copy Shoulder and/or Curb & Gutter Save Shoulder As Draft

Post Construction Data | Segment Overview Role[s] :: Data Owner

Segment Details [PR # - 961905 / MP : 4.465 ... 4.499] [Show] ▲

Segment Shoulder Overview

	Left	Right
Work Done	Yes	Yes
Status	Draft	Draft

Segment Lane(s) Overview

Lane #	Work Done	Status
3.0	Yes	Complete
2.0	Yes	Complete
1.0	Yes	Complete

Lane Details

Segment Curb & Gutter Overview

	Left	Right
Work Done	No	No
Status		

Shoulder, Curb & Gutter Details

Median Overview

* Median Type : Undivided

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

EDIT SHOULDER, CURB & GUTTER DETAILS

- Select the **Left Side** or **Right Side** tab (1)
- Click 'Yes' or 'No' for Work Done (2)
 - ❖ 'Yes' will allow entry of details
- Enter Shoulder details (3)
- To **copy** the selected side to the other side – click 'Copy Shoulder, Curb & Gutter Details' (4)
 - ❖ **Note:** Right and Left sides are established by facing the direction of increasing milepoints

Post Construction Data | Shoulder, Curb & Gutter Details Role[s] :: Data Owner, System Administrator

* = Required Fields

Left Side Right Side (1)

Shoulder Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done (2): ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☐ No

* Is Parking Lane : ☐ Yes ☐ No

* Partial Width Paving? : ☐ Yes ☐ No

* Paved Width : 8 Feet

* Total Width : 8 Feet

* Shoulder Surface Type (pavement cross-section) : HMA over exist Jointed Conc

Select New Layer

Layer : Select a Layer

Add Layer

Shoulder Sections

#	Layer Name	Data Entry Status	
---	------------	-------------------	--

Move Up Move Down Remove

Curb & Gutter Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☐ Yes ☒ No

Back Save Shoulder, Curb & Gutter Cancel

(4) Copy Shoulder and/or Curb & Gutter Save Shoulder As Draft

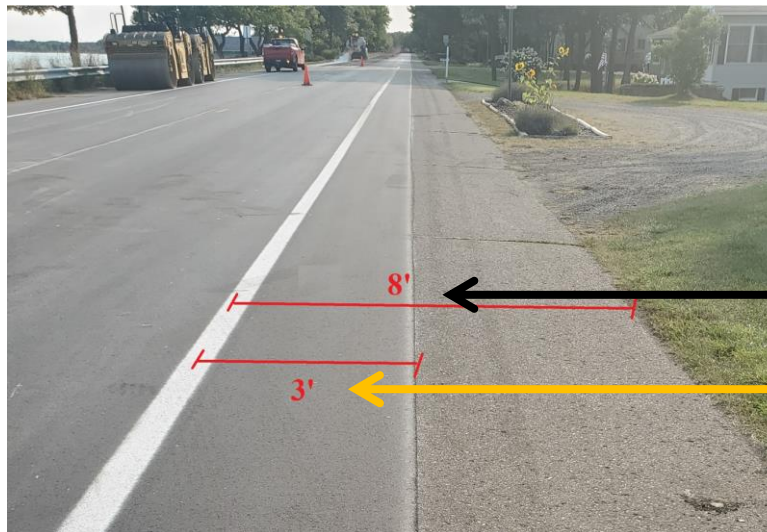
EDIT SHOULDER, CURB & GUTTER DETAILS

☐ Partial width paving

- Select 'Yes' if the shoulder was **partially** paved **within the same job**
- Select 'No' if the shoulder was **completely** paved **within the same job**

☐ If 'Yes' is selected:

- Enter the partial Paving Width



Left Side

Right Side

Shoulder Details [Job # - 201195 / PR # - 1562406/ MP :0 ... 0.059]

Left Side

* Work Done : ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☒ No

* Is Parking Lane : ☐ Yes ☒ No

* Partial Width Paving? : ☒ Yes ☐ No

* Partial Paving Width : 3 Feet

* Paved Width : 8 Feet

* Total Width : 8 Feet

* Shoulder Surface Type (pavement cross-section) : HMA full depth

Select New Layer

Layer :

Select a Layer

Add Layer

Shoulder Sections

#	Layer Name	Data Entry Status	
			<div>Move Up</div> <div>Move Down</div> <div>Remove</div>

Curb & Gutter Details [Job # - 201195 / PR # - 1562406/ MP :0 ... 0.059]

Left Side

Work Done : ☒ Yes ☐ No

* Curb Type :

Select Curb Type

Back

Save Shoulder, Curb & Gutter

Cancel

Copy Shoulder and/or Curb & Gutter

Save Shoulder As Draft

SHOULDER, CURB & GUTTER: SIMPLIFIED CPM

Simplified CPM

Post Construction Data | Shoulder, Curb & Gutter Details Role[s] :: Data Owner, System Administrator

* = Required Fields

Left Side Right Side

Shoulder Details Right Side

* Work Done : ☒ Yes ☐ No

Select New Layer

Layer :

Add Layer

#	Layer Name	Data Entry Status

Move Up Move Down Remove

Curb & Gutter Details Right Side

* Work Done : ☒ Yes ☐ No

* Curb Type :

Back Save Shoulder, Curb & Gutter Cancel

Copy Shoulder, Curb & Gutter Details Save Shoulder As Draft

Left Side & Right Side tabs

Shoulder Details

Add/Edit Shoulder Layers (No Shoulder Details)

Curb Type drop-down list

Standard Full Job Entry

Left Side Right Side

Shoulder Details [Job # - 201195 / PR # - 1562406/ MP :0 ... 0.059] Left Side

* Work Done : ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☐ No

* Is Parking Lane : ☐ Yes ☐ No

* Partial Width Paving? : ☐ Yes ☐ No

* Paved Width : Feet

* Total Width : Feet

* Shoulder Surface Type (pavement cross-section) :

Select New Layer

Layer :

Add Layer

#	Layer Name	Data Entry Status

Move Up Move Down Remove

Curb & Gutter Details [Job # - 201195 / PR # - 1562406/ MP :0 ... 0.059] Left Side

* Work Done : ☒ Yes ☐ No

* Curb Type :

Back Save Shoulder, Curb & Gutter Cancel

Copy Shoulder and/or Curb & Gutter Save Shoulder As Draft

- Simplified CPM
- Full Job
- Both

EDIT SHOULDER, CURB & GUTTER DETAILS

- *Save Shoulder As Draft:*
 - Saves current side as **Draft** – use to save and add more data/layers later
- *Save Shoulder, Curb & Gutter:*
 - Saves current side as **Complete** – use when all data/layers are added & complete

Result in the Segment Overview Screen

Segment Shoulder Overview		
	Left	Right
Work Done	Yes	No
Status	Draft	
Segment Curb & Gutter Overview		
	Left	Right
Work Done	No	No
Status		
Shoulder, Curb & Gutter Details		

Segment Shoulder Overview		
	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete
Segment Curb & Gutter Overview		
	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete
Shoulder, Curb & Gutter Details		

Result in the Segment Overview Screen

Post Construction Data | Shoulder, Curb & Gutter Details Role[s] :: Data Owner , System Administrator

* = Required Fields

Left Side Right Side

Shoulder Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☒ No

* Is Parking Lane : ☐ Yes ☒ No

* Partial Width Paving? : ☐ Yes ☒ No

* Paved Width : 8 Feet

* Total Width : 8 Feet

* Shoulder Surface Type (pavement cross-section) : HMA over exist Jointed Conc

Select New Layer

Layer : Select a Layer

Add Layer

Shoulder Sections

#	Layer Name	Data Entry Status	
2	HMA Top Course	Draft	<input type="checkbox"/>
1	Cold Milling	Draft	<input type="checkbox"/>

Move Up Move Down Remove

Curb & Gutter Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Right Side

* Work Done : ☒ Yes ☐ No

* Curb Type : Concrete Curb & Gutter

Back Save Shoulder, Curb & Gutter Cancel

Copy Shoulder and/or Curb & Gutter Save Shoulder As Draft

EDIT SHOULDER, CURB & GUTTER DETAILS

❑ Copying Shoulder details

- Click 'Copy Shoulder and/or Curb & Gutter' (After Saving a side as Complete) **(1)**

➤ Options:

- To overwrite and copy everything to other side – click 'Copy to...Shoulder' **(2)**
- Or, uncheck a box to not overwrite everything – click 'Copy to...Shoulder' **(3)**

(3)

Instructions - Shoulder Details Copy [Hide]

- Select the copy option.

All the existing shoulder information will be lost.

Copy Options

Select Option
<input checked="" type="checkbox"/> Shoulder Details
<input checked="" type="checkbox"/> Shoulder Layers
<input checked="" type="checkbox"/> Curb & Gutter Details

Back Copy to Right Shoulder **(2)**

Post Construction Data | Shoulder, Curb & Gutter Details Role[s] :: Data Owner, System Administrator

* = Required Fields

Left Side Right Side

Shoulder Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☒ Yes ☐ No

* Has Corrugations(Rumble Strip) : ☐ Yes ☒ No

* Is Parking Lane : ☐ Yes ☒ No

* Partial Width Paving? : ☐ Yes ☒ No

* Paved Width : 8 Feet

* Total Width : 8 Feet

* Shoulder Surface Type (pavement cross-section) : HMA over exist Jointed Conc

Select New Layer

Layer : Select a Layer

Add Layer

Shoulder Sections

#	Layer Name	Data Entry Status	
1	HMA Top Course	Complete	<input type="checkbox"/>

Move Up Move Down Remove

Curb & Gutter Details [Job # - 110749 / PR # - 961905/ MP :4.465 ... 4.499] Left Side

* Work Done : ☒ Yes ☐ No

* Curb Type : Concrete Curb & Gutter

Back Save Shoulder, Curb & Gutter Cancel

Copy Shoulder and/or Curb & Gutter Save Shoulder As Draft

(1)

EDIT SEGMENT DETAILS: SAVING

- *Save Segment As Draft:*
 - Lanes/Shoulder, Curb & Gutter **do not** require 'Complete' Status
- *Click Save Segment:*
 - Lanes/Shoulder, Curb & Gutter **does** require 'Complete' Status

Result in the Road Segment List Screen

Successfully saved sectional information for the segment [# 4] as Draft.

PR Segment List										[Hide] ▼
	#	PR Number	PR (v)	BMP	EMP	Route	Direction	Framework Status	Data Status	
<input type="radio"/>	1	962706	16	10.505	10.789	I-69	E	Active	Draft	
<input type="radio"/>	2	962706	16	10.789	11.123	I-69	E	Active	Draft	
<input type="radio"/>	3	962706	16	11.123	11.554	I-69	E	Active	Draft	
<input checked="" type="radio"/>	4	961905	16	4.465	4.499	M-19	N/S	Active	Draft	
<input type="radio"/>	5	961905	16	4.499	4.719	M-19	N/S	Active	Draft	

Segment Details Copy Segment Details Create Segment Delete Segment View Map

Quick Layer Overview

Post Construction Data | Segment Overview Role[s] :: Data Owner

Segment Details [PR # - 961905 / MP : 4.465 ... 4.499] [Show] ▲

Segment Shoulder Overview		
	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete

Segment Lane(s) Overview		
Lane #	Work Done	Status
3.0	Yes	Complete
2.0	Yes	Complete
1.0	Yes	Complete

Lane Details

Segment Curb & Gutter Overview		
	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete

Shoulder, Curb & Gutter Details

Median Overview

* Median Type :

Segment Comments [max 250 characters]

Segment Summary

Successfully saved sectional information for the segment [# 4].

PR Segment List										[Hide] ▼
	#	PR Number	PR (v)	BMP	EMP	Route	Direction	Framework Status	Data Status	
<input type="radio"/>	1	962706	16	10.505	10.789	I-69	E	Active	Draft	
<input type="radio"/>	2	962706	16	10.789	11.123	I-69	E	Active	Draft	
<input type="radio"/>	3	962706	16	11.123	11.554	I-69	E	Active	Draft	
<input checked="" type="radio"/>	4	961905	16	4.465	4.499	M-19	N/S	Active	Complete	
<input type="radio"/>	5	961905	16	4.499	4.719	M-19	N/S	Active	Draft	

Segment Details Copy Segment Details Create Segment Delete Segment View Map

Quick Layer Overview

LAYERS LIBRARY OVERVIEW

❑ Function/Purpose:

- Create/add 'Layers' to segments' lanes/shoulders within a single screen
- Makes adding/editing layers faster and easier to do
- This works the same for *Simplified CPM* (adds layers to segments, not lanes)

❑ Click *Layers Library Overview*

- The Layers Library Overview screen will appear

Create/Modify Layer(s) **Add Layer(s)**

Select New Layer

Layer :

User Specified :

Name

Add Layer

Layers List

#	Layer Name	User Specified Name	Data Entry Status	
				<input type="checkbox"/>

Remove

Back **Save**

Job Details [201403 / 164 - Asphalt Reconstruction] **[Show] ▲**

Edit Job Details

PR Segment List **[Hide] ▼**

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	961905	23	4.123	4.465	M-19	2 Way	Active	Draft
<input type="radio"/>	2	3090836	23	0	0.125	M-25	NB	Active	Draft
<input type="radio"/>	3	3090836	23	0.125	0.369	M-25	NB	Active	Draft
<input type="radio"/>	4	3090836	23	0.369	0.587	M-25	NB	Active	Draft
<input type="radio"/>	5	3090836	23	0.587	0.852	M-25	NB	Active	Draft
<input type="radio"/>	6	3090836	23	0.852	1.292	M-25	NB	Active	Draft

Segment Details **Copy Segment Details** **Create Segment** **Delete Segment(s)** **View Map**

Layers Library Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
1	961905	4.123	4.465

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [At least 2]

Create Sub Segments

Project Comments
[max 250 characters]

Back **Finalize Job** **Save Job as Draft** **Cancel**

Project Summary

LAYERS LIBRARY OVERVIEW: CREATE/MODIFY

❑ To **add** a 'Layer', in the Select New Layer pane:

- Select a Layer from the drop-down list (1)
- Enter a unique name in the text box (2)
- Click 'Add Layer' (3)

❑ **Edit/complete** the layer & aggregate details (4)

❖ **NOTE:** Each 'Layer' must have a unique name

This screenshot shows the 'Create/Modify Layer(s)' pane. Step (1) points to the 'Layer' dropdown menu in the 'Select New Layer' section, which is set to 'HMA Top Course'. Step (2) points to the 'User Specified Name' text box, which contains 'Top_201403'. Step (3) points to the 'Add Layer' button. The 'Layers List' table on the right shows the newly added layer.

#	Layer Name	User Specified Name	Data Entry Status	
1	HMA Top Course	Top_201403	Draft	<input type="checkbox"/>

This screenshot shows the 'Pavement Attributes' and 'Select New Aggregate' panes. Step (4) points to the 'Aggregate' dropdown menu in the 'Select New Aggregate' section, which is set to 'Select an Aggregate'. The 'Pavement Attributes' section for 'HMA Top Course' shows various fields for user specification, including 'User Specified Name' (Top_201403), 'AWI (Actual)', 'Application Rate', 'Asphalt Binder', 'Asphalt Binder Cert. Supplier', 'Mix Design No (Case Sensitive)', 'Mix Type', 'Shingles used in the mix?', and 'Warm Mix?'. The 'Aggregate Summary' section shows 'Empty - Add Aggregates'.

Aggregate	Source	
Empty - Add Aggregates		

LAYERS LIBRARY OVERVIEW: CREATE/MODIFY

➤ To save a 'Layer', click 'Save Layer'

- **NOTE:** If attributes are missing, the Data Entry Status is saved as **Draft**. If all attributes are entered, it is **Complete**.
- **WARNING:** Clicking Save, is **not** the same as Save Layer. Click Save Layer **before** clicking Save.

Draft

The screenshot shows the 'Create/Modify Layer(s)' form. The 'Layers List' table has one entry: #1, HMA_Top_Course, Top_201403, Draft. The 'Pavement Attributes - HMA Top Course' section shows 'User Specified Name' as Top_201403. Fields for 'AWI (Actual)', 'Application Rate', 'Asphalt Binder', and 'Asphalt Binder Cert. Supplier' are filled. 'Mix Design No (Case Sensitive)' and 'Mix Type' are highlighted with a yellow box and labeled 'Missing'. The 'Aggregate Summary' table is empty, also labeled 'Missing'. The 'Save Layer' button is visible at the bottom.

#	Layer Name	User Specified Name	Data Entry Status
1	HMA_Top_Course	Top_201403	Draft

Aggregate	Source
Empty - Add Aggregates	

Complete

The screenshot shows the 'Create/Modify Layer(s)' form with the 'Data Entry Status' changed to 'Complete'. The 'Mix Design No (Case Sensitive)' is now '13MOD' and 'Mix Type' is 'SEMI'. The 'Aggregate Summary' table now contains two entries: Sand (02-004) and 3/8 (04-012). A red arrow points from the 'Save Layer' button to the 'Complete' status. The 'Save' button is also highlighted at the bottom.

#	Layer Name	User Specified Name	Data Entry Status
1	HMA_Top_Course	Top_201403	Complete

Aggregate	Source
Sand	02-004
3/8	04-012

LAYERS LIBRARY OVERVIEW: CREATE/MODIFY

- To **change** the active 'Layer', click the layer name in the Layers List pane
 - To **remove** a 'Layer', select the layer checkbox and click 'Remove'
 - Click '**Save**' at bottom of screen (After all layers are complete and layer saved)
- ❖ **WARNING:** Always click Save **before** clicking Back or Add Layers tab. Otherwise, all added layers or changes will be lost



The screenshot displays the 'Create/Modify Layer(s)' web interface. At the top, there are two tabs: 'Create/Modify Layer(s)' (active) and 'Add Layer(s)'. Below the tabs, the interface is divided into several sections. On the left, the 'Select New Layer' section contains a 'Layer' dropdown menu set to 'Select a Layer', a 'User Specified Name' text field, and an 'Add Layer' button. To the right of this is the 'Layers List' table, which has columns for '#', 'Layer Name', 'User Specified Name', 'Data Entry Status', and a checkbox. It lists two layers: 'HMA Level Course' (Level_54875, Draft status) and 'HMA Top Course' (Top_201403, Complete status). The 'HMA Top Course' row is highlighted with a yellow box, and its checkbox is checked. A red box highlights the 'Remove' button at the bottom right of the table. Below the table is a 'NOTE' field containing 'HMA Level Course'. The main section is titled 'Pavement Attributes - HMA Level Course' and shows the 'User Specified Name' as 'Level_54875'. It contains several form fields with red asterisks indicating required fields: 'Application Rate' (dropdown), 'Asphalt Binder' (dropdown), 'Asphalt Binder Cert. Supplier' (dropdown), 'Mix Design No (Case Sensitive)' (text field), 'Mix Type' (dropdown), 'Shingles used in the mix?' (radio buttons, 'No' is selected), and 'Warm Mix?' (radio buttons). Below this is the 'Select New Aggregate' section with an 'Aggregate' dropdown and a 'Source' text field, followed by an 'Add Aggregate' button. To the right is the 'Aggregate Summary' section, which is currently empty and contains the text 'Empty - Add Aggregates' and a 'Remove Aggregate' button. At the bottom of the interface, there are 'Save Layer' and 'Restore Defaults' buttons, and a navigation bar with 'Back' and 'Save' buttons. The 'Save' button is highlighted with a green box.

#	Layer Name	User Specified Name	Data Entry Status	
2	HMA Level Course	Level_54875	Draft	<input type="checkbox"/>
1	HMA Top Course	Top_201403	Complete	<input checked="" type="checkbox"/>

NOTE: HMA Level Course

Pavement Attributes - HMA Level Course

User Specified Name : Level_54875

* Application Rate : Select Application Rate #/syd

* Asphalt Binder : Select Asphalt Binder

* Asphalt Binder Cert. Supplier : Select Asphalt Binder Certified Supplier

* Mix Design No (Case Sensitive) :

* Mix Type : Select Mix Type - HMA Level Course

* Shingles used in the mix? : ☐ Yes ☒ No

* Warm Mix? : ☐ Yes ☐ No

Select New Aggregate

* Aggregate : Select an Aggregate

Source : -

Add Aggregate

Aggregate Summary

Aggregate Source

Empty - Add Aggregates

Remove Aggregate

Save Layer Restore Defaults

Back Save

LAYERS LIBRARY OVERVIEW: ADD LAYERS

❑ After all layers are complete, layers saved, and screen saved:

➤ Click **'Add Layers'** tab

▪ Unsaved data warning will always appear (even if you did save)

Note: This is now the active tab (shown in orange)

Create/Modify Layer(s) **Add Layer(s)**

Select New Layer

micamdevw.michigan.gov says

Any unsaved data in this project will be lost - proceed?

OK Cancel

Pavement Attributes - HMA Level Course

User Specified Name : Level_54875

* Application Rate : Select Application Rate #/syd

* Asphalt Binder : Select Asphalt Binder

* Asphalt Binder Cert. Supplier : Select Asphalt Binder Certified Supplier

* Mix Design No (Case Sensitive) :

* Mix Type : Select Mix Type - HMA Level Course

* Shingles used in the mix? : ☐ Yes ☒ No

* Warm Mix? : ☐ Yes ☐ No

Select New Aggregate

* Aggregate : Select an Aggregate

Source : ☐ - ☐

Add Aggregate

Aggregate Summary

Aggregate	Source
Empty - Add Aggregates	

Remove Aggregate

Save Layer Restore Defaults

Back Save

Create/Modify Layer(s) **Add Layer(s)**

PR Segment List [Hide] ▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input type="radio"/>	1	526107	23	0.092	0.285	M-66	2 Way	Active	Draft
<input type="radio"/>	2	526107	23	1.067	1.521	M-66	2 Way	Active	Draft
<input type="radio"/>	3	240805	23	1.737	1.926	S West County Line Rd		Active	Draft

Add Library Layer ^

Layers List

	#	Layer Name	User Specified Name	Data Entry Status
<input type="checkbox"/>	1	HMA Top Course	Top_201403	Complete

Back Save

LAYERS LIBRARY OVERVIEW: ADD LAYERS

❑ To **add** a 'Layer':

- (1) Select a segment's radio button - Lanes and Shoulders pane appears below
- (2) Select lane(s) or shoulder(s) radio button (to copy to)
- (3) Select a layer from the Layers List
- (4) Click *Add Library Layer* (above) - the layer is added to the Lane/Shoulder Section pane

Create/Modify Layer(s)Add Layer(s)

PR Segment List[Hide]▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	526107	23	0.092	0.285	M-66	2 Way	Active	Draft
<input type="radio"/>	2	526107	23	1.067	1.521	M-66	2 Way	Active	Draft
<input type="radio"/>	3	240805	23	1.737	1.926	S West County Line Rd		Active	Draft

Lanes and Shoulders

<input type="checkbox"/>	#	Lane/Shoulder
<input type="checkbox"/>	2.0	Lane
<input type="checkbox"/>	1.0	Lane
<input type="checkbox"/>	Left	Shoulder
<input type="checkbox"/>	Right	Shoulder

Add Library Layer ^

Layers List

<input type="checkbox"/>	#	Layer Name	User Specified Name	Data Entry Status
<input type="checkbox"/>	1	HMA Top Course	Top_201403	Complete

Back

Save

(Appears)

Create/Modify Layer(s)Add Layer(s)

PR Segment List[Hide]▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	526107	23	0.092	0.285	M-66	2 Way	Active	Draft
<input type="radio"/>	2	526107	23	1.067	1.521	M-66	2 Way	Active	Draft
<input type="radio"/>	3	240805	23	1.737	1.926	S West County Line Rd		Active	Draft

Lanes and Shoulders

<input type="checkbox"/>	#	Lane/Shoulder
<input checked="" type="checkbox"/>	2.0	Lane
<input checked="" type="checkbox"/>	1.0	Lane
<input checked="" type="checkbox"/>	Left	Shoulder
<input type="checkbox"/>	Right	Shoulder

(2)

Add Library Layer ^

Layers List

<input type="checkbox"/>	#	Layer Name	User Specified Name	Data Entry Status
<input type="checkbox"/>	1	HMA Top Course	Top_201403	Complete

Back

Save

Create/Modify Layer(s)Add Layer(s)

PR Segment List[Hide]▼

	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	526107	23	0.092	0.285	M-66	2 Way	Active	Draft
<input type="radio"/>	2	526107	23	1.067	1.521	M-66	2 Way	Active	Draft
<input type="radio"/>	3	240805	23	1.737	1.926	S West County Line Rd		Active	Draft

Lanes and Shoulders

<input type="checkbox"/>	#	Lane/Shoulder
<input checked="" type="checkbox"/>	2.0	Lane
<input checked="" type="checkbox"/>	1.0	Lane
<input checked="" type="checkbox"/>	Left	Shoulder
<input type="checkbox"/>	Right	Shoulder

(4)

Add Library Layer ^

Layers List

<input type="checkbox"/>	#	Layer Name	User Specified Name	Data Entry Status
<input checked="" type="checkbox"/>	1	HMA Top Course	Top_201403	Complete

(3)

Back

Save

LAYERS LIBRARY OVERVIEW: ADD LAYERS

❑ After all layers are added to the current lane or shoulder:

➤ Click '**Save**' (at bottom of screen)

❖ **WARNING:** Always click Save **before** selecting a new segment/lane/shoulder radio button, Back, or Create/Modify Layer(s) tab. Otherwise, all added layers or changes will be lost

Successfully saved Layers Library information.

Create/Modify Layer(s) Add Layer(s)

PR Segment List [Hide] ▼									
	#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input checked="" type="radio"/>	1	526107	23	0.092	0.285	M-66	2 Way	Active	Draft
<input type="radio"/>	2	526107	23	1.067	1.521	M-66	2 Way	Active	Draft
<input type="radio"/>	3	240805	23	1.737	1.926	S West County Line Rd		Active	Draft

Lanes and Shoulders		
<input type="checkbox"/>	#	Lane/Shoulder
<input type="checkbox"/>	2.0	Lane
<input type="checkbox"/>	1.0	Lane
<input type="checkbox"/>	Left	Shoulder
<input type="checkbox"/>	Right	Shoulder

Add Library Layer ^

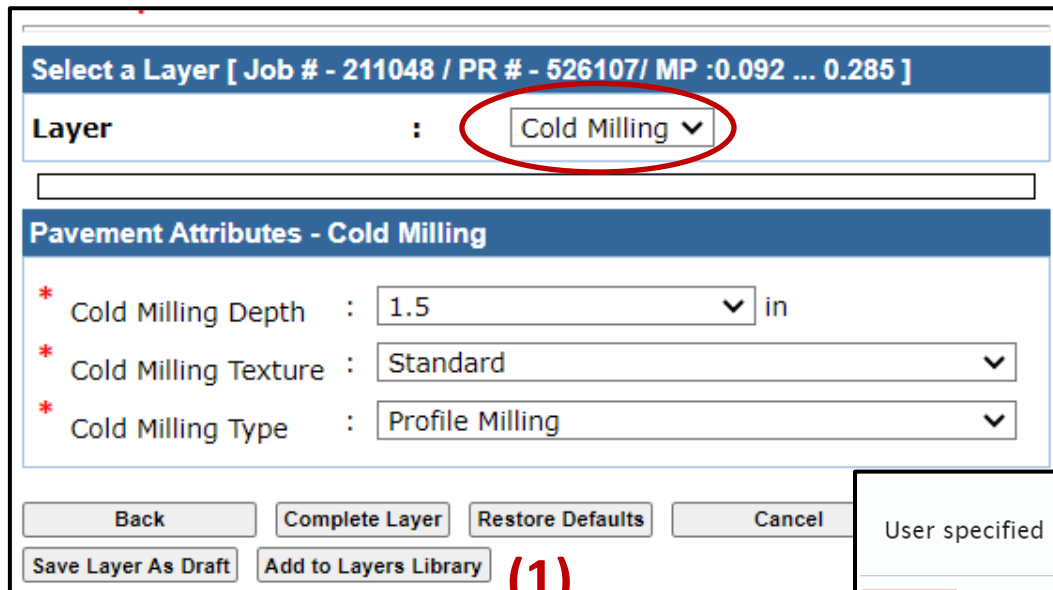
Layers List				
<input type="checkbox"/>	#	Layer Name	User Specified Name	Data Entry Status
<input type="checkbox"/>	1	HMA Top Course	Top_201403	Complete

Back Save

ADD A LAYER FROM LAYER DETAILS

❑ **Add** to the list of 'Layers Library' “on the fly” while working within the Layer Details screen:

- Click 'Add to Layers Library' (1)
- Enter the name in the pop-up window (2)
- Click 'Ok' (3)



Select a Layer [Job # - 211048 / PR # - 526107/ MP :0.092 ... 0.285]

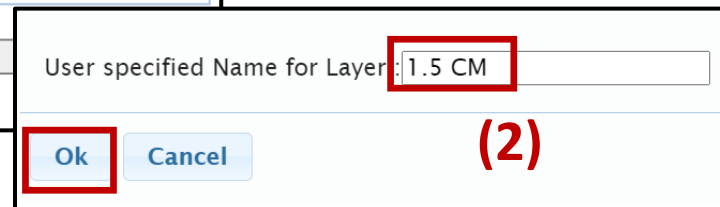
Layer : Cold Milling

Pavement Attributes - Cold Milling

- * Cold Milling Depth : 1.5 in
- * Cold Milling Texture : Standard
- * Cold Milling Type : Profile Milling

Back Complete Layer Restore Defaults Cancel

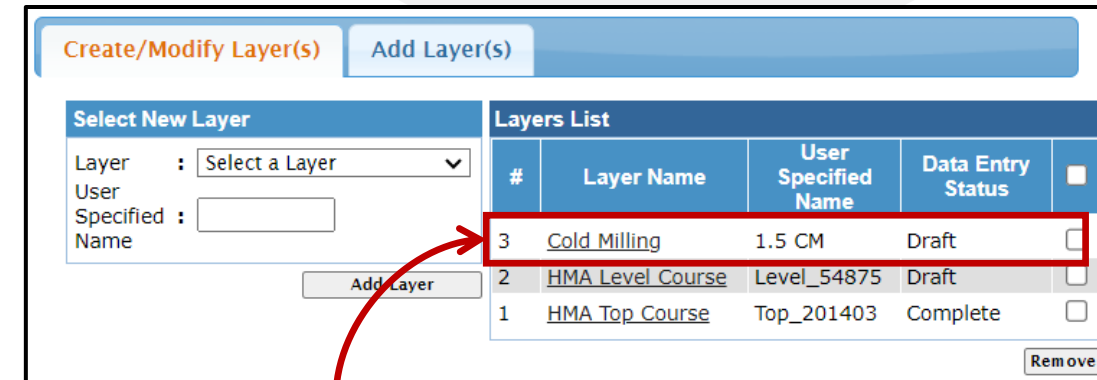
Save Layer As Draft Add to Layers Library (1)



User specified Name for Layer: 1.5 CM

Ok Cancel

(2) (3)



Create/Modify Layer(s) Add Layer(s)

Select New Layer

Layer : Select a Layer

User Specified :

Name

Add Layer

#	Layer Name	User Specified Name	Data Entry Status	
3	Cold Milling	1.5 CM	Draft	<input type="checkbox"/>
2	HMA Level Course	Level_54875	Draft	<input type="checkbox"/>
1	HMA Top Course	Top_201403	Complete	<input type="checkbox"/>

Remove

Result in the Layers Library Overview Screen

COPY SEGMENT DETAILS

- Click 'Copy Segment Details' (1)
- In the Copy Segment Details screen, select:
 - The **Completed** segment to **copy from** (select only one) and, (2)
 - The **Draft** segment to **copy to** (can select multiple) (3)
- Click 'Copy Details' (4)
 - ❖ WARNING: All segment details (lanes, shoulders/curb & gutter) will be overwritten

Copy From Complete Segment

Copy To Draft Segments

(2)

(3)

(4)

Back Copy Details

Post Construction Data | Road Segment List

Job Details [80912 / 163 - Concrete Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR (v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input type="radio"/>	1	962706	16	10.505	10.789	I-69	E	Active	Draft
<input type="radio"/>	2	962706	16	10.789	11.123	I-69	E	Active	Draft
<input type="radio"/>	3	962706	16	11.123	11.554	I-69	E	Active	Draft
<input checked="" type="radio"/>	4	961905	16	4.465	4.499	M-19	N/S	Active	Complete
<input type="radio"/>	5	961905	16	4.499	4.719	M-19	N/S	Active	Draft

Segment Details Quick Layer Overview

Copy Segment Details (1)

Create Segment Delete Segment View Map

Change PR Segment Mile Points

#	PR Number	BMP	EMP
4	961905	4.465	4.499

Apply Milepoint Changes

Create PR Sub Segments

No. of Sub Segments : [] [At least 2]

Create Sub Segments

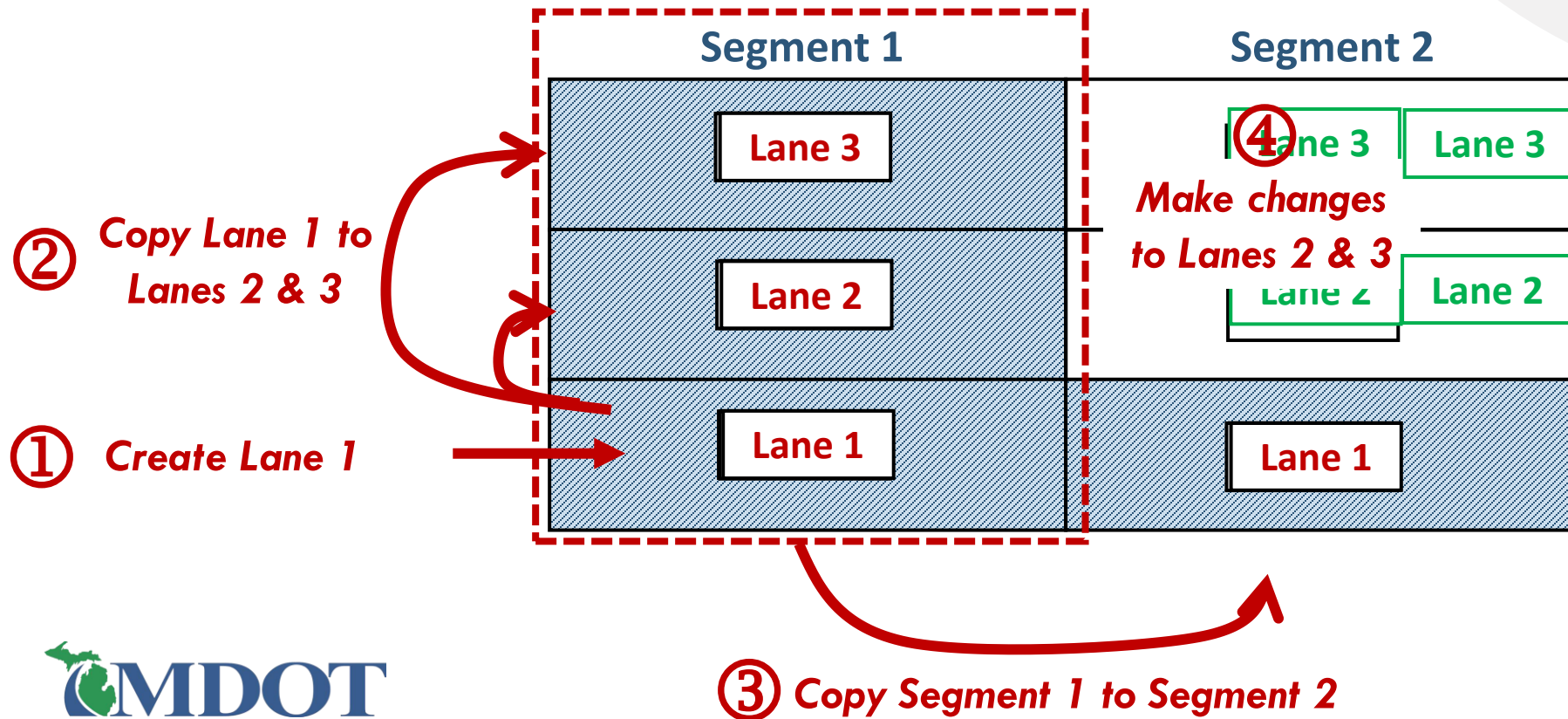
Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

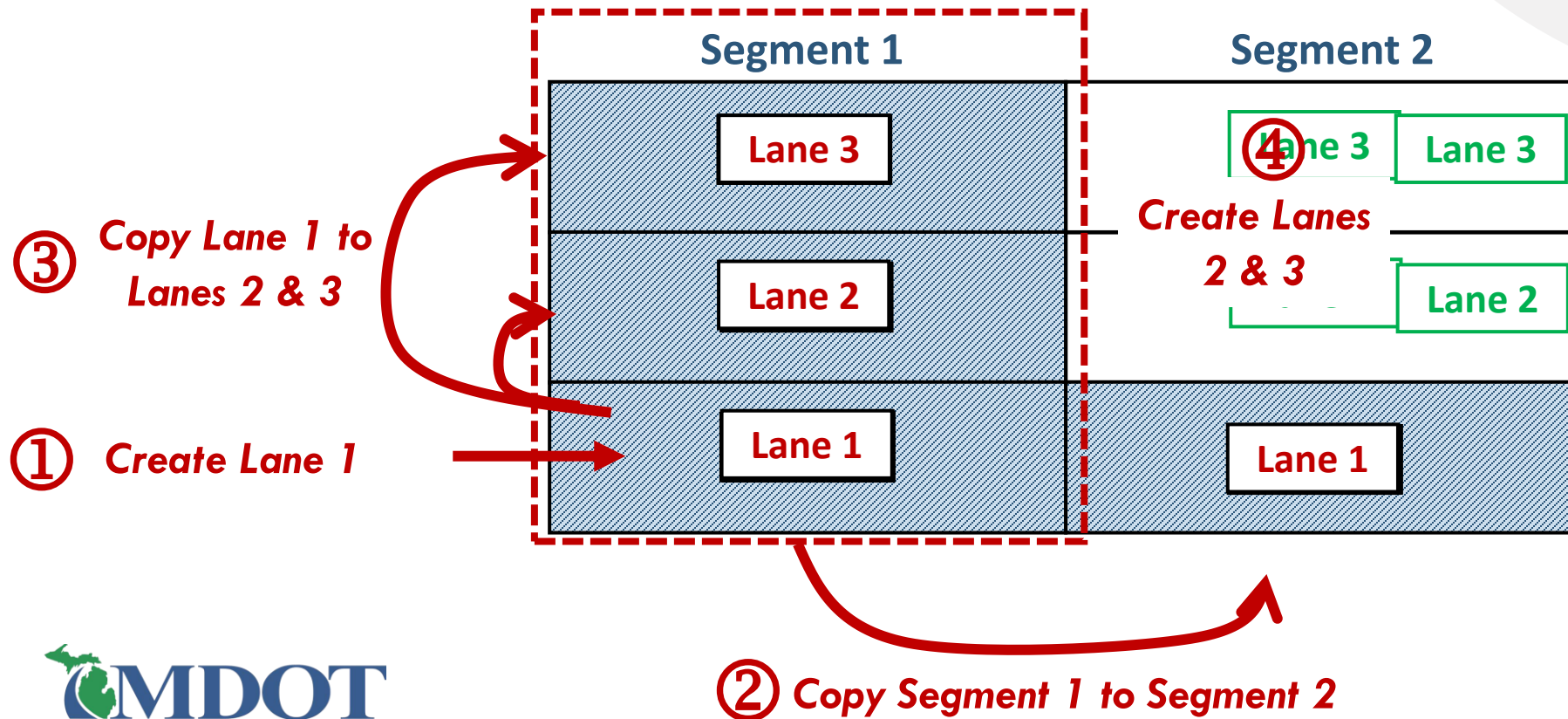
COPYING EXAMPLE (1)

- ❑ Using **Copy Lane** or **Copy Segment Details** can reduce data entry time and errors
- ❑ For Example:
 - Segment 1 has three lanes with identical info
 - Segment 2 has three lanes with different info, but Lane 1 is identical to Lane 1 of Segment 1



COPYING EXAMPLE (2)

- ❑ Using **Copy Lane** or **Copy Segment Details** can reduce data entry time and errors
- ❑ For Example:
 - Segment 1 has three lanes with identical info
 - Segment 2 has three lanes with different info, but Lane 1 is identical to Lane 1 of Segment 1



COMMENT BOXES

- ❑ Comment boxes are used to enter project specific details or additional information relating to the project or a particular segment
- ❑ Users can enter **up to 250 characters** of text

Post Construction Data | Road Segment List Role[s] :: Data Owner

Job Details [80912 / 163 - Concrete Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

	#	PR Number	PR (v)	BMP	EMP	Route	Direction	Framework Status	Data Status
<input type="radio"/>	1	962706	16	10.505	10.789	I-69	E	Active	Complete
<input type="radio"/>	2	962706	16	10.789	11.123	I-69	E	Active	Complete
<input type="radio"/>	3	962706	16	11.123	11.554	I-69	E	Active	Draft
<input checked="" type="radio"/>	4	961905	16	4.465	4.499	M-19	N/S	Active	Complete
<input type="radio"/>	5	961905	16	4.499	4.719	M-19	N/S	Active	Draft

Segment Details Copy Segment Details Create Segment Delete Segment View Map

Quick Layer Overview

Change PR Segment Mile Points

#	PR Number	BMP	EMP
4	961905	4.465	4.499

Create PR Sub Segments

No. of Sub Segments : [At least 2]

Create Sub Segments

Apply Milepoint Changes

PROJECT Comments

Project Comments [max 250 characters]

Back Finalize Job Save Job as Draft Cancel

Project Summary

Post Construction Data | Segment Overview Role[s] :: Data Owner

Segment Details [PR # - 961905 / MP : 4.465 ... 4.499] [Show] ▲

Segment Shoulder Overview

	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete

Segment Lane(s) Overview

Lane #	Work Done	Status
3.0	Yes	Complete
2.0	Yes	Complete
1.0	Yes	Complete

Lane Details

Segment Curb & Gutter Overview

	Left	Right
Work Done	Yes	Yes
Status	Complete	Complete

Shoulder, Curb & Gutter Details

Median Overview

* Median Type :

SEGMENT Comments

Segment Comments [max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

PROJECT/SEGMENT SUMMARY

- Click **Project Summary** in the Road Segment List screen, or
- Click **Segment Summary** in the Segment Overview screen
 - A PDF format pop-up summary will appear
 - The summary is an excellent resource for QA/review of entered data

Project Comments [max 250 characters]

This job was constructed concurrently with job 110441.

Back Finalize Job Save Job as Draft Cancel

Project Summary

Project Summary

Job Summary

Job Number	Work Type	Fix Life (Yrs)	Cost ^[1] / Lane Mile (\$)	Date	Lanes	Special Project Type	Pavement Study Number
80912	163 - Concrete Reconstruction	26		09/20/2016 ^[4]	0	N/A	N/A

^[1] - Construction Cost or A Phase CTD from MPINS / ^[4] - Open to Traffic Date / ^[6] - Let Date / ^[3] - A Phase start date / ^[4] - Sufficiency Year Imp

Segment Details

Region	TSC	County	Route	PR Number	PR BMP	PR EMP
Bay	Huron	St. Clair	I-69	962706	10.505	10.789

Median Type: Undivided / Median Width: 0 ft

Lane [1.0], Lane Type [Mainline], Sectional Details [Surface Type:HMA full depth / Width: 12.00 ft / Partial Width Paving: No / Paving Width: N/A]

Year Constructed	Pavement	Attribute	Value	Aggregate	Pit / Source
		AWI (Actual)	283	2NS	72-006
		Application Rate	165 Pounds Per Square Yard	21A	13-078
		Asphalt Binder	PG 70-28P		

Segment Comments
[max 250 characters]

Back Save Segment Save Segment As Draft Cancel

Segment Summary

Segment Summary

Job Summary

Job Number	Work Type	Fix Life (Yrs)	Cost ^[1] / Lane Mile (\$)	Date	Lanes	Special Project Type	Pavement Study Number
80912	163 - Concrete Reconstruction	26		09/20/2016 ^[4]	0	N/A	N/A

^[1] - Construction Cost or A Phase CTD from MPINS / ^[4] - Open to Traffic Date / ^[6] - Let Date / ^[3] - A Phase start date / ^[4] - Sufficiency Year Imp

Segment Details

Region	TSC	County	Route	PR Number	PR BMP	PR EMP
Bay	Huron	St. Clair	M-19	961905	4.465	4.499

Median Type: Undivided / Median Width: 0 ft

Lane [1.0], Lane Type [Mainline], Sectional Details [Surface Type:HMA full depth / Width: 12.00 ft / Partial Width Paving: No / Paving Width: N/A]

Year Constructed	Pavement	Attribute	Value	Aggregate	Pit / Source
		AWI (Actual)	283	2NS	72-006
		Application Rate	165 Pounds Per Square Yard	21A	13-078
		Asphalt Binder	PG 70-28P		
		Asphalt Binder Certified Supplier	Ajax Asphalt Terminal, Detroit, MI		
		Mix Design No. (Case Sensitive)	13MD299		
		Mix Type - HMA Top Course	5E3		
		Shingles Used	N		
		Warm Mix	N		
		Application Rate	220 Pounds Per Square Yard	22A	13-003
		Asphalt Binder	PG 70-28P	2NS	72-006
		Asphalt Binder Certified Supplier	Ajax Asphalt Terminal, Detroit, MI		
		Mix Design No. (Case Sensitive)	13MD297		

SAVE JOB AS DRAFT OR FINALIZE JOB

❑ Save Job as Draft:

- **Data Entry user:** Saves and keeps the job in the Modify area
- **Data Owner user:** Saves and moves the job from the Review area back to the Data Owner's Modify area

❑ Finalize Job:

- **Data Entry user:** Saves and moves the job to the Data Owner's Review area
- **Data Owner user:** Finalizes and sends the job to the PHD database

Post Construction Data | Modify List

Search Filter [Show] ▲

⚠ Job [80912] has been saved as a Draft.

MAP Job ID ▲	Non MAP Job ID	Non MAP Job Type	Work Type
33333	—	—	310—New Routes
45824	—	—	169—Cncr Pv Rubb & Bit Resurf
80912	—	—	163—Concrete Reconstruction
83996	—	—	170—Major Rehabilitation
84072	—	—	163—Concrete Reconstruction

Page: 1 of 7

Post Construction Data | Road Segment List

Job Details [80912 / 163 - Concrete Reconstruction] [Show] ▲

Edit Job Details

PR Segment List [Hide] ▼

#	PR Number	PR(v)	BMP	EMP	Route	Direction	Framework Status	Data Status
1	962706	16	10.505	10.789	I-69	E	Active	Complete
2	962706	16	10.789	11.123	I-69	E	Active	Complete
3	962706	16	11.123	11.554	I-69	E	Active	Complete
4	961905	16	4.465	4.499	M-19	N/S	Active	Complete
5	961905	16	4.499	4.719	M-19	N/S	Active	Complete

Change PR Segment Mile Point

Do you want to Save this job as a Draft?

☐ Prevent this page from creating additional dialogs.

OK Cancel

Back Finalize Job Save Job as Draft Cancel

Project Summary

miloginworkerqa.michigan.gov says:

Do you want to Finalize the job?

☐ Prevent this page from creating additional dialogs.

OK Cancel

Back Finalize Job Save Job as Draft Cancel

Project Summary

Post Construction Data | Modify List

Search Filter [Show] ▲

⚠ Job [80912] has been finalized.

MAP Job ID ▲	Non MAP Job ID	Non MAP Job Type	Work Type
33333	—	—	310—New Routes
45824	—	—	169—Cncr Pv Rubb & Bit Resurf
83996	—	—	170—Major Rehabilitation
84072	—	—	163—Concrete Reconstruction
87379	—	—	405—Overband Crack Fill

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